The house book; or, family chronicle of useful knowledge, and cottage physician: combining medicine, cookery, diet, general economy, health, sea-bathing, gardening, manufactures, arts, etc., ... including upwards of a thousand select recipes and prescriptions / [William Scott].

Contributors

Scott, William.

Publication/Creation

London : Sherwood, Gilbert & Piper, 1826.

Persistent URL

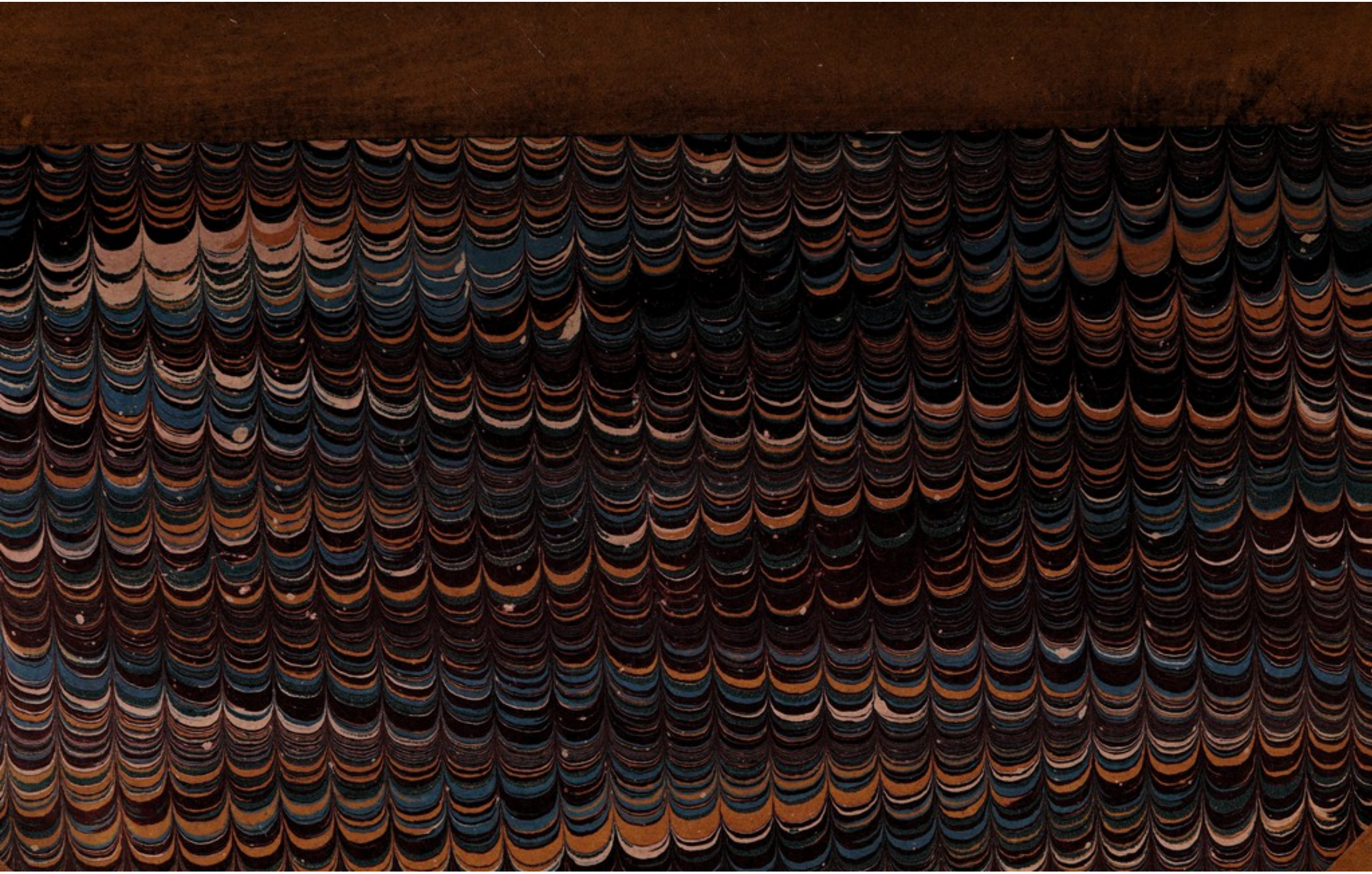
https://wellcomecollection.org/works/rhw7er3g

License and attribution

This work has been identified as being free of known restrictions under copyright law, including all related and neighbouring rights and is being made available under the Creative Commons, Public Domain Mark.

You can copy, modify, distribute and perform the work, even for commercial purposes, without asking permission.

Wellcome Collection
183 Euston Road
London NW1 2BE UK
T +44 (0)20 7611 8722
E library@wellcomecollection.org
https://wellcomecollection.org



47511/B


Digitized by the Internet Archive
in 2018 with funding from
Wellcome Library

https://archive.org/details/b29336508

FRONTISPIECE.



Storer sculp.t Pub.d by Sherwood, Neely & Jones, Dec.r 1820. Cruikshank del.t

Man is a progressive being: his Progression is his grand distinction: when he is most rapidly progressive then he most completely fulfils his destiny: any institution for education that is hostile to Progression is the most preposterous and vicious thing which the mind of man can conceive.

See the article Education.

THE

HOUSE BOOK;

OR,

FAMILY CHRONICLE OF USEFUL KNOWLEDGE,

AND

COTTAGE PHYSICIAN:

COMBINING

MEDICINE,
COOKERY,
DIET,
GENERAL ECONOMY,
HEALTH,

SEA-BATHING,
GARDENING,
MANUFACTURES,
ARTS, &c. &c.

WITH THE VARIOUS BRANCHES OF

Domestic Concerns;

INCLUDING UPWARDS OF

A THOUSAND SELECT RECIPES AND PRESCRIPTIONS,

FROM THE BEST AUTHORITIES; AND A VARIETY OF OTHER IMPORTANT INFORMATION, FOR THE USE OF FAMILIES, INVALIDS, AND CONVALESCENTS.

EDITED

BY WILLIAM SCOTT, M.D.

LONDON:

PRINTED FOR SHERWOOD, GILBERT, AND PIPER,

PATERNOSTER-ROW.

1826.

WELLCOME
HISTORICAL
MEDICAL
LIBRARY

B. M'Millan, Printer,
Bow-Street, Covent-Garden.

INTRODUCTION.

A BOOK, containing a fund of useful knowledge on a multiplicity of subjects of daily, nay hourly, occurrence, calling for the interference and exertion equally of the heads of families and individuals, gentle or simple, either in private or in public life, cannot fail to meet with a welcome reception from all who deem it their interest to be directed in the comfort, economy, and general management of the domestic circle, and their personal health, by the maturest experience, and most efficient practice, in all matters connected therewith.

Much has of late been said, but a great deal more has been written, on some of the subjects treated in the following pages; without, however, being either influenced or biassed by the opinion or practice of those who have assumed the dictatorship in family matters, on what authority we know not, our chief aim has been to select, and illustrate from the experience of ourselves, friends, and every other correct source of information, much of those principles of domestic economy, which, unabated and unchanged, have stood the test of long practical observation, and, like an heir-loom, will yet stand to be handed down to our children's children, without regard to the delusive fascinations of luxury or fashion, which, unlike the gradual advances of temperance to old age, suddenly sweep off their infatuated votaries, before they have regular notice to quit: so true is the old proverb, "that young folks think old folks to be fools," &c.

Medical quackery, and epicurism in diet, alike pernicious to health, are continually displaying their morbid blandishments, like the warbling of the deceitful sirens,

to tempt the unwary from the road of temperance, to their destruction. The empiricism of the non-practical scribes, namely, the writers, or rather the compilers, of certain useless and contradictory recipes, under fictitious names, either for food or physic, are equally as reprehensible and fatal to health, economy, and good living, as the nostrum of the quack, held up as a specific for certain diseases, where pump water alone might, with more propriety, and infinitely less risk, claim all its pretensions. The empirical and piratical scribe, therefore, is a dangerous enemy, equally obnoxious to health, and less ingenuous in his dealings than the openly avowed quack. The first acts, kill or cure, without discrimination—he takes every thing by chance and upon trust, and any thing upon hear-say, wherever he can get it. The second may have some little experience for his irregular practice, though, with equal chances in his favour, he may go a round-about way to work to bring it into an equivocal action. He is equally unsafe as the other; both, consequently, ought to be avoided, and Nature's simple rules, aided by some practical knowledge, adopted in preference. These are the principles which have invariably actuated every sensible and useful writer on Domestic Economy, Medicine, and Dietetics. In proof of this assertion, we may boldly advance, and without fear of contradiction, that the writings of Tissot, a French physician, and those of Dr. Buchan, in our own country, have done more service to the state, as regards the simplification of remedies in the treatment of diseases, than a host of physicians whose practice, though more profitable and less beneficial, has been still more mystical and complicated.

In the science also of the stomach, the great secret consists in rendering food acceptable to the palate, without unnecessary expence to the pocket; nourishing without being inflammatory, and savoury without surfeit-

ing; constantly endeavouring to maintain that salutary equilibrium which ought to distinguish economy from parsimony, epicurism from coarseness, and which constitutes the golden mean, the real philosopher's stone, the true panacea of human happiness—Healthand Longevity.

The art of good living is simple, and easy of attainment. Nature affords abundance, as well as variety, of articles of sustenance. This assertion is well verified in the language of the poet:

> "O, reason not the need: our basest beggars
> Are, in their poorest things, superfluous:
> Allow not Nature more than Nature needs,
> Man's life is as cheap as beasts'."—SHAKSPEARE.

Proceeding, as we purpose here to do, to notice some of the important features of this useful Work, we shall first introduce those comprehended under

DOMESTIC MEDICINE,

which includes many select Observations on Diet—Air—Sleep—Exercise—the Preservation of Health—Sea-Bathing—Treatment of Diseases—the Valetudinary, and Convalescent state—Indigestion—Lectures on the Physical Education, Management, and Treatment of the Diseases of Children, addressed, with Advice, to Mothers and Nurses—Prescriptions, selected from the writings and practice of the most distinguished Physicians of Europe, in all prevalent Diseases, interspersed with a multiplicity of opinion, tending to confirm their efficacy—General rules for preserving the Sight—Diseases of the Working Classes, the manner of avoiding and treating them, medically and surgically, without expence, danger, or inconvenience to their respective callings, all of which are treated in a manner equally simple, efficacious, and intelligible. The Medical History of Cold and Warm, Salt and Fresh-Water Bathing, and the various kinds of

medicated and other Baths, are prescribed, with all their advantages and disadvantages, under every variety of constitutional health and infirmity. And, compatible with this department of the Work, as uniting the pursuit of health with economy and recreation,

THE WELLS, MINERAL WATERS, WATERING-PLACES, SEA-BATHING, &c.

are historically and medically described; their virtues, and qualities; the diseases, doses, and seasons of drinking them, bathing, &c. and every other desirable information connected with these places of health and fashionable resort, are amply pointed out. The conveniences afforded at each place, interspersed with appropriate medical advice, and proper directions, in all cases, for using the waters, render this feature, with its appendages, an excellent and safe accompaniment, either to the travelling convalescent or the periodical visitor, where domestic management, nursing, and medical care, are indispensible to local and individual comfort.

Under these interesting heads are described the following localities, with all their respective advantages of sea-bathing, air, &c. MARGATE, RAMSGATE, BROADSTAIRS, DOVER, SANDGATE, TUNBRIDGE-WELLS, HASTINGS, BRIGHTON, SOUTHAMPTON, LYMINGTON, the ISLE OF WIGHT, HARROGATE, BUXTON, BATH, CHELTENHAM, GLOUCESTER SALINE CHALYBEATE SPA, &c.

The benefit of the fresh air, exercise, and change of scene, stand first among the restorative properties of these delightful places; and the advantages resulting from a happy combination of them, are known to produce effects in debilitated and worn-out constitutions, that are not to be derived from medicine alone. The gaiety that usually enlivens these summer retreats, the invigorating sea-breezes, &c. all contribute not a little to dissipate the melancholy of the hypochondriac, to renovate the

enfeebled energies of life, and to restore the valetudinary to the active duties of society. With these considerations in view, we felt ourselves called upon to devote considerable attention to a correct estimate of the circumstances and advantages usually expected, and frequently derived, from visiting the different Wells at certain seasons of the year. The general information, therefore, contained under this head, will be found a useful and desirable companion, embracing directions and instructions to families or individuals who visit the Wells, Mineral Waters, &c. including every thing that interests health, pleasure, and comfort, to be met with at the different watering-places along the coast.

DOMESTIC ECONOMY,

in every branch, is copiously treated. Many useful Family Recipes, from unquestionable authorities, tend to enrich the numerous articles which form this essential feature; under which are comprised the several departments of

HOUSEKEEPING AND HUSBANDRY,

which again will be found to include the best and most economical modes of

COOKERY,

in all its branches, of boiling, baking, stewing, broiling, frying, &c. with many cheap and useful directions for preparing various dishes, broths, soups, made-dishes, gravies, sauces, force-meats, stuffings for all kinds of game, poultry, puddings, pies, with the easiest, least expensive, and most salubrious modes of preparing them for the palate and the stomach; cookery for the sick, with a variety of medico-gastronomical directions relative to vegetable and animal food; also

BREWING AND BAKING.

The various adulterations which are well known to

enter into the composition of beer, and many other articles of human sustenance, render it a desideratum for families to prepare themselves those necessaries, which but too frequently are sophisticated by the mercenary manufacturer. Some excellent rules for brewing Ale, Table Beer, &c. will be found in the following pages, and which the result of long experience have proved to be superior to any directions previously communicated to the public with a similar intention. But, as "fermented liquors," observes an eminent author, "notwithstanding they have been exclaimed against by many writers, still continue to be the common drink of almost every person who can afford them," we would, nevertheless, rather endeavour to assist people in the selection of them, than pretend to condemn what custom has so firmly established; as it is not the moderate use of sound fermented liquors which hurts mankind: it is excess, and using such as are ill-prepared and vitiated; for it is well known, that if fermented liquors were faithfully prepared, kept to a proper age, and used in moderation, they would prove real blessings to mankind. But while they are ill-prepared, adulterated in various ways, and taken to excess, they must produce pernicious effects.

It is equally recommended to families, not only to prepare their own liquors, but also their bread, which forms so necessary a part of their diet, that too much attention and care cannot be paid to have this article of consumption sound and wholesome. For this purpose, it is necessary it should be made of good grain, properly prepared, and kept free from all unwholesome ingredients; which, unfortunately for the health of many, is not always the case when it is prepared by those who make a trade of selling it; and whose object it is rather to please the eye, than to consult the health of the consumer. The best bread is that which is neither too coarse nor too

fine; well fermented, and made of wheat-flour and rye mixed together.

As nothing contributes more to make an accomplished gentlewoman, than to be well instructed in the management of

HOUSEHOLD AFFAIRS,

as regards Marketing, the Laundry, general internal Economy, and in improving the products and fruits of the earth, &c. we have, in addition to what has already been stated under the preceding head, given many directions for making

PASTRY, CONFECTIONARY; PRESERVING, PICKLING, CAKES, CREAMS, JELLIES, MADE WINES, CORDIALS, DISTILLING, DIET-DRINKS, SALVES, OINTMENTS,

and other branches of good housewifery. The time of the year in which various kinds of fish, flesh, fowl, vegetables, &c. are in season, with the mode of dressing and serving them up, come also under this distinct head, in various places. Conformable with the intention of the work, we have also laid down the plainest directions for making

DISTILLED WATERS,

their properties, &c. are given; many of which are used as vehicles to disguise the nauseous taste of medicines; as well as those directed as perfumes, several of which are in great request, and valued, not for the above intentions alone, but for the medical and grateful properties they possess in various preparations of domestic utility. With the same views are also introduced the choicest methods of making a variety of

HARD CONFECTIONS,

such as lozenges of every description, drops, pastes, candies, refined liquorice, &c. forming a complete arrangement of useful Domestic Confectionary, consisting of the most grateful stomachic cordials of every class.

Under the head of

TOILETTE, (COSMETICS, AND PERFUMERY),

a select collection of recipes for making the most fragrant Perfumes and Cosmetics, many of which possess medicinal and detergent properties, and as such are really useful, consequently will be appreciated by both sexes, in whom attention to dress, if not attended with too great a sacrifice of time, is not only justifiable, but laudable; for a solicitous regard to neatness (we do not mean preciseness), preserves that air of delicacy, without which, the ardour inspired by the brightest charms will speedily sicken into disgust. Indeed, the graces of the person, as well as those of the mind, are to be ranked among the choice blessings of bounteous Heaven; and though we should not be vain of a superiority, either fancied or real, neither the one nor the other of these blessings ought to be neglected; and, provided too much is not sacrificed to superfluous embellishment, it is a point of duty to ornament them both to the best advantage, and not to suffer our talent to be buried in the dust. Neither the mind nor the person, indeed, ought to be disguised with the enamel of art; but both should be kept free from the soil of negligence, and graced with such ornaments as are most congenial with their respective peculiarities.

Under this head we have introduced no powder for the hair, no washes for the skin, but such as possess fragrant with medicinal properties; no rouge for the cheeks, nor pencils for the eye-brows; no *Kalydors* for the complexion; in short, none of those pernicious articles with which the silly part of the fair-sex think to improve their charms, by disguising, and not unfrequently corrupting Nature; and by which, at most, a transient and uninteresting bloom is purchased, at the expence of early wrinkles and immature old age. To be brief, all complexion beautifiers,

skin whiteners, &c. who so loudly puff off their washes and other poisonous lotions, deal deeply in mercury, which constitutes the principal ingredient. Let therefore this caution operate as a timely warning to those who would prefer their natural complexion, however homely, to the acquisition of a mercurial taint, which never fails to bring out equivocal eruptions of the skin, loathsome to the eye, and difficult to heal; besides laying the foundation of numerous other disorders. Many of these preparations will also be found analysed under the head of

SECRETS OF TRADE:

QUACK, OR PATENT MEDICINES;

where a full exposition of such nostra, the ingredients they are composed of, the proportions, boasted virtues, and doses, by whom invented, &c. are all laid down, with opinions and medical observations on their use and danger.

Many people, unacquainted with the fabrication of these articles, say that quack medicines are not intended against the constitution, but only against the pocket; and that they are too insipid to do either good or harm. But most of the medicines here mentioned, and many which have not been deemed worthy of any analysis, and which every dabbler deals in, are, in unskilful hands, destructive; and record furnishes us with numerous instances, of persons brought to condign punishment for administering similar compositions ignorantly.

In the reign of Edward VI. one Grigg, a poulterer in Surrey, was set in the pillory at Croydon, and again in the Borough of Southwark, during the time of the fair, for cheating people out of their money, by pretending to cure them with charms, by only looking at the patient, and by examining his water; and in the reign of James I. the Council dispatched a warrant to the Magistrates of the City of London, to take up all reputed empirics, and

to bring them before the Censors of the College, to examine how properly they were qualified to be trusted either with the lives or limbs of his Majesty's subjects. One Dr. Lamb, a noted quack, was brought before this judiciary ordeal; he had acquired an immense fortune by his pretended medicine, but was at last obliged to confess that he knew nothing of physic. Read and Woodhouse, two other contemporary quacks, were likewise brought to justice, and confessed the same.

In Stow's Chronicle we meet with an account of a water-caster being set on horseback, his face to the horse's tail, which he held in his hand, with a collar made of certain nameless utensils about his neck, led by the hangman through the city, whipped, branded, and afterwards banished. One Fairfax, in King William's time, was fined and imprisoned for doing great damage to several people by his *aqua celestis.* Anthony's *aurum potabile;* Arthur Dee, for advertising remedies which he gave out would cure all diseases; Foster, for selling a powder for the green sickness; Tenant, a water-doctor, consequently an impostor, who sold his pills for 6*l.* each; Aires, for selling purging sugar-plums; Hunt, for putting up bills in the streets for the cure of diseases; Philips, a distiller, for selling his strong waters, with directions what they were good for, and how persons were to take them; and many others of more modern introduction and improvement, were all severely punished, and compelled to relinquish their mal-practices, fraught with so much danger to the unwary public.

However lenient the laws are at present with respect to notoriously illiterate quacks and medicine-venders in the metropolis and country at large, it is plain that, notwithstanding the wisdom of the age, more care was formerly taken of the subjects' constitution, and their health was not suffered to be destroyed with impunity, by these

wholesale and retail poisoners of men, women, and children.

The causes of quackery obviously originated in various self, though mistaken, considerations. It was a favourite saying of Dr. Cullen, that there are in physic more false facts than false theories. It is by the want of due caution with regard to these, that quackery has been chiefly sustained; for those who do not belong to the profession, being off their guard, from not being in the habit of observing, and reflecting on the fallacy of testimony, and other sources of error; and being anxious to catch at relief, from whatever quarter, perhaps with minds soured by disappointment, and exquisitely sensitive to hopes and fears, however vain. These impressions are also wonderfully favoured by the operation of mystery and concealment; for, by some principle of human nature, not easy to be explained, there is a peculiar interest and importance attached to whatever is secret. The credit of these remedies is also greatly enhanced by the successful cases only being made public; for the innumerable cases in which they are used, whether openly or secretly, without the boasted good effects, still more if with bad effects, are never reported. And there is here a farther source of false or dubious testimony; for those who are induced to use those remedies, being anxious to ward off reproach or derision, justify themselves by making the most favourable report, and even by affecting to have received relief: and not unfrequently fancying, and honestly believing that they have actually received it.

It is also a curious and well-ascertained fact, that no nostrum has, in any instance, maintained its character after it was revealed. This was strikingly exemplified in the case of Ward's various remedies, which went entirely out of vogue the moment they were published, which was done after his death, by an injunction in his last will. And indeed it is still farther in proof of the capriciousness

of the world at large, on medical subjects, that all his remedies are excellent preparations or compositions, and, under the exercise of discretion, well adapted to the diseases they professed to cure. Indeed the injury done to the world by secret medicines in general, is frequently not so much from any thing pernicious and inefficient in their nature, as from their indiscriminate use, and the false confidence they inspire, to the exclusion of other, and better remedies. On the contrary, observes Sir Gilbert Blane*, it is presumable, that it must have been from some eminent and ascertained good effects observed from them, that the authors of them were first induced to offer them to the public. On the other hand, there are remedies not secret, but entirely inert, which attain a high degree of reputation, most commonly from the salutary powers of nature being mistaken for the effect of artificial appliances, or from the power of imagination. In proof of this, we have introduced some interesting remarks on

AMULETS, CHARMS, AND THE DOCTRINE OF EFFLUVIA,

which, like animal magnetism, the metallic tractors, the boasted virtues of certain substances, the doctrine of signatures, &c. had their run among the vulgar, and which, by having been proclaimed good for *every thing*, were, at length, found to be good for *nothing*. So much for credulity!

But it is not the vulgar alone who have been led astray by this species of easy belief. Men of great capacity, and high mental attainments, also men of dignified station, the heads of the law and the church, who had not given their minds to such pursuits, have been known to become converts to the most groveling imposture, and dupes of the vilest quackery. Bacon, for instance, believed in amulets, sorcery, and magic; and Boyle seriously recommended the thigh-bone of an executed criminal, prepared

* See Element of Medical Logic, p. 245.

in a prescribed manner, as a remedy in certain disorders. In short, if we reflect how deeply interesting life and health are, particularly to the affluent, and that they engage the hopes and fears of mankind so anxiously as to pervert the judgment of the most enlightened, the popular misconceptions on this subject ought rather to be matter of pity and regret than of surprise, indignation, or derision.

LIQUEURS,

including the richest French ratafias, creams, oils, &c. will be found a serviceable piece of information, not only to families, but to pastry-cooks, confectioners, hotels, and all who are interested in the preparation, sale, importation, or consumption, &c. of these articles of refined luxury. These, with numerous select and approved seasonable

DIRECTIONS FOR HOME-MADE FAMILY WINES,

different methods of preparing and preserving them for use, observations regarding their employment as medicinal auxiliaries, &c.: to these again may be added the

ECONOMY OF THE WINE-CELLAR,

under which are given instructions for the choice, with the methods of remedying the defects of wine cellars: also the management of French wines in the wood, fining and bottling of wines, choice of corks, with the various changes of which wine is susceptible.

GARDENING, AND RURAL ECONOMY,

Under HORTICULTURE, or GARDENING, much practical information, in a concise form, for every month in the year, is laid down in the various provinces of this useful and profitable domestic art; viz. in the kitchen and fruit-garden, and orchard; flower-garden, pleasure-grounds, shrubbery and plantations; nursery, green-house, and hot-house, hot-beds, and forcing-house, &c. whereby

people may be enabled occasionally to manage their own gardens, or to give directions for its cultivation in the several branches above enumerated.—Under RURAL ECONOMY, will be found some excellent instructions on the cultivation of various articles in constant requisition —manures, draining, fruit-trees, orcharding, destruction of insects, diseases of trees, remedies, hay-making, economy of bees, care of sheep, instructions for sowing and cultivating tobacco in England, method of increasing potatoes, flooding of meadows, preservation of game, &c. &c. being selections from the opinions of the best practical writers on these matters.

MISCELLANEOUS RECIPES USED IN THE MANUFACTURES, DOMESTIC ARTS, &c.

have also claimed a portion of our consideration. Among these will be found directions for the making and preparing various kinds of cements, varnishes, colours, and other articles used in dying, polishing, lacquering, bronzing, staining, vein-marbling, sundry methods of making the best and most durable inks, blacking, boot-top liquid, wash-colour for maps or writings, Blackman's colours in bladders, plate-powder, polishes, &c. &c.

In addition to the preceding features, much equally useful matter will be found interspersed throughout the work. Many eligible tables, containing information of general use in domestic concerns, desirable at all times to be acquainted with, relating to the prices of market-goods, at various rates, &c. &c. As the object of the Editor was to form a complete system of general domestic economy, neither pains nor expence have been spared in consulting the most popular authors in every department of useful knowledge; a reference to the following pages, will be the best proof of the zeal and industry by which he has been actuated, in the furtherance of these views.

THE

COTTAGE PHYSICIAN,

AND

FAMILY ADVISER,

&c. &c.

——"Dread winter spreads his latest glooms,
And reigns tremendous o'er the conquer'd year.
How dead the vegetable kingdom lies!
How dumb the tuneful! Horror wide extends
His desolate domain. Behold, fond man!
See here thy pictur'd life! Pass some few years,
Thy flowering spring, thy summer's ardent strength,
Thy sober autumn fading into age,
And pale concluding winter comes at last,
And shuts the scene."——

THE SEASONS.—*Winter.*

OBSERVATIONS ON CLOTHING, INFLUENCE OF AIR, WEATHER, EXERCISE, REST, &c.

DURING the present inclement season of the year, it may not be amiss to offer some salutary observations on the variable state of the atmosphere, and on the different articles of dress requisite to ensure a continuance of health, by guarding against the vicissitudes of the weather, which is always sure, more or less, to affect the system during the winter quarter. Cold, it is known, renders bodies more compact, particularly the solid parts of the animal structure—such as the muscles, nerves, bones, &c.; in winter they become more elastic, the appetite for food is stronger, and digestion, if the organs necessary to this process be in good order, is always carried on easier and quicker. On the contrary, if the cold be too violent, the resistance offered by the fluids becomes so great, that even the increased power of the solids cannot overcome it. The blood, in winter, is much disposed to influence inflammatory diseases; for example,

stitches in the side, sore throats, hoarseness, rheumatism, &c. In those persons who, from natural inactivity, use little exercise, the fluids are apt to stagnate, and the solids to become chill during the winter, giving rise to diseases, by impeding the circulation of the blood, the secretion of the various humours, &c. by checking the insensible perspiration.

The humidity of the atmosphere is another cause of disease, which, when increased, never fails to bring along with it that unaccountable torpor and lassitude by which the mind becomes sensibly depressed; and with the loss of energy which accompanies such a state, that cheerfulness and equanimity are lost, which are its characteristics under different and more agreeable impressions. Damp places and districts, particularly in cold weather, are always unhealthy. Moisture, by diminishing perspiration, is no less productive of disorders of the throat, chest, and abdomen.

Dry and Cool Air, from its possessing a sufficient degree of elasticity, promotes in an extraordinary degree the serenity and agility of both mind and body; hence its decided benefit to people of a hypochondriacal disposition. But *a dry and very cold air* generates inflammations, from its tending to thicken the blood. Dry and hot air affects us like heat, and enervates the body; and a dry air, which is not too warm, is both agreeable and healthy. *Great and hasty transitions* from a warm to a cold, or from a light to a heavy air, are highly injurious to valetudinarians, as well as to those in a state of health. Soldiers in camps, and travellers, feel, not unfrequently, very severely the bad effects of cold and moist air, after long marches and journeys.

Infirm and weakly people very often experience ominous sensations previous to any remarkable changes in the state of the atmosphere. *A moderately heavy and elastic air,* is the most salutary as well as the most agreeable to the human body; hence the reason we are not assigned by Nature to reside constantly on the tops of mountains. *A light and rarefied air* is, nevertheless, not so ill adapted for respiration, nor does it manifest an influence so prejudicial to the human frame as was formerly imagined.

As regards clothing, which, judiciously arranged, is calculated in a great measure, if not entirely, to counteract the baleful influence of cold and moisture, it may be

briefly observed, that there is nothing contributes more essentially to health and comfort, than a well-directed attention to these articles; nor does it require any laboured commentary, in giving plain directions for the management of this department of medical precepts. The general properties of a good, commodious, and comfortable dress, may be briefly comprised as follows, viz. That it be soft and pliable, so as not to obstruct the free and easy motions of the joints, nor in any other respect to incommode us, either by its weight or tightness;—that it be adequate to protect the body from the external influence of the atmosphere, and preserve the body in that degree of temperature which is most agreeable, as well as best adapted to the exercise of the different functions and motions compatible with a state of health;—that it do not produce any detrimental effects, so as to increase an unnecessary degree of perspiration, nor absorb the vapours of the atmosphere. As far as individual clothing is concerned, these are the essential requisites for the preservation of health.

While on the subject of clothes, we cannot resist laying before our readers, particularly at this season of the year, the judicious observations of Dr. Kitchiner*, whose opinions so perfectly accord with our own. "A gentleman who has a mind to carry the adjustment of his clothes to a nicety, may have the shelves of his wardrobe numbered 30, 40, 50, 60, &c. and according to the degrees of cold pointed to by his Fahrenheit†, he may wear a corresponding defence against it. This mode of adjusting dress according to the vicissitudes of the weather, &c. is as rational as the ordinary practice of regulating it by the almanack or the fashion, which, in this uncertain climate, and capricious age, will as often lead us wrong as right."

Directions for the regulation of Wearing Apparel, &c.

Leave off your winter clothes late in the spring; put them on early in autumn. By wearing your winter clothes during the first half dozen warm days, you get some fine per-

---

* See Peptic Precepts, p. 144.

† Thermometers intended to give the temperature of rooms, should be so placed as to be equally removed from the radiant heat of the fire, and from currents of air from the door. Out of doors, they should be in a northern situation, sheltered from sunshine, or reflected heat.

spirations, which are highly salutary in removing obstructions in the cutaneous pores, &c. *Delicate and dyspeptic persons are often distressed by changing their dress,* which should be as uniform as possible, in thickness, quality, and form, especially flannel, or indeed whatever is worn next to the skin. The change of a thick waistcoat for a thin one, or a long one for a shorter one; not putting on winter garments soon enough, or leaving them off too soon, will often excite a violent disorder in the lungs, bowels, &c. and exasperate any existing constitutional complaint.

Those who wear flannel waistcoats, are recommended to have their new ones about the middle of November, with sleeves to them coming down to the wrist: the shortening these sleeves in warm weather, is as effective an antidote against extreme heat, as lengthening them, and closing the cuff of the coat, is against intense cold.

Coats* should be made so large, that when buttoned, we may be as easy as when it is unbuttoned, so that without any unpleasant pressure on the chest, &c. we may wear it closely buttoned up to the chin: the power of doing this, is a convenient provision against the sudden transitions from heat to cold. Buttoning up this outer garment, will protect the delicate from the many mischiefs so apt to arise in this precarious and uncertain climate, from the want of such an article of defence; and the additional warmth it produces, will often cure slight colds, &c. Another mode of accumulating heat, is to have two sets of button-holes to the cuff of the coat (especially the great-coat), one of which will bring it close round the wrist.

Boerhaave observed, that only fools and beggars suffered from cold; the latter not being able to procure sufficient clothes—the former not having the sense to wear them.

People advanced in life, well know how to appreciate these observations, without, at the sacrifice of their health, being biassed either by prejudice or fashion.

---

* In the Life of John Stewart, the traveller, better known about London by the name of *Walking* Stewart, he observes: "I clothed myself at all times very warm, and by buttoning and unbuttoning, I could accommodate to the sudden changes of climate and season, and preserved thereby, that equilibre of the secretions and excretions, on which life and health depends; for clothing forms a factitious heat, as a substitute to the muscular heat, declining with age or sickness; on which action of heat, vitality, and all the other functions of vital organism, depend."

When the feet grow cold, from languor in the circulation, worsted stockings are the fittest coverings for them, observing to have your shoes well warmed; and in taking them from the fire, to put your slippers in their place, that they may be dry, warm, and comfortable when you want them again. The best slippers are a pair of old shoes; the worst, those of plaited cloth, which not only make the feet tender, but are a hotter covering for them in the house, than you put upon them when you go out.

In wet weather, shoes with good thick soles, and double upper leathers, which will keep the feet much drier than one thick one. The curriers' dubbing is the best nourisher of leather, rendering it as soft as satin, and impervious to water.

The restoration, as well as the preservation of health, especially of those who have passed their FORTIETH YEAR, depends upon a scrupulous and unremitting attention to food, clothes, exercise, pure air, &c.; any of which, taken individually, may appear trifling, but, taken in the aggregate, are of the most vital importance.

Tight hats, stays*, braces, garters, &c. obstruct the circulation of the blood, and are often the cause of many chronic complaints, which lay the foundation of organic diseases, &c.

Exercise and Rest.

Those who do not take a sufficient quantity of exercise, soon suffer from a number of disorders, *e. g.* want of appetite, want of sleep, flatulence, &c. obstructions, relaxation of the bowels, and all the diversified symptoms of nervous complaints. Men of letters suffer much, and, from neglecting to take exercise, are often the most unhealthy of human beings; even that temperance by which many of them are distinguished, is no effectual remedy against the mischief of a sedentary life, which can only be counteracted by a proper quantity of exercise and air.—*See* SIR JOHN SINCLAIR'S *Code of Health and Longevity.*

---

* Stays and stiff jackets are most pernicious; they disfigure the beautiful and upright shape of a woman, and injure the breasts and bowels; obstruct the breathing and digestion; hurt the breasts and nipples so much, that many mothers have been prevented by their use from suckling their children; hence many get cancers, and at last lose both health and life—for they render the delivery of women very difficult and dangerous, both to mother and child.—DR. FAUST'S "*Catechism of Health.*"

The advantages to be derived from exercise, are, increase of bodily strength, free circulation of the blood and the other fluids, a due performance of the necessary secretions and excretions—the whole mass of blood is cleared and refined, so that stagnation does not take place, even in the minutest vessels; and if any obstruction be beginning to take place, it will be effectually relieved by it.

To those, however, unaccustomed to it, violent exercise is particularly hurtful; more so, when excesses in eating and drinking have been committed. Those also, whose bodies have not been sufficiently nourished by food and drink, may do themselves harm by using too much exercise. In like manner, sudden transitions from a state of rest to violent action, is likewise hurtful, and still more so in hot than in cold weather. After strong emotions of the mind, every species of bodily exercise ought to be avoided, till the tranquillity of the mind return upon an equilibrium with that of the body: the effects of cold should nevertheless be guarded against, which, in such a state, might prove extremely injurious*.

Manner of taking Exercise.

Three principal points in the manner of taking exercise, are necessary to be attended to, viz. 1. The kind of exercise;—2. The proper time for exercise;—3. The duration of it.

With respect to the kinds of exercise, the various species of it may be divided into active and passive. Among the first, which admit of being considerably diversified, may be enumerated, walking, running, leaping, swimming, riding, fencing, the military exercise, different sorts of athletic games, &c. Among the latter, or passive kinds of exercises, may be comprised riding in a carriage, sailing, friction, swinging, &c. The first, or active exercises, are more beneficial to youth, to the middle-aged, to the robust in general, and particularly to the corpulent, the plethoric, and to those whose evacuations are not in a due proportion to their supplies. The second, or passive kinds of exercise, on the contrary, are better calculated for children; old, dry, and emaciated persons

---

* See "The Natural and Medical Dieteticon," for many useful observations on the preceding subjects, just published.

of a delicate and debilitated constitution; and particularly to the asthmatic and consumptive.

With regard to the time at which exercise is most proper, it, in fact, depends on such a variety of concurrent circumstances, that it does not admit of being regulated by any general rules, and must therefore be collected from the observations made on the effects of air, food, drink, &c.

With respect to the duration of exercise, there are other particulars, relative to a greater or less degree of fatigue attending the different species, and utility of it in certain states of the mind and body, which must determine this consideration as well as the preceding. That exercise is to be preferred, which, with a view to brace and strengthen the body, we are most accustomed to, as any unusual one may be attended with a contrary effect*. Exercise should always be begun and finished gradually, never abruptly. Exercise in the open air has many advantages over that used within doors. To continue exercise until a profuse perspiration, or a great degree of weariness take place, is far from being wholesome. In the forenoon, when the stomach is not too much distended, muscular motion is both agreeable and healthful; it strengthens digestion, and heats the body less than with a full stomach; and a good appetite after it, is a proof that it has not been carried to excess. But, at the same time, it should be understood, that it is not adviseable to take violent exercise immediately before a meal, as digestion might thereby be retarded. Neither should we sit down to a substantial dinner or supper immediately on returning from a fatiguing walk, at a time when the blood is heated, and the body in a state of perspiration from previous exertion, as the worst consequences may arise, especially where cooling dishes, salad, or a glass of cold drink is begun with. Exercise is always hurtful after meals, from its impeding digestion, by propelling those fluids too much towards the surface of the body, which are designed for the solution of the food in the stomach.

---

* To the delicate and invalid, carriage exercise is preferable; horse exercise to the more hardy; but foot exercise, is most convenient for many reasons. For small is the proportion of mankind, who can afford to use either a carriage or a horse. *Adair's Essay on Diet and Regimen*, p. 62.—Both body and mind are enlivened by walking; and even when carried to an extreme, it has often been found highly serviceable in nervous diseases.—*Turnbull's Medical Works*, p. 120.

HEALTH, LONGEVITY, AND DEATH.

"IF," observes the author of the 'Code of Health and Longevity,' "men lived uniformly in a healthy climate, were possessed of strong and vigorous frames, were descended from healthy parents, were educated in a hardy and active manner, were possessed of excellent natural dispositions, were placed in comfortable situations in life, were engaged only in healthy occupations, were happily connected in marriage, and kept their passions in due subjection, there would be little occasion for medical rules."—All this is very excellent and desirable; but, unfortunately for mankind, unattainable. Man must be something more than man, to be able to connect the different links of this harmonious chain—to consolidate this *summum bonum* of earthly felicity into one uninterrupted whole. For, independent of all regularity or irregularity of diet, passions, and other sublunary circumstances, contingencies and connexions, relative or absolute, thousands are visited by diseases and precipitated into the grave, independent of accident, to whom no particular vice could attach, and with whom the appetite never overstepped the boundaries of temperance. Do we not hear almost daily, of instances of men living near to, and even upwards of a century? We cannot account for this; either because of such men we know but few who have lived otherwise than the world around them; and we have known many who have lived in habitual intemperance for forty or fifty years without interruption, and without much apparent inconvenience.

Children, whose constitutions cannot be, and women whose constitutions seldom are, injured by intemperance, are the frequent prey of death. How is this to be accounted for? We see a beautiful body, the model of health and strength, attacked by certain pains and irregularities, which we call disease, and which close the scene of life in its prime. Why these things are, God only knows. We cannot account for length or shortness of life. Temperance ought to be practised as a duty, and as one on which a healthful existence depends; still temperance is no defence against death. We frequently see the healthiest and strongest men cut off by a few days' illness; while, on the other hand, it is wonderful what length and severity of disease the feeble and the valetudinary will survive.

The assertion has been made by those who have attained a great age, (Parr, and Henry Jenkins, for instance), that they adopted no particular arts for the preservation of their health; consequently, it might be inferred, that the duration of life has no dependence on manners or customs, or the qualities of particular food. This, however, is an error of no common magnitude. Peasants, labourers, and other hard-working people, more especially those whose occupations require them to be much in the open air, may be considered as following a regulated system of moderation, and hence the higher degree of health which prevails among them and their families. They also observe rules; and those which it is said were recommended by Old Parr, are remarkable for good sense; namely, "keep your head cool by temperance, your feet warm by exercise; rise early, and go soon to bed; and if you are inclined to get fat, keep your eyes open and your mouth shut*." In other words, sleep moderately, and be abstemious in diet;—excellent admonitions, more especially to those inclined to corpulency.

The advantages to be derived from a regular mode of living, with a view to the preservation of health and life, are no where better exemplified than in the precepts and practice of Plutarch; whose rules for this purpose are excellent; and by observing them himself, he maintained his bodily strength, and mental faculties unimpaired, to a very advanced age. Galen† is a still stronger proof of the advantages of a regular plan, by means of which he reached the great age of 140 years without having ever experienced disease. His advice to the readers of his Treatise on Health is as follows: "I beseech all persons who shall read this work, not to degrade themselves to a level with the brutes, or the rabble, by gratifying their sloth, or by eating and drinking promiscuously whatever pleases their palates, or by indulging their appetites of every kind. But whether they understand physic or not, let them consult their reason, and observe what agrees, and what does not agree with them, that, like wise men, they may adhere to the use of such things as conduce to

---

* It is stated by others, that the latter part of this maxim was—"Never eat till you are hungry; nor drink but when nature requires it." James Donald, an old man who lately died in Dunbartonshire, aged at least ninety-three (some imagine one hundred years), always made it a rule to walk at least two miles every day, either out of doors, in good weather; or within in bad.

† A celebrated physician, born at Pergamus, in Asia Minor, anno dom. 131.

their health, and forbear every thing which, by their own experience, they find to do them hurt; *and let them be assured, that, by a diligent observation and practice of this rule, they may enjoy a good share of health, and seldom stand in need of physic or physicians.*"

Cornaro*, and the Archbishop of Seville, are other memorable instances of the efficacy of rules. The former attained his 101st year; the latter, who died in 1785, his 110th. It was no less by attention to rules, such as strict temperance, regular exercise, and judicious habits, that the celebrated John Wesley, notwithstanding a delicate constitution, protracted his existence to near ninety years; and was enabled, during that long period, to undergo much bodily and mental exertion and fatigue.

Shakspeare's Description of a Healthy Old Man.

"Though I look old, yet I am strong and lusty,
For in my youth I never did apply
Hot and rebellious liquors in my blood;
Nor did not, with unbashful forehead, woo
The means of weakness and debility;
Therefore my age is as a lusty winter,
Frostly, but kindly."

This is a very able delineation of the effects of temperance on declining years, which, coupled with the preceding allusions, and other facts of a similar nature that might be brought forward, are sufficient, nay, encouraging proofs of the efficacy of rules, and how much they are deserving of attention and cultivation.

Healthy old age, is doubtless a fine subject of contemplation; but we know not, even by rules, that it can be acquired. Few very old men, who are healthy, have lived by system, with all its recommendations; and, according to the significant experience of our English Seneca (Dr. Johnson), a healthy old man, after all, is but a *tower undermined.*

The attainment of long life, if attended with a good state of bodily health, is not only an important consideration to the individual, but also, if he be an upright man, and an useful member of society, to the community to which he belongs; declining years, under such circumstances, often prove the happiest period of our existence.

Children, and very young persons, endure the thoughts

---

* See Cottage Physician, No. 7, Old Series.

of death with great composure. Perhaps this proceeds from their innocence, and from their having few ties to engage their attention here. They are observed indeed to struggle hard in the hour of death, but that is the consequence of a sound constitution. Life with them is not wasted: the whole of it is at once taken from them.

It may with propriety be doubted, whether ever a really good man formed, or expressed, the wish of dying suddenly, from its being preferable to a lingering and painful illness; for surely no man could wish to rush abruptly into the presence of his Maker. Besides, the last illness is not always attended with pain, and how exquisitely consoling to those sensible minds who survive them, are the dying words of a good and pious man.

It has been said, that "It matters not how a man dies, but how he lives; the act of dying is not of importance, it lasts so short a time." The act of dying, the expiration of the last breath, is certainly not of importance, inasmuch only as it closes the scene of our earthly career; but it *does* matter how a man dies, in whatever manner he may have lived. It is the most solemn act man can perform. It is that which completes his character, discovers his principles, and affords the greatest consolation, or the greatest misery, to his friends. It is important, because he throws off all disguise. Yet so short is the period allotted for this inevitable act of solemnity, that we are generally inclined to compare the past with the present; and, if we do not distrust the sincerity of a dying man, we are not apt to venerate it. It is good to die well—but it is better to live well. There seems a compulsion in the former; in the latter, all is voluntary.

A short Sketch of the Human Passions.

As the emotions of the mind are acknowledged to possess considerable influence over the health of the body, the following short tabular sketch of them, giving their sources, varieties, and deviations, will serve to point out the intimate connection these subjects have with inquiries relative to health, on which longevity may be said to depend. As the mind evidently rules the body, unless we form an idea of the nature of the mind, how can we know how to preserve the health of the body? We might as well pretend to negotiate with a foreign nation, without any

knowledge of the nature of its government, or under whose guidance its affairs were conducted.

A passion has been defined, "A movement of the mind, occasioned by some strong impression made upon it, either by external objects through the senses, or by the power of the imagination." The passions, therefore, are the great springs of action, impelling the mind, or spirit, through the influence of which the body is governed. The passions are certainly the springs of virtue, and intended for the benefit of mankind; but though, in their nature and origin good, yet, they are too apt to run into a contrary stream, and become the sources of vice. If, however, we make a proper exercise of our mental faculties, we may govern our passions, and direct them to their true and proper ends.

By the following analysis of the passions, we shall at once be able to distinguish the genuine emotions of human nature, in its perfect state, from those which are the unfortunate consequences of its depravity.

SOURCES.	VARIETIES.	DEVIATIONS.
AMBITION,	Desire of power, Desire of fame,	Avarice, Envy.
ANGER,	Indignation, Resentment,	Retaliation, Revenge, Rage, Fury, Fretfulness, Moroseness, Surliness, Hastiness, Sullenness.
ANTIPATHY, or AVERSION,	Natural repugnance,	Hatred, Malevolence, Rancour, Spite, Misanthropy.
CURIOSITY,	Desire of information,	Futile curiosity, Dishonourable curiosity.
FEAR,	Timidity, Terror, Horror, Awe,	Cowardice.
HOPE,	Rational hope,	Chimerical hope.
JOY,	Cheerfulness, Mirth,	Exultation, False spirits fictitiously procured, Malignant joy.

SOURCES.	VARIETIES.	DEVIATIONS.
LOVE,	Self love, Social love, Parental affection, Esteem, Friendship, Patriotism, Philanthropy, Benevolence, Charity, Gratitude, Piety,	Pride, Arrogance, Haughtiness, Vain glory, Vanity, Jealousy.
SHAME,	Bashfulness, Diffidence,	Shame of doing right.
SORROW, or GRIEF,	Melancholy, Contrition, Remorse,	Despair.
SYMPATHY,	Pity, Terror,	Vicious sympathy.
WONDER,	Admiration, Astonishment.	

ELIXIR OF LONG LIFE.

VARIOUS modes have been devised for strengthening the stomach, and keeping the whole apparatus of digestion in good condition. In Sweden, the elixir of Dr. Jernitz was held in general repute; and, as a proof of its efficacy, it is stated that the Doctor himself lived to the age of 104 years, his son to 100, and that the whole family, by the constant use of it, attained a great age. Numbers also in the same country, are said to have received great benefit from it. The following is the receipt for making this elixir, as presented to Sir John Sinclair, Bart.; which, whether it may prolong life or not, we cannot disapprove of it, as an excellent stomachic tincture. It has been tried in England, and found serviceable to the stomach; and by strengthening that important organ, it is said also to render persons less liable to catch cold.

Take Socotrine aloes	- -	1 drachm.
Zedoary root, Gentian root, Levant saffron, Fine rhubarb,	in powder	1 drachm.
Venice treacle	- -	1 drachm.

The five first mentioned articles being finely powdered, are to be passed through a sieve, and afterwards put into

a bottle with the Venice treacle, and a pint of good brandy added to them. The mouth of the bottle is to be well stopped with wet parchment, and when this dries, several holes are to be made into it with a pin; it is to be left for nine days, observing occasionally to shake it well up. On the tenth day, the infusion is to be carefully poured off, as long as the liquor continues clear, into another bottle; which is afterwards to be well stopped with linen. A second pint of brandy is afterwards to be poured upon the dregs, for a second infusion, which is to be left for nine days more in the bottle, well stopped as before, and shaken in the same manner. On the tenth day, pour off again into another bottle, as long as it passes off clear; and when it begins to be turbid, it should be filtered through cotton in the funnel several times: the two infusions are afterwards to be added, and kept in a stopper bottle for use.

By the daily use of this remedy, it is said that one may live for a very long time, without requiring bleeding, or any other medicine or preservative against contagious diseases. It throws out the small-pox without any danger; and it possesses this admirable property, that a very strong dose of it may be taken, should occasion require it; and it is also as serviceable in small quantities, according to circumstances. It is directed to be taken in the following manner: For sickness at the stomach, one spoonful, quite pure; for indigestion, two spoonfuls in four of tea; for drunkenness, two spoonfuls, quite pure; for colicks, two spoonfuls, in four of brandy; for fits of the gout, during the fit, and particularly when it is getting up, three spoonfuls quite pure; for worms, one spoonful before eating, for eight days; for the dropsy, one spoonful in white wine for a month; for intermitting fevers (agues), a spoonful quite pure before the cold fit; and, if the fever is not cured by the first or second dose, it will undoubtedly be so by the third.

The only precaution necessary in taking a large dose of this elixir, is, to eat nothing raw, to take neither milk nor salad, and not to go too much into the open air. The quantity to be taken daily, as a strengthener of the stomach, is seven drops for women, and nine for men. Very old people should take, besides, a spoonful quite pure, every eighth day.

STOMACH PILLS.

Take Powder of ipecacuanha,	-	1 scruple.
Powder of rhubarb,	-	2 scruples.
Simple syrup,	- -	a sufficient quantity.

Make twenty-four pills, and take one every night at bed-time.

For weak and delicate stomachs, these pills have been recommended by an eminent physician.

TOOTH-ACHE, AND ANTI-RHEUMATIC EMBROCATION.

In no department of the medical practice, is there more dangerous quackery than that afforded by the tooth-ache. This complaint is, to those who have the misfortune to be visited with it, an intolerable source of torment. Neither stoics nor philosophers can endure it; and what is worse, the fair sex, the weaker vessels, are more frequently its victim than the sturdy and athletic male. When this affliction befalls any one, we recommend the following embrocation, in either of the proportions, according to the purpose for which it may be wanted, on good authority, as well as from personal observation:

Take Sal volatile,	3 drachms or 9 drachms.
Tincture of opium,	1 drachm or 3 drachms.

Mix them, and, if for rheumatism, rub the part affected frequently; if for a hollow tooth that aches, dip in it a piece of cotton, and introduce it into the cavity. For a general face-ache, or sore throat, moisten a bit of flannel with some of it, and at bed-time apply it to the part affected. Keeping the bowels open, by taking half an ounce of Epsom salts at bed-time, and applying the above, we have witnessed the most inveterate attacks of face and tooth-ache, rheumatism, &c. alleviated, and frequently removed within twenty-four hours.

HEALTH AND QUACKERY.

Some men are as eager to get rid of their health as others are to preserve it. To their friends and companions, the latter become a much more insufferable spectacle than the first. An excessive anxiety about health, generally produces that morbid carefulness which is called 'quacking one's self;' a custom to which many

give way from good intention, and with a view originally to cure some active complaint, but which, assisted by the force of imagination, produces, on the contrary, a train of complaints that are often incurable.

We have all heard of certain persons, who, when something has troubled their minds, have had recourse to the bottle, as a medium of ease, and have never been able to leave off the deleterious practice. Your *quacking* people are much about in the same predicament. Some complaint has been removed by medicines; and, on this account, such a violent liking has been taken for drugs, as never to be easy without them, nor able to leave off taking them in one shape or other. Such persons, with the utmost efforts at health, are never well, nor ever without some cause of complaint. They procure popular books on medicine, and as Don Quixote, from reading books of chivalry, fancied himself doomed to be a knight-errant, so they, from reading histories of diseases, fancy they are born to be afflicted with every distemper they read of, and prepare their cures accordingly. In the morning, something must be taken to correct the wind on the stomach; at noon, something also must be taken to promote digestion—dinner pills, or some such other buffoonery; in the afternoon, they remove the foulness of the stomach; in the evening they guard against the ague; and at night they procure sleep. If the physician be called in, he is anticipated in all his recipes, and to prescribe such gentle remedies as are usual in incipient disorders, would be as effectual as to recommend weak negus to warm the stomach of a brandy drinker. Indeed, there are plenty of practitioners of the present day, who desire no better customers, than a dozen such squeamish ladies of quality. 'The doctor,' says Foote's *Julep*, 'that doses best, is the best doctor for us.'

Prodigality of health, and avarice of ease, are the two extremes a wise man would wish to avoid: they are, indeed, equally culpable. For the man who, endowed by nature with a strong constitution, wantonly exhausts it in luxurious and lawless pleasures, there is no known excuse can be made. What language can excuse the impious ingratitude to Heaven, which such conduct implies; and what temptation of company, or situation in life, however it may account, can justify this species of slow suicide? This much may indeed be said, that where we see a man, worthy in other respects, so habituated to the pleasures of the table as not to be able to limit him-

self, even when sensible that it is dragging him to the grave, we see an object that has stronger claims upon our pity, than any other kind of wretchedness incident to human nature.

An uncommon anxiety about health, on the other hand, which does not direct the patient to AIR, EXERCISE, and PROPER REGIMEN, but to a promiscuous use of drugs, and violent remedies, on the recurrence of any trifling symptom, argues a diffidence in Providence; and, if we may use the expression, a mean hankering after life, equally inconsistent with Christian faith as with Christian fortitude. A mind thus wedded to life, is almost invariably found to unite with a great degree of weakness of understanding, a very moderate share of confidence in Heaven.

Let it, however, be understood, that, with regard to health in general, it is not difficult to preserve it; although it is not unfrequently next to impossible to recover it, when lost by a long-continued course of intemperance. The changes effected by nature through the medium of disease, are generally for the better; and it has been remarked by physicians, how quickly health is regained after the most dangerous fevers, brought on in the process of nature's operations—whereas the chronic diseases induced by a course of debauchery and excess, bring on a degree of debility, which is rarely cured, and, at the same time, they deprive of that firmness, vigour, and repelling power, which, when once lost, is difficult to recover.

THE GENUINE GOLDEN RULES OF ECONOMY.

1. THE present pleasures, produced by a large expence of money, by no means balance the future miseries of a wasted patrimony, dissipated fortune, and a decayed constitution.

2. There is great reason for us to make a reserve of property against the day of decrepitude; because, in old age, we want chiefly those comforts which only money can procure: a comfortable house, a warm fire, delicate living, and a little share of authority, which, in the last stage of life, is exceedingly soothing and acceptable.

3. Perhaps society cannot shew a more pitiable figure, than either a very old man or woman, who, having spent their substance in the flattering gaieties of youth, are reduced, in the most helpless situation, to live upon acci-

dental strokes of generosity, and to be at once ridiculed and relieved.

4. If an old person expects to receive the least degree of attention from the world in general, or even from his relations in particular, it must be by the force of happy circumstances in his favour; such, for instance, as arise out of a fortune accumulated by the industry or ingenuity of youth. This will render the veteran respectable among his domestics, and make even his utmost infirmities supportable. Whereas, if an old man has no testimonials of his economy to produce, he will crawl contemptibly about the world; be upbraided for his former prodigality, even by his own children, who, having no hopes, will consider him as an incumbrance; and, wanting the various attentions which are necessary to the accommodation of the last scene, his continuance in the family will be irksome, his life must be supported by the contributions of the charitable, and he must die unmourned. Keep, therefore, the staff in thine own hand.

5. The same principle of prudence which makes it necessary for a man to provide against the wants and infirmities of age, should prevail with a man, to provide against the wants and infirmities of distemper. Let the sick man rather depend on the panacea of his purse, than on the pity of his physician. A very healthy person is very soon reduced to his chamber, and we are all liable to the most inveterate disorders. It often happens that a stout young man, in the very vigour of existence, is brought to such a state, as to depend on the servitude of another, for whose assistance in these very points, which, in a state of health, he would blush to make known to a second person. If these feeblenesses continue for any length of time, nothing, but the power of paying our attendants well, can make them be done cheerfully, if at all. A sick spendthrift is therefore a horrid spectacle; his nurse becomes negligent; his physician gives him now and then a call, upon the score of humanity—he wants strengthening and restoring comforts, both of the kitchen and the arm-chair; and, what is worse than all, rebukes himself, for having squandered, in the hour of superfluity, what should have been reserved for the moment of exigence.

6. Art thou rich? Place then circumspection as a centinel over thy passions; lest that which thou possessest, becometh a prey to artifice!

7. Art thou poor? be industry thy guard, lest thou should want the bread of life; and, in wanting that, the path of disgrace is not remote, and that path will lead thee, peradventure, to the pits of misery and destruction: condescend not to be the object either of pity or charity, whilst thou hast limbs to toil, imagination to suggest, or health to perform. Liberty is independence, and slavery is a state of pecuniary obligation. Get honestly and give cautiously. Whoso putteth in practice these rules, shall certainly LIVE all the days of his life.

CAUTIONS AGAINST SITTING NEAR DOORS OR WINDOWS, IN HEATED ROOMS, &c.

DURING the winter season, in particular, when larger fires are kept up, and more candles burnt, than at any other time of the year, people, young or old, ought not to expose themselves to draughts or crevice winds, by sitting too near a window or door; for the consumption of air, occasioned by the heat of the fire and candles, will always be very considerable; which, necessarily, must be replaced by cold air through the windows or door, or through some other opening into the room; because no air can come down the chimney, the warm stream always arising from the fire in that direction, preventing it. Let those therefore who sit near those apertures, take particular care, if they be small and the heat great, as there it will rush in with greater impetuosity, and the pores will be more liable to receive its noxious quality.

As example is always preferable to precept, we will endeavour to illustrate the preceding observations with a familiar example: hold a candle at the key-hole of a door, or to a crevice in a room where there is a good fire and many candles, and you will soon detect the constant current of air that enters there. Besides, it is a rational observation, that our heels are often ready to freeze, while we sit before a fire in winter, in consequence of the continual influx of cold air by the openings from without, and which draws towards the fire, to make good the waste of the air that goes up the chimney.

Those who frequent public assemblies, should be careful to avoid this danger, to which they are singularly liable, from the sudden transitions from heat to cold.

A man in health may leap into a cold bath, even though he be in a profuse perspiration, or out of his bed in frosty

weather, without endangering his health, provided he stops not too long in; and yet a fever is too often the effect of only sitting a short time with your back to a window or door, through which, summer and winter, a stream of cold fresh air is perpetually rushing. In the first case, the body endures one uniform and general shock, which makes it less fierce; but, in the other, a single part, the ear or neck, is attacked with greater violence. The cannon of a battery, for instance, will sooner open a passage into the town, when levelled against one single part of the bastion, than when discharged against the whole face.

SIGNS OF GOOD BODILY HEALTH.

The best criterion of a man being in a good condition of body, is the clearness of his complexion; to which may be added, the appearance of the under lip, which is rosy and plump, in proportion to the healthy fulness of the constitution, which is a much more certain symptom of vigorous health, than any indication that may be formed from the appearance of the tongue, or the pulse, which is another very uncertain or deceiving index, the strength and frequency of which, not only varies in different persons, but in the same person, under different circumstances and positions. In some irritable constitutions, the vibrations of the heart varies almost as often as its pulsations; for instance, when we walk, stand, sit, or lie down, early in the morning, late in the evening, elated with good news, depressed with bad, &c.; when the stomach is empty—after taking food—after a full meal of nutritive food—after a spare one of *meagre* materials. It is moreover impossible to ascertain the degree of deviation from the standard of health, by feeling a pulse, unless we are well acquainted with its peculiarity when the patient is in good health.

CHINESE ART OF PRESERVING HEALTH.

Be virtuous; govern your passions; restrain your appetites; avoid excess, and high-seasoned food; eat slowly, and chew your food well. Do not eat to full satiety. Breakfast betimes; it is not wholesome to go out fasting. In winter, a glass or two of wine is an excellent preservative against unwholesome air. Make a hearty

meal about noon, and eat plain meats only. Avoid salted meats: those who eat them often, have pale complexions, a slow pulse, and are full of corrupted humours. Sup betimes, and sparingly. Let your meat be neither too much nor too little done. Sleep not until two hours after eating. Begin your meals with a little tea, and wash your mouth with a cup of it afterwards. I do indeed drink wine, but never more than four or five small glasses. The most important advice which I can give, says Du Halde, for maintaining the body in due temperament, is to be very moderate in the use of all the pleasures of sense; for all excess weakens the spirits. Walk not too long at once. Stand not for hours in one posture; nor lie longer than necessary. In winter, keep not yourself too hot, nor in summer too cold. Immediately after you awake, rub your breast where the heart lies, with the palm of your hand. Avoid a stream of wind as you would an arrow. Coming out of a warm bath, or after hard labour, do not expose your body to cold. If in the spring there should be two or three hot days, do not be in haste to put off your winter clothes. It is unwholesome to fan yourself during perspiration. Wash your mouth with water or tea, lukewarm, before you go to rest, and rub the soles of your feet warm. When you lie down, banish all thought.

*** In this short space we have presented at one view, a "code of health calculated to ensure longevity," adapted to any climate, for every constitution, and worthy of being practised by all who value themselves as men and Christians, desirous of perpetuating by their example the lessons of morality, as conducive to a state of mental as well as bodily health, from whence will emanate the greatest portion of human happiness on earth.

CHINESE PHYSICIANS.

PHYSICIANS, in China, never write any prescriptions, but commonly give their own medicines; a boy carrying after them a cabinet with five drawers, each divided into more than forty little squares, and all of them furnished with medicines ready prepared. When they have felt the pulse, they make up two compositions; one to be taken on the spot, the other afterwards. Their medicines are only simples; in the uses of which, and in

the knowledge of the pulse, their whole art consists. Blood-letting is very rarely practised among them; and the use of clysters was not known till they learned it from the Portuguese at Ma-cao, which they therefore call "The remedy of barbarians." The circulation of the blood is said to have been known to them from time immemorial; but from their aversion to dissecting, and ignorance of anatomy, they have made no improvements from it. The profession is chiefly handed down from father to son, though they have good ancient books of the art; extracts from which may be seen in Du Halde. Their fees are very moderate, but they never repeat their visits unless sent for; so that the patient is at liberty to change his physician.

(*Vide* the Hau Kiou Choan, or Pleasing History, translated from Chinese into Portuguese, and thence into English, by Percy, Bishop of Dromore. Lond. 1761).

Aphorisms from the Chinese, respecting Medicine.

He who doth not love tea, covets wine.

Honour the dead, as you would honour them if they were alive.

If the excesses of debauchery make great havock of the body, the vexations of the body make still greater.

In China are more tutors than scholars, and more physicians than patients.

Not one in ten thousand dies by poison, yet the bare mention strikes with horror. What multitudes by intemperance! yet, how little is it feared.

See that moth, which flies incessantly round the candle —it is consumed! Man of pleasure, behold thy own image.

Temperance is the best physic.

The life of man is a fever, in which very cold fits are followed by others equally hot.

The man who hath never been sick, doth not know the value of health.

The man who is pointed at with the finger, never dies of a disease.

The medicine that doth not cause the patient to wink (sleep), never cures him.

When a family rises early in the morning, conclude the house to be well governed.

Proverbs pertaining to Health, Diet, and Physic.

An ague in the spring is physic for a king.—Agues come on horseback, but go away on foot.—You eat and eat, but you do not drink to fill you.

An apple, an egg, and a nut, you may eat after a slut.

Children and chicken must be always picking.—Old young and old long.—They who would be young when they are old, must be old when they are young.—Every man is either a fool or a physician after forty years of age.—After dinner sit a while, after supper walk a mile.

An old physician, a young lawyer.—A good surgeon must have an eagle's eye, a lion's heart, and a lady's hand.—Good keal is half a meal.

If you would live ever, you must wash milk from your liver.—Butter is gold in the morning, silver at noon, lead at night.—He that would live for aye, must eat sage in May.

After cheese comes nothing.—An egg and to bed.

You must drink as much after an egg as after an ox.—Light suppers make clean sheets.—He that goes to bed thirsty, rises healthy.—*Galen.*—One hour's sleep before midnight, is worth two hours after.—Who goes to bed supperless, all night tumbles and tosses.—Often and little eating makes a man fat.—Fish must swim thrice.

Drink wine and have the gout; drink no wine, and have the gout too.—With this saying, intemperate persons, that have or fear the gout, encourage themselves to proceed in drinking wine notwithstanding.

OBSERVATIONS ON TEA,

WITH DIRECTIONS FOR CHOOSING IT, AND DISTINGUISHING THE GOOD FROM THE INDIFFERENT, &c. DETECTION OF ADULTERATIONS, &c.

MUCH has been said and written on the medicinal properties of tea: in its natural state it is a narcotic plant, on which account, the Chinese refrain from its use until it has been divested of this property, by keeping it at least for twelve months. If, however, good tea be drunk in moderate quantities, with sufficient milk and sugar, it invigorates the system, and produces a temporary exhilaration; but when taken too copiously, it is apt to occasion weakness, tremor, palsies, and the various other symptoms arising from narcotic plants, while

it continues to aggravate hysterical and hypochondriacal complaints. Tea has also been supposed to possess considerable diuretic and sudorific virtues, which, however, depend more on the *quantity* of warm water employed as a vehicle, than the quality of the tea itself. Lastly, as infusions of these leaves are the safest refreshment after undergoing great bodily fatigue or mental exertion, they afford an agreeable beverage to those who are exposed to cold weather; tending, at the same time, to support and promote perspiration, which is otherwise liable to be impeded.

Division of Teas in Great Britain.

The teas commonly imported amongst us, are only of two sorts, Green and Bohea; and these are divided into three kinds of green, and five of Bohea. In the former class are included, 1. *Imperial*, or *Bloom* tea, having a large leaf, a faint smell, and of a light green colour;—2. *Hyson*, which has small curled leaves, of a green shade, inclining to blue;—3. *Singlo* tea, thus termed from the place where it is cultivated.

The Boheas comprehend, 1. *Souchong*, which, on infusion, imparts a yellowish green colour;—2. *Camho*, a fine tea, emitting a fragrant violet smell, and yielding a pale shade: it receives its name from the province where it is reared;—3. *Pekoe* tea, is known by the small white flowers that are mixed with it;—4. *Congo* has a larger leaf than the preceding variety, and yields a deeper tint to water;—5. *Common Bohea*, the leaves of which are of an uniform green colour. There are, besides, other kinds of tea, sold under the names of *gun-powder tea*, &c. which differ from the preceding, only in the minuteness of their leaves, and being dried with additional care.

Qualities, &c.—The Chinese Bohea (distinguished by the above names of Pekoe, Congo, and Common), has the most pleasant and delicate flavour; its liquor is not of so deep a tincture as the others, and it creams briskly when poured out. The water must stand on it a considerable time, to draw out its virtue; and it will bear four or five different waters. This sort of tea improves by keeping.

If the water is not poured off quickly from the Congo Bohea, the whole strength of the tea will be drawn off at once, so that the best way to have fine tea, is to mix the Pekoe and Congo together, in equal quantities.

The *common Bohea* is blacker and larger leaved than either of the former, smells and tastes more faint, and not

unlike dried hay. It gives the deepest tincture, and two or three waters draws out its whole strength.

Green tea, distinguished by the names of Hysson (so called from Mr. Hysson, a rich East India merchant that first imported it), imperial, common, and ordinary. The hysson, in addition to the above properties, tastes crisp in the mouth when chewed, and afterwards looks green when spit out; and, though it scarce tinctures the water with a pale greenness, when strongest, it is of a most delicious flavour. Its virtue is known by the clear blue green of its leaves, or more certainly by letting a cupful of its liquor stand all night; then, if its colour, delicate smell, and bitterish taste continue, it is good; but if these, or any of them be impaired, the tea is old, and has lost part of its virtue. This tea will bear four or five waters, and requires less for use, than any other sort, to the same quantity of water.

Two waters will draw off the virtue of *imperial tea*, in consequence of its being the lightest, and its principles the loosest of all others.—*Common green tea* will bear three or four waters.—*Ordinary green tea*, which is neither so pleasant to the taste or smell as the former, will not bear so many waters.

Not only China, but Japan, and Siam, are fruitful in this shrub. And the Japan tea is most esteemed for its fine clear green colour, smaller leaf, and more delicious smell.

Method of detecting Adulterations in Tea.

Many of the noxious qualities attributed to tea, doubtless arise from the twofold sophistication it is frequently doomed to undergo before it reaches the hands of the consumer. The Chinese formerly mixed the leaves of other shrubs with it. This, however, is easily discovered, if not at first sight, by putting a grain and a half of blue vitriol into a cupful of the infusion, when, if it be genuine green tea, and set in a good light, it will appear of a fine light blue. If it be genuine Bohea, it will turn to a deep blue, next to black; but if either of these be adulterated, a variety of colours, as green, black, yellow, &c. will be seen in them.

After this fraud was detected, they dyed the leaves of damaged and ordinary *green tea*, and probably of such teas as had been infused, with Japan earth, which gives the leaf the colour, and the infusion the tincture of Bohea. This may be discovered by various means:—1. It will be

found that a lesser quantity of this dyed tea, will give a deeper colour to the same proportion of water, than if it were genuine;—2. The colour it gives the water, will also be of a reddish brown, whereas it should be dark;—3. When the leaves have been washed, by standing a little, they will look greener than good *Bohea;*—4. This dyed tea is generally much larger; it is therefore a good way, always to buy the smallest-leaved Bohea;—5. The liquor, which should be smooth and balsamic to the palate, tastes rougher and more harsh;—6. If milk be poured into it, it will rise of a reddish colour, instead of a dark or a blackish brown;—7. A little copperas put into this liquor, will turn it to a light blue, instead of a deep blue, inclining to black;—8. Spirit of hartshorn makes the good tea of a deep brownish colour, after it has stood awhile, like new drawn tincture of saffron; but it has not the same effect on bad tea.

Green tea may also be counterfeited, by dyeing bad Bohea with green vitriol. This also is easily detected: 1. By putting a piece of gall into the infusion, it will turn it presently to a deep blackish colour, which would not be the case were vitriol or copperas not present; for galls do not naturally tincture tea;—2. If the infusion made of this tea, be of a pale green, and incline to a bluish dye, it is bad;—3. Spirit of hartshorn will give it a slight purple tinge, and throw down a small sediment, instead of a deep greenish yellow, after it has stood about six minutes.

These directions will serve to detect adulterated teas, a species of fraud by no means uncommon at the present day; and may prove equally serviceable to the wholesale dealer, the retailer, or the private individual who purchases for his own and his family's consumption; thus a reciprocal test may be established between the seller, who ought to purchase none but genuine articles, and the consumer, who ought to have the best, and most wholesome in the market, for his money.

Observations on the Manner in which the Tartars, Japanese, and Chinese prepare their Tea.

The Tartars boil it in milk; but this method, it is said, causes obstructions and relaxations of the vessels through which the liquor is to pass into the body; it is therefore adviseable that corpulent, cachectic, and hypochondriac persons, should abstain from using it in this manner, and from mixing milk or cream with their tea. Besides,

milk is not adapted to insinuate itself into the leaves of the tea, or to dissolve the delicate salt, oil, and earth, by which means the virtue of the tea is lost.

The Japanese powder their leaves; upon which they pour boiling water, and sip them up together, which must give the tea a more rough, earthy, and disagreeable taste, consequently prejudicial, as it will not only thicken the blood, but constringe the fibres too much; thereby destroying that equilibrium which ought to be maintained between relaxation and contraction.

The Chinese infuse their tea in boiling water, as we do; and when they have drawn off their full quantity, they prepare the leaves with sugar, oil, and vinegar, for an evening salad.

IMPORTANT REFLECTIONS ON THE HEALTH, EDUCATION, AND MORALS OF CHILDREN.

Children, like tender oziers, take the bow,
And as they're fashion'd, so they always grow.
DRYDEN.

"TRAIN up a child in the way he should go, and when he is old he will not depart from it," says Solomon; and, although this sublime moral advice does not amount to an axiom, the correctness of the maxim is so far established, that should its early inculcation be neglected or deferred, the bias of the future mind is deteriorated in a tenfold ratio. On parents, therefore, it depends, whether their children shall prove a blessing or a curse; whether they shall comfort their declining years, or bring down their grey hairs with sorrow to the grave. On the basis of religion must their happiness be founded; and the existence of a Supreme and Invisible Being, the first knowledge that is imprinted on their weak and tender minds. When children are permitted by nature to notice the beautiful varieties of the creation, teach them to believe, that to the hand of an all-merciful and beneficent Creator, we owe their formation; that they are sent to us as the reward and encouragement of virtue, and that to act in opposition to the divine will, would be the surest means to deprive us of every benefit we enjoy. Instead of terrifying their weak imaginations by the representation of a thousand frightful monsters to them, such as old *Poby, the chimney-sweep,* or any other of the like smutty tribe, to whom they are to be consigned when

they commit a fault, or punishing them in any other manner, or, on the contrary, flattering their little minds with delusive hopes, to bribe them to their duty; teach and encourage them to be good for virtue's sake. Tell them, that an all-seeing eye is witness to their most private faults, and that to Heaven they must look for their reward or punishment. And, although the system of bribery is unquestionably a bad thing, either in the senate or the family circle, children should by no means be discouraged so far, as to suffer their little merits to pass unnoticed and disregarded. They should be taught from precept and example, to know that a good action is always sure to meet with a suitable acknowledgment, if not, at all times, with a reward; whilst, at the same time, to guard them against the insinuating influence of vanity, it should be equally inculcated, that in the execution of whatever they may have so ably and so obediently accomplished, they have acted in no other manner than as dutiful and becoming children.

It is the opinion of many, that children of three or four years of age, are too young to attend public worship. We, however, are of a different opinion, save one exception; namely, as regards the season of the year, which we shall consequently explain. It is certainly true, that a child at the age of three years, or even four, cannot be imagined to understand the full explanation of prayer and thanksgiving; nevertheless, though not capable of accompanying a congregation in those solemn acts of devotion, they may doubtless be inspired with a reverend awe of their divine Creator; and thus, by a constant attendance at the house of God, be brought to an early practice of piety and religion.

If there be any thing objectionable in taking young children to places of worship, it is during the winter season, where, from sitting in an almost empty pew, the cold is so severe, as to diminish the heat of the body below the natural standard; the force of the circulation is not able to resist its influence; and, as young children have to encounter a variety of changes, incidental and accidental, which, for want of proper attention to their little comforts, might be both accelerated and aggravated by exposure to cold and moisture: on the other hand, crowded congregations are frequently attended with the pernicious effects resulting from sudden transitions, which the tender frame is equally as ill adapted to encounter—

then only we admit that young children are better at home, within the range of a more uniform degree of temperature.

No one can doubt that children are born with various dispositions, or the germs of such dispositions; and it is equally true, that by proper and timely management, these dispositions may be so changed and meliorated by the attention of a parent, or those to whom they are entrusted, that not only their little blemishes may be smoothed away, but even those things which more offensively distinguish the child, may, by proper discipline, become the characteristic ornaments of the man. "In respect to the desires of children," observes Dr. Parr, "it is hardly possible to lay down any general rule. But the best method of inuring them to disappointments, is perhaps rather to call off their thoughts to some new gratifications, than to drive them forcibly from any favourite pursuit. Their inclinations are keen, but fickle, and therefore he gives no mean proof of his skill in the management of the human mind, who makes one weakness the instrument of counteracting another."

The temper of a child in the early days of its infancy, and beyond a certain period, is not easily rectified, should it unfortunately have taken a wrong bent. If every little sally of passion and impatience were instantly and properly controlled—if such things as are admissible, were regularly permitted, and those that are improper, as regularly and steadily withheld, the wily little creature would soon learn to distinguish between what is allowed and what is prohibited. But a melancholy reverse will be found, if, on the other hand, no consistency regulates his management: if at one time the slightest indulgence is refused, and at another the most extravagant, and even injurious cravings, are satisfied, just as the whim of the parent may lead him to gratify his ill-humour, by thwarting another; or to amuse his moments of *ennui*, by playing with his child as with a monkey, and exciting it to those acts of mischief and audacity, for which, in the next moment, it may suffer a severe correction. The effects of such an insensible and capricious line of conduct, and the serious consequences, must strike home to the bosom of every parent alive to his duty, as at once uncharitable and inconsistent: continually undergoing either disappointment or punishment, or engaged in extorting gratifications, which he often triumphs at hav-

ing gained by an artful display of passion, his time passes on, until, at length, the poor child frequently manifests a degree of ill-humour sufficient to render him the little detested tyrant of his playmates and inferiors. No one will here presume, we believe, to assert that such a mode of tampering with the education of children—an education, by which it is here intended to be understood, combining the whole concourse of circumstances which form the human character—is not erroneous in the extreme. Yet how frequently do we witness its effects in our intercourse with human life? It may be asked, if, when children do wrong, are they to be corrected? Most undoubtedly they are to be corrected, that is, they are to be directed right, and prevented from doing wrong, and special care taken that this correction be *correct;* for these young reasoners are as expert as ourselves in detecting fallacies; and in criminal, so ought it to be in moral law—*it is better that ten naughty boys should go unpunished, than that an innocent one should be whipped for a fault of which he is not the author!*

In punishing children for their faults or vices, the greatest care is necessary that capriciousness forms no part of this moral process; and punishment for doing wrong, will effect more harm than good, in proportion to the frequency with which it is inflicted; for punishment, mental or corporeal, will be invariably, and as much as possible avoided; and the dread of it will make them both liars and hypocrites. Above all things, children should be taught candour and the undisguised declaration of their feelings; but whilst they are operated upon by the apprehension of pain, such candour and declaration of their feelings will be prevented—their chief occupation, under such circumstances, will be the practice of deceit and duplicity, in order to conceal the errors they have committed. No child will be candid without kindness; and it will be difficult to persuade any child, that, in putting him to bodily or mental torture, you have his happiness at heart.—*(To be continued).*

PRACTICAL OBSERVATIONS ON DOMESTIC ECONOMY, &c.

ECONOMY in domestic affairs*, is the management of a family with propriety, and without waste. As atten-

---

* For these judicious calculations, we are indebted to that able work, the "*Family Cyclopædia*," or Manual of Useful and Necessary Knowledge, &c. (2d Edition, vol. ii. 8vo.) by JAMES JENNINGS.

tion to economy is at all times necessary, the following calculations may therefore be found useful. We premise, however, that in forming these estimates, no line is drawn for the poor*; and as those with large fortunes are comparatively few, we have the less occasion to write for them; but the middling classes of society may find our hints useful. Should any calculation be thought too great or too small, it should be remembered, that our wants are different; some choosing one thing, some another. And never let the maxim in economy be forgotten, that *as things grow dearer, if we cannot increase our income,* and wish to be at ease, we must diminish our expences.

Bread.—Each person eats, on an average, about three-quarters of a pound daily; so that nine quartern loaves, for seven persons, per week, are ample.

Butter.—Three-quarters of a pound for each person per week, allowing for melting, will be found ample.

Sugar.—The same as butter.

Tea.—Two ounces per head weekly, are ample.—Here we cannot avoid observing, that if half the expence of tea were laid out in milk, and milk and water drunk, instead of tea, that it would be more economical, and we believe equally more wholesome.

Malt Liquor.—A quart daily for each person, will be found enough.

Meat or Fish.—One pound weight daily, is a full allowance, both for dinner and supper, for each person. If any vegetables are eaten, the quantity of meat will be less: so that the value of one pound of meat, will be sufficient for both meat and vegetables.

Vegetables.—The expence of these will vary according to the season of the year. Potatoes are, however, a standing dish, and from one pound to a pound and a half of these, will be an ample allowance for each person for dinner. Of vegetables, and indeed every other article in domestic economy, it may be observed, that they ought to be *purchased with ready money,* and at such times as they are cheapest. A winter stock of both potatoes and coals, ought always to be laid in at that season when they can be bought cheapest and best.

Coals.—A moderate fire in a proper grate, may be kept

---

* As we proceed, practical estimates on a smaller scale will be given, to shew not only how people may live who have the means, but how those can live, comparatively comfortable, whose incomes are more limited, by economical, not by parsimonious rules.

through the winter six months, on the average consumption of two bushels weekly; and in London, the cost of coal, therefore, for one fire, should not be more than three shillings per week.

Luxuries.—Wine, spirituous liquors, strong beer, fruit, cream, and entertainments for friends, must be regulated by what families have to spare, always remembering, that sickness, the physician's fees, and other contingencies, must be provided for; and also if there be children, that a provision must be made for them.

From these estimates, we draw the following corollaries of expences, attending a family consisting of husband and wife, four children, and a maid servant:

WEEKLY.	£	*s.*	*d.*
Bread for seven persons, 9 quartern loaves, at 10*d.* each	0	7	6
Butter, 5½ pounds, at 1*s.*	0	5	6
Tea for six, 12 ounces, at 7*s.*	0	5	3
Sugar for ditto, 4½ pounds, at 1*s.*	0	4	6
Meat or Fish, 7 pounds daily, at 10*d.*—5*s.* 10*d.* daily	2	0	10
In this calculation, vegetables, puddings, &c. are included.			
Salt, vinegar, mustard, pepper, &c.	0	0	7
Milk, one pint daily	0	1	2
Table beer, at 20*s.* per barrel, 11 gallons, at 6¾*d.* per gallon	0	6	2
Strong beer occasionally	0	2	6
Washing	0	7	0
Haberdashery, viz. pins, needles, thread, tape, &c.	0	2	0
Wear and tear, breakage, scouring materials, &c.	0	2	3
Candles per week, average winter and summer	0	2	6
Weekly Expences,	£4	7	9

YEARLY.	£	*s.*	*d.*
Four pound seven shillings per week	226	4	0
Five chaldron of coals, at 2*l.* 14*s.*	13	10	0
Clothes for master and mistress	30	0	0
Ditto for four children	26	0	0
Lying-in expences (once in two years), per year	7	10	0
Pocket expences, including letters, &c. for all the family	11	16	0
Schooling for two children	10	0	0
Apothecary	5	0	0
Servant's wages, including tea and sugar	10	0	0
Standing rent and taxes	60	0	0
	£400	0	0*

Of the rural economy recommended in books, to be pursued by persons retiring from the town to the country,

* In this calculation, sufficient allowance is made for retrenchment. On the same averages, therefore, taking the advantage of circumstances, any one may calculate his weekly, consequently his annual expences, according to the number of their family, and usual mode of living.

and which is asserted to be so advantageous, we cannot speak with approbation. From our own experience, we are convinced, that no profit will, in general, be derived from *farming*, by those who are not professedly farmers. The keeping of a cow or a horse, is the extent to which we advise such persons to go; the keeping of poultry may be pleasant, but we do not think it will be found profitable.

Calculation II.

The average wages of the greater part of the labouring community, do not exceed a guinea per week; an estimate, therefore, of the manner in which this sum might be judiciously expended, by adapting the ends to the means, may assist those whose system of expenditure, with this income, is not so correct.

Income, 3*s.* 6*d.* per day—21*s.* per week—55*l.* per annum; out of which a man, his wife, and three children, are to be supported.

Quantity of Provisions weekly, with their Prices.

	£	*s.*	*d.*
Bread and flour for five persons, 24 pounds at 1¾*d.*	0	3	6
Butter, cheese, and milk	0	1	9
Sugar and treacle	0	0	9
Rice, oatmeal, salt, &c.	0	0	6
Butcher's meat or fish—say meat, 6 pounds at 4½*d.*	0	2	3
Vegetables (including ¼ cwt. of potatoes, or 4 pounds a day, at 3*s.* 6*d.* per cwt.), 2*d.* per day	0	1	9
Table beer, 1 quart a day, at 2*d.*	0	1	2
Coals 1¼ per week, on an average all the year round, at 1*s.* 4*d.*, to 1*s.* 8*d.*—wood, a penny—3*d.* per day	0	1	9
Candles, on an average all the year round, ½ pound per week, at 7*d.*	0	0	3½
Soap, starch, blue, &c. for washing	0	0	3½
Sundries, for cleaning, scouring, &c.	0	0	1
Total for household expences	£0	13	6
Clothes, haberdashery, &c.	0	3	6
Rent	0	2	3
Total expence	£0	19	3
Saving 1-12th	0	3	6
Amount of income	£1	1	0

According to this method of living, as each child will cost 1-12th of the income, 1*s.* 9*d.* a week, and each parent 4-12ths, or 7*s.* respectively, this estimate may be adapted to various incomes and descriptions of families, in the following manner:

	£	*s.*	*d.*	
For the man and wife only	0	14	0	per week.
1 child	0	15	9	
2 children	0	17	6	

3 children	- - - -	0	19	3	as per estimate.
4 children	- - - -	1	1	0	
5 children	- - - -	1	9	9	
6 children	- - - -	1	4	6	
7 children	- - - - -	1	6	3	and so on.
	Reserving 1-12th, or - -	0	1	9	for contingencies.

Remarks.—This, with other similar low estimates, may serve to direct a numerous class of industrious mechanics and others, in large manufacturing towns and districts, to whom it may be advantageous to know how to *save* as well as how to *get* money; a knowledge which, when habitually practised, must infallibly tend to the improvement of their morals, and their future advancement in life.

As regards bread, which, in families of the middling classes, is the principal article of consumption, the preceding calculation is founded on the price of good household bread in London, viz. from seven farthings to twopence halfpenny per pound. Barley, rye, or oaten bread, is also eaten in such families, and many of them bake their own bread, which is a considerable saving; so that, should this calculation be too high for the country, it is an error on the right side. The other articles of food are as correct, and as generally applicable, as it is possible for them to be. Should, however, any of the items here enumerated, not prove sufficient, as the income will not afford more, recourse must be had to potatoes, rice, oatmeal, and other wholesome and nutritive articles of food for children, which will save bread, and should be constantly given to them, as proper and economical substitutes for this and other expensive articles of diet.

It is better to buy large loaves than small ones; and bread two or three days old, is not only more wholesome than that eaten at one, but is more economical, and will go nearly one-fourth as far again. The quantity of butcher's meat in the above estimate, is rather too low, we apprehend, at least for the present state of the markets; although certain, and far from indifferent pieces (not prime) may be bought at that price; but at all places, on or near the sea-coast, fish are cheap and plentiful to supply its place. Even in London, mackerel, herrings, cod, flounders, eels, and other kinds of fish, may be had much cheaper, in proportion, than meat from the shambles. The price of good beef and mutton is now from 6*d.* to 8½*d.* per pound; the average for common joints is 7*d.* to 8*d.* Much, however, may be saved by the mode of cooking: meat roasted, baked, or broiled, loses

fully one-third of its nutritive qualities; if boiled *fast*, it loses nearly as much; but stewed *gently*, it loses least, and what it does lose, the liquor acquires; and this, thickened with a little meal, ground rice, Scotch barley, or pease and vegetables, affords a most wholesome food, and the family gets the nourishment of the whole meat at the least expence.

Coals vary in their prices, according to local situation, circumstances, &c. But where coals are dear, coke, wood, turf, peat, are reasonable; and for six months in the year, but little is required for coal or candles; for which latter article, in families of this description, oil is frequently used. Tea* and sugar are not included in the estimate, so that it must either be dispensed with, or saved out of the more necessary articles. The expence of each child is rated at 1*s.* 9*d.* per week; and though a child in arms will not cost so much, the extra nourishment the mother requires, in giving suck, will be fully equivalent to it. There are other considerations which may conspire to ease the burthen, and make ends meet; of which every industrious couple will know, from necessity, how to avail themselves.

CONSOLATION FOR LADIES AT THE TURN OF LIFE.

THE cessation of the catamenial evacuations, is always regarded with a degree of dread by the female race—especially if they happen to be affected, for some years previously, with any chronic complaint. But, even if their health be ever so good, they have a secret apprehension of the critical period—an apprehension which has, in all ages, been fostered by medical authority and observation. In these days of scrutiny and scepticism, the "turn of life" has been made the subject of enquiry, by M. de Chateauneuf, and the result is not in favour of the popular opinion—or, as it will now be called, *prejudice*. This author grounds his memoir on tables of mortality, furnished by the most respectable authorities, from which he draws the following conclusions. Between

---

* Roasted corn, as a cheap, wholesome, and nutritious beverage, as a substitute for coffee, and as preferable to tea, is an advantage much in favour of the working classes; indeed, it is a well-known fact, that it is prevalent at the breakfast-table of multitudes of the better order of society.

the 43d and 60th degrees of north latitude, and over a space extending from Marseilles to St. Petersburgh, the most accurate and authentic tables of records shew no other increase of mortality in females, from the age of thirty to seventy, than what necessarily results from the progress or decline of life!!

At all periods within the above range, there is, in fact, according to the said tables, a greater mortality among men than women—especially between the age of forty and fifty years—hence the "turn of life," or we will say the forty-fifth year, is a more critical period for the lords of the creation than for the ladies.

On these calculations and tables, we can only remark, that, although they appear to prove that the general ratio of mortality among women is not increased by the "turn of life," yet they do not prove the cessation of the catamenia is unproductive of danger, and in many instances of death. It ought to be recollected, that the "turn of life" brings with it an immunity from some dangers, as child-bearing, for instance, and therefore, although the *general rate* of mortality may not be influenced by this epoch, the *kind of death* may vary. If, for example, as many women die, after the age of forty, in consequence of the "turn of life," as there died before that age, of child-bearing, the ratio of mortality would not be altered, and yet it would be quite certain that the critical period was a period of danger.

SINGULAR CURES OF THE GOUT, &c.

THE influence of the master's temper on all his servants and dependants, is one of the most remarkable particulars in the manners of the Turks. Despotism seems as if it would be incomplete, were it not also to enslave the sentiments of the mind. The servants of the Turks carefully observe the reception any one meets with from their patron, in order to treat him in the like manner, the moment he quits his presence. They interpret the usage he has received, and if the master bestows a kick, he can expect no quarter. A Pacha had honoured an European merchant with his intimate friendship; he delighted in his company, and all about him paid their court to the stranger. It happened he was subject to the gout. The Pacha, who had unfortunately studied a little

physic, was desirous to cure his friend; and when he was in one of his fits, directed two of his domestics to give him fifty-two blows on the soles of his feet. The servants, who were not so learned as their master, astonished he should be treated in a manner that had so little the appearance of friendship, imagined the infidel must have given some affront, and executed their orders with a severity, of which they made their boast.—"What, (said he) rascals! have you dared to treat the man who is my friend with disrespect? The fifty blows were intended as a remedy; but the insults you have added, must not go unpunished." The Pacha immediately ordered that each should receive a hundred blows for their presumption; and went himself and apologized to the merchant for the insolence of his domestics, who had dared to render his remedy more violent. The European, though he would willingly have dispensed with the administration of the medicine, found it deserving of praise, for it soon effected a perfect cure.

Gaudanone, Grand Duke of Muscovy, was tortured by the gout: he invited, by great promises, such of his subjects as were acquainted with any remedy for this complaint, to communicate it to him. The wife of a Bayard, desirous of being revenged for some ill usage she had received from her husband, bethought herself of the same stratagem made use of by the woman in Moliere's Médecin Malgre lui.

This woman repaired to the prime-minister, and acquainted him, that her husband was in possession of an infallible remedy for the gout, but that he had not sufficient respect for his majesty to communicate it to him. The Bayard was sent for; in vain he protested his ignorance; he was committed to jail, and severely flogged in order to induce him to communicate his nostrum. At length he was informed, that unless he would reveal his secret, he must prepare himself for death. The unhappy man, seeing his destruction inevitable, thought it best to acknowledge that he did possess a remedy for the gout; but that he was afraid of using it in the case of his majesty, lest it should not succeed.

He required fifteen days to prepare his remedy, which were granted. He demanded that they should send to Czirbaul upon the Occa, two days' journey from Moscow, whence they were to bring him a waggon loaded with all manner of herbs, which he never either saw or knew; of

these he prepared a bath, in which he immersed the Grand Duke.

The miserable Bayard would have considered himself as but too happy, had the bath done neither good nor harm. But what was his astonishment, when he found that, on the third or fourth application of the bath, his majesty found his pains relieved; and after he had used it six times, he was perfectly recovered! He was again interrogated concerning his secret, of which he no longer pretended ignorance, but rather boasted of his success. He expected a handsome recompense, which he in fact received; the Czar granting him a pension of 400 crowns per year, and eighteen peasants: but he again received a severe chastisement for not having revealed his secret earlier. History has not acquainted us how the husband and wife accommodated this awkward business.

Lord ——, labouring under a severe fit of gout, had a person warmly recommended to him, by some friends, as possessing a specific for this complaint. In compliance with their recommendations, he sent for him. On his being announced, his lordship demanded of his servant, "Does this famous doctor come on foot, or in his carriage?" "On foot," was the reply. "Send the scoundrel about his business. Did he possess the secret which he pretends to, he would ride in his coach and six, and I should have been happy to entreat him to deliver me from this horrible disease." To credit this tale, a man must have experienced the tortures of this horrible malady.

Theophrastus has said, that music cures the gout; nor is that surprising, as melodious notes are known to suspend many painful affections. In the third volume of the Lessons of Guyon, it is affirmed, that a lady, a great invalid, and a sad victim to the gout, sent for an individual who played incomparably well on the drum and flute, and performed with so much vehemence, that she fell on the ground in a swoon, deprived of speech and voluntary motion. Recovering from this trance, she complained of intense pain: the musician again had recourse to the succours of his art, and commencing again to play, this second dose of music, produced so good an effect, that in a short time the patient was freed from all her pains, and perfectly cured.

When Philip the Second, of Spain, had the gout, his first physician, Mercatus, a man of learning and much experience, tried a great variety of experiments without

producing any degree of ease. Some proposed to him to call in the physician Valezio. When he came, he advised the king to immerse his feet in warm water. This simple remedy succeeded beyond all expectation. The result was, that Mercatus was discharged, and Valezio received his place.

When Biosrobert was seized with gout, Despreaux sent a servant to inquire after his health. On returning, he acquainted him that the gout was raging with redoubled fury. "I suppose he swears heartily then," said Despreaux. "Alas! Sir," said the valet, "he has no other consolation, as all the physicians have abandoned him."

An anecdote related in the Roman History has escaped general attention. Of three ambassadors, sent by the Romans to the king of Bythinia, one had the gout, the second had been trepanned, and the third was little better than a fool: on which Cato, the censor, remarked, that "this embassy had neither feet, head, nor common sense."

It was the gout that first gave a turn for mathematics to the celebrated Cavalieri, a Jesuit of Milan, and afterward professor of mathematics at Bologna. He was dreadfully tormented with this malady when Castelli, a disciple of Galileo, came to visit him; who counselled him, by way of diverting his pains, to apply himself to geometry. Cavalieri followed his advice, and took such a liking for this science, that he became one of the first mathematicians of the age. Gout is frequently the concomitant of genius, although it has been denominated the offspring of Bacchus and Venus.

The torture of the gout must be dreadful, as it has even driven its victims to terminate their miseries by a violent death. Of this an example is furnished in the case of Colonel Lloyd, who, in the year 1724, being cruelly tormented by this disease, put an end to his life by a pistol. He left a note upon his table, declaring, that the gout having got completely the better of him, he knew no other way of getting rid of this enemy than by putting an end to his life. This is a case in which it may be justly said, that the remedy is worse than the disease.

Leibnitz, in consequence of wishing to be too quickly relieved from an attack of gout, took some remedy from the hands of a Jesuit at Vienna. The gout mounted from the feet to the stomach, and the patient soon expired in spasms, sitting on his bed-side, with the Argenis of

Benclay, then newly published, in his hand.—This anecdote ought to be a lesson to the gouty, not to hazard the use of doubtful remedies, which only ease their pains by destroying life.

A gentleman was attacked with a severe fit of the gout at Vienna, at the time when hemlock was much in vogue as a remedy. He took very large doses of this medicine, which eased his pain; and he certainly never again experienced any severe attack of gout, but he became entirely impotent.

Hoffman relates, that a man who was attacked by the gout, was cured by a dog which he took to sleep with him, and which was seized with it. The animal appeared to feel all the pains which his master had previously experienced. The gouty may safely try this remedy: if it does not cure them, it can assuredly do them no harm.

A dog that was extremely fond of Burton ale, was remarked to have every symptom of gout—swelled joints, lameness, &c.

Causing the inflamed part to be licked with the tongue of a dog, is said to assuage the pain.

M. Desault, a physician of Bourdeaux, has given to the public a collection of medical dissertations; and among them one on the gout, which he treats in a singular manner. "Had I composed only a romance concerning the gout, in which saving the appearance of truth, and endeavoured to prove the possibility of curing this painful malady, every arthritic would have perused my dissertation when at leisure; how much more then is it his duty so to do, when I declare, that all the facts on which I found my system are true, and that I mean to deceive no person." The author follows Sydenham in the opinion, that the gouty are in general persons of genius: that it attacks men of sense in preference to fools; the rich rather than the poor. Why the rich are its peculiar victims, is not difficult to explain. The same author tells a pleasant story of a dispute with a monk, who was mightily offended that he had been cured of some disease by an infusion of cinchona in a mixture of old wine and distilled spirit, because it had produced a slight degree of intoxication.

The savage inhabitants of the Antilla islands, when attacked by the gout, dig a hole in the ground, into which they throw heated coals; and upon these they pile

the fruits of the monbane, a kind of palm: upon this they place the part affected, and endure the hot steam as long as they can. If this remedy does not cure, it affords at least great relief. They term this kind of fumigation *baucaner*. M. Bossu, in his Voyages to America, states, that he witnessed an experiment made by an European with this method of baucanning. He had laboured for six weeks under a severe fit of the gout in the right foot, which completely laid him up. He determined to put himself in the hands of the most famous juggler of the island, named Tonska, who treated him as follows: He boiled a vast variety of herbs in a large cauldron: this savage then covered the cauldron with the hide of a deer, supported by bent branches of trees. He introduced the diseased foot of the patient, so as to be immersed in the vapour arising from this cauldron, and the European soon received a complete cure. "I saw him in a short time after," says M. Bossu, "follow the chace, and attend to all his usual avocations, without inconvenience." Many imitations of this savage quackery have lately appeared in different parts of Europe.

QUALIFICATIONS OF A GOOD COOK.

SHE must be quick and strong of sight: her hearing most acute; that she may be sensible when the contents of her vessel bubble, although they be closely covered, and that she may be alarmed before the pot boils over: her auditory nerves ought to discriminate (when several saucepans are in operation at the same time) the simmering of one, the ebullition of another, and the full-toned wabbling of a third. It is imperiously requisite that her organ of smell be highly susceptible of the various effluvia, that her nose may distinguish the perfection of aromatic ingredients, and that in animal substances it shall evince a suspicious accuracy between tenderness and putrefaction: above all, her olfactories should be tremblingly alive to mustiness and empyreuma. It is from the exquisite sensibility of her palate that we admire and judge of the cook; from the alliance between the olfactory and the sapid organs, it will be seen that their perfection is indispensable.—*Apicius Cœlius, jun.*

A RECIPE TO ESTABLISH TRUE FRIENDSHIP.

In Pliny's Natural History, there is a curious recipe for making the Roman friendship; a cordial that was universally esteemed in those days, and very few families of any credit were without it. In the same place, he says, they were indebted to the Greeks for this recipe, who had it in the greatest perfection.

The old Roman friendship was a composition of several ingredients, of which the principal was *union of hearts*, a fine flower that grew in several parts of the empire; *sincerity*, *frankness*, *disinterestedness*, *pity*, and *tenderness*, of each an equal quantity: these were all blended together with two rich oils, which were called *perpetual kind wishes* and *serenity of temper;* and the whole was strongly perfumed with *the desire of pleasing*, which gave it a most grateful smell, and was a sure restorative in all sorts of vapours. This cordial, thus prepared, was of so durable a nature, that no length of time could waste it: and what is very remarkable, says our author, it increased in weight and value the longer you kept it.

This fine recipe has been most grossly adulterated by the moderns: some of the ingredients indeed are not to be found; but what they impose on you as friendship, is as follows:

Outward professions, a common weed that grows every where, instead of the flower of union; *the desire of being pleased*, a large quantity; of *self-interest*, *conveniency*, and *reservedness*, many handfuls; a *little pity* and *tenderness*. But some pretend to make up without these two last; and the common oil of *inconstancy*, which, like our linseed-oil, is cold-drawn every hour, serves to mix them together. Most of these ingredients being of a perishable nature, the composition will not keep, and shews itself to be counterfeit, by continually diminishing in weight and value.

A CURIOUS ANCIENT WILL*.

Dame Alice, the widow of Sir Thomas West, by her will, dated July 15, 1395, orders her body to be

---

* In some of these ancient wills, the lover of antiquities is not only gratified with curious particulars of the customs and manners of our ancestors, and of the value of money in different periods of our history, but the philosopher meets with entertainment of a nobler kind, by contrasting the deplorable state

buried in the priory of the canons of Christ-Church, in the county of Southampton, with her ancestors; and gave to Thomas, her son, a bed of tapsters' work, as also a pair of matyn books, a pair of beads, and a ring wherewith she was espoused to God, which were the lord her father's: to Joan, her son's wife, a bed paled black and white, a mass book, and all her books of Latin, English, and French; also the vestments of her chapel, and what belongs to the altar, with all other apparel thereunto belonging, as silver basons, with escutcheons of her ancestors' arms, &c.: to Sir Nicholas Clyfton, Knt., and Eleanor his wife, her daughter, and Thomas Clyfton, her son, one hundred and twenty pounds: to her sister Dame Lucy Fitzherbert, Princess of Shaftsbury, forty pounds: to her sister Thomasine Blount, a nun at Romesey, forty marks. And she bequeathed eighteen pounds ten shillings, for four thousand four hundred masses, to be sung and said for the soul of Sir Thomas West, her lord and husband, her own soul, and all Christian souls, in the most haste that might be, within fourteen nights next after her decease; also forty pounds to the canons of Christ-Church, to read and sing mass for her lord's soul, and her own, while the world shall last. She further bequeaths to the Dean of St. Olave's, in London, and to the priests of the said house, one hundred shillings, to pray for the soul of her lord and husband, Sir Thomas West, her own soul, and for the estate of Thomas her son, Joan his wife, and their children: to the religious women dwelling without Aldgate, London, and to those of the houses of Shaftsbury, Romeslye, Wilton; the friars within Newgate, London; the friars in Fleet-street; the friars Augustines, within Bishopsgate; the friars preachers of Winchester; the friars mendicant of Winchester; the friars of Southampton; the friars preachers of Salisbury; the friars mendicant of Salisbury; the friars preachers of Bristol; to each of them one hundred shillings. The rest of her goods, &c. she bequeaths to Thomas her son, requiring, whenever she died, that her body should be carried to the priory of Christ-Church, and there buried at the first mass, with a taper of six pounds of wax standing and

---

of the human mind in remoter periods, with the present happy triumphs of unfettered reason, and of a religion that is comparatively pure and perfect. The good lady who dictated the above will, appears indeed to have had a very awful idea of the venerable fathers of her time, and of the powerful efficacy of the masses sung and said for the repose of Christian souls.

burning at her head, and another at her feet; and constitutes Thomas her son, sole executor.—Given and written at Cherlton, without Newgate, in the parish of St. Sepulchre, London, the day and year aforesaid.

Another Curious Will.

The Dutchess of Northumberland (wife of John Duke of Northumberland, who was beheaded August 22, 1553, for proclaiming Lady Jane Grey), a short time before her death, wrote her will with her own hands. She bequeathed to Sir Henry Sidney the gold and green hangings in the gallery at Chelsea, with her lord's arms and her's; to her daughter Mary Sidney, her gown of black-barred velvet, furred with sables, and a gown with a high back of fair wrought velvet; to her daughter Catherine Hastings, a gown of purple velvet, a summer gown, and a kirtle of new purple velvet to it, and sleeves; to Elizabeth, daughter of Lord Cobham, a gown of black-barred velvet furred with lizards; to the Dutchess of Alva, her green parrot, having nothing else worthy for her. "My will is (says she), earnestly and effectually, that little solemnitie be made for me; for I had ever have a thousand foldes, my debts to be paid, and the poor to be given unto, than anye pompe to be shewed upon my wretched carkes; therefore to the worms will I goe, as I have afore wrytten in all poyntes, as you will answer that afore God. And you breke any one jot of it, your wills hereafter may chaunce be as well broken."

In another place she says, "After I am departed from this world, let me be wonde up in a shete, and put into a coffyn of woode, and so layde in the grounde with such funeralls as parteyneth to the buriall of a corse. I will at my yeres mynde have such devyne service as myne executors shall thynke mete, with the whole arms of father and mother upon the stone graven; nor in no wise to let me be opened after I am dead. I have not loved to be verry bold afore women, much more would I be lothe to come into the hands of any lyving man, be he physician or surgeon."

Notwithstanding her strict injunctions to the contrary, she was buried with great solemnity, February 1, 1554-5, two heralds attending, with many mourners, six dozen of torches, and two white branches, and a "canopy borne over her effigies in wax, in a goodly hearse, to the church of Chelsea."

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

"PREVENTION is better than cure;" and as a knowledge of certain signs either preceding or accompanying disease, may not only afford satisfaction, when they are not the omens of danger, but be the means of preventing the incurrence of an unnecessary expence, on every little ailment to which any of the members of the family may be subjected; so will this knowledge, on the other hand, assist in deciding when medical interference is no longer indispensable: and as these symptoms will be laid down in alphabetical order, they can easily be consulted as occasion may require.

ANXIETY.—Fever, accompanied by extreme anxiety, lowness of strength and spirits, may be judged to be of the malignant kind, requiring the most prompt and judicious medical assistance.

APPETITE, *loss of*.—Loss of appetite, accompanied by squeamishness, vomiting, pain and distention of the stomach, eructations and heartburn, indicates that weakness of the stomach, arising from derangement of the digestive organs, is the cause; which demands a judicious regulation of diet, and the use of strengthening remedies.—In fevers, and other acute diseases, it is a sign of recovery, when a lost appetite returns.—Whenever, in fever, a patient craves for any thing particular, although apparently improper, he may, nevertheless, be moderately indulged in it, without any bad consequences; but, on the contrary, with considerable advantage.

BELLY, *pain of (in lying-in women)*.—If, a few days after delivery, a considerable degree of soreness and pain is experienced in the belly, and upon pressure preceded by cold shiverings, the pulse becoming quick and small, the skin dry, the head and back painful, the breathing difficult, and the patient oppressed with excessive anxiety and depression of spirits, there is every reason to suspect that puerperal or child-bed fever has set in: a disease requiring the most prompt and active medical treatment.

Violent pain of the belly, chiefly about the navel, vomiting, obstinate costiveness, with fever, are signs of inflammation of the bowels, which, if not speedily arrested by bleeding, &c. is apt to terminate fatally in a few days.—Griping pains of the belly, chiefly about the

navel, accompanied with troublesome urgings, and generally preceded by slimy or mucous stools, in which small streaks of blood are perceptible, shew the disease to be *dysentery, or bloody flux.*

BLOOD, *brought up by coughing, &c.*—In every case wherein blood is coughed up, it may be concluded that some blood-vessel is ruptured, which, if not speedily remedied, or if it often returns, is not unfrequently the fore-runner of consumption; consequently requires early attention.—*If brought up by vomiting,* it must come from the stomach; and, except in interrupted menstrual discharge, is attended with no small degree of danger.—*Spitting of blood,* without cough or vomiting, proceeding from the mouth only, is not attended with danger, although it may indicate a scorbutic affection of the gums, &c.—*Blood discharged from the nostrils,* seldom occurs but in such a condition of the system as demands great care; that by adopting a spare regimen, cooling medicine, and wholesome exercise, the fulness of the blood-vessels may be relieved, in order to prevent *consumption* in the young, or apoplexy in the aged.—*Blood from the fundament,* may be caused by the piles; if this be not the case, some internal mischief is to be feared.

BLOODY STOOLS.—Dysentery.—See BELLY, *griping pains of.*

BREAST, *swelling of.*—Sometimes succeed, as the disease termed mumps subsides; but is then without danger. When a small, hard, moveable lump appears in the breast, the formation of a cancer may be apprehended, and therefore requires the earliest and strictest attention.

BREATHING, *shortness of.*—Frequent little cough, shortness of breathing, pain in some part of the chest, accompanied with fever, more or less, denote inflammation of the lungs, which, if not removed by early and copious bleeding, and other active treatment, within the first two or three days from the commencement, will either prove fatal, or lay the foundation of a lingering consumption.—*Difficult breathing,* with a loud wheezing sound, hoarseness, and cough, accompanied with a shrill barking sound, shew the disease to be the croup, or inflammation of the windpipe; the removal of which can only be expected by the early employment of the proper means, during the first hours of the existence of the disease.—*Difficulty of breathing,* returning by fits, with a sense of tightness across the chest, are symptoms of *asthma.*

CONVULSIONS.—Convulsive fits often precede the eruption of the small-pox; and frequently accompany teething, in which last case they may be speedily removed by having the gums properly lanced.—*Convulsions* are often occasioned by worms irritating the stomach and bowels of children; here vermifuges are necessary.—*Convulsions of the whole body*, with frothing at the mouth, and total loss of sensibility, characterise *epilepsy*, or *falling sickness*, so termed, from the subjects of this disease falling down suddenly on the coming on of the fit. Accompanied with a sensation as if a ball were rising in the throat, fluttering and rumbling in the bowels, shew the disease to be hysterics.

COSTIVENESS.—Obstinate costiveness, with severe pain, and contraction of the belly, and twisting about the navel; point out colic. When costiveness happens to painters, makers of white lead, lapidaries, &c. there will be reason to suppose it to be occasioned by the poisonous fumes of the lead.—When accompanied with extreme pain and vomiting, inflammation of the bowels; which symptoms also may be a consequence of strangulated hernia. It is also a symptom of weak organs of digestion, torpor of the intestinal canal, &c.

COUGH, when continuing for any length of time, ought to excite apprehension of some dangerous affection taking place in the lungs. Accompanied with shortness of breath, pain in the chest, bloated or swelled face of a purplish colour, particularly indicate inflammation of the lungs. Continuing with shortness of breath, after the other symptoms have subsided, gives reason to fear some alteration in the lungs, that may, if not speedily remedied, terminate in consumption. With frequent discharge from the mouth, eyes, and nose, distinguishes a catarrhal affection—with redness of the eyes, accompanying an eruption of small pimples like flea-bites, are symptoms of measles. Violent coughing may be sometimes symptomatic of an hysterical affection. With a discharge of purulent matter accompanied by fever, increasing twice in twenty-four hours, shows that consumption has commenced. Strangulating convulsive cough, quickly repeated, and accompanied with a peculiar hooping sound, *hooping cough*.

CRAMP *in the legs*, is a frequent symptom in the disorder of the bowels, termed *cholera morbus*.

DEAFNESS, succeeding to a purulent discharge from

the ear, seldom admits of a cure—where, without this last symptom, it continues for any length of time, it often depends on the passage of the ear being obstructed by wax; consequently may be cured by its removal; which may be effected by syringing the ear with a solution of soap and water, &c.

DELIRIUM, preceded by cold shivering, and succeeding to excessive indulgence in spirituous liquors, and other pernicious habits, demands the utmost attention to guard against inflammation of the brain. In acute diseases, it never occurs without danger. At the commencement of fever, it ought to excite the greatest alarm, from the probability of its being a consequence of inflammation of the brain. When it accompanies erysipelas, or St. Anthony's fire, and increases as the disease proceeds, it is an alarming symptom, prognosticating a translation of the morbid matter to the brain, or its membranes. Whenever delirium is violent, with redness of the face and eyes, accompanied with fever, the patient experiencing great inconvenience from light and noise, it may be concluded that inflammation of the brain has actually taken place.—*(To be continued).*

FAMINES ACCOUNTED FOR IN EARLIER TIMES.

THE frequency of famines which prevailed in the earlier centuries, affords too clear a proof of the slow progress of agricultural improvement. The wretched tenure by which the inferior farmers held their lands (a tenure which obliged them to discontinue that labour which they were employing in their own fields, and to transfer it to that of their lords, whether prelates or barons), was an effectual bar to every amendment of soil. If gardening throve better, it was because it flourished immediately by the protection of the great. Almost every large castle or monastery, had its kitchen-garden, physic-garden, orchard, and frequently its vineyard. And, strange as it may appear to those who consider how much less is brought about, although with much greater advantage, yet it does appear from evidence we cannot well doubt, that at the period we allude to, wine, in great quantity, was made in England, and of a quality too which, at least, is never mentioned to its disparagement.

EXERCISE AND DISEASE.

The wise for cure on exercise depend,
God never made his work for man to mend.
DRYDEN.

NUMEROUS instances are recorded in ancient history, of the efficacy of exercise in the cure of disorders. In many branches of medicine, the ancients were doubtless inferior to the moderns; they nevertheless treated disease with success; for they applied themselves with extraordinary diligence, to acquire a thorough knowledge of the symptoms of every disorder; and called in the aid of *corporeal exercises*, by which means they supplied what was wanting from other remedies.

The diseases in which exercise has been found to exert the most beneficial influence, are gout; rheumatism; consumption; nervous disorders; bilious colic; dropsy; palsy, &c.

GOUT.—Sydenham, the father of English physic, affirms, that nothing so effectually prevents that indigestion of the humours, (which he considers to be the principal cause of the gout), and consequently strengthens so much the fluids and solids, as exercise. But as there is more necessity for making a thorough change in the constitution, in the gout, than in any other chronic disease, so exercise, unless it be used daily, will do no service, and perhaps may do mischief, by bringing on a paroxysm, if it were resorted to, after having been abandoned for any length of time. In short, without exercise, medicaments will be of little service. The nature of the exercise in gouty patients should be moderate and uniform, because, if violent or unsteady, people advanced in years, who are chiefly the subjects of this disease, have their spirits too much wasted, and their concoctive powers injured, which regular and gentle exercise would strengthen.

Riding on horseback was considered by Sydenham as the best medium of exercise, and indeed it has been found so beneficial in gout, rheumatism, and other chronic diseases, as to come strictly within the means of cure for such complaints. If riding on horseback cannot be adopted, going out frequently in a carriage will, he observes, answer almost as well.

RHEUMATISM.—In chronic rheumatism, particularly in that species of it called sciatica, or hip-joint disease, the beneficial effects of exercise have been ascertained in the

most satisfactory manner. A gentleman afflicted for a length of time with rheumatism, resolved, after every other remedy had been tried in vain, to try the effects of *sweating walks*. For this purpose, he procured stockings, drawers, and shirts of fleecy hosiery, and applied eight thicknesses of flannel to the chief seat of the complaint, besides warm pantaloons and a great coat. Thus equipped, he used to walk, according to the state of the weather, from one to two miles; the consequence of which was a profuse perspiration. On his return, he had always at hand a couple of changes of well-aired flannel, one of which he put on, and then lay down upon a bed not warmed. The result was, that he felt convinced that exercise is much preferable to heated air, or hot water. His complaint completely cured, his appetite increased; his general health improved, and he became less sensible of cold, or variation of temperature.

CONSUMPTION.—In the greater part of chronic diseases, but especially in consumption, riding on horseback has afforded relief in an almost incredible manner; and, indeed, is not only proper in slight indispositions, accompanied with a frequent cough and wasting, but, according to Sydenham, even in confirmed consumption, in which the looseness is succeeded by night sweats, which are the general forerunners of death, in those who perish by this disease.

NERVOUS DISORDERS.—In nervous disorders, exercise is better than any medicine that can be prescribed. Many have been cured by perseverance in walking; and before they have travelled many days, their complaints have been entirely removed.

BILIOUS COLIC.—The great Sydenham says, that he found no remedy so effectual in this disorder, as riding on horseback, provided sufficient evacuations had been previously made, and the exercise was continued for several days afterwards. To prevent the return of the pains which accompany this disorder, he recommends an opiate pill to be taken, morning and evening.

DROPSY.—The ancients, it appears, depended much on exercise for the cure of this complaint; and it is worthy of more frequent adoption at the present day, than it seems to meet with.

PALSY.—A person threatened with paralytic symptoms, was ordered by his physician to go down to Bath. In making his journey, he thought he would try the effect

of walking, having it always in his power to get into his carriage when he was fatigued; but he derived so much benefit from the exercise he thus took, that he was cured of the disorder before he reached Bath.

DISEASES OF THE MIND, &c.—The celebrated Hoffman, a German physician, justly celebrates exercise as the best of medicines; he cured idiotism by it; and the mind would seem to depend so much upon the state of the bodily organs, that, according to Descartes, an eminent French philosopher, in his day, if any means of increasing sagacity were to be met with, they must necessarily be sought for in the art of medicine, accompanied by a due proportion of exercise.

A well-framed, and well-exercised body, is precisely what facilitates and secures the proper performance of the mental functions; and a healthy organisation of the bodily powers, is the best foundation for that noble endowment, known under the name of *common sense* (however uncommon in fact it is), or a sound understanding.

A number of cures have been alleviated and cured by the exercise of sailing. In all the preceding, it has been of essential service, also in nervous pains of the stomach, in, what is termed, vapourish languor and fever, &c.

With regard to the choice of exercise for curing diseases, there are many particulars to be attended to. Every kind of exercise, and every degree of it, is not fit for every constitution, far less in every disease, or at all times. The proper kind of exercise to be recommended, must depend upon particular circumstances of habit, age, constitution, or disease, and wherever disease is present, taking the advice of some intelligent physician ought not to be neglected. By means, therefore, of the invigorating quality of exercise, the efficacy of medicine is increased, by extending its powers to every part of the system, and at length promoting its discharge, when it is no longer useful: and as the elegant poet Armstrong observes:

> Toil and be strong. By toil the flaccid nerves
> Grow firm, and gain a more compacted tone;
> The greener juices are by toil subdu'd,
> Mellow'd, and subtiliz'd; the vapid old
> Expell'd; *and all the rancour of the blood.*
> *Art of Preserving Health*, book iii. line 39.

General Rules for taking Exercise, &c.

As regards the *time* of taking exercise, authors hitherto

are not unanimous. Some recommend early in the morning, when the stomach is empty, and body refreshed with sleep; but many cannot bear to take exercise when fasting; and consequently this does not hold uniformly good. It is generally admitted, that between breakfast and dinner, when the weather is not too hot, is an excellent time for active exercises in the open air. It is certainly injudicious to take a great deal of exercise immediately after so heavy a meal as dinner usually is, in this country; at the same time, during the summer season, the dinner is frequently earlier and lighter; consequently, at that period, persons may take exercise in the evening as well as the morning. Dr. Franklin observes, in his "Essay on the Art of procuring Pleasant Dreams," that exercise should precede meals, not immediately follow them; the first promotes, the latter, unless moderate, obstructs digestion. Darwin justly remarks, that in summer, weak people cannot continue too long in the open air, if it can be done without fatigue; and in winter, they should go out several times in a day, for a few minutes, using the cold air like a cold bath, to invigorate and render them more hardy.

It is well known, that violent exercise is more necessary in cold than in warm climates, and is peculiarly essential during the winter season, for promoting perspiration, as the best defence against outward cold, &c.

The quantity of exercise differs as materially as the time; and, indeed, it must necessarily vary according to the same circumstances. Dr. Cheyne, in his "Essay on Health," observes, that the valetudinarian, and the student, ought to have stated times for riding or walking, and that in good air. Three hours at least should be allotted for the former, and two for the latter; the one half before dinner, and the other half, in the summer season, in the evening; the first to beget an appetite, the second to help on digestion, and to promote sleep. Exercise, however, at all seasons of the year, should be proportioned to the powers. For the weak and infirm, it is better they should take three short walks than one long one. Not only is nothing gained by over exertion, but the rest that follows does not refresh, and sleep often cannot be obtained.

Advice to Mothers and Nursery Maids, &c.

It is of the utmost importance, as regards the health of children, at all delicate, that they be not suffered to

walk too long at a time. Short efforts, with intervening repose, should be the maxim of the nursery. When the bones are at least too soft, it is incredible how much mischief is done, by keeping the limbs much on the stretch. Healthy children, indeed, of two or three years of age, have became indisposed, by walking about a mile, without even being hurried. Their own feelings are the best criterion how far they are enabled to continue such exertions; circumstances which demand all the vigilance of an affectionate mother and an attentive nurse.

Advice to Invalids, Convalescents, Valetudinarians, and Hypocondriacs.

In acute diseases, notwithstanding the doctrines to the contrary, rest is absolutely necessary; but when sickly people get into a state of convalescence, exercise, under a proper system, is essential for their recovery. They are apt, however, to be alarmed at the pain and inconvenience which often accompany their first attempts to take exercise, at least to any extent; they ought therefore to desist as soon as they begin to find themselves fatigued; but every day they will feel enabled to bear it longer; and the more they persevere, the stronger they will become.

Gentle exercise and good air, afford such surprising relief to convalescents, that their friends and medical advisers ought to insist on a trial being made, disregarding all objections to the contrary, which the languid state of their mind and body may occasion. Exercise in a cot or hammock, when the patient is exceedingly weak, by swinging it from side to side, will afford an excellent substitute, when other means are not attainable. When invalids return from exercising, should they find themselves chilled by the cold air, they ought, instead of warming themselves by the fire, to sit down, well clothed, in a remote part of the room, until their feelings are gradually reconciled to the temperature of the place they are in. By adopting this precaution, all the hazard of rushing from one extreme to another, may be avoided.

Not a day should be allowed to pass without taking a certain degree of exercise, accommodated to individual strength. And as few persons, more especially invalids, can long enjoy health under a state of indolence, the latter, when confined at home by bad weather, should adopt some kind of active domestic exercise, like that of shuttle-cock, or any similar amusement, several times in

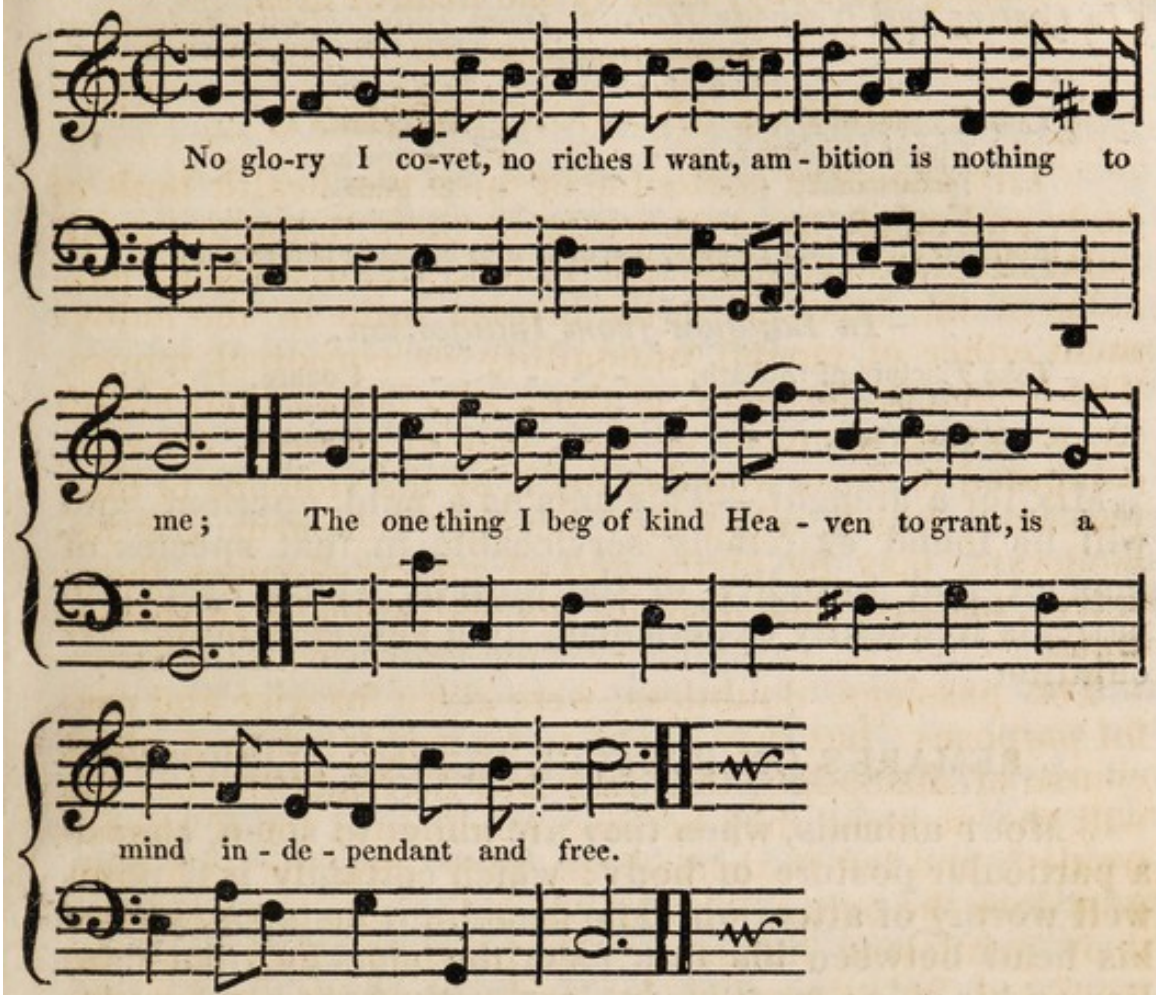
a well-ventilated room, taking care, however, to avoid the draught of air. This will be found a more salutary mode of warming the body, than by the heat of fires.

HEALTH AND CONTENTMENT.

THE effects of contentment upon the health both of body and mind, are sufficiently obvious to require particular illustration; while the violent and distressing passions of the mind are in the inverse ratio to the enjoyment either of mental tranquillity or corporeal repose. The instances, however, of those who impair their health by a severe exercise of their mental powers, are rare, compared to those who destroy it by the violence of their passions; which, when they become vehement and immoderate, may be justly ranked among diseases themselves, because they disorder the bodily health in various ways.

The passions, doubtless, were given for wise and useful purposes; but they ought to be subjected to a strict course of discipline, that they may be ready to obey the will the moment they become rebellious; for if uncontrouled, and left to themselves, they affect us as a tempest does the ocean, without our being able to counteract their pernicious influence. Fortunately, they may be regulated by education, by early restraint, or by unwearied personal attention, founded on the full conviction of its necessity; the practicability of which has been proved in the instances of Augustus and Cornaro. The passions do not act with equal force on all. Their effects vary, according to the diversity of constitutions, both of mind and of body; and, even in the same individual, differ at different times. Happy, therefore, is the man whose temper is naturally good, and who has found means to correct its violence. It has been well observed, that "a contented mind is a perpetual feast;" and it has often been remarked, that persons destitute of ambition and avarice, are peculiarly likely to enjoy long life. These kind of people experience no regret for the past, nor anxiety for the future. In the full enjoyment of that tranquillity of soul, on which the happiness of our early years so much depends, they are strangers to those torments of the mind which usually accompany more advanced years, and by which the body is wasted and consumed.

The simplicity of the following ode, beautifully illustrates the general force of contentment:



With passion unruffled, untainted with pride,
By reason my life let me square;
The wants of my nature are cheaply supply'd,
And the rest is but folly and care.

The blessings which Providence freely has lent,
I'll justly and gratefully prize;
Whilst sweet meditation and cheerful content
Shall make me both healthy and wise.

In the pleasures the great man's possessions display,
Unenvy'd I'll challenge my part;
For ev'ry fair object my eyes can survey,
Contributes to gladden my heart.

How vainly, thro' infinite trouble and strife,
The many their labours employ!
Since all that is truly delightful in life,
Is what all, if they will, may enjoy.

Hence then a calm, contented, and cheerful disposition, may justly be considered the great source of health, as regards body or mind; and ought, as a God-like attribute, to be esteemed as the most important and valuable of all our earthly possessions.

WARM LAXATIVE PILLS,

(In Costive and Nervous Habits, from Indigestion, Sedentary Occupations, &c).

Take Extract of aloes,	- -	20 grains.
Ginger in powder,	- - -	½ drachm.
Ipecacuanha,	- - - -	8 grains.
Simple syrup,	- -	a sufficient quantity.

Mix, and divide into 16 pills, one or two to be taken before dinner.

In Languor from Indigestion.

Take Tincture of rhubarb,	- - -	½ ounce.
Epsom salts,	- - - -	2 drachms.
Hot water,	- - - - -	3 ounces.

Mix for a draught.—This acts as a mild aperient, and will be found extremely serviceable in that species of languor and torpidity of the bowels, which dyspeptic patients frequently experience, from slowness in the circulation.

REMARKS ON POSTURE DURING SLEEP.

Most animals, when they are about to sleep, choose a particular posture of body; which certainly is a point well worthy of attention. The camel, for instance, places his head between his fore feet; the monkey, like man, lies on his side; most birds sleep with their head under one wing. The Psittacus Garrlus (a species of parrot) hangs by one foot on the branch of a tree; and some spiders, and other insects, suspend themselves by their fore legs. Some horses never lie down, but sleep standing; and even those accustomed to lie down, will sometimes sleep on their feet.

Nothing is more prejudicial than to lie in a half sitting posture. Sleep not on your back, or in the posture of a dead man, is a maxim attributed to Confucius. Hippocrates particularly reprobates this posture, as likely to occasion the night-mare, apoplexy, disorders of the kidneys, and other complaints. The opposite position, on the stomach, is extremely injurious to the eyes, lungs, and the bowels in general. We should never lie in any forced or constrained posture, but almost horizontal, the head excepted, which ought to be a little raised; lest the food, by rising too high in the stomach, should require a much longer time to be digested. The best position is to lie upon one side, the body straight, and the limbs

bent, by which they are more at ease. When tired in one posture, the body should afterwards assume that position most favourable to those limbs or parts which have been particularly exercised.

Valangin (on Diet, p. 288) recommends lying on the right side, on first going to bed, particularly while there is yet any food in the stomach; but, after the first nap, or when the stomach is empty, to lie a little on the left side, changing postures when necessary; and every time a person awakes, to stretch himself in bed, to give freer transit to the circulation of the blood.

Dr. Franklin recommends the limbs being placed so as not to bear inconvenientlŷ hard upon one another; as, for instance, the joints of the ancles; for though a bad position may at first give but little pain, and be hardly noticed, yet a continuance of it will render it less tolerable, and the uneasiness may come on during sleep, and may disturb the imagination.

In cold weather the arms should be under the clothes, and above them in warm; and care should be taken not to fold them round the head. It is imprudent to hide the head almost entirely under the bed-clothes. We ought to sleep with our mouth shut; as, besides other inconveniences attending a contrary practice, the teeth are liable to injury from it; for the air continually passing in and out between them, hurts, and by degrees renders them less firm in their sockets; it also tends to consume, unnecessarily, the moisture of the mouth and throat, consequently they become too dry, which is always unpleasant, and in cold weather may occasion sore throats

People should never sleep in a sitting posture, unless for a *forty wink* nap after a meal.

Causes which prevent Sleep.

Sleep may be prevented by improper diet and bad digestion, violent emotions of the mind, &c. Drinking of tea, coffee, and any thin or weak liquor, immediately before going to bed, will, with many people, retard sleep. A full stomach occasions restless nights; and that difficulty of going to sleep, so often ascribed to the vapours, is generally owing to crudities which are undigested, and not carried off by proper exercise. Whatever therefore interferes with the digestive functions, must injure sleep.

The Chinese, who have paid particular attention to the

subject of sleep, among other maxims, have strongly recommended, before lying down, to divest the mind, as far as possible, of thought, and all other circumstances that can shock the imagination, or leave impressions that may tend to disturb the rest; which also, at night, is often prevented by too intense application to one subject or other, requiring the exercise of the mind, when the object applied to is not varied, so as to afford some relaxation to the mental faculties. Sleep may likewise be molested by a number of incidental circumstances, as noise—light—sleeping in a new apartment—having slept during the day—repelled perspiration, owing to being improperly covered with bed-clothes—cramps—mental disquietude—dreams—the night-mare—sleep-walking, &c.

The Philosophy of Dreams.

Dreams are ably described, as comprehending all those thoughts which people feel passing through their minds, and those imaginary transactions in which they often find themselves engaged when in a state of sleep. There is great uncertainty with respect to the manner in which our powers of body and mind perform their functions in dreaming; but, in general, it may be observed, that our dreams are affected by the state of our health; by the manner in which we have passed the preceding day; by the general habits of life; by the hopes we most fondly indulge, and the fears by which our fortitude is most apt to be affected, when we awake. Our dreams may therefore be applied to useful purposes. We may learn from them, to correct many improprieties in our conduct; to refrain from meat, or drink, or exercises, which have unfavourable effects on our constitution; to resist, in due time, evil habits that are stealing upon us; and to guard against hopes and fears, which detach us from our proper concerns, and unfit us for the duties of life. Above all, we ought to remember, that the sleep of health and innocence is sound and refreshing, and the dreams pleasing and delightful; whereas a distempered body, and a polluted or disturbed mind, are haunted, during sleep, with dreams impure, unpleasing, and frightful.

Night-Mare.

This distressing affection is, for the most part, a result of indigestion, and by eating too much, particularly of flesh meat, at supper. It is also not unfrequently caused

by sleeping with the head too low, and laying on the back, the weight of the bed-clothes bearing on the breast. From whatever cause it proceeds, it is uniformly accompanied with great terror, and a sense of suffocation, exciting sensations of the most excruciating nature.

Darwin observes, in Vol. II. p. 403, of his Zoonomia, that great fatigue, with a full supper and much wine, is apt to produce night-mare. The remedies are—the use of the bath, to take little or no supper; and to sleep on a hard bed with the head raised. By the hardness of the bed, the patient will be apt to turn himself more frequently, and will not be liable to sleep too profoundly, or lie too long in one posture. If it be necessary, he ought to be frequently awakened by an alarum clock.

Somnabulism; or Sleep-Walking.

Many well-authenticated instances are recorded, of persons quitting their bed-rooms, and, in the midst of their sleep exposing themselves to great dangers; and not unfrequently terminating fatally.

Means of procuring Sleep.

Sleep, "tired Nature's sweet restorer," cannot safely be dispensed with for any considerable length of time. When its accustomed visits are not paid, the whole frame is deranged from head to foot. It is often in vain that every means are resorted to for the purpose of courting its balmy influence—it evades like a fleeting vision:

> "And in the calmest and the stillest night,
> With all appliances and means to boot,
> Denies it to a king."

In the celebrated case of Lord Lyttelton, as related by his physician, the want of sleep appears to have been the cause of his death; and Tissot proves, by a multitude of facts, that intense thought destroys the aptitude for sleep; and that it much imports studious characters to restrict their learned labours to proper hours, to support their strength by intervals of exercise in the open air; and, above all, to solicit sleep, by a seasonable dismissal of business and of care.

The circumstances which principally contribute to procure or promote sleep, are, air, labour, or exercise, diet, medicine, useful habits, resolution of mind, machinery, application of heat, application of cold, electricity, regular hours, &c.

There may always be suspected some derangement in the machinery of the constitution, when sleep does not follow as a natural consequence of the activity employed throughout the course of the day. Various practices have been recommended to promote sleep: some to be observed before going to bed, and some after; such as walking up and down the parlour or bed-room, before retiring to rest: "*after supper walk a mile,*" is an excellent rule, and may be practised in the house as well as abroad. Listening to music, reading, &c. are good preparations for repose.

Chinese method of promoting Sleep.

The Chinese recommend it as an important rule before going to bed, to wash the mouth, and to rub the teeth and gums over with a brush. This gives the mouth and tongue an agreeable freshness; and though the practice at first may appear a little troublesome, one may soon become accustomed to it, will feel uncomfortable if omitted, more especially as it has a tendency to promote sound sleep. It is also considered by them as a healthy custom, and tending to promote sleep, when a person is undressed, to rub the soles of the feet briskly, and then each toe separately, with the hand or flesh-brush; this practice promotes insensible perspiration, and is an effectual method of preserving and repairing the vital and animal spirits. In fact, there is no better rule than to use the flesh-brush generally, before going to bed, and after getting up in the morning.

Dr. Adair's Suggestions to induce Sleep.

As disturbed or sleepless nights are very annoying and distressing, and not unfrequently productive of disease, Dr. Adair recommends it, as an effectual remedy, to bathe the feet in a narrow tub with handles, so deep as to reach the knees, gradually increasing the heat, by adding boiling water, till a gentle sweat breathes out; the legs must then be wiped quite dry, and a pair of worsted stockings put on. This he recommends as the best means of procuring natural rest, and as particularly beneficial to men of studious and sedentary habits, as well as to those who are subject to frequent attacks of nervous head-achs, colics, rheumatic or gouty pains.

Dr. Franklin's Rules for Sleeping well, and having pleasant Dreams.

Dr. Franklin, who appears scarcely to have been at a loss for any thing, recommends, in order to procure healthy sleep and pleasant dreams, moderate eating; thinner and more porous bed-clothes, which will suffer the perspirable matter to pass more easily through them; and, when a person is awakened by any accident, and cannot easily sleep again, to get out of bed, beat up and turn the pillow, shake the bed-clothes well, with at least twenty shakes, then to throw the bed open, and leave it to cool. In the mean time walk about the chamber undressed, till the skin has had time to discharge its load, which it will do sooner, as the air may be drier and cooler. When you begin to feel the cold air unpleasant, then return to your bed, and you will soon fall asleep, and your sleep will be sound and pleasant. If you are too indolent to get out of bed, you may, instead of this plan, lift up your bed-clothes with one arm and leg, so as to draw in a good deal of fresh air, and by letting them fall, force it out again. This, repeated twenty times, will so clear them of the perspirable matter they have imbibed, as to permit your sleeping for some time afterwards. This method, however, is by no means equal to the former.

Dr. Buchan on the Means of procuring Sleep—Directions to remedy Cold Feet in Bed, &c.

Gently titillating the soles of the feet, will frequently procure sleep. Among the natives of India, I have been informed it is customary for every person who can go to the expence, to employ a servant, gently to tickle the soles of the feet, till sleep takes place. The experiment has frequently been recommended in this country, and with advantage in nervous irritability. Lord Bacon, in his Natural History, says, "It is received and confirmed by daily experience, that the soles of the feet have great affinity with the head; application of hot powders to the feet, attenuate first, and afterwards dry the rheum; likewise pigeons bleeding, applied to the soles of the feet, ease the head; and soporiferous medicines applied to them, provoke sleep."—No person can sleep with cold feet. This may be obviated by applying bottles filled with hot water to the feet. Rubbing the feet with a hard

brush, for some minutes previous to going to bed, will be found a more effectual method of preventing the sense of coldness, and of conciliating sleep, than the immediate application of any thing actually hot.

There are various other artificial means of procuring rest, such as opiates, &c. but these can never be used for any length of time, without considerable constitutional inconvenience. Exercise alone can ensure it in its natural form; for, as the immortal Shakspeare observes,

> ——————————"weariness
> Can snore upon the straw, when resty sloth
> Finds the down pillow hard."

OUTLINES OF AN USEFUL ESTABLISHMENT.

THERE is an Institution, called "The Preservative Society," founded in the county of Northampton in October 1789. Its objects were, 1. To circulate printed cautions, for preventing the causes of many of the accidents which occasion death;—2. To publish directions for preserving life, under apparent death;—and, 3. To grant rewards to those who assisted in saving the lives of their fellow-creatures in such emergencies. The same society likewise extended its views to the preservation of human life, in various cases of imminent danger, respecting which, it was the means of diffusing much useful knowledge, which chiefly consisted in

Cautions for the better Prevention of Accidents.

E. gr. 1. As most sudden deaths come by water, particular caution is therefore necessary, in its vicinity.

2. Stand not near a tree, or any leaden spout, iron gate, or palisado, in time of lightning.

3. Lay loaded guns in safe places, and never imitate firing a gun in jest.

4. Never sleep near charcoal; if drowsy at any work where charcoal fires are used, take the fresh air.

5. Carefully rope trees before they are cut down, that when they fall they may do no injury.

6. When benumbed with cold, beware of sleeping out of doors; rub yourself, if you have it in your power, with snow. *And do not hastily approach the fire*.*

---

* The Italics are additional observations by the Editor, to prevent repetitions.

7. *Beware of damps.*

8. Air vaults, by letting them remain open some time before you enter, or scattering powdered lime in them. *Where a lighted candle will not burn, animal life cannot exist; it will be an excellent caution, therefore, before entering damp and confined places—as wells, privies, cellars, &c.—to try this simple experiment.*

9. Never leave saddle or draught horses, while in use, by themselves. *Nor go immediately behind a led horse, as he is apt to kick.*

10. Ride not on foot-ways.

11. Be wary of children, whether they are up, or in bed; and particularly when they are near the fire; *an element with which they are very apt to amuse themselves.*

Leave nothing poisonous, open or accessible; *and never omit to write the word* "POISON," *in large letters upon it, wherever it may be placed.*

12. Whenever you feel very uneasy, tell your distress early to a steady friend.

Such are the outlines of this useful establishment, to which a number of other equally important cautions might be added. The advantages of societies formed every where on a similar plan, would be incalculable, and the benefit derived to society, far exceeding the trifling expence with which they might be maintained.

THE ORIGIN OF BRANDY.

IT is probable that in 1642 brandy was not in fashion in Wales: yet Nurse, in Shakspeare's play of Romeo and Juliet, calls for it amain, under the name of *aqua vitæ*—

"Some *aqua vitæ*, ho! my lord! my lady!"

It appears to have been chiefly used in those days for medical purposes. In Captain Wyndham's Voyage to Guinea, there was brandy on board for the use of the sick sailors. It was said to have been invented by Raymundus Lullius, the famous alchymist, who died in the year 1315. Charles the Bad, King of Navarre, came to a most horrible end, says Mezerey, who, to restore his strength, weakened by debauchery, was wrapped in sheets steeped in *eau de vie.* His valet, by accident, set fire to them: after the third day he died in the most dreadful tortures, and it is to be hoped, thus expiated the crimes of his most execrable life.

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

(Continued from page 48).

DROPSICAL SWELLING, of the whole body, at the conclusion of scarlet fever, manifests a dangerous disposition, and if not removed on its first appearance, may terminate fatally.

DROWSINESS, with a difficulty of speech and of recollection, and numbness of the limbs, demand the greatest attention, being often the fore-runners of *palsy* or *apoplexy*. Accompanied with pain in the head and at the pit of the stomach, and preceded by shivering, sometimes takes place on the commencement of the fever of *small-pox*. With a frequent dry cough, and running at the eyes and nose, is generally followed by the eruption of the *measles*.

EARS.—Extreme pain of the ears, is always to be considered as a symptom demanding great attention; since it generally shews inflammation to have taken place, which, if not removed in time, may terminate in deafness for life. Sense of singing in the ears, with head-ach and continual drowsiness, threatens *palsy* or *apoplexy*.

ERUCTATION.—Frequent acid eructations, denote a *weakness of the stomach*.

ERUPTIONS, SCARLET, gives name to the scarlet fever; with which is frequently found, *ulcerated throat*. It is also generally a symptom in the *malignant* ulcerated throat. Eruption of pimples, on their first appearance somewhat resembling those of scarlet fever, but having the cuticle or scurf skin a little more raised, and the pimples more clustered, marks it to be the measles. The distinction between scarlet fever and measles, is more easily made, by the eyes and nose suffering an increased discharge in the latter; while in scarlet fever, they look red and inflamed. When the pimples are more distinct and elevated, and the nostrils and eyes are not affected, as in the former case, the disease may be concluded to be *small-pox*, the eruption assuming a pustular form. It should be remembered, that the termination of this and the former disease, will frequently depend on their treatment during the first stages. A vesicular eruption appears of the size of millet-seed in fevers, and other diseases, where there has been profuse perspiration, or

in cases where much blood has been lost, and is termed the *miliary eruption*.—An eruption of red spots, with a lighter centre, accompanied with an itching resembling that which is produced by the stinging of nettles, is called the *nettle rash*.—Scaly, white, and itching eruptions, beginning about the elbows, and spreading to the hands, the body, and face, is the *leprosy*.—An eruption of small pimples, containing a pellucid fluid, appearing all over the body, but chiefly at the bending of the limbs, and itching violently, is the *itch*.—An eruption on the head, terminating in ulcers, which discharge a humour soon drying into a whitish crust, is denominated *tenea*, or *scalled head*.

EXTREMITIES becoming cold, in acute diseases, marks danger.—Becoming cold, with pain in the belly, or with great heat of the body, also shews danger.

EYES, not closing during sleep, in fevers, is a bad symptom.—Red, painful, and watery eyes, with incapability of sustaining the light, shews inflammation of this organ.—The eyes appearing sunk, dull, or watery, is a symptom of much danger in fevers.

FACE contracted, the eyes appearing sunk, nose sharp, the ears cold, the skin dry and pale, the eye-lids, lips, and cheeks livid, shew life to be nearly at an end.—The face swelled, pale, and of a waxy hue, in children, points out a disposition to *rickets*.—Pale and sallow face, in young female subjects, shews a *cachectic disposition*, or bad habit of body, which, if not removed, may terminate in complaints of a very serious tendency.

FAINTING, when it occurs frequently, points out a very debilitated state of the system.

FEVER, accompanying pain in any internal part, shews, in general, that inflammation is establishing itself in that part; and can only be removed by an immediate employment of powerful means.—Fever increasing about noon and evening, with perspirations during the latter part of the night, and the urine depositing a bran-like sediment, gives reason to suppose that some change in the system, full of danger, has taken place.

FITS, happening just before the eruption of small-pox, are not always, though generally, succeeded by a favourable kind.

GIDDINESS, with sickness at the stomach, and loss of appetite, generally shows the stomach to be foul.—Giddiness, accompanied with head-ach, ringing in the ears,

and impaired powers of recollection, threatens apoplectic or paralytic attacks.

HANDS AND FEET SWELLING, in small-pox, as the swelling of the head and face subsides, is a favourable symptom.

HEAD-ACH, continuing with violence through the course of fever, shews that a fatal termination is to be apprehended.—Head-ach with giddiness, sickness, and loss of appetite, but without fever, accompanies foulness of the *stomach.*—With redness of the face and eyes, and fever, are symptoms of inflammation of the brain;—accompanying *inflammation of the eyes,* is in general a mark of danger;—with eructations, and loss of appetite, points out *indigestion;*—with pain and tension at the pit of the stomach, generally proceeds from wind pent up in the stomach;—when accompanied by *a costive state of the bowels,* may be attributed to that circumstance;—with florid countenance, and a full, sluggish pulse, may arise from *fullness of blood;*—with chilliness, slight shiverings, and great lassitude, generally distinguish the commencement of fever.

Secrets of Trade;

OR, ANALYTICAL HISTORY OF ALL PATENT MEDICINES, COSMETICS, AND OTHER QUACK NOSTRA:

Shewing their various Ingredients, Proportions, Medicinal Properties, Doses, &c. with proper Cautions, &c.

A

AGUE DROP—SOLUTION OF ARSENIC.

This is a solution of the arsenite of potass, coloured and flavoured by the compound spirit of lavender, a fluid drachm of which contains half a grain of arsenious acid. It was introduced into practice by Dr. Fowler of Stafford, as a substitute for the empirical remedy known by the name of the "*Tasteless Ague Drop.*" It is a powerful tonic, and has been successfully administered in the cure of intermittent and remittent fevers, periodical head-aches, and as an alterative in many anomalous diseases of the skin. It has also been given with decided effect in certain visceral obstructions; its use, however, is to a great degree empirical, although it is generally observed, that wherever strong arterial action exists, arsenic will

do harm. The dose of Fowler's solution is from one drop to four, twice a day.

ALMOND PASTE.

This cosmetic for softening the skin, and preventing chaps, is made as follows:

Take Bitter almonds, blanched, 4 ounces.
White of an egg.
Rose water, and
Rectified spirits, equal parts, as much as is sufficient to make the almonds into a paste.

ANDERSON'S PILLS.

These pills are made with Barbadoes aloes, a proportion of jalap, and a few drops of the oil of aniseed.

*** In consequence of aloes not undergoing solution in the stomach, it is admirably adapted for the basis of remedies intended to remove habitual costiveness, or torpor of the intestinal canal. It should however be remarked, that these pills, as well as every other preparation into which aloes enter as an ingredient, are improper as a cathartic in hemorrhoidal and pulmonic affections, pregnancy, or in cases where menstruation occurs either too frequently or too redundantly.

ANODYNE NECKLACES.

The roots of *hyoscyamus* (henbane) are commonly strung in the form of beads, and sold under this name, to tie round the necks of children, to facilitate the growth of their teeth, and allay the irritation of teething.

*** The application of medicated necklaces is a very ancient superstition. Oribasius commends in high terms, a necklace of *pæony root*, for the cure of epilepsy. In a work on scrofula, written by Mr. Morley, the root of the vervain is directed to be hung round the neck, tied with a yard of white ribbon, which is to remain there until the patient is cured. These kinds of deceptions, however, were too palpable. Oribasius accompanied his pæony necklace with copious purgatives;—and Morley called into his aid the most active medicines of the Materia Medica.

AROMATIC LOZENGES OF STEEL.

These consist of sulphate of iron, with a small proportion of the tincture of cantharides.

AROMATIC VINEGAR (HENRY'S).

This is merely an acetic solution of camphor, oil of cloves, of lavender, and of rosemary. A preparation of this kind may be extemporaneously made, by putting a

drachm of the acetate of potass into a phial, with a few drops of some fragrant oil, and twenty drops of sulphuric acid.

THIEVES' VINEGAR, OR MARSEILLES VINEGAR,

is a pleasant solution of essential oils and camphor, in vinegar. The Edinburgh Pharmacopœia has given a formula for its preparation, under the title of "*Acetum Aromaticum*" (*Aromatic Vinegar*). The repute of this preparation, as a means of preserving health from the attacks of contagious fevers, is said to have arisen from the confession of four thieves, who, during the plague at Marseilles, plundered the dead bodies with perfect security, and who, upon being arrested, stated, on condition of being spared, that the use of *aromatic vinegar* had preserved them from the influence of contagion. On this account, it is sometimes called "*Vinaigre des Quatre Voleurs.*" The French codex has a preparation of this kind, consisting of an acetic infusion of various aromatic herbs and camphor, which is termed "*Acetum Aromaticum Alliatum,*" *seu Antisepticum*, vulgo "*des Quatre Voleurs.*"

B

BAILEY'S ITCH OINTMENT.

This is a very complicated combination; containing nitre, alum, sulphate of zinc, and cinnabar, made into an ointment with olive oil and lard, and perfumed with the essential oils of *anise seed*, *origanum*, and *lavender*, and coloured with alkanet root.

*** The Indians use an ointment in inveterate itch, which is said to prove very successful, and consists of finely-powdered *cocculus Indicus*, mixed with a little castor-oil.

BALSAM OF HONEY,

is the tincture of benzoin, or Benjamin, or that of Tolu.

BALSAM OF HOREHOUND (FORD'S).

This nostrum may very properly be classed under the present head. It consists of a watery infusion of horehound and liquorice root, with double the proportion of proof spirit, or brandy; to which is then added, opium, camphor, benzoin, squills, oil of aniseed, and honey.

BALSAM OF LIQUORICE, PECTORAL.

The proprietor of this nostrum gravely affirms, that a fluid ounce and a half of it contains the virtues of a whole pound of liquorice root; but upon investigation, it will

be found to consist principally of paregoric elixir, very strongly impregnated with the oil of aniseed.

*** Opium is the quack's sheet anchor. The various nostrums advertised as "*cough drops,*" for the cure of colds, asthmas, catarrhs, &c." are preparations of opium, very similar to paregoric elixir. THE PECTORAL BALSAM OF LIQUORICE, and ESSENCE OF COLTSFOOT, are combinations of this kind. Grindle's cough drops, are a preparation of the same description, only made with rectified, instead of proof spirit, and consequently, more highly charged with stimulant materials. "The mischief," observes Dr. Fothergill, that "has proceeded from the *healing* anodynes of quacks, can scarcely be imagined; for in coughs, arising from suppressed perspiration, or an inflammatory diathesis, opiates* generally do harm."

BARCLAY'S ANTIBILIOUS PILLS.

Take Extract of colocynth,	2	drachms.
Extract of jalap,	1	drachm.
Almond soap,	1½	drachm.
Guiacum,	3	drachms.
Tartarized antimony,	8	grains.
Essential oils of juniper, caraway, and rosemary, of each,	4	drops.

Syrup of buckthorn, as much as will be sufficient to form a mass, which is to be divided into 64 pills.

BARK, ESSENTIAL SALT OF.

This is merely an extract prepared by maserating the bruised substance of bark in cold water, and submitting the infusion to a very slow evaporation.

*** The public ought to know, that the preparation sold under the above empirical title, has no relation whatever to the late discoveries of M. Pelletier, a celebrated French chemist.

BATEMAN'S PECTORAL DROPS,

consist principally of the tincture of castor, with portions of camphor and opium, flavoured by aniseeds, and coloured with cochineal.

BATES' ANODYNE BALSAM,

consists of one part of the tincture of opium, and two of opodeldoc, or compound soap liniment.

BATTLEY'S SEDATIVE LIQUOR OF OPIUM. (*Liquor Opii Sedativus*).

Under the name of liquor opii sedativus, Mr. Battley,

---

* The operation of opium is not unfrequently attended with an itching, or a sense of pricking of the skin, which is sometimes terminated by a species of miliary eruption.

of Fore-street, London, has introduced a narcotic preparation, which it is generally supposed owes its efficacy to the *acetate of morphia;* on being kept, however, it was found that it underwent some important change, during which so much air was disengaged, as to blow out the cork from the bottle with violence. This is an insuperable objection to its admission, says Dr. Paris, into practice.

BEAUME DE VIE. *(Balm of Life).*

The compound decoction of aloes resembles the well-known *Beaume de Vie,* and is a scientific preparation, constructed upon the true principles of medicinal combination. Aloes is the base, to which are added, 1st, subcarbonate of potass; 2dly, powdered myrrh; 3dly, extract of liquorice; 4thly, saffron; and after the decoction is made; 5thly, compound tincture of cardamoms. By the first ingredient, the aloes is rendered more soluble; the second and third suspend the portion not dissolved, and at the same time disguise its bitterness; the fourth imparts an aromatic flavour; and the fifth not only renders it more grateful to the stomach, but prevents any spontaneous decomposition from taking place. Its taste is improved by keeping. It is a warm gentle cathartic.

BLACK DROP, *(Or, the Lancaster, or Quaker's Black Drop).*

This preparation, which has been long known and esteemed, as being more powerful in its operation, and less distressing in its effects than any tincture of opium, has, until lately, been involved in much obscurity; the papers, however, of the late Edward Walton, of Sunderland, one of the near relations of the original proprietor, having fallen into the hands of Dr. Armstrong, that gentleman has obliged the profession, by publishing the manner in which it is prepared: *e. g.*

Take of sliced opium,	- - -	½ pound.
Good verjuice,	(juice of the wild crab),	3 pints.
Nutmegs,	- - -	1½ ounce.
Saffron,	- - - -	½ ounce.

Boil them to a proper thickness, then add a quarter of a pound of sugar, and two spoonsful of yeast. Set the whole in a warm place near the fire, for six or eight weeks, then place it in the open air until it becomes a syrup; lastly, decant, filter, and bottle up, adding a little sugar to each bottle.

*** One drop of this preparation is considered equal to about three of the tincture of opium, of the London Pharmacopœia.

BRODUM'S NERVOUS CORDIAL.

This empirical preparation consists of the tinctures of

gentian, columba, cardamom and bark, with the compound spirit of lavender, and wine of iron.

C

CHAMBERLAINE'S RESTORATIVE PILLS FOR SCROFULA.

"The most certain cure for the Scrofula, or King's Evil, Fistula, Scurvy, and all Impurities of the Blood."

My attention, says Dr. Paris, (see Pharmacologia, vol. ii. p. 247), has been particularly directed to these pills, in consequence of having lately seen, during the course of my professional duty, several highly respectable persons, who have been induced to make trial of their efficacy. Their inventor, if I am rightly informed, resides at Ipswich, where, for the benefit of suffering humanity, he prepares these wonderful pills, and, with the alacrity of his patron deity, Mercury, transmits them to every corner of the united kingdom. It appears from the printed directions which accompany the "*restorative pills,*" that their use must be continued for a very long period; but upon this occasion we must allow the Doctor to speak for himself: "*It may be necessary to observe, that in some cases of scrofula, especially when the seat of the disease is in the feet, ancles, or hands, it may take a long time to effect a cure, even two years, and it may be twelve or sixteen months, with seeming little or no improvement, yet the cure is certain by perseverance.*"—What, two years! and to be taken during a period of sixteen months without any sensible benefit! Is it possible that people can be found, with sufficient credulity and resolution to submit to so preposterous a proposal? There is no doubt Mr. Chamberlaine can produce a great a proportion of cures after such an ordeal, as was adduced in former times, in proof of the efficacy of the royal touch, and for the same obvious reason.

Upon examining these said pills, they were found to consist of cinnabar, sulphur, sulphate of lime, and a little vegetable matter, perhaps gum. Each pill weighs a fraction less than three grains; upon dividing one with a penknife, and examining the cut surface through a lens, it exhibited the appearance of scoriæ of a red brick colour, having small yellowish masses imbedded in its substance. When exposed on a piece of platinum foil to the action of the blow-pipe, it yielded vapour of a strong sulphureous smell, and left a residuum of a pearly white matter,

which consisted almost entirely of *sulphate of lime.* Upon submitting a portion of the pill, in a glass tube, to the heat of a spirit-lamp, two distinct sublimates were produced, the first consisting of sulphur, the second of cinnabar, and a small carbonaceous deposit remained. The pill was then assayed, *via humida:* distilled water dissolved the sulphate of lime, which was identified by appropriated tests, and left sulphur and cinnabar on the filtre. "By the above experiments, (says Dr. Paris), I feel warranted in considering the composition of this pill as fully ascertained."

CEPHALIC SNUFF.

The basis of this errhine, is powdered *asarum,* diluted with some vegetable powder.

CHAMOMILE DROPS.

The nostrum sold under this name, is a spirit flavoured with the essential oil of chamomile. It is very obvious that it cannot possess the tonic bitter of the flowers.

CHARCOAL, CONCENTRATED SOLUTION OF.

A preparation under this absurd name, for cleaning the teeth.

CHELSEA PENSIONER.

An empirical remedy for the rheumatism, is well known under this name; it is said to be the prescription of the Chelsea Pensioner, by which Lord Amherst was cured: the following are its component parts:

Take Gum guiacum, - - -	1 drachm.
Powdered rhubarb, - -	2 drachms.
Cream of tartar, - - -	1 ounce.
Flour of sulphur, - -	2 ounces.
Nutmeg, fine powdered, - -	No. 1.

To be made into an electuary, with one pound of clarified honey. Two large spoonfuls to be taken night and morning.

CHELTENHAM SALTS.

A factitious compound has long been vended under this name, as a popular purgative; it is formed by triturating together the following salts: *sulphate of soda,* 120 grains; *sulphate of magnesia,* 66 grains; *muriate of soda,* 10 grains; *sulphate of iron,* ½ grain. As a purgative it is very efficacious, and superior probably to that which is actually obtained by the evaporation of the Cheltenham water itself; for, notwithstandiug the high pretensions with which this latter salt has been publicly announced, it will be found to be nothing else than common *Glauber's*

salt. This fact has been confirmed by the experiments of Mr. Richard Phillips, (Annals of Philosophy, No. LXI), who observes, that the "real Cheltenham salts contain no chalybeate property, but are merely sulphate of soda, mixed with a minute quantity of soda, and a very small portion of common salt." It could not be imagined that the salt should contain oxide of iron even in a state of mixture, much less in combination, for carbonate of iron is readily decomposed by ebullition, and the oxide of iron is precipitated before the salt can be crystallized. A preparation under the name of Thomson's Cheltenham Salts, is accordingly manufactured in London, by evaporating a solution of sulphate of soda and sub-carbonate of soda.

"EFFLORESCENCE OF REAL CHELTENHAM SALTS."

The preceding salt deprived of its water of crystallization.

"EFFLORESCENCE OF REAL MAGNESIAN CHELTENHAM SALTS," MADE FROM THE WATERS OF THE CHALYBEATE MAGNESIAN SPA.

This is asserted to be a sub-sulphate from nature, which combined both a pure and a sub-sulphated magnesia in its composition; "but, (says Mr. Phillips), neither nature nor art have ever produced such a combination; in truth, it consists of *Epsom salt,* with portions of magnesia, and muriate of magnesia, or muriate of soda."

MURIO-SULPHATE OF MAGNESIA AND IRON.

This preparation, so named by Mr. Thomson, was found by Mr. Phillips to consist of Epsom salt, deprived of part of its water of crystallization, and discoloured by a little rust of iron, and containing a small portion of muriate of magnesia.

Thus it appears, that not one of these preparations is similar to the water which is drunk at the spa; in order therefore to remedy this difficulty, Mr. Thomson prepared the "ORIGINAL COMBINED CHELTENHAM SALTS," by evaporating the waters to dryness: but a very little share of chemical penetration is requisite to shew, that no process of this description can remedy the defect described; for, as Mr. Phillips has observed, the chalybeate properties of the water *must* be essentially altered by such an operation.

CHING'S WORM LOZENGES.

These consist of yellow and brown lozenges: the former are taken in the evening; the latter, the following morning.

*** Many of the nostrums advertised for the cure of

worms, contain calomel as their principal ingredient, combined with scammony, jalap, gamboge, or some other purgative. They are uncertain and dangerous medicines; the method of exhibiting them is in the form of lozenges *(worm cakes)*, is also attended with inconveniences, for the sugar and the gum generating an acid, being kept in damp places, may considerably increase the acrimony of the mercury; besides which, the calomel is frequently very unequally diffused throughout the mass: one lozenge, therefore, may contain a poisonous dose, whilst others can scarcely contain any active matter.

COLLEY'S DEPILATORY.

Potass forms the basis of many of those preparations sold as depilatories, or substances that remove superfluous hairs; in some instances, they are combined with quick-lime. The above appears to consist of quick-lime and a portion of the sulphuret of potass.

CORN PLAISTER.

The green coloured plaister sold under this title, is usually composed of three parts of wax, four of Burgundy pitch, and two of common turpentine; to which is added, one of verdigris.

COUGH DROPS.

These are usually preparations of opium, very similar to paregoric elixir. (See page 5).

COURT PLAISTER. *(Sticking Plaister).*

The composition of this preparation is as follows: black silk is strained and brushed over ten or twelve times, with the following preparation: Dissolve half an ounce of benzoin in six ounces of rectified spirit; in a separate vessel, dissolve an ounce of isinglass in half a pint of water; strain each solution, mix them, and let the mixture rest, so that the grosser parts may subside; when the clear liquor is cold, it will form a jelly, which must be warm before it is applied to the silk. When the plaister is quite dry, in order to prevent its cracking, it is finished off with a solution of chian turpentine four ounces, in six ounces of the tincture of Benjamin.

CRESPIGNY, LADY, HER PILLS—DINNER PILLS—LADY WEBSTER'S, OR LADY CRESPIGNY'S PILLS.

These popular pills, are the "*pilulæ stomachicæ*," stomach pills—commonly called, "*pilulæ ante cibum*," or pills before meat, of the *codex medicamentarius Parisiensis*. Editio Quinta, A. D. 1758.

They are made as follow:

Take The best or soccotrine aloes, - - 6 drachms.
Mastiche and red roses, each, - 2 drachms.
Syrup of wormwood, enough to make a mass, to be divided into pills of three grains each.

*** The operation of this pill is to produce a copious and bulky evacuation, and in this respect experience has fully established its value.

D

DAFFY'S ELIXIR.

This is the *compound tincture of senna,* with the substitution of treacle for sugar candy, and the addition of aniseeds and elecampane root. The different kinds of this nostrum are sold under the name of Dicey's Daffy, and Swinton's Daffy; but they differ merely in some subordinate minutiæ, or unimportant additions.

Dicey's Daffy is made with the following ingredients:

Take Senna leaves, - - - - 4 ounces.
Shavings or raspings of guiacum,
Elecampane dried, - -
Aniseed, - - -
Caruiseed, - - -
Coriander seed, - -
Liquorice root, - - } of each, 2 ounces.
Raisins of the sun, stoned, - - 8 ounces.
Proof spirit, - - - - 6 pints.
Macerate for 14 days, and filter.

or,

Take Senna leaves, - - - - 1 pound.
Caruiseeds, - - - - - 1½ ounce.
Lesser cardamoms, - - - - ½ ounce.
Stoned raisins, - - - - 16 ounces.
Proof spirit, - - - 1 gallon.

or,

Take Senna leaves, - - - 2 ounces.
Jalap root, - - - 1 ounce.
Coriander seed, - - - ½ ounce.
Proof spirit, - - - 3½ pounds.
When made, add white sugar, - - 4 ounces.

Swinton's Daffy.

Take Jalap, - - - - 3 pounds.
Senna leaves, - - - - 12 ounces.
Coriander seed, - -
Aniseed, - -
Liquorice root, - - } of each, 4 ounces.
Elecampane, - - -
Rectified spirit of wine, and water, of each, 1 gallon.

or,

Take East India rhubarb, - - - 40 pounds.
Red Saunders, - - - 5 pounds.

Caruiseed, coriander, and aniseed, of each,	5 pounds.
Impure potass,	8 ounces.
Proof spirit,	80 gallons.
Treacle,	46 pounds.

or,

Take Senna leaves,	7 pounds.
Jalap root,	5 pounds.
Aniseed,	14 pounds.
Caruiseed,	4 pounds.
Seeds of sweet fennel,	4 pounds.
Brandy colouring,	2 gallons.
Rectified spirit of wine,	26 gallons.
Water,	24 gallons.

Let it stand three weeks, strain, washing out the large portions with water two gallons, then add treacle twenty-eight pounds.

A common remedy in flatulent colic, and used as a purge by those accustomed to spirit drinking: dose, one, two, or three table-spoonsful.

DALBY'S CARMINATIVE.

This consists of Carbonate of magnesia,	2 scruples.
Oil of peppermint,	1 drop.
—— nutmeg,	3 drops.
—— aniseed,	3 drops.
Tincture of castor,	30 drops.
——— assafœtida,	15 drops.
——— opium,	5 drops.
Spirit of penny royal,	15 drops.

DR. DARWIN'S* ADVICE TO THE MEN OF NOTTINGHAM.

"YE men of Nottingham, listen to me; you are ingenious and industrious mechanics. By your industry, life's comforts are procured for yourselves and families. If you lose your health, the power of being industrious will forsake you. *That* you know; but you may *not* know, that to breathe the fresh and changed air constantly, is not less necessary to preserve health, than sobriety itself. Air becomes unwholesome in a few hours, if the windows be shut. Open those of your sleeping rooms whenever you quit them to go to your workshops. Keep the windows of your workshops open, whenever the weather is not insupportably cold. I have no *interest* in giving you this advice. Remember what I, your countryman, and a physician, tell you. If you would not bring infection and disease upon yourselves, and to your wives and little ones, change the air you breathe; change it many times a day, by opening your windows."

---

* A man of genius, a botanist, a poet, a practitioner, and author of Zoonomia.

Housekeeping and Husbandry.—No. I.

House-keeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

COOKERY, &c.

Cheap and palatable Receipts in Cookery.

1. *To make Beef Potage.*—Take three pounds of gravy beef, eleven quarts of water, boiled gently two hours, then add four pound of Scotch barley, and boil it gently four hours more with six pounds of potatoes, half a pound of onions or leeks, with some parsley, thyme, pepper, and salt; half a pound of bacon, cut in slices, makes it more savory, and any other vegetables may be added: this produces three gallons of potage, and requires no bread. It gave a plentiful meal to twenty persons.

2. *Beef Stew.*—Two pounds of beef, one pound of turnips, half a pound of onions, half a pound of rice, parsley, thyme, pepper and salt, and eight quarts of water. Cut the beef in slices, and when it has boiled some time, mince it small; the vegetables may be minced before they are put in.

3. *Shin of Beef Stew.*—Shin of beef, bones broken, barley, onions, and potatoes, one pound each; six pounds of cabbage, carrots, and turnips, and salt and pepper; water, eleven quarts; produced three gallons.

4. *Baked Shin of Beef.*—A shin of beef, six quarts of water, a pint of split peas, one leek, four or five sliced turnips, baked in an earthen pot.

To stew Mutton Chops, and make good Mutton Broth.

Put a pound of chops into a stew-pan with cold water enough to cover them, and half a pint over, and an onion; when it is coming to a boil skim it, cover the pan close, and set it to simmer gently over a very slow fire, till the chops are tender: if they have been kept a proper time, they will take about three quarters of an hour to do. Send up turnips, which may be boiled along with them, in a deep dish, with the broth they were stewed in. This makes an economical, comfortable, and wholesome meal.

To remove the Thief from the Candle.

There is a fault in most candles, viz. that of not having the cottons properly disposed, and of the same length

throughout, which causes what is commonly called a thief, from its wasting the tallow in its descent down the candle; now the effect of steel is such, that if you lay any piece of that metal, as the snuffers, on the opposite side of the candle to that on which the thief is, in such a manner that it may touch the candle, where it meets the candlestick in the socket, it will not only stop the progress of the thief down the candle, but will cause it to be taken up and consumed in the flame itself.

To banish Rats and Mice.

A plant which grows in great abundance in every field, the dog's tongue, *Cynoglossum Officinale* of Linnæus, has been found to possess a very valuable quality. If gathered at the time when the sap is in its full vigour, bruised with a hammer, and laid in a house, barn, or granary, or any other place frequented by rats or mice, these destructive animals, it is said, immediately shift their quarters.

To prevent Flies from settling on Pictures, Picture Frames, or other Furniture.

Soak a large bundle of leeks for five or six days in a pail of water, and then wash or sponge the pictures, &c. over with it.

To make Cheap and Wholesome Bread.

To every five pounds of flour, add one pound of rice previously boiled over a slow fire, until it becomes like a jelly. Then, when lukewarm, add the yeast, and mix up for bread. Should the sponge be too thick, a sufficient quantity of lukewarm water may be added. By this method, thirty pounds of flour and six pounds of rice, will make eighteen quartern loaves, of four pounds and one quarter each.

N. B. The five pounds of flour make eight pounds of bread; but when mixed with a pound of rice, twelve pound and a half.

Singular Improvement in Preserving Potatoes, by M. Parmentier, of Paris.

To preserve a quantity of these roots sufficient to last till next crop, it is necessary they should first be partly dressed; and after they have been peeled, sliced and dried in a stove or oven, they acquire the transparency, hardness, and dryness of horn; they break clean, and the fracture has a glassy appearance. Some in this state

have been sent to the East Indies. When these potatoes, thus prepared, are dried, they may be ground as they are wanted; and the flour, which is a yellowish powder, similar to gum arabic, dissolves in the mouth, and communicates to water the consistence and taste of potatoe that has been cooked. It has been called *the poor people's soup*. Gruel and rich porridge may be made with it. The indispenable necessity of partly cooking the potatoes, in order to preserve their nutritious quality, has occasioned in Germany many useful researches; and, among others, an instrument has been made for mashing them after they are cooked. It is a cylindrical tube made of tin, which is pierced with small holes like a skimmer; by this the potatoes, boiled and dried in a stove, produce a kind of vermicelli. Another method is, to take them in a sound state, neither boiled nor bruised, and to rasp or grate them. When dried or sifted, and the juice of fibrous matter separated, they will keep like starch for ages. These rasped potatoes put into a linen bag, and well pressed, then divided into small cakes, being dried, become friable, and very proper to be used in soups, &c.

THE LAUNDRY, &c.

To restore Soiled and Discoloured Linen.

WHEN linen is soiled or discoloured by town-washing, or by age, or by lying by out of use, the best bleaching materials are the natural verdure of the ground, with the dews and winds of heaven. But as a more speedy mode may be desirable, we recommend the following, viz. the linen must be twice washed out; first in a mixture of ley, formed in the proportion of one pound of common pearl-ash to a gallon of soft water, in a boiling state, in which the linen must lie for twelve hours, and then be boiled for half an hour in the same liquid; after which it must pass into the second process, viz. a mixture of common bleaching powder (hyper-oxymuriate of lime) with eight times its quantity of water, or a pound to a gallon, which must be well shaken in a stone jar, for three days, then allowed to settle, and being drawn off clear, the linen must be steeped in it for thirty-six hours, and then washed by the usual process: this will take out all but ink stains. Grass-bleaching is always best for discoloured linen or muslin; but in town, or when in a hurry, mix a pound of oxymuriate of lime, with six quarts of soft water, and

put a portion of this into the tub where the articles are steeping.

To remove Iron-moulds from Linen.

Take some crystallized citric acid (acid of lemons), pound a small quantity to a fine powder, and apply it to the spot; drop some hot water on, and rub it in, upon a pewter plate over a stove, until the oxide of the iron unites with the acid, when a little warm water washes all out.

For Washing Chintz, so as to preserve its Gloss and Beauty.

Take two pounds of rice, and boil it in two gallons of water till soft; when done, pour the whole into a tub: let it stand till about the warmth you in general use for coloured linens; then put your chintz in, and use the rice instead of soap; wash it in this till the dirt appears to be out; then boil the same quantity as above, but strain the rice from the water, and mix it in warm, clear water. Wash in this till quite clean; afterwards rinse it in the water you have boiled your rice in, and this will answer the end of starch, and no dew will affect it, as it will be stiff as long as you wear it. If a gown, it must be taken to pieces; and when dried, be careful to hang it as smooth as possible; after it is dry, rub it with a sleek stone, but use no iron.

To remove Ink or Iron Spots of long standing.

Where spots from iron or ink are of too long standing to be readily removed, a more chemical process is required. Take sulphuret of potass, or muriate of tin; apply it to the spot, and let it remain about five minutes, when it must be washed out. Then apply some acid of lemon to it. The older the spots, the oftener this process must be repeated.

Ink spots in linen, may be taken out by melting part of a mould candle, and dipping the spot in it before the linen is put into the washing-tub.

To remove Stains occasioned by Acid Vegetables, and Alkaline Substances.

The first are mostly occasioned by oranges, and the like, upon coloured stuffs. They may be destroyed by a mixture of alcohol and liquid ammonia. Those from

alkalis must be neutralized with the diluted acid of vinegar.

Muslin, when stained by wine, will be best restored by rubbing it with soft soap and common whiting before washing; after which it must be kept wet, and exposed to the sun and air.

To remove Grease Spots.

Moisten them with a few drops of the concentrated solution of subcarbonate of potash; rub the spot between the fingers, so that the alkali may unite chemically with the grease, forming a species of soap, which a little warm water will wash out.

To remove Spots of Wax, Oil Paint, &c.

Moisten them repeatedly with alcohol, or strong spirit of wine, when the wax will become dry and brittle, yielding easily to the action of a brush. If, however, the spots are of long standing, it will be a readier method to apply a few drops of rectified spirit of turpentine; rub it in well, and wash out with soap and water.—To remove oil paint, apply oil of turpentine, and wash it out.

The preceding directions are all applicable to linens, cottons, and woollens; but another process is required,

To remove Grease Spots from Silk, e. g.

Take some fullers' earth, powder it, and mix into a paste with water. Apply some to the spot; let it dry, and then brush out; after which, remove the marks with a little sulphuric ether, which must again be washed out with spirits of wine.

Of discharging Grease Spots from Cloths, by Mr. W. Nicholson, Philosophical Journal, No. 68, Vol. 16.

Piece goods are often so damaged, by oil or tallow dropping on them from the lamps or candles of the weaver, that they are quite unsaleable; it is therefore a matter of considerable importance to the manufacturer, to have every information he can, on the best method of discharging the spots so caused.

Fullers' earth, or tobacco-pipe clay, being put wet on an oil spot, absorbs the oil as the water evaporates; and leaves the vegetable or animal fibres of the cloth clean, on being beaten or brushed out. When the spot is occasioned by tallow or wax, it is necessary to heat the part cautiously by an iron, or the fire, while the earth is dry-

ing. In some kinds of goods, blotting paper, bran, or raw starch, may be used with advantage.

Soap or alkali, it is well known, will make the grease soluble in water; but the chemical action of these, particularly of the latter, and the danger of applying water to some kinds of goods, renders their use, in general, too hazardous.

Alcohol, or spirits of wine, mixed with essential oil of lemons, will remove grease from silk, though by itself it has no action on it; the place should be wetted with it, and then rubbed with a sponge or cloth. Spirits of turpentine may be tried, instead of essence of lemons, on account of its cheapness.

As soap is soluble in alcohol by a gentle heat, it might be used with it beneficially, for taking out spots from some stuffs which would be injured by water. Sugar, also, may be tried for cleaning goods so injured in some cases, as it makes oil soluble in water.

Process for Purifying Fish Oil.

Take one gallon of crude stinking oil, and put to it a pint of water poured off from two ounces of lime, slacked in the air; stir the mixture up several times for the first twenty-four hours; then let it stand a day, and the lime-water will sink below the oil, which must be carefully separated from it. This is one of the methods by which our common oils can be so clarified as to become like pure water.

Mode of Preserving Milk for any length of time.

Kirchoff, a German chemist, well known for his curious discovery of converting starch into sugar, reduces milk to a dry mass by a gentle evaporation. This powder, when mixed with the requisite proportion of water, is brought back nearly to its original state.

Smoking Chimnies.

To prevent chimnies smoking, the following hints are recommended to be attended to in erecting them: The height of the mantel must not exceed one-third the height of the room; the jambs and breast to be carried perfectly upright, at least to the ceiling, then the turn to be as easy and gradual as possible; let the jambs from the hearth to the mantel describe a curve, and the lower part of the mantel to be a broad horizontal plane; the distance from the inside of the breast to the back on each side of the

throat, to be from ten to fourteen or sixteen inches, according to the size of the chimney. It has been ascertained, that reducing smoky chimnies as above, will seldom fail of having the desired effect.

Genuine Marking Ink.

Take a drachm of the nitrate of silver (lunar caustic), dissolve it in a glass mortar, in double its weight of pure water. *This forms the ink.*—Then dissolve a drachm of salt of tartar in an ounce of water, in another vessel: this is the liquid with which the linen must be previously wetted, then allowed to dry, and afterwards to be written on.—Or, to make *Coloured marking ink.* Take vermilion, as much as will lay on a half-crown piece, of the best salt of steel, about the size of a small nutmeg; grind or levigate them well together, with linseed oil. You make it thick or thin, at discretion.

Purchasing and Preserving Starch.

The economical laundress will remember, that the price of starch is regulated by the price of flour; and as it will keep for some years, if covered up in a warm dry place, she will lay in her stock of this article, according to her means, at the time when bread is cheap. It has been recommended, for the sake of economizing flour, that the starch used for stiffening muslins, and other fine stuffs, in the laundry, should be made of the flour of canary seed, which is considered as superior for that purpose; and also for the purpose of manufacture when in the loom. But perhaps a much better substitute may be found in the starch of fine flour, which forms the dressing paste, or *congee*, in the Indian looms, as well as the starch in getting up muslins in India. Much, also, of the softness of the Indian cotton, depends upon the palm oil, which, even when not specifically applied, constantly oozes out of the fingers of the spinner and the weaver.

Purchasing Soap, &c.

Another great saving will be found in purchasing soap in large quantities, cutting it in pieces of about a pound each, and keeping it in a place of moderate temperature and dryness. If the quantity necessary for one year is first laid in, it ought to be filled up every six months; and thus a smaller quantity of the article will suffice, as much less goes to waste; with a saving of, perhaps thirty per cent.

Directions for the Care of Family Linen.

When linen is well dried and laid by for use, nothing more is necessary than to secure it from damp and insects; the latter may be agreeably performed by a judicious mixture of aromatic shrubs and flowers, cut up and sewed up in silken bags, to be interspersed among the drawers and shelves. These ingredients may consist of lavender, thyme, roses, cedar-shavings, powdered sassafras, cassia, lignea, &c. into which a few drops of attar of roses, or other strong scented perfume, may be thrown.

In all cases, it will be found more consistent with economy, to examine and repair all washable articles, more especially linen, that may stand in need of it, previous to sending them to the laundry. It will also be prudent to have every article carefully numbered, and so arranged after washing, as to have their regular turn and term in domestic use.

To renew Scorched or Browned Linen.

This is an accident attributable entirely to the ignorance of the laundress, in not knowing how to regulate the heat of her irons. To remedy this: Add to a quart of vinegar, the juice of half a dozen large onions, about an ounce of soap rasped down, a quarter of a pound of fullers' earth, one ounce of lime, and one ounce of pearl ash, or any other strong alkali. Boil the whole until it is pretty thick, and lay some of it on the scorched part, suffering it to dry. It will be found that, on repeating this process for one or two washings, the scorch will be completely removed from the linen without any additional damage; provided its texture has not been absolutely injured, as well as discoloured.

THE FULHAM FISHERIES.

The fisheries were leased in the seventeenth century to Sir Abraham Dawes, Sir Nicholas Crispe, and others, for the annual rent of three salmons. Flounders are taken here all the year, and used to be caught in great abundance, but since the completion of the new docks, below London Bridge, they have almost disappeared, owing to the spawn being carried by the tide into the docks, where it is destroyed, from the water being impregnated by the copper-bottomed vessels.

The season for the blennetting for roach and dace begins on the first of July. They are caught here in great abundance, especially after a heavy rain. Their scales are sold to the Jews for the purpose of making false pearls, and are worth from twelve shillings to a guinea per quart.

Smelt fishing begins on the 25th of March above London bridge. Very few have appeared here during the last four years.

Salmon fishing begins on the 1st of January, and ends on the 4th of September. The salmon caught here are highly esteemed, and sell from five to twelve shillings per pound. Only one was caught here during the last season; they have abandoned the Thames since the opening of the docks, and now frequent the Medway, where they are considered merely as salt-water fish.

The dragging for shads begins on the 10th of May, and continues to the end of June. This fish is caught in abundance, and is sold very cheap.

Lamprey fishing begins on the 24th of August, and ends on the 30th of March. This fish used to be sold to the Dutch, previous to the commencement of the late war.

Barbel are taken in great abundance in the season, which begins on the 1st of July, and ends on the 1st of March.

Eels are caught hereabouts very large and fine. The principal method of taking them is by means of pots made of basket-work, laid at the bottom of the river. A great many are also taken by bobbing.

Sturgeons are sometimes caught here; they are considered as a royal fish, and are claimed by the Lord Mayor, who usually sends them to the King. The fishermen are entitled to a guinea for every fish.

In the Thames, near Fulham bridge, is a large shifting sand-bank, from which great quantities of sand are taken, and carried to London. The sand is in great repute among builders, for the purpose of mixing with lime. —FAULKENER'S *Account of Fulham.*

THE GOUT.

A Fragment from an Ancient MS.

BLESSED gout! most desirable gout! sovereign antidote of murdering maladies! powerful corrector of intemperance! deign to visit me with thy purging fire, and

throw off the tophous injury which I may have suffered by wine and wit, too hard for the virtue of a devotee upon a holy festival; but fail not thy humble supplicant, who needs thy friendly help to keep his tottering tenement in order; fail him not every vernal and nocturnal equinox.

1. The gout gives a man pain without danger.

2. The gout is no constant companion, but allows his patient lucid, joyous intervals.

3. The gout presents you with a perpetual almanack.

4. Gouty persons are most free from the head-ache.

5. The gout preserves its patient from the great danger of fevers.

6. To crown the honour of the gout, it is not to be cured! The gout defies all your gross Galenical methods, and all your exalted chemical preparations. For the conjunct causes thereof lie in parts so very remote, that the virtues of medicine can never reach them; and Heaven be praised for it: for why would you cure the gout, which gives pain without danger, a better taste of health by an acquaintance with pain, a knowledge of future things, free from the head-ache, and from fevers?

INDIAN REMEDIES.

THE common people in the East have several very simple remedies: For a megrim they take the powder of a dried pomegranate rind, pounded with four grains of pepper, as if it were snuff. For a common head-ache, they smell to a composition of sal ammoniac with lime and water, tied up in a rag. For a deafness proceeding from cold, they let fall one drop of lemon juice into the ear. For the tooth-ache, they apply to the tooth a sort of paste, made of the crumb of bread and the seed of stramonium, or the thorn-apple, which gives instant relief. For a colic proceeding from wind, they give the patient four spoonfuls of water in which aniseed has been boiled, till half the water is consumed. They also pound a raw onion with some ginger, which they apply cold to that part of the belly where they feel any pain. For a lienteria, or looseness, which discharges the food before it is altered, they roast a head of garlic in the embers, which they take going to bed, and hold it in the mouth. For stoppage of urine, a good spoonful of olive oil is taken, mixed with an equal quantity of warm water. For a common looseness, they toast a spoonful of white cum-

min-seed with a little pounded ginger, which they swallow with sugar. Agues are cured, viz. those that begin with shivering fits, by taking three large pills made of ginger, black cummin-seed, and long pepper. The cucumber leaf, dried and pounded, acts both as a cathartic and an emetic.

SMALL-POX AND VACCINATION.

THE salutary advantages of vaccination are clearly shewn in the following calculation, on the authority of nearly all the respectable medical men, not merely in the united kingdom, but in the whole civilized world. Natural small-pox, 10,000 cases give 1000 deaths, or one in ten; inoculated small pox, 10,000 cases give 20 deaths, or one in 5000; vaccination, 10,000 cases give ten failures, or one in 1000, and *no deaths*. Whence it appears, that where there are ten failures of vaccination, there are twenty *deaths* from small-pox inoculation, not to mention the incalculable numbers destroyed by spreading the contagion.

A HINT TO THE LADIES, ON A CERTAIN ARTICLE OF DRESS.

THE following edict was published some years ago throughout the German empire; which goes to prove that one at least of our fashions originated in Germany.

"Whereas the dangerous consequences arising from the use of stays, are universally acknowledged to impair the health, and impede the growth of the fair sex; when, on the contrary, the suppression of that part of their dress cannot but be effectual in strengthening their constitution, and, above all, in rendering them more fruitful in the marriage state: we hereby strictly enjoin, that in all orphan houses, nunneries, and other places set apart for the public education of young girls, no stays, of any kind whatever, shall be made use of or encouraged, from henceforth; and it is hereby further noticed to all masters and mistresses of academies and boarding-schools, that any girls wearing stays should not be received or countenanced in such schools. We hereby also will and command, that it be enjoined to the College of Physicians, that a dissertation, adapted to every one's capacity, be forthwith composed, shewing how materially the growth of children of the female sex, is injured by the use of stays; for the better information of parents and schoolmasters, who wish to

procure a handsome shape to their children or pupils, as also those who are not rich enough to alter the stays in proportion to the growth of such children, or having neglected the means to do it. The above dissertation shall be distributed gratis, and dispersed among the public; the more so, as whole nations, unacquainted with the use of stays, bring up a race of children remarkable for the healthiest constitutions."

The above edict was caused to be published by the Emperor Joseph II.

LEGACY DUTIES.

THE following rates of duty are payable on all legacies, annuities and residues of the amount or value of 20*l.* or upwards, (see stat. 55th Geo. III. cap. 148,) namely,

To the children of the deceased, and their descendants, or to the father or mother, or any lineal ancestor of the deceased, out of his (the deceased) personal property, 1*l.* per cent.

To brothers and sisters of the deceased, and their descendants, 1*l.* per cent.

To brothers and sisters of the grandfather or grandmother of the deceased, and their descendants, 6*l.* per cent.

To any person in any other degree of collateral consanguinity, or to any stranger in blood to the deceased, 10*l.* per cent.

The husband or wife of the deceased is not chargeable with duty.

TWO REMEDIES FOR LOVE.

LOVE, it has been said, is not merely a passion of the soul, but it is also a disease of the body, like the fever. It is frequently in the blood, and to be cured, it may be treated as methodically as any other disorder. Great perspirations, and copious bleedings, that carry away with humour the inflammable spirits, would effect a recovery.

The Great Condé having felt a violent passion for Mademoiselle de Vigean, was constrained to join the army. While his absence lasted, his passion was continually nourished by the tender recollections of love, and by the intercourse of a correspondence, till the conclusion of the campaign, when a dangerous sickness brought him to the most imminent danger. To the violence of his illness

remedies were applied, and every thing that was most efficacious in physic, was given to the Prince. He regained his health, but he lost his love; the strength of his disorder had abated that of his passion, and when he thought himself a lover, he found that he had ceased to love.

There is, however, another species of evacuation, not less efficacious for a despairing swain, which will probably amuse the reader.

A German gentleman felt an amorous flame for a German Princess. She was not insensible to a reciprocal passion; and to have him about her person, without giving scandal, she created him her general. They lived some time much pleased with each other; but the Princess became fickle, and the General grew jealous. He made very sharp remonstrances; the princess, who wished to be free, gave him his *congé*, and he was constrained to quit her. But his passion at every hour increased; he found he could not live out of her presence, and he ventured to enter privately into her closet. There he threw himself at her feet, and entreated her forgiveness. The Princess frowned, and condescended to give no other answer, than a command to withdraw from her royal highness' presence. The despairing lover exclaimed, and he was ready to obey her in every thing but that; that he was resolved, in this to disobey her; and that he preferred to die by her hand. In saying this, to give force to his eloquence, he presented his naked sword to the Princess; who, perhaps, being little acquainted with the flowers of rhetoric, most cruelly took him at his word, and ran him through the body! Fortunately his wound did not prove mortal: he got well at the end of three months, and likewise of his passion, which had flowed away with the effusion of his blood.

Horticulture.

JANUARY.

KITCHEN-GARDEN.—The principal business in the kitchen-garden, at this season, is to prepare the ground for future crops, by manuring, digging, and trenching; protecting tender plants in frames, hand-glasses, borders, &c. In frosty or other inclement weather, making hot-beds for early forcing, when required; and only a few articles are necessary to be sowed and planted, and these principally in but small portions, some in warm

compartments, in the full ground, if dry, mild, settled weather; and some in hot-beds, for early crops. Prepare vacant ground at all opportunities, for early and general crops, by augmentation of dung for manure where most needful; and by digging and trenching the ground in rough ridges, to improve by the weather, till wanted for sowing and planting, which can then be expeditiously levelled down, in an improved fertilized state, for the reception of the respective seeds, plants, and roots.

FRUIT-GARDEN AND ORCHARD.—Planting, pruning, and nailing, should now be forwarded at all proper opportunities, both in wall, espalier, and standard fruit-trees, in the garden, orchard, &c.

FLOWER-GARDEN, PLEASURE-GROUND, &c.—Tender or curious plants in pots, should now be protected from rigorous frost; such as double wall-flowers, double stocks, double sweet Williams, double rockets, &c. as also any curious tenderish evergreens, and other shrubs; placing them rather under garden frames, or any temporary shelter, or awning of mats, &c. Range likewise your pots of tender plants and shrubs in some dry compartment, to guard the roots more securely from the frost.

WORK IN THE NURSERY.—The principal works in the nursery, at this season, consist, some in preparing ground ready for spring planting, or transplanting various sorts of trees and shrubs, and for sowing seeds, and planting cuttings, layers, suckers, &c. giving occasional pruning to trees and shrubs, and digging between nursery rows thereof; and in affording temporary protection to tender, curious, or valuable sorts from severe frost, and in drawing or taking up trees, &c. of proper growth, as required for different plantations, and in some other necessary works.

GREEN-HOUSE.—At this season great attention must be paid to preserve the green-house plants from frost in severe weather, and when mild to admit air, and to give occasional waterings.—Keep the windows of the green-house close shut in frosty weather; and in very rigorous weather defend the windows with shutters or mats.—Moderate fires evening and morning, or occasionally all day, when the frost is extremely severe. Admit air in open, mild weather, at certain hours, by moderately opening the windows; and keep them shut always at night in wet and foggy weather, and when sharply cold; give occasional waterings; pick off decayed leaves, wood, or shoots.

HOT-HOUSE AND STOVE.—During this season a good internal heat must be constantly supported in the hot-house, and sometimes to admit a little air, and to give gentle waterings. If severe frost prevail, guard the hot-house plants by constant fires; and in very rigorous weather, and no sun, defend the glasses with shutters or mats.

In grape forcing-houses, may now be begun the forcing by heat and fire.

FEBRUARY.

THE KITCHEN-GARDEN.—If the weather be settled and open, considerable attention is now required, relative to the preparation of all vacant ground, by dunging, digging, and trenching, &c. and of hot dung and other materials for hot-beds, all in proper order, ready for sowing and planting the principal early and main crops, this and the two following months, for the general supply of the present year; some to attain early perfection in the same spring, and beginning of summer: but considerably the greater part of the main crops for the general service of summer and autumn; and many also for the following winter.

FRUIT-GARDEN AND ORCHARD.—All planting and pruning should now be forwarded as much as possible, to have the whole completed, or nearly finished, this month.

FLOWER-GARDEN AND PLEASURE-GROUND.—Forward now all the necessary preparation for planting, where intended, the various sorts of flower-roots, plants, shrubs, and trees; as also for sowing the different sorts of annual flowers, both in the open ground and in hot-beds; and likewise to dig and clean the different compartments of beds, borders, shrubberies, walks, &c. in the best order, now in the commencement of the spring season. Dig and prepare the compartments of beds, borders, shrubberies, &c. both for planting, where intended, the flowers and shrubs, saving many sorts of flower-seeds, both of annuals, biennials, and perennials; and that the whole may appear in the utmost regular order, &c.

WORK IN THE NURSERY.—As this month may properly be considered as the commencement of the spring season, various works of nursery, planting, transplanting, will be necessary, in many sorts of young trees and shrubs, in open settled weather, as well as in taking up and drawing

many sorts for garden and other plantations; also in the work of propagation, by sowing many kinds of tree and shrub-seeds, &c. planting suckers, cuttings, layers, and ingrafting; likewise in forwarding the digging or trenching of vacant ground, and digging between the nursery rows of young trees and shrubs: some occasional work of pruning, with several other requisite works of nursery culture, &c.

THE GREEN-HOUSE.—Supply the green-house plants with plenty of free air every mild day, gentle waterings, and defend them still from cold, by shutting all close every night, and in frosty and other inclement weather, loosening the earth, giving fresh earth, shifting into larger pots, stripping off decayed leaves, dead wood, &c.

THE HOT-HOUSE.—Continue always a regular heat in the hot-house, by a constant bark-bed, especially the pinery stove, and fires every night and cold days. A high state of heat is necessary for all the hot-house exotics, and in pineries, as the full-grown fruiting pines will now be advancing in young fruit, should have both a good bottom heat supported in the bark-bed, and regular moderate fire every night, and every cold morning, &c. to forward their fruiting freely in proper season; continuing the pine plants, in general, always plunged in the bark-bed, &c.

MARCH.

KITCHEN-GARDEN.—Particular attention during this month is required to prepare for, and to sow and plant, many principal crops for the service of the present year, both in the natural ground for the general supply, and in hot-beds for several plants; and to forward some others of more hardy growth, when desired in early perfection. General sowing and planting should now be forwarded; *e. g.* onions, leeks, carrots, parsnips, beet, radishes, spinach, lettuce, cabbages, savoys, brocoli, borecole, coleworts, asparagus, peas, beans, some early turnips, salsyfy, scornozerna, celery, cauliflowers, Alexanders, large-rooted parsley, cardoons, finochio. And of small herbs, as parsley, small salading of cresses, mustard, radish, rape, &c.; cherries, coriander, borage, marigolds, nasturtiums, corn-salad, elary, fennel-dill, angelia, thyme, savory, marjoram, and hyssop. Plant asparagus, artichokes, cabbages, cauliflowers, horse-radish, beans, potatoes, garlick, shallots, lettuces, coleworts, Jerusa-

lem artichokes, &c. with various small herbs. Liquorice also may be planted, if omitted last month, &c.

FRUIT-GARDEN AND ORCHARD.—All planting and pruning must now be finished. *Planting* may be performed in all sorts of fruit-trees, any time this month; but it is advisable to complete all that is intended as soon as possible, before the trees advance much in their spring buds, &c.

FLOWER-GARDEN.—Compartments designed for planting with any kind of flower-roots or plants, shrubs, trees, should now be forwarded, that all principal planting may be commenced this and the beginning of the next month. Numerous sorts of flowering plants may now be planted; and many sorts of annual, perennial, and biennial flowers, and many sorts of trees and shrubs, may be planted. Various perennials may also be propagated, &c.

THE NURSERY.—In this month a considerable increase of principal nursery business comes under observation, some consisting in forwarding whatever was omitted in the two former months; others in performing some particular now more successfully than at any other season; and to finish, if possible, all nursery digging, and the principal work of planting and transplanting in general, according as required; as also to forward the business of propagating, both by seeds, layers, cuttings, suckers, grafting, &c.; and to complete all principal work of pruning, and in performing several other works, mentioned under their proper heads, &c. &c.

GREEN-HOUSE.—Continue all the plants still in the green-house; and at this season allow them a large admission of free air daily in mild weather, with frequent waterings, &c. &c.

HOT-HOUSE PLANTS.—These still require the constant aid of a lively bark-bed heat, assisted by fires in the evenings, and in cold mornings; continuing the pines always in the bark-bed, supported in a good heat, &c. &c.

CHEAP RECIPE FOR WHITE-WASHING A COTTAGE.

THERE is something particularly comfortable-looking and healthy in a clean white-washed cottage; and, as poor people are often denied this comfort, from the expence attending it, I give the following recipe, to enable them to do it themselves. The expence is merely for the lime, and should be done with a proper brush. Put half a

peck of lime into a tub; pour in some water by degrees, and stir it well with a stick that is broad at one end. When the lime and water are well mixed, and the thickness of mud, strain it through a sieve into another vessel, when it will settle to the bottom; skim off the little water that remains at the top, and, when you are going to use it, mix it up with cold water to the thickness of thin paint. The house will be quite dry, and also may be scoured, in two hours.—*Cottager's Friendly Guide.*

SAVINGS BANK.

Table, shewing the Produce of Weekly Sums, at Compound Interest, at 4l. per Cent.

Amount.	One Shilling per Week.	Two Shillings per Week.	Three Shillings per Week.	Four Shillings per Week.	Five Shillings per Week.	Six Shillings per Week.	Seven Shillings per Week.
	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
1st year	2 12 0	5 4 0	7 16 0	10 8 0	13 0 0	15 12 0	18 4 0
2d year	5 6 0	10 12 2	15 8 3	21 4 3	26 10 5	31 16 6	37 2 6
3d year	8 2 3	16 4 8	24 7 0	32 9 4	40 11 8	48 14 0	56 16 5
4th year	11 0 10	22 1 7	33 2 5	44 3 2	55 4 0	66 4 10	77 5 7
5th year	14 1 7	28 3 3	42 4 10	56 6 6	70 8 1	84 9 9	98 11 3
6th year	17 5 0	34 9 10	51 14 9	68 19 9	86 4 8	103 9 6	120 14 6
7th year	20 10 8	41 1 5	61 12 1	82 2 10	102 13 6	123 4 2	143 14 11
8th year	23 19 1	47 18 3	71 17 4	95 16 6	119 15 7	143 14 8	167 13 10
9th year	27 10 2	55 0 4	82 10 6	110 0 8	137 10 11	165 1 1	192 11 3
10th year	31 4 3	62 8 7	93 12 10	124 17 3	156 1 6	187 5 10	218 10 1
11th year	35 1 3	70 2 6	105 3 9	140 5 0	175 6 3	210 7 6	245 8 10
12th year	39 1 3	78 2 8	117 4 0	156 5 4	195 6 8	234 8 0	273 9 5
13th year	43 4 7	86 9 2	129 13 10	172 18 5	216 3 0	259 7 7	302 12 2
14th year	47 11 7	95 3 3	142 14 10	190 6 6	237 18 1	285 9 8	333 1 4
15th year	52 1 3	104 2 6	156 3 9	208 5 0	260 6 2	312 7 6	364 8 8
16th year	56 15 0	113 9 10	170 4 8	226 19 7	283 14 6	340 9 5	397 4 3
17th year	61 12 3	123 4 7	184 16 11	246 9 2	308 1 6	369 13 10	431 6 1
18th year	66 13 6	133 7 1	200 0 7	266 14 2	333 7 8	400 1 3	466 14 10
19th year	71 18 10	143 17 9	215 16 8	287 15 6	359 14 5	431 13 4	503 12 2
20th year	77 8 6	154 16 10	232 5 3	309 13 9	387 2 2	464 10 8	541 19 1

DIRECTIONS FOR THE MANAGEMENT OF A COTTAGER'S GARDEN, OF TWENTY-FIVE RODS OF GROUND.

	Rods.
Early potatoes	2½
Late potatoes	5¼
Early cabbages	2½
Late cabbages	2½
Savoys	1¼
Greens	2½
Leeks and onions	2½
Carry forward	19

	Rods.
Brought forward	19
Peas	2½
Beans	1¼
Carrots	½
Early turnips	¾
Late turnips	1
Total	25

POTATOES.—No vegetable answers better to the cottager than good potatoes: one great reason why people

have bad potatoes, is, because they take their sets from the small potatoes, thinking they will do as well to set; but to have a fine crop of potatoes, you should always take the eye from the middle of the best and finest potatoes. The eyes at the top of the potatoe are the next best; the remainder of the potatoe will do to dress as well as any other. If your potatoes sprout when laid up for the winter, which they should not do, the shoots, if strong, will make good plants.

With respect to laying up potatoes, the following method has been found to answer well: As early in October as they are ripe, dig them up as dry as possible, and lay them in a heap, ridged up and covered with straw; cover the straw with earth, thatch it with stubble or straw, and then again cover it with earth. In March or April, or soon after the first warm spring weather, take them out, and, if properly done, they will not have sprouted or cankered.

The following are good sorts of potatoes:—for *first early*, Fox's seedling, and Early Manly; for *second early*, Nonsuch and Early Champion, particularly the last. Perhaps the best sort of all is a new one, called the Bread-fruit potatoe, with which Heligoland beans may be profitably cultivated, by sowing them in the channels with the potatoes: they ripen at the same time, without injuring the crop of potatoes. This intermediate cropping will often be found profitable, and it admits of the spaces between being dug and manured, if necessary; thus, if Windsor peas and beans are sown at five feet distance in the rows, potatoes may be planted between them, which will fill the ground when the peas and beans are over. If early York and Battersea cabbage is planted thus, two rows at eighteen inches distance, and a space of three feet left between those and the next two, any spring crops, as leeks, kidney beans, lettuces, or peas, may be put between them. While potatoe plants are small, any quick growing crop may be planted in the spaces they will occupy when full grown. Early potatoes should be planted in the second or third week of March; some late potatoes should be planted the same time as the early ones, and the rest in April.

Sowing.—It injures the crop, and makes a garden look very untidy, when the seed is sown unevenly: the best way to avoid this, is to make the bed very even; then sow the seed as regularly as possible, and, instead of

raking, sow some more earth over them, and always get the best seeds.

GREENS.—The best winter greens for a cottager are the Savoy, Brussels sprout, green borecole or Scotch kale, and the buda kale, called also the Manchester, Russian, and Prussian kale; these four sorts will keep a constant succession from November till May; the three first should be sown towards the end of March, and the stronger plants be planted out in June, the rest in July. The buda kale should be sown in the middle of May, and planted out in July; the Scotch kale is easily cultivated, will stand severe frosts, and is the best sort for those who have only room for one kind of winter greens. Greens, to plant out in the spring, should be sown in August. In spring, in order to make the most of your ground, as fast as you cut greens, plant more, or other spring crops.

CABBAGES.—The best sorts are, early and late Yorks, early Russian for spring use, and early and late sugar-loaf. Early cabbages should be planted in February, first or second week of May, and the two last weeks of August. Early sugar-loaf cabbages, for summer and autumn use, should be sown in the third or fourth week of March; late cabbages should be planted in February, and in August to plant out in the spring.

TURNIPS.—The best sorts are early Dutch and stone; they should be sown the end of March or the beginning of April: a little radish seed sown with them, will keep the fly away.

CARROTS.—The best sorts are, Altringham and orange. Carrots should be sown in March.

BROCOLI.—The latest green or Danish, if sown the end of April, will head in May, and survive the severest winter.

PEAS.—The Charlton, blue Prussian, and dwarf marrow. Sow peas and beans in the third or fourth week of February; and in April, a few days before you sow them, stir in amongst them a little train oil, and vermin will not attack them.

BEANS.—Early and large long pods, Sandwich toker, and broad Spanish. Scarlet runners should be sown in May: pick off the tops of beans as soon as the lowest blossoms are in full flower.

ONIONS AND LEEKS.—In the beginning of March, sow Strasburg, Deptford, and white Spanish. — *Cottager's Friendly Guide.*

GENERAL RULES REGARDING SLEEP.

1. In Infancy and Youth;—2. In Manhood;—3. In Sickness;—4. In Old Age;—and, 5. Miscellaneous Particulars.

1. *Infancy and Youth.*—The celebrated Locke, in his Treatise on Education, sect. 21, has explained, at some length, his sentiments as to sleep, more especially the rules that should be observed regarding the sleep of children. He justly recommends their being permitted to sleep to their full satisfaction, as nothing contributes more to their health and growth. Children should, for some time, sleep on their backs; but as soon as they get teeth, and begin to live on more substantial diet, their bones and ligaments become stronger, they should be laid to sleep, sometimes on the one side, and sometimes on the other, that both may grow alike, and become equally strong.

The cradle in which a child is put, ought to be turned directly to that side of the room from which the light comes, otherwise he will be in danger of learning to squint. Sleep is so great a refreshment to children, that we see new-born infants, when they are well, are almost always asleep; but if their sleep is frequently interrupted, they soon become lean and emaciated, and lose their strength.

2. *Manhood.*—All the observations in the former part of this subject, are principally calculated for manhood, or middle age; it is therefore unnecessary to recapitulate any of them in this place.

3. *Sickness.*—Sleep is of infinite advantage to the sick; for it greatly repairs their strength, helps to concoct and expel the morbific matter, and eases their pains.

Invalids, whether from weakness or fatigue, often express an inclination to sleep for an hour during the day; and this indulgence may be granted them, if it is found that their sleep during the night is not thereby interrupted. Many real or imaginary invalids lie long in bed in the morning, to make up for any deficiency of sleep in the night-time; but this ought not to be permitted, for the body must necessarily be enervated by long continuance in a hot and foul air. A little resolution will enable invalids to surmount this destructive habit. By rising early, and going to bed in due time, their sleep

will become sound and refreshing, which, otherwise, they cannot expect. Want of sleep is a most distressing, weakening, and dangerous symptom, in a multiplicity of diseases. The causes of morbid irritation, which produce and support this dreadful evil, are many and complicated; and it is of the utmost consequence that the true cause should be ascertained. In no instance do ignorant practitioners err so much, or so frequently, as in cases of this kind.

4. *Old Age.*—Sleep was intended to recruit nature, and to restore the wasted spirits. This is necessary to all persons, *but is most essential to the aged,* because they can least bear any waste or exhaustion, and they may indulge more in it than younger people, or those who are in the prime of life. In this respect, indeed, they may be considered as children a second time. Instead of eight hours, therefore, nine, and even ten, may be allowed them, provided they sleep the whole time, and are not corpulent.

If, owing to any agitation of mind, a person advanced in years finds himself unable to sleep as well as usual, he ought, notwithstanding, to rise at his accustomed hour; and next evening let him take the warm bath, and a glass of wine extraordinary, and he will enjoy a sweet slumber, and will not suffer from his former watchfulness. This is a much better plan than lying in bed in the morning, to make up for the last night's want of sleep, which may lead to a very pernicious habit, which it may be difficult to conquer.

By getting into a regular habit, in regard to hours (which old people have no excuse for breaking through), life may be as much enjoyed in old age, as even in youth, and perhaps even more so; *but then it is necessary to attend to a number of minute circumstances,* which may be overlooked in the heyday of youth, but cannot be neglected in old age with impunity. Persons advanced in years may sleep a little after dinner, that their heat, which is weak and feeble, being concentrated within, may enable them to perform their digestion better; but their afternoon's sleep ought not to be continued too long, for fear it should prevent their sleeping in the night, which is of much more advantage to them.

5. *Miscellaneous Rules for Sleeping.*—A Chinese philosopher, who had paid particular attention to the art of preserving health and long life, drew up a regular system

for that purpose. Among the rules he has laid down, one of the most important is, not to sleep till two hours after any meal. Indeed, he contends, that walking a little after meals, facilitates digestion. He also recommends the following maxims: not to sleep, if you can avoid it, in the open air, or when the ground is moistened by dew, or upon cold stones, or in a damp place, or upon beds or chairs that are varnished, or on chairs or stones heated by the sun, as such indiscretions occasion colds, palsies, or other disorders.

In regard to sleeping in the open air, we see many common people, particularly in the country, take a very long nap upon the grass, in the day-time, without any inconveniency. But those who are not accustomed to that practice, are liable to catch cold, if they happen to fall asleep even on a garden bench; for the system becomes warm during sleep, and if a current of cold air affects any part of the body, a torpor of that part is necessarily produced. But it will be still more unwholesome to sleep in the open air *during the night*, and few can do it without injury to their health, unless they had been accustomed to it. In these climates, the night is, in general, too cold; and in hot countries, as on the coast of Guinea, the dews that fall are so extremely noxious, that it is accounted certain death to sleep all night in the open air.

Sleeping in a carriage is not much to be recommended; and many have suffered severely, by sleeping in that state with the glasses down.

The following miscellaneous rules may, in various circumstances, merit attention: 1. It is an indispensible rule, that fat people should avoid soft beds, and should sleep little, and rise early, as the only chance they have of keeping their bulk within due bounds.—2. It is a good rule to lock the door of your bed-room, and to secure the windows, previous to going to rest, so as to prevent your being suddenly and hastily roused by any person coming into the room; and you should also examine the room carefully, that no cat or dog, or any other animal, may disturb your sleep, the alarm of which may be highly injurious.—3. It often happens, that if a young person has not slept very well, he feels a weariness in the morning, which is best removed by exercise; for that weariness must have been occasioned by an obstruction of indigested perspirable matter, which, by exercise, may

be rendered fit to pass the pores.—4. Many people are subject to colds and coughs, if they sleep in a less warm head-dress, or thinner night-cap, than they have been accustomed to. Any risk of that sort ought to be carefully guarded against.—5. Such persons as are subject to cold feet, ought to have their legs better covered than the body, when they are in bed.—6. As the body is excited by light, hence darkness is necessary for repose; and fires in the room, or lamps or candles, by which the air is vitiated, or admitting the morning light, ought to be avoided.—7. We should never suffer ourselves to dose, or fall asleep, before we go to bed, as it must greatly diminish any chance of getting repose, when we wish for sleep.—8. Some sleep with their eye-lids open, like hares, who are led to do it in consequence of their timidity; but this practice is not to be approved in men, because dust may get into the eyes, and the light in the morning may become so powerful as to interrupt sleep.—9. There is not a more pernicious custom, than that of reading in bed, even in the day-time; such a practice strains the eyes, but by candle-light it is still more injurious; to which is to be added, the danger of having the bed set on fire, and not only suffering a cruel death one's self, but being perhaps the source of infinite mischief.—10. At public schools, where great numbers of children sleep together, the utmost attention ought to be paid to the nature of their beds, the bedding, the airiness of the apartment, and every thing that can prevent the bad effects of crowding numbers together, and compelling them to breathe a confined and vitiated atmosphere.—11. Those whose sleep is apt to be interrupted by slight causes, should nevertheless keep themselves quiet, and warm in bed, with their eyes shut, and without tossing or tumbling, and this will, in some degree, answer the purpose of more sound repose.

Sleep, in fact, is so natural to man, that in almost every instance, it must be the fault of the individual, if he does not enjoy it to that extent, which is so essential for his comfort and happiness.

PRESCRIPTIONS.

In Rheumatism and Dropsy.

Take Guiacum, - -
Tartarized antimony, - } of each, 1 grain.
Purified opium, - -
Syrup, enough to make a bolus.
To be taken twice a day. SMITH.

In Rheumatism.

Take Guiacum, - - - - 10 grains.
Compound powder of ipecacuanha, - 5 grains.
Confection of hips.
Make a bolus. ED. PHARMACOPŒIA.

In Acute Rheumatism.*

Take Camphor mixture, - - - 1½ ounce.
Acetated liquor of ammonia, - - ½ ounce.
Antimony wine, - - - 40 drops.
Tincture of opium, - - - 20 drops.
Make a draught, to be taken at bed time. BLANE.

*** If this draught be repeated oftener than once in twenty-four hours, one half of the quantity of the tincture of opium only ought to be given.

In Rheumatism and Gout.

Take Guiacum, - - - } of each, ½ ounce.
Refined sugar, - - }
Gum arabic, in powder, - - 2 drachms.
Pound them well together, and add
Mint water, - - - - 9 ounces.
Make a mixture; two table spoonfuls, with a copious draught of gruel or barley-water, to be taken night and morning. POWELL.

Anti-Bilious Pills.

Take Compound extract of colocynth, - - 2 scruples.
Extract of jalap, - - }
Calomel, - - - } of each, 1 scruple.
Extract of scammony, - }
Make a mass, with ten drops of the oil of cloves, and divide into twenty pills; dose, one or two occasionally. WILLIS.

Draught for Hysterical Women.

Take Compound spirit of lavender, - - 30 drops.
Huxham's tincture of bark, - - ½ drachm.
Cinnamon water, - - - ½ ounce.
Sweetened with a sufficient quantity of the syrup of saffron.
FOTHERGILL.

---

* Rheumatism is distinguished into chronic and acute, being known by the former appellation, when there is no great degree either of inflammation or fever present, but merely pain; by the latter, when both fever and inflammation exist in a high degree.

ON THE PROPRIETY OF MAKING A WILL.

Of all the duties incumbent on men to perform, as members of society, we can scarcely name one in which they err more egregiously, than in the disposal of their property by will. From the great number of absurd wills, that are every day produced at the Bank, and other public offices, for the transfer of testamentary property, one would be tempted to imagine, that beside the sentence "to die," there was a time appointed for all men to play the fool, and contradict every opinion of their wisdom or common sense, which had been formed during their lives. In most nations men enjoy, as a sacred right, the privilege of disposing of their property by will; and it is very singular that men of acknowledged, or supposed good understanding, should do so much to bring into disrepute a privilege, which the common consent of the public has fully recognized. Yet this they do in various ways.

Different Species of Wills.

Of wills properly made, it is not necessary here to speak: of those which come under another description, there are several kinds. There are cruel wills, and whimsical ones. In the first, a total disregard is paid to the obligations of kindred, affection, and merit: a family that have lived in splendour, and who consider themselves as in part heirs to the continuation of it, are left very often destitute of the necessaries of life, and very ill provided with any means, or resources, to enable them to support such a reverse of fortune, or to re-enter the world in a different character from that in which they appeared before. In whimsical wills, we find that property, which might have been usefully extended among the circles of industry and indigence, left entirely to some worthless, and perhaps, to some inanimate objects: a dog, or a cat have often inherited what would have assisted a distressed family, and sums have been left to erect monuments, which perpetuated the vanity of those on whom they could confer no fame.

Consequence of Unjust, or Whimsical Wills.

But when we consider the nature of wills, in which cruel, unjust, and whimsical or absurd divisions of property are made, a question very naturally arises; how can

all this be reconciled with the vanity of mankind, and with their desire to obtain and perpetuate a good report among their fellow creatures? Is it not strange, that a man who had for a long life so demeaned himself as to obtain (what surely it is the wish of most men to obtain) the character of a just, kind, and wise member of society; we say, is it not strange, that such a man should at once, with a few strokes of his pen, destroy all this reputation, and cancel every obligation which his friends or his fellow citizens owed to him? That a miser should leave his possessions to build an hospital, or a wicked man to found a religious seminary, are things not to be wondered at. The former may have thought that he can do more good by one great act of munificence, than by the usual mode of periodical or casual charity; and the latter may imagine, that if the last of his actions demonstrate a regard for the interests of piety, his former failings may be buried with him. But when we find a man, who has enjoyed an excellent reputation for justice, affection, generosity, and wisdom, make such a will, as is not consistent with any of these qualities, nor even with common sense, we must acknowledge ourselves to be at a loss how to reconcile his latter with his former conduct, upon any known principles which usually guide mankind.

In such cases, indeed, it may be said, and perhaps it is all that can be said, that these men have delayed the writing of their wills to a period, when the anguish of a sick bed impaired their memories and their intellects. It is not certainly easy to suppose that any man, in the full possession of reason, would stab his reputation any more than his person. But the fact, in whatever manner it may be accounted for, is not to be denied; nor will it, indeed, be disputed by any person whose profession puts it in his way to see many wills, and who will often see much that he may wonder at, without being able to resolve.

Knowledge of making a Will.

The privilege of making a will, however grossly abused, is perhaps the very last of which we would consent to be deprived. Custom is second nature; it would not be possible to persuade a man that he has not a natural right to bequeath his property, because it is a right which he knows his ancestors have enjoyed time immemorial. Blackstone informs us, that when property came to be

vested in individuals by the right of occupancy, it became necessary for the peace of society, that this occupancy should be continued, not only in the present possessor, but in those persons to whom he should think proper to transfer it; and this first introduced the practice of alienations and gifts; but if we were restricted to those, the privilege would still be imperfect; for upon the death of the occupier, all his goods would again become common, and create an infinite variety of strife and contention. The law of very many societies has therefore given to the proprietor, a right of continuing his property after his death, in such persons as he shall name, and in defect of such appointment or nomination, or where no nomination is permitted, the law of every society has directed the goods to be vested in certain particular individuals, exclusive of all other persons. In England, as the same author observes, this power of bequeathing is coeval with the first rudiments of the law; for we have no traces or memorials of any time when it did not exist.

Such is the law upon this subject, and we know that scarcely any crime is more severely punished in the civil courts, than any departure from the will of a testator. Guarded therefore, as this privilege is, by express laws, and considered as sacred by public opinion, it is lamentable that it should be so often exercised to prove the wickedness or imbecility of our natures; that it should be attended to only when attention cannot be commanded, and that it should be neglected even by those, who, from a thousand motives, might be supposed interested in its being well and duly executed. These evils appear to us to arise from two causes, though perhaps it is not necessary to consider them distinctly—we mean, either putting off the making a will to a distant and inconvenient period, or neglecting it altogether: the latter perhaps sometimes is intentional, as in the case of a person, who thinks that he ought not to violate an imprudent promise in behalf of some one, which would injure his heirs-at-law—but more often this proceeds from the first cause, a perpetual delay and backwardness to perform the most simple and easy act of human obligation.

The Folly of delaying to make a Will.

It is not easy to account for this backwardness in men of sense; for all the reasons assigned to excuse it, are not very consistent with common sense. A man who is

entitled, in any moderate degree, to the epithet of *wise*, will not surely think, that when he signs his will he signs his death-warrant, or that the undertaker must of necessity follow the lawyer. In fact, it would be foolish to delay the making of a will, even if this were the case; but surely that man's mind must have little fortitude, and less religion, who cannot at stated times think on death with composure, as that which is appointed for all men, and which he can neither retard nor accelerate.

But every thing must be subordinate to duty. If the thought of death be a pain, it must be submitted to, because that which suggested it is an obligation binding on all men who are possessed of property, and much more on those who have families, and who are engaged in the connexions of business. Could any man of sense, who died without a will, return to see his family almost beggared, his children scattered on the wide world, his business embarrassed so as to be worth nothing, how much would he be shocked to think that all this confusion arose from his neglecting so simple an operation as a will! Would not such a man blush to find his memory despised, and perhaps execrated, for neglecting to do what, if he considered as a trifle, ought the more readily to have been done, but what, considered as the means of avoiding much distress and confusion, it was criminal to leave undone?

Preventive Cause to Will-making.

One cause there is, which, we firmly believe, has prevented some men from making a will. It is not very honourable to human nature that such a cause should exist, but they who have opportunities of knowing that it does exist, will not object to a truth, though an unwelcome one. We attribute the reluctance which worldly and avaricious men entertain against a will, to that extreme aversion they have to the very idea of parting with their property. As their enjoyment of wealth is not in spending, but in hoarding, and is, consequently, a passion which brick-dust might gratify, if it were as scarce as gold-dust, it must be supposed that the imaginary parting with their wealth, will afflict them in proportion to the ecstasies that arise from their imaginary enjoyment. The miser who shows us his gold, has not much more enjoyment of it than we have; the bright metal affects our eyes just as much as his: the employment of the wealth belongs to neither of us. We cannot touch it

without suffering punishment; and he cannot without suffering pain. We repeat it, that we are persuaded such a man will feel so much from the idea of parting with his wealth, that he cannot sit down to give it away with his own hand. We know not even whether a miser be not such a monster, as to calculate the possibility of taking it with him, but we know that he is often fool enough to lament that he must leave it behind him.

If not to be deferred, when ought a Will to be made?

If the making of a will is not to be deferred to a late period, at what time is it to be performed? This question is not necessary to be answered, after what we have already presumed to advance on the subject. If any man knows exactly when he is to die, he may defer it to that period; but as "of that day and hour knoweth no man," we must be content to prepare for whatever may happen. Sickness has its pangs, its alienations of mind; and old age has its cares and its forgetfulness. These are not the times when a man of sense would hazard blunders and errors in a matter that concerns his dearest relatives and his reputation. We will not enquire how far death-bed repentance is accepted; but we hope it is less matter of dispute than death-bed testaments. If, indeed, making of a will be deferred until that period, it had better be done then, but it will rarely be done satisfactorily; it will rarely include or exclude what it ought; very little indeed ought to be left to that awful crisis. Our intellects are not perfect in "the time of tribulation." We cannot think of the world at the "hour of death."

Consequences of neglecting to make a Will.

The confusion and unhappiness which arise to survivors from the neglect of a will, or from the making of one, when the testator cannot possibly recollect his obligations or his engagements, need not demand many words. We observe something of the kind every day. One thing, however, it is worth while to dwell upon more particularly. It has often been a custom with persons of wealth and substance, to adopt and consider as their own child, some poor orphan or friendless young person, whom they educate in a manner suitable to their own fortune. These adopted children naturally adopt the ideas of the situation in which they are brought up; they look upon themselves as the heirs of those who have adopted them, and are considered in the same light by the world. At length,

the patron or patroness dies, *without a will!* and the heirs-at-law take possession of all. The orphan, if not immediately turned out of doors, finds his or her situation too irksome to remain longer in a place, where they are degraded to the rank, perhaps of a menial servant; and with the education, accomplishments, and ideas, of genteel life, they sink into the helpless lot of those "who cannot work, and to beg they are ashamed."

This is one bad effect of intestate property, and in our opinion, that, which of all others, blackens the memory of the deceased. We know no *crime* greater than that of him, who promotes an orphan to a rank of independence, takes him from where he might have been trained up to industry and usefulness, and yet does not, from the first, provide that no accident shall deprive him of the rank to which he has been raised. It is in fact, though perhaps without the evil intention, strewing the path to a precipice with roses. Such dependents, educated in high life, only to be consigned to poverty which they cannot avert, and shame which they cannot encounter, have reason, it is to be feared, to curse that mistaken benevolence which drew them from the happy mansions of industry and frugality, where they might have been useful and virtuous in their situations, and have had no hopes or fears to encounter from the smiles or frowns of the world.

It may be said, "This is too severe; those benefactors meant to have left to their adopted children as they would to their own, had they not been suddenly cut off before a will could be made."—But if we consider what a serious thing is the temporal, and perhaps eternal happiness of a child, educated and deserted as we have stated, we fear that our indignation will not be abated by this excuse. In the first place, it is great folly to take a child from a life of useful industry; and in the second place, it is great wickedness to educate any children with ideas of high life, even if we could realize them, and with hopes of great wealth, even if we could gratify them. He is the best benefactor to orphans, who places them in situations where they can provide for themselves; and who teaches them the value of wealth, not by the profusion, but by the acquirement of it. But to educate children in splendid idleness and useless accomplishments, can never be atoned for, unless an immediate provision be made for them, and nothing be left to accident. We conclude this part of our subject with repeat-

ing, that the man who, in such circumstances, neglects to secure his promised provision for his adopted child, is guilty of a crime connected with every thing unthinking, ungenerous, and absurd.

We have, perhaps, extended this discussion too far; but we were unwilling to divide the subject; and we have written so much, because we do not recollect to have seen the subject professedly treated. After what we have advanced, very little is necessary to demonstrate that it is of great importance.

Wills ought to be written clearly and distinctly.

We have said nothing yet of the embarrassments arising from wills being written in a confused manner. Whoever is in the least acquainted with law proceedings, must know that errors, and confused arrangements in wills, furnish a rich harvest to the gentlemen of the long robe. Much of this, unquestionably, proceeds from the cause we have already insisted upon, namely, the delaying the duty until we are sick, and must call in the assistance of those who may deceive us, until we are old and cannot recollect our various obligations, and until we are fretful, and cancel the good sense and discretion of a whole life, by the spleen of a moment. These are considerations which, we trust, will have their weight.

We might add something, perhaps, in proof of the necessity of an early will, from the secrecy with which certain persons choose to conduct their affairs. A circumstance occurred very lately, which places this argument in a striking point of view. We allude to the act of parliament, which compelled the Bank to render up to the public the unclaimed money in their hands.

One other argument only may be advanced. Although in the case of a person dying intestate, the law provides him with heirs, it is very seldom that the distribution of property in this way is consistent with justice, far less with the intentions of the deceased, had he been wise enough to provide a will. The law lays down a certain positive succession, which must apply to all cases alike, and cannot be guided by any individual circumstances.

As to those persons who may be termed legacy-hunters, and who employ the best of their days in obsequious idleness, expecting that the will of their patron or friend must at last be in their favour, we purpose to consider their hopes and disappointments in another article.

Secrets of Trade.—No. II.

DALBY'S CARMINATIVE.

This consists of	Carbonate of magnesia, - -	2 scruples.
	Oil of peppermint, - -	1 drop.
	—— nutmeg, - -	3 drops.
	—— aniseed, - -	3 drops.
	Tincture of castor, - -	30 drops.
	——— assafœtida, -	15 drops.
	——— opium, - - -	5 drops.
	Spirit of penny royal, -	15 drops.
	Compound tincture of cardamoms,	30 drops.
	Peppermint water, - - -	2 ounces.

*** There are cheaper compositions sold under the same name. In examining the pretensions of this combination, it must be allowed that it is constructed upon philosophical principles; this, however, is no reason why the physician should recommend it; the mischievous tendency of a quack medicine does not depend upon its composition, but upon its application. We ought to remember, says an eminent physician, that in recommending this nostrum, we foster the dangerous prejudices of mothers and nurses, who are unable to ascertain the circumstances under which it should be given, or even the proper doses in which it should be administered. If its composition is judicious, why do not physicians order the same in a regular prescription, rather than in a form in which the most valuable remedy will be abused?

DAVIDSON'S REMEDY FOR CANCER.

Arsenious acid, and powdered hemlock *(dangerous)*.

DE LA MOTTE'S GOLDEN DROPS.

An ethereal solution of iron. Much used in gout, hypocondriasis, and nervous diseases. They have the remarkable property of losing their yellow colour in the sun, and recovering it in the shade.

DINNER PILLS. *(See Lady Crespigny's)*.

DIXON'S ANTIBILIOUS PILLS.

Aloes, scammony, rhubarb, and tartarized antimony.

DUTCH, OR HÆRLEM DROPS.

The basis of the nostrum consists of the residue of the re-distillation of the oil of turpentine, which is a thick, red resinous matter, to which the name of Balsam of Turpentine has been given; a preparation, however, is frequently vended as "Dutch Drops," which is a mixture of oil of turpentine, tincture of guiacum, spirit of nitric æther, with small portions of the oil of amber and cloves.

EATON'S STYPTIC.

After the styptic of Helvetius had been discarded from the Continent, it was brought into this country, and for a long time continued to be employed with confidence, under the new title of Eaton's Styptic. It is now made in several different modes, and consists chiefly of an alcoholic solution of *sulphate of iron,* with some unimportant additions.

EAU MEDICINALE D'HUSSON.

After repeated attempts to find out the active ingredient of this Parisian remedy, it is at length determined to be the *colchicum autumnale (meadow saffron),* which several ancient authors, under the name of *hermodactyllus,* have recommended in the cure of gout. The following is the recipe for preparing this medicine: Take two ounces of root of the *colchicum,* cut into slices, macerate in four ounces of Spanish white wine, and filter.

ECONOMICAL BREAKFAST POWDER (HUNT'S).

Various articles have been proposed at different times as substitutes for coffee. In the "*Fourth Century of Observations,*" in the "*Miscellanea Curiosa,*" we find a critical dissertation on the *(cahve)* coffee of the Arabians, and on the European coffee, or such as may be prepared from grain. Dillenius gives the result of his own preparations, made with pease, beans, and kidney beans, but says, that that made from rye comes the nearest to true coffee, and was with much difficulty distinguished from it. This is a curious fact, inasmuch as a spurious coffee, known by the name of "Hunt's Œconomical Breakfast Powder," has lately come into use, which is nothing more than roasted rye, and which the proprietor continues to prepare in a manner far superior to any of his imitative rivals.

EDINBURGH OINTMENT.

The principal ingredients of this ointment, are the white hellebore and muriate of ammonia.

ELIXIR OF LONGEVITY *(of Dr. Jernizt, of Sweden).*

This consists of an aromatic tincture, with aloes. *(See* p. 13).

ELIXIR OF VITRIOL.

The preparation sold under this name, is the *aromatic sulphuric acid* of the Edinburgh Pharmacopœia, and is imperfectly æthereal in its nature. It is a grateful medicine. A spurious article is often sold for it, which is nothing but the diluted acid, coloured by the addition of a tincture.

*** The word elixir is of Arabian origin, viz. elechscher, or elekscir; which means an essence, or pure mass, without any dregs.

ESSENCE OF VITRIOL. *(See Elixir of Vitriol).*

ESSENCE OF BITTER ALMONDS.

The preparation sold under this name, for the purposes of perfumery, &c. consists of one part of the essential volatile oil of bitter almonds, and seven parts of rectified spirit.

ESSENCE OF COFFEE.

The cassia pulp is said to form the basis of this article.

ESSENCE OF COLTSFOOT.

This preparation consists of equal parts of the balsam of Tolu, and the compound tincture of benzoin, to which is added, double the quantity of rectified spirit of wine; and this, egad! is a pectoral for coughs. If a patient with affection of the lungs, should recover during the use of such a remedy, it ought certainly to be designated as a lucky escape, rather than as a skilful cure.

ESSENCE OF MUSTARD (WHITEHEAD'S).

This consists of oil of turpentine, camphor, and a portion of spirits of rosemary, to which is added a small quantity of the flour of mustard seed.

Whitehead's Essence of Mustard Pills.—Balsam of Tolu, with resin.

Ready-made Mustard.—This is made up with currant-wine and sugar: formerly must, or grape-juice, was employed for this purpose; whence the name *must*ard.

ESSENCE OF PEPPERMINT.

A spirituous solution of the essential oil, coloured green by spinach leaves.

ESSENCE OF SENNA, PREPARED, (SELWAY'S).

This is a concentrated infusion of senna, in combination with an alkali. It is well adapted for domestic use.

*** Dr. Cullen used to say, that senna was one of the best purgatives, if it could be divested of its griping quality; this, however, he was unable to obviate, as he was not aware of its cause, and therefore conjoined it with aromatics, instead of those salts which might be capable of increasing the solubility of its oxidized extractive, or the purgative activity of the infusion. Soluble tartar and alkaline salts are its most useful adjuncts; it

is rarely, however, prescribed in practice, without the addition of other cathartics.

ESSENCE OF SPRUCE.

A fluid extract, prepared by decoction from the twigs of the pinus larix *(the larch)*, is the well known *essence of spruce*, which, when well fermented with molasses, forms the popular beverage called "*spruce beer*," *(cerevisia pini laricis)*.

ESSENTIAL SALT OF BARK. *(See* p. 69).

ESSENTIAL SALT OF LEMONS.

The preparation sold under this name, for the purpose of removing iron-moulds from linen, consists of cream of tartar, and superoxalate of potass, or salt of sorrel, in equal proportions.

F

FORD'S LAUDANUM.

This is similar to the *vinum opii* (wine of opium), with the substitution only of a dilute spirit for the wine.

FORD'S BALSAM OF HOREHOUND.

This nostrum may very properly be classed under the present head. It consists of an aqueous infusion of horehound and liquorice-root, with double the proportion of proof spirit or brandy; to which is then added, opium, camphor, benzoin, squills, oil of aniseed, and honey.

FOTHERGILL'S PILLS.

Aloes, scammony, colocynth, and oxide of antimony.

FREEMAN'S BATHING SPIRITS.

Compound soap liniment (opodeldoc), coloured with Daffy's elixir. Jackson's spirits differ from the former, in the addition of some essential oils.

FRIAR'S BALSAM—WADE'S DROPS—JESUITS' DROPS.

These preparations are nothing more than the compound tincture of Benjamin of the shops.

FUMIGATING PASTILLES.

Benzoin generally constitutes the chief ingredient in these compositions; to which may be added any variety of odoriferous substances. The following form may be offered as a specimen:

Take Benzoin,	1	drachm.
Cascarilla,	½	drachm.
Myrrh,	1	scruple.
Oil of nut and cloves, of each	10	drops.
Nitrate of potass,	½	drachm.
Charcoal,	6	drachms.
Mucilage of gum tragacanth, enough.		

RULES FOR THE PRESERVATION AND TREATMENT OF THE EYES.

In whatever calling or employment we may be engaged, we should attend, as much as possible, to the following circumstances, viz. that the eyes receive an uniform and sufficient light, so as to affect the *retina* (the seat of vision) on all sides alike. The eyes materially suffer, when the rays of the sun are strongly reflected from the opposite wall or window. In children, many disorders of the eye, which never would have terminated fatally, have ended in total blindness, when parents have neglected to provide the cradle or window with proper curtains. For this reason, the greatest caution is necessary in the choice of an apartment appropriated to the labours of the day. Nor should people place themselves directly opposite to the light, in reading and writing; they should take the light rather in a lateral direction.

A great obstacle to this arrangement, is the change of light, in the same apartment, by the progress of the sun. Where the sun dazzled in the morning, we find in the middle of the day the most uniform light, which again in the afternoon, particularly in town, becomes reverberatory, and extremely hurtful. This inconvenience should be remedied, if possible, by a frequent change of the room; or, at least, we might produce more uniformity in the light, by means of window-curtains or blinds: and it may be observed, that blinds of green, or of whited-brown linen, are best adapted for this purpose.

It is an useful practice, to protect weak eyes from the descending rays, by means of shades; because the vivid light striking them from above, is thus intercepted. But we ought to consider, that the lower part of the eye is, by such means, completely shaded, while the upper part of this organ is stimulated by the light it receives from below; a practice which cannot be productive of good consequences. If the malady be situated in the upper part of the eye, this conduct is still more improper; for the healthy part is in this manner protected, and that already relaxed, is still more weakened.

Darkness, or shade, is then only beneficial to the eyes, when they are unemployed, when the obscurity is natural, and, consequently, every where extended. To rest a little during the twilight, is very suitable to weak

eyes. No artificial darkness during the day is ever so uniform, but that one eye must exert itself more than another, and necessarily suffer by this change. Persons with weak or diseased eyes, who spend the whole day in an apartment darkened with green curtains, injure their sight still more by this pernicious practice. It is far more prudent to repair to clear day-light and fresh air, and to direct the eyes to distant prospects, than to confine them to the close atmosphere of a room, and to the sight of near objects. Lastly, it is an error, that weak eyes, when employed in minute vision, ought to have a faint light; for by this practice they are still more weakened. Thus green spectacles are very hurtful to some eyes, as they deprive them of that light which is necessary to a distinct perception of objects.

Conduct to be observed in Weak Eyes.

The artificial light of candles and lamps is detrimental to weak eyes; not, as some imagine, on account of the light being too strong for the eyes, but because the flame of a candle too powerfully illumines the eye in one point, and does not uniformly stimulate the *retina*.

The best Defence of Weak Eyes by Candle-light, &c.

The means used to prevent the great stimulus from the rays of light are, in general, so regulated, that the screen may not only cover the flame, but also concentrate the greatest part of the light. Thus the room is darkened, and only a small spot above and below the apparatus is illumined; a practice highly injudicious.

The study-lamps, with large round screens, seem to be purposely contrived to impair the soundest eyes, by their continued use. The green parchment screens formerly used, were likewise objectionable; for though they admitted the free access of light on both sides, they produced too great a shade before the eyes. The best and most proper mode of defence of weak eyes by candle-light, is a flat screen, projecting about two or three inches over the forehead; or even a round hat, with a brim of a proper size.

The advantage of Candles over Lamps, &c.

Those who are afflicted with weak eyes, should always use two candles, so placed that the flame be neither too low nor too high for the eye. This is a circumstance of great importance; as the light, when placed too low, is

uncommonly stimulating and fatiguing. Candles have this advantage over lamps, that their light is less offensive to the eye, and less pernicious to the lungs; as they do not, in general, emit so much smoke. But, on the other hand, all candles have the following disadvantages: 1. That by their burning downward, the fatigued eye is progressively more strained in the later hours of candle-light;—2. That the unequal light they give, is attended with the additional trouble of snuffing them;—and, 3. That by the least commotion of the air, or, if made of bad materials, they offend the eye by their flaring light. Hence, a clear chamber-lamp, burning with the least possible smoke and smell, is far preferable, and more soothing to the eye, than even wax candles. Some of the lately improved patent lamps, originally contrived by M. D. Argent, in Switzerland, are well calculated to answer every useful purpose; but instead of the common round screens, we would recommend the one we are about to describe.

Those *screens* are the best, which are applied to one side of the light only, which is not larger than is necessary to cover the flame, and which still admit a small quantity of light to pass through them. This is obtained by a simple contrivance of taffety, slightly gummed, and folded so that it can be carried about in the pocket. These little screens are very convenient in travelling, and are possessed of the essential advantage, that they overshade only the small angle formed for the individual who is affected with weak eyes, without depriving the rest of the company of light. In the day-time, on the occasion of sealing letters, for instance, the light of a candle or taper is more prejudicial to the eye than in the evening.

Miscellaneous Observations on Weak Eyes.

The eyes should not be too much exerted immediately after rising in the morning. Hence it is advisable to remove the candle to some distance, and under shade, in the long winter mornings, till the eye be gradually accustomed to it. For the same reason, the window-shutters ought not to be opened in very bright day-light. This immediate change, from darkness to the clearest light, occasions sensible pain, even to the strongest eye.

Writing fatigueth eyes less than reading; for the letters we form on the paper, are previously imprinted on the imagination, and consequently require much less acute-

ness of sight, than the series of letters and words we read.

Sight with regard to an Apartment or Sitting-Room.

Refracted rays afford an unpleasant light, and oblique rays are particularly painful. When we take exercise in a long irregularly lighted apartment, we feel insensible vibrations in the pupil of the eye. The most suitable apartment, in this respect, is one forming an irregular square, with large windows to the east, in which there is an uniformly divided light, or still better by means of sky-lights. Garret windows afford a bad light, it being generally introduced, as it were, by a funnel, and illumining only one part of the room, whilst the rest remains dark.

A sitting-room is best adapted to preserve the eyes, the walls of which are pale green, without paintings; two or three uniformly high windows, so as to give an equal light; (yet so contrived as to prevent its being too strong), close and moveable green blinds; a green carpet on the floor; and lastly, such shutters as may occasionally leave the upper part of the window uncovered, in order to admit sufficient light.

Position of the Writing-Desk.

To sit with one's back to the window, occasions a shade which forms a disagreeable contrast to the surrounding light. The writing-desk, therefore, ought to be placed so, that the last window may be on the left hand, and that the right hand may throw no shade on the paper, and not too near a corner of the room, as this generally receives an unfavourable light. A space sufficiently broad between two windows, is a still more convenient situation for a desk; but we should not sit too near the wall, a custom which is excessively hurtful to the eyes.

The oblique position of the desk is the most proper; for it presents to us the writing materials in that position in which we are habituated to place a book, when we hold it in our hand, and from which the rays of light diverge more gradually than from a horizontal table. It is less hurtful to the breast, to the abdomen, and also to the eyes, to use a desk of this form, and to write standing rather than sitting, provided that the height of the desk be proportionate to the length of the body, that it be firm, and that both arms rest upon it, without being fatigued by raising them too high. In *standing* before a

desk, we have additional advantage, that there is less occasion to direct the eyes upwards, than in sitting.

Directions for placing the Candle.

At night the candle should be so placed, that we may receive light from it as we do from windows in the day time. Even should it be provided with a green screen, as before described, a weak eye will not long be able to support its glare in a straight line. Were the candle to be elevated at our back, so as to allow the light to come down over our shoulders, we should then experience the same inconvenience which attends that posture in day-light. Hence it is necessary to place it sideways, and to keep the book or paper in a lateral direction.

Directions for placing the Bed-Room Light.

Where it is necessary to have a light kept up during the night, it ought to be placed in the next room, or at least within the chimney, that it may be entirely out of sight. If neither of these methods be convenient, it should be placed behind, or at the side of the bed, rather than in an opposite direction: for should this circumstance not be attended to, the light may produce very hurtful effects during sleep, even through the closed eye-lids.

The same attention is requisite to prevent the rays of the sun or moon, either directly or by reflexion from the opposite wall, from striking the eyes of the person asleep. As some men are known to sleep with their eyes open, it would be advisable to employ some one to shut them, that they may not suffer from accidents before-mentioned, as well as to prevent dust from entering, or the natural secretions being suppressed, which is necessary for their lubrication.

Those who are troubled with weak eyes should carefully avoid strong fires, and even hot rooms, as well as all sudden transitions from darkness to light, and *vice versa;* for heat still more dries the eyes already suffering from want of moisture. Indeed, it is highly probable that the weakness of sight and early blindness, so commonly met with in this country, are, in a great measure, owing to the bad custom of hastening to the fire-side, whether coming from the cold air, or from the dark streets. Weak eyes must be indulged with shady places, and protected against every dazzling object. But green arbours should

be avoided, on account of the twinkling light occasioned by the agitation of the leaves.

Bathing the Eyes in cold Water.

The best remedy with which we are acquainted for preserving weak eyes, is bathing them in pure cold water: it both refreshens and strengthens them. But this ought not to be done above three or four times in the course of the day; otherwise it has a tendency to over stimulate the eyes. Nor should it be done immediately after rising in the morning, but only when the moisture, which during sleep is deposited even in the soundest eyes, is evaporated. This partial cold bath may be very advantageously employed after dinner and supper, at which times the eyes stand as much in need of it as in the morning. The brow, the region behind the ears, and sometimes the whole head, and particularly the upper lip, which is closely connected with the optic nerves, should be bathed or washed as well as the eyes. The washing should be expeditiously performed; gradually exposing the eye in the morning to the water. The eyes after this ablution should be carefully and cautiously wiped dry; and rays of light, as well as every kind of exertion, should afterwards be particularly avoided.

A large piece of sponge, containing a good deal of water, so that it may not too soon become warm, is far preferable, in these partial bathings, to the warm smooth hand, or towel. The sponge should be frequently dipped in cold water, and occasionally allowed to lie for a few moments on the eye, with the head bent backward, while the eye is gently moved, and a little opened during the operation.

Eye-Wash, for relieving the Pain and Weakness incident to the Eyes of Elderly People, when depending on Debility of the Optic Nerves.

Take Sulphate of zinc,	- - -	1 drachm.
Spirit of Camphor,	- - -	3 drachms.
Distilled water, hot,	- -	4 ounces.
Rose water,	- - -	8 ounces.

Pour the boiling water upon the zinc and camphorated spirit in a closed vessel, and when cold, strain through linen or fine tow; then add the rose water.

ON THE COST OF TEA, AND THE PREFERENCE DUE TO MALT-LIQUOR IN A COTTAGER'S FAMILY.

THE annual cost of drinking tea in a cottager's family, is thus estimated by Mr. Cobbett, omitting the *et cætera*.

	£.	s.	d.
18lbs. of tea, at 5*s.* - - -	4	10	0
54lbs. of sugar, at 7*d.* - -	1	11	6
365 pints of milk, at 1*d.* - -	1	10	5
	£7	11	11

As neither strong beer nor strong tea are now under consideration, I will suppose every ounce of the 18lbs. of tea to make a gallon of this beverage, and adding a pint of milk for the potion of each day, the daily quantity will be seven pints and a fraction of a pint of 114 parts in 365; and whether this may be too much or too little, depends upon the number and other circumstances of those who partake of it: the cost of it, however, will be 5*d.* per day, or less by the most insignificant fraction, and equal to 1*d.* and a fraction of 1*d.* of 671 parts in 1152, per quart, or in even numbers it may be estimated at 1½*d.* per quart. Believing that the substitution of malt-liquor for tea, in a cottager's family, is deserving of every possible recommendation, the strength of each liquor must be left to the discretion and means of those who are to pay for it.

I shall now compare the cost and strength of three descriptions of malt-liquor, namely, that proposed by Mr. Cobbett—that described in the Act of Parliament, 4 G. IV. c. 51, "To encourage the consumption of beer," the same to be made of "an intermediate strength between strong ale and table beer,"—and that which is adopted in Shropshire by alehouse-keepers, and private brewers of ale.

Mr. Cobbett states, that a Winchester "bushel of malt will make eighteen gallons of better beer than that which is sold at public-houses," (paragraph 25) that is seventy-two quarts of beer to thirty-two quarts of malt.

If 32 quarts of malt and 1lb. of hops cost			The beer will be worth per quart, according to the strength recommended by Mr. Cobbett.
s.	d.		d.
6	0	- - - -	1
7	6	- - - -	1¼
9	0	- - - -	1½
10	6	- - - -	1¾
12	0	- - - -	2
13	6	- - - -	2¼
15	0	- - - -	2½
16	6	- - - -	2¾
18	0	- - - -	3

The beer, according to 4 G. IV. c. 51, is required "to be brewed in the proportion of five barrels of thirty-six gallons, and five and a half of such barrels to a quarter of malt;" that is, ninety-nine quarts to a bushel of malt, or a lower strength than that proposed by Mr. Cobbett, in the proportion of ninety-nine to seventy-two.

If 32 quarts of malt & 1 lb. of hops cost	*s.*	*d.*	The beer will be worth per quart, according to the strength directed by 4 G. IV. c. 51.	*d.*
	6	2¼		¾
	8	3		1
	10	3¾		1¼
	12	4½		1½
	14	5¼		1¾
	16	6		2
	18	6¾		2¼

This is subjected to a duty of 5*s.* per barrel of thirty-*six* gallons, payable by a public brewer, equal to an additional duty on malt of 3*s.* 3¼*d.* per bushel.

The third and last description of malt-liquor which I have proposed to bring under this comparison of strength and cost, is that which is adopted very generally in Shropshire, both by alehouse-keepers and private brewers, and is considered as good ale, being about eight gallons to a bushel of malt. I might be told that the alehouse-keepers draw only eight gallons of ale from the Oswestry bushel of nine gallons and a half of malt, but they take some small beer after it, which allows me to assume the even quantity of a gallon of ale from a gallon of malt. A barrel of small beer of thirty-*four* gallons, is charged with an additional duty of 2*s.*, two or three gallons of which is usually made from every bushel of malt after the ale wort is drawn off.

If 32 quarts of malt, and 1 lb. of hops cost	*s.*	*d.*	The ale will be worth per quart, according to the strength adopted in Shropshire.	*d.*
	5	4		2
	6	8		2½
	8	0		3
	9	4		3½
	10	8		4
	12	0		4½
	13	4		5
	14	8		5½
	16	0		6
	17	4		6½
	18	8		7

This is subjected to a duty of 10*s.* per barrel of thirty-*four* gallons, payable by a public brewer, equal to an additional duty on malt of 2*s.* 4*d.* and a fraction of four parts in seventeen of 1*d.* per bushel, and 1¼*d.* for the two gallons and a half of small beer. The duty on ale made by the public brewer is equal to three farthings and a

fraction of nine parts in seventeen of a farthing, or nearly 1*d.* per quart; and the quart of ale is now (November, 1823) sold for 7*d.* at the public-houses of this neighbourhood, or 6*d.* if carried away by the buyer.

The Winchester bushel (13 W. III. c. 5), is thus described: "that every round bushel, with a plain and even bottom, being made eighteen inches and a half wide throughout, and eight inches deep, shall be esteemed a legal Winchester bushel, according to the standard in his Masjesty's Exchequer:" and it will appear, that by adding one quarter of an inch for every additional quart required, retaining the same width, the depth for thirty-eight quarts should be nine inches and a half, and for thirty-nine quarts nine inches and three quarters. The Winchester bushel is generally allowed to contain 2150 cubic inches, and a fraction of four parts in ten of a cubic inch, as the dry measure, for grain, &c.; but this does not apply to liquid measure, for there are

Cubic Inches.
268 & 8-10ths in a gallon of grain or malt,
282 in a gallon of ale or beer.
231 in a gallon of wine.

By the same act of W. III. an allowance in the proportion of four bushels in twenty, or twenty per cent. is made to the maker of malt, in reduction of the duty (now 2*s.* 6*d.* on the Winchester bushel, equal to 3*s.* 0½*d.* on the Oswestry bushel of barley of about thirty-nine quarts, or about 63 lbs.) "in consideration of the difference between the quantity of such corn when it is wet and swoln, and the quantity thereof when it is converted into dry malt." The duty, therefore, is in fact charged on the barley; for the malt, when dried and completely screened from the malt-dust, will measure more than the barley, under skilful management and favourable circumstances in the malting process; which increase is well understood amongst maltsters by the term *outcast;* it will be found, also, that the allowance of twenty per cent. on the swelling of the barley during the operation of malting, is a little in favour of the maker of malt.

The only method which I am aware of, for proving at once the real increase or decrease of bulk, is to take a wine glass, or any such vessel, striking off this small measure of barley, and the like of malt clear from malt-dust, and then counting out the grains; which will give a tolerably accurate proportion of the increase or de-

crease of bulk upon the whole quantity: it being understood, that the malt-dust ought not to be immediately separated from the whole store of malt, but only from each quantity as it is wanted for use.

In regard to the present value of malt: the aggregate average price of barley for the week ending 1st of November, according to the London Gazette, is 27*s.* 4*d.* per quarter, that is, 3*s.* 5*d.* per bushel; the charge for malting thirty-nine quarts is 1*s.* equal to rather less than 10*d.* for thirty-two quarts; and the duty is 2*s.* 6*d.*, or rather less.

	s.	*d.*
Barley, per bushel	3	5
Malting	0	10
Duty	2	6
Hops, &c.	1	6
Including the maltster's profit from the outcast	8	3

I have charged rather too much for hops in bringing the total precisely to answer the table (page 120), which shews, that the beer described in the act of 4 Geo. IV. c. 51, may be brewed at home for less than 1*d.* per quart, according to the present prices of the ingredients, instead of 2½*d.*, the price fixed by the act for the public brewer; and I have before shewn that tea (page 119) is worth more than 1½*d.* per quart, so that cottagers may provide themselves with three pints of such beer at a less cost than two pints of tea.

I am informed, that a bushel of malt after brewing, produces three or four quarts of yeast, and more than a bushel of grains, in the proportion of about six to five. The yeast and grains will therefore amply compensate for the expences of brewing; while there is some trouble and loss of time in making tea twice a day, from which you have no return besides the liquor; and there being no duty on home brewed-beer, is another advantage.

I apprehend that the act of 4 Geo. IV. c. 51, is not likely to answer the purpose proposed by it; for although there are sixty-eight common ale-house licenses granted in the hundred of Oswestry, including the town and liberties, not one license has been applied for under this recent act of 4 Geo. IV. c. 51.

Were this question to be tried by a jury of cottagers' wives, I should be found guilty of recommending very indifferent tea, but for the strength of the beer I may shelter myself under the protection of an act of parliament; and although 2*s.* 6*d.* per bushel is paid for malt-

duty, and 2*d.* per lb. for the duty on hops, beer is still cheaper than tea in the proportion at the least of three to two.—*Cottage Economy, and Mansion Economy, estimated on the market-prices of provisions for November,* 1823, *and February,* 1824. *By T. N. Parker, Esq. A. M.*

TREATMENT TO COUNTERACT THE EFFECTS OF DRINKING LARGE QUANTITIES OF LIQUORS.

MANY persons are destroyed suddenly by drinking large quantities of spirit. The first effects are stimulant; they quicken the circulation, and occasion much blood to be thrown upon the head. They afterwards prove sedative; they bring on stupor; loss of reason, total; of motion and sensation, almost total. Their effects may be partly owing to their entering, in some degree, into the circulation, but depend chiefly, when violent, on their action on the nerves of the stomach. In consequence, the brain is affected, and the nervous influence suspended, if not destroyed. All the parts of the body therefore partake of this insensibility. As the skin in some cases may be burnt even without feeling, so the stomach and intestines may be stimulated considerably without any effect. The motion of the heart and lungs is much enfeebled and interrupted, but continues irregularly till death ensues.

To rescue the person from so dangerous a state is extremely difficult. To counteract these effects by medicine is less likely, both as the power of swallowing is lost, and as, probably, little or no absorption then takes place. But we ought to endeavour, 1st, to evacuate the poison; or else, 2dly, to dilute it, and thereby weaken its action. With a view to the first, brisk vomits may be given; but, from the want of irritability of the stomach, these often will not act, unless given early, when they are of great service in cases of intoxication. A dock-porter, who died in the Liverpool Infirmary from this cause, Feb. 28, 1780, got down over night, nearly twelve grains of emetic tartar dissolved, yet it produced little or no effect, though he lived till the next day. Purges are also proper, but liable, though in a less degree, to the same objections. Sharp glisters may be administered, and will produce some evacuation, but their operation does not extend far enough. Large glisters, of water only, or of water in which purging salts are dissolved,

thrown up with some force by a syringe, might be of more service.

Oil has been advised to be given, to help to evacuate the spirit, or to weaken its action. But when the inactivity of the stomach is become so great and the danger so pressing, there seems more reason to expect success, from largely diluting that poison, which we in vain attempt to evacuate. When intoxication has been produced by drinking strong liquors, large quantities of water, or weak liquids, drank are found to lessen it very considerably. And though the power of swallowing be lost, yet by means of a pipe (as a catheter) passed beyond the glottis, or even down into the stomach*, water might be poured in, in such quantity as was judged sufficient to dilute and carry off the liquor in the stomach. To the water might be added with advantage, probably, vinegar, or any kind of acid: or purgatives might be dissolved in it, to facilitate the poisons passing off by the intestines. A pipe of this kind too would afford the best method of introducing substances into the stomach to promote vomiting.

Putting the body into a warm bath, or the legs and feet in warm water, will be of use, by lessening the quantity of blood accumulated in the head and in the larger vessels: and some of the water may perhaps be absorbed. With a view to relieve the oppression, bleeding, and opening the temporal artery are advisable. If the pulse is found to become freer and fuller on losing some blood, more may be taken away. Blisters may also be applied with advantage.

The coldness of the extremities, and the evident difficulty with which the circulation is kept up, point out the propriety of assisting it by warmth and friction applied to the skin (as in recovering drowned persons). Motion, to prevent sleep, may probably be serviceable in such cases. Great care should be taken to loosen the neckband, garters, and every kind of bandage, and that the body should lie in a natural easy posture; on the side is perhaps better than on the belly, though that has been recommended, that the stomach might the easier discharge its contents. The breathing should not be obstructed, nor the neck lie low, or in a bent position.

---

* This article was written before the stomach pumps, lately introduced, came into use. Those of Messrs. Jukes, Reid, and Weiss, are now sufficiently known, and may prove equally serviceable in cases of strong intoxication.

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

(Continued from page 66).

HEAT at the pit of the stomach, and sour risings, constitute the *heart-burn*, arising from *weakness of the stomach*.—With pain in any internal part, gives reason to suspect *inflammation* to be proceeding to *suppuration*.—Internal heat, with cold limbs, in fevers, points out great danger.

HICCUP, succeeding to considerable evacuations, shews much danger. If occurring in the progress of internal inflammation, gives reason to apprehend the approach of mortification. It is an alarming symptom in cases of suppression of urine; and in cases of strangulated rupture, shews great danger to exist.

LASSITUDE, and real debility, generally precede the other symptoms of fever; and languor, in children, should always excite vigilance in parents, and those who have the care of children.

LEGS, SWELLING OF THE—Where this occurs in a very slight degree, in persons rather advanced in years, and using but little exercise, is not to be regarded as an alarming circumstance. In persons beyond the middle stage of life, who are affected by difficulty of breathing, it may be considered as entirely depending on the disordered state of the lungs, and as pointing out the necessity of exertions being made for their relief. Swelling of the legs, and failure of strength, should be considered as a warning that some important change in the system is taking place, perhaps tending to *dropsy*.

LIPS.—Eruptions on the lips, succeeded by scabs, in fevers, is a favourable symptom.

LOOSENESS occurring in cases of hectic fever, with night-sweats, shews danger.

MATTER discharged from the lungs, hectic fever being also present, is a mark of consumption. Matter, however, of a purulent appearance, may be discharged from the lungs, and if without hectic fever, still consumption may not succeed, if very powerful means are employed.

MENSES when suppressed in consumption, no benefit will be derived from endeavours to procure their return; their suppression being a symptom, not the cause of consumption.

MIND much dejected in the beginning of fevers, generally points out a considerable degree of malignancy in their nature.

PAIN internally, with fever, requires particular attention; it in general denoting inflammation of some internal part. In cases of internal inflammation, if the pain suddenly cease, the countenance sunk, the pulse beginning very quick and small, with frequent cold shiverings, gives reason to fear the coming on of mortification.—Pain, in cases of internal inflammation, gradually diminishing, and a sensation of weight in the part gradually arising, with some degree of anxiety, shews that suppuration is taking place.

PAIN IN THE HEAD, with fever, redness of the face and eyes, and inability to bear noise and light, are symptoms *of inflammation in the brain and its membranes.*

PAIN IN THE EAR, with feverishness, are symptoms *of inflammation in the ear.*

PAIN IN THE CHEST, with a sense of oppression, and of heat under the breast-bone, with a saltish taste in the mouth, generally precedes *spitting of blood.*

PAIN in the chest, with fever, difficulty and shortness of breathing, are marks of *inflammation of the lungs.* If the other symptoms here enumerated, are present, the disease may be concluded to exist, although the pain be not considerable.

PAIN coming on suddenly, during walking, and particularly whilst going up stairs, or ascending a hill, a pain also being felt, at the same time, about the middle of the arm, are symptoms of the disease termed *angina pectoris.*

PAIN OF THE SIDE, increased by drawing in the breath, and particularly by coughing, with hard pulse, and difficulty of laying on the pained side, denotes *pleurisy,* or *inflammation of the pleura* or *membrane inverting the inside of the chest.*

PAIN IN THE LEFT SIDE OF THE CHEST, with fever, great anxiety, irregular pulse, faintings and palpitations, are symptoms of *inflammation of the heart.*

PAIN IN THE LEFT SIDE, under the short ribs, with fulness and tension, distinguishes the *inflammation of the spleen.*

PAIN ON EITHER SIDE OF THE CHEST, not very acute, nor violently increased during inspiration, may occur in consequence of an affection of the muscles of the chest.

PAIN IN THE RIGHT SIDE, under the short ribs, extending to the shoulder, with fever, points out *inflammation of the liver.*

PAIN OVER THE WHOLE BELLY, increased by straightening the body, extreme soreness and fever, mark *inflammation of the peritoneum,* or membrane lining the cavity of the belly.

Very violent vomitings, obstinate costiveness and fever, distinguish *inflammation of the bowels.*

PAIN ABOUT THE NAVEL, very severe, with costiveness and contraction of the belly, are symptoms of *colic.*

With frequent slimy stools, streaked with blood, point out *dysentery, or bloody flux.*

PAIN AT THE BOTTOM OF THE BELLY, with fulness and extreme tenderness on pressure, and frequent painful attempts to pass urine, which escapes only in small quantities, shews *inflammation* to have possessed the *bladder.*

PAIN IN THE BACK, one of the first symptoms of fever, and generally occurs to a great degree in *malignant and in eruptive fevers.*

PAIN IN THE LOINS, passing forward toward the bottom of the belly, fever, vomitings, numbness of the thigh, and drawing up or pain of the testicles in the affected side, accompany *inflammation of the kidneys.*

PAIN IN LARGE MUSCLES AND JOINTS, without redness, swelling, or fever, occurs in *chronic rheumatism.* With swelling, redness, and fever, distinguish *acute,* or *inflammatory rheumatism.*

PAIN IN THE SHIN BONES, or in the head, suffering a considerable augmentation in the evening, demands immediate attention.

PAIN IN THE JOINTS OF THE GREAT TOE, instep, or hand, generally preceded by some affection of the stomach, and coming on most commonly in the night, characterises the attacks of the *gout.*

PAIN IN THE LIMBS generally occurs at the commencement of fever.

PAIN AT THE PIT OF THE STOMACH, with vomitings, may proceed from gall-stones.—At the commencement of fever, pain at the pit of the stomach is often followed by a disease of a considerable degree of malignity. It also frequently precedes the eruption of the small-pox or measels. And heat in the stomach, increased by swal-

lowing of even fluids, with vomitings, extreme anxiety, and fever, are symptoms of *inflammation of the stomach.*

PAIN AT THE BOTTOM OF THE BELLY, IN FEMALES, with heat, swelling, and tenderness on pressure, frequent vomitings and fever, are symptoms of *inflammation of the womb.* Darting in the region of the womb, generally accompanies a schirrous or cancerous state.

Housekeeping and Husbandry.—No. II.

House-keeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

Directions for Cooking and preparing Vegetables for the Table (from the COOK'S ORACLE).

THERE is nothing in which the difference between an elegant and an ordinary table is more seen, than in the dressing of vegetables, more especially of greens: they may be equally as fine at first, at one place as at another; but their look and taste are afterwards very different, entirely from the careless way in which they have been cooked.

They are in greatest perfection, when in greatest plenty, *i. e.* when in full season.

By season, I do not mean those early days, that luxury in the buyers, and avarice in the sellers about London, force the various vegetables: but that time of the year in which by nature and common culture, and the mere operation of the sun and climate, they are in most plenty and perfection.

Potatoes and peas are seldom worth eating before Midsummer. Unripe vegetables, are as insipid and unwholesome as unripe fruits.

As to the quality of vegetables, the middle size are preferred to the largest, or the smallest; they are more tender, juicy, and full of flavour, just before they are quite full grown: freshness is their chief value and excellence, and I should as soon think of roasting an animal alive, as of boiling a vegetable after it is dead.

The eye easily discovers if they have been kept too long; they soon lose their beauty in all respects.

Roots, greens, salads, &c., and the various productions

of the garden, when first gathered, are plump and firm, and have a fragrant freshness no art can give them again, when they have lost it by long keeping;—though it will refresh them a little to put them into cold spring water for some time before they are dressed.

To boil them in soft water, will preserve the colour best of such as are green; if you have only hard water, put to it a tea-spoonful of carbonate of potash.

Take care to wash and cleanse them thoroughly from dust, dirt, and insects: this requires great attention: pick off all the outside leaves, trim them nicely, and if not quite fresh gathered and have become flaccid, it is absolutely necessary to restore their crispness before cooking them, or they will be tough and unpleasant; lay them in a pan of clean water, with a handful of salt in it, for an hour before you dress them.

"Most vegetables being more or less succulent, their full proportion of fluids is necessary for their retaining that state of crispness and plumpness which they have when growing. On being cut or gathered, the exhalation from their surface continues, while from the open vessels of the cut surface, there is often great exudation or evaporation, and thus their natural moisture is diminished, the tender leaves become flaccid, and the thicker masses or roots lose their plumpness. This is not only less pleasant to the eye, but is a real injury to the nutritious powers of the vegetable; for in this flaccid and shrivelled state its fibres are less easily divided in chewing, and the water which exists in vegetable substances, in the form of their respective natural juices, is directly nutritious. The first care in the preservation of succulent vegetables, therefore, is to prevent them from losing their natural moisture."—*Sup. to Edinb. Encyclop.* vol. iv. p. 335.

They should always be boiled in a saucepan by themselves, and have plenty of water: if meat is boiled with them in the same pot, they will spoil the look and taste of each other.

If you wish to have vegetables delicately clean, put on your pot, make it boil, put a little salt in, and skim it perfectly clean before you put in the greens, &c. which should not be put in till the water boils briskly; the quicker they boil, the greener they will be. When the vegetables sink, they are generally done enough, if the water has been kept constantly boiling. Take them up

mmediately, or they will lose their colour and goodness. Drain the water from them thoroughly before you send them to table.

This branch of cookery requires the most vigilant attention. If vegetables are a minute or two too long over the fire, they lose all their beauty and flavour. If not thoroughly boiled tender, they are tremendously indigestible, and much more troublesome during their residence in the stomach, than under-done meats*.

To preserve or give colour in cookery, many good dishes are spoiled; but the rational epicure who makes nourishment the main end of eating, will be content to sacrifice the shadow to enjoy the substance.

Once for all, take care your vegetables are fresh; for as the fishmonger often suffers for the sins of the cook, so the cook often gets undeservedly blamed instead of the green-grocer. Vegetables in this metropolis are often kept so long, that no art can make them either look or eat well.

"Succulent vegetables are best preserved in a cool shady and damp place. Potatoes, turnips, carrots, and similar roots intended to be stored up, should never be cleaned from the earth adhering to them, and must be protected from the action of the air and frost, by laying them in heaps, burying them in sand or earth, &c. or covering them with straw or mats.

"The action of frost destroys the life of the vegetable, and it speedily rots."—*Sup. to Edinb. Encyclop.* vol. iv. p. 335.

N. B. When greens, &c. are quite fresh gathered, they will not require so much boiling, by at least a third of the time they take, when they have been gathered the usual time those are that are brought to public markets.

---

* "Cauliflowers and other vegetables are often boiled only crisp, to preserve their beauty. For the look alone they had better not be boiled at all, and almost as well for the use, as in this crude state they are scarcely digestible by the strongest stomach. On the other hand, when over boiled, they become vapid, and in a state similar to decay, in which they afford no sweet purifying juices to the body, but load it with a mass of mere feculent matter."—*Domestic Management*, 12mo. 1813, p. 69.

PROGNOSTICS OF FOUL WEATHER.

THE *hollow winds* begin to blow;
The *clouds look black*, the *glass is low;*
The *soot falls down*, the *spaniels sleep;*
And *spiders* from their *cobwebs peep.*
Last night the *sun* went *pale to bed;*
The *moon* in *halos* hid her head.
The boding shepherd heaves a sigh,
For, see, a *rainbow* spans the sky.
The *walls are damp*, the *ditches smell*,
Clos'd is the pink-ey'd *pimpernel.*
Hark! how the *chairs* and *tables crack—*
Old Betty's joints are on the rack:
Her *corns* with *shooting pains* torment her,
And to her bed untimely send her.
Loud *quack the ducks*, the *sea-fowl cry*,
The *distant hills* are *looking nigh.*
How restless are the *snorting swine!*
The *busy flies* disturb the *kine.*
Low o'er the *grass* the *swallow wings;*
The *cricket* too, how *sharp he sings!*
Puss on the hearth, with *velvet paws*,
Sits *wiping* o'er her *whisker'd jaws.*
The *smoke* from *chimneys right ascends;*
Then spreading, *back to earth it bends.*
The *wind* unsteady *veers around*,
Or settling, in the *South is found.*
Through the clear stream the *fishes rise*,
And *nimbly catch* the incautious *flies.*
The *glow-worms* num'rous, clear and bright,
Illum'd the *dewy hill* last night.
At dusk the squalid *toad* was seen,
Like *quadruped*, stalk o'er the green.
The *whirling wind* the dust obeys,
And in the *rapid eddy* plays.
The *frog* has chang'd his *yellow vest*,
And in a *russet coat* is drest.
The *sky is green*, the air is still,
The *mellow* blackbird's voice is shrill.
The *dog*, so alter'd is his taste,
Quits mutton-bones, on *grass* to feast.
Behold the *rooks*, how odd their flight;
They imitate the *gliding kite*,
And seem *precipitate to fall*,
As if they felt the piercing ball.
The *tender colts on back do lie*,
Nor heed the traveller passing by.
In *fiery red* the *sun* doth *rise*,
Then *wades through clouds* to mount the skies.
'Twill *surely rain*, we see't with sorrow,
No *working in the fields to-morrow.*

DARWIN.

Horticulture.

APRIL.

THE KITCHEN-GARDEN.—Now all principal sowing and planting omitted last month in the main crops, should be finished early in this; also at this time the sowing, planting, transplanting, &c. many successional plants that are but of short duration in perfection, will be required.

Finish preparation of ground—by dunging, digging, and trenching, ready for sowing and planting.

Sowing—may still be successfully performed in most of the principal crops (b. m.*), both in the open ground and in hot-beds, which, however, should now be forwarded as much as possible, in the main crops of several sorts; such as onions, leeks, parsnips, carrots, red beet, lettuce, celery, cabbage, savoys, broccoli, &c.

——— *In the open ground*—may sow onions, leeks, carrots, parsnips, radishes, red beet, peas, beans, kidney beans, cabbage, cauliflowers, broccoli, borecole, savoys, red cabbage, sea cabbage, celery, cardoons, lettuce, asparagus, turnips, spinach, white beet, green beet, turnip-cabbage, turnip-radish, salsafy, scorzonera, skirrets, Alexanders, finochio, rampion, nasturtiums, and small salading.

——— *Of the above*—finish sowing the main crops of onions, leeks, carrots, parsnips, red beet, cabbage, cauliflowers, asparagus, lettuce, radishes, and spinach.

——— *Likewise of pot-herbs*—may sow parsley, borage, fennel, dill, thyme, marjoram, savory, hyssop, marigold, sorrel, burnet, chervil, clary, coriander, and purslane, if not done last month.

——— *In hot-beds*—sow cucumbers, melons, kidney beans, capsicum, tomatoes or love apple, and basil.

Planting—is now proper in many principal crops, as asparagus, artichokes, cabbages, cauliflowers, coleworts, sea-cabbage, beans, kidney beans, potatoes, horse-radish, lettuce, Jerusalem artichokes, and strawberries; with several kinds of aromatics, pot and sweet herbs, both in full plants, slips, off-sets, cuttings, &c. as sage, mint,

* b. m. l. stand for beginning, middle, and latter end of the month, denoting when particular works may be performed.

balm, tansey, tarragon, thyme, savory, marjoram, hyssop, sorrel, burnet, fennel, pennyroyal, chamomile, cives, rhubarb, lavender, rue, &c.

To plant in hot-beds—are cucumbers, melons, asparagus (b.), strawberries, and mushrooms; and to prick therein young seedling cucumbers, melons, capsicums, love apples, basil, &c.

Fruit-Garden and Orchard.—The principal business now in this district, consists in completing an intended planting, and to finish all remaining winter pruning as soon possible, and to give occasional watering to new-planted trees; to finish all grafting; defending tender wall-fruit from frost; and in some sorts of wall-trees, to commence their summer pruning (l.) by displacing useless shoot-buds of this year's production.

Planting—may still be performed, but should be wholly completed (b. m.) in the different sorts of wall, espalier, and standard fruit-trees; giving water as soon as planted, and repeated occasionally the first three or four weeks.

Flower-Garden and Pleasure-Ground. — The flower-garden, pleasure-ground, and shrubbery, should now have all necessary articles for sowing and planting of flowers, shrubs, trees, &c. completed; and all parts put into the neatest order by digging, hoeing, raking, sweeping, rolling, mowing, &c.

Borders and beds—should be digged or hoed, and carefully raked, both to appear neat, and to be ready for the reception of seeds and plants of flowers that may be intended.

Walks and grass lawns—should also be put into neat order, for the spring season.

Sowing—may be performed in all sorts of annuals and biennials, and many sorts of perennials; also of many tree and shrub seeds.

Planting—may still be continued in fibrous-rooted perennials and biennials; but finish planting all bulbs (b.), and most kinds of flowering shrubs, and various trees, both deciduous and evergreens, (b. m.), &c.

Work in the Nursery.—In the two last months having advised the several works of planting and transplanting, sowing seeds, and other methods of propagating the different sorts of trees, shrubs, and plants, to be forwarded as much as possible, as being the principal season for performing these operations; and also to complete all the principal spring business of digging, and several

other necessary works of nursery culture; which, if any now remain, it should be generally finished this month; and other requisite works performed, as directed under their respective heads.

All spring planting—of trees and shrubs, should be wholly completed this month.

Finish planting out all seedling and other young plants—of deciduous trees and shrubs, as early in this month as possible, before they begin to shoot, as it would then be too late to transplant many sorts successfully.

THE GREEN-HOUSE.—The exotics of the green-house must still be continued therein, but will now require a large share of free air, frequent waterings, the pots of some fresh-earthed, and others shifted, &c.

Admit air—in mild days, from morning till evening; but shut close when cold, and every night.

Waterings—will be necessary once or twice a week.

Clean the leaves—of oranges, lemons, and of any other exotics that are foul, by washing the large-leaved kinds with a sponge, and the others by watering over the branches and leaves.

Decayed leaves, shoots, &c.—clear away.

Fresh earth—the tops of the pots not yet done this spring, previously loosening the old earth.

Shift into larger pots, &c.—with some fresh earth, any plants that are in pots or tubs too small; removing with the ball of earth entire, and watering. And where any of the large-growing plants, as oranges, lemons, and American aloes, now growing in the largest-sized pots, are considerably advanced in growth, they should be shifted from the pots into tubs of a larger size; and any in tubs too small, should be shifted into others of larger dimensions.

THE HOT-HOUSE.—The principal requisite works of this department, are still to support a proper heat by constant bark-beds, and by fires of nights and mornings; with supplies of fresh air in warm days, and moderate waterings; and the young pines, and some other plants, require shifting into larger pots.

The bark-bed heat—will now require to be renewed with about one-third of new tan, if not done last month; first take up the pots of pines, and remove some of the waste, or earthy old bark, at top, then apply the fresh tan, the old and new forked up together, and directly replunge the pots of plants.

Fire heat—will still be necessary every evening and cold mornings.

Air—should be admitted moderately in mild sunny days, but shut close when cold, and all night.

Watering—will be necessary about once or twice a week, according as the different sorts of plants shall require.

Rural Economy.—No. I.

METHOD OF INCREASING POTATOES.

Extract of a Letter from Mr. John Lockett, of Donnington, to Mr. More.

"I took three potatoes the 17th of December, and put them into a small cask, and placed the cask in a cellar; the 10th of March I took off fifteen shoots from them, and planted them with a setting or dibbling stick, in the same manner as cabbage plants, about one foot square: the 16th of April I took twenty-one more shoots from the same three potatoes, and planted them as before; on the 22d of May I took twenty-five shoots more, and planted them also, and then washed and boiled the said three potatoes, which proved very good to eat. I had from the said sixty-one shoots, as many potatoes as weighed ninety-two pounds, notwithstanding the rooks did me much damage.

"My method of procuring plants after a mild winter, is to go (about the month of May) over the fields where potatoes were planted the preceding year, and pull up from among the corn all the shoots produced by the potatoes left in the ground the preceding autumn, which had escaped the digger, and plant these shoots in the same manner as above, viz. the same as cabbage plants."

RECEIPT TO ESTIMATE BUILDER'S WORK.

To acquire a proper estimate of a builder's work, build a house, and immediately sell it, and you will receive about half of the money it cost you.

MISCELLANEOUS RECIPES, IN DOMESTIC ECONOMY, MANUFACTURES, AND THE ARTS, &c.

Armenian Cement.

1. Soak isinglass in water till soft, then dissolve it in proof spirit; add a little galbanum or gum ammoniac, and mix it with tincture of mastich.

*** It must be kept well stopped, and when wanted, liquefied by the phial being immersed in hot water. *Used to cement jewels upon watch-cases; to mend china, or to replace leaves torn out of books.*

2. Add tincture of lac in rectified spirit, to a solution of isinglass in the same solvent.

3. Add to melted glue, half its weight of rosin in powder, and some red ochre: this is used for coarser purposes, as for cementing hones to their frames.

Bronzing Liquor.

Blue vitriol dissolved in water, used to bronze tea-urns, &c.; the surface being previously well cleaned.

Boyle's Fuming Liquor.—(Wine test).

Take fresh burned lime, four ounces; water, two ounces; and lake; and when cold, add sal ammoniac, 4 ounces; flour of sulphur, two ounces; distil—used as a proof liquor for wine; but it requires the precipitate to be examined, by fusion, whether it be really lead.

Fly Water.

Take white arsenic, one drachm; water, one pint: dissolve by boiling, and sweeten with treacle—used to destroy flies.

*** A strong infusion is equally efficacious, and not attended with any danger.

Green Sympathetic Ink.

Saturate spirit of salt, or aqua regia, with zaffre, or cobalt ore, free from iron, and dilute with distilled water: what is drawn upon paper with this liquor will appear green when it is warm; and lose its colour again when cold, unless it has been heated too much.

Blue Sympathetic Ink.

Dissolve cobalt or zaffre in spirit of nitre, precipitate by prepared kali, wash the precipitate, and dissolve it in distilled vinegar, avoiding an excess of the acid: to be used in the same manner as the last.

Dyer's Spirit.—(Composition for Scarlet Dye).

This consists of a solution of tin in spirit of salt or aqua regia: the proper manner of making it is not determined, every workman having his own way. Take spirit of nitre, ten ounces; sal ammoniac, one ounce; tin, one ounce three-eighths is a good proportion for its preparation in a small way:—used in dying scarlet, and in making many vegetable red colours.

Common Varnish.

Sandarac, eight ounces; Venice turpentine, six ounces; rectified spirits of wine, two pints.

Transparent Varnish.

Gum juniper, eight ounces; Venice turpentine four ounces; mastich, two ounces; rectified spirits of wine, two pints:—used upon wood.

White Varnish.

Gum juniper, one pound; Strasburgh turpentine, six ounces; rectified spirits of wine, two pints:—used upon paper, wood, and linen.

White hard Varnish.

Mastich, four ounces; gum juniper, Venice turpentine, of each three ounces; pounded glass, (to prevent the gums from forming an impenetrable mass) four ounces; rectified spirits of wine:—used upon cards, sheaths, &c.

Transparent Copal Varnish.

Spirit of wine fully charged with camphor, four ounces; copal, in fine powder, one ounce; dissolve and filter; add the filtered liquor to a pint of rectified spirits, in which an ounce of gum elemi has been previously dissolved.

White polishing Varnish.

Mastich, in tears, two ounces, gum juniper, eight ounces; gum elemi, one ounce; Canada turpentine, four ounces; rectified spirits two parts:—used upon metal, polished with pumice powder.

French Polish.

Shell lac, three ounces; mastich, one ounce; sandarac, one ounce; rectified spirit, forty ounces; dissolve in a gentle heat, making up the loss occasioned by evaporation.

Roman Polish.

Rectified spirits boiled upon gum arabic, or more probably gum sandarac.

Soft Brilliant Varnish.

Take gum sandarac, six ounces; lac in cakes, two ounces; black rosin, four ounces; Venice turpentine, six ounces; rectified spirits, two pints:—used upon wood and metals.

Lacquer.

1. Take seed lac, dragon's blood, arnotto, gamboge, of each four ounces; saffron, one ounce; rectified spirits of wine, ten pints.—Or,

2. Turmeric, one pound; arnotto, two ounces; shell lac, gum juniper, of each twelve ounces; rectified spirit, twelve ounces.—Or,

3. Seed lac, three ounces; amber and gamboge, of each two ounces; watery extract of red saunders, half a drachm; dragon's blood, one drachm; saffron, half a drachm; rectified spirits, two pints four ounces.—Or,

4. Turmeric, six drachms; saffron, fifteen grains; rectified spirit, one pint four ounces; draw the tincture, and add gamboge, six drachms; gum sandarac and gum elemi, of each two ounces; dragon's blood and seed lac, of each one ounce:—used upon metals and wood, to give a golden colour.

Red Varnish.

Sandarac, four ounces; seed lac, two ounces; mastich, choice Benjamin, of each one ounce; turpentine, two ounces; rectified spirit, two pints:—used for violins and cabinet work.

Anti-Attrition.

Hog's lard, ten pounds; camphor, four ounces; black lead, enough to colour it:—*used to rub on iron, to prevent rust, and to diminish friction.*

Clothes Ball.

Pipe clay, two pounds; fuller's earth and whiting, of each four ounces, white pepper, two ounces; ox-gall, four ounces:—*used for cleaning clothes.*

Clothes Powder.

Pipe clay, one pound eight ounces; white pepper, starch, and whiting, of each, one ounce; Florentine iris,

one ounce and a half; rectified spirit, two ounces:—*used as the clothes ball.*

Breeches Ball.

Bath brick, one pound; pipe clay, twenty-eight pounds; pummice-stone powder, four ounces; ox-gall, six ounces; they may be coloured with rose pink, yellow oker, umber, fresh slate, &c. to any desired shade.

Silver Boiling Powder.

White argol, common salt, and alum, of each equal parts; a small quantity of this powder is put into water, and plate, to which it gives a brilliant whiteness, is boiled in it.

Plate Powder.

1. Quicksilver, with chalk, one ounce; prepared chalk, four ounces.

2. Polisher's putty, and burnt hartshorn, eight ounces; whiting, one pound.

3. Prepared crab's eyes, two ounces; levigated oxyd of tin (commonly sold under the name of prepared putty), three drachms; quicksilver, two drachms. Rub the quicksilver with the oxyd of tin, in a marble mortar, for half an hour, and then add the crab's eyes, and continue the rubbing for an hour longer.

*** This powder is sometimes used with spirit of wine, but when the plate is not tarnished, it is not necessary. I am aware that the prepared crab's eyes are only prepared chalk, but being reduced to a more palpable powder than the article sold under the name of prepared chalk, I have always preferred them.

Powder for destroying Mice.

Black hellebore root, and seeds of stavesacre, of each an ounce; oatmeal, two pounds; oil of carraway, thirty drops.

Heel Ointment.

Hog's lard, three pounds; honey, two pounds; common turpentine, one pound; blue vitriol, verdigrise, and common alum, of each eight ounces; train oil, eight ounces:—used by farriers and grooms.

Dressing for Leather, to render it Water-Proof.

1. Lintseed oil, one pound; yellow wax, and common turpentine, of each two ounces; Burgundy pitch, one ounce.

2. Lintseed oil, one pound; suet, eight ounces; yellow wax, six ounces; yellow rosin, one ounce.

Bleaching Liquid.

Take common salt, two pounds; manganese, one pound; water, two pounds; put into a retort, and add gradually, oil of vitriol, two pounds; pass the vapour through a solution of prepared kali, three ounces, in water, twenty-nine ounces; applying heat towards the last. Stimulant and antisyphilitic:—used to bleach linen, and take out spots, and to clear books from what has been scribbled on their margins.

Pink Dye.

Tie safflower in a bag, and wash it in water till it no longer colours the water; then dry it; of this take two drachms; salt of tartar, eighteen grains; spirit of wine, seven drachms; digest for two hours more, and add distilled vinegar, or lemon juice, enough to reduce it to a fine rose colour:—used as a cosmetic, and to make French rouge.

Saxon Blue. (Scott's Liquid Blue).

Take indigo, one pound; oil of vitriol, four pounds; dissolve, by keeping the bottle in boiling water; then add water, twelve pound, or as much, more or less, as may be necessary.

Wash Colours for Maps or Writing.

1. *Yellow.*—Gamboge dissolved in water.
2. *Red.*—Brazil dust steeped in vinegar, and alum added;—or, litmus dissolved in water, and spirit of wine added;—or, cochineal steeped in water, strained, and gum added.
3. *Blue.*—Saxon blue diluted with water;—or, litmus rendered blue by adding distilled vinegar.
4. *Green.*—Distilled verdigrise dissolved in water, and gum added;—or, sap green dissolved in water, and alum added;—or, litmus rendered green, by adding prepared kali to its solution.

Nankin Dye.

Take arnotto and prepared kali, equal parts, boiled in water; the proportion of kali is altered, as the colour is required to be deeper or lighter:—used to restore the colour of faded nankin clothing.

Black Ink.

Take galls, in sorts, two pounds; logwood and green vitriol, of each one pound; gum arabic, a sufficient quantity—very good.—Or,

Bruised galls, one pound; green vitriol, eight ounces; gum arabic, four ounces; water, two gallons—for common sale.—Or,

Uncia sit gallæ, semisque sit uncia gummi, vitrioli pars quarta; his addas octo Falerno:—used for writing, but is destroyed by acids, and even by age; its restoration may be attempted by wetting the place with an infusion of galls, or with the solution of alkali calcined with blood (as in making Prussian blue), alternately with diluted spirit of salt.

Patent Ink.

Take logwood shavings, and powdered galls, each two pounds; pomegranate bark, four ounces; green vitriol, one pound; gum arabic, eight ounces; water, one gallon.

Ink used in the Prerogative Office.

Take galls, one pound; gum arabic, six ounces; alum, two ounces; green vitriol, seven ounces; logwood, in powder, four ounces; water, three gallons.

Lithographic Crayons.

Wax, twenty-five ounces; tallow, thirty-five ounces; rosin, twenty-six ounces; lamp black, six ounces.

Artificial Yeast.

Boil malt, a quarter of a peck, in water, three pints; pour off the decoction, and put it in a warm place for thirty hours; add twice as much of similar decoction; again ferment, and repeat this process, until a sufficient quantity of yeast is obtained.

Furniture Balls.

1. Lintseed oil, one pint; alkanet root, two ounces; heat together, strain, and add yellow wax, eighteen ounces; yellow rosin, two ounces.

2. Mutton suet, three pounds; white wax, eight ounces; essence of lemon, enough.

Black Ball.

Bees'-wax, eight ounces; tallow, one ounce; gum arabic, one ounce; lamp black, enough;—used for blacking leather.

Botany-Bay Cement.

Yellow gum and brick-dust, of each equal parts:—used to cement china ware.

Gilders' Wax.

1. Yellow wax, one pound eight ounces; verdigrise and white vitriol, of each eight ounces; colcothar, two pounds twelve ounces; the dry species must be powdered very fine; borax, four ounces, may be added.
2. Yellow wax, fifteen pounds; colcothar, seven pounds; verdigrise and white vitriol, each three pounds eight ounces; borax, eight ounces.
3. Yellow wax and colcothar, each four pounds; verdigrise, two pounds; burnt borax, and burnt alum, of each two ounces.
4. Colcothar, eighteen pounds; yellow wax, ten pounds eight ounces; verdigrise and white vitriol, of each three pounds eight ounces.

Seal-Engravers' Cement.

Common rosin and brick-dust: it grows harder every time it is melted; but is always inferior to Botany-Bay cement.

Blackman's Colours in Bladders,

Are prepared with the spermaceti mixture, like his oil-cakes; but the proportion of oil is larger.

Refined Ox-Gall.

Fresh ox-gall, one pound; boil, skim, add alum, one ounce; and keep it on the fire for some time; to another pint of ox-gall add common salt, one ounce, in the same manner; keep them bottled up for three months, then decant off the clear: mix them in an equal proportion; a thick yellow coagulum is immediately formed, leaving refined gall clear and colourless—used by limners, enabling them to lay successive coats of colours upon drawings, to fix chalk and pencil drawings, so that they may tinted, to remove the greasiness of ivory, and even allowing them to paint with water-colours upon oiled paper or satin.

Boot-top Liquid.

Take sour milk, three pounds; oil of vitriol, two ounces; compound tincture of lavender, three ounces; gum arabic, one ounce; lemon juice, two ounces; white of two eggs. Mix.—Or,

Take sour milk, three pints; spirit of salt, and spirit of vitriol, of each two ounces; compound tincture of lavender, one ounce. Mix.—Or,

Take sour milk, three pints; butter of antimony and cream of tartar, of each two ounces; citric acid, burnt alum, common alum, of each one ounce. Mix for use.

Blacking.

1. Take lamp black, six pounds; sugar, six pounds; dissolve in water, two pints; sperm oil, one pound; gum arabic, three ounces; dissolved in vinegar, two pints; vinegar, three gallons, oil of vitriol, one pound and a half. Mix, *secundum artem.*—Or,

2. Take ivory black and common treacle, of each twelve ounces; sperm oil, oil of vitriol, of each three ounces; vinegar (No. 18) four pints. Mix.—Or,

3. Take ivory black and treacle, of each two pounds; neat's-foot oil, eight ounces; oil of vitriol, one ounce; gum tragacanth, two ounces; vinegar, six pints. Mix.—Or,

4. Take ivory black, six pounds; vinegar, water, of each two gallons; treacle, eight pounds; oil of vitriol, one pound.—Or,

5. Take ivory black, one ounce; small beer or water, one pint, brown sugar, gum arabic, of each half an ounce; or, if required to be very shining, the white of an egg.—Or,

6. Take ivory black, four ounces; treacle, eight ounces; vinegar, one pound—used to black leather.

Method of Vein-Marbling, and Staining Silk, Linen, Cotton, Paper, &c. By Mr. S. Toplin, of Gainsborough.

Make a middling thick size, or paste, of flour and water, to which add a little powdered alum, and then boil it in the manner of glovers' paste, &c. Put some of the size, when cool, into several pots, and mix with it such kinds of colours, or other matters used in staining and dying, as are had in esteem. Have ready a painter's brush to each pot, and with any of the brushes spread a quantity of the fore-mentioned size very even on a flat piece of marble, or other kind of smooth stone, or on a smooth board, or a table, according to the length or width of the piece of silk, linen, cotton, or sheet of paper. On the coloured size, thus spread, lay a strong plate of

glass, or one of tin, or copper, or a thin piece of board, pressing the plate (of whatever sort) gently with the hand on every part. Raise the plate, by lifting up one end, and it will be found veined in every direction, by the adhesiveness of the size; immediately lay the plate, thus prepared, on the silk, linen, or other article, and with the hand again gently press on every part of the plate, which will vein or marble the silk, &c. with the same figures as were on the sized plate. If the plate of glass (which is preferable, but exceptionable on account of its brittleness) be not pressed too hard, a second impression, with a beautiful sort of smaller-sized veins, may be had from the first colouring; and if two different colours are desired on the same surface, there needs only a repetition of the process with the size, containing staining ingredients, and the other favourite colouring substances. A neat sort of tortoiseshell appearance, and a great variety of expressive figures, may be produced in this way, as also by various actions by the fingers upon the plate, before the size loses its moisture, and likewise by many times folding the silk, linen, or other material of flexible texture.

For Sharpening Razors.

Take oxyd of tin, levigated, vulgarly termed prepared putty, one ounce; saturated solution of oxalic acid, a sufficient quantity to form a paste.

This composition is to be rubbed over the strap, and when dry, a little water may be added. The oxalic acid having a great attraction for iron, a little friction with this powder gives a fine edge even to a blunt razor.

Insect Destroyer.

Take of wood mushrooms, or large brown fetid boletuses, 6 lbs.; black soap, 2 lbs.; grated nux vomica, 2 oz.; water, 200 lbs. Put the mushrooms bruised, and beginning to putrefy, into the water, having previously dissolved the soap therein. Leave the mixture to putrefy in a cask for some days, agitating the liquid from time to time. When it has become very fetid, the decoction of the nux vomica in water is to be poured into it. This liquor, sprinkled on trees, bushes, plants, &c. in gardens, will entirely destroy or banish every species of insects. None of them stand this fetid poison.—*Journal de Pharmacie, February,* 1825.

DR. BUCHAN ON CLEANLINESS, PERSONAL, LOCAL, AND GENERAL;

Its Beneficial and Salutary Effects; Consequences of the want of it, &c. &c. the absolute Necessity of it in Camps, and on board of Ships, &c. &c.

THE want of cleanliness is a fault which admits of no excuse. Where water can be had for nothing, it is surely in the power of every person to be clean. The continual discharge from our bodies, by perspiration, renders frequent changes of apparel necessary. Change of apparel greatly promotes the secretion from the skin, so necessary for health. When that matter, which ought to be carried off by perspiration, is either retained in the body, or re-absorbed by dirty clothes, it is apt to occasion fevers and other diseases.

Most diseases of the skin proceed from want of cleanliness. These indeed may be caught by infection; but they will seldom continue long where cleanliness prevails. To the same cause must we impute the various kinds of vermin which infest the human body, houses, &c. These may generally be banished by cleanliness alone. Perhaps the intention of nature, in permitting such vermin to annoy mankind, is to induce them to the practice of this virtue.

One common cause of putrid and malignant fevers is the want of cleanliness. These fevers commonly begin among the inhabitants of close, dirty houses, who breathe bad air, take little exercise, use unwholesome food, and wear dirty clothes. There the infection is generally hatched, which spreads far and wide, to the destruction of many. Hence cleanliness may be considered as an object of public attention. It is not sufficient that I be clean myself, while the want of it in my neighbour affects my health as well as his own. If dirty people cannot be removed as a common nuisance, they ought at least to be avoided as infectious. All who regard their health, should keep at a distance even from their habitations.

In places where great numbers of people are collected, cleanliness becomes of the utmost importance. It is well known, that infectious diseases are communicated by tainted air. Every thing, therefore, which tends to pollute

the air, or spread the infection, ought, with the utmost care, to be avoided. For this reason, in great towns, no filth of any kind should be permitted to lie upon the streets. Nothing is more apt to convey infection than the excrements of the diseased. These, in many cases, are known to be highly infectious. The streets, in many great towns, are little better than dunghills, being frequently covered with ashes and nastiness of every kind. How easily might this be prevented by active magistrates, who have it always in their power to make proper laws relative to things of this nature, and to enforce the observance of them?

We are sorry to say, that the importance of general cleanliness does by no means seem to be sufficiently understood. It were well if the inhabitants of Britain would imitate their neighbours the Dutch, in the cleanness of their streets, houses, &c. Water indeed is easily obtained in Holland; but the situation of most towns in Britain is more favourable to cleanliness. Nothing can be more agreeable to the senses, more to the honour of the inhabitants, or conducive to their health, than a clean town; nor does any thing impress a stranger sooner with a disrespectful idea of any people than its opposite.

The peasants in most countries, seem to hold cleanliness in a sort of contempt. Were it not for the open situation of their houses, they would often feel the bad effects of this disposition. One seldom sees a farm-house without a dunghill before the door, and frequently the cattle and their masters lodge under the same roof. Peasants are likewise extremely careless with respect to change of apparel, keeping their skins clean, &c. These are merely the effects of indolence and a dirty disposition. Habit may indeed render them less disagreeable, but no habit can ever make it salutary to wear dirty clothes, or breathe unwholesome air.

In camps, the strictest regard should be paid to cleanliness. By negligence in this matter, infectious diseases are often spread amongst a whole army, and frequently more die of these than by the sword. The Jews, during their encampments in the Wilderness, received particular instructions with respect to cleanliness. The rules enjoined them ought to be observed by all in the like situation. Indeed the whole system of laws delivered to that people, has a manifest tendency to promote cleanliness. Whoever considers the nature of their climate, and the

diseases to which they were liable, will see the propriety of such laws.

It is remarkable that, in most eastern countries, cleanliness makes a great part of their religion. The Mahometan, as well as the Jewish religion, enjoins various bathings, washings and purifications. No doubt these were designed to represent inward purity; but they are at the same time calculated for the preservation of health. However whimsical these washings may appear to some, few things would appear more to prevent diseases than a proper attention to many of them. Were every person, for example, after handling a dead body, visiting the sick, &c. to wash before he went into company, or sat down to meat, he would run less hazard either of catching the infection himself, or communicating it to others.

Frequent washing not only removes the filth and sordes which adhere to the skin, but likewise promotes the perspiration, braces the body, and enlivens the spirits. Even washing the feet tends greatly to preserve health. The sweat and dirt with which these parts are frequently covered, cannot fail to obstruct their perspiration. This piece of cleanliness would often prevent colds and fevers. Were people careful to bathe their feet and hands in warm water at night, after being exposed to cold or wet through the day, they would seldom experience any of the fatal effects which often proceed from these causes.

A proper attention to cleanliness is no where more necessary than on ship-board. If epidemical distempers break out there, no one can be safe. The best way to prevent them, is to take care that the whole company be cleanly in their clothes, diet, &c. When infectious diseases do break out, cleanliness is the most likely means to prevent their spreading. Above all things, the clothes, bedding, &c. of the sick, ought to be carefully washed, and fumigated with brimstone, or the like. Infection will lodge a long time in dirty clothes, and will afterwards break out in the most terrible manner.

In places where great numbers of sick people are kept, cleanliness ought most religiously to be observed. The very smell in such places is often sufficient to make one sick. It is easy to imagine what effect that is likely to have upon the diseased. A person in perfect health has a greater chance to become sick, than a sick person has to get well, in an hospital or infirmary where cleanliness is neglected.

The brutes themselves set us an example of cleanliness. Most of them seem uneasy, and thrive ill, if they be not kept clean. A horse that is kept thoroughly clean, will thrive better on a smaller quantity of food, than with a greater, where cleanliness is neglected. Even our own feelings are a sufficient proof of the necessity of cleanliness. How refreshed, how cheerful and agreeable does one feel on being shaved, washed, and dressed; especially when these offices have been long neglected. Most people esteem cleanliness; and even those who do not practise it themselves, often admire it in others. Superior cleanliness sooner attracts our regard than even finery itself, and often gains esteem where the other fails.

We shall conclude this article by recommending the practise of that virtue to people of all stations and conditions in life. We do not indeed pretend to rank cleanliness amongst the cardinal virtues; but we would recommend it as necessary for supporting the dignity of human nature; as useful and agreeable to society, and as highly conducive to health.

PRACTICAL REMARKS ON THE DISEASES OF TRADESMEN, MECHANICS, LABOURERS, &c. &c.

Preliminary Observations.

From the various employments to which mankind are indebted for their comforts and luxuries, some of the most serious disorders to which the human body is liable, have their origin; whence the deduction to be drawn, must naturally depend upon how far the waste of life is a necessary consequence of such occupations; or whether it be only an unfortunate or but avoidable consequence.

"If, on the one hand," observes a French writer, "man has rendered nature tributary, and compelled her to afford all those stores which can serve to increase the pleasure of his existence; on the other hand, medical philosophy recognises a multitude of grievous evils, arising from the very same source with so many useful and ingenious inventions. The almost infinite number of arts, of trades and professions, are not exercised with impunity, and thousands perish victims to the state of life they have embraced."

The most elevated as well as the most degraded professions, are equally subject to maladies of more or less importance; as if, in a manner, the universality of the evil rendered it less deplorable. It must, however, be unquestionably admitted, that after all the stress that has been laid upon the occupations of men, much, if not

the greater portion of the evil supposed to result from them, arises in consequence of imprudence and intemperance in the mode of regulating those principal matters which, although they do not enter into the composition of the body, are, at the same time necessary to its existence; for example, air, meat and drink, sleeping and watching, affections of the mind, retentions and excretions, &c. Before, however, we touch upon this important subject, previous to treating of the effects of certain callings and particular positions of the body, as productive of certain diseased actions, it may not be irrelevant to our plan to premise the following inquiry, as far as regards the consequences of labour, abstractedly taken.

The subject here presents two points for consideration, viz. over-confinement, and over-exertion, either of which it seems impossible to reject alone, as being the cause of serious diseases. We are accustomed frequently to witness the consequences of over-working the horse, and to acknowledge their origin; and, at least in this respect, there is nothing physically different between man and the other animals of the first class. In the horse, the kind of labour has evidently nothing to do with it, since the same exercise, moderately taken, contributes to the preservation of his health and the improvement of his strength: it is the quantity alone to which the injury is to be referred. The same remark holds equally good of man, but very many circumstances attending his occupations will require to be taken into account. In the first place, the quantity of labour which different individuals will undergo without detriment, will considerably vary with the original constitution of their bodies, and their habits of life. A man of great natural physical strength, other things being equal, will perform more labour than a man of less powerful make; of two men of equal natural powers, the one, accustomed to continual hard work, will bear more than the other, unaccustomed to such employment; and, in the second place, very much will depend upon the quantity of nutriment which can be obtained*. Taking, however, all these considerations into account, there are

* A more striking instance of this could scarcely be adduced, than what occurred to the persons engaged with Captain Franklin in the travels to the North Pole; where we find them preserving their strength, and enduring easily the journey to the sea, though called upon perpetually to great bodily exertion; but, on their return, having been for some time deprived of sufficient food, the strongest amongst them was scarcely able to carry his gun, and not at all able to steady it, so as to obtain any of that supply when it appeared within their reach.

numerous instances of injurious effects arising from the long continuance of bodily as well as of mental labour; and, at the same time, of that labour which, if used in a moderate degree, instead of being hurtful, might tend in all probability to conduce to a healthy action of the corporeal powers.

Under this head may be included the occupations of children; particularly among those employed in manufactories, to which we shall refer in its proper place. On this part of the subject, however, there fortunately exists some very strong evidence, and that too, from a most unsuspicious source.

On the early Exertion and overstraining of the Physical Powers of Children.—Mr. OWEN'S *Remarks, &c.*

A few years ago, the injury which, it was natural to suppose, must ensue to young children, from too early overstraining their physical powers, engaged the attention of parliament, and under the influence of Sir Robert Peel, a variety of manufacturers were examined, together with many of the first medical men of the kingdom. It was scarcely reasonable to expect that the former should have observed, or, if they had observed, that they would readily acknowledge, even to themselves, the ill effects which accrued to their young work-people; and, accordingly, we find that, for the most part, they utterly deny that any evil had ensued from the confinement or exertion to which they were subjected. We do not mean to insinuate that, in any instance, the manufacturers who were called, stated any thing of which they did not feel themselves convinced; but, accustomed as they must be to employ children, and little as they would naturally feel disposed to indulge in an inquiry, which must necessarily take up much time, the probability is, that they would be in perfect ignorance of the subject. Among them, however, we find Mr. Owen, not only acknowledging, but remedying, as far as he possessed the means, the evils which arise from a too early employment of children. In speaking of the children which were engaged in his manufactory at New Lanark, he says,

"I very soon discovered, that although these children were extremely well fed, and clothed, and lodged, looked fresh, and to a superficial observer, healthy in their countenances, yet their limbs were very generally deformed, their growth was stunted, and although some of the best school-masters on the old plan were engaged to instruct these children, they made a very slow progress, even in learning a common alphabet."

These observations have been corroborated by similar observations, in an asylum for children, in a large manufacturing town, where the individuals were certainly properly nourished, but where they were confined eight or nine hours a day in heading pins and straw-platting; but this kind of work they did not commence until above seven years of age. Still, upon an extensive comparison of them with others not so confined, it was obvious that their growth was stunted; the buoyancy of infancy, usually so remarkable and engaging, was lost; neither was there that freedom of action in the limbs, which, in children, is generally so conspicuous.

Sir Astley Cooper's *Opinion on the Confinement of Children, &c.*

Sir Astley Cooper, who also gave his evidence before the above-mentioned Committee, states, if possible, the ill-effects of confinement in still stronger terms than Mr. Owen; and, as he asserts his opinion to be the result of extensive observation, it is particularly deserving of attention.

"The result of confinement commonly," observes Sir Astley, "is not only to stunt the growth, but to produce deformity, and to that point I can answer, from a good deal of experience, that deformity is a common consequence of considerable confinement."

The bad Effects of over Exertion.

These effects are not confined to children alone; though, from the intemperance and irregular habits of adults, it is much more difficult to ascertain them. Among the poor, the idea of having over-worked themselves is by no means uncommon; and, necessarily as suspicion attaches to their own evidence, many cases have occurred, in which general exhaustion and debility were readily enough traced to this source. Such, therefore, being the consequence of labour, not with regard to the kind, but the degree, it forms a most important subject of inquiry, to what extent an individual may exert his physical strength, without deteriorating or retarding the full development of his powers. To enter deeply into this, however, would lead us too far from our present purpose; we shall therefore content ourselves with stating on this subject, the opinion of the late most eminent physician Dr. Baillie, and in which he was supported by Drs. Pemberton and Tuthill, Sir Gilbert Blane, Sir Astley Cooper, and Mr. Carlisle.

"Seven years old," said Dr. Baillie, "is perhaps the earliest age at which

children should be employed in factories; and for the first year they should not be employed more than four or five hours a day; for the two succeeding years, six or seven hours a day; and afterwards they might be employed ten hours a day; and beyond that, in my opinion, there ought to be no increase of labour."

That there are extraordinary instances, in which more than the time here specified is passed in labour, is unquestionable; but these are too few in number, to disturb the general accuracy of Dr. Baillie's opinion.

Diseases arising from Exposure to Deleterious Fumes, &c.—Those most liable to be affected with it, and other Anomalous Diseases, &c.

The great and almost incredible number of individuals that are exposed to the influence of various deleterious fumes arising from minerals, such as mercury, lead, antimony, arsenic, all of which are readily vapourable by heat, lead us now to offer some observations on the diseases to which such workmen thus exposed are liable.

1. MERCURY, *and the Effects of Exposure to Mercurial Vapour.*

The workmen in silver mines, and the gilders of buttons and toys, are almost the only individuals sufficiently exposed to the fumes of this metal, to be affected by it. Still there is no doubt, that wherever any one is long occupied with mercury, the same diseases may occur.

One of the most common consequences of exposure to mercurial vapours, is a great increase of sensibility to cold. It is said by Dr. Gosse of Geneva, that the workmen employed in this mineral are so sensible to the variations of the atmosphere, that they may be compared to living barometers.

The workmen who employ quicksilver, are also subject to all those diseases to which the name latterly of pseudo-syphilis, or diseases resembling syphilis, has been given, viz. ulcerations of the mouth and fauces, eruptions, rheumatic pains in the limbs, and, in short, all the diseases which, in former times, were comprehended under the appellation of cachexia, or diseases proceeding from a bad habit of body, known by a depraved or vitiated state of the solids and fluids.—Terrible, however, as these disorders may appear, there is nothing peculiar in them consequent upon the manner in which they arise; they exhibit the same phenomena, are equally distressing, and equally obstinate, as when proceeding from the internal administration of mercury for the cure of lues.

The name of mercurial palsy has been assigned to the disease which seems more peculiar to the workmen who employ this metal; and this arises very seldom, if ever, from the exhibition of mercury as a medicine.

Mode of Attack and Symptoms of Mercurial Palsy, &c.

The attack of the mercurial palsy is sometimes sudden; its approaches, however, are more frequently very gradual: at first the workman has less controul than usual over his arms; these are subject to slight convulsive snatches; they become agitated, and at length they are in a continual state of tremor, which continues to increase in intensity if the individual still persist in his employment, and spreads from the arms, which it first attacks, to the legs, and finally to the whole body. The patient is unable to execute perfectly any of the functions which require a certain exertion of muscular power, such as locomotion, mastication, any labour of the hands, &c. To these sometimes succeed pains in the bowels, restlessness, anxiety, delirium, &c. The latter, after a time, appears to become more settled, and the patient will often live for twenty years, utterly unable to make any useful exertion from the tremor, although in other respects he may enjoy tolerable good health.

History of a Case of Mercurial Palsy, &c.

The following account of an instance of this disease, which occurred in a man of sixty-two years of age, and with whom it had endured twenty-five years, related in the London Medical Repository, will convey a better idea of it, than any more general description.

"At the time we saw him, all the voluntary muscles were violently agitated, so that every attempt to speak was interrupted by the spasmodic contractions of the jaw and tongue. His head was in a continual see-saw; he could not hold any thing in his hands, and seemed to have no power whatever over them. Any attempt to obtain any controul over his muscles invariably rendered the convulsions more violent. Mental agitation increased them. His teeth had been lost many years, but had fallen out without being decayed; his appetite was good, and his sleep sound. His evacuations were voluntary."

The disease, in this individual, it appears, had commenced after gilding one year, with a shaking in one knee, whence it had spread to the rest of the body. He continued, however, to work for seven years, but during that time was frequently obliged to take a glass of rum to keep his hands steady; "and he now finds his tremors less after taking more ale or spirits than usual; but when the

immediate effects of these are exhausted, the complaint is always much more aggravated."

Treatment of Mercurial Palsy.

Notwithstanding the length of time that the mercurial palsy has been known, we are still unacquainted with any treatment capable of removing it. The French, as usual, administer their ptisans, but without much benefit. In recent cases the paralytic trembling spontaneously subsides, provided the patient removes from the cause, *i. e.* the mercurial vapour. The late Dr. Lettsom thought sulphur was a specific against it; De Haen, a German physician, according to Dr. Bateman's reports of the diseases of London for 1812, placed much confidence in electricity; and Mr. Pearson says, " that a free exposure to the open air during a dry state of the atmosphere, whether hot or cold, is, on the whole, the most effectual mode of depurating the habit from a mercurial impregnation." The Cavalier Sementini (in the 11th volume of the *Giornale di Physica)*, has related five instances of the successful treatment of this disease by the nitrate of silver. He began by administering the eighth part of a grain; and by the time three grains a day were given, the good effects it produced were manifest; and in twenty days more the patient was perfectly cured. Although this remedy has not been employed in this country, it is nevertheless presumed that the most effectual, as well as the most certain means of curing or palliating this disorder, is to remove entirely from the influence of the mercurial vapour: the individual, at the same time, should the effects of the disease wear off, ought not, if he can possibly avoid it, to resume the same occupation, from his liability to a relapse.

As far as regards button-gilding, the treatment of the disease arising from the materials used in that process, has been tolerably complete; and where this has not proved to be the case, it may be attributed to the inaccuracy of the apparatus, and the carelessness of the workmen, rather than from any defect in the principle of operation. In order, therefore, to explain this subject, we shall present our readers with some notion of the process of gilding, in which there may be some trifling difference in different work-shops, but not of any material consequence, as relates to the minutiæ of the art.

The following account, which we extract from a re-

spectable and well-conducted Medical Journal*, is taken, on that authority, from the inspection of two extensive manufactories, one a button, and the other a gilt-toy maker.

Dangerous Parts of the Process of Gilding, &c.—Its pernicious Effects, &c.—Particular Cautions to Gilders, &c.

"There are two parts of the process which are attended with danger from mercury, but in very different degrees. The first, and least injurious, and perhaps not at all injurious, if the workmen are clean in their habits, is the application of the amalgam to the metal. This, which consists of gold and quicksilver, is thrown into a small quantity of the solution of mercury in nitric acid, in button-gilding, and the buttons are stirred in it; in toy-gilding, the amalgam is generally diffused with a brush. As little, if any, of the quicksilver is vapoured during this process, the principal danger arises from the workmen unnecessarily touching the materials with the naked hand, and not exerting sufficient care to make thorough ablutions before taking their meals.

"The next process, which consists in driving off the mercury by heat, is highly dangerous, in the old and common method of gilding. This, which is technically named cap-and-pan gilding, is effected over an open stove fire. The articles are placed in a common frying-pan, and every now and then are taken off and shaken in an old hat. During the whole of this time the mercury is very imperfectly carried up the chimney, and, consequently, its fumes reach the workmen, more especially when the materials are in the hat. This plan is chiefly now followed in the gilding of toys; but in button-gilding, an apparatus has for some time been employed, to which, if well executed, it seems scarcely possible to add any thing. For this purpose the buttons are enclosed in an open wire cylinder, which is then introduced into another cylinder formed of iron, communicating with a flue, and placed over a stove. At the entrance are folding-doors, with a small opening for the iron rod, which passes through the wire cylinder, to rest upon, and which has likewise a support at the opposite end, so that it may be resolved within the iron cylinder by the workmen. The latter commonly stand several feet distant from the stove.

* See London Medical Repository, p. 71.

When this apparatus is properly made, the draught of air is very great, and it seems scarcely possible for those employed to be at all subjected to the fumes of the mercury; and we believe that it very rarely happens that the workmen become disordered where it is used. It is somewhat unfortunate, that the same plan cannot be employed in toy-gilding, or that it is not; for we confess we are not ourselves aware of any real well-founded objection to it. Even, however, when the old method is employed, there is great reason to believe that the serious evils attending, arise, for the most part, from the carelessness of the gilders themselves.

"As some corroboration of this opinion, we may state, that we have just seen a gilder, who has now been in the business for thirty-eight years, and the greatest part of this period he worked at a common stove, but without experiencing a single inconvenience during the whole time. His appearance was remarkably cleanly; and being an intelligent man, we asked him the principal source of the mercurial tremors; and he answered, the careless and uncleanly habits of those employed. He himself had always been accustomed to frequent ablutions, and had never eaten without this precaution. This instance does not, of course, prove that the evil effects of the mercurial vapours can always be avoided by these means; but the observation of most manufacturers might be cited, in proof of the workmen usually neglecting them."

Diseases of Gilders described—Cases recorded—Cure effected by a Decoction of the Roots of the Burnet, Saxifrage, &c.

Ramazini, a physician of Padua, who wrote a book on the diseases of artificers some seventy years ago, draws the following frightful picture of the diseases to which gilders are liable.

"If we turn our view," says he, "from the mines, and the heating, melting, and refining work-houses, to towns and cities, here we also meet with workmen who suffer by the influence of minerals. It is well known what dismal calamities are inflicted by quicksilver upon goldsmiths, and chiefly those who are employed in gilding silver or brass work; for, as this gilding cannot be performed without amalgamation, so, when they afterwards come to dislodge the mercury by fire, though they turn away their faces, they cannot possibly avoid receiving some poisonous steams at the mouth; and accordingly we find that this sort of workmen quickly become asthmatic, paralytic, and liable to vertigoes; and their aspect becomes cadaverous and ghastly. Few such workmen continue in that way to old age; or, if they do not die soon, their condition becomes so miserable, that death is preferable to life. Their neck and hands tremble, their teeth fall out, their legs are weak, and afflicted with the scurvy."

Instances, in fact, are on record, where a gold-refiner, in gilding some silver plate, was so affected by the mercurial vapour, that he became stupid, deaf, and dumb; and of another who was struck with a palsy, from imprudently exposing himself to the vaporisation of mercury. Another again, of a German, who got his living by gilding plate, who, in consequence of managing the steam arising from the mercury with less caution than usual, "fell into a dismal vertigo, with a violent difficulty of breathing, a ghastly countenance, a lowness of pulse, and trembling of the joints, insomuch, that every one thought he was expiring; but was cured after all by sweats, procured with several alexipharmical prescriptions, and especially the decoction of the roots of burnet and saxifrage."

Remarks on the Treatment of these Diseases, &c.

To correct the effects produced by the inhalation of the fumes of mercury, as well as to prevent them from taking place, we have already observed, that avoiding the cause, either wholly or as much as possible, will be found to be the surest means of averting their serious consequences. Poterius, in his Pharmacopœia Spagyrica, recommends sublimated sulphur infused in wine. Purgatives are also necessary; as well as antimonials, to promote perspiration. Cordial spirituous waters, or even brandy, or diluted alcohol; decoctions of the blessed thistle, and the like, are reckoned more effectual than the distilled waters. Bleeding would prove injurious, from its sedative effect on the body, which requires rather to be stimulated.

We are told by Pliny, that the ancients, in working in the lead and silver mines, used to tie bladders upon their faces, to guard against the effects of these minerals: if, therefore, masks of glass, or other equivalent materials, could be invented for the same purpose, they might go a great length in arresting the ravages committed upon that portion of the human race destined to labour among these deleterious products of nature, until such employments be rendered more safe by means of an apparatus calculated effectually to destroy or obviate the noxious fumes as they arise.—*(To be continued).*

PRESCRIPTIONS.

ELECTUARY

In Winter Cough, and Humid Asthma.

Take Flour of sulphur, - - - 1 ounce.
Powdered nutmeg, - - - 1½ drachm.
Senna, - - } of each, 2 drachms.
Ginger, - - }
Honey, the best, - - - 2 ounces.

Make an electuary: the size of a nutmeg to be taken every day.—BOERHAAVE.

Humid asthma, is when there is a sufficient degree of expectoration; which in dry asthma is wanting. In plethoric habits, the countenance is flushed and tinged during the fit; but in others, rather pale and shrunk.

*** This prescription was sent by the celebrated Boerhaave to Lord Ferrars, and has been found an excellent remedy in the above complaints.

In Dry Asthma.

Take Camphor mixture, - - - - 5 ounces.
Camphorated tincture of opium *(paregoric elixir)*, - 6 drachms.
Compound spirit of vitriolated ether *(Hoffman's anodyne)*, 2 drachms.
Mix.—Take three table spoonfuls three times a day, or every third or fourth hour. BAILLIE.

In Shortness of Breath, or Difficult Breathing.

Take Vitriolated spirits of ether, - - 1 ounce.
Camphor, - - - 12 grains.

Make a solution, of which take a tea spoonful during the paroxysm.—BAILLIE.

*** This has often been found to afford instantaneous relief in difficulty of breathing, depending on internal diseases, and other causes, where the patient, from a very quick and laborious breathing, is obliged to be in an erect posture.

"TOM" PAINE ON THE YELLOW FEVER.

PLAGIARISM OF DR. MILLER, OF NEW-YORK, AND OTHERS, &c.

WITH the political merits of Mr. Thomas Paine we have nothing to do; yet in justice to his memory as a philosopher, it would argue little in favour of our Common Sense, as impartial observers and commentators, although no admirers of the "Rights of Man," were we to deny the man his rights, particularly in the present age of reason, when genuine merit ought to soar conspicuously above prejudice, however unreasonable in other respects the age may be.

The pamphlet whence the following paragraphs are

extracted, was, we believe, at least ostensibly, published some years ago by Mr. Rickman; and we trust that the subject it embraces is of such important interest, particularly at the present moment, as not to be unacceptable to the general reader and enquirer*.

The yellow fever has of late years, it is well known, prevailed throughout several colonies in the West Indies, and over a great portion of the American Continent, from which places it extended in a short period to the southern parts of Europe, nearly equalling the plague in its devastations. Many different and conflicting opinions have prevailed relative to its origin; some supposing it to have been introduced into the West Indies; and others, that it took its rise from the exposure of putrid animal and vegetable substances on the public wharfs of the city of Philadelphia; which latter opinion is strongly supported by Dr. Rush, as he also found that the streets adjoining these wharfs, were the first in which the disease made its appearance, and that in several instances it could be clearly traced from thence to other parts of the city. And Dr. Miller, of New York, informs us, or rather he repeats the observations of Paine, that the yellow fever in America, always begins in the lowest part of a populous mercantile town near the water, and remains there without affecting much the higher parts. It rages more where large quantities of new ground have been made by banking out rivers, for the purpose of constructing wharfs. The appearance and prevalence of yellow fever in low situations, he tell us (Dr. M.) have led to the belief, that the disease was imported by ships from the West Indies. But that a person seized with this fever in an affected part of the town, and conveyed to one that is healthy, or carried into the country, does not communicate it to the neighbourhood, nor to those immediately around them.

"Tom" Paine's Preliminary Observations.

"A great deal," says Paine, "has been written respecting the yellow fever, first, with respect to its cause, whether domestic or imported. Secondly, on the mode of treating it.

"What I am going to suggest in this Essay, is to ascertain some point to begin at, in order to arrive at the cause, and for this purpose some preliminary observations are necessary.

---

* The quarantine laws, and the contagious or non-contagious properties of the yellow fever, brought forward by Lord Darnley, are at the present moment under discussion before the House of Commons.

"The yellow fever always begins in the lowest part of a populous mercantile town, near the water, and continues there, without affecting the higher parts. The sphere or circuit it acts in is small, and it rages most where large quantities of new ground have been made by banking out the river, for the purpose of making wharfs. The appearance and prevalence of the yellow fever in these places, being those where vessels arrive from the West Indies, has caused the belief, that the yellow fever was imported from thence: but here are two cases, acting in the same place: the one, the condition of the ground at the wharfs, which being new made on the muddy and filthy bottom of the river, is different from the natural condition of the ground in the higher parts of the city, and consequently subject to produce a different kind of effluvia or vapour: the other case is the arrival of vessels from the West Indies.

"In the State of Jersey, neither of these cases has taken place; no shipping arrive there, and consequently there has been no embankment for the purpose of wharfs, and the yellow fever has never broke out in Jersey. This, however, does not decide the point, as to the immediate cause of the fever; but it shews that this species of fever is not common to the country in its natural state; and I believe the same was the case in the West Indies, before embankments began, for the purpose of making wharfs, which always alter the natural condition of the ground; no old history, that I know of, mentions such a disorder as the yellow fever."

We have not heard much of Dr. Miller, but our opinion, had we ever formed one of him, would assuredly have suffered considerable abatement, on discovering that he had appropriated the opinions of the republican Tom Paine, without deigning to acknowledge the source of his information. The following paragraph in particular, will verify our charge. Dr. Miller, however, does not stand alone for want of originality of conception on the same subject. Dr. Bancroft confirms the opinion of impure effluvia first broached by our author; and every other writer on yellow fever, has equally appropriated more or less of Tom Paine's observations to himself. Dr. Miller has seized upon them wholesale.

In Dr. Thomas's very exuberant and verbose practice of physic (see yellow fever), the same speculations (we were nearly saying peculations), are also retailed and detailed, with all the *modesty* of originality, and with the no less assurance of actual experience.

"Tom" Paine's Observations continued.

"A person seized with the yellow fever in an affected part of the town, and brought into the healthy part, or into the country,

and among healthy persons, does not communicate it to the neighbourhood, or to those immediately around him: why then are we to suppose that it can be brought from the West Indies, a distance of more than a thousand miles, since we see it cannot be carried from one town to another, nor from one part of another at home?—Is it in the air?—This question on the case requires a minute examination. In the first place, the difference between air and wind is the same as between a stream of water and a standing water. A stream of water, is water in motion; and wind, is air in motion. In a gentle breeze, the whole body of air, as far as the breeze extends, moves at the rate of seven or eight miles an hour; in a high wind, at the rate of seventy, eighty, or an hundred miles an hour: when we see the shadow of a cloud gliding on the surface of the ground, we see the rate at which the air moves, and it must be a good trotting horse that can keep pace with the shadow, even in a gentle breeze; consequently a body of air, that is in and over any place of the same extent as the affected part of a city may be, will, in the space of an hour, even at the moderate rate I speak of, be moved seven or eight miles to leeward, and its place in and over the city will be supplied by a new body of air coming from a healthy part, seven or eight miles distant the contrary way, and then on in continual succession. The disorder, therefore, is not in the air, considered in its natural state, and never stationary. This leads to another consideration of the case.

Paine's Theory of the Cause of Yellow Fever.

"An impure effluvia, arising from some cause in the ground, in the manner that fermenting liquors produce an effluvia near its surface, that is fatal to life, will become mixed with the air contiguous to it, and as fast as that body of air moves off, it will impregnate every succeeding body of air, however pure it may be, when it arrives at the place.

"The result from this state of the case is, that the impure air, or vapour, that generates the yellow fever, issues from the earth, or ground raised on the filthy and muddy bottom of the river, and which impregnates every fresh body of air that comes over the place, in like manner as air becomes heated when it approaches or passes over fire, or becomes offensive in smell when it approaches or passes over a body of corrupt vegetable or animal matter, in a state of putrefaction.

"The muddy bottom of rivers contains great quantities of impure, often inflammable air (carburretted hydrogen gas), injurious to life; and which remains entangled in the mud till let loose from thence by some accident. This air is produced by the dissolution and decomposition of any combustible matter falling into the water, and sinking into the mud."

"Tom" Paine here illustrates his observations, with the account of several experiments made in the presence

of Generals Washington and Lincoln, by disturbing the mud in a river, and collecting the gas thereby evolved, which, with the conclusions deduced, we shall reserve for another article on the subject of yellow fever, when some important remarks will subsequently be made, relative to the prevention and treatment of this formidable disease, for the benefit of those who may be about to change climate. In the mean time, may "Tom's" bones rest in peace, be they either in the possession of Cobbett, or, what is still more probable, silently imbedded in that soil which, in the language of his eulogistic friends, "is indebted for almost every blessing she knows, to HIS labours and exertions."

HISTORY OF EMETICS.

SUBSTANCES capable of exciting vomiting, independently of any effort arising from the mere quantity of matter introduced into the stomach, or of any nauseous taste or flavour, are called emetics. The susceptibility of vomiting is very differently modified in different individuals, and is often considerably varied by disease.

Emetics are employed in many diseases. When any morbid affection depends upon, or is connected with, over-distention of the stomach, or the presence of acrid indigestible matters, vomiting gives speedy relief. Hence their utility in impaired appetite, acidity in the stomach, in intoxication, and when poison has been swallowed: they are serviceable in jaundice, arising from calculi obstructing the course of the bile in the biliary ducts; in catarrh and phthisis, their utility is obvious; in dysentery; at the commencement of different varieties of febrile affections. They are useful in nauseating doses, in stopping hemorrhages, in dropsies, &c. &c.

The operation of emetics is dangerous, or hurtful, in the following cases; namely, where there is a determination of blood to the head, especially in plethoric habits; in visceral inflammation; in the advanced state of pregnancy; in hernia, and prolapsus uteri; and wherever there exists extreme general debility.

The frequent use of emetics weakens the tone of the stomach.

An emetic should always be administered in the fluid form. Its operation may be promoted by drinking any

tepid diluent, or bitter infusion, as that of camomile flowers, &c.

Principal Emetics, given with the intention of producing quick and full Vomiting.

	Dose.
Copper, sulphate of - - -	gr. $\frac{1}{4}$ to v. even, in cases of poison, to xv. grs.
—— vitriolated - - -	gr. j. to iij.
Ipecacuanha, powder of -	grs. x. to ʒss. with tartarized antimony, gr. j.
Tartarized antimony - - -	gr. $\frac{1}{8}$ to iij.
Sulphate of zinc - - - -	grs. x. to ʒss.

*** The influence of emetics over the human body, appears to be so manifold and extensive, that they may be justly reckoned amongst the most powerful instruments which the Materia Medica supplies.—*New London Medical Pocket-Book, for the use of Clergymen, Heads of Families, &c.* p. 120.

GENERAL RULES FOR THE PRESERVATION OF THE SIGHT; THE USE OF SPECTACLES, &c.

1. Never sit for any length of time in absolute gloom, or exposed to a blaze of light, and then remove to an opposite extreme.
2. Avoid reading a very small print.
3. Never read by twilight nor by fire-light, nor, if the eyes are disordered, by candle-light.
4. Do not permit the eye to dwell on glaring objects, particularly on first awaking in a morning.
5. Long-sighted persons should accustom themselves to read with rather less light, and somewhat nearer to the eye, than is naturally agreeable; while the short-sighted should habituate themselves to read with the book as far off as possible.
6. Nothing preserves the sight longer than a moderate degree of light; too little strains the eyes, and too great a quantity dazzles and inflames them.
7. Do not wear other spectacles than your own, to which your eyes have accommodated themselves.

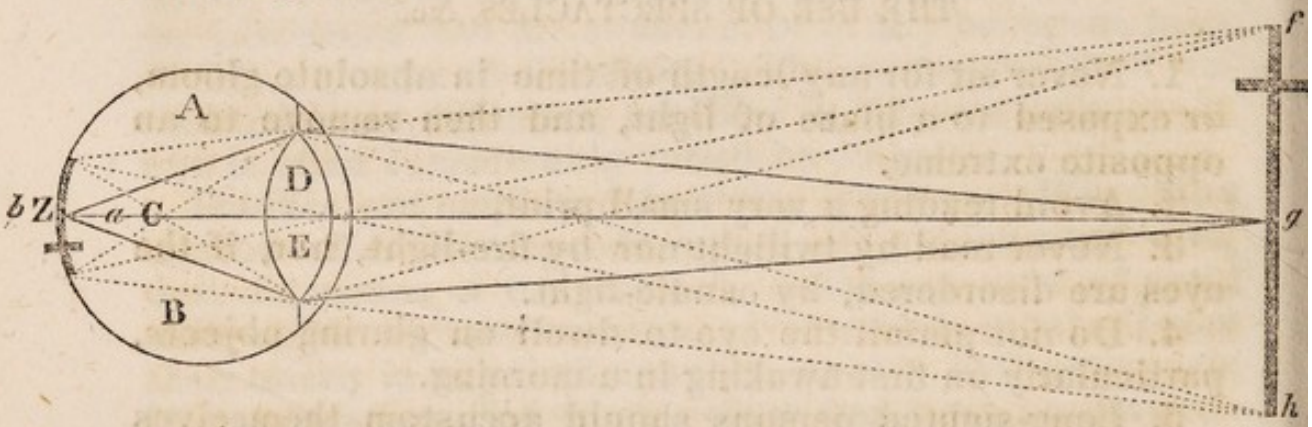
Philosophical Observations relative to Spectacles, &c.

By assisting the eyes to converge the rays of light, spectacles restore and preserve to us one of the most noble and valuable of our senses. They enable the mechanic to continue his labours and earn his subsistence till the extreme of old age. The scholar, by their aid,

pursues his studies, and recreates his mind with intellectual pleasures; thus passing away days and years with delight and satisfaction, which might otherwise have been devoured in gloomy melancholy, or wasted in idleness.

Optical Remarks, Illustrative and Experimental.

It is necessary here to observe, that every eye has its particular *focus*, or certain fixed point, where, by its refracting power, the images of all external objects are formed. This is usually formed on that part of the eye called the *retina* (the third and innermost membrane of the eye, and the true organ of vision); and whenever it happens otherwise, the eye is then said to be defective in the formation of the crystalline humour; and as in some of these the images of objects do not reach the retina, which is the case in short-sighted persons—a deficiency which is easily supplied by means of concave or convex glasses.



Explanation.—The progress of the rays of light proceeding from an object, is described in the annexed diagram, where A B C represent the eye, and D E the crystalline humour. Suppose *f h* an object placed before it, emitting pencils of rays from its several points *f g h*, which rays, by the refracting powers of the humours contained in the eye, are made to converge, and meet together in a focus at Z, a point in the retina; by which means, an image of the object *h g f*, will be found there; although, in consequence of the rays of light crossing each other, it will be inverted. This is proved by experiment; for, if the back part of the eye be cut away, and a paper applied there, the image of external objects placed upon it, will be seen, and very distinctly, provided no light be suffered to fall upon the paper, except that which passes through the humours of the eye.

This is the more easily explained by the camera obscura, which is a contrivance to exhibit the representation of such objects as may be seen from a window, upon a plain white surface held before the window within the room. For this purpose, a convex lens must be fixed in a hole in the window shutter; and then, if no light be suffered to enter the room but what passes through the hole, and a sheet of white paper is held opposite to the hole, at such a distance that the rays proceeding from the object abroad, and passing through the glass, may be collected into their respective foci, we have the images of all the objects which lay before the hole, represented upon the paper, inverted, but in a much more lively and exact manner than can be done even by the pencil; and not only the objects, and their situation, but, what is peculiar to this sort of painting, their motion, will also be expressed.

Directions to be observed in the Choice of Spectacles.—When Spectacles are necessary, &c.

Those spectacles are best, which are the least convex of any that will suit the eye. For as they cannot be put close to the eye, the pictures of objects upon the retina are less magnified; they also oblige the eye to that conformation of its coats and humours, which is requisite for seeing objects as near as it can, and, consequently, may prevent the eye from growing more and more long-sighted; for when the picture upon the retina is very large, it need not be quite so distinct as when it is smaller, to convey an idea of the same number of parts of an object; consequently, the eye will be more at liberty to recede from that conformation which is proper for the glass, and to relapse into that to which it inclines, and which is only proper for seeing more remote objects. —Hence, then,

Spectacles are necessary,

1. When we are to remove small objects to an increased distance from the eye (the general indication of the decay of sight), to see them distinctly:
2. When we find it necessary to have more light than formerly; as, for instance, when we find ourselves placing the candle between the eye and the object:
3. When, on looking at, and attentively considering a near object, it becomes confused, and appears to have a kind of mist before it:

4. When the letters of a book run into one another, and become double and treble:

5. When the eyes are so fatigued by a little exercise, that we are obliged to shut them from time to time, and to relieve them by looking at different objects.

When any of these things come to pass, it will be prudent as well as necessary, to confess honestly that our eyes, the thermometer of age, require assistance from art, and without apology, to get the optician to suit a pair of spectacles to the proper focus.

For those who live far from large cities, the following methods of calculating the proper focus of glasses may prove convenient.

Rule for calculating the Focus of Convex Glasses.

Multiply the distance at which a person sees distinctly, by the distance at which he wishes to see, and divide the product by the difference between the said distances; the quotient is the desired focus.

Rule for Concave Glasses to read and write, for a Near-sighted Person.

Multiply the greatest distance at which the short-sighted sees distinctly with his naked eye, by the distance at which it is required he should see distinctly, by a concave glass, and divide the product by the difference between the said distances. If it is to see remote objects, the focus should be the same as that required for the distance of distinct vision.

In the choice of spectacles, less attention need be paid to their magnifying power, as to the circumstance of their agreeing best with our sight; that is, when they enable us, clearly and without exertion, to see at the same distance, in which we formerly were accustomed to read or work.

Remedy and Directions to Short-sighted People.

In the choice of spectacles, short-sighted people should choose a second glass, magnifying a little more than the other, but somewhat less distinct, yet so that it may not obscure the object. This is unpleasant at first, but the eyes in time become accustomed to it, and daily improve. If, after some time, less concave glasses be used, there is no doubt, that in the course of a few years, according to particular circumstances, the defect of short-sightedness may be gradually improved.

Secrets of Trade.—No. III.

G

GODBOLD'S VEGETABLE BALSAM.

No less than forty-two different vegetables, in the specification of the patent for this nostrum, are directed to be distilled, "for the purpose of extracting their essences, which are to be preserved separately, and apart from each other, in syrups, and are to be mixed with the following gums and drugs, viz. gum dragon, gum guiacum, gum arabic, gum Canada, these being dissolved in double-distilled vinegar, with a quantity of storax dissolved in spirits of wine and oil of cinnamon. It is to be bottled, and kept three years before it be fit to be administered for the cure of consumption or any asthmatic complaint."—It is hardly necessary to observe, that no such directions ever are, or indeed ever could be followed; in short, the "Balsam" is little else than simple oxymel. It is, however, not a little curious, that amongst the forty-two plants enumerated, there should be several which, on distillation, yield prussic acid, such as the bays. It is rather singular, that this accidental circumstance has not been noticed, and turned to account, by some of those worthy disciples of Esculapius who live by the credulity of mankind, and, as Falstaff expresses it, "Turn diseases to a commodity."

GODFREY'S CORDIAL.

The following receipt for this nostrum, was obtained from a wholesale druggist, who makes and sells many hundred dozen bottles in the course of a year. There are, however, several other formula for its preparation, but they are not essentially different.

"Infuse ten ounces of sassafras, and of the seeds of caraway, coriander, and anise, of each one ounce, in six pints of water; simmer the mixture until it be reduced to four pints; then add six pounds of treacle, and boil the whole for a few minutes; when it is cold, add three ounces of the tincture of opium."

*** The extensive and indiscriminate use of this nostrum in the nursery, is a subject of national opprobrium, and is equally considered so by foreign writers.—(Vide Fodéré's Legal Medicine, vol. iv. p. 22).

GODFREY'S SMELLING SALTS.

This highly pungent preparation is obtained by resubliming the common subcarbonate of ammonia with pearl-ash, and a proportion of rectified spirit. In this case, the subcarbonate of potass abstracts a fresh portion of carbonic acid from the ammoniacal salts. Its atomic composition has not yet been ascertained, but it will probably be found to consist of equal atoms of carbonic acid and ammonia.

GOLDEN SPIRITS OF SCURVY-GRASS.

This is merely a solution of camboge in the compound spirit of horse-radish.

GOUT TINCTURE (WILSON'S).

This is merely an infusion of *colchicum*, or meadow saffron, as satisfactorily proved by Dr. Williams of Ipswich. Since the discovery of colchicum being the active ingredient in the *eau medicinale* (medicinal water), numerous empirical remedies have started up, containing the principles of the plant in different forms. (See *Eau Medicinale d'Husson*, p. 110).

GOWLAND'S LOTION,

Is a solution of corrosive sublimate in an emulsion of bitter almonds, in the proportion of about one grain and a half of the former to an ounce of the latter. A solution of this mercurial salt in spirit of rosemary, is also sold as an empirical cosmetic.—The following is the recipe:

Take Bitter almonds,	- - - -	1 ounce.
Sugar,	- - - -	2 ounces.
Distilled water,	- - - -	2 pints.
Grind them well together, strain, and add		
Corrosive sublimate,	- - -	2 scruples,
Previously ground with		
Rectified spirits of wine,	- -	2 drachms.

Used as a wash in obstinate eruptions.

GREEN'S DROPS.

The basis of these also is corrosive sublimate.

POOR SETTLEMENT.

By 59 Geo. III. cap. 50, No settlement shall be acquired by renting any tenement, except a house or land, in the parish, of the actual annual value of 10*l.* to be hired and rented for one whole year.

Rural Economy.—No. II.

On Flooding Meadows.

From a long residence in Hampshire, we well know that the meadows in that county are considerably improved by flooding them, that is, stopping the water, when there happens to be an unusual quantity, from violent or long continued rains, and by means of trenches or gripes, conveying the surplus water so as to overflow them entirely, if possible; but we deny that, by this process, all *weeds* are destroyed, the use of *manure* superseded, or that *flote fescue grass* is immediately *begotten.* Although it is a constant practice with the farmers to flood their meadows in the winter, it is no less a constant practice, with such as wish to have good crops of grass, to manure them with dung or ashes. Flooding can no otherwise destroy weeds, than by altering the soil on which they grow; and if it destroys one set of weeds, it must certainly favour the growth of another. If those plants which thrive best in a dry situation, are destroyed by the alteration which now takes place in the soil, those which are fond of a moist situation will proportionably flourish. If the flote fescue grass was immediately produced by flooding, we should find all those meadows which have undergone this operation, to contain nothing but this kind of grass, whereas the richest and best meadows in Hants contain scarce a single blade of it. The fact is, this grass will not flourish in meadow land, unless you convert it into a bog or swamp; and I believe few landed gentlemen will think this an improvement, or thank Mr. Kent for giving them such a hint. (Grass on the best watered meadow is always less substantial than the pure natural grass; whence the utility of dry manures, more especially on watered soils of inferior quality).—*Curtis on British Grasses.*

Preservation of Game.

In preserves, and wherever it is an object to protect the game, great care ought to be taken to extirpate, if possible, the breed of vipers, snakes, and all vermin of the serpentine kind, which suck the eggs, and even destroy young pheasants and partridges. In warm and dry soils,

and particularly in dry seasons, these vermin, without always being suspected, have made great havoc among the game.

Animal Substances in Agriculture.

The young farmer should be sensible of the importance of animal substances, which are greatly preferable to all vegetable manures; many kinds being procurable in great cities. Curriers' shavings, woollen rags, hogs' hair, feathers, offals of butchers' and fishmongers' stalls and kennels, trotters, horn shavings, &c. &c. It should be received as a maxim, that all animal substances whatever make admirable manures, much better than any thing in the vegetable or fossil kingdoms; and this should not only direct him in the purchase of his manures, but also to be very attentive in preventing any such substances in his own house and farm being wasted: the compost dunghill should be the general receptacle of all such. Some of these substances, however, are sold at such high prices, that common dung is a better purchase. Compost of fish is excellent.

On Paring and Burning.

We feel as much desire and anxiety to get over this job, when begun, while the fine weather lasts, as we do to escape the effects of too much fire. The occurrence of much wet makes the job tedious, and the season may sometimes be lost, or thrown too backward for sowing our cole. The delay in spreading the ashes is, therefore, the consequence of our desire to get the pared slices burned; but we hold it as a good general caution, to have the ashes spread within a few days of the heaps being thoroughly burned down.

There is, however, one thing which deceives many of us. When we begin to heap and fire the first side, the earth is yet moist below (suppose the middle of May); but before we get over fifteen or twenty acres, a fortnight of drought makes a great difference; we examine the first side a few days after it is burned, but find very little fire below the ashes; by this temptation to let the others lie, that the heaping and firing may be completed, the fire drops in the middle part of the field, and occasions much expence and trouble. Perhaps it might be too much to say, that closely spreading and future care would always be a preventive of mischief, but generally it would succeed.

When we have put a paring plough, or two, or three, according to business, to work, we are accosted by labourers, who are desirous to heap and burn the slices by the acre. Being taken, and fit to begin on, the people work almost night and day, to get on with the heaping and firing. We article with them to *spread the ashes* when *we* please; but they generally article, *not to be bound to extinguish the fires,* otherwise, they must have a different price, by running the risk of weather longer, and having more labour to perform.

In some cases, we work a second tilth by paring the field the cross way, but this depends on circumstances and seasons; for sometimes our *hay* calls us, and sometimes the season is too far spent at the end of the first operation. If time and economy would always allow, I believe the second tilth ought never to be omitted; but sometimes if we did it, we should have no cole, by losing the season, especially if favourable rains then tempt us to sow, which would, of course, delay the second burning. I have known this cross ploughing, and working with harrows and roll, to have great effect in putting the fire entirely out in some parts of the field, more heathy and dry than others; though nothing that we could do before would extinguish it. I believe it would be a good general rule to pare and burn as early in May as possible, and follow the burning with another tilth as above. But many persons choose to eat off first a good spring bite of grass, and defer paring to the first of June. In this case, some soils, I mean some fields, with us more than others are dangerous to handle; and if the weather set in very dry, a good deal of mischief may ensue, because, in some instances, I believe, no spreading of ashes, nor other means at present in use, can stop the fire.—*Farmer's Journal.*

Directions for Preserving the Buds of Fruit-Trees for Conveyance.

Mr. Knight, in the Trans. Hortic. Society, states that, in conjunction with Sir C. Monck, he made some experiments to discover the most eligible mode of transferring buds from one part of the kingdom to another, the result of which was satisfactory. "It has led me," says Mr. K. "to adopt a better mode of using buds which have become somewhat withered, than I previously knew. Several different methods of packing buds were tried; but

the following, which was first adopted by Sir Charles Monck, having proved to be at once the most efficient and most easy of execution, it is useless to describe any other. The leaf-stalks of the buds were reduced to a very short length, and the young branch was then enclosed in a double fold of cabbage leaf, bound close together at each end, and enclosed in a letter. It was found advantageous to place the lower surface of the cabbage leaf inwards, by which the enclosed branch was supplied with humidity, that being the perspirating surface of the leaf, and the other surface being nearly or wholly impervious to moisture. I did not usually receive the buds from Belsay-castle, the seat of Sir Charles Monck, in Northumberland, in less than five or six days, and the leaf-stalk had then often parted from the buds, and the bark could not very readily be detached from the wood. The latter substance was therefore suffered to remain; but it was pared very thin, particularly such part of it as extended above the bud; and as the loss of the leaf-stalk deprived me of the usual method of holding the bud, I found it necessary to suffer that to remain attached to the branch above it, or to a part of it, till I had placed the bud in its proper position; it was then severed from the branch with a sharp knife, and the bud almost always succeeded as well as one recently taken from the tree would have done."—*New Monthly Mag.*

Observations on Eggs, and the Fecundity of Hens.

December 7th.—Half-bred Poland hen matched with the cock; began to lay on the 28th. On March 1, 1806, she had laid fifty-six eggs, and afterwards sat over twelve eggs. After incubation had commenced, she laid two eggs, making a total of fifty-eight, which two were withdrawn. Her eggs, unbroken, weighed from one ounce three quarters to two ounces each, amounting, at one ounce and three quarters each, to nearly seven pounds avoirdupois. I had, from motives of curiosity, deducted the weight of the shells, but the memorandum is lost. The eggs of another hen, in poor condition and ill fed, were small, light, and the yolk unsubstantial; the same hen, after good feeding, laid plenty of eggs of larger size, and nearly double the weight. The largest eggs will weigh two ounces and a half, those of the Chittagong hen, perhaps, three ounces. To promote fecundity and great laying in the hen, nothing more is necessary than

the best corn and fair water; but malted or sprouted barley has occasionally a good effect, whilst the hens are kept on solid corn; but if continued too long, they are apt to scour. Cordial horse-ball is good to promote laying in the cold season, and toast and ale, as every housewife well knows.—*Moubray on Poultry.*

Virtues of the Potatoe.

In 1807, Mrs. Morris, of Union-street, near the Middlesex Hospital, discovered* that the liquor obtained in the process of making potatoe starch, would clean silk, woollen, or cotton goods, without damage to the texture or colour. It is also good for cleaning painted wainscots; and the white *fecula*, the substance of which potatoe starch is made, she says, will answer the purpose of tapioca, and will make a nourishing food with soup or milk. It is known to make the best *souffles*, and has within these last few months been introduced at the foreign oil-shops as a new article, under the name of *Fècule de Pomme de Terre*, for which they modestly charge four shillings per pound. Potatoes boiled down to a pulp, and passed through a sieve, form a strong nutritious gruel, that may be given to calves as well as pigs, with great advantage, and saving of milk. A size is made from potatoes, which has great advantages over the common size, for the purpose of whitewashing, as it does not smell, and it has also a more durable whiteness. The most simple, and perhaps the most wholesome way of boiling potatoes, is in an untinned iron pot or saucepan; when boiled, pour off the water, and let them continue over a gentle fire; the heat of the fire will cause the moisture to evaporate, and dry the potatoe fit for the table.

Means to Destroy Turnip-Fly, or Beetle.

For the destruction or putting to flight of this voracious insect, the old remedy of lime, it seems, has lately been revived, and it is said with success. The method is, to repeat strewing of fresh slacked lime upon the young plants daily, or even twice a day. Upon drilled turnips this may be easily enough practised, and the lime may not only preserve them from the fly and slug temporarily,

---

* For this discovery, Mrs. M. obtained the gold medal from the Society of Arts.

but shield them from the cold air, which is of far worse consequence than the fly. This plan, however, if our *recollection* be correct, will succeed only in slight cases, and when the blight is not excessive or continuous, in which case we know, from long practice, there can be no possible remedy, preventive or extemporaneous; and the cultivator can trust only to repeated sowings, and the expectation of a more genial atmosphere. All the numerous contrivances of trapping, fly catching, and dressing of seed, are purely amusing, proceeding from the imaginations of those who had not duly considered the subject. A cold northerly wind will assuredly overturn all these contrivances; the seed-leaf of the turnip being naturally unable to resist this *mal aria*, or blight, and, the instant it droops, becoming the lawful prey of its own proper beetle. On the other hand, with a genial south, or south-western air, this tender and infantine leaf is soon succeeded by a rough one, which defies the bite of the fly, and is out of the reach of the slug. The evolution of *gas* from prepared seed could obviously have only a temporary, or rather momentary effect.

Rules for the Collection and Payment of Tithes. By Mr. Mathew, of Tottenham.

Hay becomes titheable when in grass cocks, and is decided not to be so until once tedded; it is therefore necessary that the grass should be shook out in the usual way, and when collected into windrows from the grass cocks, it is then titheable. The usual method of setting out, is by agreeing first with the tithing-man where to commence; and then proceeding regularly to place a small bough, or something of the sort, upon every tenth cock; and as the tithing-man is entitled to the raking, in hay, though not in corn, you are compelled to rake round the tithe cock as much ground as, in your judgment, appears calculated to grow the grass contained thereon; and what is thus collected should be placed upon the cock, and then left to the tithing-man's sole management, with reasonable time for making the same. With me, it is usual to employ the same man through the season for that purpose; and as it is customary to throw the hay into beds, when the grass cocks are shook out, another man is appointed, whose place it is so to arrange the beds, as to bring them sufficiently separated from those allotted for the tithe. If this plan is adopted systematically, no trou-

ble, inconvenience, or expence is experienced by either party.

Wheat.—This crop is *strictly* titheable in sheaves, but generally so in shocks: and notice for tithing is mostly given previous to carting. The tithe of this crop is certainly the most easy to set out, when the shocks contain such an equal quantity of sheaves; and should any odd sheaves remain, the parson is entitled to his tithe of them as well as of the rest. The commencement of setting out must be, as in the case of hay, agreed upon between the parties interested. I have heard it asserted, that the tithing-man is bound to begin with the first shock on the right or left of the gate through which he enters the field; but I am inclined to doubt the existence of this custom; as in such cases, the farmer may make an arrangement in his own favour throughout the field, as was in the case of Stebbs *v.* Goodlock, when a custom was alledged, that the parson was to have every tenth land for the tithe of the corn; beginning upon such land as was nearest the church; and the occupiers, being aware of what land would be the parson's, in order to defraud him, omitted to till, manure, or sow his land, as they did their own. The Court held this to be a fraud, remediable by an action at law.

Rye—being garbed similar to wheat, is titheable in the same manner.

Clover Hay.—Much controversy and difference of opinion having prevailed respecting the setting out of this crop, a case was brought into the Court of Exchequer, where it was decided that the legal way of tithing clover hay, should be when put into cocks, the same as common hay.

Barley.—This crop is generally mown, and lays upon the swathe, till fit to be carted, when it is collected into heaps or shocks, and then becomes titheable, the same as other corn.

Oats—are sometimes garbed, in which case they can be tithed like wheat: but if not garbed, they must be tithed when put into heaps or shocks, like barley.

Peas and *Beans*—are titheable when garbed, like other corn, but when gathered green, are titheable by measure. If consumed in the grower's own family, they are not subject to the payment of tithes, unless by special endowments.

Tares—are considered, whether cut green or made into

hay, as ratorial tithes, being enumerated under the character of hay, and are titheable in the same manner; but as an opinion often prevails, that tares cut green and consumed by the grower's own horses are exempt, it is necessary to remark, that such is the case only where it can be proved that no other sustenance of that nature can be obtained. But before I conclude my observations upon this article, I think it requisite to remind the growers, that as the mode of cutting them green, and making them into bundles for the London markets, seldom admits of more than a load per day, it is proper that the tithing-man should be apprized of that intention: and it is his duty to be present, and take his tenth bundle or bundles, every morning, or at any other time you may think proper to cut.

Wood—under twenty years growth, is titheable; but a full description of the nature and quality of such as are exempt, would be much too extensive for my present limits; I therefore refer you to Totter, p. 62, 98, 100—118.

Method to prevent Hares and Rabbits barking young Plantations. By William Patterson, Esq. of Iborden, in Kent.

Hares, rabbits, and rats, have a natural antipathy to tar; but tar, though fluid, contracts, when exposed to the sun and air for a time, a great dryness, and a very binding quality; and, if applied to trees in its natural state, will occasion them to be bark-bound. To remove this difficulty, tar is of so strong a savour, that a small quantity, mixed with other things in their nature open and loose, will give the whole mixture such a degree of its own taste and smell, as will prevent hares, &c. touching what it is applied to.

Take any quantity of tar, and six or seven times as much grease, stirring and mixing them well together; with this composition brush the stems of young trees, as high as hares, &c. can reach; and it will effectually prevent their being barked. I believe, if a plantation of ash (which they are very fond of) were made in a rabbit-warren, this mixture would certainly preserve it.

They do great mischief among flowering shrubs, are particularly fond of Spanish broom, scorpion senna, and evergreen cytesus. I have had those shrubs cut down to a stump; but, as the mixture cannot be conveniently

applied to them, I have enclosed their branches with new tar twine, by putting it several times round the shrub, which has had the desired effect. Tar twine, however, by being exposed to the air and rain, will lose its smell; consequently must be renewed as occasion requires; but the mixture is always to be preferred, where it can be used.—*Trans. Philosoph. Society.*

Method of preserving Seeds when sown from Vermin. By Mr. Henry Brown, of Derby.

"I have made use of a very simple method for the last three years; in which time I have never lost a seed by vermin, although they have burrowed in a direct line with almost every row of pease and beans that have been sowed. It is nothing more than steeping the grain or seed, three or four hours, or a sufficient time for it to penetrate the skin, or husk, in a strong solution of liver of sulphur."

HEALTH, AN ALLEGORY.

BY THE LATE DR. COTTON.

HEALTH is reported to be the daughter of Temperance, and born in the golden age. Some are of opinion that she was descended, on the male side, from Exercise. But, by the best lights I could ever obtain in a matter of such antiquity and obscurity, I am inclined to think that this account of her genealogy is spurious. For Temperance was not so properly her mother, as nurse or guardian; one who had the tuition of her infancy, and was far advanced to a most important post, as shall hereafter be mentioned.

Whatever darkness, however, may attend her parental descent, yet all the annals agree in the following, viz. that her birth was celebrated with great pomp and ceremony; for the Graces visited her in person, and each would have adopted her for their own. This beautiful young virgin, though highly accomplished, was never fond of public appearance, which, it must be confessed, would be strange self-denial in the pretty goddesses of our days. Her principal delight was in the fields and woods, where Flora dressed her with the rose and the lily; and Diana frequently made her a companion in her sports. A nymph thus possessed of more than human accomplishments, was justly entitled to a throne; nor

was it long before she was invested with the sceptre, by the concurring voices and acclamations of the people. Her reign was long and prosperous, and her subjects were happy. Nor indeed could less be expected from a queen, that founded her government upon the unerring laws of nature, which were as obligatory upon herself as upon her people; nor could the royal authority itself dispense, at any time whatever, with a breach of those primary statutes.

Her first minister was Virtue, who had an unbounded ascendancy over her mistress. Beside this premier favourite, there was another, who was almost a constant associate of the queen. The name of this pretty sylvan was CHEERFULNESS. She was generally apparelled in green, of a mild and composed aspect, liable to have her features sometimes brightened by a smile. Many other virgins joined the train of this princess, and were adjudged to be of British extraction. There was INNOCENCE dressed in white, with a curious blush of crimson on her cheeks; she was handed along by PRUDENCE, who wore a good deal of solicitude in her countenance, and seemed to step with great caution. She was indeed an armed satellite, and had more of severity than sweetness in her brow. But there was a most beautiful, that justly challenged a particular description; a lady who so closely adhered to the white-robed fair, that it is said they were never seen apart. She had a most lovely serenity in her visage, and a softness not to be delineated by a human pen. The assistance of the imagination must here be called in, and the portrait wear an angel's face. Though she was highly admired by the gazing crowd, yet she seemed to borrow none of her happiness from the applauses and adoration of the multitude. It is further given out, that, fond as this lady was of the court of Health, she rarely makes her appearance in the courts and palaces of other monarchs; and the reason assigned, is her inseparable attachment to the female above-mentioned, who was arrayed in a garment of spotless white.

In process of time, there arose a powerful enemy to the queen—LUXURY, an absolute monarch, who proclaimed war against HEALTH. The armies of the former were principally Asiatics, and more numerous than those of Xerxes, which drank up whole rivers as they marched; or than those of the Macedonian madman, who conquered all but himself. Yet notwithstanding the number of the tyrant's

forces, HEALTH had never been subdued, had her subjects never listened to overtures of peace from the enemy; which, as you shall hear by and by, paved the way for the dissolution of the queen's happy government.

EXCESS led the armies of LUXURY into the field, and commanded the van; SICKNESS and PAIN were posted in the centre; POVERTY and PRIDE had the command of the wings; and REPENTANCE and DEATH brought up the rear.

HEALTH headed her own troops, and was supported by her two illustrious amazons, RESOLUTION and PRUDENCE. The latter drew up the forces with such matchless skill, that their corps were impenetrable by the enemy. Their helmets and coats of mail were tempered with so much art, that they were proof to the enemy's shot. Nor was the queen's army to be surprised at any time by a sudden invasion; for PRUDENCE had erected up and down several watch-towers, whence the motions of the adverse party were easily descried.

The dispute was long and doubtful; till at last, the enemy finding no success likely to ensue from open measures of hostility, had recourse to stratagem; for, sending PLEASURE as an ambassadress, to mediate between the two contending powers, this artful syren so insinuated herself into the favour of the queen's subjects, and sowed such discontent in their breast, that, being gradually won upon by her blandishments and corruptions, they at first began to murmur against the severity of the queen's discipline, and, by degrees relaxing of their allegiance, they at last revolted openly, and ran over to the enemy.

HEALTH being thus overpowered by her adversary, or rather deserted basely, through the treachery of her own subjects, withdrew from earth to heaven, and was speedily enrolled among the divinities; whence she continues to impart her benefits to those distinguished few, who wisely regulate their lives by her golden precepts, and hold no correspondence with LUXURY, or her partisans.

VESTRIES.

BY 59 Geo. III. cap. 85, Any person assessed to the poor rates, although such person shall not reside in the parish, may vote in vestry, according to the value of the premises rented.

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

(*Continued from* p. 128).

PALPITATION OF THE HEART—may proceed from some disease originating in the *heart* itself; or it may be a symptom of general debility:—when accompanied with quick and difficult breathing, after moderate exercise, and sallowness of the complexion, it marks chlorosis, or green sickness:—with irregular pulse, extreme anxiety, and frequent fits of suffocation, dropsy of the pericardium, or membrane enveloping the heart.

PAROXYSM, FEBRILE, returning repeatedly, after twenty-four hours intermission, distinguishes the *quotidian*, or daily ague:—returning after an intermission of forty-eight hours, the *tertian*, or third day ague:—and after an intermission of seventy-two hours, the *quartain*, or fourth-day ague.

PULSE.—Quick pulse, succeeding to cold shivering, and accompanied by heat, shews the existence of fever: a quick, hard, and strong pulse, accompanied with a greater degree of heat than is natural, points out *inflammatory fever*, or inflammation of a particular kind.—Hard, small, and quick pulse, is generally found with *inflammation of the stomach and bowels*.—A quick, small, and weak pulse, with extreme debility, in fevers, shews the fever to be of a malignant kind, and great danger to exist.

REDNESS OF THE SKIN, diffused with heat, and but little swelling, the skin only elevated as with a little roughness, distinguishes *erysipelas, or St. Anthony's fire:* redness of the cheeks, coming on with the hectic fever, marks *consumption*.

RESPIRATION, QUICK AND SHORT, with fever, and tightness across the chest, indicates *inflammation of the lungs:* short and quick respiration, pains in the side, chest, and fever, distinguish pleurisy. Difficult respiration coming on by fits, but without fever, marks an asthmatic affection: awaking the patient with considerable alarm, with weight across the chest, and swelling of the feet, points out *water in the chest*. Difficult respiration may also accompany inflammation of the liver, various affections of the heart and large vessels, disten-

sion of the bowels by wind, and the preternatural enlargement of any of the bowels. Snoring, and long respiration, with the appearance of deep sleep, distinguishes apoplexy. In all fevers, difficult respiration is a bad symptom.

RIGIDITY at the side of the face, and back of the neck, and difficulty of swallowing, are the first symptoms of a *locked jaw.*

SHIVERING is the first symptom of every *febrile* or *inflammatory* disease. In fevers, not succeeded by increase of heat and sweat, it is an unfavourable symptom. When it occurs in the latter stages of fever, the patient being very low and weak, it is also an unfavourable sign. Accompanied with delirium, following intoxication, threatens a dangerous affection of the brain. After violent inflammation, shivering shews that suppuration has taken place. In the small-pox, shivering occurring about the ninth day, the skin appearing shrunk, and the pustules flattening, and becoming pale at their bases, shows danger.

SICKNESS occurring after having been in the chamber of a person in fever, sometimes marks the first impression of infection, requiring the immediate employment of an emetic. Sickness accompanied with pain at the stomach, heartburn, and loss of appetite, shews the weakness of the stomach.

SIGHING, frequent, in fevers, is a bad symptom.

Horticulture.

MAY.

THE KITCHEN-GARDEN.—The general principal crops having been sowed and planted in the spring, they will now want weeding, hoeing, thinning, and some pricking out and transplanting; and several successional crops are necessary to be sowed and planted, and some main crops for autumn and winter.

Sowing and planting—is necessary now for several successional summer crops, and some full crops for autumn and winter supply; mostly all in the natural ground, and some in hot-beds.

FRUIT-GARDEN AND ORCHARD.—Having finished all

planting and winter pruning in the different sorts of fruit trees, the preceding months, and as the wall and espalier trees will now be advancing in numerous young shoots, the principal business at this time is to commence the summer pruning, by removing the ill-placed and superabundant productions, and to give occasional watering to late planted trees.

The pruning—principally required at this season, and all summer, is chiefly in wall-trees and espaliers: not so generally necessary in standards.

Summer pruning.—Begin in early shooting wall-trees, by disbudding the improper and superabundant young shoots of the year.

Flower-Garden and Pleasure-Ground.—As in the preceding spring months, the several compartments of the flower-garden and pleasure-ground having been mostly furnished with the principal supplies of seeds, plants, shrubs, and trees, that were wanted, the principal care now is to keep the beds, borders, shrubberies, &c. clean from weeds, watering some late-planted articles; also to keep the walks, lawns, &c. in neat order. Annuals may be transplanted from hot-beds, and warm borders; others in the borders may be thinned, and some sowed; likewise some sorts of small, or moderate-shooting perennials or biennials, may still be removed with balls, and planted occasionally, for flowering the same year.

Work in the Nursery.—Having in the preceding spring months finished all principal planting for this season until the following autumn; as likewise the general business of propagation by seeds, layers, cuttings, suckers, and grafting; together with all the necessary work of digging, &c. the business now in the nursery consists principally in keeping the ground and plants clear from weeds, and in giving occasional waterings to new planted young trees, seed-beds, pots, &c. and sometimes shading from the sun some particular sorts of small seedling plants in beds and pots; some occasional pruning and propagating, and some other necessary works of culture.

The Green-House.—The green-house exotics continue mostly under shelter till (m. 1.), but must have plenty of air daily, frequent waterings, some shifted into larger pots, and others fresh earthed.

Give air—freely now to the green-house plants, by

opening the glasses almost fully every warm day, and shutting them in cold nights; but when warm (m. l.), continue them open all night, to inure the plants now by degrees to the full air.

HOT-HOUSE AND STOVE.—Continue still a proper regular heat in the hot-house, by means of a constant bark-bed, and moderate fires in cold evenings and mornings; though fire-heat may be entirely discontinued, if warm weather.

Useful Memoranda.—No. I.

Comparative Health and Population in England.

SIR GILBERT BLANE lately published the following remarks on the comparative health and population of England, at different periods. The annual mortality of London, in the year 1700, was one in twenty-five; in 1750, one in twenty-one; in 1801, and the four preceding years, one in thirty-five; in 1810, one in thirty-eight; and in 1821, one in forty. Sir Gilbert conceives the causes of superior health to consist in the general improvement of the habits of life; in particular, with regard to ventillation and cleanliness; to a more ample supply of water, since the new water companies have been established; to greater abundance and better quality of food; to the improved state of medicine, and the superior management of children. A comparative improvement in salubrity has also occurred in other large towns, and throughout the country.

Masters and Servants.

By 4 Geo. IV. cap. 34, sect. 3, It is enacted, that if any servant in husbandry, or any artificer, calico printer, handicraftsman, miner, collier, keelman, pitman, glassman, potter, labourer, or other person, shall contract with any person to serve him for any time, or in any other manner, and shall not enter into or commence his or her service according to his or her contract (such contract being in writing, and signed by the contracting parties); or having entered into such service, shall absent himself or herself from his or her service before the term of his or her contract, (whether such contract shall be in writing, or not in writing), shall be completed, or neglect to fulfil the same, or be guilty of any other misconduct or misdemeanor in the execution thereof, or otherwise respecting the same;

then, and in every such case, it shall be lawful for any justice of the peace, upon complaint thereof made upon oath to him by the person or persons, or any of them, with whom such servant shall have so contracted, or by his, her, or their steward, manager, or agent, to issue his warrant for the apprehending every such servant, and to examine into the nature of the complaint; and if it shall appear to such justice that any such servant shall not have fulfilled such contract, or hath been guilty of any other misconduct or misdemeanor as aforesaid, it shall be lawful for such justice to commit every such person to the house of correction, there to remain and be held to hard labour for a reasonable time, not exceeding three months, and to abate a proportionable part of his or her wages, for such period as he or she shall be so confined, or, in lieu thereof, to punish the offender by abating the whole or any part of his or her wages, or to discharge such servant from his or her contract, service, or employment; which discharge shall be given under the hand and seal of such justice, gratis.

Management of Horses in case of Fire.

It is well known that, when a fire happens in a stable, such is the natural dread of the horse, that he cannot be prevailed on to move out of danger, but remains to his certain destruction. In this alarming case it has been recommended, and in a few instances practised with success, the opportunity of a few mitutes offering, to *blind* the horses with any cloths which can be suddenly laid hold on, and a bridle or halter also being put on, to *back* them out; for it seems, when these animals see or smell fire, they obstinately refuse to move forward, but may be forced backward. It is obvious that there are too many desperate cases, in which no opportunity can be had for this practice; on the other hand, during the hurry and confusion of a fire it may not occur, even when such an opportunity may be instantaneously present, whence it is worthy of memorandum and recollection.—*Adams's Horsemanship.*

Porter and Pewter Pots—Snuff and Tin-plate Boxes.

It was asserted some time ago, in a debate in the House of Commons, that porter tasted better out of a pewter vessel than any other, which occasioned a smile

among some of the members. Professor Davy has explained this on galvanic principles. This peculiarity arises from pewter being formed of dissimilar metals, which are known to communicate the influence of the galvanic fluid. Water has also a different taste in a pewter vessel from what it has in glass or earthenware. Volta found, that if a cup made of tin, or what is still better, zinc, be filled with water, and placed upon a silver stand, and the point of the tongue applied to the water, it is found quite insipid, till we lay hold of the silver support with the hand well moistened, when a distinct and strong acid taste will be perceived. From the same cause, Professor Robinson found that snuff taken from a box of tin plate, which has long been in use, so that the tin coating has been removed in many places, is extremely different from that of snuff taken from a new box, or one lined with tin foil.

List of Taxes.

Postage of Letters; Newspapers; Franks, &c. &c.—Letters, pay if single, from any post-office in England, to any place not exceeding 15 measured miles from such office, 5*d.*—Above 15, and not exceeding 30 miles, 6*d.*—Above 30, and not exceeding 50 miles, 7*d.*—Above 50, and not exceeding 80 miles, 8*d.*—Above 80, and not exceeding 120 miles, 9*d.*—Above 120, and not exceeding 170 miles, 10*d.*—Above 170, and not exceeding 230 miles, 11*d.*—Above 230, and not exceeding 300 miles, 12*d.*—Above 300, and not exceeding 400 miles, 13*d.*—Above 400, for every 100 miles, or part thereof, 1*d.*

Letters between England and Ireland pay, over and above the commom rates, a packet postage, viz. for every single letter, 3*d.*—Double, 4*d.*—Treble, 5*d.*—Ounce weight, 9*d.*

Packets of one ounce weight are charged as four single letters.—If a single sheet exceed one ounce, it is charged according to its weight.

Packets or covers, containing patterns or samples only, not exceeding one ounce, 1*d.* extra.

Newspapers between England and Ireland, in covers open at the end, pay one penny each.

No franks pass unless the member of parliament write the full direction, the day of the month, the year, and the name of the post from whence it goes: nor does any

letter pass free to a member, unless directed to his house, or the place where he is.—Counterfeiting superscriptions, is transportation for seven years.

Assessed Taxes.

Duty on Dogs.—As a rigid enforcement of this duty is likely to take place, in consequence of the numerous fatal accidents from hydrophobia, the particulars thereof may be acceptable to such as intend to keep these favourite animals.

For every greyhound, kept by any person, whether his property or not, 1*l.*—For every hound, pointer, setting dog, spaniel, lurcher, or terrier, and for every dog of whatever denomination the same may be, except greyhounds, where any person shall keep two or more dogs for his own use, or the use of any other person, the annual sum of 14*s.*—For every dog not being such as aforesaid, kept by any person having one such dog and no more, whether the same be kept for his own use, or the use of any other person, the annual sum of 8*s.*

But this duty is not to extend to dogs not six months old; the proof of which to lie on the owner.

Persons compounding for their hounds, to be charged 36*l.*

PREPARATION OF FOOD,

CONNECTED WITH COOKERY AND ITS PROCESSES, FUEL, &c.

For the purpose of food, all alimentary substances are used in their raw or crude state, or after having undergone some kind of preparation. Fruits and salads, though they admit of various forms of cookery, are, for the most part, eaten in as fresh and natural a state as possible. Cookery is either necessary to destroy some deleterious property, or to render food more palatable and nutritious. Of the former effect, the most remarkable instance is furnished by various species of *arum*, which, in their crude state, are acrid, or even poisonous, but by being cooked, become mild and wholesome. The acrimony resides in a very volatile principle, which is easily dissipated by heat. A more familiar example in this country is furnished by the onion tribe*, the acrimony and flavour

* Onions, says Dr. Cullen, are acrid and stimulating, and possess very little nutriment. With bilious constitutions they generally produce flatulency, thirst, head-ache, and febrile symptoms; but where the temperament is phlegmatic, they are of infinite service, by stimulating the habit and promoting the natural

of which are entirely destroyed by being long subjected to the action of heat.

The processes of cookery, notwithstanding the great number of receipts, are but few. In some, the chief object is to extract the fluid or soluble parts of the substance cooked; in others, to alter the nature of the substance itself, and often to combine both purposes. Fire is a principal agent in almost all the processes of cookery, and the most economical mode of applying it, has engaged the attention of many philosophers and artists. Convenience and economy are the objects proposed by all alleged improvements. The nature of the fuel is of no little importance, and is different in different countries. Pit-coal has the advantage of forming a lasting fire, and producing an intense degree of heat, which renders it almost indispensable for roasting; but its smoke is very detrimental, both by the unpleasant flavour it imparts, and by the inconvenience arising from the flame, and from the soot deposited upon the vessels and in the chimney.

Wood, Turf, Charcoal, Coke, Cinders, &c.

Wood and turf make less smoke, but their flavour is more penetrating, and they give less heat, and are less durable. The cleanest and most generally useful fuel is charcoal of wood, or coke, neither of which give out any smoke, or impart any flavour. Charcoal is more easily kindled, but coke lasts longer, and gives out more heat. Well-burnt cinders are an excellent substitute for coke, which in every family ought to be carefully preserved for the purposes of cookery.

Heat, how applied in Boiling, Roasting, Baking, Broiling, and Stewing.

Whatever may be the fuel from which heat is produced, it is applied in various ways to the substances to be cooked, either directly or indirectly. As a radiant heat, it is applied directly in the process of roasting, in which the effects are produced entirely by the rays of heat impinging directly upon substances placed at a short distance before it: for this purpose, a clear glowing fire is

---

secretions; particularly expectoration and urine. They are recommended in scorbutic cases, as possessing antiscorbutic properties. Externally, onions are employed in suppurating poultices; and suppression of urine in children, is said to be relieved by applying them roasted to the pubes.

necessary, and the bars of a good roasting grate should impede as little as possible the radiation of its heat.

Another very direct mode of applying heat, is by placing the substance over the fire, by suspending it in the stream of heated air ascending from it, or laying it directly on the burning fuel, or on bars, or on a plate of iron, or other substance capable of supporting the heat. Broiling is the result of this mode of applying heat.

Heat is also often employed through the intervention of fluids, chiefly of water or steam, as in boiling or stewing, or of some oily substance, as in frying. The peculiarity of baking consists in the substance being heated in a confined space, which does not permit the escape of the fumes arising from it.

To understand well the theory of cookery, the action of heat upon the various constituents of alimentary substances must be attended to, as applied directly or indirectly, through the medium of some fluid. In the former way, as exemplified in the processes of roasting and broiling, the chief constituents of animal substances undergo the following changes—the fibrine is corrugated, the albumen coagulated, the gelatine and osmazome rendered more soluble in water, the fat liquefied, and the water evaporated.

If the heat exceed a certain degree, the surface becomes first brown, and then scorched. In consequence of these changes, the muscular fibre becomes opaque, shorter, firmer, and drier; the tendons less opaque, softer, and gluey; the fat is neither melted out, nor rendered semi-transparent. Animal fluids become more transparent; the albumen is coagulated, separated, and they dissolve gelatine and osmazome. Lastly, and what is the most important change, and the immediate object of all cookery, the meat loses the vapid nauseous taste and smell peculiar to its raw state, and it becomes savoury and grateful.

Heat applied through the intervention of boiling oil or melted fat, as in frying, produces nearly the same changes, as the heat is sufficient to evaporate the water, and to induce a degree of scorching. But when water is the medium through which heat is applied, as in boiling, stewing and baking, the effects are somewhat different, as the heat never exceeds 212°, which is not sufficient to commence the process of browning or decomposition, and the soluble constituents are removed by being dissolved

in the water, forming soup or broth; or, if the direct contact of the water be prevented, they are dissolved in the juices of the meat, and separate in the form of gravy.

Loss sustained in the Cooking of Animal Substances, &c. &c.

Whether the heat be directly or indirectly applied, there must be a considerable loss in the cooking of animal substances in public institutions, where the allowance of meat is generally weighed out in its raw state, and includes bones, and is served out cooked, and sometimes without bone, and it is a matter of importance to ascertain, as near as possible, their relative proportions. With regard to this circumstance, much no doubt depends on the piece of meat to be cooked, the degree of cookery, and the attention bestowed upon it, &c.

We have been informed by persons who salt rounds of beef to sell by retail, after they are boiled, that they are able to get nineteen pounds of cold boiled meat from twenty-five pounds of raw; but the meat, it must be confessed, is always underdone.

Messrs. Donkin and Gamble boiled in steam 50 pounds of captain's salt meat; the meat when cold, without the bones, which amounted to 5 pounds 6 ounces, weighed only 35 pounds. In another experiment, 113 pounds of prime mess beef gave 9 pounds 10 ounces of bones, and 47 pounds 8 ounces meat; and in a third, 213 pounds of mess beef gave 13 pounds 8 ounces of bones, and 103 pounds 10 ounces of meat; or, taken in the aggregate, 372 pounds of salt beef, including the bones, furnish, when boiled, 186 pounds 6 ounces, without bone, being about 50 per cent.; or, disregarding the bone altogether, salt meat loses, by boiling, about 42.2 per cent.

We are indebted to Professor Wallace, of the University of Edinburgh, for the detail of a very accurate and extensive experiment in a public establishment, the results of which were, that in pieces of 10 lbs. weight, each 100 lbs. of beef lost, upon an average, by boiling, 26.4; baking, 30.2; and roasting, the shoulder, 31.1; the neck, 32.4; the loin, 35.9. Hence, generally speaking, mutton, by boiling, loses about one-fifth of its original weight, and beef about one-fourth: again, mutton and beef lose, by roasting, about one-third of their original weight.

In roasting, the loss arises from the melting out of the fat, and the evaporating of the water, but the nutritious matter remains condensed in the cooked solid; but in

boiling, the loss is occasioned partly by the fat melted out, but chiefly from gelatine and osmazome dissolved in the water in which the meat is boiled; there is, therefore, a real loss of nourishment, unless the broth be used, when this mode of cooking becomes the most profitable, as well as the most economical.

Vegetable substances (see page 128) are most commonly boiled or baked; or, if apparently fried or roasted, there is always much water present, which prevents the greater action of the fire from penetrating below the surface.

The universal effect of cooking upon vegetable substances, is to dissolve some of their constituents in the water, such as the mucilage and starch, and to render those that are not properly soluble, as the gluten and the fibre, softer and more pulpy, consequently easier of digestion.—(FORSYTH's *Natural and Medical Dieteticon; or Practical Rules for Eating and Drinking, &c.)*

Housekeeping and Husbandry.—No. III.

House-keeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

ADVICE TO COOKS.

Broths and Soups.

THE cook must pay continual attention to the condition of her stewpans* and soup-kettles, &c. which should be examined every time they are used. The prudent housewife will carefully examine the condition of them herself, at least once a month. Their covers also must be kept perfectly clean and well tinned, and the stewpans not only on the inside, but about a couple of inches on the outside: many mischiefs arise from their getting out of repair, and if not kept nicely tinned, all your good work will be in vain; the broths and soups will look green and dirty, taste bitter and poisonous, and will

---

* We prefer the form of a stewpan to the soup-pot; the former is more convenient to skim; the most useful size is twelve inches diameter by six inches deep; this we would have of silver, or iron, or copper lined (not plated) with silver.

be spoiled both for the eye and palate, and your credit will be lost.

The health, and even life of the family, depends upon this; and the cook may be sure her employers had rather pay the tinman's bill than the doctor's; therefore, attention to this cannot fail to engage the regard of the mistress, between whom and the cook, it will be my utmost endeavour to promote perfect harmony.

If a servant has the misfortune to scorch or blister the tinning of her pan*, which will happen sometimes to the most careful cook, I advise her, by all means, immediately to acquaint her employers, who will thank her for candidly mentioning such an accident, and censure her deservedly if she conceal it.

Take care to be properly provided with sieves and tammy cloths, spoons, and ladles; make it a rule, without an exception, never to use them till they are well cleaned and thoroughly dried, nor any stewpans, &c. without first washing them out with boiling water, and rubbing them well with a dry cloth and a little bran, to clean them from grease, sand, &c. or any bad smell they may have got since they were last used: never neglect this.

Though we do not suppose our cook to be such a naughty slut as to wilfully neglect her broth pots, &c. yet we may recommend her to wash them immediately, and take care they are thoroughly dried before the fire, before they are put by, and to keep them in a dry place, for damp will rust and destroy them very soon: attend to this the first moment you can spare after the dinner is sent up.

Never put by any soup, gravy, &c. in a metal utensil; in which, never keep any thing longer than is absolutely necessary for the purposes of cookery; the acid, vegetables, and fat, &c. employed in making them, are capable of dissolving them; therefore stone or earthen vessels should be used for this purpose.

Stewpans and soup-pots, with thick and round bottoms (such as saucepans are made with), will wear twice as long, and are cleaned with half the trouble, as those whose sides are soldered to the bottom, of which sand and grease get into the joined part, and it is next to an

* This may be always avoided by browning your meat in the frying-pan—it is the browning of the meat that destroys the stewpan.

impossibility to dislodge it. The Editor claims the credit of having first suggested the importance of this construction of these utensils.

Take care that the lids fit as close as possible, that the broth, soup, and sauces, &c. may not waste by evaporation. They are good for nothing unless they fit tight enough to keep the steam in, and the smoke out.

Stewpans and saucepans should be always bright on the upper rim, where the fire does not burn them: but to scower them all over, is not only giving the cook needless trouble, but wearing out the vessels.

Cultivate habits of regularity and cleanliness, &c. in all your business, which you will then get through easily and comfortably. I do not mean the restless spirit of *Molidusta*, "the *Tidy One*," who is always frisking about in a whirlpool of bustle and confusion; and is always dirty, under pretence of being always cleaning.

Lean juicy beef, mutton, or veal, form the basis of broth: procure those pieces which afford the most and the richest succulence, and as fresh killed as possible.

Stale meat will make your broth grouty and bad tasted, and fat meat is only wasted. This only applies to those broths which are required to be perfectly clear: we shall show hereafter, that fat and clarified drippings may be so combined with vegetable mucilage, as to afford, at the small cost of one penny per quart, a nourishing and palatable soup, fully adequate to satisfy appetite, and support strength: this will open a new source to those benevolent housekeepers who are disposed to relieve the poor, and will show the industrious classes how much they have it in their own power to assist themselves, and rescue them from being objects of charity, dependent on the precarious bounty of others, by teaching them how they may obtain a cheap, abundant, salubrious, and agreeable aliment for themselves and families.

This soup has the advantage of being very easily and very soon made, with no more fuel than is necessary to warm a room; those who have not tasted it, cannot imagine what a salubrious, savoury, and satisfying meal is produced by the judicious combination of cheap homely ingredients.—*(Cook's Oracle).*

ON THE ORIGIN AND IMAGINARY EFFICACY OF AMULETS AND CHARMS,

IN THE CURE OF DISEASES, PROTECTION FROM EVIL SPIRITS, &c.

What are Amulets?

AMULETS are certain substances, to which the peculiar virtue of curing, removing, or preventing diseases, was attached by the superstitious and credulous; for which purpose they were usually worn about the neck, or other parts of the body. The council of Laodicea prohibited ecclesiastics from wearing amulets and phylacteries, under pain of degradation. St. Chrysostome and Jerome were likewise zealous against the same practice.

Decline of Amulets—Boyle's Remarks, &c.

At the present day, although by no means entirely extinct, amulets have fallen into disrepute; the learned Boyle nevertheless considered them as an instance of the ingress of external effluvia into the habit, in order to shew the great porosity of the human body. He moreover adds, that he is persuaded "some of these external medicaments do answer; for that he was himself subject to a bleeding from the nose; and being obliged to use several remedies to check this discharge, he found the mass of a dead man's skull, though only applied so as to touch the skin until the mass became warm from being in contact with it, to be the most efficacious remedy. A remarkable instance of this nature was communicated to Zwelfer, by the chief physician to the States of Moravia, who, having prepared some troches, or lozenges of toads, after the manner of Van Helmont, not only found that, being worn as amulets, they preserved him, his domestics and friends from the plague; but when applied to the carbuncles or buboes, a consequence of this disease, in others, they found themselves greatly relieved, and many were saved by them. Mr. Boyle also shews how the effluvia, even of cold amulets, may, in the course of time, pervade the pores of the living animal, by supposing an agreement between the pores of the skin and the figure of the corpuscules. Bellini has demonstrated the possibility of this occurrence in his last propositions *de febribus;* the same has also been shewn by Dr. Wainwright, Dr. Keil, and others.

There were also verbal or lettered charms, which were

frequently sung or chanted, and to which a greater degree of efficacy was ascribed; and a belief in the curative powers of music has even extended to later times. In the last century, Orazio Benevoli composed a mass for the cessation of the plague at Rome. It was performed in St. Peter's church, of which he was Mæstro di Capella, and the singers, amounting to more than two hundred, were arranged in different circles of the dome; the sixth choir occupying the summit of the cupola.

Origin and Cause of the Use of Amulets, &c.—Jacob's Earrings, &c.

The origin of amulets may be traced to the most remote ages of mankind. In our researches to discover and fix the period when remedies were first employed for the alleviation of bodily suffering, we are soon lost in conjecture, or involved in fable; we are unable to reach the period in any country, when the inhabitants were destitute of medical resources; and we find among the most uncultivated tribes, that medicine is cherished as a blessing, and practised as an art, as by the inhabitants of New Holland and New Zealand, by those of Lapland and Greenland, of North America, and the interior of Africa. The personal feelings of the sufferer, and the anxiety of those about him, must, in the rudest state of society, have incited a spirit of industry and research, to procure alleviation, the modification of heat and cold, of moisture and dryness; and the regulation and change of diet and habit, must intuitively have suggested themselves for the relief of pain; and when these resources failed, charms. Amulets and incantations were the natural expedients of the barbarian, ever more inclined to indulge the delusive hope of superstition, than to listen to the voice of sober reason. Traces of amulets may be discovered in very early history. The learned Dr. Warburton is evidently wrong, when he assigns the origin of these magical instruments to the age of the Ptolomies, which was not more than three hundred years before Christ; this is at once refuted by the testimony of Galen, who tells us that the Egyptian King Nechepsus, who lived six hundred and thirty years before the Christian era, had written, that a green jasper cut into the form of a dragon surrounded with rays, if applied externally, would strengthen the stomach and organs of digestion. We have moreover the authority of the Scriptures in support

of this opinion; for what were the ear-rings which Jacob buried under the oak of Sechem, as related in Genesis, but amulets? And we are informed by Josephus, in his Antiquities of the Jews, (lib. viii. c. 2, 5), that Solomon discovered a plant efficacious in the cure of epilepsy, and that he employed the aid of a charm or spell for the purpose of assisting its virtues; the root of the herb was concealed in a ring*, which was applied to the nostrils of the demoniac; and Josephus himself remarks, that he himself saw a Jewish priest practise the art of Solomon with complete success in the presence of Vespasian, his sons, and the tribunes of the Roman army. Nor were such means confined to dark and barbarous ages: Theophrastus pronounced Pericles to be insane, because he discovered that he wore an amulet about his neck; and in the declining era of the Roman empire, we find that this superstitious custom was so general, that the Emperor Caracalla was induced to make a public edict, ordaining that no man should wear any superstitious amulets about his person.

In the progress of civilization, various fortuitous incidents†, and even errors, in the choice and preparation of aliments, must gradually have unfolded the remedial powers of many natural substances: these were recorded, and the authentic history of medicine may date its commencement from the period when such records began.

We are told by Herodotus, that the Chaldeans and Babylonians carried their sick to the public roads and markets, that travellers might converse with them, and communicate any remedies which had been successfully used in similar cases. This custom continued during many ages in Assyria; and Strabo states, that it also prevailed among the ancient Lusitanians, or Portuguese: in this manner, however, the results of experience descended only by oral tradition; it was in the Temple of Æsculapius in Greece, that medical information was first recorded; diseases and cures were then registered on

* From this art of Solomon, exhibited through the medium of a ring, or seal, we have the Eastern stories which celebrate the seal of Solomon, and record the potency of its sway over the various orders of *demons*, or of genii, who are supposed to be the invisible tormentors or benefactors of the human race.

† The discovery of the virtues of the Peruvian bark may here serve as an instance. The story goes, that an Indian (some say a monkey) being ill of a fever, quenched his thirst at a pool of water strongly impregnated with the bark from some trees having accidentally fallen into it; and that he was in consequence cured.

durable tablets of marble; the priests and priestesses, who were the guardians of the temple, prepared the remedies and directed their application; and as these persons were ambitious to pass for the descendants of Æsculapius, they assumed the name of the Asclepiades. The writings of Pausanias, Philostratus, and Plutarch, abound with the artifices of those early physicians. Aristophanes describes in a truly comic manner, the craft and pious avarice of these godly men, and mentions the dexterity and promptitude with which they collected and put into bags, the offerings on the altar. The patients, during this period, reposed on the skins of sacrificed rams, in order that they might procure celestial visions. As soon as they were believed to be asleep, a priest, clothed in the dress of Æsculapius, imitating his manners, and accompanied by the daughters of the god, that is, by young actresses, thoroughly instructed in their parts, entered, and delivered a medical opinion.

General Definition of Amulets, &c.

All remedies working, as it were, sympathetically, and plainly unequal to the effect, may be termed amulets, whether used at a distance by another person, or immediately about the patient; of these, various are related. By the Jews, they were called *kamea;* by the Greeks, *phylacteries,* as already mentioned; by the Latins, *amuleta,* or *ligatura;* by the Catholics, *Agnus Dei,* or consecrated relicks; and by the natives of Guinea, where they are still held in great veneration, *fetishes.* Different kinds of materials, by these different people, have been venerated, and supposed capable of preserving from danger and infection, as well as to remove diseases when actually present.

Plutarch relates of Pericles, an Athenian general, that when a friend came to see him, and enquiring after his health, he reached out his hand, and shewed him his amulet; by which he meant to intimate the truth of his illness, and, at the same time, the confidence he placed in these ordinary remedies.

Amulets still continue among us to the present day; indeed, there are few instances of ancient superstition, some parcel of which has not been preserved; and not unfrequently, they have been adopted by men of otherwise good understanding, who plead in excuse, that they are not nauseous, cost little, and if they do no good

they can do no harm. Lord Bacon, whom no one can suspect of being an ignorant man, says that, if a man wear a bone ring, or a planet seal, strongly believing, by that means, that he might obtain his mistress, or that it would preserve him unhurt at sea, or in battle, it would probably make him more active and less timid; as the audacity they might inspire, would conquer and bind weaker minds in the execution of a perilous duty.

Amulets for Ague, and other Diseases.

There are a variety of amulets used by the common people for the cure of ague; and however this may be accounted for, whether by the imagination, or the disease subsiding of its own accord, many have been apparently cured by them, when the Peruvian bark had previously failed. Ague, says Dr. Willis, resisting, amulets have often been applied to the waist with success. ABRACADABRA, written in a conical form, *i. e.* in the shape of an isoceles triangle, beginning with A, then AB, ABR, and so on, and placed under each other, will have a good effect. The herb Lunaria, gathered by moonlight, we are assured by very respectable authorities, has performed some surprising cures. Naaman, we are told, *(numero deus impare gaudet)*, was cured by dipping seven times in the river Jordan. An old gentleman of eighty years of age, who had nearly exhausted his substance upon physicians, was cured of a strangury by a new glass bottle that had never been wet inside, only by *making* water in it, and burying it in the earth. There were also certain formalities performed at the pool of Bethseda, for the cure of diseases. Dr. Chamberlayne's anodyne necklace for a long time was the *sine qua non* of mothers and nurses, until its virtue was lost by its reverence being destroyed; and those which have succeeded it, have nearly run their race. The grey liverwort was at one time thought not only to have cured hydrophobia, but, by having it about the person, to have prevented mad dogs from biting them. Calvert paid devotion to St. Hubert for the recovery of his son, who was cured by this means. The son also performed the necessary rites at the shrine, and was cured not only of the hydrophobia, "but of the worser phrensy with which his father had instilled him." Cramp-rings were also used, and eel-skins tied round the limbs, to prevent this spasmodic affection; and also by laying

the stocks across on the floor, on going to bed, have performed cures this way.

Numerous are the charms, amulets and incantations used even at the present day for the removal of warts. We are told by Lord Verulam (vol iii. p. 234), that when he was at Paris he had above an hundred warts on his hands; and that the English ambassador's lady, then at court, and a woman far above all superstition, removed them all, only by rubbing them with the fat side of the rind of a piece of bacon; which she afterward nailed to a post, with the fat side towards the south. In five weeks, says my Lord, they were all removed.

Lord Verulam's Observations on Amulets, &c.

As Lord Verulam is allowed to have been as great a genius as this country ever produced, it may not be irrelevant to the present subject, to quote in his own words, what he has observed relative to the power of amulets. After deep metaphysical observations in nature, and arguing in mitigation of sorcery, witchcraft, and divination, effects that far outstrip the belief in amulets, he observes, "we should not reject all of this kind, because it is not known how far those contributing to superstition depend on natural causes. Charms have not their power from contracts with evil spirits, but proceed wholly from strengthening the imagination; in the same manner that images and their influence have prevailed in religion; being called from a different way of use and application, sigils, incantations and spells."

Effect of Imagination on the Mind, &c.

Imagination indubitably has a powerful effect on the mind; and in all these miraculous cures, is by far the strongest ingredient. Dr. Strother says, the influence of the mind and passions work upon the body insensible operations like a medicine, and is of far the greater force upon the juices than exercise. The countenance, he observes, betrays a good or wicked intention; and that good or wicked intention will produce in different persons a strength to encounter, or a weakness to yield to the preponderating side. "Our looks discover our passions; there being mystically in our faces, (says Dr. Brown), certain characters, which carry in them the motto of our souls, and therefore probably work secret effects in other

parts." Or, as Garth in his "Dispensatory," so beautifully illustrates the idea—

> "Thus paler looks impetuous rage proclaim,
> And chilly virgins redden into flame:
> See envy oft transformed in wan disguise,
> And mirth sits gay and smiling in the eyes:
> Oft our complexions do the soul declare,
> And tell what passions in the features are.
> Hence 'tis we look, the wond'rous cause to find,
> How body acts upon impassive mind."

Addison, on the power and pleasure of the imagination, (Spect. vol. vi.) concludes, from the pleasure and pain it administers here below, that God, who knows all the ways of affecting us, may so transport us hereafter with such beautiful and glorious visions, or torment us with such hideous and ghastly spectres, as might even of themselves suffice to make up the entire of Heaven or Hell of any finite being.

St. Vitus' dance was cured by visiting the tomb of the Saint, near Ulm, every May. Indeed there is some reason in this assertion; for exercise and change of scene and air, will cure many obstinate diseases. The bite of the tarantula is cured by music; and what is more wonderful still, persons bitten by this noxious animal, are only to be cured by certain tunes—thus, for instance, one person might be cured with "Nancy Dawson," while another could only reap a similar benefit from "Moll in the Wood,—or, "Off She Goes."

Dr. Willis's Amulet for the Cure of Epilepsy, &c.

The learned Dr. Willis, in his treatise on nervous diseases, does not hesitate to recommend amulets in epileptic disorders. "Take," says he, "some fresh pæony roots, cut them into square bits, and hang them round the neck, changing them as often as they dry." In all probability, the hint from this circumstance was taken for the anodyne necklaces which were in such strong requisition some time ago, and which produced so much benefit to the proprietors; as the Doctor, a little farther on, prescribes the same root for the looseness, fevers, and convulsions of children during the time of dentition, mixed, to make it appear more miraculous, with some elks-hoof.

Turner, whose ideas on hydrophobia are so absurd, when he asserts that the symptoms may not appear for forty years after the bite; and who asserts, "that the

slaver, or breath of such a dog, is infectious; and that men bit, will bite like dogs again, and die mad," (p. 411); although he laughs at the anodyne necklace, argues much in the same manner. It is not so very strange that the effluvia from external medicines entering our bodies, should effect such considerable changes, when we see the efficient cause of apoplexy, epilepsy, hysterics, plague, and a number of other disorders, consists, as it were, in imperceptible vapours.

Amulet to prevent Abortion, and to facilitate Delivery.

Lapis ætites (blood-stone) hung about the arm, by some similar secret means, is said to prevent abortion; and to facilitate delivery, when worn round the thigh. Dr. Sydenham, in the iliac passion, orders a live kitten to be laid constantly on the abdomen; others have used pigeons split alive, and applied to the soles of the feet, with success, in pestilential fevers and convulsions. The court of King David thought that relief might be obtained by external agents, otherwise they would not have advised him to seek a young virgin; doubtless, thereby imagining that the vigour of youth would impart a portion of its warmth and strength to the decay of age. "Take the heart and liver of the fish, and make a smoke, and the devil shall smell it, and flee away." (Tobit, c. vi.)

During the plague of London, arsenic was worn as an amulet against infection. During this melancholy period, Bradley says that Bucklersbury was not visited with this scourge, which was attributed to the number of druggists and apothecaries living there.

Belort's Amulets against the Plague, &c.

During the plague at Marseilles, which Belort attributed to the larvæ of worms *infecting the saliva, food, and chyle;* and which, he says, *were hatched by the stomach, took their passage into the blood, at a certain size, hindering the circulation, affecting the juices and solid parts,* advised amulets of mercury to be worn in bags suspended at the chest and nostrils, either as a safeguard, or as a means of cure; by which method, through the *admissiveness* of the pores, effluvias specially destructive of all verminous insects, were received into the blood. "An illustrious prince," continues Belort, "by wearing such an amulet, escaped the small-pox."

An Italian physician (Clognini) ordered two or three drachms of crude mercury to be worn as a defensive

against the jaundice; and also as a preservative against the noxious vapours of inclement seasons: it breaks, he observes, and conquers the different figured seeds of pestilential distempers floating in the air; or else, mixing with the air, kills them where hatched.

Doctrine of Effluvia applied to Amulets, &c.

Other philosophers have ascribed the power of mercury in these cases, to an electric faculty given out by the warmth of the body; which attracts the infectious particles outwards. For, say they, all bodies are continually emitting effluvia more or less around them; and some, whether they be external or internal. The Bath waters change the colour of silver in the pockets of those who use them; mercury the same; cantharides applied externally (or taken inwardly) affect the urinary organs; and camphor, in the same manner, is said to be an antiphrodisac. Quincy informs us, that by only walking in a newly-painted room, a whole company had the smell of turpentine in their urine. Yawning and laughing are infectious; so is fear and shame. The sight of sour things, or even the idea of them, will set the teeth on edge. Small-pox, itch, and other diseases, are infectious; if so, mercurial amulets bid fair to destroy the germ of some complaints, when used only as an external application, either by mercurial attrition or worn as an amulet, or inhaled by the nose. In a word, all amulets, medicated or not, are precarious and uncertain; and now a-day are seldom resorted to, much less confided in.

Baglivi refines on the doctrine of effluvia, by ascribing his cures of the bite of the tarantula, to the peculiar undulation any instrument or tune makes by its strokes in the air; which, vibrating upon the external parts of the patient, is communicated to the whole nervous system, and produces that happy alteration in the solids and fluids, which so effectually contributes to the cure. The contraction of the solids, he says, impresses new mathematical motions and directions to the fluids; in one or both of which, is seated all distempers, and without any other help than a continuance of faith, will alter their quality—a philosophy as wonderful and intricate as the nature of the poison it is intended to expel; but which, however, supplies this observation, that if the particles of sound can do so much, the effluvia of amulets may do more.

Charms used by the Moors of Barbary, &c.

The moors of Barbary, and generally throughout the Mahomedan dominions, the people are remarkably attached to charms, to which, and Nature, they leave the cure of almost every distemper; and this is the more strongly impressed on them, from the belief in predestination, which, according to this sect, stipulates the evils a man is to suffer, as well as the length of time it is ordained he should live upon the land of his forefathers; consequently they conceive that the interference of secondary means would avail them nothing: an opinion said to have been entertained by King William, but by no means calculated for nations, liberty, and commerce; upon the principle, that when the one was intrenched upon, men would probably be more sudden in their revenge, and dislike physic and its occupation, and when actuated with religious enthusiasm, nothing could stand them in any service. F.

PRESCRIPTIONS.

Laxative Powder.

Take Jalap, in powder, - - - 10 grains.
Cream of tartar, - - - 1 scruple.
Ginger, - - - - 15 grains.
Mix for a dose.

Active Purgative Powder.

Take Jalap, - - - - 15 grains.
Rhubarb, - - - - 10 grains.
Calomel, - - - - 2 grains.
Mix for a dose.

Bilious Head-Ache.

Take Antimonial powder, - - 1 scruple.
Calomel, - - - - 15 grains.
Compound extract of colocynth, - - 1 drachm.
Make a mass, with syrup, and divide it into twenty pills; two to be taken at bed-time, assisted the next morning with a tea-spoonful or two of Epsom salts. JOHNSON.

Opening Pills.

Take Compound extract of bitter apple, - - 3 scruples.
Gamboge, - - - - - 2 scruples.
Scammony, - - - - - 1 scruple.
Oil of cloves, or mint, - - - 10 drops.
Make twenty-four pills; one, two, or three for a dose. WILLIAMS.

*** This is a recommendable form for family use.

THE WAY TO WEALTH.

In the Life of the late Dr. Benjamin Franklin, there is a small Publication by that great Philosopher, which has been read by his Countrymen and many others with much avidity and profit. This Piece is entitled, "The Way to Wealth, as clearly shewn in the Preface to an old Pensylvanian Almanack, entitled 'Poor Richard Improved;'" and as the many excellent Maxims it contains, are admirably calculated to excite and enforce Habits of Industry and Frugality, we beg leave to subjoin it, for the perusal and practice of the Readers of the Cottage Physician, &c.

'COURTEOUS READER,

'I HAVE heard that nothing gives an author so great pleasure as to find his works respectfully quoted by others. Judge, then, how much I must have been gratified by an incident I am going to relate to you. I stopped my horse lately, where a great number of people were collected at an auction of merchants' goods. The hour of sale not being come, they were conversing on the badness of the times; and one of the company called to a plain, clean old man, with white locks, 'Pray, Father Abraham, what think you of the times? Will not these heavy taxes quite ruin the country? How shall we be ever able to pay them? What would you advise us to?'—Father Abraham stood up, and replied, 'If you would have my advice, I will give it you in short, "for a word to the wise is enough," as Poor Richard says.' They joined in desiring him to speak his mind, and, gathering round him, he proceeded as follows*:

'Friends,' says he, 'the taxes are indeed very heavy; and if those laid on by the government were the only ones we had to pay, we might more easily discharge them; but we have many others, and much more grievous to some of us. We are taxed twice as much by our idleness, three times as much by our pride, and four times as much by our folly; and from these taxes the commissioners cannot ease or deliver us, by allowing an abatement. However, let us hearken to good advice, and something may be done for us: "God helps them that help themselves," as Poor Richard says.

* Dr. Franklin, wishing to collect into one piece all the sayings upon the following subjects, which he had dropped in the course of publishing the Almanack, called "Poor Richard," introduced Father Abraham for this purpose. Hence it is, that Poor Richard is often quoted, and that, in the present title, he is said to be improved.

I. 'It would be thought a hard government that should tax its people one-tenth part of their time to be employed in its service: but idleness taxes many of us much more; sloth, by bringing on diseases, absolutely shortens life.—"Sloth, like rust, consumes faster than labour wears, while the used key is always bright," as Poor Richard says. "But dost thou love life? then do not squander time, for that is the stuff life is made of," as Poor Richard says.—How much more than is necessary do we spend in sleep? forgetting that, "The sleeping fox catches no poultry, and that there will be sleeping enough in the grave," as Poor Richard says.

'"If time be of all things the most precious, wasting time must be," as Poor Richard says, "the greatest prodigality;" since, as he elsewhere tells us, "Lost time is never found again; and what we call time enough, always proves little enough."—Let us then up and be doing, and doing to the purpose: for by diligence we shall do more with less perplexity. "Sloth makes all things difficult, but industry all easy; and he that riseth late, must trot all day, and shall scarce overtake his business at night; while laziness travels so slowly, that poverty soon overtakes him. Drive thy business, let not that drive thee; and early to bed, and early to rise, makes a man healthy, wealthy, and wise," as Poor Richard says.

'So what signifies wishing and hoping for better times; we may make these times better, if we bestir ourselves.—"Industry need not wish, and he that lives upon hope will die fasting. There are no gains without pains; then help hands, for I have no lands, or, if I have, they are smartly taxed. He that hath a trade, hath an estate; and he that hath a calling, hath an office of profit and honour," as Poor Richard says; but then the trade must be worked at, and the calling well followed, or neither the estate nor the office will enable us to pay our taxes; for "at the working-man's house hunger looks in, but dares not enter." Nor will the bailiff or the constable enter; for "Industry pays debts, while despair increaseth them." What though you have found no treasure, nor has any rich relation left you a legacy, "Diligence is the mother of good luck, and God gives all things to industry; then plough deep while sluggards sleep, and you shall have corn to sell and to keep. Work while it is called to-day, for you know not how much you may be hindered to-morrow. One to-day is worth two to-morrow," as Poor

Richard says; and farther, "Never leave that till to-morrow, which you can do to-day."—If you were a servant, should you not be ashamed that a good master would catch you idle? Are you then your own master? Be ashamed to catch yourself idle, when there is so much to be done for yourself, your family, your country, and your king. Handle your tools without mittens; remember, "that the cat in gloves catches no mice," as Poor Richard says. It is true there is much to be done, and, perhaps, you are weak-handed, but stick to it steadily, and you will see great effects; for "Constant dropping wears away stones; and by diligence and patience the mouse ate in two the cable; and little strokes fell great oaks."

'Methinks I hear some of you say, "Must a man afford himself no leisure?" I will tell thee, my friend, what Poor Richard says—"Employ thy time well, if thou meanest to gain leisure, and, since thou art not sure of a minute, throw not away an hour."—*Leisure* is time for doing something useful: this leisure the diligent man will obtain, but the lazy man never; for a life of leisure, and a life of laziness, are two things. Many without labour would live by their wits only, but they break for want of stock; whereas industry giveth comfort, and plenty, and respect. "Fly pleasures, and they will follow you. The diligent spinner has a large shift; and now I have a sheep and a cow, every body bids me good morrow."

II. 'But with our industry we must likewise be steady, settled, and careful, and oversee our own affairs with our own eyes, and not trust too much to others; for, as Poor Richard says,

'"I never saw an oft-removed tree,
Nor yet an oft-removed family,
That throve so well as those that settled be."

'And again, "Three removes are as bad as a fire;" and again, "Keep thy shop, and thy shop will keep thee;" and again, "If you would have your business done, go; if not, send." And again,

'"He that by the plough would thrive,
Himself must either hold or drive."

'And again, "The eye of a master will do more work than both his hands;" and again, "Want of care does us more damage than want of knowledge;" and again, "Not to oversee workmen, is to leave them your purse open."

Trusting too much to others' care, is the ruin of many; for, "In the affairs of this world, men are saved not by faith, but by the want of it:" but a man's own care is profitable; for "If you would have a faithful servant, and one that you like, serve yourself. A little neglect may breed great mischief; for want of a nail the shoe was lost; for want of a shoe the horse was lost; and for want of a horse the rider was lost," being overtaken and slain by the enemy; all for want of a little care about a horse-shoe nail.

III. 'So much for industry, my friends, and attention to one's own business; but to these we must add frugality, if we would make our industry more certainly successful. A man may, if he knows not how to save as he gets, "keep his nose all his life to the grindstone, and die not worth a groat at last. A fat kitchen makes a lean will," and

> '"Many estates are spent in getting,
> Since women for tea forsook spinning and knitting,
> And men for punch forsook hewing and splitting."

'"If you would be wealthy, think of saving as well as of getting. The Indies have not made Spain rich, because her out-goes are greater than her incomes."

'Away then with your expensive follies, and you will not then have so much cause to complain of hard times, heavy taxes, and chargeable families; for

> '"Women and wine, game and deceit,
> Makes the wealth small, and the want great."

'And farther, "What maintains one vice would bring up two children." You may think, perhaps, that a little tea, or a little punch now and then, diet a little more costly, clothes a little finer, and a little entertainment now and then, can be no great matter; but remember, "Many a little makes a mickle." Beware of little expences; "A small leak will sink a great ship," as Poor Richard says; and again, "Who dainties love, shall beggars prove;" and moreover, "Fools make feasts, and wise men eat them." Here you are all got together to this sale of fineries and nick-nacks. You call them *goods;* but if you do not take care, they will prove *evils* to some of you. You expect they will be sold cheap, and, perhaps, they may for less than they cost; but if you have no occasion for them they must be dear to you. Remember what Poor Richard says, "Buy what thou hast no need of, and ere long thou shalt sell

thy necessaries." And again, "At a great penny-worth pause awhile." He means, perhaps, that the cheapness is apparent only, and not real; or the bargain, by straitening thee in thy business, may do thee more harm than good. For in another place he says, "Many have been ruined by buying good pennyworths." Again, "It is foolish to lay out money in a purchase of repentance;" and yet this folly is practised every day at auctions, for want of minding the Almanack. Many a one, for the sake of finery on the back, have gone with a hungry belly, and half starved their families. "Silks and satins, scarlets and velvets, put out the kitchen fire," as Poor Richard says. These are not the necessaries of life; they can scarcely be called the conveniences; and yet, only because they look pretty, how many want to have them! By these and other extravagances, the genteel are reduced to poverty, and forced to borrow of those whom they formerly despised, but who, through industry and frugality, have maintained their standing; in which case it appears plainly, that "A ploughman on his legs is higher than a gentleman on his knees," as Poor Richard says. Perhaps they had a small estate left them, which they knew not the getting of; they think "It is day, and will never be night;" that a little to be spent out of so much is not worth minding; but "Always taking out of the meal-tub, and never putting in, soon comes to the bottom," as Poor Richard says; and then, "When the well is dry, they know the worth of water." But this they might have known before, if they had taken his advice: "If you would know the value of money, go and try to borrow some; for he that goes a borrowing, goes a sorrowing," as Poor Richard says; and indeed so does he that lends to such people, when he goes to get it in again. Poor Dick farther advises and says,

> "Fond pride of dress is sure a very curse;
> Ere fancy you consult, consult your purse."

And again, "Pride is as loud a beggar as want, and a great deal more saucy." When you have bought one fine thing, you must buy ten more, that your appearance may be all of a piece; but Poor Dick says, "It is easier to suppress the first desire, than to satisfy all that follow it:" and it is as truly folly for the poor to ape the rich, as for the frog to swell in order to equal the ox.

> "Vessels large may venture more,
> But little boats should keep near shore."

'It is, however, a folly soon punished: for, as Poor Richard says, "Pride that dines on vanity, sups on contempt; pride breakfasted with plenty, dined with poverty, and supped with infamy." And, after all, of what use is this pride of appearance, for which so much is risked, so much is suffered? It cannot promote health, nor ease pain; it makes no increase of merit in the person—it creates envy, it hastens misfortune.

'But madness must it be to *run in debt* for these superfluities? We are offered by the terms of this sale, six months credit; and that perhaps has induced some of us to attend it, because we cannot spare the ready money, and hope now to be fine without it. But, ah! think what you do when you run in debt—you give another power over your liberty. If you cannot pay at the time, you will be ashamed to see your creditor; you will be in fear when you speak to him; you will make poor pitiful sneaking excuses, and by degrees come to lose your veracity, and sink into base downright lying; for "The *second* vice is lying, the *first* is running in debt," as Poor Richard says; and again to the same purpose, "Lying rides upon debt's back:" whereas a free-born Englishman ought not to be ashamed or afraid to see or speak to any man living. But poverty often deprives a man of all spirit and virtue. "It is hard for an empty bag to stand upright." What would you think of that prince, or of that government, who should issue an edict forbidding you to dress like a gentleman or gentlewoman, on pain of imprisonment or servitude? Would you not say that you were free, have a right to dress as you please, and that such an edict would be a breach of your privileges, and such a government tyrannical? And yet you are about to put yourself under that tyranny, when you run in debt for such dress! Your creditor has authority, at his pleasure, to deprive you of your liberty, by confining you in a jail for life, or by selling you for a servant, if you should not be able to pay him. When you have got your bargain, you may, perhaps, think little of payment; but, as Poor Richard says, "Creditors have better memories than debtors; creditors are a superstitious sect—great observers of set days and times." The day comes round before you are aware, and the demand is made before you are prepared to satisfy it; or if you bear your debt in mind, the term which at first seemed so long, will, as it lessens, appear extremely short. Time will seem to

have added wings to his heels as well as his shoulders. "Those have a short Lent, who owe money to be paid at Easter;" at present, perhaps, you may think yourselves in thriving circumstances, and that you can bear a little extravagance without injury; but

> ' "For age and want save while you may,
> No morning sun lasts a whole day."

'Gain may be temporary and uncertain, but ever while you live, expence is constant and certain; and "It is easier to build two chimnies, than to keep one in fuel," as Poor Richard says; so "Rather go to bed supperless, than rise in debt."

> ' "Get what you can, and what you get hold,
> 'Tis the stone that will turn all your lead into gold."

'And when you have got the philosopher's stone, sure you will no longer complain of bad times, or the difficulty of paying taxes.

IV. 'This doctrine, my friends, is reason and wisdom. But, after all, do not depend too much upon your own industry and frugality, and prudence, though excellent things; for they may be all blasted without the blessing of Heaven; and therefore, ask that blessing humbly, and be not uncharitable to those that at present seem to want it, but comfort and help them. Remember Job suffered, and was afterward prosperous.

'And now to conclude: "Experience keeps a dear school, but fools will learn in no other," as Poor Richard says, and scarce in that; for, it is true, "We may give advice, but we cannot give conduct." However, remember this: "They that will not be counselled, cannot be helped;" and farther, that, "If you will not hear reason, she will surely rap your knuckles," as Poor Richard says.'

Thus the old gentleman ended his harangue. The people heard it, and approved the doctrine, and immediately practised the contrary, just as if it had been a common sermon; for the auction opened, and they began to buy extravagantly. I found the good man had thoroughly studied my Almanacks, and digested all I had dropped on these topics during the course of twenty-five years. The frequent mention he made of me, must have tired any one else; but my vanity was wonderfully delighted with it, though I was conscious, that not a tenth part of the wisdom was my own, which he ascribed to me; but rather the gleanings that I had made of the sense of all ages and nations. However, I resolved to be the

better for the echo of it; and, though I had at first determined to buy stuff for a new coat, I went away resolved to wear my old ones a little longer. Reader, if thou wilt do the same, thy profit will be as great as mine.

I am, as ever, thine to serve thee,

RICHARD SAUNDERS.

Secrets of Trade.—No. IV.

GREENOUGH'S TINCTURE FOR THE TEETH.

Take Bitter almonds,		2 ounces.
Brazil wood,	} of each,	½ ounce.
Cassia berries,		
Florentine iris,		2 drachms.
Cochineal,	} of each,	1 drachm.
Salt of sorrel,		
Alum,		
Rectified spirits of wine,		2 pints.
Spirit of scurvy-grass, or horse-radish,		4 drachms.

GRAY'S PHARMACOPŒIA, p. 360.

GRINDLE'S COUGH DROPS. (*See* p. 74).

H

HANNAY'S LOTION.

This famous lotion for the prevention of venereal infection, was nothing more than a weak solution of caustic potass, *i. e.* liquor potassæ diluted with distilled water.

HATFIELD'S TINCTURE.

Take Guiacum and soap, equal parts,		2 drachms.
Rectified spirit,		1½ pint.

HILL'S ESSENCE OF BARDANA.

Take Gum guiacum,		1 ounce.
Rectified spirit, and water, of each,		1½ pint.

HILL'S BALSAM OF HONEY.

Take Balsam of Tolu,	} of each,	1 pound.
Honey,		
Rectified spirits of wine,		1 gallon.

Or,

Best balsam of Tolu,	2 ounces.
Styrax gum,	2 drachms.
Purified opium,	½ drachm.
Best honey,	8 ounces.
Rectified spirits,	2 pints.

Pectoral.—Used in coughs and colds.

HONEY WATER.

The article usually sold under this name, is a mixture of essences, coloured with saffron; some add a small quantity of honey, the effect of which is to communicate a clamminess, which retains the scent longer.

PRACTICAL REMARKS ON THE DISEASES OF TRADESMEN, MECHANICS, LABOURERS, &c. &c.

(*Continued from* page 157).

Symptoms of the Dry Belly-ache, or Devonshire Colic—Colic occasioned by the Fumes of Lead, Paint, &c.

THIS complaint is known by a violent and constant pain about the navel, with a retraction of the integuments towards the spine, by an obstinate costiveness, and by a frequent but ineffectual desire to evacuate the contents of the bowels. There is sometimes, though not always, considerable retching; and when vomiting takes place in this disease, what is thrown up is usually of a green colour. This is a state of the complaint which will continue for several days, during which time, however, the pain will vary somewhat in degree, though never entirely cease. A mild kind of delirium, nay, a perfect mania, will sometimes take place, and continue the whole time the bowels are constipated. These, however, are not very common circumstances; and when they do occur, they seem to have no influence in retarding the patient's recovery.

In the dry belly-ache, the greatest relief from pain is experienced by keeping the trunk bent upon the knees. The pulse is usually not more than a hundred in a minute; the tongue has a natural appearance, and is moist; and there is scarcely any fever.

It may be distinguished from every other disease of the abdomen by the situation of the pain round the navel, the retraction of the belly, the costiveness, the absence of fever, the pulse, and the preference given to a bent position of the body to any other.

When this colic has continued for some time, and occasionally when it has not been present, there results a peculiar species of palsy, which affects the superior extremities only, very rarely the inferior. The wrist also in many cases becomes remarkably flaccid and loose, as if the weight of the hand stretched the capsular ligament of it. The thumb wastes away, in consequence, it is supposed, of the rapid absorption of the part taking place from the pressure of the handle of the brush used in painting.

This disease is always attended with some degree of danger, in proportion to the violence of the symptoms and the duration of the disease. Even when it does not

prove fatal, it is apt to terminate in palsy, and to leave behind it contractions of the hands and feet, with an inability in their muscles to perform their office; and in this miserable state of existence the patient lingers out many years of wretchedness.

Means of Prevention.

The best means of guarding against this disease is cleanliness; frequently washing the body, and always the hands before eating; changing the body-linen often, &c.

Medical Treatment.

The medical treatment will consist, first, in guarding against the consequences of inflammation, when the attack is severe, and the patient young and plethoric, by drawing of a quantity of blood, proportionate to the age and habit of the patient.

2dly, To take off the spasm, by means of various antispasmodic medicines in general use, viz. fomentations applied to the belly, by means of flannel cloths wrung out in a warm decoction of poppy-heads, to which some rectified spirits has been added; immersing the body frequently in a warm bath; or taking the patient out of bed, and making him walk on a cold damp floor barefooted, and, at the same time, throwing cold water on his feet, legs, and thighs*, and giving him large doses (three or four grains) of opium.

Accidents, Diseases, &c.

The treatment of the accidents and diseases to which tradesmen, mechanics, and labourers, are more particularly liable, from the nature of their varied callings, previous to treating of those to which each distinct class is exposed from the same causes, may not be irrelevantly premised; as, in the course of mentioning the latter, we shall have frequent occasion to refer to the former.

Accidents from Edge-Tools, Hard Bodies, &c.

Under this head may be comprehended cuts, bruises, and lacerations, &c.

In all recent wounds, the first consideration is to remove foreign bodies, such as pieces of glass, splinters of

* The benefit obtained by dashing cold water upon the extremities in this disease, as well as in that called the iliac passion, appears to be owing to the sympathy which exists between them and the intestines; the fibres of the latter becoming relaxed, while the sudden contraction on the vessels of the skin, in consequence of the application of cold, determines the flow of blood inwardly —Ed.

wood, pieces of stone, earth, or any other substance that may have been introduced by the violence of the act which caused the wound. Where there is much loss of blood, an attempt should be made to stop it with dry lint and compression above the part wounded, if the blood be of a florid red colour, and below, if of a dark colour. The reason for this distinction is obvious to those acquainted with the structure and functions of the human body; and those who are not, ought to be made acquainted with it, as early as possible. First then, the florid blood flows from the heart through the arteries, to be returned by the veins; where, immediately on its entering the extreme ends of these vessels, it changes to a dark colour. Hence arterial blood and venous blood flow in different directions, in separate vessels; the first coming from the heart, the other returning to it. The colour of the latter is dark, that of the former florid red.

In proportion to the importance of the part wounded, will be the degree of the discharge of blood, and the subsequent tendency to inflammation, and its consequences.

Method of stopping Blood in consequence of a Wound.

If an important part be severely wounded, such as any part of the arms, legs, or thighs, attended with a profuse discharge of blood, compression, until a surgeon arrives, should be made by the by-standers, in the following manner, by means of a bandage, garter, or handkerchief; viz. tie it loosely round the limb, and introduce a piece of stick, sufficiently strong for the purpose, about a foot long, and twist it round, tight enough to check the discharge.

Dressing of Wounds.

The first dressing to recent wounds, after stopping the blood by means of styptics, or tying the vessel, should it be necessary, is dry lint, covered with tow or linen cloth. This dressing should be suffered to remain for three days. It should then be removed, and afterwards dressed accordingly, by promoting suppuration, incarnation, &c. once or twice a day. This is the manner of treating a lacerated wound, or an incised wound that has not united in the first instance, by what surgeons call the adhesive inflammation, which, in the latter case, should always be attempted, by bringing the edges closely in contact, by means of adhesive plaster.

If there be considerable inflammation attendant upon a

flesh wound, the patient must live upon vegetable diet, as well as endeavour to abate the influence of the whole of the natural powers; and when the patient becomes emaciated, and appears to sink under its influence, and the wound shews no disposition to heal, strengthening diet must be taken, and other correspondent active means. When matter, which is the healing medium, does not properly form on the surface of a wound, warmth, by means of mild poultices, must be used to promote it.

Treatment of Simple Incised Wounds or Cuts.

On a workman receiving a clean cut with any sharp instrument, which has not penetrated very deep, and which is not lacerated or torn in any part, the best way, in such cases, is to lay the edges of the wound close in contact, and to confine them there by means of sticking-plaster; when, in the course of a day or two, they will be glued together—consequently a cure performed without any other application; unless the wound suppurates, when it will be necessary to treat it as in the preceding case.

Spirits, tinctures, balsams, and the like, although sometimes used to stop blood, where mechanical means do not admit of being used, are highly improper to recent wounds; they are sure to irritate the part they are applied to, and retard the cure. The loss of blood is always greater from an incised, than from a lacerated wound.

Bruises.

This description of wound is mostly occasioned by obtuse or blunted heavy substances falling upon, or otherwise injuring the parts of the body that come in contact with it, without laying open any part; and they are generally productive of worse consequences than wounds of the preceding kind. The danger from bruises is not immediately apparent, by which means they are not unfrequently neglected.

Treatment of Bruises.

When the bruise is of a slight nature, it may be sufficient to bathe the part with warm vinegar, to which some spirits, rum or brandy, or warm gin itself, may be added, or with opodeldoc, keeping cloths wetted constantly applied to it. This method is preferable to using spirits alone, which, for the most part, are applied, though injudiciously, in similar cases.

When bruises are of a serious and alarming nature, attended with much discolouration of the skin, the patient should apply, as soon after the injury as possible, a number of leeches, proportioned to the extent of the injury, as well as lose blood from the arm, and put himself on low diet; after which, the bruised part may be bathed as before advised, and a poultice of elder and camomile flowers, thickened with crumb of bread, applied in equal quantities of vinegar and water. This poultice is peculiarly proper when a wound accompanies the bruise. It may be renewed twice or three times a day.

Wounds from Pointed Instruments.

Punctured wounds are produced by sharp-pointed instruments, and are more dangerous than any other kind, from the liability to locked jaw, on any of the nerves being wounded; and the inflammation which is attendant on them, runs to a considerable extent. Here fomentations and poultices should be used, and, if constitutional symptoms run high, it will be proper to call in a surgeon, who will, if necessary, make a free incision into the wound, and adopt other means, as circumstances may suggest.

Scalds and Burns.

On being scalded or burnt, it is recommended to place or plunge the offended part into a bucket or other convenient vessel of cold water, or to pump upon it; retaining it for a time under this process, until the pain be less sensible on taking it out. The water should frequently be changed, that its temperature may be as considerably below that of the part, as it was when first placed in the bucket. The longer this is deferred after the accident, the less benefit will be derived from it. After the cold water has been used long enough, which, in the first instance, should be adopted without a moment's delay, the parts may be kept moist with equal parts of milk and lime-water, or even water alone, by rags wet with them, constantly applied to the part, and passing over them a stream of air from a pair of bellows, until a certain degree of cold, or sense of freezing, is felt. By this simple process, a large piece of skin that has been burnt to the appearance of charring, and surrounded with a high degree of inflammation, has been perfectly cured in a very short time.

ORIGINAL LETTER FROM THE LATE FRANCIS GROSE, ESQ. F. A. S. TO ——

SIR, *London, April* 4, 1791.

HEREWITH you have the Dial of Princes, which I beg you would keep till you have quite done with it; if you return it in the winter, or send it with your book, it will be quite time enough.

I have been hunting for the horrid receipt for dressing a duck alive, but cannot find the book in which I think it is: but have written to a friend who has the book, and will communicate his answer in a post or two. I am certain as to the fact of there being such an article, but not quite so clear as to the book.

Knives and forks make a curious article in TOM CORIAT, who says his familiar friends scrupled not to call him *Furcifer*, for using a fork. *Fines Morrison*, in his travels, advises the leaving off the fork in England, as being a piece of refinement or foppery. As I have him at hand, I will transcribe the passage: "Also I admonish him, after his return home, to renew his old friendships: and as souldiers in a good commonwealth, when the warre is ended, return to the works of their calling, (like the followers of Mercury, as well as of Mars): so that he returning home, lay aside the spoone and forke of Italy, the affected gestures of France, and all strange apparell; yea even those manners, which with good judgment he allowes, if they be disagreeable to his countrymen."

Cooks seem to have been persons of consequence in the households of our princes. Witness the manor of Addington, given by the Conqueror to his cook, and still held by the service of presenting the king at his coronation with a dish of plumb water-gruel, called *de la groute;* for the making of which there is the recipe preserved in some of the public offices. The dress is likewise settled; it is a laced *bib and apron*. Though that part of the ceremonial, on the installation of Knights of the Bath, where the master cook threatens to cut off the spurs of any knight who shall misbehave, seems rather to degrade his office. The master cook is, I likewise believe, the executioner for cutting off the hand of any person who shall strike another within the verge of the court.

In some extracts from the books of account, in the chest of St. Bartholomew's Hospital, Sandwich, A. D. 1596, among the expences of entertaining the mayor with a dinner upon St. Bartholomew's day, is the following item: "For turnynge the spytte, iiijd."

Respecting the Times of Eating.

Extract from the Haven of Health, by Thomas Cogan, Master of Arts, and Bachelor of Physicke.

Of Dinner.—"When foure houres be past after breakfast, a man may safely taste his dinner; and the most convenient time for dinner is about eleven of the clocke before noon. Yet Diogenes the philosopher, when he was asked the question, what time was best for a man to dine; he answered, for a rich man when he will, but for a poore man when he may. But the usuall time for dinner in the Universities is eleven, and elsewhere about noone. At Oxford, in my time, they used commonly at dinner boyled biefe with pottage, bread and beere, and no more; the quantity of biefe was in value an half-a-penny for one man; sometimes, if hunger constrayned, they would double their commons."

Of Supper.—"About foure houres or sixe after we have dined, the time is convenient for supper: which in the Universities is about five of the clocke in the afternoone, and in poore men's houses, when leisure will serve."

Having thus set down every thing that occurs to me at present, I shall conclude with my best wishes for your health; and am, Sir, your most obedient humble servant,

FRANCIS GROSE.

EDUCATION OF CHILDREN.

IN Boswell's Life of Dr. Johnson, we find the following sentiments, with regard to the education of children:—"Mr. Boyd told us that Lady Errol was one of the most pious and sensible women in the island; had a good head, and as good a heart. He said she did not use force or fear, in educating her children."—Johnson observed, "Sir, she is wrong; I would rather have the rod to be the general terror to all, to make them learn, than tell a child, if you do thus or thus, you will be more esteemed than your brothers or sisters. The rod produces an effect which terminates in itself. A child is afraid of being whipped, and gets his task, and there's an end on't; whereas by exciting emulation, and comparisons of superiority, you lay the foundation of lasting mischief; you make brothers and sisters hate each other."

Housekeeping and Husbandry.—No. IV.

House-keeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

Kitchener on Carving, &c.

CEREMONY does not in any thing, more commonly and completely triumph over comfort, than in the administration of "the honours of the table."

Those who serve out the loaves and fishes, seldom seem to understand, that he is the best carver who fills the plates of the greatest number of guests in the least portion of time.

To effect this, fill the plates and send them round, instead of asking each individual if they choose soup, fish, &c. or what particular part they prefer; for as they cannot all be choosers, you will thus escape making any invidious distinctions.

A dexterous carver (especially if he be possessed with that determined enemy to ceremony and sauce, a keen appetite), will help half a dozen people in half the time one of your would-be-thought polite folks wastes in making civil faces, &c. to a single guest.

It would save a great deal of time, &c. if poultry, especially large turkeys and geese, were sent to table ready cut up.

Fish that is fried, should be previously divided into such portions as are fit to help at table.

A prudent carver will cut fair*, and observe an equitable distribution of the dainties he is serving out, and regulate his helps by the proportion which his dish bears to the number he has to divide it amongst, taking into this reckoning, the *quantum* of appetite the several guests are presumed to possess.

"Study their genius, caprices, *goût*—
They, in return, may haply study you:
Some wish a pinion, some prefer a leg,
Some for a merry-thought, or sidesbone beg—

---

* Those in the parlour should recollect the importance of setting a good example to their friends at the second table. If they cut bread, meat, cheese, &c. fairly, it will go twice as far as if they hack and mangle it—as if they had not half so much consideration for those in the kitchen, as a good sportsman has for his dogs.

The wings of fowls, then slices of the round,—
The trail of woodcock, of codfish the sound.
Let strict impartiality preside—
Nor freak, nor favour, nor affection guide."

From the BANQUET.

The guest who wishes to ensure a hearty welcome, and frequent invitation to the board of hospitality, may calculate, that the "easier he is pleased, the oftener he will be invited;" instead of unblushingly demanding of the fair hostess that the prime "*tit-bit*" of every dish be put on his plate, must receive (if not with pleasure, or even content), with the liveliest expressions of thankfulness, whatever is presented to him; and let him not forget to praise the cook, and the same shall be reckoned unto him even as the praise of the mistress.

The invalid or the epicure, when he dines out, to save trouble to his friends, may carry with him a portable Magazine of Taste.

"If he does not like his fare, he may console himself with the reflection, that he need not expose his mouth to the like mortification again: mercy to the feelings of the mistress of the mansion, will forbid his then appearing otherwise than absolutely delighted with it, notwithstanding it may be his extreme antipathy.

"If he likes it ever so little, he will find occasion to congratulate himself on the advantage his digestive organs will derive from his making a moderate dinner, and consolation from contemplating the double relish he is creating for the following meal, and anticipating the (to him) rare and delicious zest of (that best sauce) good appetite, and an unrestrained indulgence of his gormandizing fancies at the chop-house he frequents.

"Never entrust a *cook-teazer* with the important office of carver, or place him within reach of a sauce-boat. These chop-house cormorants, who

"Critique your wine, and analyse your meat,
Yet on plain pudding deign at home to eat,

are, generally, tremendously officious in serving out the loaves and fishes of other people; for, under the notion of appearing exquisitely amiable, and killingly agreeable to the guests, they are ever on the watch to distribute themselves, the dainties which it is the peculiar part of the master and mistress to serve out, and is to them the most pleasant part of the business of the banquet,—the pleasure of helping their friends is the gratification,

which is their reward for the trouble they have had in preparing the feast: such gentry are the terror of all good housewives; to obtain their favourite cut, they will so unmercifully mangle your joints, that a dainty dog would hardly get a meal from them after, which, managed by the considerative hands of an old housekeeper, would furnish a decent dinner for a large family."—Vide *Almanach des Gourmands.*

I once heard a gentle hint on this subject, given to a *blue mould fancier,* who, by looking too long at a Stilton cheese, was at last completely overcome, by his eye exciting his appetite, till it became quite ungovernable; and, unconscious of every thing but the *mity* object of his contemplation, he began to pick out, in no small portions, the primest parts his eye could select from the centre of the cheese. The good-natured founder of the feast, highly amused at the ecstacies each morsel created in its passage over the palate of the enraptured gourmand, thus encouraged the perseverance of his guest:—"Cut away, my dear sir, cut away, use no ceremony, I pray: I hope you will pick out all the best of my cheese —*don't you think that the* RIND *and the* ROTTEN *will do very well for my wife and family!!*"

Half the trouble of waiting at table may be saved, by giving each guest two plates, two knives and forks, two pieces of bread, a spoon, a wine glass, and a tumbler, and placing the wines and sauces, and the Magazine of Taste, &c. as a dormant, in the centre of the table; one neighbour may then help another.

Dinner tables are seldom sufficiently lighted or attended; an active waiter will have enough to do, to attend upon half a dozen active eaters; there should be half as many candles as there are guests, and their flame be about eighteen inches above the table: our foolish modern pompous candelabras, seem intended to illuminate the ceiling, rather than to give light on the plates, &c.

Observations on the Cooking of Fish.

This department of the business of the kitchen requires considerable experience, and depends more upon practice than any other; a very few moments, more or less, will thoroughly spoil fish*; which, to be eaten in per-

* When the cook has large dinners to prepare, and the time of serving uncertain, she will get more credit by fried, or stewed, than by boiled fish. It is also cheaper, and much sooner carved.

fection, must never be put on the table till the soup is taken off.

So many circumstances operate on this occasion, it is almost impossible to write general rules.

There are decidedly different opinions, whether fish should be put into cold, tepid, or boiling water.

We believe, for some of the fame the Dutch cooks have acquired, they are a little indebted to their situation, affording them a plentiful supply of fresh fish for little more than the trouble of catching it; and that the superior excellence of the fish in Holland, is because none are used, unless they are brought alive into the kitchen (mackarel excepted, which die the moment they are taken out of the water). The Dutch are as nice about this, as Seneca says the Romans* were; who, complaining of the luxury of the times, says, "they are come to that daintinesss, that they will not eat a fish, unless upon the same day that it is taken, that it may taste of the sea, as they express it."

On the Dutch flat coast, the fish are taken with nets; on our rocky coast, they are mostly caught by bait and hook, which instantly kills them.—Fish are brought alive by land to Dutch markets, in water casks with air-holes in the top. Salmon and other fish are thus preserved in rivers, in a well-hole in the fishing-boat.

Fish of every kind are best sometime before they begin to spawn, and are unfit for food for some time after they have spawned.

The most convenient utensil to boil fish in, is a turbot-kettle; this should be twenty-four inches long, twenty-two wide, and nine deep: it is an excellent vessel to boil a ham in, &c. &c.

Mr. Ude (page 238 of his Cookery) advises—"If you are obliged to wait after the fish is done, do not let it remain in the water, but keep the water boiling, and put the fish over it, and cover it with a damp cloth; when the dinner is called for, dip the fish again in the water, and serve it up."

* They had salt water preserves for feeding different kinds of sea fish; those in the ponds of Lucullus, at his death, sold for 25,000*l.* sterling. The prolific power of fish is wonderful; the following calculations are from Petit, Bloch, and Leuwenhoek:

	Eggs.
A salmon of twenty pounds weight contained	27,850
A middling sized pike	148,000
A mackarel	546,681
A cod	9,344,000

See *Cours Gastronomiques*, 18mo. 1806, p. 241.

The good folks of this metropolis are so often disappointed by having fish which have been kept too long, that they are apt to run into the other extreme, and suppose that fish will not dress well, unless it is absolutely alive. This is true of lobsters, &c. and may be of fresh-water fish, but certainly not of some sea-fish.

Several respectable fishmongers and experienced cooks have asserted, that they are often in danger of losing their credit by fish too fresh, and especially turbot and cod, which, like meat, require a certain time before they are in the best condition to be dressed: they recommend them to be put into cold water, salted in proportion of about a quarter of a pound of salt to a gallon of water. Sea-water is best to boil sea fish in, and let them boil slowly till done; the sign of which is, that the skin of the fish rises up, and the eyes turn white.

It is the business of the fishmonger to clean them, &c. but the careful cook will always wash them again.

Garnish with slices of lemon, finely-scraped horse-radish, fried oysters, smelts, or whitings, or strips of soles. The liver, roe, and chitterlings, should be placed so that the carver may observe them, and invite the guests to partake of them.

N. B. Fish, like meat, requires more cooking in cold than in warm weather; if it becomes frozen*, it must be thawed by the same means directed for meat.

To Boil a Leg of Lamb.

Shake a little flour over the lamb, tie it in a clean cloth, and put it in the water when it boils: if it weighs six pounds, boil it an hour and a half; take off the scum as it rises, and boil it in a good quantity of water; send it to table with spinage, carrots, and melted butter; caper sauce, or gooseberry sauce, is also very good with it.

To Dress a Hind Quarter of House Lamb.

Boil the leg in a floured cloth, an hour and a quarter, cut the loin into chops, fry them, and lay them round the leg, with a bit of crisp parsley on each; serve it up with spinage or brocoli.

---

* Fish is very frequently sent home frozen by the fishmonger, to whom an ice-house is as necessary an appendage (to preserve fish) as it is to a confectioner.

To render Tea at Five Shillings a Pound, equal to Tea at Twelve Shillings.

The cheapest and most expensive teas are all the leaves of the same tree, at least they should be so, and if there were no sloe-leaves nor privet-leaves, they would be so. The high flavour, therefore, of some of the sorts of tea, and the want of flavour in others, must arise from the manner of preparing them, and must be in some measure artificial. It follows, that if we can discover any fine-flavoured substance, and add it to the tea in a proper manner, so as to make it agree and harmonise with the original flavour, we shall be able to improve low-priced and flavourless tea, into a high priced article of fine flavour. The flavouring substance found to agree best with the original flavour of tea, is the oil of bergamot; by the proper management of which, you may produce from the cheapest teas, the finest flavoured bloom, hyson, gunpowder, and cowslip. There are two ways of managing the bergamot. Purchase at the perfumers some of the perfumed pieces of wood, which they call bergamot fruit. Keep one such piece in your cannister, and it will flavour the tea in the same way as a tonquin bean flavours snuff. If the cannister be a small one, the flavour perhaps would be too strong; in that case you may chip the bergamot fruit in pieces, and put only a little bit among your tea. Or procure a small phial of the oil of bergamot; take some of the smallest of your tea, and add it to a few drops of the oil, till you form a sort of paste, which is to be carefully mixed with the whole tea, in proportion to its quantity, and the degree of flavour you like best. If you make the flavour too strong, you have always an easy remedy, namely, by adding more unflavoured tea. When it is thus improved, it is often sold at eighteen shillings, and a guinea a pound. Cowslip tea has been as high as thirty-two shillings.

To Boil Salmon.

Clean the fish, and scrape it carefully; boil it gently with salt and horse-radish in the water; if put into cold water, a piece not very thick will take half an hour after it boils. Serve it up with shrimp, lobster, or anchovy-sauce, in one tureen, and fennel and butter in another; if you have essence of anchovy, send plain melted butter to table with it; some like parsley and butter.

To Broil Salmon.

Cut some slices an inch thick, and season them with pepper and and salt; dip them in sweet oil, or rub them with butter; fold them in pieces of writing paper, and broil them over a slow fire six or eight minutes; serve them up in the papers, with some anchovy sauce in a tureen, or plain melted butter; if the salmon is dried, soak it for two or three hours; then put it on the gridiron, and shake over it a little pepper; it will take but a short time; when done, serve it up with melted butter.

To Souse or Pickle Salmon.

Boil it in the usual way for eating, as before directed, after which, take it out and boil the liquor with bay-leaves, pepper-corns, and salt; add vinegar when cold, and pour it over the fish.

Lobster-Sauce.

Melt some butter in a little milk, with a little flour and a bit of lemon-peel in it; then add some cream; take out the lemon-peel, and put in the lobster, cut in small pieces, with a little of the spawn; simmer all together about ten minutes. Shrimp-sauce may be made in the same way, or the shrimps put into plain melted butter.

To Pot Mackarel.

Clean, season, and bake them in a pan, with spice, bay-leaves, and some butter; when cold, take out the bones, lay them very close in potting-pots, and cover them with clarified butter.

Gooseberry Fool.

Set two quarts of gooseberries on the fire in about a quart of water; when they begin to simmer, turn yellow, and look plump, throw them into a cullender to drain the water out; then with the back of a spoon squeeze the pulp carefully through a sieve into a dish; make them tolerably sweet, and let them stand till cold; take two quarts of milk and the yolks of four eggs: beat them up with a little grated nutmeg, and stir it softly over a slow fire; when it begins to simmer, take it off, and by degrees stir it into the gooseberries; let it stand till it is cold, and serve it up: if it is made with cream, it does not require any eggs; the cream should not be boiled.

Rural Economy.—No. III.

Communications relative to Orcharding. By T. S. D. Bucknall, Esq.

(*From Vol.* 13 *of the Transactions of the Society for the Encouragement of Arts, Manufactures and Commerce*).

"It is generally imagined, that when the trees are planted, the troublesome part of forming an orchard is over: but the fact is far otherwise; for a greater difficulty remains, which is, to determine what proper use to apply the ground to; for if it is cultivated by the plough, little good can be expected; for the injuries which young trees constantly receive, from the implements in husbandry bruising and destroying them before they can have got possession of the soil, generally hurt them most essentially; and if, by a superlative care, they should surmount the evils so brought on, the crops of corn being regularly carried off the land, impoverishes the ground so much, that the trees are soon stunted, and run to moss.

"There is not any culture we are acquainted with, equal to hops, for raising an orchard; and when the proper time comes for grubbing up the hops, the trees may be secured, and the land turned to grazing. However, let the agriculture be what it may, the land should never be ploughed, or dug deep, directly over the roots of a young-planted fruit-tree; for as the roots collect their best benign sap from their extreme points, if those points are broken off from the upper side of the roots, that tree is compelled to subsist on nurture drawn from the understrata, and consequently the sap will be of an inferior quality.

"It may be regularly observed, that where trees stand in such a situation, that the hogs and poultry are constantly running over the ground, those trees very seldom fail of a crop, which is the best proof that manure is necessary; and any manure will suit an orchard: but there are several sorts of manure which are overlooked, such as the sweepings of cow-houses, slaughter-houses, emptying of drains, and every thing filthy; and these are more disposed to facilitate the growth and health of fruit-trees, than the manure from the stable.

"An essential circumstance to be attended to is, that the fruits be ordered of those sorts which thrive in the

neighbourhood where the plantation is intended to be made, and a strict regard shewn to that purpose, as the beauty and value of the whole orchard will greatly depend upon the trees being well suited. There is a striking instance of this at Sittingbourn, and its neighbourhood: the lemon-pippin is invariably a fine thriving tree, and the summer pearmain as constantly ragged and out of health; and this observation may be applied throughout the whole range of fruit-bearing trees, according to the soil and situation.

"The ancient orchards of Kent, which were mostly grubbed up about fifty years since, produced the Kentish pippin, lemon-pippin, russet, cat's-head, and other hardy-keeping fruits; but as the age refined in luxury, the more delicate apples were introduced. The sharp north-east winds, in many situations, were certainly too severe for these productions; though I entertain no doubt but this appearance of a caprice or particularity in nature, may by attention be in part corrected, though any attempt to point out the cause would lead me too far from the present subject.

"Care should be taken not to suffer trees to bear much fruit while young; it should be gathered as soon as seen, except about half a dozen, to shew the size and quality. The young trees being kept clear, will give them, if I may use the expression, the habit of producing larger and finer fruit; but that is not the material reason; by being kept clear, the leading and collateral branches run stronger each year; and be assured, if the tree can be brought to a proper size, there will be no doubt of its bearing afterwards. Observe among those gentlemen who pride themselves for being masters of fine stock, either horses, cattle, or sheep, and you will find the governing principle with each of them, is to run the young stock to as *long bone* as possible in the first year; knowing, from experience, that having once secured bone, flesh, figure, and symmetry will follow. Such trees as suit the soil may, by easy means, be induced to grow to a size beyond what we imagine: let the land be grazed or manured, and gather the fruit before it can be applied to any use. How long this custom should be continued, each orchardist must judge for himself; but no one will have the least chance for the prize, who does not take off the fruit for some time at least.

"There is no impropriety in deeming the heads of

fruit-trees as so many hemispheres: only suppose it possible, by any art, to induce each of the branches of one tree to grow two inches longer than those of another tree in the same year; that free-growing tree will, in eighteen years, double the head of the other: so much for size. Health is the certain consequence.

"No young plant, or newly-engrafted tree, should be suffered to run *mop-headed;* for until each branch has acquired a determined leader, that tree will make no progress; and a tree, like an animal, if it takes a stunt, it is difficult to throw such energy into the system afterwards as will make it free-growing.

"It has been objected, that if no leading branches are to be shortened, the nurseryman could not form the stems to support the head.

"Undoubtedly, while the plants are in the nursery, the slightest practitioner knows that the head must be cut down, to give strength and symmetry to the stem; and it is also necessary that most of the grafts be shortened, or the wind will blow them out; and during the time the plants are in an infant state, shortening helps to swell out the buds. It was never meant to exclude shortening, until the plant was become a tree; and it is perfectly within the nurseryman's art to produce all his standard fruit-bearing trees with stems large and smooth, buds full and round, and leaves broad and open, without the tree being liable to canker or gum; and this is given as the character of a perfect and valuable tree.

"*Moss.*—One of the greatest obstructions to good orcharding, is moss, which is merely the result of poverty and neglect, reflecting a discredit on the owner. Where trees are much over-run with moss, a strong man with a good birch-broom, in a wet day, would do great execution. But to enter more into the business, what is moss? a plant; and, like other plants, may be eradicated on the first appearance; for that purpose, on young trees, the best method is to rub all the branches, spring and autumn, with a hard scrubbing-brush and soap-suds; and the action of rubbing will so far invigorate the tree, as to overpay both trouble and expence. There is no damage can befall the tree from rubbing; and let it be performed as a groom does a horse's legs.

"Certainly the best soil to plant on is a fine deep loam; and no one, for profit, would think of planting on a strong clay, chalk, or a cold sharp gravel; but where

a gentleman, for the embellishment of his residence, would wish for an orchard on either of these soils, never dig into the under strata; for that would be placing the trees in so many well-holes, where certain destruction must ensue; therefore, rather plant the trees above ground, raising over it a little mound of good fresh mould, about as large as an extensive ant-hill, under a curve of eight inches by sixty, and sow the top with white Dutch clover.

Canker.—" In pruning, the medication ought never to be omitted; for, from experience, the mercury is found to be so strongly operative in removing the baneful effects of canker in the more delicate fruit-trees, that it may be presumed to enter into the economy of the plant, giving a smoothness to the bark and freeness of growth; proofs of which will be produced to the society in a few years, by persons who have attentively considered the subject.

" I shall here give an abstract of the system of close-pruning and medication, as before laid down, that it may be seen at one point of view.

" Let every stump, the decayed or blighted branches, with all those which cross the tree, or where the leaves curl, be taken off smooth and even; pare down the gum close to the bark, and rather a little within, but not to destroy the rough coat; open the fissures, out of which the gum oozes, to the bottom; cut away the blotches, and pare down the canker; then anoint all the wounds with the medication, smearing a little over the canker, which was not large enough to be cut; score the tree, and rub off the moss; but do not shorten a single branch: follow the surgeon's rule, go to the quick, and no more; act with observation, and each practitioner will improve the science.

" A tree under such care, must, with its remaining free shoots, run large, which requiring a great flow of sap, will keep the roots in constant employ, and from that very source necessarily establish permanent health.

" P.S. Where the only object is to remove the canker, I find hogs'-lard preferable to tar; but where the wet is to be guarded against, tar is superlatively better."

On the Means of Destroying Insects in Orchards; confirming the Doctrine in the foregoing Paper. By William Hampson, Esq.

(From the same Work).

"It will not appear foreign to the subject, if some general observations which are well known to those who have the management of fruit-trees, and more particularly the apple, precede an account of the means here discovered, for preventing the destruction often occasioned by the ravages of the caterpillars. 1st, A winter, in which there is a severe frost for a long continuance, is accounted favourable to the succeeding fruit harvest. 2dly, Young and healthy trees, which are continually distending the rind, and putting forth vigorous branches, are not often attacked with the caterpillars; or if they are, it is when the foliage of an aged or sickly neighbour is exhausted; and then, being urged by want of food, the worm throws its silken line, which, carried by the wind, clings to the branches of another tree, and by this means it effects a passage.

"Some time ago, having an intention to improve a number of apple-trees, which, owing to their being yearly infested with the caterpillar, had been long neglected, I began in the following manner: it being early in the spring, I first caused the thick brown moss to be removed from the trunk of the tree, around which, but at a distance equal to the extremities of the roots, I spread warm rotten litter; and then, with the back of a pruning knife, scraped off the livid-coloured moss with which the branches of the tree were entirely encrusted. But what surprised me, and to which I would beg particular attention, was, that small detached pieces of moss hung upon the bough by fine threads, after it had been cleansed: this led me to think they belonged to some eggs or insects which lay concealed between the moss and the outer bark, or between the outer and the inner rind; but being then without the help of glasses, my curiosity remained unsatisfied, although the effects discovered in the opening season justified my strongest apprehensions; for those trees which had been thoroughly cleaned, put forth strong and healthy shoots, and retained their leaves; when others, their neighbours, were eaten up: yet what convinced me beyond the least doubt, was a tree which through negligence had been left in part cleaned: the boughs which I

had cleaned, were untouched by the caterpillars; on the contrary, the leaves of those boughs I had not cleaned, were soon consumed by them.

"These facts being stated, the following remarks are naturally suggested. First, that the eggs of the caterpillars lie, during the winter, concealed in such trees as are overgrown with moss, between the moss and the rind, or, where the rind is decayed, in the cavities occasioned by such decay; a circumstance which, with the assistance of a microscope, I have since ascertained; but through mere neglect, having not preserved the eggs for future observation, I cannot say determinately they were the eggs of the caterpillar; but this I can say, that the removal of those eggs prevented the leaves of the tree from being eaten. Secondly, that the proper time for destroying them would be before the eggs are hatched; for by the time the caterpillar is come out, the buds begin to open, and of course become its immediate prey; and as the butterfly tribe are so numerous and so perfectly free from restraint, the nature of the case will require an annual search to be made in such places as are thought favourable to them for depositing their eggs: there will be often found full-grown trees, which by being encumbered with branches, the power of the sun is not admitted to shrivel the old rind as the new one is forming; consequently such trees become encrusted with decayed coats, the fit receptacles for preserving the embryo caterpillars; and such trees whose wounds have been suffered to heal, so as to form an hollow, retaining moisture, which cankers the wood, and renders it easily perforated by the fly, are likewise liable to become a prey to the insects they have preserved."

CAUTION.

By an Act passed 55 Geo. III. cap. 137, it is enacted, "That after the 25th day of March, 1816, no churchwarden, overseer of the poor, or other person having the management of the poor, shall furnish or supply for his or their own profit, any articles or provisions for the support of the poor, under the penalty of 100*l.*;" with an exception, in case there should not be a person competent or willing to undertake it, in the parish.

Horticulture.

JUNE.

THE KITCHEN-GARDEN.—In the kitchen-garden particular attention will now be required, in weeding, thinning, hoeing, and watering many principal crops; and in sowing, picking out, and transplanting, several successional and main crops, for autumn and winter, &c.

As several early crops—in the natural ground will now be in perfection, and some gathered off for use this month, the ground should be prepared in proper time, and sowed or planted with others in succession.

Advanced forward crops—in rows that will soon come off, as early cauliflowers, cabbages, beans, &c. may be inter-cropped with other articles, to gain ground and time in the advancing growth of the intermediate crops, which may be cabbage-plants, coleworts, borecole, celery, lettuces, leeks, &c. also occasionally beans, peas, kidney-beans, cucumbers, &c.

Sowing and planting—is still necessary in many successional and several principal crops.

For sowing—the principal sorts are turnips, kidney-beans, lettuce, endive, cucumbers, celery, cabbages, savoys, spinach, radishes, peas, beans, borecole, broccoli, carrots, finochio, turnip-radish, small sallading, coleworts, turnip-cabbage, and a few onions to draw young.

——— *To sow in hot-beds*—nothing is now required except if cold wet weather, may sow cucumbers to plant out for pickles, &c.

To plant—several principal and successional crops are necessary; as cabbages, coleworts, savoys, borecole, broccoli, leeks, lettuce, beans, endive, and cardoons; also many aromatic and pot herbs, in young seedling plants of the year, slips, cuttings, off-setts, &c.

——— Pricking out from seed-beds, is necessary in celery, cauliflowers, cabbages, savoys, broccoli, borecole, and the different aromatic and sweet herb seedling plants, &c. &c.

FRUIT-GARDEN AND ORCHARD.—Considerable attention is now required in wall and espalier trees in general, in the work of summer pruning and nailing, &c. as the shoots of the year will be numerous, much advanced,

and greatly want a proper regulation, by removing the ill-placed, improper, and superfluous, and training in the eligible and useful supply.

But pruning—at this season is required only principally in wall and espalier fruit; seldom in standards.

Summer pruning—of all wall and espalier trees, if not forwarded a little last month, now demands our most early attention, before the trees run into a confused disorder in the numerous shoots of the year, which is of particular importance, both for the advantage of the trees and fruit, as well as to give the trees an agreeable appearance to the sight, when timely trained in regular order.

Wall-trees—should have the summer pruning and regulation commenced as soon as convenient, particularly in apricots, peaches, nectarines, and vines; afterwards in cherries, plums, pears, apples, &c. to displace the foreright productions, with other ill-placed, and all very luxuriant and other improper shoots; as also the superfluous and over-abundant.

In summer pruning of peaches, nectarines, and apricots—keep in mind, that as these trees bear mostly on the young wood of a year old, a full supply of the well placed side and leading shoots must be retained in all parts, for next year's bearers; and from which prune away the improper, unnecessary, and superabundant productions.

——— All the retained shoots continue at their full length, as far as the limited bounds of each tree admits, and train them in regularly to the wall. [See MAY.]

FLOWER-GARDEN AND PLEASURE-GROUND.—The general business of the flower-garden, pleasure-ground, &c. at this season, is to keep all the compartments of walks, lawns, borders, beds, shrubberies, &c. in perfect neat order. Annuals will require transplanting from hot-beds, borders, &c. seedling biennials and perennials pricking out; new planted articles watering; and various other necessary works, as explained under the proper heads.

Annual flower plants—of many sorts, will now require final removing or transplanting, where they are to flower; some into pots, others into borders, beds, &c. and some to be sowed; observing generally in transplanting these sorts into the borders, &c. it would be of great advantage to take the opportunity of showery weather, if it happens; otherwise must be constantly watered every day till they take root.

Annual Flower Plants.—Tender annuals—raised in hot-beds, as cock's-combs, tricolors, balsams, globe amaranthus, egg plant, &c. remove into the open air, some in pots, others planted into borders, &c. all to remain for flowering the same summer.

——— *Water*—all new-planted annuals in dry weather; also those lately sowed, or of small growth, and all sorts of pots.

WORK IN THE NURSERY.—In the nursery, at this season, particular care is necessary to destroy weeds by hoeing and hand-weeding; and in watering some late planted young trees, shrubs, and other plants; also in watering seed-beds of small young seedlings of the same year, and all plants in pots; and in giving occasional shade to some small seedling exotics of evergreens, and others of slender growth; attend also to some works of propagation by layers, cuttings, and budding; and in pricking out some seedling evergreens of the spring sowing.

Weeds rising numerously—at this season, should be diligently destroyed, in all parts between rows of young trees and shrubs, &c. and among all young plants in seed-beds.

THE GREEN-HOUSE.—The exotics still remaining in the green-house should now be removed into the open air, as soon as settled warm weather; but while they remain give the free air, by continuing the windows open almost day and night.

Remove into the full air—all the myrtles, geraniums, oleanders, &c. (b.); also, if warm weather, the oranges, lemons, and all the other exotics, except the more tender succulent plants: placing them at first in a sheltered situation for a week, then dispose them where required, to ornament the flower-garden or pleasure-grounds, forecourts, &c.

HOT-HOUSE AND STOVE.—All the hot-house exotics are to be continued constantly in that apartment, and must still have the bark-bed heat supported, but that of fires discontinued; and plants should have air admitted freely every warm day: they will require frequent watering.

TO MAKE VARIOUS HARD CONFECTIONS.

Marsh-Mallow Lozenges.—Marsh-mallow root, in powder, one pound; white sugar, four pounds; mucilage of gum tragacanth, enough.

Starch Lozenges.—Starch, one ounce and an half; liquorice root, six drachms; Florentine orrice root, half an ounce; sugar, one pound and an half; mucilage of gum tragacanth, enough.

*** These may also be made without the orrice root.

Almond Paste.—(See *Secrets of Trade*).

Marsh-Mallow Paste (Paté de Guimauve).—Decorticated root of marsh-mallows, four pounds; water, one gallon; boil to four pints, strain; add gum arabic, half a pound; lump sugar, two pounds; evaporate to an extract, then take from the fire; stir it quickly with the white of twelve eggs, previously beat to a froth; add while stirring, orange-flower water, half an ounce.

Yellow Pectoral Lozenges.—Florentine orrice root, six drachms; liquorice root, three drachms; starch, half an ounce; saffron in powder, two scruples; sugar, eight ounces; mucilage of gum tragacanth, enough.

Lozenges for the Heartburn.—Prepared chalk, four ounces; prepared crabs' claws, two ounces; bole armeniac, one ounce; nutmeg, one scruple; sugar, three ounces; water, a sufficient quantity.

2. Prepared chalk, four ounces; prepared crabs' claws, two ounces; cinnamon, half an ounce; sugar, three ounces; mucilage of gum arabic, enough.

3. Prepared chalk, four ounces; gum arabic, one ounce; nutmeg, one drachm; sugar, six ounces; water, a sufficient quantity.

Clove Lozenges.—Cloves, five drachms; sugar, one pound eight ounces; mucilage of gum tragacanth, enough:—make one hundred and fifty lozenges, containing two grains of cloves each. Put into chocolate to render it stomachic, or used as a restorative after fatigue.

Cachou Lozenges.—Catechu, three ounces; sugar, twelve ounces; mucilage of gum tragacanth, enough.

Cachou à l'Ambergris.—The same, with eight grains of ambergris.

Cachou Musqué.—The same, with musk, eight grains.

Cachou à la fleur d'Oranges.—The same, with essence of nerole, six drops.

Cachou à la Reglisse.—Catechu, two ounces; extract of refined liquorice, one ounce; sugar, fourteen ounces; mucilage of gum tragacanth, enough.

Cachou à la Violette.—The same, with Florentine orrice root, one drachm and an half.

Saffron Lozenges.—Hay saffron dried and powdered,

one ounce; sugar, one pound; mucilage of gum arabic, a sufficient quantity: anodyne, pectoral and emmanagogue.

Refined Juice.—Spanish liquorice, four pounds; gum arabic, two pounds; water, enough; dissolve, strain, evaporate gently to a soft extract; roll into cylinders, cut into lengths; and polish by rubbing them together in a box: expectorant, in coughs.

2. Spanish liquorice, carpenters' glue, of each an equal quantity; water, a sufficient quantity.

Cachou à la Canelle.—Catechu, three ounces; cinnamon, one drachm and an half; oil of cassia, five drops; sugar, fourteen ounces; mucilage of gum tragacanth.

Black Pectoral Lozenges.—Extract of liquorice, sugar, of each, ten ounces; gum tragacanth, decorticated sweet almonds, of each, six ounces; mucilage of quince-seed made with rose water, a sufficient quantity; dissolve, strain, and evaporate.

Paté de Reglisse Noir.—Refined liquorice, eight ounces; gum arabic, two pounds; sugar, one pound; water, a sufficient quantity; dissolve and evaporate till it forms a very thick syrup; add Florentine orrice root and elecampane, of each half an ounce; essence of cedrat, a few drops; put into ten moulds; to be dried in a stove.

Paté Blanche de Reglisse.—From the roots of liquorice, in the same manner as Paté de Guimauve. Pectoral.

Ipecacuanha Lozenges.—Ipecacuanha, half an ounce; sugar, two pounds; mucilage of gum tragacanth, a sufficient quantity: make four hundred and eighty lozenges, containing each half a grain of ipecacuanha: expectorant, used in coughs, also stomachic.

Orrice Lozenges (Violet Lozenges).—Florentine orrice root and gum arabic, equal parts; liquorice root, six drachms; sugar, one pound eight ounces; gum tragacanth, a sufficient quantity.

Lemon Drops.—Sugar, one pound, very finely powdered; dissolve one half along with salt of sorrel, three drachms, in the smallest quantity of water; as soon as it boils add the other half of the sugar; and essence of lemon, eight drops; drag it out immediately with a crooked wire in drops upon a slab; concrete acid of lemons, or acid of tartar may be used instead of the salt of sorrel.

Steel Lozenges.—Sugar, three pounds eight ounces; iron filings, or rust of iron, eight ounces; cinnamon, two

ounces; mucilage of gum arabic, a sufficient quantity: stomachic, tonic.

Candid Horehound.—Juice of horehound, one pint; white sugar, four pounds; brown sugar, six pounds.

Magnesia Lozenges.—Calcined magnesia, four ounces; ginger, one scruple; sugar, two ounces; mucilage of gum tragacanth.

2. Magnesia, one ounce; sugar, four ounces; mucilage of gum tragacanth made with orange-flower water.

Peppermint Drops.—Sugar, two pounds; peppermint water, four ounces, made into drops as those of lemons; essence of peppermint may be added, if they are required to be very warm.

Peppermint Lozenges.—Sugar, two pounds; starch, two ounces; essence of peppermint, and mucilage of gum tragacanth, a sufficient quantity.

Pastilles de Rose.—Sugar, two pounds; rose water, four ounces; made into drops.

Rhubarb Lozenges.—Rhubarb, one ounce; sugar, six ounces; mucilage of gum tragacanth made with cinnamon water, a sufficient quantity. Cathartic.

Ginger Lozenges.—Ginger, one ounce; sugar, one pound; mucilage of gum tragacanth, a sufficient quantity. Stimulant and stomachic.

Ginger Candy.—Ginger, two ounces; boiling water, enough to strain a pint; white sugar, six pounds; brown sugar, eight pounds.

Ginger Drops.—Sugar, two pounds; strong infusion of ginger, four ounces.

Barley Sugar.—Sugar, one pound; saffron, twelve grains; water, a sufficient quantity, to boil to a full candy height, pour it out upon an oiled slab, and roll it in cylinders: formerly a decoction of barley was most used; some employ a mucilage of gum arabic, and flavour it with lemons.

Worm Cakes.—Aleppo scammony, two ounces; prepared calomel, three ounces; resin of jalap, two ounces; cream of tartar, four ounces; white sugar, three pounds; mucilage of gum tragacanth, a sufficient quantity.

Storey's Worm Cakes.—(See *Secrets of Trade).*

DIRECTIONS FOR MAKING DISTILLED WATERS, &c.

MANY of these are used as vehicles for medicines, in order to disguise their nauseous taste; others as perfumes. No great care is judged necessary in their preparation for medical purposes; the herb, just as collected, without any separation of decayed parts, or accidental mixture of dirt, or other substance, is added to the water, distilled in a short-necked wide still, as quickly as possible, and two drachms of spirit of wine, or even more, added to each pint. Many do not, in fact, take this trouble, but rub a drop or two of the oil, with a little sugar, and add it to common water, or dilute the oil with ten times as much spirit of wine, and add, as occasion may require, a few drops of the essence to the water, or other vehicle. The case, however, is different with regard to perfumes, as rose water, elder-flower water, &c. more care being requisite, as the buyers must be pleased with their smell and appearance; hence the herb, &c. must be carefully picked, and the waters as carefully distilled in a high narrow-necked still, that no part of the infusion may be thrown over with the distilled water, as this would render them liable to become mothery in a short time; and if a superior article is required, the waters must be redistilled by a gentle heat.

Angelica Water.—Leaves, eight pounds to the gallon: cordial.

Anise-seed Water.—Collected in the distillation of the oil.

Aqua Cymbalariæ.—From the herb: used in Italy as the vehicle for exhibiting arsenic as a poison.

Aqua Ledi palustris.

Aqua Persicariæ.—From the herb: useful in calculous complaints.

Allspice Water.—Half a pound to a gallon: stimulant; used in hospitals as a cheap spicy vehicle.

Aqua Castorei.—Russian castor, an ounce; a sufficient quantity: distil two pounds.

Aqua Lactis Alexiteria.—Leaves of meadow-sweet, goat's rue, of each six handfuls; of mint, wormwood, five handfuls; of rue, three handfuls; of angelica, two handfuls; milk, three gallons; distil to dryness: diaphoretic.

Aqua Omnium Florum (Water of all flowers).—From cows' dung, collected in May: used in consumptions.

Arse-smart Water.—From the herb: from a pint to a pint and a half drank in a day, very effectual in nephritic cases.

Balm Water.—From the herb: cephalic and cordial.

Bean-Flower Water.—Fragrant: used in perfumery.

Carduus Water.—Leaves, eight pounds to the gallon: vehicles for diaphoretic medicines.

Carline Thistle Water.—Fragrant.

Carui Water.—Seeds, one pound to the gallon: carminative.

Cassia Water.—One pound to the gallon. (*See* Cinnamon Water).

Camomile Water.—Flowers, eight pounds to the gallon: stomachic.

Celandine Water.—Leaves, eight pounds to the gallon.

Cinnamon Water.—One pound to the gallon.

2. Bruised cinnamon, one pound; water, two gallons: simmer in a still for half an hour; put what comes over into the still again; when cold, strain through a flannel. Cassia must be distilled, as its infusion is yellow.

3. Cassia minor, eight pounds: draw twelve gallons.

4. Cassia buds, one pound; cassia wood, two pounds: draw eight gallons.

5. Cassia minor, six pounds; spirit of wine, two gallons; water, a sufficient quantity; draw four gallons of spirit of cinnamon, and ten gallons of cinnamon water: stomachic, tonic, and covers the disagreeable taste of some medicines.

Cumin Water.—From the seeds: carminative.

Cowslip Water.—From the flowers: slightly narcotic.

Camels' Hay, Water of.—From the herb: fragrant; used in perfumery.

Common Wormwood Water.—Eight pounds of green leaves to the gallon: stomachic.

Dill Water.—Seeds, two pounds to the gallon: carminative.

Eye Bright Water.—From the herb: ophthalmic.

Elder-Flower Water.—From the fresh flowers.

Fennel Water.—From the herb.

Fennel Water, Sweet.—Seeds, one pound to the gallon: a weak carminative.

Fumitory Water.—From the herb.

Frogs' Spawn Water.—Collected in February or March, and distilled: cooling.

Germander Water.—From the herb: fragrant, although no oil comes over with it.

Hyssop Water.—From the herb: pectoral, stomachic.

Juniper Water.—From the herb: stimulant.

Laurel Water.—From the leaves; contains prussic acid, is stronger than black cherry water; has been used for poisoning, and therefore labours under an ill name, although doubtless one of the most efficacious of this sort of medicines, and of great use in consumptions.

Lovage Water.—From the herb: carminative.

Lily of the Valley Water.—Fragrant: used as a perfume to scent soaps.

Lemon-Peel Water.—Fresh peel, two pounds to the gallon.

Lime-Flower Water.—From the flowers: fragrant; used in perfumery.

Marygold Water.—From the flower.

Marjoram Water.—Fresh herb, eight pounds to the gallon; strong scented: used in cookery.

Mint Water.—Green herb, eight pounds to the gallon (of the London Pharmacopœia before 1745).

2. Dried herb, one pound and an half to the gallon (London Pharmacopœia since 1745). Edinburgh Pharmacopœia.

3. Oil of spear-mint, one ounce; draw ten gallons: antispasmodic; allays vomiting.

Myrtle-Flower Water.—Fresh flowers, three pounds; draw a gallon: very fragrant; used as a perfume.

Meadow-Sweet Water.—From the flowers: has a fine flavour, but the flowers must be infused in warm water as soon as gathered.

Orange-Flower Water.—Three pounds to three pounds of water.

2. Three pounds to six pounds: very odoriferous.

Orange-Peel Water.—Seville orange-peel, four ounces to the gallon.

2. Peel, two pounds to the gallon: as agreeable vehicles.

Oak Water.—From the young leaves, gathered in May, eight pounds to the gallon.

Peppermint Water.—Green herb, eight pounds to the gallon (London Pharmacopœia before 1745).

2. Dried herb, a pound and an half, or green, eight

pounds to the gallon (London Pharmacopœia since 1745) Dublin Pharmacopœia.

3. Herb in flower, three pounds to the gallon (Edinburgh Pharmacopœia).

4. Oil of peppermint, one ounce; water, a sufficient quantity; draw ten gallons.

5. Oil, two ounces; draw nine gallons.

6. Oil, one pound; draw thirty gallons: stimulant; carminative; and covers disagreeable flavours.

Painy Water.—From the flowers; gathered in May.

Parsley Water.—From the whole plant, with the root, gathered in spring: nephritic, diuretic.

Pimpernell Water.—From the roots: acrid, blue.

Plantain Water.—From the herb when in flower: vulnerary.

Pennyroyal Water.—Green herb, eight pounds to the gallon (London Pharmacopœia before 1745).

2. Dry herb, one pound and an half to the gallon (London Pharmacopœia since 1745). Dublin Pharmacopœia.

3. Fresh herb, three pounds to the gallon (Edinburgh Pharmacopœia).

4. Oil of pennyroyal, one ounce; draw twelve gallons.

5. Oil of pennyroyal, one pound; draw thirty gallons: emmenagogue.

Red Poppy Water.—From the flowers; narcotic, but less so than white poppy water.

Rose Water.—Petals of the flowers, six pounds to the gallon.

2. Petals, ten bushels; draw fourteen gallons.

3. Pickled roses, sixty pounds; yellow saunders, eight ounces: draw sixteen gallons.

4. Attar of roses, one ounce; spirit of wine, one gallon; distilled water, sufficient quantity: distil forty gallons.

5. Wood of rhodium.

6. Root of rhodium: may either of them be distilled, and the water sold as rose water.

Rosemary Water.—From the tops: fragrant.

Raspberry Water.—From the fruit: fragrant.

Rue Water.—From the herb: stimulant, and emmenagogue.

Sea Wormwood Water.—Eight pounds of green leaves to the gallon.

Star Anise Water.—Very fragrant.

SUMMER BATHING; SEA AIR;
REFRESHENING BREEZES; COUNTRY EXCURSIONS, &c.

"From brightening fields of ether fair disclos'd,
Child of the Sun, refulgent Summer, comes
In pride of youth, and felt thro' Nature's depth:
He comes attended by the sultry hours,
And ever-fanning breezes, on his way;
While from his ardent look, the turning Spring
Averts his blushful face, and earth and skies,
All smiling, to his hot dominion leaves."—THOMSON.

AT a season of the year when health, pleasure, change of air, romantic scenery, rural rides, verdant and salubrious foliage, and summer breezes, invite alike the hypochondriac, the valetudinarian, the nervous, the debilitated, the gay, the fashionable, the man of pleasure, and the cit, to desert for a while the dull and ponderous monotony of a town life, and, if we may use the very appropriate simile, "when toil remitting lends its turn to play," we conceive that a few of our pages cannot be better devoted, than in drawing the attention of our readers to a most essential and indispensable article in the rational Code of Health and long Life—Bathing—(which comprehends exercise and recreation, with a view to restoring lost spirits, re-invigorating a weakly constitution, dissipating nervous and unfounded diseases), amidst the fragrant air, wafting health and energy in every breeze,

Country perambulations to town's-folk, and more particularly to those of sedentary habits, are attended with a variety of advantages, as well physical as corporeal. The face of Nature welcomes its sportive, as well as its afflicted votaries; every shadowed grove, blossom and flower, has its particular charm, character, and odour; evey zephyr its agreeable and refreshening influence; while every nerve vibrates with new energy and fresh delight, fanned by the summer gales, far from the noise, stench, smoke, and bustle, of an overgrown and pestiferous metropolis, where every court, alley, and lane, emits all but the fragrance of the rose, or the delightful perfume of the violet.

The greatest and surest preserver of health, as we have already remarked, under this head, is *cleanliness*. To this important consideration, the ancients were more attentive than the moderns have hitherto been. The daily use of the bath, and of the currycombs with which they scraped the body, produced great neatness, and entirely

removed all impurities and disagreeable smells. The modern practice of wearing linen, does not equally effect these purposes, though we change our shirts ever so often. The observation will appear true to every one who considers, that a very frequent shifting of our linen will not clear the scurf from the skin, which can only be done by water, and the common practices attendant on the ancient mode of bathing.

Before offering any remarks on our own baths or watering-places, we shall premise the subject with some

HISTORICAL OBSERVATIONS ON THE BATHS OF THE ANCIENTS.

Among the numerous large and pompous buildings of the ancients, were the structures erected for the purposes of bathing. Baths made a part of the ancient *gymnasia*, though they were frequented more for the sake of pleasure than health.

Roman Baths.

The most magnificent baths were those of Nero, Titus, Paulus Æmilius, and Dioclesian, of which there are some ruins still remaining. It is said that at Rome there were 856 public baths. Fabricius adds, that the excessive luxury of the Romans appeared in nothing more visible than in their baths. Seneca complains, that the baths of plebeians were filled from silver pumps; and that the freedmen trod on gems. Macrobius tells us of one Sergius Oratus, a voluptuary, who had pendant baths hanging in the air.

According to Dion, Mæcenas was the first who made a bath at Rome; yet there are instances of public baths prior to this; but they were of cold water, small, and poorly decorated. Agrippa, in his ædilate, built 160 places for bathing, where the citizens might be accommodated either with hot or cold, gratis. After this example, Nero, Vespasian, Titus, Domitian, Severus, Gordian, Aurelian, Maximian, Dioclesian, and most of the emperors who studied to gain the affections of the people, erected baths laid with the richest marble, and wrought according to the rules of the most delicate architecture. The rich had baths at home, and frequently very magnificent ones, especially after the time that the practice of pillaging the provinces had begun; but they only used them on extraordinary occasions. The great men, and even emperors themselves, sometimes bathed in public

with the rest of the people. Alexander Severus was the first who allowed the public baths to be opened in the night-time during the heats of summer.

Greek Baths.

The Greek baths were usually annexed to *palestræ* or *gymnasia*, of which they were considered as a part. These baths consisted of seven different apartments, usually separated from each other, and intermixed with other buildings, belonging to the other sorts of exercises. These were, 1st, The cold bath, *frigida lavatio;* 2dly, The *elæothesium*, or room where they were anointed with oil; 3dly, The *frigidarium*, or cooling room; 4thly, The *propnigeum*, or entrance of the *hypocaustum*, or stove; 5thly, The vaulted room for sweating in, or vapour bath, called *concamerata sudatio*, or *tepidarium;* 6thly, The *laconicum*, or dry stove; 7thly, The hot bath, called *callida lavatio*.

As for the baths separate from the *palestræ*, they appear to have been usually double, one for men, the other for women; but so near, that the same furnace heated both. The middle part was possessed by a large basin that received water by several pipes, and was surrounded by a balustrade, behind which there was an area for the reception of those who waited to use the bath. They were vaulted over, and only received light from the top.

Description of the Roman Baths.

In the Roman baths, the first part that appeared was a large basin, called κολυμβηθρα in Greek, and *natatio*, or *piscina*, in Latin. In the middle was the *hypocaustum*, which had a row of four apartments on each side, called *balnearia:* these were the stove, the bath, cold bath, and *tepidarium*. The two stoves, called *laconicum* and *tepidarium*, were circular, and joined together. Their floor was hollow, and suspended, in order to receive the heat of a large furnace, which was communicated to the stoves through the vacuities of their floor. This furnace also heated another room, called *vasarium*, in which were three large brazen vessels, called *milliaria*, respectively containing hot, warm, and cold water; which were so disposed, that the water might be made to pass by syphons and pipes out of one or other of them into the bath, in order to adjust its temperature. The description is given by Vitruvius. At three in the afternoon, which is what Pliny calls *hora octava et nona*, the Romans all

repaired to the baths, either the public or the private ones: this was called the bath hour, *hora balnei*, which in winter was at nine, in summer at eight. The public baths were all opened by the sound of a bell, and always at the same hour. Those who came too late, stood a chance for bathing in cold water.

They began with hot water; after which, as the pores were now opened, and might give room for too plentiful a perspiration, they thought it necessary for their health to close them again, either with the cold bath, or at least with a sprinkling of cold water. During the bath, the body was scraped with a kind of knives, or small strigils, such as are still found in the cabinets of the curious. After bathing, succeeded unction and perfuming, from which they went fresh to supper.

The Romans, when they found their stomachs overcharged with meat, went to the bath, as we learn from Juvenal, who inveighs against those who, having gorged themselves with eating, were forced to go into the baths to give relief*. They found also that a bath was good to refresh themselves after some considerable fatigue or travel, as Celsus tells us; which makes Plautus say, that all the baths in this world were not sufficient to remove the weariness he felt. After Pompey's time, the humour of bathing was carried to great excess, by which many were ruined, several having brought themselves to such a pitch, that they could not bear food without bathing first. The Emperor Titus is said to have lost his life thereby. Hence Pliny inveighs severely against those physicians who held, that hot baths digested the food. The Emperor Hadrian first laid a restraint on the immoderate humour of bathing, by a public edict, prohibiting all persons to bathe before the eighth hour.

The baths of Agrippa were built of brick, but painted in enamel; those of Nero were not only furnished with fresh water, but even had the sea brought into them; those of Caracalla were adorned with 200 marble columns, and furnished with 1600 seats of the same matter. Lipsius assures us they were so large, that 1800 persons might conveniently bathe in them at the same time. But the baths of Dioclesian surpassed all the rest in magnificence. One hundred and forty thousand men were employed many years in building them. Great part of

---

* See observations on this practice, p. 260.

these, as well as those of Caracalla, are still standing; and with the vast high arches, the beautiful and stately pillars, the extraordinary plenty of foregin marble, the curious vaulting of the roofs, the prodigious number of spacious apartments, and a thousand other ornaments, make one of the greatest curiosities of modern Rome.

MANNER OF BATHING AT SCIO.

(From Travels into Asia Minor, by R. Chandler, D. D. and others).

The next morning we were set on shore again, and I went with Captain Jolly to the principal bagnio, or public bathing-place, which is a very noble edifice, with ample domes, all of marble. I shall attempt to give an account of the mode of bathing: We undressed in a large square room, where linen is hung to dry, and the keeper attends with his servants. We had each a long towel given us to wrap round our middle, and a pair of tall wooden pattens to walk in. We were led through a warm narrow passage into the inner room, which is yet more spacious, and made very hot by stoves, which are concealed. In this was a water-bath, and recesses, with partitions on the sides. The pavement in the centre, under the dome, was raised and covered with linen cloths, on which we were instructed to lie down. We were soon covered with big drops of sweat, and two men naked, except the waist, then entered, and began kneading our flesh, tracing all the muscles, and cleansing the pores. By the time they had finished, our joints were sufficiently suppled, and they commenced the formidable operation of snapping all of them, not only the toes, ancles, feet, knees, fingers, and the like, but the vertebræ of the back and the breast; one while wrenching our necks; then turning us on our bellies, crossing our arms behind us, and placing their right knee between our shoulders. The feats they perform cannot easily be described, and are hardly credible. When this was over, we were rubbed with a mohair-bag fitted to the hand, which, like the ancient strigil, brings away the gross matter perspired. We were then led each to a recess, supplied by pipes with hot and cold water, which we tempered to our liking. The men returned with soap-lather and tow in a wooden bowl, with which they cleaned the skin, and then poured a large quantity of warm water on our heads. Our spirits were quite exhausted, when they covered us with dry cloths and led us back to the first room, where beds were

ready for us. On waking after a gentle slumber, we were presented each with a lighted pipe and a dish of coffee. We arose much refreshed, and, as the ladies of the Aga or Turkish Governor were expected there, hastened away. The common Turks and Greeks pay a very small gratuity for the use of the bath, which they frequent once a week or oftener. I have sometimes been regaled, while in the inner room, with ripe fruits and sherbet, and with incense burning to scent the air. One of my companions repeatedly partook with me in this innocent and wholesome luxury at Smyrna.

WELLS, WATERS, AND WATERING-PLACES.

MARGATE

Lies on the acclivity of two hills; on the top of one stands the church; it is situated on the north side of the parish of St. John the Baptist, and is considered as the metropolis of the Isle of Thanet. The constant resort of genteel people to this place, for pleasure, as well as bathing, soon rendered an increase of houses for their accommodation necessary; and a new town has risen, to the southward of the old one, on the side of the hill near the church; while the latter has been greatly enlarged and improved.

Bathing-rooms and Machines.

Near the harbour, are situated the bathing-rooms, on the western side of the High-street; and though they are seven in number, and several machines belong to each, company are frequently obliged to wait some minutes before they can be accommodated with a dip. Each person on his arrival enters his name, that he may have his regular turn; in the mean time, if he chooses, he may read the newspapers, thrum a piano, or gossip with his fellow expectants.

By careful guides, these machines, which are on a very commodious construction, may be driven to any requisite depth in the tide. There are also several marble salt-water warm-baths, filled from the sea, which may be procured at any degree of temperature, on giving a short previous notice.

Terms of Bathing.

For a lady bathing in a machine, guide included, 1*s.* 3*d.*
Two or more ladies together, guide included, 1*s.* each.
Child in a machine, guide included, 1*s.* 3*d.* each.

Two or more children together, 9*d*. each.
A gentleman without a guide, 1*s*.
Ditto, with a guide, 1*s*. 6*d*.
Two or more gentlemen, with a guide, 1*s*. 3*d*. each.
Ditto, without a guide, 9*d*.
Warm-bath, 3*s*. 6*d*. each, or seven times for a guinea.

General Sea-bathing Infirmary.

Where cold-bathing, as is often the case, is inadmissible; and in almost all cases where it is proper, a preparatory tepid bath is usually recommended; but as warm bathing is too expensive to come within the reach of the afflicted poor, some well-disposed persons, among whom was the late Dr. Lettsom, projected a Sea-bathing Infirmary, which was opened in 1790, under the patronage of his present Majesty King George IV. (then Prince of Wales), and the direction of a Committee. The building, which is neat and plain, is situated at West-brook, and is already liberally supported; which, no doubt, as including a comprehensive benevolence to the afflicted poor, it will continue to meet with increased patronage and support.

RAMSGATE.

The bathing-place lies in front of a long line of high chalky cliffs behind the pier, and is composed of a reddish sand, soft and pleasant to the feet. The machines, though not so numerous, are plied here in the same manner as at Margate. The rooms for the accommodation of bathers are commodious; and Dyason, of the bath-house, has erected four warm salt-water baths, also a plunging bath, attached to which are equally convenient waiting and dressing rooms. The Isabella baths have been lately erected on the West Cliff, near the Paragon, for warm sea-water bathing. The building is situated 110 feet from the level of the sea; and the water is raised through a horizontal channel excavated in the rock, by means of pumps worked by horses. The baths, formed of white marble, are of the dimensions of the celebrated warm-baths of Naples. The shower-baths are constructed so as to be supplied with either hot or cold water.

Vapour-baths, upon the principle of the Hon. Mr. Cochrane, are also included in this establishment. The whole are warmed by steam, brought from the outside of the building under the floors by means of pipes. An elegant vase in each dressing-room forms the receptacle; and, to add to other conveniences, the degree of heat of

any particular apartment, may be lowered or raised at pleasure.

BROADSTAIRS.

Either envy or emulation is invariably excited by the success of our neighbours. Margate on the one side, and Ramsgate on the other, having acquired a high reputation as bathing-places, Broadstairs, adopting the common principle, has attempted to rival them, or at least to participate in their profits.

Broadstairs, sometimes pronounced *Bradstow* by the inhabitants, is a hamlet belonging to the parish of St. Peter, in the Isle of Thanet, distant about three miles south-east from Margate, and two miles from Ramsgate. It has latterly become the resort of many respectable families during the summer, who, preferring retirement to the gaiety and bustle of a public place, find, in the society and accommodations that are to be met with here, every pleasure and amusement they can wish for. Many new buildings have been erected for their reception, so that now, what was originally an insignificant village, has become a convenient and pretty considerable little town.

In the harbour, and off its mouth, is the bathing-place. The machines and rooms are on the same principle and terms as those of Ramsgate and Margate; between which and Broadstairs, a constant intercourse is kept up; to be attributed principally to the shortness of the distance.

Lodging-houses are plentiful, and persons may live according to their own plan.

DOVER.

This celebrated sea-port, so much frequented by visitors to France, has of late imitated many of its neighbours, in aspiring to the rank of a regular watering-place. It is a town of high antiquity, situated in the eastern part of the county of Kent, seventy-two miles from London, sixteen from Canterbury, and twenty-two from Margate, in a pleasant valley. It was once walled round, and had ten gates. The environs are beautiful and romantic.

A little to the north of the town is Shakspeare's Cliff, so styled from the following appropriate description in the Tragedy of King Lear:

> "There is a cliff, whose high and bending head
> Looks fearfully on the confined deep;—
> How dizzy 'tis to cast one's eyes below!
> The crows and choughs, that wing the midway air,
> Shew scarce so gross as beetles. Half way down
> Hangs one that gathers samphire; dreadful trade!

Methinks he seems no bigger than his head.
The fishermen that walk upon the beach,
Appear like mice; and yon tall anchoring bark,
Diminish'd to her cock; her cock, a buoy
Almost too small for sight. The murmuring surge,
That on the unnumbered idle pebbles chafes,
Cannot be heard so high. I'll look no more,
Lest my brain turn, and the deficient sight
Topple down headlong.

SANDGATE,

A pretty village, situated midway between Folkstone and Hythe, about seventy-three miles from London, has suddenly and deservedly started into notice as a watering-place. Here are also many bathing-machines, besides comfortable warm-baths. Lodgings may be procured on reasonable terms. Some very good houses have been lately erected for the accommodation of strangers.

The beach consists entirely of shingle, so that the water is very clear, and by shelving gently from the shore, presents any depth that may be desired. The cliffs on the land-side, and all the walks and rides round Sandgate, are highly romantic and fascinating.

TUNBRIDGE-WELLS.

Among the mineral waters of the chalybeate kind, those of Tunbridge have long maintained distinguished pre-eminence; and this place owes less to the virtues of its springs than to the purity of its air, and its vicinity to town. This is now the oldest watering-place but one: Bath having been visited as such, early in the sixteenth century. The wells are a hundred yards above the sea; and the position of the hamlet is picturesque and inviting, the houses appearing like a large town in a wood. The village is nearly two miles in length by one in breadth. The place improves yearly.

The Wells:—Their Virtues and Qualities.

That part called the Wells, by way of distinction, is the centre of business and amusement. The springs rise here, and here is held the markets; and here also are situated the chapel, the assembly-rooms, and the public parades.

The discovery of the mineral springs has been ascribed to Dudley Lord North, a distinguished courtier in the reign of James the First. Having injured his constitution by fashionable excesses, his health was perfectly restored within the space of three months after he commenced the use of these waters, and his debilitated frame so completely invigorated, that he lived to the age of

eighty-five. The reputation of the Wells being thus established, they soon became the resort of invalids; and Lord Abergavenny having an estate in the neighbourhood, exerted himself to provide proper accommodations for such as might be induced to visit them. The springs were cleaned out and scoured; and during the summer season the neighbouring villages, and even Tunbridge town, although about six miles distant, were crowded with invalids. Buildings gradually arose in the immediate vicinity, and improvements were adopted to render them agreeable and convenient equally to the votaries of health and pleasure.

From the experience made with these waters, they have been found to be composed of steely particles, marine salts, an oily matter, an ochrous substance, a volatile vitriolic spirit, too subtle to be analysed, and a simple fluid.

Tunbridge water is excellently adapted to invigorate a relaxed constitution, to promote digestion, and to produce a cheerful flow of spirits. In nervous and female complaints, it is highly recommended. Caution, however, is necessary in their exhibition. A quarter of a pint for weak and delicate persons to begin with, which may be increased to half a pint or more; and this should be taken in equal draughts, at intervals of twenty minutes. Persons whose constitutions are more strong, may take double the quantity; still it is always advisable to commence with the smallest dose, gradually increasing it, and diminishing it towards the end of the dose, in the same proportion.

To give the waters a chance of producing beneficial effects, they should be combined with a due degree of exercise and temperance.

HASTINGS.

The bathing-machines here, which are thirty in number, stand to the westward of the town, close to the parade, on which is a small building called the bathing-room. A fine level sand at low water extends for a great distance, and the shore has such a gentle ascent, that the bathing is safe at any time of the tide. The sea also is perfectly clear and free from weeds, and every thing likely to inconvenience the bather.

The old warm-baths are situated at the west end of the promenade, and under efficient management. The

new warm and cold sea-baths on the beach, near High-street, are also commodiously fitted up.

Passing Eastbourne, Bognor, Little Hampton, Worthing, &c. places of minor consequence, though all possessing proportionate degrees of convenience, and where the air is pure and salubrious, the country agreeable and romantic, it may not be irrelevant, before we notice places of greater resort, to lay before our readers some practical observations on

SEA-BATHING AND SEA-AIR*.

Sea-air is prescribed by physicians in a variety of complaints, in consequence of its being considered of a more healthy nature than that on land; though, in its component parts, it is not known to possess a greater quantity of oxygen, on which the salubrious principle depends. It is, nevertheless, acknowledged to be a most powerful and valuable remedy, and is resorted to with the happiest success against most cases of debility.

As a discutient (substances which possess the power of repelling or resolving tumours), the peculiar power of *sea-salt* and sea-water is well known to be attended with considerable advantage, when judiciously applied.

On Bathing generally, but more particularly under a restorative point of view, &c.

As a salutary gymnastic, bathing is held in high estimation; and as a pleasurable and agreeable recreation, its votaries, during the summer season, are numerous and constant, wherever opportunities are afforded for its free and uninterrupted exercise.

Baths are distinguished into hot and cold, with intermediate modifications, and different modes of applying them; and are either *natural* or *artificial*. The *natural* hot-baths are formed of the water of hot springs, of which there are many in different parts of the world, especially in those countries where there are, or evidently have been, volcanoes. The *artificial* hot-baths consist of water, either fresh or salt, in its natural degree of heat; or they may be made cold by art—as by a mixture of nitre and sal ammoniac, &c.

* For these excellent directions in sea, and various other kinds of baths, and for the plain and important advice laid down in them, we acknowledge our obligation to the "NEW DOMESTIC MEDICAL MANUAL," by J. S. Forsyth; published by Sherwood and Co. Paternoster-row; to which source we have no hesitation in refering all who may have occasion to consult the catalogue of human infirmities, with a view to their alleviation.

The chief hot-baths in our country, are those of Bath, Buxton, and Matlock; which latter, however, are rather warm or tepid, than hot. The use of these baths is found to be beneficial in diseases of the head—as palsies, &c.; in diseases of the skin—as leprosies, &c.; obstructions and constipations of the bowels; the scurvy, and in many diseases of women and children.

Directions for the Use of the Cold-Bath, &c.

"Cold bathing has this good alone,
It spurs old John to hug old Joan,
And of the matrimonial two makes one."

The cold-bath, though popularly esteemed one of the most innocent remedies yet discovered, is not, however, to be adopted indiscriminately. On the contrary, it is liable to do considerable mischief in all cases of diseased *viscera*, and is not, in any case, proper to be used during the existence of costiveness, which should previously be obviated by appropriate laxatives. As a preventive remedy for the young, and as a general bracer for persons of a relaxed fibre, especially of the female sex, it frequently proves highly advantageous; and in general the popular idea is a correct one, that the *glow* which succeeds the use of cold or temperate baths, is a test of their utility; while, on the other hand, their producing *chilliness*, head-ache, &c., is proof of their being pernicious.

Cold water is a powerful tonic, but, like all others, is liable to the same abuses, consequently, in this respect, capable of doing mischief.

The first action of cold is to produce a sudden torpor of the skin, and to determine the volume of blood from the external to the internal parts; hence if a person be disposed to inward bleedings, spitting or vomiting of blood, or apoplexy, the first application of cold to the skin, may produce the complaint.

No one disposed to consumption ought ever to use the cold-bath: in such cases, SEA-AIR and SEA-BATHING—and SEA-WATER internally, accelerate the disease. All persons weakened by disease to a certain degree are incapable of bearing the concussion of the cold-bath; the utility of which arises from its secondary operation, *e. g.* the irritability is accumulated in the vessels of the skin, which are stimulated to act more strongly; the balance of blood is restored to the external surface, and kept up there, and a glow of heat ensues.

Those disposed to gouty affections should not use the cold-bath; by which is meant every degree of cold under 85°, which always prove more or less tonic in its operation. In many cases, where the patient is too weak to bear a bath of 40°, one of 65° acts like a charm: thus rheumatism is benefited by whatever strengthens the system, and particularly the skin; the first degree, *i. e.* 40°, will bring on the paroxysm, while a bath of 65° is an excellent preventive: hence the Matlock and Buxton waters are so useful.

Cold water, as well from its tonic power as from its gravity, tends to remove the debility incidental to the inhabitants of cities and large towns, who breathe an impure atmosphere, give way to luxurious habits of living, or lead sedentary lives. By accelerating the motion of the blood, and promoting the different secretions, it braces and gives permanent vigour to the system—purposes which are conceived to be most effectually answered by the application of SEA-WATER, not only on account of its greater specific gravity, but also because it is a more powerful stimulant, promoting the discharge from the skin, and rendering people less liable to the influence of cold.

The diseases in which the cold salt water is most serviceable, are those of the cachectic kind—in green sickness—profuse discharges—chronic inflammation of the eyes—aptitude to abortion—convulsions and rickets of children—in preventing the paroxysms of agues—in removing the debility consequent on febrile diseases, and the long-continued use of mercury—in a variety of those chronic affections, termed "nervous complaints," &c. particularly when its salutary effects are assisted by the moderate use of wine, or such other aliment or medicines as are adapted to the age, sex, constitution and complaints of the patient.

In scrofulous affections, and the enlargement of bones or tendons, commonly called white swellings, sea-air and sea-bathing afford considerable benefit. The internal use of sea-water, although it has little or no effect on some diseases of the skin, removes worms from the intestines of children, and prevents their reproduction; but as children can seldom be prevailed upon to take a sufficient quantity of any nauseous medicine, however beneficial, other means should be resorted to. Sea-water is

also useful in gravel—jaundice—fistula in ano—and is an excellent purgative, when taken in sufficient quantity, in paralytic complaints.

The external use of cold water affusion is of singular use in the treatment of scarlet fever at the commencement. It is also beneficial when applied to particular parts of the body, where its use may be continued much longer than the cold-bath, without danger. Cold affusions to the head are useful in many cases of those painful and local affections which are the result of intoxication; and against too great a flow of blood towards the head, when persons are menaced with apoplexy, or sudden death, from the rupture of a blood vessel of the brain.

Advice to Bathers, either in Salt or Fresh Water, &c.

People of delicate constitutions, or those much weakened from disease, ought not to bathe until the sun approaches near to his meridian height; and, indeed, with those who enjoy a tolerable degree of health, it may not always be proper to bathe immediately after rising from bed in the morning, a time suitable to some constitutions, although not to others. There are a variety of circumstances here which require consideration. In sultry moist weather, bathing should be discontinued; and patients in particular confined to their bed-chamber, with the windows of the apartment shut. A small clear fire would also be a recommendation, which, notwithstanding the state of the atmosphere, will not be found unacceptable to convalescents. Nothing can be more improper or inconsiderate than to immerse or to plunge the body hastily into cold water after a meal, when the stomach is loaded with food. The process of digestion by such means is interrupted so as with difficulty to accomplish its object, independent of a variety of other inconveniences known to occur after such a premature step. People, therefore, of weak habits, should stay until the digestion of their first meal is nearly perfected before they venture into the water.

Bathing dresses are too well known to need any description of them here; they generally consist of porous flannel, open in front like a wrapper, with short wide sleeves, that the water may come in contact with every part of the body as speedily as possible. To convale-

scents, one plunge, or two at the utmost, is sufficient; after which they should dry and dress as speedily as possible.

On coming out of the water, particularly after sea-bathing, where the air is keen and sharp, although the heat of the water is more uniform than in rivers, should chilliness or trembling come on, a small quantity of weak brandy and water, to which a few drops of the compound spirit of lavender may be added, will be found to be the best restorative—using a gentle degree of exercise. Other means may be used, should these prove insufficient; such as putting the patient to bed, and procuring warmth, &c. The pleasing glow of heat diffused over the body, after cold bathing, is a proof that it may be continued with benefit.

The Hot-Bath.

By a hot bath, is understood any degree of heat between 93° and 96° of Fahrenheit. It has a peculiar tendency to bring on a state of repose, to alleviate any local irritation, and thereby to induce sleep; it promotes personal cleanliness; is excellent to children affected with convulsions; in diseases of the skin; restores suppressed perspiration; relieves gouty, rheumatic, and hectic patients; and complaints in the region of the kidnies and loins. It is also used in the puffy swellings in the legs, and obstructions peculiar to females, &c. It is, upon the whole, a safer remedy than the cold bath, and more peculiarly applicable to very weak and irritable constitutions, whom the shock procured by the cold immersion would overpower, and who have not sufficient vigour of circulation for an adequate re-action.

In all cases, where the local formation of matter is the solution of the general inflammatory symptoms, experience directs the use of warm relaxing applications, rather than those which, by exciting a general re-action, would increase the local complaint. This object is particularly to be consulted when the part affected is one that is essential to life.

Hence it is that in fever, where there is a great determination to the lungs, the respiration appearing to be locally affected, independently of the oppression produced by mere febrile increase of circulation, practitioners have avoided the external use of cold, in order to promote the solution of the fever, and have trusted to general antiphlo-

gistic measures along with the topically relaxing application of warm vapour inhaled by the lungs.

Warm bathing appears to be particularly well calculated to relieve those complaints which seem to depend on an irregular or diminished action of any part of the alimentary canal; and the state of the skin produced by immersion in warm water, seems highly favorable to the healthy action of the stomach and bowels.

Another very important use of the warm bath, is in that species of eruption termed *Herpes**, by relaxing the skin, and rendering it more pervious, and admirably preparing it for receiving the stimulant applications, of tar ointment, mercurials, &c., that are intended to restore it to a healthy state.

The constitutions of children seem more extensively relieved by the warm bath than those of adults; and this remedy appears more generally applicable to acute fevers in them than in persons of a more advanced age.

When the warm bath produces its salutary operation, it is almost always followed by an easy and profound sleep.

In paralytic affections of particular parts, the powerfull stimulus of heated water is generally allowed; and in these cases, the effect may be assisted by any thing which will increase the stimulating properties of the water, as, for instance, by the addition of salt. In these cases much benefit may be expected from the use of warm sea-baths.

The application of the warm bath to certain parts of the body, *e. g.* the feet, often produces the most powerful effects in quieting irritation in fever, and bringing on a sound and refreshing repose.

The cases in which the warm bath is likely to be attended with danger, are particularly those where there exists a strong tendency to a determination of blood to the head; and apoplexy has sometimes been thus brought on.

The lowest temperature will be required for cutaneous complaints, and to bring on relaxation of the skin during febrile irritation; the warmer temperature in paralysis.—More heat should be employed on a deeply-seated than on a more superficial part.

---

* Distinguished by an assemblage of numerous little creeping ulcers, in clusters, itching very much, and difficult to heal, but terminating in furfuraceous *(branny)* scales.

The Tepid-Bath, and its Use.

A bath at about 90° is what we should term tepid. In a medicinal point of view, it produces the greatest effect in ardent fever, where the temperature is little above that of health, but the powers of the body weak, and not able to bear the vigorous application of cold immersion. In diseases of the skin, a tepid-bath is often quite sufficient to produce a salutary relaxation, with perspirability on the surface of the body. Dr. Saunders strongly recommends a tepid-bath, or even one of a higher temperature in the time of hemorrhagia, or obstructions of females. It is useful in chronic rheumatism of internal parts; in gout during the fit; also in head-aches, colds, and in inflammation about the head, inflammatory sore throat, &c.

Shower-Bath.

This is a kind of cold-bath, of modern invention, in which the water falls through numerous apertures on the body. It is applied, in every case, to the same purposes as the cold-bath, and is often attended with particular advantages. First, from the sudden contact of the water, which, in the common cold-bath, is only momentary, but which, in the shower-bath, may be repeated, prolonged, and modified at pleasure; and second, from the head and breast, which are exposed to some inconvenience and danger in the common bath, being here effectually secured, by receiving the first shock of the water. A proper apparatus for this purpose may be obtained at the shops.

The Vapour-Bath.

The vapour-bath forms a valuable remedy in a variety of cases. In most of the hot natural waters on the Continent, the vapour-bath forms a regular part of the bathing apparatus, and is there highly valued. In no country, however, is this application carried to so high an extent as in Russia, where it forms the principal and almost daily luxury of all the people, in every rank, and it is employed as a sovereign remedy for a great variety of complaints.

The Hon. Mr. Basil Cochrane, some short time back, published a treatise on the vapour-bath, from which it appears he has brought the apparatus to such perfection, that he can apply it to all degrees of temperature, partially or generally, by shower or by steam, with a great force or a small one, according to the particular circum-

stances under which patients are so variously placed who require such assistance. Connected with this article is the air-pump vapour-bath, or machine, to which the inventor has given this name. This apparatus has been found efficacious in removing paroxysms of the gout, and preventing their recurrence, in acute and chronic rheumatism, palsy, diseases of the skin, ulcers, lumbago, sciatica, &c. It has also been proposed in chilblains, leprosy, yaws, cramps, female obstructions, and dropsy, with every probability of success.

Medicated Baths.

This description of baths are such as are saturated with certain mineral, vegetable, and sometimes animal substances. Thus we have sulphur, chlorine, and iron-baths, simple or medicated, aromatic and milk baths. There is little doubt that such ingredients, if duly mixed, and a proper temperature given to the water, may, in certain complaints, be productive of effects highly beneficial.

Water impregnated with the sulphate of iron will abound with the bracing particles of that metal, and may be useful for strengthening the parts to which it is applied, re-invigorating debilitated limbs, stopping various kinds of bleeding, restoring the menstrual and hemorrhoidal discharges when obstructed, and, in short, as a substitute for the natural iron-bath.

There are various other medicated baths, such, for instance, as those prepared with alum and quicklime, sal ammoniac, &c., by boiling them together or separately in pure rain water. These have long been reputed as eminently serviceable in paralytic, and all other diseases arising from nervous and muscular debility.

DISEASES OF THE SKIN OF CHILDREN.

ERUPTIONS of various kinds make their appearance in the early periods of life, of which it is impossible at all times to convey any precise idea, by mere description, divested of technical terms. Some take on the resemblance of measles, others the small-pox; some that of the *nettle-rash,* and others the appearance of what has been vulgarly called scurvy (herpes, or shingles); all these eruptions, however different in appearance, yield to a well-regulated use of the warm, or medicated bath, with occasional calomel purgatives.

BUONAPARTE'S MEDICATED BATH.

THE following recipe for a medicated bath, Sir Arthur Clarke observes, he was favoured with from a French Physician, and which is the form Sir Arthur has recommended in a variety of cases of the diseases of the skin, from the slightest eruption to the most obstinate scorbutic complaints, approaching to leprosy.

To produce water similar to that of the Source Royal *at* Barege.

Take, for every gallon of water you wish to impregnate,

Alumine, - -	2 grains.
Carbonate of lime, - -	2 grains.
Hard Spanish soap - -	2 grains.
Muriate of soda (common salt)	4 grains.
Carbonate of soda (dried) -	20 grains.
Sulphuret of potash - -	16 grains.

Grind these materials together, and boil them in as much water as will dissolve them; stir them over the fire, till the sulphuretted hydrogen gas is disengaged, which is known by its resemblance to the smell of rotten eggs; then mix the ingerdients with the water of the bath, previously prepared.

When this combination is formed, and the proper degree of heat added, we may expect every salutary effect by this artificial water, as certainly, observes Sir Arthur, as if used at its source.

Julius Cæsar, and the Roman General Sertorius, bathed in the waters of Barege, to restore their wonted energy, after their campaigns in Gaul and Spain. Henry IV. of France frequented them in his youth, and Louis XVI. dignified them with an hospital for his wounded officers, and another for his soldiers; who, when all other means of cure failed, were, from the remotest parts of France, sent to Barege, as a last and *sure resource*.

M. Dessault, an eminent French surgeon, published an essay recommending their use in stone and gravel; and Sir Christopher Meighan published a treatise on their use for the cure of gun-shot and other wounds, muscular contractions, schirrous tumours, and many other disorders; but the general use of the waters at Barege, is for disorders of the skin, gouty, rheumatic, rigid and palsied limbs, and cases of painful wounds. Monsieur Montant, at the Military Hospital at Barege, has given an account of their utility in such cases.

The most successful results have been obtained from the use of artificial medicated baths, as well as from the source of the medicated springs; and as the latter are inaccessible to the subjects of this country, whose means do not allow of visiting them, it is a consideration of the first importance, to be enabled to supply this defect;

and if the use of artificial mineral waters may not prove so serviceable as that of the natural springs, it is to be ascribed to the local circumstances of the latter, and not to any real difference between them; for if the waters themselves are capable of producing any effect on the constitution, it must be absurd to say, that their perfect imitation should be less efficacious; and if the analysis that has been made of them be correct in the first place, and the imitation in the second, there can be no doubt but the artificial will prove of the same intrinsic value as the natural. Chemistry has happily placed this within our reach; and as *all* mineral waters can be imitated with a scrupulous exactness at home, where we have the power of creating any temperature, the heat may be accommodated to the state of the patient, and by varying the degree from the scale of the natural hot springs at Barege, Aix-la-Chapelle, and Bourbon les Bains, the benefits arising from the use of those springs may be obtained; and that this can be done at home, cannot be denied. If, therefore, the valetudinarians who resort annually in crowds to the watering-places on the Continent, could be induced to seek health and amusement in their native country, much useless emigration might be spared, and the immense wealth that is lavished abroad, being circulated at home, would contribute in no mean degree to the industry and civilization of the lower classes of people in this country.

Advantage of the Artificial over the Natural Medicated Warm Baths.

The temperature of the natural medicated warm baths remains always the same, and the patient is ordered from one spring to another, merely on account of temperature; frequently from Bath to Buxton, and from thence to Matlock. The advantages then of the artificial medicated baths over the natural springs are obvious: the temperature may be regulated, and the strength of the bath may be increased or diminished, according to the will of the physician, or the state of the patient, through the whole treatment of disease, and the expence and trouble of going to the different sources may be thus avoided*.

* For the mode of preparing several artificial mineral waters, see the "NATURAL AND MEDICAL DIETETICON," a work principally intended for convalescents, valetudinarians, and hypochondriacs; and admirably adapted as a guide to the use of mineral springs generally, and to the different watering-places, p. p. 360. Published by Sherwood and Co. Paternoster-row.

PRESCRIPTIONS.

Female Pills.

Take Aloes, - - - - 1 drachm.
Calomel, - - - - 1 scruple.

Make twenty pills; one, two, or three may be taken for a dose, according to constitution. BAILLIE.

Gout.

Take Long pepper, - - - 12 grains.
Aromatic confection, - - 1 scruple.
Simple peppermint-water, - - ½ ounce.
Nutmeg-water, - - 2 drachms.

Mix, and make a draught; to be taken every sixth hour. WILSON.

Sir EDWARD WILMOT'*s Prescription for Gout.*

Take Raleigh's confection, - - 1 scruple.
Steel prepared with sulphur, - - 7 grains.
Black pepper, - - - 8 grains.
Syrup of ginger, as much as sufficient to make a bolus.

To be taken every six hours, and washed down with three table spoonfuls of the following mixture, *e. g.*

Take Simple peppermint-water, - - 6 ounces.
Simple cinnamon-water, } of each 2 ounces.
Eaton's styptic tincture*, }
Refined sugar, - - - 2 drachms.

Make a mixture.

Dr. HARTLEY'*s, for the same.*

Take Cardiac confection, - } of each 1½ drachm.
Aromatic species, - }
Syrup of ginger, - - - 6 drachms.
Orange-peel water, } of each 2 ounces.
Simple cinnamon-water, }

Make a mixture; of which take three table spoonfuls occasionally, for gout in the stomach, and the sickness or fainting fits usual in that disorder.

Cataplasm in Gout.

Take Mustard-seed, bruised, } of each 6 ounces.
Horse-radish, scraped small, }
Strong vinegar, as much as is sufficient to make the above into the consistence of a poultice. Dr. R. TAYLOR.

(To be applied to the soles of the feet in wandering gout.)

To prevent Costiveness in Gout.

1. Take The vinous tincture of rhubarb, - 2 ounces.
Aromatic tincture, - - - 1 drachm.

Mix for a draught; to be taken when a motion is wanted.

Or,

2. Take Compound tincture of aloes, - 1½ ounce.
Compound spirit of lavender, - 1 drachm.

Mix for a draught; to be taken every other morning. SAUNDERS.

Powder of the Extract of Monkshood.

Take Extract of Wolfsbane, - - 1 grain.
Liquorice-root, powdered, - - 10 grains.

Make a powder; to be taken twice or three times daily. STOERCK.

(In gout and rheumatism).

---

* Calcined green vitriol, 1 drachm—proof spirit, tinged yellow with a little oak-bark.

Useful Memoranda.—No. II.

IMPORTANT PRECAUTIONS FOR HOT WEATHER.

SEE that your dogs have constant and easy access to plenty of water; and, if convenient, get them into the fields to bathe, and eat grass. Keep your singing birds in the shade, as they are liable to become blind, as well as otherwise considerably influenced by the burning heat of the sun. If you hang them up in the open air, the cage should be covered with a green sod, chickweed, a piece of thick cloth or carpeting, and take care they have enough of water. In short, all animals ought to have a plentiful and frequent supply of the same fluid during sultry weather.

Drinking cold fluids, in a state of excessive heat, is extremely dangerous. The body should invariably be suffered to cool before cold draughts of beer or water be taken, particularly where the transition is from an active to a passive state.

At no season of the year ought people to be more cautious against sitting in currents of air or draughts, then during the summer heats. And nothing can be more dangerous than to throw off our clothes suddenly, during a high state of perspiration.

Method of Beautifying and Preserving the Colour of all sorts of Wood, by means of a Stain, Varnish, and Powder; which Powder may likewise be used in Polishing and Sharpening Steel-edged Instruments.*

Take pumice stone, and burnt alum, of each equal parts, finely powdered, true *lapis calaminaris*. (Tutty powder) tile and green vitriol calcined to redness, of each half a pint, finely powdered, mix them into a powder, and rub the wood with it, with a woollen cloth, until it received a good polish.

N. B. They must be finely levigated for edged tools.

Then use the following stain: Take six pounds of stick lac, boil it in three gallons of water till the colour is extracted, and strain off the liquor; then add to it half a pound of madder root, and boil it until reduced to three quarts: take half a pound of cochineal, half a pound of kermes berries, and four ounces of clean scarlet rags, digest them in a glass vessel with one gallon of spirit of wine, and two ounces of pearl-ash dissolved in half a

---

* For this invention, a patent was granted March 30, 1778, to Mr. Humphry Jackson, of Great Tower-hill.

pint of water, till all the colour is extracted. Strain, and add the decoction of stick lac to it; lastly, add as much aquafortis as will bring it to a proper red colour, with which brush over the wood till it become of the colour wanted.

The Varnish.—Take a pound of clear white amber, and half a pound of gum copal, put them into a close vessel, with six pounds of oil of nuts, half a pound of spirit of turpentine; of oil of rosemary and lavender, each half a pound; digest them in a sand heat until the oils become as thick as syrup; strain for use; when clear, varnish the wood with a brush, and let it dry.

JUDGE BULLER'S OBSERVATIONS,

ON THE *UTILITY* AND *BENEFIT* TO BE DERIVED FROM DESTROYING MACHINES INTENDED TO EXPEDITE LABOUR.

In an action tried at the Salisbury assizes in 1791, brought by Mr. Phelps against the hundred of Bradford, to recover the damage he had sustained in consequence of a riot, by which his house and furniture were partly demolished, and a machine used in scribbling wool, taken from his workshops and burnt; on the jury finding a verdict for full damages, Judge Buller made the following observations:

"The workmen have shewn their disapprobation to the different improvements that have taken place in other manufactories as well as this; but deluded, infatuated people, how have they mistaken their own interests! I know myself the advantage which machines have been to the cotton manufactory in Lancashire; for there, where only four thousand people were employed, there are now forty thousand; and were the gentlemen concerned in that business to give up their machines, it would occasion greater jealousies and discontents than were caused by their first introduction.

"This country has long been famous for making superfine cloth, in which it has excelled, and supplied, not only this country, but all Europe, with that article; and if machines are not used, to enable the manufacturer to sell as cheap as other countries now do, they will be undersold, and find their goods returned on their hands; for that man who can afford to sell his commodity the cheapest, will have the greatest sale, and the most expeditiously increase his concern: independent of this consequence, it is a public benefit."

Secrets of Trade.—No. V.

HOOPER'S PILLS.

THESE are composed of the aloe pill with myrrh (Rufus' pill) sulphate of iron, and canella bark, to which is added a portion of ivory black: the following are laid down as the ingredients, with their proportions:

Take Green vitriol, - - } of each, 1 ounce.
Water, - - - }
Dissolve, and add
Barbadoes aloes, - - 2 pounds 8 ounces.
White cinnamon, - - - 6 ounces.
Gum myrrh, - - - 2 ounces.
Opoponax, - - - - - 3 drachms.

Or,

Take Salt of Steel, - - - 2 ounces.
Aloes with cinnamon, in powder, - 1 pound.
Mucilage of gum tragacanth, - } of each, a sufficient quantity.
Tincture of aloes, - - }
Cut each drachm into 18 pills, and put 40 in each box.

HUDSON'S PRESERVATIVE FOR THE TEETH AND GUMS.

This is made with equal parts of the tincture of myrrh, tincture of bark, and cinnamon water, to which are added arquebusade and gum arabic.

HUILES ANTIQUES.

The basis of the best of these oils is the oil of Ben, from the nuts of the Guilangia Moringa; or oil of hazel, which is a very good substitute, since it is inodorous, colourless, and may be kept for a considerable period without becoming rancid: it is therefore well adapted to receive and retain the odour of those vegetables that yield but a small proportion of essential oil.

HUILE ANTIQUE A LA ROSE.
HUILE ANTIQUE A LA TUBEROSE.
HUILE ANTIQUE A LA FLEUR D'ORANGE.
HUILE ANTIQUE AU JASMIN.

Oil of Ben nuts, scented with the essences of the different flowers.

HUILE ANTIQUE A LA VIOLETTE.

Oil of Ben, olives, or almonds scented with orrice, in the same manner as making essence de jasmin.

HUILE ANTIQUE AU MILLE FLEURS.

Oil of Ben, or almonds, mixed with different essences, to the fancy of the perfumer.

IPECACUANHA LOZENGES.

Each lozenge contains half a grain of ipecacuanha.

JAMES' POWDER.

This is the *pulvis antimonialis* of the London Pharmacopœia, 1788, which is an imitation of James': crude antimony in gross powder, hartshorn shavings, of each, two pounds; roast in an iron pot until they form a grey powder; put this into a long pot, with a small hole in the cover, keep it in a red heat for two hours, and grind it to a fine powder.

2. Dr. James' Powder. The *pulvis antimonialis*, or powder of antimony of the London Pharmacopœia since 1809; crude antimony, one pound; hartshorn shavings two pounds: proceed as above.

3. *Chenevix's Antimonial Powder.* Precipitate obtained by pouring butter of antimony into water, and phosphate of lime obtained by dissolving burnt bones in spirit of salt, and precipitating the solution with an equal weight of the spirits of hartshorn; dissolve these in spirit of salt, and pour the solution into water alkalized with spirits of hartshorn. Its virtues are febrifuge and diaphoretic, three grains to eight grains; in larger doses, ten grains to a scruple: it is emetic and purgative. It is also used as an alterative in cutaneous diseases.

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

(*Continued from* p. 181).

SIGHT, EXTREMELY INDISTINCT, in fevers, the patient being much exhausted, shows considerable danger. When the eyes become uneasy and hot, after reading, &c. the eye requiring to be removed farther for the examination of any minute object that it has been accustomed to do, indicates the convexity of the cornea to have become morbidly lessened, and that the use of convex glasses is positively pointed out.

The eyes affected by dark spots and streaks appearing on the objects viewed, shews a serious affection of the eyes; but this is not, as has been supposed, a sign that blindness must inevitably follow, since it is an affection that not unfrequently admits of being removed by proper measures.

SKIN, COLD, whilst thirst and internal heat are experienced, is a bad symptom in a fever. When the skin is

pungently hot, leaving a smarting sensation of heat on the fingers of the examiner, shews great malignancy in fever. When it assumes a greenish yellow colour, it gives name to the green sickness. When of a yellow cast, as well as the urine, whites of the eyes, and stools white, or of a clayey appearance, jaundice may be presumed to be present.

SLEEP returning with appetite for food, may be considered as a most favourable symptom in every fever. Calm sleep, after delirium, is a favourable event.

Sleepiness often precedes and accompanies erysipelas of the face; and if it increases with the disease, it points out much danger.

SNEEZING, discharge of a limpid fluid from the eyes and nose, and frequent cough, shew that catarrh and *coryza*, as it is termed, are forming.

SPIRITS DEPRESSED, in the beginning of fevers, shows the fever to be of a low and malignant kind. When the spirits are depressed without cause, accompanied with loss of appetite, sickness, pain and oppression in the stomach, distinguish hypochondriacal affections.

SPITTING, discoloured with blood, brought up by coughing, indicates a condition of the lungs requiring the greatest care and attention.

SPOTS, livid, accompanied with putrid and bleeding gums, and great weakness, are signs of scurvy. Purple spots denote great danger in malignant fever.

The Toilette.—No. I.

COSMETICS AND PERFUMES.

MILK OF ROSES.

Take Prepared kali,	6	grains.
Oil of Almonds,	1	ounce.
Essence of Bergamot,	2	drachms.
Rose water,	3	ounces.
Orange-flower-water,	2	drachms.

Mix.

Or,

Take Jordan almonds,	8	ounces.
Oil of almonds, Castille soap, White wax, of each,	½	ounce.
Spermaceti,	2	drachms.
Oil of lavender,	½	drachm.
Rose water,	3	pints.
Rectified spirits of wine,	1	pint.

Mix—and use to render the skin fair, smooth, and white, &c.

Or,

Take Bitter almonds,	8	ounces.
Distilled water,	6	ounces.
Elder-flower-water,	4	ounces.

Make an emulsion, and add

Oil of tartar,	3	ounces.
Tincture of Benzoin,	2	drachms.

Cosmetic.—Beautifies and renders the skin smooth.

POMATUM.

Take hog's lard, two pounds; rose water, three ounces; beat up together, then melt, let it settle, separate the water, beat up again into a light mass, and add essence of lemon.

COLD CREAM.

Take oil of almonds, one pound; white wax, four ounces; melt, pour into a warm mortar, add by degrees, rose water, one pint: it should be very light and white. —Or,

Take trotter oil, one pint; rose water, two pints; melted spermaceti, one pound eight ounces; white wax melted, one ounce; oil of almonds, two ounces; essence of Bergamot, one ounce; beat up together, and kept floating upon some rose water: as the preceding: and an excellent application to chaps, cooling, &c.

ORANGE POMMADE.

Hog's lard, one pound; oil of palms, eight ounces; essence of Neroli, one ounce.

ROLL POMATUM.

Suet, five pounds; white wax, eight ounces; spermaceti, two ounces; oil of lavender and essence of Bergamot, each, half an ounce.

POMMADE DIVINE.

Beef marrow, one pound eight ounces; cinnamon, one ounce and an half; storax, calamine, Benzoin, and Florentine orris, of each, one ounce; cloves and nutmegs, of each, one drachm.—Or,

Mutton suet, one pound eight ounces; storax, calamine, Benzoin, Florentine orris, Cyprus root, cinnamon, cloves, and nutmegs, of each, nine drachms: keep melted in a gentle heat for some time.—Or,

Mutton suet, four pounds; white wax, one pound; essence of Bergamot and essence of lemon, of each, one ounce and an half; oil of lavender and oil of marjorum, of each, half an ounce.

THE PROCESS FOR MAKING SPRUCE-BEER*.

BY CAPT. JAMES COOK.

"We at first made it of a decoction of the spruce leaves; but, finding that this alone made the beer too astringent, we afterwards mixed with it an equal quantity of the tea plant (a name it obtained in my former voyage, from our using it as tea then, as we also did now) which partly destroyed the astringency of the other, and made the beer exceedingly palatable, and esteemed by every one on board. We brewed it in the same manner as spruce-beer, and the process is as follows: first, make a strong decoction of the small branches of the spruce and tea plants, by boiling them three or four hours, or until the bark will strip with ease from off the branches; then take them out of the copper, and put in the proper quantity of molasses, ten gallons of which are sufficient to make a ton, or two hundred and forty gallons of beer; let this mixture just boil; then put it into the casks, and to it add an equal quantity of cold water, more or less, according to the strength of the decoction, or of your taste: when the whole is milk-warm, put in a little grounds of beer, or yeast, if you have it, or any thing else that will cause fermentation, and in a few days the beer will be fit to drink. After the casks have been brewed in two or three times, the beer will generally ferment itself, especially if the weather is warm. As I had inspissated juice of wort on board, and could not apply it to a better purpose, we used it, together with molasses or sugar, to make these two articles go farther. For of the former I had but one cask, and of the latter little to spare for this brewing. Had I known how well this beer would have succeeded, and the great use it was of to the people, I should have been better provided. Indeed, I was partly discouraged by an experiment made during my former voyage, which did not succeed then, owing, as I now believe, to some mismanagement.

---

* As the 'Cottage Physician and Family Adviser,' is not limited, and that every thing that contributes to preserve the health of mariners, is of the utmost importance to a commercial nation, we make no apology for laying the above method of making an wholesome anti-scorbutic beverage before our readers, which produced such good effects among the men on board his Majesty's ship the Resolution, during her voyage round the world.

"Any one, who is in the least acquainted with spruce-pines, will find the tree which I have distinguished by that name. There are three sorts of it; that which has the smallest leaves and deepest colour, is the sort we brewed with, but, doubtless, all three might safely serve that purpose. The tea plant is a small tree or shrub, with five white petals, or flower-leaves, shaped like those of a rose, having smaller ones of the same figure in the intermediate spaces, and twenty or more filaments or threads. The tree sometimes grows to a moderate height, and is generally bare on the lower part, with a number of small branches growing close together towards the top. The leaves are small and pointed, like those of the myrtle; it bears a dry roundish seed case, and grows commonly in dry places near the shores. The leaves, as I have already observed, were used by many of us as tea, which has a very agreeable bitter and flavour, when they are recent, but loses some of both when they are dried. When the infusion was made strong, it proved emetic to some in the same manner as green tea."

QUALIFICATIONS OF A FOOTMAN.

He must have eyes like a hawk, but be as blind as a bat; ears like a cat, but be as deaf as a post: must have more sensibility than the sensitive plant, but yet be as hard as a stone; must be wise as a counsellor, yet ignorant as an ass; his movement swift as that of an eagle, but smooth as that of a swallow: in manners and politeness a Frenchman, in probity and virtue an Englishman; in dress, a gentleman; in disposition, a saint; in activity, a harlequin; in gravity, a judge: he must have a lady's hand, a maiden speech, and a light foot: in protection and defence, he must be a lion; in confidence and trust, like the law of the Medes and Persians, "which altereth not;" in domestic management, a Moses; in chastity, a Joseph; in pious resolution, a Joshua; in wisdom, a serpent; in innocence, a dove.—*Footman's Directory.*

Housekeeping and Husbandry.—No. V.

Housekeeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

BOILING*.

THIS most simple of culinary processes is not often performed in perfection; it does not require quite so much nicety and attendance as roasting; to skim your pot well, and keep it really boiling (the slower the better) all the while—to know how long is required for doing the joint, &c. and to take it up at the critical moment when it is done enough—comprehends almost the whole art and mystery. This, however, demands a patient and perpetual vigilance, of which few persons are capable.

The cook must take especial care that the water really boils all the while she is cooking, or she will be deceived in the time; and make up a sufficient fire (a frugal cook will manage with much less fire for boiling than she uses for roasting) at first, to last all the time, without much mending or stirring.

---

* "The process by which food is most commonly prepared for the table—boiling—is so familiar to every one, and its effects are so uniform, and, apparently, so simple, that few, I believe, have taken the trouble to inquire how or in what manner those effects are produced, and whether any, and what, improvements in that branch of cookery are possible. So little has this matter been an object of inquiry, that few, very few indeed, I believe, among the millions of persons who, for so many ages, have been daily employed in this process, have ever given themselves the trouble to bestow one serious thought on the subject.

"Boiling cannot be carried on without a great expence of fuel; but any boiling-hot liquid (by using proper means for confining the heat) may be kept boiling-hot for any length of time, almost without any expence of fuel at all.

"The waste of fuel in culinary processes, which arises from making liquids boil unnecessarily, or when nothing more would be necessary than to keep them boiling hot, is enormous: I have not a doubt but that much more than half the fuel used in all the kitchens, public and private, in the whole world, is wasted precisely in this manner. But the evil does not stop here. This unscientific and slovenly manner of cooking, renders the process much more laborious and troublesome than otherwise it would be, and (what by many will be considered of more importance than either the waste of fuel, or the increase of labour to the cook) the food is rendered less savoury, and, very probably, less nourishing and less wholesome.

"It is natural to suppose that many of the finer and more volatile parts of food (those which are best calculated to act on the organs of taste) must be carried off with the steam, when the boiling is violent."—*Count Rumford's 10th Essay*, pages 3 and 6.

When the pot is coming to a boil, there will always, from the cleanest meat and clearest water, rise a scum to the top of it; proceeding partly from the foulness of the meat, and partly from the water: this must be carefully taken off as soon as it rises. On this, depends the good appearance of all boiled things.

When you have scummed well, put in some cold water, which will throw up the rest of the scum. The oftener it is scummed, and the cleaner the top of the water is kept, the cleaner will be the meat. If let alone, it soon boils down and sticks to the meat; which, instead of looking delicately white and nice, will have that coarse and filthy appearance we have too often to complain of, and the butcher and poulterer be blamed for the carelessness of the cook in not scumming her pot.

Many put in milk, to make what they boil look white; but this does more harm than good: others wrap it up in a cloth; but these are needless precautions: if the scum be attentively removed, meat will have a much more delicate colour and finer flavour than it has when muffled up. This may give rather more trouble—but those who wish to excel in their art, must only consider how the processes of it can be most perfectly performed: a cook who has a proper pride and pleasure in her business, will make this her maxim on all occasions.

Put your meat into cold water, in the proportion of about a quart of water to a pound of meat; it should be covered with water during the whole of the process of boiling, but not drowned in it; the less water, provided the meat be covered with it, the more savoury will be the meat, and the better will be the broth.

The water should be heated gradually, according to the thickness, &c. of the article boiled; for instance, a leg of mutton of ten pounds weight should be placed over a moderate fire, which will gradually make the water hot, without causing it to boil for about forty minutes; if the water boils much sooner, the meat will be hardened, and shrink up as if it was scorched—by keeping the water a certain time heating without boiling, its fibres are dilated, and it yields a quantity of scum, which must be taken off as soon as it rises.

"If a vessel containing water be placed over a steady fire, the water will grow continually hotter, till it reaches the limit of boiling; after which, the regular accessions of heat are wholly spent in converting it into

steam; the water remains at the same pitch of temperature, however fiercely it boils. The only difference is, that with a strong fire it sooner comes to boil, and more quickly boils away, and is converted into steam."—*Buchanan on the Economy of Fuel*, 1810.

There was placed a thermometer in water in that state which cooks call gentle simmering—the heat was 212°, *i. e.* the same degree as the strongest boiling. Two mutton chops were covered with cold water, and one boiled a gallop, and the other simmered gently, for three quarters of an hour; the flavour of the chop which was simmered, was decidedly superior to that which was boiled; the liquor which boiled fast, was in like proportion more savoury, and, when cold, had much more fat on its surface: this explains why quick boiling renders meat hard, &c.—because its juices are extracted in a greater degree.

Reckon the time from its first coming to a boil.

The old rule of fifteen minutes to a pound of meat, we think rather too little; the slower it boils, the tenderer, the plumper, and whiter it will be. For those who choose their food thoroughly cooked (which all will who have any regard for their stomachs), twenty minutes to a pound will not be found too much for gentle simmering by the side of the fire; allowing more or less time, according to the thickness of the joint, and the coldness of the weather; always remembering, the slower it boils the better.

Without some practice it is difficult to teach any art; and cooks seem to suppose they must be right, if they put meat into a pot, and set it over the fire for a certain time—making no allowance, whether it simmers without a bubble, or boils a gallop.

Fresh killed meat will take much longer time boiling than that which has been kept till it is what the butchers call ripe, and longer in cold than in warm weather: if it be frozen, it must be thawed before boiling as before roasting; if it be fresh killed, it will be tough and hard, if you stew it ever so long, and ever so gently. In cold weather, the night before the day you dress it, bring it into a place of which the temperature is not less than 45 degrees of Fahrenheit's thermometer.

The size of the boiling pots should be adapted to what they are to contain; the larger the saucepan the more room it takes up on the fire; and a larger quantity of water requires a proportionate increase of fire to boil it.

In small families, we recommend block tin saucepans,

&c. as lightest, and safest; if proper care is taken of them, and they are well dried after they are cleaned, they are by far the cheapest; the purchase of a new tin sauce-pan being little more than the expence of tinning a copper one.

Take care that the covers of your boiling pots fit close, not only to prevent unnecessary evaporation of the water, but that the smoke may not insinuate itself under the edge of the lid, and give the meat a bad taste.

If you let meat or poultry remain in the water after it is done enough, it will become sodden, and lose its flavour.

Beef and mutton a little under done (especially very large joints, which will make the better hash or broil), is not a great fault—by some people it is preferred; but lamb, pork, and veal, are uneatable, if not thoroughly boiled—but do not overdo them.

A trivet, or fish-drainer, put on the bottom of the boiling pot, raising the contents about an inch and a half from the bottom, will prevent that side of the meat which comes next the bottom from being done too much,—and the lower part of the meat will be as delicately done as the other part; and this will enable you to take out the contents of the pot without sticking a fork, &c. into it. If you have not a trivet, use four skewers, or a soup-plate laid the wrong side upwards.

Take care of the liquor you have boiled poultry or meat in; in five minutes you may make it into excellent soup. The good housewife never boils a joint without converting the broth into some sort of soup. If the liquor be too salt, only use half the quantity, and the rest water; wash salted meat well with cold water before you put it into the boiler.

Gravy for Boiled Meat,

May be made with parings and trimmings; or pour from a quarter to half a pint of the liquor in which the meat was boiled, into the dish with it, and pierce the inferior part of the joint with a sharp skewer.

Parsley and Butter.

Wash some parsley very clean, and pick it carefully leaf by leaf; put a tea-spoonful of salt into half a pint of boiling water; boil the parsley about ten minutes, drain it on a sieve, mince it quite fine, and then bruise it to a pulp.

The delicacy and excellence of this elegant and innocent relish, depends upon the parsley being minced very fine; put it into a sauce-boat, and mix with it, by degrees, about half a pint of good melted butter, only do not put much flour to it, as the parsley will add to its thickness: never pour parsley and butter over boiled things, but send it up in a boat.

In French cookery books, this is called, *"Melted Butter, English Fashion;"* and, with the addition of a slice of lemon cut into dice, a little allspice and vinegar, *"Dutch Sauce."*

N. B. To preserve parsley through the winter, in May, June, or July, take fine fresh gathered sprigs, pick and wash them clean, set on a stewpan half full of water, put a little salt in it, boil and skim it clean, and then put in the parsley, and let it boil for a couple of minutes, and take it out, and lay it on a sieve before the fire, that it may be dried as quick as possible; put it by in a tin box, and keep it in a dry place; when you want it, lay it in a basin, and cover it with warm water a few minutes before you use it.

Fennel and Butter for Mackarel, &c.

Is prepared in the manner we have just described.

For mackarel sauce, or boiled soles, &c. some people take equal parts of fennel and parsley; others add a sprig of mint, or a couple of young onions minced very fine.

Mackarel Roe Sauce.

Boil the roes of mackarel (soft roes are best), bruise them with a spoon with the yolk of an egg, beat up with a very little pepper and salt, and some fennel and parsley boiled and chopped very fine, mixed with almost half a pint of thin melted butter. Mushroom catsup, walnut pickle, or soy, may be added.

Anchovy Sauce.

Pound three anchovies in a mortar with a little bit of butter, rub it through a double hair sieve, with the back of a wooden spoon, and stir it into almost half a pint of melted butter, or stir in a table-spoonful of essence of anchovy.—To the above, many cooks add lemon-juice and cayenne.

Foreigners make this sauce with good brown sauce, or white sauce, instead of melted butter, and add to it

catsup, soy, and some of their flavoured vinegars, as elder or tarragon, pepper and fine spice, sweet herbs, capers, eshallots, &c. They serve it with most roasted meats.

N. B. Keep your anchovies well covered; first tie down your jar with bladder moistened with vinegar, and then wiped dry, tie leather over that: when you open a jar, moisten the bladder, and it will come off easily: as soon as you have taken out the fish, replace the coverings—the air soon rusts and spoils anchovies.

Liver and Parsley Sauce, or Liver and Lemon Sauce.

Wash the liver (it must be perfectly fresh) of a fowl or rabbit, and boil it five minutes in five table-spoonsful of water; chop it fine; or pound or bruise it in a small quantity of the liquor it was boiled in, and rub it through a sieve; wash about one third the bulk of parsley leaves, put them on to boil in a little boiling water, with a tea-spoonful of salt in it; lay it on a hair sieve to drain, and mince it very fine; mix it with the liver, and put it into a quarter of a pint of melted butter, and warm it up: do not let it boil.—Or,

To make Lemon and Liver Sauce,

Pare off the rind of a lemon, or of a Seville orange, as thin as possible, so as not to cut off any of the white with it; now cut off all the white, and cut the lemon into slices, about as thick as a couple of half crowns; pick out the pips, and divide the slices into small squares; add these, and a little of the peel minced very fine, to the liver, prepared as directed above, and put them into the melted butter, and warm them together, but do not let them boil.

N. B. The poulterers can always let you have fresh livers, if that of the fowl or rabbit is not good, or not large enough to make as much sauce as you wish.

Some cooks, instead of pounding, mince the liver very fine (with half as much bacon), and leave out the parsley; others add the juice of half a lemon, and some of the peel grated, or a tea-spoonful of tarragon or chili vinegar, a table-spoonful of white wine, or a little beaten mace, or nutmeg, or allspice; if you wish it a little more lively on the palate, pound a shallot, or a few leaves of tarragon or basil, with anchovy, or catsup, or cayenne.

An Estimation of the Loss of Weight which takes place in Cooking Animal Food.

[*From the Philosophical Magazine.*]

"It is well known, that, in whatever way the flesh of animals is prepared for food, a considerable diminution takes place in its weight. We do not recollect, however, to have seen any where a statement of the loss which meat sustains in the various culinary processes, although it is pretty obvious that a series of experiments on this subject, would not be without their use in domestic economy.

"We shall here give the result of a series of experiments which were actually made on this subject in a public establishment; premising that, as they were not undertaken from mere curiosity, but, on the contrary, to serve a purpose of practical utility, absolute accuracy was not attended to. Considering, however, the large quantities of provisions which were actually examined, it is presumed that the results may be safely depended upon for any practical purpose. It would no doubt have been desirable, to have known not only the whole diminution of weight, but also the parts which were separated from the meat in the form of aqueous vapour, jelly, fat, &c.; but the determination of these did not fall within the scope of the enquiry.

	lbs.	*ozs.*
"28 pieces of beef, weighing	280	0
"Lost in boiling	73	14

"Hence the weight lost by beef in boiling was, in this case, about 26½ lbs. in 100 lbs.

	lbs.	*ozs.*
"19 pieces of beef, weighing	190	0
"Lost in roasting	61	2

"The weight lost by beef in roasting, appears to be 32 per cent.

	lbs.	*ozs.*
"9 pieces of beef, weighing	90	0
"Lost in baking	27	0

"Weight lost by beef in baking, 30 per cent.

	lbs.	*ozs.*
"27 legs of mutton, weighing	260	0
"Lost in boiling, and by having the shank-bone taken off	62	4
"The shank-bones were estimated at 4 ounces each; therefore the loss by boiling was	55	8

"The loss of weight in legs of mutton, in boiling, is 21⅓ per cent.

	lbs.	*ozs.*
"35 shoulders of mutton, weighing	350	0
"Lost in roasting	109	10

"The loss of weight in shoulders of mutton, by roasting, is about 31⅓ per cent.

	lbs.	ozs.
" 16 loins of mutton, weighing - - - - - -	141	0
" Lost in roasting - - - - - - -	49	14

" Hence loins of mutton lose, by roasting, about 35½ per cent.

	lbs.	ozs.
" 10 necks of mutton, weighing - - - - -	100	0
" Lost in roasting - - - - - - -	32	6

" The loss in necks of mutton, by roasting, is about 32⅓ per cent.

" We shall only draw two practical inferences from the foregoing statement.—1st, In respect of economy, it is more profitable to boil meat than to roast it. 2dly, Whether we roast or boil meat, it loses, by being cooked, from one-fifth to one-third of its whole weight."

The loss of roasting arises from the melting out of the fat, and evaporating the water; but the nutritious matters remain condensed in the cooked solid.

In boiling, the loss arises partly from the fat melted out, but chiefly from gelatine and osmazome being extracted and dissolved by the water in which the meat it boiled; there is, therefore, a real loss of nourishment, unless the broth be used; when this mode of cooking becomes the most economical.

MAKING OF CONSERVES.

Rob de Berberis.—Juice of barberries strained, one pint; white sugar six ounces; boil down to a jelly.

2. Juice of barberries and sugar, equal parts: boil down. *Refrigerant.*

Rob de Cerasis.—Kentish cherry juice, strained, one pint; sugar, six ounces: boil down. *Refrigerant.*

Rob de Cornis.—Cornelean cherries, one pound; boil in a little water, pulp through a sieve, add sugar, six ounces; and boil down.

Rob Cydoniorum.—Juice of quinces, cleared by settling awhile, six pounds; boil to two pounds; add sugar, six ounces, and boil down.

Diacydonium.—Flesh of quinces, boiled soft in water, eight pounds; white sugar, six pounds; boil to a jelly, and pour into moulds.

Rob of Plums.—As the former; from unripe plums: *astringent.*

Currant Jelly.—Juice of red currants, white sugar, of each, equal parts, one pound; sugar, six ounces; boil down.

2. Juice of red currants, white sugar, of each equal parts, stir it gently and smoothly for three hours; put it into glasses; and in three days it will concrete into a firm jelly.

Rob of Elder Berries with Sugar—Juice of elder berries, four pounds; sugar, one pound. *Detergent, used in gargles.*

2. Juice of elder berries, sixteen gallons; sugar, eighty-seven pounds; produced one hundred and thirty pounds.

Jelly of Apples.—Apple juice strained, four pounds; sugar, one pound: boil to a jelly.

Strawberry Jelly.—Juice of strawberries, four pounds; sugar, two pounds; boil down.

Gooseberry Jelly.—Dissolve sugar in about half its weight of water, boil; it will be nearly solid when cold: to this syrup add an equal weight of gooseberry juice, and give it a boil, but not long, for otherwise it will not fix.

Damson Cheese.—Boil the fruit in water enough to cover it, and pulp through a very coarse sieve; to each pound add four ounces of sugar; boil till it begins to candy on the sides, then pour it into tin moulds.

*** Other kinds of plums as well as damsons may be treated in the same way, as also cherries, and several kinds of fruit.

Scotch Marmalade.—Juice of Seville oranges, two pints; yellow honey, two pounds; boil to a proper consistence.

Honey of Roses.—Dried red roses, four ounces; boiling water, three pounds; infuse, strain; add honey, five pounds; and boil down: *used in cooling detergent gargles.*

Rob Diacaryon.—Juice of green walnut-husks, four pounds; honey, two pounds; boil it down. Stomachic, from a drachm to half an ounce.

Rob Diamorum.—Juice of mulberries, four pounds; honey, two pounds; boil down: *cooling.*

Conserve of Wormwood.—Leaves of wormwood, one pound; sugar, three pounds; beat or ground into a conserve. *Tonic, Stomachic*

Conserve of Oranges.—Yellow part of the peel of Seville oranges, one pound; sugar, three pounds. *Stomachic.*

AN ACCOUNT OF THE GREAT VIRTUES OF RHUBARB, COMBINED WITH CREAM OF TARTAR.

[*From Sir William Fordyce's Method of Cultivating and Curing that Plant in this Country*].

Of the cream of tartar, let half an ounce be dissolved in a quart of boiling water; of which let the patient drink one half every twenty-four hours, giving, in a cup-full of it, ten grains of powder of the same rhubarb, twice or thrice within that space of time.

Mix a quarter of an ounce of rhubarb in powder, with three quarters of an ounce of the cream of tartar, into the form of a linctus, with oxymel of squills. A teaspoonful of this, taken twice or thrice a day, is one of the best medicines for a dropsy, hitherto known.

Add sixty grains of our rhubarb to as much of the salt of tartar, boil them for a quarter of an hour in six ounces of water in a tin saucepan, strain it through blotting-paper; and you have what one of the best writers on the *Materia Medica* calls *Anima Rhabarbari*. One teaspoonful of this given once a-day to a child of a year old, twice a-day to one of twenty-four months old, and three times a-day to one a year older, is one of the best compositions as yet known, for strengthening the stomach and bowels of little children, and preventing the big bellies, rickety joints and limbs, incident to their age.

Put half an ounce of the fibrous roots of our rhubarb, with two drachms of this same salt of tartar, into a bottle of brandy, or as much aniseed water; and you have an excellent tincture and domestic medicine for the wind cholic.

ASTONISHING ACCUMULATION OF VALUE FROM RAW MATERIALS.

There is an instance hitherto unnoticed in the annals of English industry, wherein, by the manufacturer, an article is raised in price, from one halfpenny to thirty-five thousand guineas. This takes place in the manufacture of *watch springs*—a pound of crude iron costs one halfpenny, which is converted into steel; that steel is made into watch springs, every one of which is sold for half a guinea, weighing only the tenth of a grain: after deducting for waste, there are in a pound weight seven thousand grains; it therefore affords steel for seventy thousand watch springs, the value of which, at half a guinea each, is *thirty-five thousand guineas*.

DIRECTIONS FOR MAKING DISTILLED WATERS, &c.

(Concluded from page 246).

Succory Water.—From the leaves; eight pounds to the gallon.

Spear-wort Water.—From the herb; it is acrid—vomits instantly; and in cases of poison being taken, is preferable to any medicine yet known, as it does not excite any contraction of the upper part of the stomach, and thus defeat its own intention, as white vitriol sometimes does.

Strawberry Water.—Fruit bruised, twenty pounds sufficient quantity; draw two gallons and a half: very fragrant.

Simple Lavender Water.—Collected in the distillation of the oil: mostly used to scent soaps.

Silver-weed Water.—From the herb: is used in dress ing of French gauzes, and although it has neither taste nor smell, common water will not supply its place.

Sassafras Water.—From the root: diaphoretic.

Saxifrage Water.—From the herb.

Small Snail Water.—Baulm mint, hart's-tongue, ground-ivy, flowers of the dead nettle, mallow flowers, elder flowers, of each four ounces; snails freed from their shells, whites of eggs, of each four ounces; nutmegs, half an ounce; milk, a gallon: distil in a water bath to dryness.

2. Nutmegs, one ounce; water, sufficient quantity: distil a gallon: used in incipient consumption.

The Water of Black Cherries.—The fruit with the stones bruised, twelve pounds to the gallon.

2. Almond (bitter) cake bruised, four pounds; draw five gallons: antispasmodic; contains prussic acid, when drawn very strong;—six pounds of cherry-stones to the pint, is deleterious; expunged from the Pharmacopœia in 1745.

*** As late experiments have shewn the efficacy of prussic acid, when sufficiently diluted, in phthisis, may not the increase of that disease be referred to the diminished use of this medicine?

Vanilla Water.—From the pods: fragrant; used in perfumery.

White Poppy Water.—From the flowers: narcotic; much used in some parts of Lincolnshire, every cottager growing the plant for his own consumption in making this water.

Water of Pale Roses.—From white roses.

Water of Red Roses.—Fragrant, but inferior to that of the common rose.

Horticulture.

JULY.

THE KITCHEN-GARDEN.—Now, as many principal crops will be arrived to perfection, and some mature crops gathered off, the ground should be prepared for the reception of others in succession, and some main crops for autumn and winter.

Many articles will now require sowing and planting, which must be particularly attended to in proper time this month.

To sow—several successional and principal crops are necessary; as turnips, colewort, cabbages, endive, lettuces, kidney-beans, spinach, radishes, carrots, onions, turnip-radish, black Spanish radish, finochio, coriander, borage, beets, small salading, &c.

—— No hot-bed sowing is required at this season.

Planting—is now requisite in many full crops for autumn and winter, &c. and some for autumnal succession; as savoys, broccoli, coleworts, borecole, cabbage, celery, endive; leeks, lettuce, some late beans for production in August and September, &c. cauliflowers for autumn and winter; and to prick out several seedling plants, of cabbages, coleworts, broccoli, celery, borecole, and various aromatic and other pot-herbs.

FRUIT-GARDEN AND ORCHARD.—At this season the most diligent attention is still necessary in the operation of summer pruning, and nailing wall and espalier trees, both in continuance of the former regulation, and more particularly in that wholly omitted before, to regulate the numerous shoots of the year, which in the latter case will now be grown into confused disorder.

Summer pruning—where commenced in May or June, and the improper and superfluous shoots displaced, will not be so considerable at this time; and the principal business required is to fasten in the retained regular shoots to the walls, &c. according as they advance in growth, and to cut out useless after-shoots.

——— But where the summer pruning of wall and espalier trees is omitted till this time, great confusion must consequently occur in the numerous shoots of the year, and should now be regulated with the utmost at-

tention and expedition, that the whole may be completed early in the month.

FLOWER-GARDEN AND PLEASURE-GROUND.—The flower-garden and pleasure-ground, &c. having been furnished in the preceding months with the requisite articles, the principal work now consists in keeping all the different compartments in proper order, in the neatest manner, and to give any necessary regulation to the flowers, plants, shrubs, &c.

Annual Flowers—having been all principally sowed, planted and removed to the places where they are to flower, now only require occasional waterings, especially those in pots; and some to be supported with sticks.

WORK IN THE NURSERY.—The nursery business in this month comprises the continuation of several works of the two former, May and June, consisting of hoeing, weeding, watering, and some occasional shading, propagating by budding, layers, cutting, some transplanting and pricking out, with some occasional works of pruning, training, &c.

Weeding and Watering—will now demand particular attention, for as weeds generally at this season continue advancing considerably in all parts, they should be diligently kept under; and in dry weather many sorts of small young plants will need frequent watering; and is particularly necessary to all plants in pots.

Hoeing—perform in dry weather, to destroy weeds between rows of young trees, and in all compartments where weeds are advancing in considerable growth, and where the hoe can be introduced, cutting them up radically, that they may not grow again, and that the ground may thereby appear in a clean neat order; for, by giving a proper hoeing, and eradicating the weeds effectually, you loosen and freshen the surface beneficially to the growth of the plants.

——— *Likewise seed-beds and others*—of small young plants in close growth, where the hoe is not admissible, should be carefully weeded by hand, before the weeds increase much in size to spread, entangle with, and injure the plants, now in their infant state.

THE GREEN-HOUSE.—Any green-house exotics of tender succulent plants, still remaining in the house, remove now into the open air; or if continued longer in the green-house, have the full air admitted day and night; such as ceruses, African aloes, torch thistle, ficoides, &c.

Water—will now be necessary to all green-house plants every day or two, in dry weather.

Fresh earth—or loosen the earth in the tops of the pots occasionally, especially where the surface appears crusted or binding.

THE HOT-HOUSE AND STOVE.—The hot-house plants are still principally to remain in this preservatory, and the bark-bed heat continued, especially in the pinery, but no fires; they will now require a large admission of fresh air, and frequent waterings; or in hot-houses having many different sorts of exotics much crowded, some may now (b. m.) be removed into the green-house or glass case, with the sashes open in front, there to remain five or six weeks, during the hotter part of the season.

APPERT'S METHOD OF PRESERVING GREEN PEASE, ASPARAGUS, ARTICHOKES, KIDNEY-BEANS, &c.

THE numerous letters and reports in favour of M. Appert's method of preserving alimentary substances or *comestibles*, we shall pass over, and confine ourselves to the more useful parts of his observations. After objecting to the old modes of preserving, by desiccation, or by adding some substance (as sugar, salt, vinegar, &c.) to prevent fermentation, as more or less destructive of the flavour of the things to be preserved, and as more or less unwholesome; he states his own newly-discovered method to consist in, 1st, Placing the alimentary substances in strong glass bottles or in jars; 2d, Accurately stopping the bottles or jars with the finest corks, by driving them in for three-fourths of their length, and fastening them down with wire; 3d, Putting each bottle into a coarse linen bag, made on purpose for it, and placing all the bottles so prepared in a copper, into which water is then poured till it is almost up to the corks; 4th, The water is then heated to a certain degree, and for a longer or shorter time, according to the nature of the contents of the bottles. The lid of the copper or boiler is made to rest upon the bottles or jars, and a wet cloth is laid round its edge to confine the steam as much as possible. A bottle will sometimes burst with detonation. None of the bottles should be completely full, for fear of such an accident. The day after the operation, the corks may be secured still more by a covering of pitch or cement.

The sorts of *green pease* preferred by the author for preservation are, the *clamart* and the *crochu;* the *michaux* he rejects. The pease being gathered when not two young, and the largest separated, they are put into bottles, observing to jog the bottles, that they may contain as many as possible. When corked, they are submitted to the water-bath, which is kept boiling for an hour and a half or two hours. The large pease also are to be bottled, and treated in the same way, but with thirty minutes longer boiling.

Asparagus—being washed as usual, are plunged into boiling, and afterwards into cold water, before they are bottled: if they are preserved whole, they are carefully ranged in a jar with their heads downwards. They are left in the bath no longer than till it begins to boil.

Garden Beans.—The larger sorts, gathered when the bean is about half an inch long, are shelled, and bottled with a small bunch of savory, &c. and submitted to the bath, which is to boil for an hour and a half.

Green Kidney Beans are gathered as for common use, the best sort for preserving are known by the name of *Bayolet.* They are to be cut and stringed, and then bottled. The water bath should boil for an hour and an half; but if the beans are large, they should be cut in two or three lengthwise, and then an hour's boiling will be sufficient.

Artichokes (whole) are treated the same as asparagus, and left an hour in the bath. *Cauliflowers* require the same treatment, with only half an hour's boiling. A longer heat is given in dry, and a shorter in wet seasons. Culinary and medicinal *herbs* are to be pressed close in the bottles with a stick, and, after being corked up, submitted but a short time to a boiling heat. The process should be gone through as quickly as possible, for preserving *juices* and *fruits.* Fruits should be gathered before they are perfectly ripe: they will be best if gathered in the middle of the season. *Gooseberries* and *grapes,* picked and bottled like the pease, are placed in the bath till it begins to boil: the fire is then removed from under the copper, and a quarter of an hour afterwards the water is let out through a cock, or by other convenient means. Gooseberries are preserved better if the seeds are previously taken out. Cherries and raspberries are preserved in the same manner as gooseberries.

Strawberries require to be squeezed through a searce, as for making ices; and every pound of fruit should be well mixed with half a pound of fine sugar, and the juice of half a lemon. Their colour is lost in some degree, but it may be restored by art when they are used. *Apricots* are gathered when ripe, yet somewhat hard; are cut lengthwise, and have the stones removed with a knife: they are then bottled, and to each bottle twelve or fifteen kernels of the fruit are added. In all other respects they are treated like the gooseberries. Peaches require a similar operation. The author has found by experiment, that syrup of raisins preserves the aroma and pleasant acidity of fruits infinitely better than sugar.—(Vide "*Natural and Medical Dieteticon,*" p. 185 et seq.)

SOME RARE AND SEASONABLE RECIPES FOR MAKING GENUINE FAMILY WINES.

CURRANT WINE.

Red currants, seventy pounds, bruised and pressed; brown sugar, ten pounds; water, a sufficient quantity to fill up a fifteen-gallon cask: yields a pleasant red wine, rather tart, but keeping well.

2. White currants, one sieve, red currants one gallon, press; to each gallon of juice, add three gallons of water; to ten gallons of liquor, add thirty pounds of sugar, and ferment: when you bung it up, add brandy, two pounds to each ten gallons of wine.

3. Juice eleven quarts, that is, the produce of a sieve; sugar, twenty pounds; water, a sufficient quantity to fill up a nine-gallon cask; ferment, and when it has done working, add brandy, four pounds: for half a hogshead, use currants, three sieves, eighty-four pounds; brandy, one gallon.

BLACK CURRANT WINE.

Berries, twenty pounds; brandy, two pounds to four pounds; water, twelve gallons to fourteen; yeast, two spoonfuls; fermented for eight days, then bottled and well corked: yields a pleasant, rather vinous, cooling liquor, of a purple colour; or they may be made into wine like the common currants: by the first process the wine is a dark purple, rather thick, but good.

2. Juice of boiled fruit and water, equal parts; to each quart of liquor, add sugar, one pound; and ferment.

COWSLIP MEAD.

Honey, thirty pounds; water fifteen gallons; boil, when cold, add, lemons sliced eighteen; cowslip pips, fourteen gallons; yeast, eight ounces, and sweet briar, one handful: ferment and bottle.

CHERRY WINE.

Cherries, thirty pounds; moist sugar, five pounds; water, a sufficient quantity to fill a seven-gallon cask: ferment.

COWSLIP WINE.

To each gallon of water, add three pounds of white sugar; add yeast, and ferment a day and a half, then add cowslip-flowers, one gallon; the rind and peel of two lemons or Seville oranges, to each gallon; the third day strain, and continue the fermentation.

ELDER WINE.

Juice of the berries, eight gallons; water, twelve gallons; brown sugar, sixty pounds; dissolve by boiling; add yeast, and ferment; then add, brandy, four pounds, and bung it up for three months: disagreeable when cold, but is mulled with allspice, and drank warm, in winter-time, as a stimulant.

WHITE ELDER WINE. *(English Frontiniac).*

Water, six gallons; white sugar, eighteen pounds; flowers of white elder berries, half a gallon; lemon-juice, eight ounces; yeast, six ounces; raisins, six pounds: ferment and bottle.

FRENCH WINES.

Made from selected grapes, (the bad ones being cut off the stalks with bad scissars), pressed, and only the expressed juice fermented; these are cordial, but seldom used in making medicines, currant or raisin wine being substituted.

MIXED FRUIT WINE.

White currants, three sieves; red gooseberries, two sieves; these should yield forty pints of juice; to each gallon add water, two gallons; sugar, three pounds and a-half: ferment.

2. White, red, and black currants, cherries, especially black-heart, raspberries, of each equal parts; to each four pounds of the bruised fruit, add water, one gallon; steep for three days, press, and to each gallon of liquor add yellow sugar, three pounds; ferment, and when finished add to each nine gallons, two pints of brandy; if

it does not fine soon enough, add half an ounce of isinglass, dissolved in a pint of water, to each nine gallons.

3. Fruit, any that is to be had quite ripe, equal parts; express the juice, and if very rich in flavour, an equal quantity of water may be added: to each gallon of liquor, add four pounds of sugar, and ferment as usual.

*** These English fruit wines, differ from those made from the grape, by containing the malic acid instead of the tartaric.

GRAPE WINE

May be made from the juice of ripe or even unripe grapes, or from an infusion of about five pounds of the young leaves or cuttings of the vine in seven or eight gallons of water, adding sugar about three pounds to each gallon of liquor.

GOOSEBERRY WINE.

Ripe berries bruised, ten gallons; water, thirty gallons; soak twenty-four hours; strain; to each gallon add Lisbon sugar two pounds, and ferment.

2. Bruised berries, eighty pounds; water, ten gallons; soak for a day; strain; to each gallon add loaf sugar six pounds, and ferment.

3. Juice, ten gallons; water, twenty gallons; sugar, seventy pounds: ferment.

4. Berries, one hundred pounds; brown sugar, six pounds; water, a sufficient quantity to fill a fifteen gallon cask; yields a good yellowish white, very transparent wine.

5. Green berries, forty pounds; water, four gallons; bruise together, and the next day press out the juice; to every gallon add sugar, three pounds: ferment.

GINGER WINE.

Bruised ginger, twelve pounds; water, ten gallons; boil for half an hour; add sugar, twenty-eight pounds; boil till dissolved; then cool, and put the liquor along with fourteen lemons sliced, and three pounds of brandy; add a little yeast, and ferment; bung it up for three months, and then bottle it.

GINGER BEER.

Lump sugar, three pounds; bruised ginger, two ounces; cream of tartar, one ounce; four lemons sliced; pour on them boiling water four gallons; add yeast, eight ounces; work for four days, then bottle in half pints, and tie the corks down.

2. Moist sugar, six pounds; ginger, five ounces; cream of tartar, two ounces; lemons, four; yeast, eight ounces; water, seven gallons; work two or three days; strain; add brandy, one pound; bung very close, and in fourteen days bottle it: a cooling effervescent drink in summer.

HOW TO DO THINGS IN STYLE.

If your wife is to give a dinner in *style*, she must have more money from you than the usual allowance. If you are to go to Brighton in *style*, you must first pay a visit to your banker;—and before you can finish your house in *style*, in Middlesex, you must mortgage part of your estate in Essex. If you wish to bring up your sons in *style*, you must educate them in card-playing, *milling*, and drinking, &c.; and, if you discover a disposition in them towards intrigue, attribute it to a proper *spirit*. Upon every occasion, inculcate that they are *gentlemen*, which will give them a proper contempt for the vulgarity of trade. As soon as they are able to ride, provide them with horses, that they may occasionally take the air, particularly on Sundays, and not spoil their constitutions by study or application to business. Provide also a servant to ride behind them, to take care of their horses, and pay the turnpikes in *style*. Encourage them to visit the different races, and, occasionally, to shew their knowledge by betting; in some cases they will probably win, and where they lose, they will gain some experience. Never check them in their little genteel expences incurred either at the gaming-table, the *mill*, or on the race-course; for, if you do, you will infallibly make them hate you, and besides this, you will damp their genius and growing spirit. If they discover an inclination to go abroad, encourage it, for there is nothing so much improves a young man of great spirit and small fortune as travelling. With respect to keeping company, there is but one rule; namely, to associate with those either very much their superior in rank and fortune, or those as much their inferior: at the gaming-table, on the race-ground, and *Fives Court*, plenty of both descriptions may be met with.

DISEASES OF THE SKIN.

Anatomical History of the Skin, &c.

THE *cutis,* or true skin, is formed of the termination of the superficial exhalent arteries, veins, nerves, and absorbents, and is covered by the *cuticle* or scarf skin.

Whatever may be the complexion of the individual, the true skin is always white, and the scarf skin, which has neither blood-vessels or nerves, is itself colourless. Between the true skin and the scarf skin there is a mucous substance, called *rete mucosum,* which gives colour to the body, and on which the complexion of the person entirely depends. In the *negro,* this substance is black; in the *mulatto,* of a copper-colour; in the *Egyptian,* brown; and white in the *Albinos,* and in the people of cold climates.

The outside covering, or cuticle, is a fine transparent close-set tunic, drawn over the whole surface of the body. The foulness of this tunic is of frequent occurrence, producing, if not washed, pimples, tetters, and other diseases of the skin. This insensible and inorganic medium, (the scarf skin) which has not inaptly been compared to a tight shirt drawn over and fitted to every part of the body, renders the introduction of substances into the system, which are in contact with the body, more difficult; that is, it renders absorption on the surface of the body less energetic than on the surface of internal cavities; hence cutaneous absorption here has so little activity, under certain circumstances, that it has been questioned, whether or not it existed, and various experiments have been made, to prove that the skin has no absorbing power at all. The additional weight, however, of the body, after remaining for some time in the bath, although denied by Haller—the evident swelling of the inguinal glands after long continued immersion of the feet in warm water (an observation made by Richerand)—the effects of cathartic and vermifuge medicines, externally applied —the effects of mercurial friction, and of the medicated baths, in a number of cases, are insuperable proofs that, under different circumstances, absorption is effected by the skin.

By the structure of the skin, we see that it both secretes and absorbs: that poisons and antidotes have been conveyed into the system through it, cannot be denied; and

that healthy and morbid matter has been secreted from it, is equally true; but the principal use of the skin is to carry off from the system the redundant heat and moisture by sensible and insensible perspiration. On the fitness then of this organ to perform those duties, depends, in a great measure, the state of health of the individual: if the perspiration be in excess, the system is enfeebled by the evacuation; and if it be deficient, disease must be the consequence.

Existing Sympathy between the Skin, Stomach, and Bowels, and between the Skin and Liver.

There exists between the skin, the stomach, and bowels, a *sympathy*, or what, in medical language, is called, a "consent of parts," that is, when one part (suppose the skin) is affected, the other (the stomach and bowels) sympathises, as it were, and takes on an analogous action.

Also between the skin and liver, or in other words, between the *perspiration* and *biliary secretion*, there exists one of the strongest sympathies in the human frame. This is a consideration of the first practical importance, not only in the cure of cutaneous diseases, but of *bilious*, *dyspeptic*, and other complaints; for by directing our operations, observes Sir Arthur Clarke, towards any one of the functions in question, we can decisively influence the other. For example, the vapour bath, or James' powders, by producing a perspiration, increases the secretion of bile; and mercury, while it promotes the secretion of bile, increases at the same time the insensible perspiration.

This consent of parts between the skin and liver, accounts for the augmented secretion of bile in warm weather and in hot climates, corresponding with the increased perspiration.

Eruptions on the skin, particularly those on the face, are commonly the consequence of some previous affection of the liver, or of the alimentary canal; and arise from sympathy between those organs and the skin. They are often mistaken eruptions, and as such treated without any effect. Their cause is sometimes very obscure, but they are almost always traced to some circumstance which has obstructed or checked the sensible or insensible perspiration: hence it must be obvious, that in all eruptive complaints, the *Barege*, or medicated warm-bath

(see p. 264-5) promises relief, and must be considered the most powerful auxiliary in the cure of those disorders, although there is no class of disorders in which cold sea-bathing has been so improperly, though so universally recommended. In this opinion, we perfectly concur with Sir Arthur Clarke, and in this he is also borne out by the opinion of Dr. A. P. Buchan: *e. g.*

Dr. Buchan on Cold Sea-Bathing, in Cutaneous Diseases, &c.

In his excellent Treatise on Sea-bathing, Dr. Buchan says, that persons suffering under cutaneous diseases are not benefited, but in general rendered worse, by bathing in the sea. As many people, however, with complaints of the skin, either of their own accord, or by the advice of others, do resort to the sea, I have omitted no opportunity of enquiring among those persons who were likely to afford me information on this subject; and although some have observed that bathing in the sea must do good in eruptive complaints, because it makes them come out (that is, it makes them worse), I have not discovered any grounds to induce me to alter the opinion here stated.

In almost every species of cutaneous disorders, there is more or less of inflammatory action, or increased circulation in the affected part: hence the cold bath must act as a repellent, forcing the circulation, and that matter which the vigour of the constitution has thrown upon the skin, to some internal part, thereby producing a congestion in the liver, the lungs, the brain, or some other vital organ.

Eruptions repelled by the cold bath, have been known to produce a brain fever, which ended in madness; and several cases are on record, of repelled eruptions having produced liver complaints, asthmas and dropsies; particularly in the feeble periods of infancy and old age. Such cases should render us watchful at all times, to avoid repelling eruptive diseases. In slight eruptions, which sometimes itch so violently as to prevent sleeping, the cold bath has been very generally recommended, but without any advantage. In several cases of this kind, in which cold sea-bathing has been continued for a fortnight, three weeks, or a month, and the itching by its use aggravated, the warm medicated bath gave immediate relief, and in a short time removed every appearance of the complaint.

HISTORY OF DYSPEPSY, OR INDIGESTION, &c.

THIS ailment is met with in every country, in every class of society, in every season of the year. In its restricted signification, Dyspepsy is limited to derangement in the functions of the stomach, with any other accompanying disease. The inconveniences of this limitation are sufficiently obvious; for it may be extended to those cases of indigestion which are attended with well-marked general fever, local inflammation of the stomach, or obvious cognisable disease of a remote organ. It may be further reduced to primary and secondary; and

The Symptoms common to both,

are described as follows: *e. g.* they are extremely diversified; and may be divided into such as are referable to the stomach* itself, or to its sympathies with other parts of the body. Among the first may be enumerated loss of appetite, nausea, pain in the epigastrium or hypochondria†, heartburn, a sense of fulness, distention or weight in the stomach; a feeling as if a ball were lodged in the gullet; acid or fetid eructations; pyrosis (water-brash) or the vomiting of a clear liquor, often in vast quantity; and lastly, a sensation of *sinking* or fluttering at the pit of the stomach.

To the second head of dyspeptic symptoms, among many others, may be added, costiveness, or an irregular state of the bowels, with a morbid appearance of the evacuations; pain of the back, and turbid urine; a disagreeable taste in the mouth, especially on first waking; tooth-ache, palpitation, pulsation in the epigastrium; irregularity of the pulse; a short dry cough, and occasional difficulty of breathing; giddiness and head-ache, sometimes referred to the fore, but more commonly to the back part of the head; languor, lassitude, and great depression of spirits, with fear of death, or of impending evil.

---

* The region, or part immediately over the stomach.

† The hypochondria, or hypochondriac regions, are those spaces in the abdomen that are under the cartilages of the false ribs, on each side of the epigastrium.

Appearance of the Tongue, &c. How far it may be taken as a Criterion.

The tongue is very generally referred to, as affording evidence of the state of the stomach; but it will frequently be found, that the tongue is perfectly clean when the stomach is most incontestibly disordered. It would seem, indeed, as if the morbid appearance, its fur, dryness, preternatural redness and smoothness, and its chopped aspect, are referable to the state of the constitution, rather than to any particular derangement of the stomach. When, however, the tongue is observed to be *furred* and *moist* (its true character in common Dyspepsia), that is, when the secretions of the mouth are depraved, it may reasonably be presumed that there exists a regularly disordered state of the stomach.

Dr. Gregory, in his Theory and Practice of Physic, has classed Indigestion under the following head, to which he has added remarks on each variety, which our limits will not admit of extracting.

Dr. Gregory's Tabular View of the Varieties of Primary Dyspepsy.

" 1. Dyspepsia from occasionally overloading the stomach.
2. ——— from habitual over-feeding.
3. ——— from habitual indulgence in spirituous liquors.
4. ——— from want of air and exercise.
5. ——— from exercise, or long continued evacuations.
6. ——— from anxiety of mind."

Tabular View of the Varieties of Secondary Dyspepsia.

" 1. Dyspepsia symptomatic of general feverishness.
2. ——— of habitual constipation.
3. ——— of chronic diseases of the liver.
4. ——— of chronic diseases of the spleen.
5. ——— of functional disturbance of the uterus.
6. ——— of obscure disease of the kidney.
7. ——— of chronic affections of the bronchia.
8. ——— of chronic cutaneous diseases.

" It is unnecessary to say," observes Dr. Gregory, " that there is no one drug which will fufil the great object of treatment, that of giving tone to the weakened stomach of a dyspeptic patient. This can be obtained only by

measures calculated to avert the cause which may have excited the disease. The tone of the stomach never fails without some assignable reason, which strict enquiry will detect, and the knowledge of which will point out the proper means of relief. Nor is it often that these will fail of success, provided the patient will have sufficient firmness to submit to them, and afterwards remain sensible that his health is in his own hands. The assistance of the physician, however, is very often required, where the patient either cannot or will not submit to the measures which prudence dictates. In such circumstances, we must endeavour to aid the digestive process by medicines; but I would wish to impress upon the mind, the impropriety of trusting to them in dyspeptic cases. It should be remembered, that almost any drug will injure digestion in a healthy state, and we should learn therefore, to be sparing of medicine when the stomach is weakened by disease."

Treatment of Indigestion, &c.

In every form of this complaint, attention to diet is indispensable, and the patient must have regard, not to its quality only, but to its quantity. In a weakened state of the stomach, it must have little given to it to do. The body is strengthened, not in proportion to the quantity of food taken in, but to that which is thoroughly digested. Differences in the habits of life will, of course, lead to important differences in the kind and quantity of diet which should be permitted to a dyspeptic patient; but the following may be regarded as rules of very general application: it should consist in a due mixture of animal and vegetable food, but the former should be eaten only once a day. It should be thoroughly masticated. Great varieties of food at any one time should be prohibited, as leading to an indulgence of the appetite beyond the wants of the system. Articles of difficult digestion should be carefully avoided; such as all kinds of smoaked, hard, dried, salted, and long-kept meat; all those dishes where too much nutritious matter is collected in a small space, eggs, for instance, potted meats, strong soups, and preparations of suet, fat and butter; lastly, all raw vegetables whatever, with the exception of ripe fruits. Regularity in the hours of meals should be rigorously enjoined, and the patient directed to abstain from food at all other times.

PRESCRIPTIONS.

Indigestion.

Take Magnesia, - - - - 2 scruples.
Powdered rhubarb, - - - 5 grains.
Powdered nutmeg, - - - 3 grains.
Make a powder, to be taken morning and evening.

Or,

Take Magnesia, - - - - 3 drachms.
Rhubarb, - - - - 1 scruple.
Water, - - - 4 ounces.
Cinnamon water, - - - 1½ ounce.
Liquor of potash, - - - 10 drops.
Syrup of ginger, - - - - 2 drachms.
Make a mixture, and take two table spoonfuls three times a day.

To Restore the Tone of the Stomach.

Take Infusion of quassia, - - - 5 ounces.
Tincture of cascarilla, - - } of each, ½ ounce.
Compound tincture of cardamoms, }
Of this mixture, take three table spoonfuls three times a day, occasionally adding twenty drops of diluted sulphuric acid: (Indigestion).

Also,

Take Rhubarb, - - - - 10 grains.
Ginger, - - - - - 10 grains.
To be made into a bolus, with conserve of roses, and taken occasionally in the middle of the day, with the addition of the above mixture. FORSYTH.

Nervous Head-ache.

Where head-ache or vertigo prevails as a symptom of some nervous disease, the following will be found serviceable, *e. g.*

Take Socotrine aloes, - - } of each, 1 drachm.
Powdered rhubarb, - }
Compound powder of cinnamon, - 1 scruple.
Hard soap, - - - - ½ drachm.
Syrup, enough to form the mass; to be divided into fifty pills, of which two will be sufficient for a dose: to be taken occasionally, or with two table spoonfuls of the following mixture, twice a day, *e. g.* CLARKE.

Take Bruised Gentian root, - - - ½ ounce.
Sweet flag root, sliced, - - } of each, 3 drachms.
Cardamom seeds, bruised, - }
Orange peel, dried, - - - 2 drachms.
White wine, - - - - 2 pints.
Infuse them for eight days, to be taken in conjunction with the pills as directed.

*** If head-ache be occasioned by over distention of the vessels of the head, bleeding from the arm, or cupping at the nape of the neck, or the application of several leeches to the temples, with the frequent use of cooling aperients, and a spare diet, ought to be employed.

Cooling Purgative.

Take Epsom salts, - - - 4 to 6 drachms.
Mint water, - - - - 3 ounces.
Tincture of jalap, - - - 1 drachm.
Make a draught for one dose.

BATHS, WELLS, WATERS, AND MINERAL SPRINGS.

(Continued from p. 266).

BRIGHTON.

THIS delightful and much improved place of fashionable resort, is fifty-two miles from the metropolis. In its present state, the town is estimated to contain upwards of twenty thousand settled inhabitants, and receives more than this number of annual visitors, for the purposes of health or pleasure.

Hot and Cold Baths.

These are situated near the Steyne, and were commenced in 1795, after the plan of Mr. Golden. On one side of a handsome vestibule are erected six cold baths; and on the other hot-baths, sweating, and shower-baths, which are supplied from the sea by an engine constructed by Mr. Williams. Near this place are also the old Brighton baths.

The baths here may be engaged by subscription, for one, two, or three months, or for a single time. When a hot-bath is required out of the usual hours, previous notice is expected, that it may be duly prepared.

The general place of resort for the ladies to the water in the machines, is on the east side of the town; the gentlemen now bathe on the west; by which means public decency, without which civilized society could not exist, is not violated.

Air-Pump Water-Baths.

These baths, the invention of Mr. Nathan Smith, of Artillery-street, are for the relief of persons afflicted with the gout, or violent scorbutic affections; but with what degree of success, we know not.

Gilburd's Baths, New Steyne Hotel.

These baths, for hot and cold sea water, are attached to the New Steyne Hotel. The baths and rooms are heated by steam. The sea water is pumped up every tide from the ocean, by means of a steam engine, through a tunnel in the interior of the chalk rock up to the baths, at a distance of six hundred feet. There are horizontal baths; also a plunging hot and cold bath, with a doche bath*; likewise sea water vapour-baths, shower-baths, &c. The baths communicate with the hotel.

* This term signifies purifying or dashing cold water over the body. It is

Mahomed's Baths.

These are ascertained by a native of India, and combine all the luxuries of Oriental bathing. They are adapted either for ladies or gentlemen, and the system is highly salutary in many diseases, independently of the gratification it affords, particularly to those who have resided in the East. A little further eastward there is a similar establishment on the same principle, kept by Mr. Molineaux; and in the same place, Mr. Dick has dry sulphuric baths.

Chalybeate Spring.

The spring, which lies about half a mile west of the church, has of late years been much frequented. It was analysed by the late Dr. Marcet; who stated, that it might be advantageously used in all those diseases where tonic remedies were indicated. The proprietors have erected, in the lodge style, a neat building; and constant attendance is given during the season.

SOUTHAMPTON.

Southampton is distant from London seventy-seven miles. It is agreeably situated on a kind of peninsular point; and is equally adapted for health, pleasure, and commerce.

Baths.

Near the west quay are commodious warm-baths, which may be engaged at all times: terms, four shillings each bathing, or a guinea for six. Further on towards the channel, are Mr. Goodman's commodious and well-frequented baths and machines. In addition to these accommodations, bathing machines have lately been constructed at the Cross-house, near Itchin Ferry.

Botanic Spa Gardens.

These gardens are elegantly fitted up, and well worthy of attention. During the season, a band plays twice a week, from six till nine. The chalybeate spring is well attended, and has become more popular since it has received so many natural embellishments. At the upper part of the gardens is a conservatory, filled with the choicest plants, and where there is also a choice selection of botanical books for public use. The following are the terms of admission to subscribers:

---

a practice rarely adopted, and never without the greatest circumspection, particularly in cases of insanity, where there is a violent head-ache, or excessive heat in the head. Although cold affusions are very tranquillizing, and may be made without danger.

Yearly, for one person, - -	£0	15	0
Two persons, or a family, -	1	10	0
One person, quarterly, - -	0	10	0
Two, or a family, quarterly, -	1	0	0

Three shillings per month to non-subscribers. One shilling per week, or paid for each time, at the chalybeate spring.

LYMINGTON,

Is about eighteen miles from Southampton, the road to which, is through the midst of the New Forest, the most delightful and romantic in England, and about 95 miles from London. It is situated about a mile from the narrow channel which separates the Isle of Wight from the main land, and affords the shortest and safest passage. It is situated on the gentle acclivity of a hill, a position which not only adds to its cleanliness, but to its salubrity.

Baths.

Lymington has two sets of Baths, one at the bottom of the town, and the other about half a mile from it. These have lately been rendered very commodious, and the proprietors have endeavoured to pay every attention to the comfort of their visitors; and as the baths here admit of being used at all times, without regard to the state of the tide, they are particularly suited to the convenience of invalids. The immense volume of water that passes through the strait, known by the name of the Needles, and the flow of the river being restrained by the flood-gates, during the whole of each tide, bathing is here rendered equally as salutary as at any other place.

THE ISLE OF WIGHT

Makes a part of Hampshire, and is situated midway between the counties of Dorset and Sussex: and from many circumstances, there is every reason to suppose it was formerly connected with the main land, from which it is now separated by a strait of unequal breadth, being not more than one mile at the western, and nearly seven at the eastern extremity.

The face of the country is beautifully picturesque and romantic: woods, rocks, hills, rivers, and vales, everywhere meet the eye. The soil and climate are peculiarly favourable to vegetation, and is equally congenial with health. Such, in fact, is the mildness of the air, that myrtles, that are fond of a soft marine exposure, grow

here and flourish, without being injured by the inclemency of the winter. And even tender exotics thrive, as if in their native bed.

Mineral Springs.

Between a place called Blackgang Chine, where there is a vast and gulph-like opening, the effect probably of some convulsion of the earth, and the land-slip of 1799, a mineral spring was discovered by a Mr. Waterworth, a surgeon of Newport, proprietor of the spot in question.

This aluminous chalybeate water, on examination not only by the taste (which is intensely chalybeate), but also by the application of chemical re-agents, was found to contain sulphate of iron, and sulphate of alumen, substances which, though rarely met with in combination with water, yet exist in this, in such large proportions, as to give it a very distinct character, and render the other ingredients which enter into its composition, wholly imperceptible to the palate.

From an analysis made of it by the late Dr. Marcet, it appears that each pint contains the following ingredients:

Of carbonic acid gas, three-tenths of a cubic inch.

	Grs.	
Sulphate of iron, in the state of crystallized green sulphate,	41	4
Sulphate of alumina, if crystallized,	31	6
Sulphate of dried lime, at 160,	10	1
Epsom salt, crystallized,	3	1
Glauber's salt, crystallized,	16	0
Muriat of soda, or common salt, crystallized,	4	0
Silicia,	0	7
	107	7

Dr. Marcet also observed, that he was not acquainted with any chalybeate, or aluminous spring, in the chemical history of mineral waters, that could be compared, in regard to strength, with that here described. The Hartfell water, in Scotland, and the Horley Green Spa, near Halifax, in Yorkshire, both of which appear to be analogous to this in chemical composition, and were considered the strongest impregnations of the kind, are stated by Dr. Garnet, to contain, the one only about fourteen grains, and the other, forty grains of saline matter in each pint.

Directions for using this Water.

The way in which this water has been prescribed by its discoverer, is first to evacuate the bowels, by a dose of

rhubarb and magnesia, Epsom salts, or other mild aperients, for the purpose, as is stated, of removing any vitiated bile, or other offending matter, which may have accumulated in the intestinal canal, and then to begin the following morning, after breakfast, with half an ounce of the water, diluted with two ounces of pure rain water, to be repeated twice a day, at proper intervals. In a few days, if it does not disagree with the stomach, this quantity may be gradually increased to two ounces of the water, diluted as before, three times a day. The dilution, after this, may be diminished, until it can be taken in its pure state, and the dose of water be increased, by degrees, till it ultimately amounts to four ounces, four times a day, making, in the whole, one pint in the twenty-four hours, which is the most it has ever been found necessary to prescribe in one day, even in the most obstinate cases of intermittent fevers brought from the island of Walcheren.

In irritable stomachs, the water may sometimes produce nausea, though it rarely may vomiting; these unpleasant effects, however, are easily removed, by the addition of a tea-spoonful of brandy, the compound tincture of cardamoms, lavender, or other aromatic tincture, in each dose, paying attention, at the same time, to the state of the bowels during the course, by removing costiveness whenever it may supervene.

The following formula is given by Mr. Waterworth for its safer and more agreeable exhibition:

Take Chalybeate aluminous water, - - 5 ounces.
Compound tincture of cardamoms, } of each, ½ ounce.
Syrup of ginger, - - }
Confection of opium, - - - 2 scruples.

The third part of which is directed to be taken three or four times a day.

It is sometimes found advantageous to combine it in intermittents, with the bark in powder, to prevent a return of the paroxysms.

The beneficial effects of this water is not limited to its internal exhibition; it may be used externally, and with advantage, as a lotion, in scrophulous sores, foul ulcers, scrophulous ophthalmia, and in all cutaneous eruptions of the skin.

The best way of applying it externally, is to wash the affected parts with it three or four times a day, and afterwards to lay on a compress, or folds of linen rags, wet with it, and renewed as often as they become dry.

SCARBOROUGH.

The two-fold attraction of sea-bathing and mineral waters, which this place affords, renders it, if not so fashionable, frequently, much superior to other places; and for these reasons, it contains among its numerous visitors, more votaries of health than of dissipation.

This ancient and populous town is situated in the south-east corner of the North Riding of Yorkshire, at the bottom of a beautiful bay, from which it rises in the form of a crescent, on the slope of a bold and varied shore, presenting several points of great elevation, and is sheltered from the north-east by a rock of high acclivity, surrounded by the sea, except on the western side. By the Lincoln road, Scarborough is about 214 miles distant from London, and by that through York, 240; from which latter city it is 40 miles. It contains about 8000 resident inhabitants, many of whom are engaged in maritime concerns.

Bathing.

On no part of the British coast is there any place so conveniently or delightfully situated for sea-bathing as Scarborough. The bay is spacious, and lies open to the sea; the water is pure and transparent; the sand is clean, smooth, and firm; and the inclination of the beach towards the sea is so gradual, as scarcely to be perceptible. Bathing may be performed at all times of the tide, and in almost all kinds of weather, with the most perfect security. As is usual at most other places, morning is the time for bathing, as well as for drinking the waters.

Warm Baths.

There are here three separate establishments, where warm and cold sea water, steam and shower baths, may be had, when required—two of them on the cliff; one of which is kept by a surgeon, the other by a physician, and the third, near the pier, by a gentleman of the latter distinction.

There is also a general sea-bathing infirmary, on the plan of the Margate Bethseda, where the sick poor are allowed to drink the waters gratuitously.

The Spa; its Situation, Properties, &c.

The Spa is about a quarter of a mile, in a southerly direction, from the town, on the sands, at the foot of a high cliff, and rises upright out of the earth, near the level of the spring-tides, which often overflow it. It consists

of two wells, discovered about two centuries ago, since which the waters of it have been held in great estimation.

One of these wells is more purgative, and the other more chalybeate; hence the latter, which is nearest the town, has been called the *chalybeate spring*, and the other the *purgative*, though both are impregnated with different proportions of the same principles. The *aperient* is that which usually goes by the name of the Scarborough water. It contains 52 grains of calcareous earth, 2 of ochre, and 266 of vitriolated magnesia, in each gallon of the water. The *chalybeate*, in the same quantity of water, has 70 grains of calcareous earth, 139 of vitriolated magnesia, and 11 of marine salt.

When these waters are poured from one glass into another, they exhibit a number of air-bubbles, which affords a proof they contain a quantity of fixed air. At the fountain they both possess a brisk, pungent, chalybeate taste; but the purgative is also somewhat bitter. The quantity usually drank at a time, is from two to four half-pints. These waters are found to be of service in hectic fevers, weakness or debility of the stomach, arising from indigestion and its consequences, relaxations of the system, nervous disorders, green sickness, scurvy, rheumatism, asthma, in all preternatural evacuations, in gleets, fluor albus, &c., and in habitual costiveness; although the mode of exhibiting and varying them, will frequently depend upon professional judgment.

The temperature of these springs is between forty-five and forty-six degrees, which is five less than the mean heat of springs in general.

Salts are prepared from the purgative well, which are in considerable estimation as a gentle aperient. In the year 1737, this spa was nearly lost by a land-slip.

HARROWGATE, or HARROGATE,

Is chiefly resorted to by valetudinarians, who frequently derive health from its springs; and is annually visited by upwards of two thousand patients of this description. It lies two miles north-west of Knaresborough, and is about 212 miles distant from London, consisting of two scattered villages, distinguished by the names of High and Low Harrowgate, nearly a mile distant from each other, both built on a common, yet possessing sufficient accommodation for company, who, mixing in friendly parties, enjoy more of the pleasures of social converse

amid the Wolds of Yorkshire, than many do in the fashionable haunts of Bath, Cheltenham, and Brighton.

The Properties and Virtues of these Wells.

The old Spa, discovered by Captain Slingsby in 1571, is strongly impregnated with steel, and is much frequented by those for whom tonic remedies are indicated. It rises opposite the Granby Inn, and has an elegant dome over it, erected at the expence of the late Earl of Roslyn, in 1786.

While giving a description of this spring, Dr. Monro observes, that "the water of the old spa strikes a light red purple, when six drops of tincture of galls are mixed with a glassful of it. As it sprung from the earth, it was twelve grains in a pint lighter than common water. On evaporation, a gallon yielded at one time a scruple, and at another only eight grains, of which, above one-half was earth.

There is another chalybeate, called the Tewit Well, situated about half a mile from the former, and from which it differs but very little. The water of this, on evaporation, yielded at one time, thirteen grains in a gallon; at another, nineteen grains of sediment, of which three-ninths was calcareous earth; the other two-fifths, being set aside, projected crystals of a calcareous Glauber-like salt. Both these waters combine freely with milk, but curdle soap.

The Sulphur Wells, as they are called, are situated in Lower Harrowgate, and are neatly inclosed and secured. They were discovered some length of time after the others, and still maintain their early acquired reputation. At first the water is clear and sparkling, throwing up a quantity of air-bubbles. It has a strong sulphureous smell, and is supposed to contain more of this mineral than any other water in England: it tastes salt; in fact, it contains a considerable quantity of sea salt, some marine salt of magnesia, and calcareous earth.

It is usually said that Harrowgate water has a taste resembling rotten eggs and gunpowder, an idea not at all inapplicable. Its properties, taken from two to four pints, are purgative; in smaller doses it is an excellent alterative, and is found beneficial in scurvy, scrofula, and diseases of the skin: it may be used also as a bath or fomentation in these, as well as in the cure of old ulcers, strains, aches, and paralytic debility. It has been found

serviceable in destroying worms; is recommended in gout, jaundice, and other obstructions of the liver, green sickness, &c. &c. Moreover these springs are expressly protected by two acts of parliament.

The walks, rides, country-seats, &c. hereabouts are delightful; and local amusements are not wanting.

BUXTON,

In Derbyshire, is situated in a most romantic spot, and though the surrounding country is mountainous and barren, the bowels of the earth are replete with various minerals; and the smiles of the Goddess of Health, who has fixed her residence here, gives animation to the cheerless spot, whence she dispenses her favours with unsparing hands. Buxton was formerly an insignificant village, but the goodness of the roads, its central situation, the salubrity of the air, and, above all, the medicinal qualities, and effects of its springs, have greatly contributed to its improvement, as a place of fashionable resort, where accommodations, adapted to the rank and number of its visitors, are provided on a very convenient and extensive scale.

The Baths

Are six in number, and were formed at different periods. The gentlemen's bath is the most ancient: that appropriated for the accommodation of the ladies being comparatively modern. There are also three private baths for persons of condition, who pay for them accordingly—one for the poor, and a cold bath; all adjoining each other, but entirely separate and distinct. The principal bath is twenty-six feet long, twelve wide, four feet nine inches deep; and is paved at the bottom. The two principal springs rise through a black limestone rock: the water is warm, and resembles that of Bristol. It raises the thermometer to between eighty-one and eighty-two degrees, and has a sweet pleasant taste.

Analysis and Use of the Buxton Waters.

On analysation, it was found to contain a small quantity of sea salt, and an inconsiderable portion of purging salt. Iron has been occasionally discovered in it, but in quantities too small to deserve notice. Taken inwardly, it is esteemed serviceable in diabetes, strangury or bloody urine, bilious colic, loss of appetite, coldness of the stomach, inward bleedings, atrophy or wasting of the body, contraction of the limbs, cramps, convulsions,

dry asthma, barrenness, &c. Internally as well as externally, it is deemed extremely useful in rheumatic and scorbutic complaints, gout, pulmonary affections, and a variety of other complaints; in all of which, for its efficacy, we are by no means bound to vouch.

The late Dr. Denman, who appears to have bestowed some consideration on these waters, deems it a more active remedy than is generally supposed; and dissuades from the use of it in all inflammatory and feverish complaints; and he observes that, in cases where it is efficacious, commonly two glasses, each containing about one third of a pint, are as much as ought to be drank before breakfast, at the distance of forty minutes from each other; and that one or two of the same glasses between breakfast and dinner, will be quite sufficient.

As regards bathing, Dr. Denman recommended it for invalids between breakfast and dinner, as the fittest time; and also that the prescribed or usual exercise should be taken before going into the bath; and that the water should never be drunk immediately before bathing.

Besides the hot water on the other side of the Wye, which is here an inconsiderable brook, and opposite to the Hall, is a chalybeate spring, of a rough irony taste, which, being combined with the former, proves agreeably purgative.

The Hall being near the Wells and Pump-room, and containing many apartments, is a favourite residence with invalids. Here are the baths, six in number, viz. three for gentlemen, of which two are private; three for ladies; and one for the poor, who are not only exempted from any charge, but also meet with assistance and support from the charitable contributions of the company. The springs supplying the baths are calculated to discharge about sixty gallons of water every minute; and the time, at this rate, to fill the baths, is two hours and fifty minutes. The almost invariable temperature of the water, as it rises at the baths, is 82° of Fahrenheit's thermometer, but is about half a degree lower at St. Anne's well; an elegant little building, where it is usually drunk.

Secrets of Trade.—No. VI.

JAMES' ANALEPTIC PILLS.

Take Rufus' pill,	1	pound.
Calcined antimony,	8	ounces.
Gum guiacum,	8	ounces.

Mix, and make thirty-two pills from each drachm.

Or,

Take Rufus' pill, }		
Powder of antimony, } of each,	1	scruple.
Gum guiacum, }		

Make into twenty pills with tincture of castor.

JESUITS' DROPS.

This is known by the name of *Friars' Balsam—Vervain's Balsam — Wade's Drops — The Commander's Balsam—Wound Balsam—Balsam for Cuts—Traumatic Balsam,* and Compound Tincture of Benjamin or Benzoin, which is made as follows:

Take Benzoin,	3	ounces.
Storax, strained,	2	ounces.
Balsam of Tolu,	1	ounce.
Socottrine aloes,	½	ounce.
Rectified spirits,	2	pints.

Or,

Take Benjamin gum,	3	ounces.
Balsam of Peru,	2	ounces.
Hepatic aloes,	½	ounce.
Rectified spirits of wine,	2	pounds, by weight.

Or,

Take Benzoin,	20	ounces.
Storax, strained,	12	ounces.
Balsam of Tolu,	8	ounces.
Gum guiacum,	1	pound.
Cape aloes, }		
Olibanum, } of each,	8	ounces.
Venice turpentine, }		
Turmeric powder,	1	ounce.
Rectified spirits of wine,	2	gallons.
Water,	4	gallons.

Or,

Take Benzoin,	3	ounces.
Socottrine aloes,	½	ounce.
Rectified spirits of wine,	32	ounces.

Digest for two days, then add,

Balsam of Peru,	2	ounces.

Or,

Take Benzoin,	3	ounces.
Socottrine aloes, }		
Gum guiacum, } of each,	6	ounces.
Balsam of Tolu, }		
Aloes, } of each,	2	ounces.
Balsam of Peru,	1	ounce.
Rectified spirits of wine,	1	gallon.

JACKSON'S BATHING SPIRITS.

Take Soft soap,		2 pounds.
Camphor,		12 ounces.
Oil of rosemary,	of each,	1½ ounce.
Oil of marjoram,	of each,	1½ ounce.
Rectified spirit,		2 gallons.

*** This and Freeman's bathing spirit are both similar to opodeldoc; Jackson's only differing from Freeman's in the addition of some essential oils.

ECONOMY OF THE TOAD *(Rana Bufo)*.

THE common food of the toad is small worms, and insects of every description; but its favourite food consists of *Apis mellifica, A. conica, A. terrestris,* and *Vespa vulgaris.* When a toad strikes any of these insects, however, deglutition does not immediately take place, as in other cases, but the mandibles remain closely compressed for a few seconds, in which time the bee or wasp is killed, and all danger of being stung avoided. The mandibles are provided with two protuberances which appear to be destined for this office. Although capable of sustaining long abstinence, the toad is a voracious feeder, when opportunity offers. To a middle-sized one, the writer has given nine wasps, one immediately after another; the tenth it refused, but in the afternoon of the same day it took eight more. To see the toad display its full energy of character, it is necessary to discover it in its place of retirement for the day, and, if possible, unperceived, to drop an insect within its sight: it immediately arouses from its apparent torpor, its beautiful eyes sparkle, it moves with alacrity to its prey, and assumes a degree of animation incompatible with its general sluggish appearance. When arrived at a proper distance, it makes a full stop, and, in the attitude of a pointer, motionless eyes its destined victim for a few seconds, when it darts out its tongue upon it, and lodges it in its throat with a velocity which the eye can scarcely follow. It sometimes happens to make an ineffectual stroke, and stuns the insect without gorging it, but never makes a second stroke until the insect resumes motion. It uniformly refuses to feed on dead insects, however recent. For several years a toad took up its abode, during the summer season, under an inverted garden-pot, which had a part of its rim broken out, in the writer's garden,

making its first appearance in the latter end of May, and retreating about the middle of September. This toad, there is reason to believe, distinguished the persons of the family, who daily fed it, from strangers, as it would permit them to pat and stroke it. To try the indiscriminating appetite of these animals, the writer has dropped before a full grown toad, a young one of its own species, about three-fourths of an inch long, and the instant it began to move off, it was eagerly struck at and swallowed; but the writer, in repeating this experiment, found that more will refuse than devour the young of their own species. When living minnows *(Cyprinus Phoxinus)* were dropped before a toad, they were struck at and swallowed in the same manner. These experiments were made on toads at full liberty, and met with accidentally. Toads generally return to their winter quarters about the time that swallows disappear. The writer, on such occasions, has seen them burrowing in the ground backwards, by the alternate motion of their hind legs.—*Letter from Mr. Fothergill to Dr. Sims, F. L. S.*

CORNS.

THE hardness upon the toes, and other parts of the feet, are, in general, too familiar to most of our readers to require description. The cure, however, will be necessary to dwell a little upon. When corns become large and painful, they ought to be pared closely down with a sharp knife or razor, and the centre hard point detached without giving pain. Previous to this operation, the feet should be kept in warm water for half an hour, in order to soften the parts, to render them more free to the knife; a plaster of ammoniac, with mercury, spread upon linen, applied round the toe, and continued upon it for a fortnight, when it should be taken off; the feet again bathed for half an hour, in warm water, and the corns again cut, when a similar plaster should be applied. Some have found great success in merely cutting the corns, as above described, and putting their feet in warm water, every night, for a month, cutting their corns whenever they appeared, but wearing no plaster. It is needless to mention that tight shoes must not be worn.

The Toilette.—No. II.

COSMETICS AND PERFUMES.

EAU SANS PAREILLE. *(Nonpareil Water).*

Essence of Bergamot, two drachms and a half; essence of lemon, half an ounce; essence of citron, two drachms; spirit of rosemary, eight ounces; rectified spirit, six pints; mix and distil ina warm-water bath: a fragrant cosmetic.

SPIRIT OF BALM.

Tops of balm, one pound to the gallon proof.

ESSENCE OF MYRTLE.

Myrtle in flower, one pound to the gallon.

EAU DE BOUQUET. *(Nosegay Water).*

Odoriferous honey-water, one ounce; nonpareil water, one ounce and a half; essence of jasmin, five drachms; aromatic spirit of cloves and spirit of violets, of each, six drachms; aromatic spirit of the white flag; long cypress, and spirit of lavender, of each, two drachms; spirit of orange flowers, one scruple. Mix.—Some add a few grains of musk and ambergrise: sweet-scented; also made into ratafia with sugar.

EAU DE COLOGNE.

Essence of Bergamot, three ounces; essence of neroli, one drachm and a half; essence of cedrat, two drachms; essence of lemon, three drachms; oil of rosemary, a drachm; rectified spirit, twelve pints; spirit of rosemary, three pints and a half; compound balm-water, two pints and a quarter: Mix.—Distil in a warm-water bath; and keep it in a cold cellar, or ice-house, for some time:—Used externally as a cosmetic, and made with sugar into ratafia.

OTTO OF ROSES.

The following is the recipe for making the celebrated otto, or *ottar* of roses, from a work recently published entitled the *Memoirs of the Rose:*—"Take a very large glazed earthen or stone jar, or a large clean wooden cask, fill it with the leaves of the flowers of roses, very well picked, and freed from all seeds and stalks; pour on them as much pure spring water as will cover them, and set the vessel in the sun, in the morning, at sunrise, and let it stand till the evening, then take it into the house for the night. Expose it in this manner for six or seven

successive days; and, at the end of the third or fourth day, a number of particles, of a fine, yellow, oily matter will float on the surface, which in two or three days more will gather into a scum, which is the ottar of roses. This is taken up by some cotton tied to the end of a piece of stick, and squeezed, by the finger and thumb, into a small phial, which must be immediately well stopped; and this is repeated for some successive evenings, or while any of this fine essential oil rises to the surface of the water. It is said that a hundred pounds weight of roses will not yield above half an ounce of this precious aroma."

STARCH.

A GREAT improvement has been made in the manufacture of starch by M. Herpin, of Metz. In the ordinary method, for the purpose of decomposing and destroying the gluten which conceals the starch, flour is allowed to ferment for a fortnight or a month, with a certain quantity of water; by which means ammoniac is disengaged, and a very fetid odour is spread through the manufactory. M. Herpin makes starch in the course of an hour, by a process by which he obtains at once both the gluten and the starch, without having to endure any odour whatever. To effect this, it is sufficient to knead the flour with a few drops of water, in a bag of fine linen. The water carries off the starch, and the gluten remains in the bag. The water and the starch are passed through a silk sieve, and are received into a vessel. When the starch is deposited, the water is poured off; and contains a quantity of saccharine matter, which may be advantageously employed in the preparation of some cheap beverage.

LINEN BLEACHED WITH LIME.

EVERY body knows the injury which is done to linen by bleaching it with lime. It is easy to detect linens which have been so bleached, in the following manner:— Cut off a scrap of the new linen which you wish to examine, put it into a glass, and pour upon it several spoonfuls of good vinegar. If the linen contain lime, the acid will excite considerable effervescence, accompanied with a slight noise. Otherwise, no effect is produced.

MEANS OF RENDERING WOOD, LINEN, &c. INCOMBUSTIBLE.

It always affords us pleasure to give publicity to any discovery that promises to be of advantage to society, and more especially when it is calculated to preserve the property and lives of those individuals who adopt it. Mr. Benjamin Cook, of Baskerville-house, Birmingham, in his experiments on the alkalis, has discovered that all linen, cottons, muslins, &c. &c., when dipped in a solution of the pure vegetable alkali at a gravity of from 124 to 130, taking water at the gravity of 100, become incombustible. That all timbers become incombustible when saturated with a solution of alkali at the gravity of 140 to 150. He has two methods of saturating timber, first by letting the timber in the plank lie in the solution for several weeks, until the alkali has perfectly filled up the pores of the wood; but the method he prefers, is the use of a powerful machine, by which he extracts or forces out the sap, and then forces the alkali through the whole tree, thus filling up all the pores, and rendering the tree incombustible; this he proposes to do as soon as the tree is felled, and before the bark is taken off. When the bark is in its best state he performs this operation in a few hours, which, while it renders the wood incombustible, completely prevents dry rot.

The solution of pure vegetable alkali which Mr. Cook prepares for securing from fire, muslins, cottons, &c. &c. is as pure as the clearest spring water; perfectly free from smell, and will not discolour the finest cambrics or muslins. When so many dreadful accidents are continually happening from ladies' dresses taking fire, from bed and window-curtains being set on fire, either by accident or carelessness of servants, we cannot but consider this discovery as one of great importance to society.

For ship timbers, its value is inestimable, and not less so for all timber for houses and public buildings.

We understand this gentleman obtained a patent for his discovery nearly eight months ago, and that its not yet having been brought into the world, has been occasioned by the delays he has experienced in preparing the proper apparatus for making the solution in that pure state requisite for use in muslins, cottons, &c. &c.

Housekeeping and Husbandry.—No. VI.

Housekeeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

ROASTING*.

BEEF.

THE noble Sir-loin of about fifteen pounds, (if much thicker the outside will be done too much before the inside is enough), will require to be before the fire about three and a half or four hours: take care to spit it evenly, that it may not be heavier on one side than the other; put a little clean dripping into the dripping-pan, (tie a sheet of paper over it to preserve the fat†), baste it well as soon

---

* If the time we have allowed for roasting appears rather longer than what is stated in former works, we can only say, we have written from actual experiments, and that the difference may be accounted for, by common cooks generally being fond of too fierce a fire, and of putting things too near to it. Our calculations are made for a temperature of about fifty degrees of Fahrenheit. Slow roasting is as advantageous to the tenderness and flavour of meat as slow boiling, of which every body understands the importance. The warmer the weather, and the staler killed the meat is, the less time it will require to roast it. Meat that is very fat requires more time than we have stated. Beef is in proper season throughout the whole year; but as butchers generally calculate upon its being a Sunday's dinner, you can seldom depend upon its being tender on any other day.

† "In the present fashion of fatting cattle, it is more desirable to roast away the fat, than so preserve it. If the honourable Societies of Agriculturists, at the time they consulted a learned professor about the composition of manures, had consulted some competent authority on the nature of animal substances, the public might have escaped the overgrown corpulency of the animal flesh, which every where fills the markets."—*Domestic Management*, 12mo. 1813, p. 182.

"Game and other wild animals proper for food, are of very superior qualities to the tame, from the total contrast of the circumstances attending them. They have a free range of exercise in the open air, and choose their own food, the good effects of which are very evident in a short delicate texture of flesh, found only in them. Their juices and flavour are more pure, and their fat, when it is in any degree, as in venison, and some other instances, differs as much from that of our fatted animals, as silver and gold from the grosser metals. The superiority of Welsh mutton and Scotch beef is owing to a similar cause."—*Ibid.* p. 150.

If there is more fat than you think will be eaten with the meat, cut it off; it will make an excellent pudding; or clarify it, and use it for frying: for those who like their meat done thoroughly, and use a moderate fire for roasting, the fat need not be covered with paper.

If your beef is large, and your family small, cut off the thin end and salt it, and cut out and dress the fillet, (*i. e.* commonly called the inside), next day as mock hare: thus you get three good hot dinners.

as it is put down, and every quarter of an hour all the time it is roasting, till the last half hour; then take off the paper and make some gravy for it, stir the fire and make it clear; to brown and froth it, sprinkle a little salt over it, baste it with butter, and dredge it with flour; let it go a few minutes longer, till the froth rises, take it up, put it on the dish, &c. Garnish it with hillocks of horse-radish, scraped as fine as possible with a very sharp knife. A Yorkshire-pudding is an excellent accompaniment. The inside of the sir-loin must never be cut hot, but reserved entire for the hash, or a mock hare.

Ribs of Beef.—The three first ribs, of fifteen or twenty pounds, will take three hours, or three and a half: the fourth and fifth ribs will take as long, managed in the same way as the sir-loin. Paper the fat and the thin part, or it will be done too much, before the thick part is done enough.

Ribs of Beef boned and rolled.—When you have kept two or three ribs of beef till quite tender, take out the bones, and skewer it as round as possible (like a fillet of veal): before they roll it, some cooks egg it, and sprinkle it with veal stuffing. As the meat is more in a solid mass, it will require more time at the fire than in the preceding receipt: a piece of ten or twelve pounds weight, will not be well and thoroughly roasted in less than four and a half or five hours. For the first half hour it should not be less than twelve inches from the fire, that it may get gradually warm to the centre: the last half hour before it will be finished, sprinkle a little salt over it; and if you wish to froth it, flour it, &c.

MUTTON.

As beef requires a large sound fire, mutton must have a brisk and sharp one: if you wish to have mutton tender, it should be hung as long as it will keep; and then good eight-tooth, *i. e.* four years old mutton, is as good eating as venison. The leg, haunch, and saddle, will be the better for being hung up in a cool airy place for four or five days at least; in temperate weather, a week; in cold weather, ten days. If you think your mutton will not be tender enough to do honour to the spit, dress it as a "*Gigot de sept heures.*"

A Leg—of eight pounds will take about two hours: let it be well basted.

A Chine or Saddle, (*i. e.* the two loins), of ten or eleven

pounds, two hours and a half; it is the business of the butcher to take off the skin and skewer it on again, to defend the meat from extreme heat, and preserve its succulence; if this is neglected, tie a sheet of paper over it; baste the strings you tie it on with directly, or they will burn: about a quarter of an hour before you think it will be done, take off the skin or paper, that it may get a pale brown colour, and then baste it, and flour it lightly to froth it.

A Shoulder—of seven pounds, an hour and a half; put the spit in close to the shank bone, and run it along the blade bone.

A Loin—of mutton, from an hour and a half, to an hour and three quarters. The most elegant way of carving this, is to cut it lengthwise, as you do a saddle.

A Neck—about the same time as a loin. It must be carefully jointed, or it is very difficult to carve. The neck and breast are in small families commonly roasted together; the cook will then crack the bones across the middle before they are put down to roast; if this is not done carefully, they are very troublesome to carve.

A Breast—an hour and a quarter.

A Haunch—(*i. e.* the leg and part of the loin) of mutton; send up two sauce-boats with it; one of rich drawn mutton gravy, made without spice or herbs, and the other of sweet sauce. It generally weighs about fifteen pounds, and requires about three hours and a half to roast it.

Mutton, Venison fashion—Take a neck of good four or five year old South-down wether mutton cut long in the bones; let it hang, in temperate weather, at least a week: two days before you dress it, take allspice and black pepper ground and pounded fine, a quarter of an ounce each, rub them together, and then rub your mutton well with this mixture twice a day: when you dress it, wash off the spice with warm water, and roast it in paste.

Persevering and ingenious epicures have invented many methods to give mutton the flavour of venison; some say that mutton prepared as above may be mistaken for venison, others that it is full as good; the refined palate of a grand gourmand, in spite of the spice and wine the meat has been fuddled and rubbed with, will, perhaps, still protest against "Welsh venison;" and, indeed, we do not understand by what conjuration allspice and claret can communicate the flavour of venison to mutton; we

confess our fears that the flavour of venison, especially of its fat, is inimitable, but believe you can procure prime eight-tooth wether mutton, keep it the proper time, and send it to table with the accompaniments usually given to venison. A rational epicure will eat it with as much satisfaction as he would "feed on the King's fallow deer."

VEAL.

Veal requires particular care to roast it a nice brown. Let the fire be the same as for beef; a sound large fire for a large joint, and a brisker for a smaller; put it at some distance from the fire to soak thoroughly, and then draw it near to finish it brown. When first laid down it is to be basted; baste it again occasionally. When the veal is on the dish pour over it half a pint of melted butter: if you have a little brown gravy by you, add that to the butter. With those joints which are not stuffed, send up forcemeat in balls, or rolled into sausages, as garnish to the dish, or fried pork sausages: bacon and greens, are also always expected with veal.

Fillet of Veal—of from twelve or sixteen pounds, will require from four to five hours at a good fire; make some stuffing or forcemeat, and put it under the flap, that there may be some left to eat cold, or to season a hash: brown it, and pour good melted butter over it. Garnish with thin slices of lemon, and cakes or balls of stuffing, or duck stuffing, or fried pork sausages, curry sauce, bacon and greens, &c.

A Loin—is the best part of the calf, and will take about three hours roasting. Paper the kidney fat, and the back: some cooks send it up on a toast, which is eaten with the kidney and the fat of this part, which is more delicate than any marrow, &c. If there is more of it than you think will be eaten with the veal, before you roast it cut it out, it will make an excellent suet pudding: take care to have your fire long enough to brown the ends.

A Shoulder—from three hours to three hours and a half; stuff it with the forcemeat ordered for the fillet of veal, in the underside.

Neck, best End—will take two hours. The scrag part is best made into a pie or broth.

Breast—from an hour and a half to two hours. Let the caul remain till it is almost done, then take it off, to brown it; baste, flour, and froth it.

Veal Sweetbread—Trim a fine sweetbread, it cannot be too fresh, parboil it for five minutes, and throw it into a bason of cold water: roast it plain, or beat up the yolk of an egg, and prepare some fine bread crumbs. When the sweetbread is cold, dry it thoroughly in a cloth, run a lark spit or a skewer through it, and tie it on the ordinary spit: egg it with a paste brush, powder it well with bread crumbs, and roast it. For sauce, fried bread crumbs round it, and melted butter with a little mushroom catsup, and lemon juice, or serve them on buttered toast garnished with egg sauce, or with gravy.

LAMB

Is a delicate, and commonly considered tender meat, but those who talk of tender lamb, while they are think- of the age of the animal, forget, that even a chicken must be kept a proper time after it has been killed, or it will be tough picking. Woeful experience has warned us to beware of accepting an invitation to dinner on Easter Sunday, and unless commanded by a thorough bred gourmand, our incisores, molares, and principal viscera, have protested against the imprudence of encountering young tough stringy mutton under the misnomen of grass lamb. To the usual accompaniments of roasted meat, green mint sauce or a salad is commonly added; and some cooks, about five minutes before it is done, sprinkle it with a little minced parsley.

Grass lamb is in season from Easter to Michaelmas.—House lamb from Christmas to Lady-Day. When green mint cannot be got, mint vinegar is an acceptable substitute for it.

Hind-quarter—of eight pounds, will take from an hour and three quarters to two hours; baste and froth it.

Fore-quarter—of ten pounds, about two hours. It is a pretty general custom, when you take off the shoulder from the ribs, to squeeze a Seville orange over them, and sprinkle them with a little pepper and salt.

Leg—of five pounds, from an hour to an hour and a half.

Shoulder—with a quick fire, an hour.

Ribs—about an hour to an hour and a quarter; joint it nicely; crack the ribs across, and bend them up to make it easy to carve.

Loin—an hour and a quarter.

Neck—an hour.

Breast—three quarters of an hour.

To make Mushroom Katchup.

Take mushrooms, four pounds; common salt, two pounds; sprinkle the salt over them; when the juice is drawn out, add pimento, eight ounces; cloves, one ounce; boil for a short time, and press out the liquor: what remains may be treated again with salt and water for an inferior kind: black pepper, mace, and ginger, are usually added.

Walnut Katchup.

1. Take green shells of walnuts, one bushel; common salt, six pounds; let them remain for two or three days, stirring them occasionally, that the air may turn them black; press out the liquor; add spices to the palate of the country, and boil it: are all used for sauces.—Or,

2. Take juice of young walnuts by the press, to a gallon add two pounds of anchovies; shallots, one pound; cloves, mace, black pepper, of each, an ounce; and a clove of garlic: boil a little, and bottle.

Fish Sauce.

1. Take port wine, one gallon; mountain, two pints; walnut katchup, four pints; anchovies and liquor, two pounds; lemons, eight; shallots, three dozen; Cayenne pepper, a sufficient quantity; scraped horse-radish, two pounds; mace, one ounce; flour of mustard, eight ounces; boil up gently: strain and bottle.—Or,

2. Take anchovies, twenty-four; shallots, ten; horse-radish root, scraped, three spoonfuls; mace and cloves, of each, two drachms; lemons, sliced, two; anchovy liquor, eight ounces; Hock or Rhenish wine, two pints; water, one pint; boil to two pints: strain and bottle.

STILTON CHEESE.

THIS favourite species of cheese is made in most of the villages round Melton Moubray, where the dairy people still profess to keep the method of making it a secret. It is certain that these cheeses require a great deal of care and attention, owing, probably, to their richness and thickness. They run usually from eight to sixteen or eighteen pounds, seldom larger, and are rarely fit for the table under a year old. They are made in the following manner: Take the night's cream, and put it to the morning's new milk, with the rennet; when the curd is come, it is not to be broken, as is done with other

cheese, but take it out whole by means of a soil dish, and place it in a sieve to drain gradually, and as it drains, it should be pressed by degrees, until it becomes firm and dry; then place it in a wooden hoop; afterwards to be kept on boards, turned frequently, with cloth binders round it, tightening them as occasion may require.

GERMAN MODE OF CURING HAMS.

In Westphalia, hams are cured between November and March. The Germans pile them up in deep tubs, covering them with layers of salt, saltpetre, and a small quantity of bay leaves. In this situation they let them remain about four or five days, when they make a strong pickle of salt and water, with which they cover them completely; and at the expiration of three weeks they take them out of pickle, soak them twelve hours in clean well-water, and hang them up for three weeks longer in a smoke made from the juniper bushes, which in that country are abundantly met with.

ECONOMY AND SAFETY IN MAKING SOAP.

To thirty-two gallons of lye, of strength just sufficient to bear an egg, add sixteen pounds of clean melted grease, which, by being placed in the hot sun, and occasionally stirred, will in a few days, produce a soap of first quality.

A BAKER'S WAY OF GROWING A SHOULDER OF MUTTON.

Mr. Crust first buys the smallest shoulder of mutton which he can find; perhaps it may weigh about four pounds. When his Sunday's dishes come in (which, if he be in any thing of a trade, will be pretty numerous), he changes this four-pound shoulder of mutton for a five-pounder; then he removes the five-pound shoulder to the place of a six; then substitutes a seven, and so on to eight, nine, and ten! Thus he makes a clear gain of six pounds of mutton, and changes his four pounds of carrion for prime meat! Puddings are done differently.

Rural Economy.—No. IV.

Best Method of Hay-making.

INSTEAD of allowing the hay to lie, as usual in most places, for some days in the swathe after it is cut, never cut hay but when the grass is quite dry; and then make the gatherer follow the cutter close up; put it up immediately into small cocks, about three feet high each, and of as small a diameter as they can be made to stand with; always giving each of them a slight kind of thatching, by drawing a few handfuls of the hay from the bottom of the cock all round, and laying it slightly on the top, with one of the ends hanging downwards. This is done with the utmost ease and expedition; and when once in that state, the hay is, in a great measure, out of danger; for unless a violent wind should arise immediately after the cocks are put up, nothing else can hurt the hay, as no rain, however violent, can penetrate into these cocks but for a little way; and if they are dry put up, they never sit together so closely as to heat, although they acquire in a day or two such a degree of firmness, as to be in no danger of being overturned by wind after that time, unless it blows a hurricane. In these cocks allow the hay to remain until, upon inspection, it is found that it will keep in pretty large tramp-cocks (which is usually in a week or two) according as the weather is more or less favourable, when two men, each with a long-pronged pitchfork, lift up one of these small cocks between them with the greatest ease, and carry them, one after another, to the place where the tramp-cock is to be built; and in this manner proceed over the field till the whole is finished.

To take the Honey of Bees without Destroying them.

The following easy method of taking the honey without destroying the bees, is generally practised in France. In the dusk of the evening, when the bees are quietly lodged, approach the hive, and turn it gently over. Having steadily placed it in a small pit, previously dug to receive it, with its bottom upwards, cover it with a clean new hive, which has been properly prepared, with a few sticks across the inside of it, and rubbed with aromatic herbs. Having carefully adjusted the mouth of each hive to the other, so that no aperture remains between them, take a small stick, and beat gently round the sides

of the lower hive for about ten minutes, or a quarter of an hour, in which time the bees will leave their cells in the lower hive, ascend, and adhere to the upper one. Then gently lift the new hive, with all its little tenants, and place it on the stand from which the other hive was taken. This should be done some time in the week preceding Midsummer-day, that the bees may have time before the summer flowers are faded, to lay in a new stock of honey, which they will not fail to do for their subsistence through winter.

To prevent Sheep from catching Cold after being Shorn.

Sheep are sometimes exposed to cold winds and rains immediately after shearing, which exposure frequently hurts them. Those farmers who have access to the sea, should plunge them into the salt water; those who have not that opportunity, and whose flocks are not very large, may mix salt with water, and rub them all over, which will in a great measure prevent any mishap befalling the animal after having been stript of its coat. It is very common in the months of June and July for some kinds of sheep, especially the fine Leicester breed, which are commonly thin skinned about the head, to be struck with a kind of fly, and scratching the place with their feet, they make it sore and raw. To prevent this, take tar, train oil, and salt, boil them together, and when cold, put a little of it on the part affected. This application keeps off the flies, and likewise heals the sore. The salt should be in a very small quantity, or powdered sulphur may be used instead of it.

To Destroy Maggots in Sheep.

Mix with one quart of spring water a table spoonful of the spirit of turpentine, and as much of the sublimate powder as will lie upon a shilling. Shake them well together, and cork it up in a bottle, with a quill through the cork, so that the liquid may come out of the bottle in small quantities at once. The bottle must be always well shaken when it is to be used. When the spot is observed where the maggots are, do not disturb them, but pour a little of the mixture upon the spot, as much as will wet the wool and the maggots. In a few minutes after the liquor is applied, the maggots will creep to the top of the wool, and in a short time drop off dead. The sheep must, however, be inspected next day, and if any of the maggots remain undestroyed, shake them off, or touch them with a little

more of the mixture. A little train oil may be applied after the maggots are removed, as sometimes the skin will be hard by applying too much of the liquid. Besides, the fly is not so apt to strike when it finds the smell of the oil, which may prevent a second attack. This method of destroying maggots is superior to any other, and it prevents the animal from being disfigured by clipping off the wool, which is a common practice in some countries.

How in every Year to procure plenty of New-laid Eggs at Christmas.

Let the hens be set upon eggs as early in the year as possible, not later than March. A hutch should be made for the hen and chickens, twenty-four inches long, twelve inches wide, and eighteen high, divided in the middle, so as half to be open and half very close; let down a door to keep them very warm in the night; and when wet or very cold, if made light, it may easily be put under shelter. The chickens are to be fed with plenty of boiled eggs for twelve or fourteen days; if too much relaxed, eggs are a speedy cure.

Chickens hatched early will be nearly as large as the hens at Midsummer, and in November and December will always lay plenty of eggs, and will sit upon eggs very early the next spring: this will produce an early breed of poultry. The best fowls for laying are not very large; and the white ones do not lay so well in cold weather.

Remarks.—Poultry should roost very warm in winter; and in summer the house should have air, and be cleaned every week. Many die through drinking dirty water. An earthenware fountain keeps the water clean, and preserves their health in hot weather. After three years, hens cast their feathers later and later every year, and are hardly in full feather until December or January; seldom lay eggs until March or April, and then only twenty or thirty, and no more for that year. Hens should not be kept above four years, nor cocks above three. By this method six hens will lay more eggs than twelve in the usual way.

The Frog, a Destroyer of Caterpillars.

A gentleman writes that, one summer walking in a friend's garden, a very fine frog leaped upon the path he stood upon: being an admirer of nature, he watched it under a gooseberry-bush, where there happened to lay a large leaf of a tulip; the frog immediately mounted on

the highest part of the leaf, and placing himself in a very erect position, looking most attentively up into the bush, he remained fixed near ten minutes. Calling my friend to observe the frog's attention, he at that moment made a spring up under the bush, brought down a quantity of caterpillars, and devoured them with the greatest avidity. Not being the least alarmed, he repeated the attack several times with the same success. As the caterpillars hung in small clusters, he never brought down less than from five to eight at a time, and then picked them up from the ground as a fowl picks up corn. The owner of the garden was very glad of this discovery, as he never before knew the frog so valuable as to be capable of keeping his gooseberry and currant trees free from those destructive visitors.

SPECIFIC FOR THE CROUP AND HOOPING-COUGH.

A PRIZE of 12,000 francs being offered in 1807, to that physician who should produce the best memoir on the croup, &c., eighty-three memoirs have been received; among them, two have shared the prize, being of equal merit; three are distinguished as extremely honourable to their authors; and the sixth memoir is marked by the proposal of a remedy. It is *liver of sulphur, alkalized,* a sulphur of pot-ash, recently prepared, and brownish. It is usually mixed with honey. The dose, from the attack of the croup to the decided diminution of the disorder, is ten grains, morning and evening, to be diminished as the disorder abates, and towards the close, the morning dose only to be given: the mixture of sulphur and honey to be made at the moment of using. Young children will suck it off the end of a finger; but it may be given in a spoonful of milk, or of syrup thinned with water; or as a bolus; grown children take it best in this form. It usually relieves in two days; but it must be continued some time after the cure, for fear of a relapse. The lips, and the interior of the mouth, are whitened by the liver of sulphur, and it imparts a warmth to the stomach as it arrives there. The first dose most commonly occasions a vomit of a viscid or concrete matter, to which the sulphur gives a greenish tint. Infants at the breast may continue their accustomed nourishment.—This medicine is also recommended in pulmonary catarrhs, and other affections of that class, for the purpose of obtaining further information of its effects.

LIQUEURS.

EAU DIVINE *(Divine Water)*.

RECTIFIED spirit, one gallon; essence of lemons, essence of Bergamot, of each, one drachm; distil in a warm water bath; add sugar, four pounds; dissolved in pure water, two gallons; and lastly, orange-flower water.

RATAFIA D'ANGELIQUE *(of Angelica)*.

Angelica seeds, one drachm; stalks of angelica, bitter almonds, blanched, of each, four ounces; proof spirit, twelve pints; white sugar, two pounds: digest, strain, and filter. *Carminative.*

RATAFIA D'ANIS *(of Aniseed)*.

Aniseed, two ounces; proof spirit, four pints; sugar, ten ounces: it may be made of star aniseed.

HUILE D'ANIS.

Aniseed, two ounces; rectified spirit, four pints; simple syrup, four pounds; to which tincture of vanilla may be added, if agreeable.

ANISETTE DE BOURDEAUX.

Sugar, nine ounces; oil of aniseed, six drops; rub together, and add by degrees, rectified spirit, two pints; water, four pints: filter for use.

RATAFIA DE CAFFÉ *(of Coffee)*.

Roasted coffee, ground, one pound; proof spirit, one gallon; sugar, twenty ounces: digest for a week.

RATAFIA D'ECORCE D'ORANGE *(of Orange-peel)*.

Fresh peel of Seville oranges, four ounces; proof spirit, one gallon; sugar, one pound: digest for six hours.

RATAFIA A LA PROVENÇALE *(Provincial)*.

Striped pinks, one pound; proof spirit, two pints; sugar, eight ounces; juice of strawberries, eleven ounces; saffron, fifteen grains.

RATAFIA D'VIOLETTES *(of Violets)*.

Clove pinks, the white heels pulled off, four pounds; cinnamon and cloves, of each, fifteen grains; proof spirit, one gallon; sugar, one pound.

RATAFIA DE NOYAUX *(of Kernels)*.

Peach or apricot kernels, with their shells bruised, one hundred and twenty; proof spirit, four pints; sugar, ten ounces: some use proof instead of rectified spirit, with the juice of apricots or peaches, to make this liqueur.

RATAFIA DE BRON DE NOIX *(of young Walnuts).*

Young walnuts, whose shells are not yet hard, sixty; brandy, four pints; sugar, twelve ounces; mace, cinnamon, and cloves, of each, fifteen grains; digest for two or three months; press out the liquor; filter; and keep it for two or three years. *Stomackic.*

RATAFIA DE GENIEVRE *(of Juniper Berries).*

Dried juniper berries, not bruised, two ounces; proof spirit, four pints; sugar, ten ounces.

RATAFIA DE FRAISES *(of Strawberries).*

Strawberries, eight pounds; proof spirit, four pints; sugar, twelve ounces.

ESCUBAC *(Usquebaugh).*

Saffron, one ounce; juniper berries, six drachms; dates, without their kernels, raisins, of each, three ounces; jubebs, six ounces; aniseed, mace, cloves, coriander seed, of each, one drachm; cinnamon, two drachms; proof spirit, twelve pints; simple syrup, six pounds. *Pectoral, emmenagogue.*

RATAFIA DE QUOINGS *(of Quinces).*

Juice of quinces, six pints; cinnamon, three drachms; coriander seed, bruised, two drachms; cloves, bruised, fifteen grains; mace, half a drachm; bitter almonds, four drachms; rectified spirit, three pints: digest for a week; add sugar, two pounds eight ounces.

RATAFIA DE CACAO *(of Chocolate).*

Caracca cacao nuts, one pound; West India cacao nuts, roasted, eight ounces; proof spirit, one gallon; digest for a fortnight; strain; add sugar, one pound eight ounces; tincture of vanilla, thirty drops.

RATAFIA OF GRENOBLE.

Small wild black cherries, with their kernels bruised, twelve pounds; proof spirit, six gallons; digest for a month; strain; and add sugar, twelve pounds: a little citron peel may be added at pleasure.

RATAFIA DE CERISES *(of Cherries).*

Morello cherries, with their kernels bruised, eight pounds; proof spirit, eight pints; digest for a month; strain with expression; add sugar, one pound eight ounces.

RATAFIA DE CASSIS.

Ripe black currants, six pounds; cloves, half a drachm; cinnamon, a drachm; proof spirit, eighteen

pints; sugar, three pounds eight ounces: digest a fortnight.

RATAFIA DE FLEURS D'ORANGE *(of Orange-flowers).*

Fresh flowers of the orange tree, two pounds; proof spirit, one gallon; sugar, one pound eight ounces: digest for six hours only.

HUILE DE VANILLE *(Vanilla Oil).*

Rectified spirits of wine, two pints; simple syrup, two pounds; tincture of vanilla, a sufficient quantity.

VESPETRO.

Angelica seed, two ounces; coriander seed, one ounce; fennel seed and aniseed, of each, two drachms; lemons sliced, two; proof spirit, four pints; sugar, one pound.

RATAFIA A LA VIOLETTE.

Florentine orrice root, two drachms; archel, one ounce; rectified spirits of wine, four pints; digest; strain; and add sugar, four pounds.

FENOUILETTE DE L'ILE DE RHÉ.

Fennel seed, two ounces; herb of the same, eight ounces; rectified spirit, two pints; water, four pints; sugar, ten ounces.

ELEPHANT'S MILK *(Urine d'Elephant).*

Benjamin, two ounces; rectified spirit, one pint; boiling water, two pints and a half; when cold, strain, and add sugar, one pound eight ounces.

RATAFIA DE BAUME DE TOLU *(of the Balsam of Tolu).*

Balsam of Tolu, two ounces; rectified spirits, one pint; boiling water, three pints; sugar, one pound eight ounces.

CITRONELLE *(Eau de Barbades).*

Fresh orange peel, one ounce; fresh lemon peel, four ounces; cloves, half a drachm; coriander, a drachm; proof spirit, four pints: distil in a warm water-bath, and add white sugar.

CREME DE BARBADES *(Cream of Barbadoes).*

Orange peel and lemon peel, of each, three ounces; cinnamon, four ounces; mace, two drachms; cloves, one drachm; rum, eighteen pints; distil in a warm water-bath, and add white sugar, in sufficient quantity.—Or,

Lemons, sliced, twenty-four; citrons, sliced, six; rectified spirit, two gallons and four pints; fresh balm

leaves, eight ounces; water, three gallons and eight pints: digest for a fortnight, and strain.

CEDRAT.

Lemon peel, twelve ounces; rectified spirit, two gallons; distil in a water-bath, and add simple syrup.

PARFAIT AMOUR *(Perfect Love)*.

The same as cedrat, coloured with a little cochineal.

HUILE DE VENUS.

Flowers of the wild carrot, picked, six ounces; spirit of wine, ten pints; distil in a warm water-bath; add to the spirit the same quantity of capillaire: it may be coloured with cochineal.

MARASQUIN DE GROSEILLES.

Gooseberries quite ripe, one hundred and twelve pounds; black cherry leaves, twelve pounds; bruise and ferment; distil and rectify the spirit; to each pint of this spirit add as much distilled water; and sugar, one pound.

CREME D'ORANGE *(Cream of Orange)*.

Oranges, sliced, thirty-six; rectified spirit, two gallons; sugar, eighteen pounds; water, four gallons and four pints; tincture of saffron, one ounce and an half; orange flower water, four pints: digest for a fortnight, and strain.

*** All the above liqueurs are stimulant, and are taken *ad libitum* for pleasure. Liqueurs are also made by adding Hungary water, honey water, eau de Cologne, and several other spirits, to an equal quantity of simple syrup, or common capillaire.

CREME DE NOYAU.

Bitter almonds, blanched, one ounce; proof spirit, half a pint; sugar, four ounces: it is sometimes coloured with cochineal. The foreign noyau, although differently prepared, is indebted to the same principle for its qualities.

Caution to Noyau Drinkers.—Noyau is a liquor of a fascinating nature, and cannot be taken to any considerable extent without danger: the late Duke Charles of Lorraine nearly lost his life from swallowing some "Eau de Noyau," (water distilled from peach kernels), too strongly impregnated. It contains prussic acid, on which its deleterious principle depends.—*(Journal des Debats, 22d Decembre,* 1814*)*.

Horticulture.

AUGUST.

THE KITCHEN-GARDEN.—This is now a principal season for sowing and planting several autumnal and winter crops, and for next spring and summer; to which particular attention is required, as hereafter explained in the respective sorts: they will not admit of delay.

As many early and general summer crops—will now be cleared off, get the ground ready, by dunging and digging, for the reception of several principal crops requisite to put in at this season.

As soon as the ground is digged—that intended for sowing in particular, if dry weather, generally sow directly while the earth is fresh turned up, and the surface a little moist; which now, if a dry season, will be of particular advantage in sowing.

———The sowing and planting now required, consists of the following sorts:—

Sowing—must now be particularly attended to in several crops; especially cabbages, coleworts, cauliflowers, spinach, onions, lettuce, turnips, and carrots; some for autumn, but mostly to stand the winter, and for next spring; and some for early summer crops.

———Also sow some late pease, kidney-beans, and radishes, for the present autumn; chervill, corn salad, borage, angelica, fennel, alexanders, small salading, turnip-radish, and black Spanish radish.

Planting—is now required in coleworts, cabbages, broccoli, savoys, celery, endive, leeks, lettuce, and some turnip-cabbage, &c. if in request.

Pricking out—in young seedling plants, is required for broccoli, cabbages, coleworts, and celery.

Cabbage plants—of the June and July sowing, plant out abundantly for late young cabbage, and cabbage coleworts for autumn and winter.

Beans—plant (b.) for a Michaelmas crop, of the mazagans, white blossoms, &c. in a south exposure: they will produce in the latter end of September, October, &c.

Carrots—sow a small crop (b. m.), to come in for drawing young in the spring.

In rainy or showery weather—take opportunity to sow,

prick, and plant all necessary crops of the season; and to plant slips, off-sets, &c. of aromatic and other pot-herbs.

Lettuces—sow white and green cos, brown Dutch, imperial, Cilicia, and white and green cabbage-lettuce (b. m. l.) for autumn, winter, and next spring.

Onions—arrived to full growth in large bulbs, and the stalks and leaves withering, should be pulled up, spread to dry and harden, and housed.

Pickling articles—will now be proper to gather in various sorts, as cucumbers, kidney-beans, nasturtium berries, radish pods, love-apples, capsicums, small onions, artichoke bottoms, &c.

Potatoes—now well increased in size, may be taken up in larger quantities, but let the main crop continue in growth till October.

Fruit-Garden and Orchard.—At this season many sorts of fruit will be ripening; and those upon wall-trees and espaliers should have all possible assistance, by continuing the trees trained close and regular, to admit the beneficial effects of the free air and benign influence of the sun, that the fruit may attain its peculiar perfection in growth, ripeness, and flavor.

Occasional pruning and training—in wall-trees and espaliers, will still be required; and if any principal summer pruning, &c. remains to be done, complete the whole now as soon as possible.

————————No pruning in standards is particularly required at this season.

Flower-Garden and Pleasure-Ground.—Continue to keep all parts of the pleasure-ground, &c. in neat order, by hoeing, raking, and cleaning the borders, beds, and shrubberies; clipping edgings and hedges; rolling gravel, and mowing grass, &c.

Sowing, planting, and removing—will be necessary in several sorts of seeds, plants, roots, off-sets, slips, &c.

Articles to sow—are principally auriculas, polyanthuses, anemones, ranunculuses, seeds of bulbous roots, &c. (b. m.); all in large pots, either to move to shade in summer or shelter in winter; or may all be sowed in a bed or border.

Planting—is necessary in the several autumnal flowering bulbs, to flower the same season; and most sorts of small bulbous off-sets; also plant off-sets and slips of several fibrous-rooted perennials.

Removing and taking up—may be performed in bulbous roots lately done flowering, or take up and part the off-sets; likewise take up or transplant scaly bulbous kinds, such as lilies, martagons, &c. when the flower stalks decay, detaching the off-sets, and replanting them; those sorts should not remain long out of the ground.

WORK IN THE NURSERY.—In the general business of the nursery this month, continue the care of exterminating weeds in all the compartments; give occasional waterings to small young plants, and all plants in pots; and complete all intended budding of fruit-trees and others, finishing the whole (m. l.): also perform occasional pruning, trimming, and training trees, shrubs, hedges, &c. and some works of propagation, by parting roots of fibrous-rooted perennials, &c.; likewise commence the preparation of vacant ground (m. l.), by digging, trenching, &c. for autumn planting.

THE GREEN-HOUSE.—All the exotics of the green-house being now in the open air, are to continue mostly till the latter end of next month; except very wet weather happens (l.) this, when the more tender small succulent plants may be housed.

At this season, all the plants will want water often in dry weather; some shifting into larger pots, and others fresh earthed, or the crusted top earth loosened.

HOT-HOUSE AND STOVE.—The hot-house plants, always continuing in that department, must have a large admission of fresh air, giving frequent waterings; and in the pinery, &c. the bark-bed heat is necessary.

In this month, early preparations must be made for shifting the succession pines into larger pots, with some fresh earth. For this purpose, proper pots, and a quantity of rich mellow earth, or light loamy compost, must be ready, together with some fresh tan, to renew the heat of the bark-bed, in which to replunge the pots of pines, after shifting, that the revived heat of the bed may forward the emission of new root fibres into the fresh earth more expeditiously and effectual.

Admit air—freely into the hot-house every day, by opening the glasses considerably in sunny weather.

HISTORY OF HYDROPHOBIA;

OR, DISEASE PRODUCED BY THE BITE OF RABID ANIMALS.

It is probably not generally known, that this heart-rending malady may be communicated to the human subject from the bites of cats, rats, foxes, cows, and other animals not of the canine species, to which the infection has been previously communicated. It is, however, from the bites of the dog that most frequent cases of hydrophobia occur, although circumspection ought not to be solely directed to this faithful animal. It is equally necessary to guard against cats, and other quadrupeds of the feline or canine breed. The records of medicine furnish no instances of the bite of a person affected communicating the disease to another: and all the stories of the people labouring under hydrophobia barking like a dog, and attempting to bite those who approach them, are without foundation.

Symptoms of Hydrophobia.

In the human species the general symptoms attendant on the bite of a mad dog, or other rabid animal, are, at some indefinite period, and occasionally long after the bitten part seems well, a slight pain felt in it, now and then attended with itching, but generally resembling a rheumatic pain: then come on wandering pains, with uneasiness and heaviness, disturbed sleep and frightful dreams, accompanied with great restlessness, sudden starting, and spasms, sighing, anxiety, and a love for solitude. These symptoms continue daily to increase, pains begin to shoot from the bitten part, extending up to the throat, with a tightness and sensation of choking, and a horror and dread at the sight of water, and other liquids, with loss of appetite, and trembling. The person, however, is capable of swallowing any solid substance with tolerable ease; but the moment that any thing in a fluid form is brought in contact with his lips, it occasions him to start back with much dread and horror, although he labours perhaps under great thirst at the time. A vomiting of bilious matter comes on in the course of the disease, and an intense hot fever ensues, attended with continual watching, great thirst, dryness and roughness of the tongue, hoarseness of the voice, and the discharge of a viscid saliva from the mouth, which the patient is constantly spitting out. His respiration is

laborious and uneasy, but his judgment is unaffected; and, as long as he retains the power of speech, his answers are distinct.

In some few instances, a severe delirium arises, and closes the frightful scene; but it more frequently happens, that the pulse becomes tremulous and irregular, convulsions arise, and nature becoming at length exhausted, the unhappy patient sinks under the pressure of his misery.

Appearance of a Mad Dog.

When a dog is affected with madness, he becomes dull, solitary, and endeavours to hide himself, seldom barking, but making a murmuring noise, and refusing all kinds of meat and drink. He flies at strangers, but, in this stage, he remembers and respects his master; his head and tail hang down; he walks as if overpowered by sleep; and a bite at this period, though dangerous, is not so apt to bring on the disease in the animal bitten, as one inflicted at a later period. The dog at length begins to pant; he breathes quickly and heavily; his tongue hangs out; his mouth is continually open, and discharges a large quantity of froth. Sometimes he walks slowly, as if half asleep, and then runs suddenly, but not always directly forward. At last he forgets his master; his eyes have a dull watery red appearance; he grows thin and weak, often falls down, gets up and attempts to fly at every thing, soon becoming very furious.

In this state the animal seldom lives longer than thirty hours; and it is said that his bites, towards the close of his existence, are the most dangerous. The throat of a person suffering hydrophobia is always much affected; and it is asserted, that the nearer the bite to this part the greater the danger.

Prevention and Treatment of Hydrophobia.

It would appear superfluous to dwell long on the treatment of this afflicting disease, and it might be deemed presumption, after so many great names, to say any thing on an occasion so distressing, that does not admit of being confirmed by long experience and observation; although, hitherto, nothing of any benefit has been offered through this channel—all has been conjecture and surmise. One has recommended one thing, another another; but what do these all amount to?—nothing. No good, we are told, is to be derived from medicine: the moment a man

is bitten by a mad dog, his death-warrant is signed, and his dissolution soon follows. The *law* is left to take its course; nor can all the boast of empiricism, the pomp of splendid equipages, and high sounding names, respite the unhappy victim a moment from the grave beyond the devoted period. All prognostics are unfavourable: death commonly takes place about the third or fourth day from the first appearance of the symptoms. This then, it would appear, is all we know about hydrophobia.

On this subject we will state briefly our opinion; and in so far as we concur in the belief, that early excision of the bitten part is the surest method of preventing the fatal consequences, it has, with some modifications, our warmest support. Mercury, arsenic, opium, musk, camphor, acid, wine, vegetable and mineral acids (internally), oil, various herbs, and many other remedies whose effects are diametrically opposite in their nature, have all been adopted in vain. Large blood-lettings, the cold and warm bath, injecting water into the veins; every thing, in short, has been tried without effect: nor is this much to be wondered at. Disease is easier prevented than cured, when it has once set in.

In the first place, the bitten part, as soon after the accident as possible, should be completely cut out; it should then be suffered to bleed, and the bleeding promoted by warm affusions; and, after this has been practised for some time, a cupping-glass is to be applied over the part, and suffered to remain until it produce visible effects of its exhausting power. The wound then, on the removal of the cupping-glass, may be washed with a weak solution of muriatic acid (forty drops to a pint of water), three or four times a day, and a piece of rag, or lint, moistened in the same, left applied on the part. Should some degree of inflammation ensue, as most likely will be the case, the solution may then be laid aside; the wound may now be dressed with dry lint, and warm poultices applied until suppuration be promoted. When this is effected, the wound may be healed in the usual way. During this treatment, the patient is recommended to take two of the following pills, at bed-time, every night, for three weeks or a month after the accident:

Take Blue pill, - - - - -	1 drachm.
Powdered rhubarb, - - -	2 scruples.
Extract of hemlock, - - - -	10 grains.

Make 20 pills, to be taken as above.

With respect to cauterising the bitten part, we do not place so much reliance upon it; the application of nitric acid, or similar articles, in our opinion, cannot have the same influence in arresting the progress, beyond momentarily, of so subtle a matter as the hydrophobic virus. It may sear the mouths of the absorbents, and prevent the poison from being immediately taken up by them; but as soon as the parts slough, and the subtle virus again escapes, the absorbents being rendered more sensible to their own action, from being confined, or temporarily blunted, they now, when set at liberty, are capable of increased action—the virus, consequently, not being annihilated, is more likely to be carried into the system. Excision of the part, and the treatment here recommended, present none of these uncertainties; and, as far as hitherto it has been adopted, has invariably proved successful.

Much has been said about the cause of hydrophobia, which we equally believe to be as wide from truth as the means of cure hitherto from certainty. Among these, are food of a highly putrid nature—then what animal lives upon aliment of this description more constantly and more abundantly than hogs? Corrupted and unwholesome water is also assigned—but do we not see dogs, in general, prefer the filthiest stagnant pools to the purest waters? Hot weather again is urged, although it by no means appears that canine madness is so prevalent among dogs in warm climates as in cold ones. These may occasionally be concomitant causes, but are by no means those on which the disease is said to depend. It appears, therefore, more probably, to be a specific contagion, produced by causes yet unknown, and propagated among these animals from one to the other, by a peculiarity congenial with their nature.

Attention to Dogs during Hot Weather.

Why the heat of the weather appears to be more oppressive to quadrupeds, particularly to dogs, and those of the lower species, is their greater proximity to the ground, where there is scarcely felt the least current of air; and this, added to the heat of the surface, has considerable influence over the arterial action of animals, whose stature and conformity is not so advantageous as those of the higher class. Leaving, however, these physiological speculations for the present, we would strongly

recommend to those who keep dogs, and who are anxious to keep themselves and neighbours from harm, to supply them not only with plenty of water, but to keep them as clear of vermin, particularly during the dog-days, as possible; to give them, occasionally, a little brimstone and milk, and some of the worm medicines; to turn them into fields or grass-plots; and those that are fond of the water, to give them frequent opportunities of indulging in it. By these means, the risk of their becoming mad would, if not entirely prevented, be considerably lessened. It would be adviseable also, in those with shaggy coats, or thick-set hair, to relieve them entirely of this unprofitable and unwelcome appendage, during the sultry weather, as it would grow fast enough to protect them from its inclemency when it was wanted. Attention to cleanliness, diet, and the trimming, muzzling, and otherwise ordering of these animals, must obviously render less all danger of their becoming mad—hence fewer of those melancholy scenes to which we have been forced to become witnesses, without the means of alleviation.

How to Cure Mad Dogs.

Dogs having symptoms of madness, ought not to be tampered with, with a view to curing them—they should be immediately destroyed; and however great the attachment of the master may be to the animal, it is a duty he owes to himself and (what is of far greater importance) to society, to dispatch it with all possible expedition; for this purpose, as the surest, safest, and most expeditious method, we would recommend immediate perforation through the head with a ball-cartridge, as the only specific that can or ought to be depended upon.

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

(Continued from p. 272).

STOMACH, pain of,—may proceed from worms, ulcers, &c. A violent pain, with vomiting and fever, are symptoms of inflammation of the stomach. Pain at the pit of the stomach, with sickness, recurring at uncertain periods, and succeeded by slight yellowness of the skin, accompanies the passing of gall-stones. Painful disten-

sion of the stomach, after even moderate eating, generally proceeds from weakness of the stomach.

STOOLS,—of a white clayey appearance, shew an obstruction in the gall-ducts, which is the cause of the yellowness of the skin in jaundice.—*Black Stools*, with sudden relief from violent pain in inflammation of the bowels, shew great danger, as it is probable mortification may have taken place.—*Slimy Stools*, streaked with blood, with griping pains, are symptoms of dysentery, or bloody flux.

STUPOR,—after wounds or blows on the head, shew great danger, and requires particular attention.

SWALLOWING, DIFFICULT, and acutely painful, with swelling and redness of the back of the mouth, or upper part of the throat, with fever, marks inflammatory sore throat. And not extremely painful, with swelling and redness of the back of the mouth or upper part of the throat, and a low fever, point out, especially if a scarlet eruption appear on the breast, arms, &c. that the sore throat is of the ulcerated malignant kind. Coming on gradually, and without pain or fever, gives reason to apprehend a contraction is taking place in the gullet. Endeavours for its cure are only to be made, with a prospect of success, during the commencement of the disease. Difficulty and inability in swallowing liquids, and dread of water, constitute the disease termed Hydrophobia. Difficulty of swallowing liquids, however, occurs sometimes in cases that are plainly hysterical.

SWEAT, GENERAL and PROFUSE,—occurring in cases of inflammation, is a favourable symptom. Profuse perspiration succeeding to hectic flushes, with difficulty of breathing, cough, and spitting of purulent matter, distinguish consumption. Sweat, breaking out gradually, and continuing for some time, is, in general, a favourable symptom, in fever; almost always put an end to the paroxysm of an intermittent. Cold perspiration breaking about the face and neck, in fever, shews great weakness and danger.

RING WORMS.

OF those diseases which do not endanger life, nor destroy any part of the animal organization, few are of more importance than that which is well known by the popular

appellation of ring-worm of the scalp, (the *Porrigo scutulata* of Willan). This disease, which is peculiar to children, has long been a source of terror in schools; having materially injured many respectable seminaries. In families it has been a tedious and very expensive visitor; remaining, in many instances, for years, resisting protracted and painful modes of treatment, and excluding the little sufferers from desirable places of instruction.

Ring worm is well known to be a very unmanageable disease, and viewed in this light, it is most certainly an affection of importance, and an efficacious remedy is worthy the attention of the public.

A malady so well known, does not require a tedious definition. In its progress, two states, or stages are distinguishable: the first may be called the irritable, the second, the indolent stage; to this latter, the plan about to be proposed is particularly applicable. In those cases which have resisted the ordinary means, which are of long standing and obstinate, the following treatment has been very efficacious: the head should be frequently shaved, and kept covered with an oiled-silk cap, or instead of which a thin bladder has sometimes been used. An ointment should be formed by mixing together spermaceti cerate, and finely pulverised supertartrate of potash, in such proportions as to make it of a very firm consistence; of which a piece of the size of a nutmeg, or larger, according to the extent of the surface affected, should be well rubbed on the part with the palm of the hand, every night, for three or four minutes. The head should be well washed with soap and water every third night, previously to the application of the ointment.

Internal medicines are seldom requisite in this advanced stage, except where the character of the affection is irregular, or there is a peculiarity in the constitution of the patient; in which cases some modification of treatment will necessarily be required: these variations will readily be made by any respectable practitioner.

The above plan, if diligently adopted from three to six weeks, will seldom disappoint the expectations of those who try it, even in the most inveterate cases.

BATHS, WELLS, WATERS, AND MINERAL SPRINGS.

(*Continued from* p. 311.)

BATH.

THE city of Bath has been long celebrated for its numerous hot springs, which are of a higher temperature than any in this kingdom (from 112° to 116°), and which, indeed, are the only natural waters we possess that are at all hot to the touch; all the other thermal waters being of a heat below the animal temperature, and only deserving that appellation from being invariably warmer than the general average of the heat of common springs.

These waters are particularly adapted to the benefit of invalids, who find here a variety of establishments, contributing equally to health, convenience, and amusement.

King's Bath, Cross Bath, and the Hot Bath; Properties, &c.

There are three principal springs in the city of Bath, namely, those called the King's Bath, the Cross Bath, and the Hot Bath; all within a short distance of each other, and emptying themselves into the river Avon, after having passed through the several baths. Their supply is so copious, that all the large reservoirs used for bathing are filled every evening with fresh water, from their respective fountains. In their sensible and medicinal properties, there is but a slight difference. According to Dr. Falconer, the former are; 1. That the water, when newly drawn, appears clear and colourless, remains perfectly inactive, without bubbles, or any sign of briskness, or effervescence. 2. After being exposed to the open air for some hours, it becomes rather turbid, by the separation of a pale yellow, ochrey precipitate, which gradually subsides. 3. No odour is perceptible from a glass of the fresh water, but a slight pungency to the taste from a large mass of it, when fresh drawn, which, however, is neither fetid nor sulphureous. 4. When hot from the pump, it affects the mouth with a strong chalybeate impression, without being of a saline or pungent taste. And, fifthly, on drawing cold, the chalybeate taste is entirely lost, leaving only a very slight sensation on the tongue, by which it can scarcely be distinguished from common hard spring-water. The temperature of the King's Bath water, which is usually preferred for drink-

ing, is, when fresh drawn in the glass, above 116 deg.; that of the Cross Bath, 112 deg. But after flowing into the spacious bathing vessels, it is generally from 100 to 106 deg. in the hotter baths, and from 92 to 94 deg. in the Cross Baths; a temperature which remains nearly stationary, and is greater than that of any other natural spring in Britain. A small quantity of gas is also disengaged from these waters, which Dr. Priestley first discovered to contain no more than one-twentieth part of its bulk of fixed air, or carbonic acid.

Chymical Properties of the Bath Waters.

The chymical properties of the Bath waters, according to the most accurate analysers, Doctors Lucas, Falconer, and Gibbs, contain so small a proportion of iron, as to amount only to one-twentieth or one-thirty-eighth of a grain in the pint; and, according to Dr. Gibbs, fifteen grains and a quarter of siliceous earth in the gallon. Dr. Saunders estimates a gallon of the King's Bath water to contain about eight cubic inches of carbonic acid, and a similar quantity of air, nearly azotic, about eighty grains of solid ingredients, one-half of which probably consists of sulphate and muriate of soda, fifteen grains and a half of siliceous earth, and the remainder is selenite, carbonate of lime, and so small a portion of oxyde of iron as to be scarcely calculable. Hence he concludes, that the King's Bath water is the strongest chalybeate; next in order the Hot Bath water; and lastly, that of the Cross Bath, which contains the smallest proportions of chalybeate, gaseous and saline, but considerably more of the earthy particles; while its water, in the pump, is also two degrees lower than that of the others. It is likewise now ascertained, that these springs do not exhibit the slightest traces of sulphur, though it was formerly believed, and erroneously supported on the authority of Dr. Charleton, that the subtile aromatic vapour in the Bath waters, was a sulphureous principle, entirely similar to common brimstone.

Effects of the Bath Water.

With regard to the effect of the Bath waters on the human system, independent of their specific properties, as a medicinal remedy not to be imitated completely by any chymical process, Dr. Saunders attributes much of their salubrious influence to the natural degree of warmth peculiar to these springs, which, for ages, have preserved

an admirable degree of uniformity of temperature. He thinks too, that one of their most important uses is that of an external application, yet supposes that, in this respect, they differ little from common water, when heated to the same temperature, and applied under similar circumstances.

According to Dr. Falconer, the Bath water, when drunk fresh from the spring, generally raises, or rather accelerates the pulse, increases the heat, and promotes the different secretions. These symptoms, in most cases, become perceptible soon after drinking it, and will sometimes continue for a considerable time. It is, however, remarkable, that they are only produced in invalids. Hence we may conclude, that these waters not only possess heating properties, but their internal use is likewise attended with a peculiar stimulus, acting more immediately on the nerves.

One of the most salutary effects of the Bath water, consists in its action on the urinary organs, even when taken in moderate doses. Its operation on the bowels varies in different individuals, like that of all other waters which do not contain any cathartic salt; but in general, it is productive of costiveness: an effect resulting from the want of an active stimulus to the intestines, and probably also from the determination this water occasions to the skin, more than from any astringency which it may possess; for, if perspiration be suddenly checked during the use of it, a diarrhœa is sometimes the consequence. Hence it appears that its stimulant powers are primarily, and more particularly exerted in the stomach, where it produces a variety of symptoms, sometimes slight and transient, but, occasionally, so considerable and permanent, as to require it to be discontinued. In those individuals with whom it is likely to agree, and prove beneficial, the Bath waters excite, at first, an agreeable glowing sensation in the stomach, which is speedily followed by an increase both of appetite and spirits, as well as a quick secretion of urine. In others, when the use of them is attended with head-ache, thirst, and constant dryness of the tongue, heaviness, loathing of the stomach, and sickness; or if they are not evacuated, either by urine or an increased perspiration, it may be justly inferred that their further continuance is improper.

Diseases in which the Bath Waters are used, &c.

The diseases for which these celebrated waters are resorted to, are very numerous, and are some of the most important and difficult of cure of all that come under medical treatment. In most of them, the bath is used along with the waters, as an internal medicine. The general indications, of the propriety of using this medicinal water, are in those cases where a gentle, gradual, and permanent stimulus is required. Bath water may certainly be considered as a chalybeate, in which the iron is very small in quantity, but in a highly active form: and the degree of temperature is in itself a stimulus, often of considerable powers. These circumstances again point out the necessity of certain cautions, which, from a view of the mere quantity of foreign contents, might be thought superfluous. Although, in estimating the powers of this medicine, allowance must be made for local prejudice in its favour, there can be no doubt but that its employment is hazardous, and might often do considerable mischief, in various cases of active inflammation, especially in irritable habits, where there exists a strong tendency to hectic fever; and even in the less inflammatory state of diseased and suppurating viscera; and, in general, wherever a quick pulse and dry tongue indicate a degree of general fever. The cases, therefore, to which this water are peculiarly suited, are mostly of the chronic kind; and by a steady perseverance in this remedy, very obstinate disorders have given way. The following, Dr. Saunders, in his Treatise on Mineral Waters, considers as the principal, viz. 1. Chlorosis, a disease at all times much relieved by steel, and will bear it, even where there is a considerable degree of feverish irritation, receives particular benefit from the Bath water; and its use, as a warm bath, excellently contributes to remove that languor of circulation, and obstruction of the natural evacuations, which constitute the leading features of this common and troublesome disorder.— 2. The complicated diseases, often brought on by a long residence in hot climates, affecting the secretion of bile, the functions of the stomach, and alimentary canal, and which generally produce organic derangement in some part of the hepatic system, often receive much benefit from the Bath water, if used at a time when suppurative inflammation is not actually present.—3. Another and less active disease of

the biliary organs, the jaundice, which arises from a simple obstruction of the gall-ducts, is still oftener removed by both the internal and external use of these waters.—4. In rheumatic complaints, the power of this water, as Dr. Charleton observed, is chiefly confined to that species of rheumatism which is unattended with inflammation, or in which the patient's pains are not increased by the warmth of his bed. A great number of the patients that resort to Bath, especially those that are admitted into the hospital, are affected with rheumatism in all its stages; and it appears, from the most respectable testimony, that a large proportion of them receive a permanent cure. (See *Falconer on Bath Water in Rheumatic Cases).*—5. In gout, the greatest benefit is derived from this water, in those cases where it produces anomalous affections of the head, stomach, and bowels; and it is here a principal advantage to be able to bring, by warmth, that active local inflammation in any limb, which relieves all the other troublesome and dangerous symptoms. Hence it is that Bath water is commonly said to produce the gout; by which is only meant that, where persons have a gouty affection, shifting from place to place, and thereby much disordering the system, the internal and external use of the Bath water will soon bring on a general increase of action, indicated by a flushing in the face, fulness in the circulating vessels, and relief of the dyspeptic symptoms; and the whole disorder will terminate in a regular fit of the gout in the extremities, which is the crisis always to be wished for.—6. The colica pictonum, and the paralysis, or loss of nervous power in particular limbs, which is one of its most serious consequences, is found to be peculiarly relieved by the use of the Bath waters, more especially when applied externally either generally, or upon the part affected.

Dose of the Water.

The quantity of water taken daily, during a full course, and by adults, is recommended by Dr. Falconer, not to exceed a pint and a half, or two pints; and in chlorosis with irritable habits, not more than one pint is employed; and when the bath is made use of, it is generally two or three times a week, in the morning. The Bath waters require a considerable time to be persevered in, before a full and fair trial can be made. Chronic rheumatism, habitual gout, dyspepsia, from a long course of high and

intemperate living, and the like, are disorders not to be removed by a short course of any mineral water; and many of those who have once received benefit at the fountains, find it necessary to make an annual visit to them, to repair the waste in health during the preceding year.

CHELTENHAM.—THE MONTPELIER OF BRITAIN.

The fame of this watering place is the more solid, and will be the more permanent, because it owes its celebrity less to the caprice of fashion than to the salutary virtues of its springs.

Cheltenham is about 95 miles from the metropolis, is pleasantly situated in a rich and beautiful vale in the county of Gloucester; and, being well sheltered by hills from the cold winds, the air is fine and mild. It is 9½ miles from the city of Gloucester; 16 from Cirencester; 40 from Oxford; 9 from Tewkesbury; 40 from Hereford; 35 from Monmouth; 22 from Malvern; 25 from Worcester; 44½ from Bristol; and 44½ from Bath.

The Well Walk.

With the exception of Christ-church walk, in Oxford, this is perhaps the most delightful in the kingdom. On passing the draw-bridge, we enter a magnificent gravelled promenade, twenty feet wide, shaded by venerable elms at twelve feet distance, whose embowering tops exclude the fierce rays of the sun. A quickset hedge bounds this Elysian walk on each side; and here and there a bench or garden chair is placed as we advance, which, during the morning, are generally occupied in succession by parties. From the commencement of this charming walk to the pump, which stands in its centre, is nearly 600 feet. Looking back, the church-spire appears perfectly in a line with the walk; and, on its dial, the hour and minute may be distinguished.

The Spa, or Long Room.

On the east side of the Pump-square is the Long Room, sixty-six feet by twenty-three, built in 1775, at the joint expence of the late Mr. Skillicorne, the ground-landlord, and Mr. Miller, then renter of the Spa, for the accommodation of the company while drinking the water; and on the west side is a building of similar dimensions, the principal part of which Mr. Chambers, the manager of of the pump, occupies.

The walk immediately above the well is equally shaded by a plantation of limes for more than 300 feet: which conducts to the second, or *Orchard-well,* beyond which a serpentine path commences, upwards of 503 feet long, whose sides are bordered with rising elms that will soon furnish an agreeable umbrage with their boughs. At the termination of the whole is a picturesque villa, called the Grove Cottage, which gives a pleasing finish to the scene.

Montpelier Spa.

Nearly opposite the Orchard-well are Mr. Thompson's much-admired pleasure-grounds, where an elegant building, and a spacious pump-room with a viranda in front, has been erected for the use of subscribers. Surrounding this charming spot, are the beautiful, extensive, and romantic rides and walks recently completed at a very considerable expence by the above gentleman.

Terms of Drinking at the Spa, and of Walking and Riding in the Pleasure-grounds.

Drinking the Waters	Six weeks, 3*s.* 6*d.* each person, or one guinea the family; exclusive of a gratuity to the pumper.
Walking	3*s.* 6*d.* each person.
Riding	7*s.* 0*d.* each horse.
Driving	10*s.* 6*d.* each carriage.

In the Pump-room a book is always open for subscriptions, to keep the walks in proper repair, and for the use of that room; in which every person who visits the place is expected to enter his name.

The Spa, its Qualities and Virtues.

This valuable spring rises at one-third of a mile south of the church, in a mixed loamy and sandy soil; which prevails for several miles round, and produces abundant crops of every kind of vegetation, while it seems to render the air elastic and pure. This water owes its discovery to a slow spring being observed to ooze from a strong thick blueish clay or mould, under the sandy surface of the soil; which, after spreading itself for a few yards, again disappeared, leaving much of its salt behind. To feed on these salts, flocks of pigeons being daily observed to resort, Mr. Mason, who was then proprietor of the spot, was induced to examine it with more attention; and soon remarked, that when other springs were fast bound by the frost, this continued in a fluid state.

Originally the ground belonged to Mr. Higgs, of Charlton-King's, who, ignorant of the treasure it contained, sold it to Mr. Mason, in 1716. For a short time after the discovery of the spring, it remained open, and was drunk by such persons as thought it might be of service to them. In 1718, however, it was railed in, locked up, and a little shed built over it; then, in consequence of some experiments made on the water by Dr. Baird of Worcester, and Dr. Greville of Gloucester, its virtues became more generally known; and for three years, it was sold as a medicine, till in 1721 it was leased to Mr. Spencer at 61*l.* per annum.

After the death of Mr. Mason and his son, Captain Henry Skillicorne, father of the late landlord, becoming possessed of the Spa and premises in right of his wife, the daughter of the original discoverer in 1738, he not only built the old room, on the west side of the pump, for the use of company, but cleansed the spring from all extraneous matter; and erected a square brick building in four arches, over it, with a pump on the east side, rising in the form of an obelisk. This structure now remains; and the well in the centre of the doom is about five or six feet below the surface, close shut down with doors, to prevent the admission of air.

At the same time Captain Skillicorne laid out the paved court that environs it, planned the upper and lower Well Walk, planted the trees, and was continually improving the natural beauties of the place, to render it more worthy of the respectable company that began to visit it from all quarters. Dr. Short, in 1740, published some experiments made by him on this water; and, under the name of a neutral purging chalybeate water, pronounced it superior to any thing else of the kind in England.

The growing fame of the Spa met with a great accession, from his just testimony to its virtues; and other distinguished physicians and chymists have successively analyzed it, particularly Dr. Fothergill, of Bath. Its principal ingredients are Epsom and Glauber salts, a small portion of chalybeate, and some fixed air.

The temperature at eight o'clock in the morning is generally about 53° or 54°, and at noon, in the hottest season, 6° or 7° higher.—The taste is slightly saline, and a small impression of bitter, like that of Epsom salt, is left upon the palate; but it is by no means so nauseous

as most of the waters of the other wells. The saline contents in a wine-gallon are:

	Grains.
Sulphate of soda and magnesia *(Glauber and Epsom salt)*, -	480
Oxyde of iron, - - - - - -	5
Muriate of soda *(sea salt)*, - - - - -	5
Sulphate of lime, - - - - - -	40
Carbonate and muriate of magnesia, - - -	25
	555

	Cubic inches.
Carbonic acid, - - - - - -	30.36
Azotic and hepatic gases, - - - -	15.18
	45.54

Medicinal Virtues.

Almost incredible cures have been performed by it, when drunk on the spot. Its salts prove attenuant and cathartic, its chalybeate bracing, and its air exhilarating; and, by its containing a small portion of iron, it strengthens the stomach, and is therefore preferable, in many cases, to other saline springs.

In mildness, certainty, and expedition of operation, it is almost unrivalled; which renders it peculiarly serviceable in hypochondriac and scorbutic cases.

It is singularly efficacious in all bilious complaints, obstructions of the liver and spleen, indigestion, loss of appetite, in habitual costiveness, and obstinate obstructions, which lay the foundation of many chronic disorders. Hence so many who have been resident in the East Indies came to visit Cheltenham, and to partake of the benefit of its healing waters.

It restores a relaxed habit, whether from long residence in a hot climate, free living, the use of mercury, or any other cause. In nervous complaints it has likewise proved extremely salutary; but in such cases it should be used as an alterative rather than as a purgative.

In female complaints, at an early period of life, proceeding from too languid a circulation, and likewise at the turn of life, when there is a redundancy of blood, it may be used with much benefit. On the latter principle, it is serviceable to studious sedentary men, of between forty and fifty.

The following, according to Dr. Jameson, are the principal diseases which require a course of these waters:

Inflamed and schirrous liver, or spleen—Torpid action

of the liver—Bilious state of the stomach—Habitual costiveness—Hypochondriacal complaints—Sick head-ache, with bilious vomitings—some kinds of bilious purgings—Jaundice and biliary concretions—Depraved appetite and indigestion—Pimply eruptions, called scurvies—Scaly and scurfy states of the skin—Inflammations of the skin of the face—Exudations and watery humours of the skin—Some kinds of scrofulous tumours—Inflammations of the eyes and eyelids—Inflamed ulcers and discharges of the legs—Some stages of rheumatism and gout—Inflammatory asthma—Female diseases—Piles and fistula—Diseases of the kidneys, gravel, and stone; and Intestinal worms.

The best season of the year, says Dr. Jameson, in his treatise on these waters, for a course, is the summer, on account of advantages derived from the co-operation of air and exercise with the water. It is also the season which renders the removal of bile and undigested food from the bowels most necessary for health.

The waters are likewise strongest, and their refreshing effects most felt, in summer; for superficial mineral springs are weaker in cloudy and rainy seasons, than in clear dry weather: but it may also be drank in the middle of winter, with considerable advantage, by taking off the chill, or drinking it at the fire-side.

The spring and autumn are likewise proper seasons for its use, on account of the tendency of the constitution to inflammatory and eruptive diseases at these periods. Hence the usual time of the resort of company to Cheltenham begins in April. The season is at its height from the beginning of July until the end of September, and finishes in October, except with those persons who intend to remain all the winter, of which there has been considerable numbers for some years past.

The best time of the day for drinking the water is found by experience to be early in the morning, and it is seldom used at any other time at Cheltenham. Medicines intended to operate in the circulation of the blood ought to be taken with a full meal; but water, which acts on the alimentary organs only, should be drank on an empty stomach; and the use of it, at this time, is attended with a further advantage of the operation ceasing before dinner.

Some invalids drink the water at bed-time, for the purpose of remaining all night in the bowels, to work itself off early next morning by the assistance of exercise. But

the principal benefit is derived from drinking it at the pump early in the morning, when the temperature, volatile principles, and solution of iron, enhance the value of the remedy: while the early walk in the pure cool air, enables those who pursue the salutary practice to eat a hearty breakfast. The waters generally contain more steel early in the morning, and many of them entirely lose it in the middle of the day.

The dose of the water ought always to be moderate on first using, and the quantity increased according to the effects produced on the body. This will, therefore, very much depend upon the age, sex, constitution, and disease, of the patient; and, at the commencement of the course, it will, perhaps, require the opinion of the faculty, to determine whether the water should be drank in such quantities as gently to increase the natural evacuations of the body, or to act as a brisk cathartic.

The temperature of the water is of more importance than is generally imagined. In its cold state, it braces the stomach, and refrigerates the body: in its warm state, it relaxes the stomach, and, by the loss of its volatile principles, proves less flatulent. Invalids should, therefore, endeavour to bring themselves gradually to the use of it in the coldest state, unless in cases of gout, rheumatism, spasm, gall-stones, or indurated viscera; and then some of the water, which is kept heated on purpose by the pumper, should be added to each dose.

The duration of the course should be regulated by the nature of the disease, and effects of the water on the constitution. Those who visit Cheltenham for amusement, are satisfied with drinking as much as relaxes the bowels, for two or three weeks; but in obstinate chronic cases, which require complete alteration of the habit, the patients are obliged then to persevere in a moderate use of the water for months, and sometimes for years, to get their health re-established. It is a very common practice, after these waters have acted powerfully on the bowels for two or three weeks, to take a short excursion to some neighbouring town, or to drink at the steel wells for a week or two, and return again to the use of the purging waters.

A pint of water taken at two draughts before breakfast, is generally sufficient for most constitutions. There are always physicians, or resident apothecaries, on the spot, who should be consulted on the use of such powerful

waters; as they will either prove beneficial or detrimental, according to the mode of taking them.

The resident physicians now in Cheltenham, are Dr. Jenner, Dr. Jameson, Dr. Boisragon, Dr. Christie, Dr. Faulkener, Dr. Coley, and Dr. Newell; some of whom it will be prudent to consult, before recourse is had to the use of the waters.

The King's Well.

In 1781, Mr. Skillicorne built a mansion for the late Earl of Fauconberg, (who, for many years, drank the waters with great benefit), at a small distance to the west of the Spa, or old well, on an eminence commanding an extensive and beautiful landscape. When Their Majesties honoured Cheltenham with a visit, they occupied this house, which was called Bay's Hill Lodge; and, probably in compliment for the use of it, the King, before his departure, ordered a well to be sunk, to procure a supply of fresh water for domestic purposes. At the depth of fifty-two feet, however, a mineral water was discovered, which, on examination, proved to be similar to the old well. A pump was accordingly placed in it; and it was opened, with some necessary accommodations for the use of the company; but whether it was from prejudice or reason, it was much less drunk than the Spa-water. In this well the sulphur was said to be more predominant, and the volatile particles still less: but the effects were nearly the same, and one advantage was gained by its discovery; there never will be a deficiency of water for the drinkers, which before was often the case. This house is now pulled down.

The Orchard Well,

Has obtained that name from its situation at the top of a field of fruit-trees. It is covered over with a square pump-room of brick, and was dug, in the year 1807, twenty-four feet deep in blue clay, to supply the deficiency of water at the old well, from which it is not more than a hundred yards distant.

Although the rise of the water in this well was known to be ten feet, yet it was drank so low in 1808 and 1809, as to become muddy, and its transparency is sometimes affected by heavy rains; but at present it supplies near two hundred drinkers with a pure water, which sparkles a little on being poured from one glass to another.

The impression it makes upon the palate is not unlike

that produced by the water of the old well—a slightly bitter and saline taste; and for two years after the establishment of the Spa, the water possessed a strong odour of hepatic gas, which, by constant pumping, (from its great celebrity) is now seldom discovered in it. In May, 1809, the temperature was 52°, when the atmosphere of the room was 60°, which is a degree and a half colder than the water of the old well. The specific gravity was 1.0054, and it accordingly raised the boiling point to 214.5.

Essex Well,

Situated in a field once the property of Lord Essex, is about 320 yards directly above the old Spa, and opposite to Montpelier Wells, on the west side of Badgeworth road. The saline spring issued at the depth of forty feet from the side of that next Bay's Hill, but the well was sixty feet deep, and covered over with a small square building of brick. The water has a slightly saline and bitter taste, without any flavour of hepatic gas.

Lord Sherborne's Well.

Owing to the celebrity of the above-mentioned springs, this place became more and more crowded every year, and for several seasons both wells proved insufficient to supply the whole of the company. In consequence of this increased demand for water, in the year 1802, the earth was bored in more than forty places, adjoining the town, under the direction of Dr. Jameson, in hopes of finding a new spring, but without success. He caused a hole to be made with a boring machine, in the lane adjoining the Lower Spa, which yielded only twelve gallons of water in twenty-four hours, of a saline, sulphureous, and chalybeate nature. In hopes of discovering the source of this spring, Dr. Jameson determined to bore higher up in the lane; and in the month of October, in the same year, he discovered a saline spring at the depth of forty feet, which supplied a gallon of water in four minutes, from a hole of only two and a half inches in diameter.

From experiments made in 1806, Dr. Jameson observes, "it is always beautifully transparent, and sparkled in the glasses. The temperature was from 51° in common to 53° in the hottest season, and generally two degrees colder than any of the other mineral springs. The

taste resembled diluted sea-water, with a strong flavour of hepatic gas. The saline matter obtained from a gallon of this water, after a complete dessiccation, weighed 540 grains, and when 80 gallons were evaporated, until the selenite dropped, and was thrown away, the water afterwards yielded two pounds of crystals, by slow evaporation. Nearly half the contents of it consisted of sea-salt, and a small portion of iron. The effects on the bowels and stomach were, therefore, similar to those produced by the rest of the saline springs; and, like other sulphureous waters, it also possessed a specific power over diseases of the skin."

Montpelier Wells,

Are so called from their situation in an elevated healthy field of that name, on the east side of the Badgeworth road, and not 800 yards from the centre of the town. They were opened in May 1808, and the waters soon acquired considerable reputation, which encouraged the proprietor to make the following arrangements.

The long pump-room, with pillars in front, and a music-room at the top, situated in the upper corner of Montpelier grounds, contains four pumps, which raise water from two wells. These are discharged by brass cocks on each side of the pump-case, which are numbered. There are, besides, three smaller cocks, which discharge the water conveyed from a third well, at a considerable distance.

No. 1. *The Chalybeated Saline Water*—is brought from a well under a small brick building, about twenty yards distant, and discharged by the outer cock. The water of this well acts on the bowels, in producing evacuations, like that of the other spas, and is stated in the analysis to contain an uncommonly large proportion of iron.

No. 2. *The Strong Sulphuretted Saline Water*—is pumped from within three inches of the bottom of the well immediately under the room, and discharged by the inner brass cock. The well, 46 feet deep in blue clay, collects 2000 gallons of water in twenty-four hours. Near half the solid contents consists of sea-salt, which is united to a little Glauber and Epsom salts, that occasion it to operate upon the bowels like the aperient waters of the old wells. It contains no iron, but abounds with a sulphureous principle, found, by experience, to stimulate the exhalent

vessels of the skin, and to cure cutaneous diseases in a powerful manner. It is likewise useful in many bilious cases.

No. 3. *The Weak Sulphuretted Saline Water*—is pumped from within three feet six inches of the bottom of the same well, under the room which supplied the former water, and is delivered by the middle brass cock.

No. 4. *The Simple Saline Water*—conveyed by a pipe from Bescroft-well, distant about 170 yards, on the other side of Badgeworth road, is discharged by a small cock in the circular counter. The well, 42 feet deep, is covered by a tall brick building, thatched over.

Waters in the Octagon Turret.

In the lower corner of Montpelier field is a small octagon building, adjoining the Gothic cottage, which contains three pumps, with the following waters, viz. *Chalybeated Saline,* pumped from a well 40 feet deep, immediately under the building; *Strong Chalybeated Saline,* brought by a pipe from a well under the Gothic cottage, 55 feet deep; and *Weak Saline Water,* conveyed by a pipe from a well 40 feet deep, six yards beyond the Gothic cottage. This last has so little chymical impregnations, that it has been denominated the milk well.

Waters in Hygeia House.

This spacious building, surrounded by a viranda and stone pillars, and situated at a short distance from the baths, contains three pumps with the following kinds of water: *Carbonated Steel Water,* rising out of a black ferruginous mould, a few yards from the house; *Chalybeated Weak Saline,* rising out of blue clay in the area of the house; and *Weak Sulphuretted Saline,* rising out of blue clay immediately under the house.

Allstone Villa, New Spa.

Mrs. Smith, proprietor of Allstone Villa, has lately discovered on her grounds (which are only about three minutes walk from High-street) a mineral spring, the water of which has been analysed by Mr. Frederick Accum, of London, and found to contain, in a pint, 131½ grains of salts, and two cubic inches of fixed and common air, which is nearly double the quantity of salts that the other wells, about the neighbourhood of Cheltenham, hold in solution. The strongest of them only contain

nine-tenths of a grain of iron in a pint; but this spring contains $2\frac{1}{4}$ grains of iron in every pint of water.

As the efficacy of Cheltenham waters depends on the happy combinations of iron with other saline bodies, the superabundance of this invigorating substance which exists in the spring above mentioned, must certainly give it a decided pre-eminence over those in which this metal is not so abundant. The strengthening qualities of the iron enables the stomach to bear a quantity of water sufficient to produce the desired effect, without the feeling of distention at the time of taking it, or languor and debility after its operation. Artificial salts, even when skilfully combined with preparations of iron by the chymists, have never been made to imitate that salubrious production of nature, *Cheltenham Water*, in their effects upon the human body.

Chalybeate Springs.

The first of these, which was only particularly noticed of late, promises to possess very active virtues, and will probably rival Tunbridge and Astrop. It is the property of Mr. Barret, and is situated in a meadow, two or three hundred yards from the mill at the top of the town. A pump-room has lately been erected, and a book opened, which has already a great number of subscribers; but the water has not yet been sufficiently analysed to allow us to speak with confidence on its qualities. In the beginning of 1804, a new saline spring was discovered. It is situated upon an elevated spot of ground, which commands a beautiful prospect of the town, distant 300 yards from the old well, in the lane leading to Badgeworth; and has a convenient footpath through the fields adjoining the lane.

The water somewhat resembles that of Harrowgate, and contains rather more sulphureous gas than the other wells did in their original state. The effects on the body are nearly similar to those of the Lower Spa, and no greater quantity of water is required for a dose. It is particularly recommended in bilious disorders, stomach complaints, eruptive and cutaneous affections, and intestinal worms.

During the summer of 1804, a pump was fixed in the well, which works with great ease at the depth of forty feet; and it is now covered over by a temporary building, for the accommodation of the drinkers.

A new chalybeate spring, of a very superior power, has also been discovered on the estate of Colonel Riddell, in Cambray. The proprietor, with great attention to the convenience of visitors, has erected a pump, and allows them a free passage through his garden, with the use of the water gratis. Its efficacy as a tonic is undoubtedly great, particularly when combined with the colonel's old fine-flavoured East India Madeira, of which he is as liberal as he is of the water in his pump.

On the northern bank of the same river, at about 250 yards distant from High-street, is another carbonated chalybeate well, the property of Mr. Jones, which is covered with an elegant viranda, and yields abundance of water.

There are various other chalybeate springs in the neighbourhood of Cheltenham, mostly resembling in quality those already described; namely,

1. *Arle Spring*, about a mile distant;
2. *Barnwood Spring*, eight miles from Cheltenham, and one mile and a half from Gloucester;
3. *Cleeve Spring*, four miles from Cheltenham;
4. *Hyde Spring*, in the parish of Presbury, two miles and a half from Cheltenham;
5. *Naunton Spring*, nine miles from Cheltenham, and half a mile from Todington, on the Tewkesbury road;
6. *Walworth Spring*, about three miles north from the city of Gloucester; and,
7. *Walton Spring*, distant seven miles from Cheltenham, and one from Tewkesbury.

The chalybeate waters are used in chronic diseases, accompanied with debility, and unattended with feverish symptoms. Two species, which are at first partial ones, require them more than all others. In *debility of the digestive organs*, attended with the usual symptoms of loss of appetite, flatulencies, distention of the bowels, acidity, and vomiting; or in dyspeptic symptoms, accompanied with a diseased mind, called hypochondriasis; or in a debilitated state of the stomach and alimentary canal, from hard study or debauch, the steel waters will prove decidedly useful, especially if an aperient medicine, such as the waters of the saline well, or an aloetic pill, be interposed once or twice a week, to keep the body solutive, during the time of drinking them. In *debility of the uterine vessels*, producing obstructions, weaknesses, or sterility in females, the steel water proves extremely beneficial.

It is sometimes employed in preternatural evacuations of the uterus, to give strength to the extremities of the debilitated vessels. These waters are also useful in cases of *chlorosis*, especially if they be accompanied with stimulating remedies, and horse exercise.

In *nervous diseases*, from relaxation or delicacy of habit, such as hysterical disorders, palpitations, terrors, imaginary sensations, irregularity, and depression of spirits, or those of the paralytic kind, connected with the state of the brain, such as tremors and palsied limbs, these waters will prove efficacious in a great number of instances.

In *spasmodic diseases*, from preternatural irritability of the nervous system, such as convulsions, St. Vitus's dance, and epilepsy, a course of chalybeate water will often prove beneficial.

Hot Baths.

For a long time hot baths were a desideratum here; Freeman, Thornton, and Thomson have built some on an excellent principle, and which meet with the encouragement they deserve. Perhaps every person should use the tepid baths once or twice, before he begins a course of the waters.

The New Baths consist of six, two of them cold, and the others tepid or hot, with a cold shower-bath attached to each. These are plentifully supplied with common spring water, and are fitted with pipes, which communicate with the mineral wells in the fields above, for the purpose of making saline baths, when water can be spared from drinking. These baths are ready for use at any time of the day, from seven in the morning till seven at night, and in every season of the year. Four of them are built of stone, and are large enough to swim in, thereby preventing the confinement of the body, which is particularly detrimental to it when immersed in a cold fluid.

Three of the baths are without windows, as they are lighted and ventilated by an opening in the top of the building. Hence the bathers cannot be overlooked, and the internal atmosphere is preserved in so pure a state, that steam never appears, even on the surface of the hot baths, until the temperature of the water exceeds 96 degrees of Fahrenheit's scale; but as some persons object to warm bathing, where the external atmosphere is admitted, there are three smaller baths, which are covered over, and have windows at a considerable height.

The water is preserved in the baths at the uniform height of 4½ feet, which continually flows into them by pipes of cold water and steam, and out of them by a waste pipe, of 1½ inch diameter. They are besides completely emptied every two or three days, by which means the water is always preserved fresh and pure. They are heated early every morning, and one of them kept all day about 70°, a little warmer than Matlock water, and another between 94° and 97°, or the lowest degree of hot bath; but they receive additional heat after six o'clock, so as to constitute baths of the highest temperatures for the remainder of the evening. There are also smaller baths for those who wish to regulate the heat to any particular degree, or to increase it during the time of bathing.

The Spa, or Long Room.

The Spa, or pump-room, is open every morning for the accommodation of the water drinkers; and, by the permission of the liberal and obliging renters of the Wells, Messrs. Capstack and Mathews, artists are here allowed to exhibit specimens of their skill or manufacture; and the room is further enlivened by tables covered with different wares for sale.

While the company are parading up and down the well-walks, or pump-room, from eight to ten in the morning, a band of music, supported by subscription, plays to entertain them.

The number of names entered in what is called the well-book, has lately amounted to 5000, though, about twenty years ago, 500 would have been reckoned a full season. In the year 1780, the visitors were estimated at 374; in 1790, at 1100; in 1802, at 2000; in 1809, at 4000; and in 1813, at 5000, and still increasing.

GLOUCESTER SALINE CHALYBEATE SPA.

A spring has recently been discovered near Gloucester, which surpasses the waters both of Cheltenham and Leamington in the strength of its most essential impregnations. Since the well has been opened, many hundred individuals have daily experienced its virtues; and the proprietor, Sir James Jelf, has used every endeavour to furnish such accommodations as will enable strangers of all classes to employ it with the greatest possible advantage.

A very handsome pump-room has been erected; hot

and cold, and vapour-baths have been prepared; and, as the supply of water is abundant, invalids whose cases may require the use of bathing in any shape, will here find every convenience for the administration of this most important remedy.

The wells are in the centre of some very beautiful grounds, situated to the south-east of the town, adjoining the Bath and Bristol road. The surrounding scenery is remarkable for its richness and variety; and the walks and rides have been laid out with much taste and judgment.

On Monday the first of May, 1815, the new pump-room was opened, and every thing contributed to give this event a most interesting and animating character. The band of the South Gloucester Militia was stationed under the colonnade of the new building; the walks and room were crowded; and in the course of the morning several thousand persons drank of the spring; all of whom testified their delight at the beauty and gaiety of the spectacle, and the admirable accommodations which had been provided for the health and recreation of those who may frequent the place.

PRESCRIPTIONS.

Solvent Drops, in Gravel and Stone.

TAKE eight ounces of potash, and four ounces of the fresh calcined salt of tartar; mix, and put them into a glazed earthen vessel; then pour upon them a quart of boiling, soft spring-water; let the infusion remain twenty-four hours, stirring it now and then; and afterwards filter it for use: the dose is from thirty to sixty drops, taken in half a pint of veal broth, milk and water, or linseed tea, twice a-day, fasting, and abstaining from all acid.—*(In Stone and Gravel, and Bilious Obstructions).*

*** This is the secret by which the late Dr. Chittick acquired so much profit and reputation, and which is now sold by several empirics, under another name, at a very high price.

Madame Nouffler's Remedy for the Tape-worm.

Take male fern root in powder, two to three drachms, in a glass of peppermint water, fasting, in the morning. Two hours afterwards, take the following bolus:

Calomel, - - -	5 grains.
Gamboge, - -	8 to 10 grains.

Make a bolus, to be washed down with green tea.

*** If the stomach should reject the powder, the dose must be repeated as soon as the sickness goes off. When it has been upon the stomach about two hours, the strong cathartic bolus above mentioned should be given, and its operation assisted by frequent draughts of green tea, or, if necessary, by a solution of Epsom salts, in water. Until the worm comes away, which commonly happens on the same day, the patient is to take nothing but broth; if, however, the worm should not be discharged, either wholly or in part, the powder is to be repeated with the same regimen, the next day.

Cowhage Electuary.

Take cowhage half an ounce. Simple syrup, enough to make an electuary. A tea spoonful for a dose, every morning, for three times. BANCROFT.

(*In that species of worm resembling earth-worms*).

*** The above dose is for a child two or three years old. To adults a triple quantity may be prescribed. After the third time of taking the medicine, a dose of rhubarb is usually given. Some practitioners direct the medicine to be taken at bed-time, and worked off in the morning, with some mild purgative. It is said to be a perfectly safe remedy, and that two or three doses generally suffice.

Camphorated Enema, or Clyster.

Take Camphor,	- - -	1 drachm.
Olive oil,	- - -	2 ounces.

Make an injection, every third night, at bed-time, for three times repeated; then every other night, to the fourth time, if necessary.—FOWLER *(in maw-worms)* found this clyster a more efficacious remedy against the violent itching and other painful symptoms of the anus, occasioned by these worms, than any he had ever met with. He adds, that it generally gives some immediate ease; stays all night, without any inconvenience; comes away in the morning, sometimes with a natural stool, sometimes without; seldom brings away any live animals, but sometimes dead ones.

Acute Rheumatism.

Take The resin of guiacum,	- -	3 grains.
Cream of tartar,	- - -	1 drachm.

Mix and make a powder; to be taken at bed-time in a glass of wine-whey. MACKENZIE.

Or,

Take Resin of guiacum,	- -	½ drachm.
Nitre,	- - - -	1 scruple.

To be taken at bed-time in gruel.

LECTURES ON THE PHYSICAL EDUCATION OF CHILDREN DURING THE EARLY PART OF THEIR LIVES.

ADDRESSED TO MOTHERS, &c. BY A. F. WILLICH, M. D.

LECT. I.

An Historical Sketch of the Manners and Customs prevailing among different Nations; Hints and Remarks on their Physical Character, as well as occasional Observations on their Moral State: together with an Enquiry into the Truth of the supposed degeneracy of the present Age, when compared with the condition of our Ancestors.

AMONG the various pursuits in which the reasoning powers of the human mind are engaged, that of investigating the gradual evolution of the physical and intellectual faculties of man is unquestionably one of the most dignified, perhaps the most important.

Whether we consider man as a moral or as a physical agent, we shall find him, in every country, and in every climate, endowed with such qualities and talents, as elevate him, in a general sense, far above all the lower creatures: it is, however, a remarkable circumstance, that the developement of his mental and physical nature requires a much greater number of years, together with the more complicated aid of art, than is necessary for the formation of the most perfect and long-lived animals. There are, indeed, many among the inferior creatures, which individually excel man in the exercise of the senses, and which apparently attain to a greater age; but I venture to assert, that if our external faculties be appreciated as an aggregate of sentient powers, we not only surpass every animal hitherto discovered, but we possess the means of multiplying them by reciprocal improvements, in a degree which it is impossible to compute.

In these respects, we have every reason to contemplate with satisfaction the beneficent ordinations of Providence, which has placed man in so exalted and enviable a situation. But, when we take a more enlarged view of the condition of our infantile life, and compare our physical situation immediately, or soon after birth, with that of the lower animals, a more gloomy picture presents itself to the mind; for it cannot be denied, that an infant is in a more helpless and more wretched state than any other living creature. Hence I am induced to

think with Epictetus, who very properly advised parents, when embracing a beloved child, always to remember, "that it is a mortal being they idolize." The empire of desolation, indeed, extends chiefly to infancy, and old age; as it must be confessed that the aid of scientific knowledge is often equally insufficient in both; because many insuperable difficulties are, in those periods of life, opposed to the skill and judgment of the physician. For this reason, judicious parents ought not to consider infants from the hour of their birth, as permanent property; since we are convinced, by comparative and dire experience, that it is more probable we shall lose them before they arrive at the age of adolescence, than that we shall enjoy the satisfaction of sceing them adults.

Cruel advice indeed! I hear every feeling mother exclaim: she objects to insinuations which may embitter the sweet pleasure of a maternal heart; a pleasure that arises from the purest source. I am sensible I deliver a charge of a painful nature; while I also feel the deep wound thus inflicted on the heart of a parent; but reason and prudence, the principal attributes of civilized man, enjoin him to fortify his mind against calamities, which frequently can neither be prevented, nor remedied by the wisest efforts. We ought therefore to prepare ourselves, in the more happy hours, to meet such misfortunes with a degree of firmness and philosophic resignation, sufficient to guard the mind against consequences, perhaps ultimately more fatal than the events which produced them. I have known parents who, after the loss of a favourite child—if I may be allowed the expression—revolted against the decrees of Providence, and had the additional misfortune to be deprived of their understanding; nay, I appeal to the experience of those who have an extensive circle of friends, whether they have not often heard of parents, whose grief was so intense, and so unlimited in its duration, that in consequence of such a loss, they also paid the debt of Nature!

The victims of such extravagant indulgence, I apprehend, are more numerous than is commonly believed; but to obviate the charge to which I subject myself by these reflections, I beg leave to observe, that parental love and tenderness, when carried to excess, cease to be a virtue, and degenerate into a crime committed against ourselves and society; while those who have a just claim

upon our existence, must also participate in the unhappy issue.

Although I by no means wish to insinuate, that the feelings of parents ought, on such occasions, to be suppressed; or that the peculiar pleasure they experience in beholding their beloved offspring ought to be checked, I shall nevertheless recommend the excellent advice of Epictetus; because I am convinced, that it is unreasonable to indulge in violent sorrow, and to make no efforts to controul the emotions and passions of a susceptible breast, when their influence, on both mind and body, may be attended with dangerous effects. Convinced of the stability of this principle, and actuated by the purest motives, I shall only remark, that *parental* love contemplates the *object* alone; but *prudent* love also regards the concomitant *danger*.

Lacedemonian Law relative to Weakly Children—Spartan Maxims, &c.

On examining the records of history, we meet with many extraordinary facts, relative to the education of children;—facts which cannot now be reconciled with the uniform dictates of the human heart, nor are they sanctioned by the authority of reason. Such was the unnatural law enacted by the great legislator Lycurgus, as we are informed by Plutarch, the historian; according to this law, *no* weakly children were suffered to live in the Spartan Republic. Fathers were not permitted to educate their offspring conformably to their own plan; for, as soon as a child was born, the father was obliged to carry it to the *Lesha*, a public place, where the elders of the different tribes were assembled. If, on examination, they found the child of a perfect form, lively and vigorous, they issued orders for its proper maintenance, and assigned to it one of the nine thousand portions of public wealth, which from that moment became hereditary property. If, on the contrary, the child unfortunately happened to be deformed, crippled, or weakly, the elders caused it to be thrown into the *Apothetes*, a pit sunk near mount *Taygetus*. This barbarous custom was adopted from the following plausible motives: first, because they imagined they should render an essential service to the Republic, by destroying such children as were not likely to defend her against the enemy, or to pro-

mote internal prosperity; secondly, it was a prevailing maxim in Sparta, to remove objects of public pity and regret, or in other words, to shorten the life of a being, that in all probability could never be healthy, nor happy. With the same intention, all public midwives were obliged to bathe new-born infants in wine, in order to ascertain whether they were sufficiently vigorous to undergo this singular trial of their constitution. For the Spartans believed, that weakly children, or such as have a predisposition to epileptic and convulsive diseases, would not be able to withstand the powerful stimulus of wine, and would perish under its operation; while those whom Nature had provided with greater vigour, would thus be rendered more hardy and energetic.

Treatment of Deformed Children by the Savages of Guiana —The Women of Kamtschatka and their Twins—Custom of the Ostiak Kozaks.

However discordant the regulations that subsisted among the Spartans may appear, when analysed by modern principles of ethics and good policy, it is remarkable, that they were approved of by the great Aristotle, in his eighth book "on Politics." Nay, it is more surprising, that similar customs still prevail among many barbarous nations of the present day, and frequently without any apparent motive or pretext. Thus we are informed by Barrere, a French writer, that the savages of Guiana kill and bury their deformed children, because they do not conceive them entitled to live. According to Chardin, the Mingrelians practise the diabolical principle, that children who cannot be nurtured, and patients who cannot be cured, ought to be deprived of a life which is a burthen to themselves and others. If a woman of Kamtschatka be delivered of twins, one of them is without mercy smothered; because the natives are contented with one child: and the King of Otaheite is bound, from political reasons, to destroy all the children of his concubines. Such flagrant deviations from the human character deserve to be mentioned only for this reason, because they evince how, in different climates, and under different forms of government, man is apt to forsake the path assigned by nature, when his intellectual faculties remain uncultivated. And with this intention I shall venture to cite another curious custom still prevalent among the Ostiak Kozaks. If we may credit the account

of Mr. Weber, a respectable traveller who has visited that nation, the Ostiak women, when delivered on their peregrinations in the severest winter, instantly bury the new-born infant under snow, where they leave him till he begins to cry. Upon this signal he is removed to the bosom of his mother; as it is imagined, that the alternations of heat and cold have a beneficial tendency to strengthen the child. After the lapse of four or five weeks, a fire is made in the midst of the hut, which the mother crosses three times, and this concludes the rites of child-bed: having performed that ceremony, she again joins her husband, who is at perfect liberty to receive her, together with the child, or to abandon both, according to his pleasure. We trust, however, for the sake of humanity, that the latter resolution is rarely, if ever, adopted, even among savages.

Influence of the Soil and Climate on the Moral and Physical Condition of Mankind, &c.

It deserves to be previously remarked, that every attempt at improving the soil or surface of a country, is likewise attended with certain changes, affecting the susceptibility of man for those impressions which take place in consequence of his being more or less exposed to external agents. Thus we have, by an industrious culture of the soil, rendered our climate less severe, and, as it were, removed it farther from the frigid zone; we have, by mixing the productions of all climates, enriched our body, as well as our mind, with the peculiarities of southern nations; acquired their sensibility, lively imagination, and early understanding; but also, to a certain degree, their indolent and sensual habits. Nay, we venture to pronounce, that the insupportable degree of selfishness, so common in modern times, or that disgusting system of self-happiness, more or less originates from irregular and improper modes of living: hence that general propensity displayed by the plurality of the most sensible and ingenious, to appear more than what they really are, and to bestow on external objects that value which belongs to intrinsic merit—to virtue. True ambition is only so far laudable, as it requires no foreign aid.

We are, however, concerned to observe, that disinterested and independent actions begin to vanish from the page of history, as if they were destined for a more happy age. Serious employments have in a great measure been

superseded by frivolous pursuits; the incessant desire of frequenting numerous and gay assemblies, drowns every attempt, occasionally made, to indulge in solitary reflection, and to recover that tone of mind in which alone we can act consistently, and maintain with dignity the more or less important stations we hold in society. Whether such propensities ought to be checked, or cautiously regulated, in the rising generation, is a question not easily answered; for we much doubt whether it would be compatible with the present spirit of the times, to attempt an innovation which might render the votaries of pleasure liable to complaints arising from an irksome mode of life, and consequently make them dissatisfied with the world. The catalogue of suicides, indeed, alarmingly increases. We humbly conceive, *we* are not to be removed from this vortex; but a more natural and consistent education of our *progeny*, will restore them to that happy state of our ancestors, who, together with manly virtues and dignified pursuits, enjoyed an enviable state of health.

Nature, no doubt, intended man to become the inhabitant of the whole globe: hence his constitution could not, like that of the lower animals, remain uniform in every region of the earth; and hence we may discover its modifications according to climate, aliment, habit, and education. All these exert their influence on the instinctive desires of man; and it is on account of this variety of circumstances, when he appears under forms so diversified, that it is sometimes difficult to comprehend, whether such deviations can exist in one and the same human species. But provident Nature, in every climate, and in every situation, guides and directs him to the means of preserving his health, and rendering his life as comfortable and happy as is consistent with his moral and physical condition. The inhabitants on the banks of the river Senegal, are for several months in the year exposed to a heat which is sufficient to boil spirit of wine; while those of Hudson's and David's Bays are under the influence of a degree of cold, which sometimes congeals alcohol, and even mercury; and yet, parental Nature has enabled them both, not only to live, but even to enjoy a tolerable state of health, in the most opposite climates,

Hints and Remarks on the Physical Character; with occasional Observations on the Moral State of the Greenlander.

The Greenlander seldom attains the height of five feet; and the Esquimaux, his brother, who dwells farther to the north, is still shorter. But, as the vital power operates towards the exterior parts of the body, it has compensated in warm and solid muscular substance, what it could not bestow in aspiring height. His head, in proportion to his body, is large; his face broad and flat; for Nature produces beauty only, when acting with temperance, and in a mean betwixt extremes: she could not here round a soft oval; and still less allow the nose, that ornament of the face, to project. As the cheeks occupy the chief breadth of the visage, the mouth is small and round; the hair is stiff; for the fine penetrating juices necessary to form soft silky hair, are wanting; no mind beams from the eye. In like manner, the shoulders grow broad, the limbs large, the body corpulent and sanguine; the hands and feet alone remain small and slender. As is the external form, so are the irritability and the economy of the fluids within. The blood circulates more slowly, the heart beats more languidly: hence the desire of the sexes, which rises to such a height with the increasing warmth of other countries, is here less violent. It awakens not till late; the unmarried live chastely; and the women almost require compulsion, to take upon them the troubles of a married life. They have but few children; whence they compare the amorous and prolific Europeans to dogs. In their connubial state, as in their general way of life, a calm sobriety, and an habitual stillness of the passions, prevail. Insensible of those irritations which a warmer climate, and more volatile animal spirits produce, they live and die peaceable and patient; contented from indifference, and active only from necessity. The father educates his son to that apathy which he esteems the grand virtue and happiness of life; and the mother suckles her infant for a length of time, with all the profound tenacious affection of animal maternity. What Nature has denied them in irritability and elasticity of fibre, she has given them in permanent indefatigable strength; and has clothed them with that warming obesity, that abundance of blood, which render their very breath suffocating hot, in close habitations.

Of the Laplander.

The Laplanders inhabit a comparatively mild climate, and are a more gentle race of men. The size of the human figure increases; the flat rotundity of the visage diminishes; the cheeks are lengthened; the eyes are dark grey; the straight black hair becomes red, and the internal organization of the man expands with his external frame, as the bud that blows beneath the beams of a more genial sun. The mountain Laplander grazes his rein-deer, which neither the Esquimaux nor Greenlander can do; and obtains from them food and raiment, coverings for his house and his bed, conveniences, and even superfluities; while the Greenlander is reduced to seek almost every thing from the sea. Thus man acquires an animal for his friend and servant; he learns arts, and a more domestic mode of life. It inures his foot to the chace, and his arm to the guidance of the rein; it prepares his mind for the acquisition and enjoyment of permanent property; while at the same time it cherishes his love of liberty, and accustoms his ear to that timid watchfulness, which characterizes many nations in a similar condition. The Laplander listens as faithfully as his beast, and sets off at the slightest noise; he loves his way of life, and looks, like his rein-deer, to the summits of the mountains, to spy the returning sun: he talks to his beast, and is understood by him; he is careful of him as his wealth, or as a member of his family. Thus, with the first tameable animal that Nature could bestow on this region, she gave uncivilized man a guide to a more human mode of life.

Of the Samoiede.

The Samoiede has the round, broad, flat visage, the straight black hair, the low sanguineous body, of the northern form: his lips are more full, his nose broader and more prominent, but his beard is diminished. These features, however, we shall find progressively decreasing, along an immense tract of land to the eastward. Thus the Samoiedes are, as it were, the negroes of the north; and the great irritability of their nerves, the early puberty of the females, in the eleventh or twelfth year; nay, if the account be true, their black nipples, and some other circumstances, render them still more similar to the negroes, notwithstanding the coldness of their climate. Yet, in spite of their warm and delicate constitution,

which they probably inherit as a national character, and which, it is presumed, even the climate itself could not subdue, their form is on the whole that of the north.

Of the Tungooses.

The Tungooses, who dwell farther to the south, begin to have some resemblance to the Mongolian stem; from which, however, they are as different in race and language, as the Samoiedes and Ostiaks are from the Laplanders and Greenlanders. The bodies of the Tungooses are better shaped and more slender; their eyes small, like those of the Mongolians; their lips thin; their hair softer; yet their faces retain the flat northern form. It is the same with the Yakouts, and Yukagirians, who appear to acquire the Tartarian form, as the Tungooses acquire the Mongolian; nay, this observation applies to the Tartarian race itself.

Of the Tartars.

Near the Black and Caspian Seas, on Mounts Caucasus and Ural, consequently in the most temperate climate of the world, the Tartarian form is blended with more beauty. The body is slender and pliable; the head quits the heavy rotundity for a more elegant oval; the complexion is florid; the nose projects boldly, and is well shaped; the eye is lively; the hair dark brown; the step alert; the countenance pleasingly modest and timid. Thus, the nearer we come to the regions where Nature is most profuse of life, the more exquisite and better proportioned is the organization of man. The more we proceed to the north again, or the farther into Kalmuk Tartary, so much more flat and barbarous we find the features, either after the northern or Kalmuk model. In this, however, much is to be attributed to the way of life of a people, its descent, and intermixture with others, as well as the nature of the country. The mountain Tartars preserve their features with more purity than those that dwell in the plains: hordes that reside near towns and villages, intermix, and soften down both their features and manners.

As there are many probabilities that the first abode of the human species was on the Asiatic ridge of the earth, we might naturally expect to find the most beautiful race of men in that region. But how greatly should we be deceived in our expectation? The form of the Kalmuks and Mongolians is well known. With a middling stature,

they have some remains of the flat visage, the thin beard, and the brown complexion, of the northern climate; but they are distinguishable by the inner angle of the eye being acute, fleshy, and inclined obliquely to the nose; by narrow, black, slightly-arched eye-brows; a small flat nose, very broad at the upper part; large prominent ears; the legs and thighs bowed; and strong white teeth, which, together with the rest of the features, appear to characterize a beast of prey among men. Whence proceeds this form? Their bow legs originate from their way of life. From their childhood they creep along upon their legs, or cling to the back of a horse. Their lives are spent between sitting and riding; and to the only position that gives the human foot its straight fine form, that of walking, they are almost entire strangers. And may not more of their figure be traced to their way of life?—Have not the prominent brutal ear that is ever listening; the small acute eye that perceives the least dust or smoke at the greatest distance; the white, projecting, bone-gnawing tooth, the thick neck, and the backward reclining position of the head, become substantial features, and characteristics of their mode of living? If we add to this, what Pallas asserts, that their children, even to the age of ten, frequently have deformed and bloated faces, and are of a cachochymic or sickly aspect, till, as they grow up, they become better shaped; if we consider that rain seldom falls on extensive tracts of their country, that they have little water, or at least none that is pure, so that from their infancy they scarcely know what it is to bathe; if we reflect on the salt lakes and marshes, the saline nature of the soil they inhabit, the alkaline savour of which they relish in their food, as well as in the deluges of tea with which they daily enfeeble their digestive faculty; if, farther, we consider the elevation of that country, the thin air, dry winds, alkaline effluvia, and long winters spent in the smoke of their huts, and with snow continually before their eyes; is it not probable, that their figure originated from these causes some thousands of years ago, when many of them perhaps operated still more forcibly, and thus insensibly became their hereditary nature? Nothing invigorates our bodies more, and contributes in a greater degree to their growth and firmness, than washing and bathing in water; particularly if to these be joined walking, running, wrestling, and other bodily exercises. Nothing has a greater tendency

to debilitate them, than drinking warm liquors; and these they swallow in immoderate quantities, seasoned with corrugating alkaline salts. Hence, as Pallas justly observes, the feeble and effeminate figures of the Mongolians and Burats, five or six of whom, with their utmost exertions, cannot do what can be executed by a single Russian; hence the extreme lightness of their bodies, with which, on their little horses, they seem to fly, or skim along the surface of the ground; hence, lastly, the diseased habit transmitted to their children. Even some of the neighbouring Tartar races are born with features of the Mongolian form, which disappear as they grow up; and this renders it more probable, that some of the causes dependent on the climate, are more or less ingrafted into the frame of the people, and rendered hereditary, by their descent and mode of life. When Russians or Tartars intermarry with the Mongolians, they produce handsome children, of delicate and well proportioned shapes, but resembling the Mongolian standard. Here also, in their organization, Nature remains true to herself; a race of Nomades, beneath this sky, on this ridge of the globe, and with such modes of living, must be like so many human vultures.

Of the Cashmirians.

Embosomed in Alpine heights, like a hidden paradise, lies the kingdom of Cashmire. Its fertile and pleasant hills are surrounded by mountains ascending still higher, till the summits of the last, covered with eternal snow, are lost in the clouds. Here flow pellucid streams and rivulets; the earth is adorned with salubrious herbs and fruits; gardens and islands are clad in refreshing green; flocks and herbs are spread over one universal pasture; while no savage animal or venomous reptile annoys this Eden. These may, as Bernier says, be properly named the mountains of innocence, which flow with milk and honey; and the race of men that inhabits them, is not unworthy of the place. The Cashmirians are allowed to be the most witty and ingenious people of India, equally capable of excelling in poetry and science, in arts and manufactures; the men are finely formed, and the women often models of beauty.

Of the Hindoos.

How happy might Hindostan have been, had not the hands of men combined to ravage this garden of Nature,

and to depress the most innocent of human beings, by superstition and tyranny!

The Hindoos are the most gentle race of mankind. They intentionally injure nothing that breathes; they respect every thing that has life, and subsist on the most innocent food, such as milk, rice, and the nutritious plants and fruits that their country affords. In shape, says a modern traveller, they are straight, slender, and elegant; their limbs are well proportioned; their fingers long, and endued with great accuracy of feeling; their countenances are open and benign: the features of the females display the most delicate lineaments; those of the males, manly tenderness. Their whole deportment is in the highest degree graceful and attractive. The legs and thighs, which in all the north-eastern countries are mis-shapen or shortened like those of apes, are here lengthened, and bear the stamp of germinating human beauty. Even the Mongolian form, when intermingled with this race, is lost in noble benignity. The original disposition of their mind is consonant to the frame of their body. So indeed is their manner of life, when considered free from the yoke of slavery and superstition. Temperance and quiet, gentle feelings, and peaceful meditation, are conspicuous in their labours and enjoyments, in their morals and mythology, in their arts, and even in their patience under the severest tyranny. Innocent lambs! why could not Nature feed you careless and undisturbed on your native plains!

Of the Greeks.

Lastly, the perfect human form found a site on the coast of the Mediterranean, where it was capable of uniting with the intellect, and displaying all the charms of terrestrial and celestial graces to the mind, as well as to the eye: this was *triple Greece*, in Asia and the Islands, in Greece proper, and on the shores extending to the west. Gentle zephyrs fanned the tree, gradually transplanted from the heights of Asia, and breathed life into every part. Time and circumstances assisted in refining its juices, and crowning it with that perfection which still excites universal admiration in the models of Grecian art and wisdom. Here were conceived and executed, figures which no admirer of Circassian beauty, no Indian or Cashmirian artist could have invented. The human form ascended Olympus, and clothed itself in divine beauty.—*(To be continued).*

Secrets of Trade.—No. VII.

KEYSER'S PILL'S. *(Antivenereal).*

THESE consist of the acetate of quicksilver tincturated with manna, &c. in the following form:

Take Acetate of quicksilver, - - 4 ounces.
Manna, - - - 30 ounces.
Starch, - - - 2 ounces.
Mucilage of gum tragacanth, a sufficient quantity. Make into pills of six grains each: dose two, night and morning, increasing the dose to twenty-five or more: a box of 1000 or 1200 pills is usually sufficient for the cure of a common case of syphilis.

LARDNER'S PREPARED CHARCOAL.

Chalk coloured grey with charcoal: used as a tooth-powder.

*** Charcoal varies in its qualities, according to the wood from which it is prepared: that of the soft woods, as the willow, aller, &c. well burned, is best for crayons, for making gunpowder, and for clarifying liquids; that of the harder woods is used for fuel; or for a support for substances exposed to the flame of a blow-pipe: the charcoal of the chesnut is employed by the smiths in the south of Europe, on account of its slow consumption when not urged by the blast of the bellows; and of the fire deadening immediately upon the blast being stopped. The charcoal of the holly, if the bark be left on, is believed to render iron brittle, when worked by a fire made of it. Charcoal powder is used as a poultice to correct fetid ulcers, as well as a tooth-powder; that of the areca nut is the most fashionable dentifrice, but is no otherwise preferable to any other soft charcoal.

LIQUOR OPII SEDATIVUS. (See *Black Drop*, p. 70).

MADDEN'S VEGETABLE ESSENCE.

This is little else than a simple infusion of roses.

MARSDEN'S ANTISCORBUTIC DROPS.

A solution of corrosive sublimate in a infusion of gentian.

MAGNESIAN CHELTENHAM SALTS. (See *Cheltenham Salts*, p. 72).

MARSEILLE VINEGAR. (See, *under Aromatic Vinegar*, p. 68, *Vinaigre de Quatre Voleurs).*

MARSHALL'S CERATE.

Take Palm oil,	5	ounces.
Calomel,	1	ounce.
Superacetate of lead,	½	ounce.
Nitrate of mercury,	2	ounces.

To be well mixed.

MATTHEWS' PILLS. *(Starkey's Pills).*

1. Take the roots of black hellebore,
——— white hellebore,
Liquorice root,
Opium,
} of each, 2 ounces.
Starkey's soap, 6 ounces.
Oil of turpentine, a sufficient quantity.

2. Take the roots of black hellebore,
Liquorice root, in powder,
Castille soap,
Turmeric powder,
Purified opium,
Syrup of saffron,
} of each, 4 ounces.
Oil of turpentine, a sufficient quantity to make the whole into a mass for pills.

MOCK ARRACK.

The author (of *Apicius Redivivus*) directs, for the purpose of making a mock arrack, that two scruples of Benzoic acid be added to every quart of rum. By a receipt of this description the celebrated Vauxhall punch is made, in the proportion of twenty grains of Benzoin to two pints of rum.

BATAVIA ARRACK. *(Goa Arrack),*

Is obtained from the juice of the palm tree.

CHINA ARRACK,

Is obtained from rough rice, or from millet.

NORRIS'S DROPS.

A solution of tartarised antimony in rectified spirit, and disguised by the addition of vegetable colouring matter. It has been creditably stated, that the original recipe contained opium; but that which was examined by Dr. Paris, yielded no indication of its presence.

NOUFFLEUR'S, MADAME, VERMIFUGE FOR TAPEWORM.

(See *Prescriptions*, p. 362).

STEER'S OPODELDOC.

Take Castille soap,	1	ounce.
Rectified spirit,	8	ounces.
Camphor,	3½	ounces.
Oil of rosemary,	½	drachm.
Oil of marjoram,	1	drachm.
Solution of ammonia,	6	drachms.

OXYLEY'S CONCENTRATED ESSENCE OF JAMAICA GINGER.

A mere solution of ginger in rectified spirit.—A tinc-

ture is made, in the proportion of one ounce of ginger and a pint of proof spirit.

PASTILLES, FUMIGATING, (*See* p. 112).

PATE ARSENICALE.

This favourite remedy of the French surgeons, consists of seventy parts of cinnabar, twenty-two of dragon's blood, and eight of arsenious acid, made into paste with saliva, at the time of applying it: a dangerous composition.

*** This combination, observes a periodical writer, is similar, with exception of the ashes of the soles of old shoes, to that recommended by Father Cosmo under the name of "Pulvis anto-carcinomatosa."

The Toilette.—No. III.

ROSE PEARLS. *(Rose Beads).*

BEAT the petals of the red rose in an iron mortar, for some hours, until they form a black paste, which is to be rolled into beads and dried. They are very hard, susceptible of a fine polish, and retain all the fragrance of the flower.

SWEET BALLS.

Florentine orrice, one ounce and a half; cinnamon, half an ounce; aromatic cloves, wood of rhodium, flowers of lavender, of each two drachms; ambergrise, musk, of each four grains; mucilage of gum tragacanth, made with rose water, *q. s.* Some cover the ball with spirit varnish, but this keeps in the scent: worn in the pocket as a perfume.

TOOTH-POWDERS.

Orrice root, four ounces; cuttle-fish bones, two ounces; cream of tartar, one ounce; oil of cloves, sixteen drops—take sixteen drops.

Another.—Catechu, one ounce; yellow Peruvian bark, cream of tartar, cassia, bole armeniac, of each four drachms; dragon's blood and myrrh, of each two drachms.

Another.—Rose pink, twenty ounces; bole armeniac, cuttle-fish bones and cream of tartar, of each eight ounces; myrrh, four ounces; orrice root, two ounces; essence of bergamot, half a drachm.

Another.—Cuttle-fish bones, four ounces; cream of tarter and orrice root, of each two ounces; burnt alum and rose pink, of each one ounce.

Another.—Magnesia, orrice root, rose pink, prepared chalk, of each two ounces; prepared natron, six drachms; oil of rhodium, two drops.

LARDNER'S PREPARED CHARCOAL.

Chalk coloured grey with charcoal: used as a tooth-powder. (See *Secrets of Trade*, p. 376).

Housekeeping and Husbandry.—No. VII.

Housekeeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

ROASTING POULTRY, GAME, &c.

A FOWL and a turkey, require the same management at the fire, only the latter will take longer time. Many a Christmas dinner has been spoiled, by the turkey having been hung up in a cold larder, becoming thoroughly frozen; *Jack Frost* has ruined the reputation of many a turkey-roaster. Let them be carefully picked, &c., and break the breast-bone (to make them look plump), twist up a sheet of clean writing paper, light it, and thoroughly singe the turkey all over, turning it about over the flame.

Turkeys, fowls, and capons, have a much better appearance, if, instead of trussing them with the legs close together, and the feet cut off, the legs are extended on each side of the bird, and the toes only cut off, with a skewer through each foot, to keep them at a proper distance. Be careful, when you draw it, to preserve the liver, and not to break the gall-bag, as no washing will take off the bitter taste it gives, where it once touches. Prepare a nice clear brisk fire for it.

When you first put a turkey down to roast, dredge it with flour, then put about an ounce of butter into a basting ladle, and as it melts, baste the bird therewith. Keep it at a distance from the fire for the first half hour, that it may warm gradually, then put it nearer, and when it is plumped up, and the steam draws in towards the fire,

it is nearly enough, then dredge it lightly with flour, and put a bit of butter into your basting ladle, and as it melts, baste the turkey with it; this will raise a finer froth than can be produced by using the fat out of the pan. A very large turkey, will require about three hours to roast it thoroughly; a middling sized one, of eight or ten pounds (which is far nicer eating than the very large one), about two hours; a small one may be done in an hour and a half. Turkey poults are of various sizes, and will take about an hour and a half—they should be trussed with their legs twisted under, like a duck, and the head under the wing like a pheasant.

Fried pork sausages are a very savory and favourite accompaniment to either roasted or boiled poultry. A turkey thus garnished, is called "*an Alderman in Chains.*" Sausage-meat is sometimes used as stuffing, instead of the ordinary forcemeat, &c.

If you wish a turkey, especially a very large one, to be tender, never dress it till at least four or five days (in cold weather, eight or ten), after it has been killed. "No man who understands good living, will say, on such a day I will eat that turkey—but will hang it up by four of the large tail-feathers, and when, on paying his morning visit to the larder, he finds it lying upon a cloth, prepared to receive it when it falls, that day let it be cooked."

Send up with them, oyster, egg, bread, and plenty of gravy sauce.

CAPONS OR FOWLS,

Must be killed a couple of days in moderate, and more in cold weather, before they are dressed, or they will eat tough: a good criterion of the ripeness of poultry for the spit, is the ease with which you can then pull out the feathers—and when a fowl is plucked, leave a few to help you to ascertain this. They are managed exactly in the same manner, and sent up with the same sauces as a turkey, only they require proportionably less time at the fire.

Fowls which are fattened artificially, are by some epicures preferred to those called barn-door fowls; whom we have heard say, that they should as soon think of ordering a barn-door for dinner, as a barn-door fowl.

The age of poultry, makes all the difference: nothing is tenderer than a young chicken, few things are tougher

than an old cock or hen, which is only fit to make broth. The meridian of the perfection of poultry, is just before they have come to their full growth—before they have begun to harden.

GOOSE.

When a goose is well picked, singed, and cleaned, make the stuffing with about two ounces of onions*, and half as much green sage, chop them very fine, adding four ounces, *i. e.* about a large breakfast cupful of stale bread crumbs, and a very little pepper, and salt, (to this some cooks add half the liver, parboiling it first), the yolk of an egg or two, and incorporating the whole well together, stuff the goose; do not quite fill it, but leave a little room for the stuffing to swell. Spit it, tie it on the spit at both ends, to prevent its swinging round, and to keep the stuffing from coming out. From an hour and an half to two hours will roast a fine full-grown goose. Send up gravy, and apple-sauce with it.

GREEN GOOSE.

Geese are called *green,* till they are about four months old. The only difference between roasting these, and a full-grown goose, consists in seasoning it with pepper and salt instead of sage and onion, and roasting it for forty or fifty minutes only.

This is one of the least desirable of those insipid premature productions, which are esteemed dainties.

DUCK.

Mind your duck is well cleaned, and wiped out with a clean cloth: for the stuffing, take an ounce of onion, and half an ounce of green sage, chop them very fine, and mix them with two ounces, *i. e.* about a breakfast cupful of bread crumbs, a very little black pepper and salt, (some obtuse palates will require warming with a little Cayenne, and the yolk of an egg to bind it; mix these thoroughly together, and put into the duck. From half to three quarters of an hour, will be enough to roast it, according to the size: contrive to have the feet delicately crisp, as some people are very fond of them: to do this nicely, you must have a sharp fire. For sauce, green

---

* If you think the flavour of raw onions too strong, cut them in slices, and lay them in cold water for a couple of hours, or add as much apple or potatoe as you have of onion.

pease, *bonne bouche*, gravy sauce, and sage and onion sauce.

RECIPE FOR SAUCE TO WILD FOWLS.

Port wine, or Claret, - - - -	1 glass.
Sauce à la Russe, (the older the better) - -	1 tablespoonful.
Catsup, - - - - -	1 ditto.
Lemon juice, - - - -	1 ditto.
Lemon peel, - - - -	1 slice.
Shalot, (a large) - - - -	1 sliced.
Cayenne pepper, (the darkest) not that like brick-dust,	4 grains.
Mace, - - - - -	1 or two blades.

Cook's Oracle.

To be scalded, strained, and added to the mere gravy which comes from the bird in roasting. To complete this, the fowl should be cut up in a silver dish which has a lamp under it, while the sauce is simmering with it.

HAUNCH OF VENISON.

To preserve the fat, make a paste of flour and water, as much as will cover the haunch, wipe it with a dry cloth in every part, rub a large sheet of paper all over with butter, and cover the venison with it, then roll out the paste about three quarters of an inch thick; lay this all over the fat side, and cover it well with three or four sheets of strong white paper, and tie it securely on with packthread; have a strong close fire, and baste your venison as soon as you lay it down to roast (to prevent the paper and string from burning): it must be well basted all the time.

Neck and Shoulder of Venison—Are to be managed in the same way as the haunch: only they do not require the coat or paste, and will not require so much time. The best way to spit a neck, is to put three skewers through, and put the spit between the skewers and the bones.

HARE.

The first points of consideration are, How old is the hare? and how long has it been killed? When young, it is easy of digestion, and very nourishing; when old, the contrary in every respect. To ascertain the age, examine the first joint of the fore foot; you will find a small knob, if it is a leveret, which disappears as it grows older; then examine the ears; if they tear easily, it will eat tender; if they are tough, so will be the hare, which we advise you to make into soup, or stew; or jug it. When newly killed, the body is stiff; as it grows stale, it becomes limp.

RABBIT.

If your fire is clear and sharp, thirty minutes will roast a young, and forty a full-grown rabbit. When you lay it down, baste it with butter, and dredge it lightly and carefully with flour, that you may have it frothy, and of a fine light brown. While the rabbit is roasting, boil its liver with some parsley; when tender, chop them together, and put half the mixture into some melted butter, reserving the other half for garnish, divided into little hillocks. Cut off the head, and lay half on each side of the dish.

A large, well-grown, (but young) warren-rabbit, kept some time after it has been killed, and roasted with a stuffing in its belly, eats very like a hare, to the nature of which it approaches; it is nice nourishing food when young, but hard and unwholesome when old.

PHEASANT,

Requires a smart fire, but not a fierce one. Thirty minutes will roast a young bird; and forty or fifty a full grown pheasant. Pick and draw it, cut a slit in the back of the neck, and take out the craw, but don't cut the head off; wipe the inside of the bird with a clean cloth, twist the legs close to the body, leave the feet on, but cut the toes off don't turn the head under the wing, but truss it like a fowl; it is much easier to carve: baste it, butter and froth it, and prepare sauce for it.

BROWNING.

Take white sugar, in powder, two pounds; fresh butter, eight ounces; fry gently until of a fine dark brown; add by degrees, a gallon of port wine; then put Jamaica and black pepper, each four ounces; shallots, six ounces, mace, one ounce; katsup, three pounds; salt, a sufficient quantity; peel of eight lemons; boil gently, when cold, skim and bottle the clear:—used to colour and flavour animal food.

THE LAW OF WAGERS, AS LAID DOWN IN THE COURT OF KING'S BENCH.

In the case of Jacobs *versus* Abrahams, Lord Ellenborough said, that it was always held a point in law, that a person making a bet, might, by a countermand, at any time previous to the wager being determined, put an end to it.

CONDIMENTS, &c.

VINEGARS*.

1. From wine left exposed to the air, in pairs of casks, one full, the other only half full, but filled up daily from the other in turn: those wines which contain the most mucilage are fittest for the purpose.

2. *Common White Wine Vinegar*—From ale, treated in the same way.

3. *Common Vinegar*—From weak malt liquor, brewed for the purpose: its various strength in England is denoted by the numbers from 18 to 24.

4. *Sugar Vinegar*—To each gallon of water, add two pounds of brown sugar, and a little yeast; leave it exposed to the sun for six months, in a vessel slightly stopped.

5. *Gooseberry Vinegar* — To each quart of bruised gooseberries add three quarts of water, and to each gallon of liquor, one pound of coarse sugar, or more; expose to the sun until sufficiently sour.

6. *Raisin Vinegar*—After making raisin wine, lay the pressed raisin in a heap to heat; then to each hundred weight put fifteen gallons of water, and a little yeast.

ACID LIQUORS, &c.

The strength of distilled acetous acids is examined by Taylor's Revenue Aerometer, which consists in saturating a sample of the acid with slaked lime, and then ascertaining the specific gravity of the solution.

The best malt vinegar (No. 24) contains about five per cent. real acetous acid, and is taken as the standard or proof acid, two hundred grains of which will saturate twenty-nine grains of well-crystallized subcarbonate of soda. The best common distilled vinegar is about half this strength.

---

* Vinegar is used principally as a sauce, and to preserve vegetable substances; but it is employed externally in medicine as a refrigerant and repeller: useful also internally, when an over-dose of strong wine, spirit, opium, or other narcotic poison has been taken. A false strength is given to vinegar, by adding oil of vitriol, or some acrid vegetable, as pellitory of Spain, grana cnidia, capsicum. It is rendered colourless by adding fresh-burned bone-black, six ounces to a gallon, and letting it stand two or three days to clear.

DISTILLED VINEGAR

is obtained from vinegar by distillation, rejecting the fourth or eighth part that comes over first, and avoiding its acquiring a burnt flavour. By the Dublin Pharmacopœia, it is required to have the specific gravity of 1.006.

2. Vinegar and water, equal parts; distil the original quantity.

Distilled vinegar is weaker than the common, but is used sometimes in pickles, where its want of colour is an advantage.

VINEGAR OF WOOD. *(Pyroligneous Acid).*

Improved Distilled Vinegar)—From wood, distilled in large iron cylinders, for the manufacture of charcoal for gunpowder. When rectified, it is used for all the purposes of distilled vinegar. The best pyroligneous acid may be procured of any degree of concentrations, from six degrees, or 2.898 per cent. of acid, up to 130 degrees, or 63.09 of acid, or even higher.

WINE TESTS.

1. Quick-lime, one ounce; orpiment, half an ounce; distilled water, half a pint: dissolve and filter.

2. Take oyster-shells and sulphur, of each one ounce; keep them red hot for a quarter of an hour; when cold, add an equal part of cream of tartar, and a pint of water; boil for an hour, and decant into one ounce phials, and add twenty drops of the spirit of salt, to each. A few drops of this liquor, added to any kind of wine, precipitates any metal besides iron, that may be contained in it, which it is prevented from doing by the addition of the spirit of salt.

3. Saturate water with sulphuret of hydrogen acid; acidulate it with muriatic acid.

4. Add a little muriatic acid to the wine, and then pass sulphurated hydrogen through.

ESSENCE OF ANCHOVIES.

Take anchovies, from two to four pounds and a half, pulp through a fine hair-sieve, boil the bones with seven ounces of salt, in six pints of water: strain—add seven ounces of flour, and the pulp of the fish: boil—pass the whole through the sieve, and colour with venetian red to your fancy. This should produce one gallon.

2. Use pilchard sprats, which are richer than herring sprats.

3. Use herring liquor, from the white or pickled herring.

QUIN'S SAUCE.

1. Take soy, eight pounds; walnut katsup, and mushroom katsup, of each, two gallons; anchovies, eight pounds; Cayenne pepper, eight ounces; garlic, one pound.

2. Distilled vinegar, one gallon; soy, one pound; allspice, eight ounces.

SOY.

Seeds of dolichos soja (peas or kidney beans may be used for them), one gallon; boil till soft, and add one gallon of bruised wheat; keep in a warm place for twenty-four hours; then add common salt, one gallon; water, two gallons; put the whole into a stone jar; bung it up for two or three months, shaking it very often, and press out the liquor: the residuum may be treated afresh with water and salt, for soy of an inferior quality.

LEMON PICKLE.

1. Take lemon juice and vinegar, of each three gallons; ginger, one pound; allspice, pepper, grated lemon peel, of each eight ounces; common salt, three pounds and a half; cloves and bird pepper, of each two ounces; mace and nutmegs, of each one ounce.

2. Take lemons cut, six; salt, one pound; garlic, six cloves, horse-radish scraped, and mustard flour, of each two ounces; cloves, mace, nutmegs, Cayenne pepper, of each two drachms; vinegar, four pints.

TOMATOE SAUCE.

Take love-apples, a sufficient quantity, stew them in a little water, and pulp them through a sieve; then add common salt, ginger, Cayenne pepper and vinegar: boil, strain, and bottle.

TO PREVENT FLIES FROM SETTLING ON PICTURES, PICTURE-FRAMES, AND OTHER FURNITURE.

Soak a large bundle of leeks for five or six days in a pail of water, and then wash the pictures, &c. with it.

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

(Continued from p. 342).

SWELLING *of the head and face,* takes place in small-pox, according to the number and confluency of the pustules. It also accompanies and succeeds erysipelas, or St. Anthony's fire in the face.

——— *of the hands and feet,* in small-pox, succeeds to the swelling of the head and face. *About the angles of the jaw,* with slight fever, characterizes the mumps.

——— *of the head,* in young children, who are heavy, drowsy, and even at times convulsed, gives reason to fear dropsy of the brain, or hydrocephalus.

——— *of the fore-part of the head,* large belly, the rest of the body thin, and the joints enlarged, are symptoms of the rickets.

——— *of the upper part of the right side of the belly,* gives reason to apprehend enlargement of the liver.

——— *of the belly,* elastic and sonorous on being struck with the fingers, distinguishes the tympany, or drum belly. The stroke of the fingers producing a sensible fluctuation, distinguishes the ascites, or collection of water in the cavity of the belly.

——— *at the bottom of the belly,* with suppression of urine, or frequent inclination to void it, with pain, tenderness on pressure, characterizes inflammation of the bladder.

——— *of the scrotum,* painful and hard, shews inflammation of the part. Not painful, rather pellucid, and communicating a sense of fluctuation on being gently struck with the finger, distinguishes hydrocele, or dropsy of the testicle. The swelling gradually increasing downward, and enlarging upon sneezing or coughing, shews hernia, or protrusion of some part of the bowels.

——— *of the feet and hands,* in small-pox, generally takes place as the swelling of the face subsides.

——— *of the feet,* where a considerable discharge of blood has taken place, shews that a dangerous degree of debility is brought on. It is also a general symptom demanding particular attention.

——— *of any part,* with heat, redness, tenderness, and throbbing, shews an abscess to be forming in that

part. Cold, pallid, and retaining the impression of the fingers, distinguishes odematous swellings.

SWELLING *in the breast,* solid, the edges rather hard, and not very painful, is most probably *schirrous tumour,* which, unless removed, will terminate in cancer.

——— *of the glands in the sides of the neck,* with swelling and chapping of the lips, and large belly, manifest a scrofulous tendency.

Horticulture.

SEPTEMBER.

THE KITCHEN-GARDEN.—In this month finish sowing and planting several principal crops; some for succession the present autumn and following winter, and others to stand the winter in young growth, to come in for early crops next spring and summer, as directed for each under its respective head.

Ground now becoming vacant—must be prepared in proper time, by dunging and digging, for succeeding crops.

The several crops to sow and plant—should mostly be done the beginning and middle of the month, consisting chiefly of the following:

The principal sowing crops—are spinach, lettuce, onions, radishes, turnips, turnip-radish, cabbages, coleworts, corn-salad, chervill, coriander, and borage; and successions of small salading, as cresses, mustard, &c.

Planting crops—are celery, endive, coleworts, cabbages, savoys, broccoli, borecole, lettuce, leeks, strawberries, and the several sorts of perennial aromatic and pot-herbs, where any are wanted.

——— *Likewise to plant in hot-beds*—asparagus, mushrooms, and cucumbers, for winter.

Artichokes—according as the heads are gathered, should have the remaining part of the stems broke down, to encourage shoots from the bottom more effectually before winter.

Cauliflowers—hoe and draw earth to the stems of the Michaelmas, autumn, and winter crop.

——— *The young cauliflowers plants*—of the August-sowing for the next year's early and main crops, should be pricked out (m. l.), or when the first two or three

leaves are about an inch, or inch and half broad, pricking them into nursery beds of rich light earth, three inches asunder; shade and water them till they take root.

Cabbage plants—of the July sowing, plant out plenty (b. m.) for young winter cabbages, and cabbage coleworts; hoe and earth the stems of advancing crops.

——— *The August-sowed young cabbage plants*—for next summer's early and first main crops, prick in nursery-beds three or four inches asunder, giving water; may also sow a finishing small crop, (b).

———*Red cabbage*—early planted will now be in tolerable full cabbaged head (m. l.) to cut for use as occasionally wanted.

Lettuces—raised last month, should now be thinned, and plant some largest (b. m.) for late autumn crops, and for winter; and some on warm borders (m. l.) for winter and early spring, &c.

FRUIT-GARDEN AND ORCHARD.—In this month most sorts of wall and espalier fruit will be ripe and ripening, also many sorts on standards; and as the principal summer pruning and training in wall and espalier trees, was finished in the preceding months, that operation will now be inconsiderable, only to displace any autumnal aftershoots, or to reform casual irregularities, and to extend to the wall the elongated shoots of the former training.

Give still proper attention to wall-trees and espaliers in general, it being a particular merit to continue them always well trained, appearing regular and agreeable to sight, and greatly beneficial to the trees and fruit.

The regulations in wall and espalier trees—now required, are principally to complete all that is necessary in the operation of summer pruning and training (b. m.)

FLOWER-GARDEN AND PLEASURE-GROUND.—As in this month and next, various kinds of plants, shrubs, &c. may be planted, for furnishing the different compartments where necessary, preparations for that occasion may now be commenced at proper opportunities, and the several articles planted, as hereafter explained.

Continue in good order—all parts of those grounds, by trimming disorderly growths; hoeing and raking borders and other compartments; clipping edgings, and hedges, mowing, sweeping, and rolling grass, and gravel.

Digging—may be forwarded in vacant beds and borders for bulbous roots, and other perennial and biennial flowering plants, to be planted this and next month.

Planting—may be performed in bulbous roots, various sorts of fibrous-rooted perennial and biennials, by slips, off-sets, &c. and may be commenced in many shrub and tree kinds, particularly of the evergreen tribe; also deciduous sorts, (m. l.) when the leaves begin to decay.

Gravel walks—should still be continued clear from weeds and litter, and often rolled.

Grass lawns, plats, &c.—still keep in very neat order, by proper rolling, mowing, and sweeping.

————For new grass work, or to repair old, may now cut and lay turf successfully; or in want of a sufficiency of turf, may occasionally sow grass seed (b. m.), previously in either method forming a surface of light dry soil, firm and smooth.

Work in the Nursery.—In this month it is proper to commence the preparation of ground for autumnal planting of various nursery trees and shrubs; which in some sorts, evergreens particularly, may be proceeded in towards the middle or latter end of the present month; but in others, more generally in October and November. Also may begin the autumn planting of cuttings, and making layers: likewise perform any necessary pruning, and complete all requisite pruning in evergreens in particular: and at this time take particular care to exterminate weeds, both by hoeing between rows, and hand-weeding in close growth.

The Green-House.—The green-house plants continue still mostly in the open air, till towards (m. or l.), when, or before, if cold or very wet weather, the tenderest kinds may be housed, especially succulent plants, oranges, lemons, &c., but if a warm season, they may remain till (l.) this, or (b. m.) next month.

Hot-House and Stove.—In the hot-house and pinery, continue still a proper bark-bed heat; give air and water, and finish shifting into larger pots.

Trim and regulate—any hot-house plants in which disorderly growths occur in the branchy shooting kinds, pruning and trimming the straggling and runaway shoots; and in general cut out all dead parts, and clear off decayed leaves.

Fresh earth—the tops of any pots where it appears necessary; or in others where the earth is hard crusted, loosen the surface a little.

BOTANICAL DESCRIPTION OF THE HERB VERVAIN, &c.

(See *Plate*).

THE common vervain abounds in waste places, and by way-sides, chalky, gravelly, and stony uncultivated places: the root consists of a number of thick, short, tough fibres, connected to a small oblong head; the stalks are firm, erect, remarkably tough, of a brownish green colour, sometimes reddish towards their base. The leaves stand in pairs; they are oblong, and elegantly divided, being deeply indented, the indentations rounded off, and the end of the leaf obtuse. The flowers stand in long slender spikes at the tops of the stalks and branches; they are small and white, with a blue or purplish tinge; and appear in the month of June.

Its former Reputation and Virtues.

Few plants have enjoyed greater reputation than this, nor have so completely lost it, among the moderns; although it is neither deserving of the repute in which it was once held, nor its present neglect. No small part of its high character arose out of its pretended virtues in the cure of certain diseases. In former times it seems to have been held sacred, and was employed in celebrating the sacrificial rites; and with a view to this, more than the natural power of the plant, it was worn suspended about the neck as an amulet. This practice, thus founded in superstition, was, however, in process of time adopted in medicine; and therefore, to obtain its virtues more effectually, the vervain was directed to be bruised before it was hung round the neck; and of its good effects, thus used for inveterate head-aches, Forestus relates a remarkable instance. In still later times it has been employed in the way of cataplasm, by which we are told the most severe and obstinate head-aches have been cured, and for which we have no less authorities than Etmuller, Hartman, and more especially De Haen, all eminent physicians in their day. Notwithstanding all these testimonies in favour of vervain, it has fallen into disuse in Britain; nor has Mr. Morley's pamphlet*,

* "An Essay on the Nature and Cure of Scrofulous Disorders, commonly called the King's Evil; deduced from long Observation and Practice, with Additions, and above Sixty Cases; the Remedies in them used, and occasional Remarks, &c. By the late JOHN MORLEY, Esq. of Halsted, in Essex. The *Forty-Second Edition*."—Published by Sherwood and Co.

written expressly to recommend its use in scrofulous affections, had the effect of restoring its medical character. This gentleman recommends the root of the vervain to be tied with a yard of white satin ribbon round the neck. He also directs infusions and ointments made from the leaves of the plant, and occasionally calls in aid the most active medicines of the Materia. It seems, however, to have been much more frequently employed externally, in the form of a poultice made from the bruised leaves and stalks. It has been highly recommended by many as an excellent deobstruent, in obstructions of the liver and bowels. It acts also as a diuretic, and promotes perspiration; and in this capacity it has been found serviceable in inveterate coughs, and other affections of the breast. For these purposes it is best employed in decoction, in which form it is also commended as a gargle in sore throats.

Mr. Morley's Directions for Buying and Using the Vervain, &c.

"One constant method I use to every patient, without distinction, let their complaints be what they will, if, upon examination, I have reason to suspect them to be scrofulous, is to recommend to them a piece of fresh common purple vervain, about three or four inches long, and about the size of the patient's little finger, if men or women; to young children and infants, as large as their thumb; and so in proportion, but not less; because it shrinks much, and contains but little virtue. Many patients have been grossly imposed upon by the sellers of these roots, who quote my name to deceive the ignorant buyer; and I must repeat it, that if a vervain root is not of the bigness I recommend, people are greatly deceived, and have little or no benefit at all from it. Let the buyer take heed. All the fibres are to be cut off smooth, and as little of the rind as possible, to be worn always at the pit of the stomach, tied with a yard of white satin ribbon, half an inch wide, round the neck of men and women of an ordinary stature: if taller, an ell will be wanting; and children in proportion. To the better sort of females, I propose the ribbon to be fastened through an eye-let hole or loop in the bottom of the shift, and so worn, which will be no eye-sore. A quarter of a yard of ribbon will be enough; but no other coloured ribbon is proper, because the dye in some colours may be pre-

judicial. The root must never be wetted, nor when fresh gathered, but wiped clean with a dry cloth. It must not be sewn up, or covered with any thing, but always worn naked at the pit of the stomach. If, after wearing, the ends of the fibres stick out, and hurt and prick the stomach, they must be cut off with a sharp knife as at first. I always cut a little notch round the upper end of the root, and tie the ribbon with a double fast knot, lest it slip out and be lost. When it has been worn a few days, it will shrink, by the heat of the stomach; then the ribbon must be tied faster. Observe the root be not decayed or rotten, but fresh and green when applied; and it is necessary to have a fresh one every spring and fall. If I put this root about the patient's neck, I am not ashamed to say, 'Pray God give his blessing to these my endeavours' (*Ecclesiasticus*, chap. xxxviii. v. 14), or some such short ejaculation; not by way of charm, or such like nonsense, but to remind the patient of our dependence on the Divine help co-operating with the natural means he has provided for our comfort and relief. The experience I have had of the good effects of the vervain root is enough for me: nevertheless, I will just mention, that the great Boyle, in his Essays, has treated of the strange subtility of effluvia: how specific medicines are reconcileable to the corpuscular philosophy, and how advantageous simple medicines are."

Touching for the King's Evil.

The following proclamation, issued in the reign of Charles I. (April 22, 1634) may, perhaps, afford some gratification to the curious:

By the King.—A Proclamation, appointing the time when His Majestie's subjects may approach to the Court, for cure of the disease called the King's Euill.

Whereas, by the Grace and blessing of Almighty God, the Kings and Queenes of this Realme, by many ages past, have had the happinesse, by their sacred touch, to cure those who are afflicted with the disease called the King's Euill; and his now most excellent Majesty, in no less measure than any of his Royall Progenitors, hath had blessed successe therein; and, in his most gracious and pious disposition, is as ready and willing as any King or Queene of this realme ever was in any thing, to relieve the distresses and necessities of his good subjects; yet in his princely wisdome, foreseeing that in this (as in all things), order is to be observed, and fit times are necessary to be appointed for performing this great worke of charity; and taking into his Royall consideration the great inconveniences which may happen, both in respect of the temper of the season, and in respect of contagion, which may happen in this neere accesse to his Majestie's sacred person, when the season of the year is growne warme; Doth hereby publish and declare his Royal pleasure to be, and also will and command, that from the time of publishing this proclamation, no

person or persons whatsoever do attempt or presume to repair to his Majesty's Royal Court, to be healed of that disease, before the Feast of All Souls now next coming; And to the end that all his loving subjects may the better take notice of this his Majestie's pleasure and command, his pleasure is, that this proclamation be published and affixed in some fit and open place in every market-town of this realme.

After the Restoration, great multitudes flocked to receive the Royal Touch, inasmuch that six or seven persons were crushed to death, pressing at the chirurgeon's door for tickets.—*Evelyn's Journal.*

In 1682 the King touched 8577; and Browne remarks, that notwithstanding the number had been so great as to amount to a considerable portion of the whole nation, yet, upon any new declaration of healing, they were again as fast as if none had applied before, "A thing as monstrous strange!" Notwithstanding this, it began to decline. Oliver Cromwell tried in vain to exercise the royal prerogative; and, in 1684, Thomas Rousewell was tried for high-treason, because he spoke with contempt of King Charles's pretensions to the cure of scrofula.

Charles Bernard, who had made this touching the subject of raillery all his life-time, till he became sergeant-surgeon, when it turned out so good a perquisite, that he solved all difficulties, by saying, with a sneer, "Really one could not have thought it, if one had not seen it."

Origin of Touching for the King's Evil, &c.

Stowe, in his "Annals," accounts for the origin of touching for the king's evil, in the following manner: "A young woman was afflicted with this disorder in a very alarming manner, and to a most disgusting degree, feeling the uneasiness and pain consequent upon it in her sleep, dreamt that she should be cured by the simple operation of having the part washed with the king's hand. Application was consequently made to Edward, by her friends, who very humanely consented to perform the unpleasant request. A basin of water was brought, with which he carefully softened the tumours, till they broke, and the contents discharged; the sign of the cross wound up the charm; and the female retired, with the assurance of his protection during the remainder of the cure, which was effected within a week."

The Golden Touch.

The Hon. Daines Barrington, in his "Observations on our Antient Statutes," page 107, relates the circumstance

of an old man, a witness in a cause, who averred, that when Queen Anne was at Oxford, she touched him, whilst a child, for the evil." Mr. Barrington, when he had finished his evidence, asked him, "Whether he was really cured?" Upon which he answered, with a significant smile, "that he believed himself never to have had a complaint that deserved to be considered as the evil, but that his parents were poor, *and had no objection to the bit of* GOLD."

This accounts for the great resort of patients, and the supposed miraculous cures on this occasion. This new-exploded royal gift is thus described by Shakspeare:

> "——— Strangely-visited people,
> All swollen and ulcerous, pitiful to the eye,
> The mere despair of surgery he cures;
> Hanging a golden stamp about their neck,
> Put on with holy prayers."—*Macbeth.*

LECTURES ON THE PHYSICAL EDUCATION OF CHILDREN DURING THE EARLY PART OF THEIR LIVES.

ADDRESSED TO MOTHERS, &c. BY A. F. WILLICH, M. D.

LECT. I.—*(Continued from* p. 375).

Habits of Early Life, and Physical Character of various Nations considered, relative to Cause and Effect, &c.

THE Negro spends his life, void of care, in a country which yields him food with unbounded liberality. He moves his slender body in the water as if it had been formed for that element; he runs and climbs, as if each were his sport; and, not less strong and healthy than light and active, his peculiar constitution supports him against all the accidents and diseases of his climate, under which so many Europeans sink. What to him are the tormenting sensations of superior joys, for which he was not formed? The materials were not wanting; but Nature took him in hand, and formed of him what was most fit for his country, and the happiness of his life.—Either no Africa should have been created, or it was requisite that Negroes should be made to inhabit that country.

The wandering Californian is placed as it were on the border of the habitable world, in a country which geographers, with great injustice, have called fertile. He lives in the most wretched indigence; has in general

neither roof nor clothing; sleeps almost every night in a different place, and often with the greatest difficulty escapes starvation. The women of that inhospitable climate require no artificial aid from the hands of midwives; and the only cradle of their children is the shell of the turtle. Nevertheless, this apparently unhappy race of people continually sport, sing, and smile; have a vigorous constitution, and attain a considerable age. Diseases were unknown to them, even by name, till, in the year 1763, the small-pox, and other disorders, were introduced among them; previous to that period, the natives had no other phrase to express the word disease, than by saying, "He lies on the ground." The Californian endures pain with almost incredible fortitude, and awaits his dissolution with such resignation and indifference, as would not disgrace a philosopher.

The Savage, as he is called, prefers the active free life of Nature to every other consideration; surrounded with perils, his powers, his courage, his resolution, are awakened, and he is rewarded with health in the field, with independence in his hut, with respect and honour among his tribe. He neither wants, nor desires more: and what addition to his happiness could he derive from another state, with the advantages of which he is unacquainted, and to the inconveniences of which he could not submit? Let us read the various unadorned speeches of those whom we call Savages, and say, whether sound sense and natural justice be not conspicuous in them. The frame of man, too, in this state, is as much improved, though with a rude hand, and but little advantage, as it is capable of being improved in it: he is formed for a contented equanimity, and to welcome death with calmness, after the enjoyment of a life of permanent health.

The Bedouin and Abiponian are both happy in their respective condition; but the former shudders at the thought of inhabiting a town, as the latter does at the idea of being interred in a church when he dies; according to their peculiar feelings, it would be the same as if they were buried alive.

In Canada, Virginia, the Brazils, and other American provinces, children are generally laid naked on raw cotton, in hammocks or cradles covered with fur.—In the province of Peru, they are frequently placed in shallow pits dug in the earth, so as to allow them room sufficient to move their arms freely above ground, where a few

clothes are fastened around the child, that it may receive no injury.

Treatment of Infants in some parts of North America.

In some parts of North America, infants are generally laid on couches filled with the dust of worm-eaten timber: this simple contrivance answers the useful purpose of keeping them dry and cleanly, as the powdered wood absorbs all moisture. When they are able to move, the solicitous mother incites them to meet her, by presenting the food appointed by Nature. Thus it is almost inconceivable that little Savages, at the tender age of a few months, especially in Africa, should possess such strength and agility as to embrace the waist of the mother with their arms and legs, without the least fear; and imbibe the maternal gift while she is engaged in fatiguing pursuits. In that country, it is truly astonishing to see infants two months old creeping about, and others somewhat older walking upon their hands and knees almost as speedily as adults.—On the contrary, in our quarter of the globe, it is not uncommon to see boys several years old nursed either by the breasts of an ill-advised mother, or with spoon-meat on the lap of an effeminating nurse. Such was the habit of the proud philosopher Plotinus, who, at eight years of age, when returning from school, visited his favourite nurse, and greedily partook of his wonted repast. These absurdities, however, I am happy to observe, do not often appear in a country where mothers are equally esteemed for their good sense and native modesty.

Upon this occasion, I cannot suppress an idea which has repeatedly occurred to me, when reflecting on the remarkable difference of physical endowments, between man in a state of nature, and man in civilized life. Whence does it happen that the former possesses such decisive advantages over the latter? It appears to me, that in the primitive modes of living, the human species was more susceptible of that beneficent instinct which directs the animal either to avoid or to inure himself to the noxious influence of external causes, while it enables him to follow, with more scrupulous accuracy, the simple dictates of Nature. The refined European, on the contrary, is always solicitous to *improve* upon her, whose laws are as *immutable* as the seasons. He, indeed, often succeeds in sheltering himself against powers assailing

him from without; but, as his physical condition is thus gradually impaired, he must experience the consequent unfavourable effects on the united faculties of mind and body. To whatever quarter of the primitive world he carries his improvements, peace, health, and happiness, seem to vanish. Gloomy prospects! but such they unfortunately are; and we have a conclusive instance of this melancholy truth in the now wretched Brazilians, who were formerly celebrated for their longevity, simplicity of manners, and domestic felicity. Since their conquest by the western usurpers, who introduced among them the education, the manners, and artificial habits of Europe, the happy contentment and longevity of the Brazilians were soon changed into a life of woe and disease; all their domestic comforts and happiness disappeared.—I wish I could persuade myself that this shocking change were not founded on fact; as it involves the fate of millions of human beings, who are now reduced to misery and abject servility. But, alas! we may learn from such an example, however mournful, that most of our pretended improvements in civilized life, are only of *negative* value. I pronounce this sentence with a mixture of pain and regret; because it may, on the one hand, be considered invidious, and on the other, perhaps, extravagant. Yet, convinced of the truth of my assertion, I shall, in the sequel, draw several useful inferences from its indirect application to the present state of society. And unless we resolve to abandon a few of our modern habits and prejudices, which are sanctioned by no other authority than that of time immemorial, I apprehend that, instead of advancing on the path of *true* improvement, the convulsed state of morals will gradually lead us to retrograde and baneful steps.

Observations on the supposed Degeneracy of the present Age, when compared with the former.

Many persons, as well among the learned as the illiterate classes, have asserted that mankind every day become more reduced in size, and bodily strength. When we draw a parallel between the ancient patriarchs and the progenitors of the present race, the difference with respect to their energy, figure, and duration, or longevity, is indeed remarkable. For, even admitting that the historical and traditionary accounts we have obtained from sacred and profane writers, especially those relative to chrono-

logy, are a little exaggerated by translators and commentators; that the descriptions given us of the divinities and heroes of the Greeks and Romans do not exactly correspond to their originals; and that the ancient Germans, whom Tacitus represents as men of a colossal stature, were no more than other hardy sons of Nature, viewed at a distance, when arrayed in their semi-barbarian dress, and national armour;—yet it appears from their coats of mail, their helmets, swords, and other implements of war, that they have certainly been more muscular, vigorous, and considerably taller than their descendants in the 18th century.

I have purposely chosen the Germans for this comparison, as western Europe, and even Britain, have in some measure been peopled by that nation. But it will be asked, 1st, how arose this relative debility and decrease of bodily energy in a whole people?—2d, how may it in future be most effectually remedied?—and, 3d, have we upon the whole gained or lost by this apparent degeneracy? These questions I shall endeavour briefly to answer.

The progressive culture of the human mind has unfortunately been accompanied with more than a proportionate increase of luxury, or, in other words, with an almost general effeminacy, especially in the higher walks of life. This change of manners, habits, laws, and customs, has farther been productive of effects, upon which I cannot in this place expatiate, as they chiefly relate to the animal economy of man. But without descending to particular reflections, I appeal to the judgment of every observer, whether the prevailing system of dissipation among the fashionable class of men, is not one of the most powerful means of dissolving the moral ties of society?—and whether the calm indifference shewn to those libertines, in the higher circles, is not an indirect approbation of their conduct? Hence the increasing number of those who find it more convenient to live in a state of celibacy; hence also the very *early*, or very *late* marriages—two of the most opposite and pernicious extremes in society. The Romans enacted severe laws against those who did not enter at a certain age into the marriage state: the Greenlanders, on the contrary, blame the more enlightened Europeans, and bestow upon them very opprobrious epithets, because they marry at too early an age, and are blessed with a great number of children. Whether the

principles of the corrupt Romans, or those of the placid Greenlanders, with respect to the conjugal state, are more rational and consistent with the welfare of nations, it is not very difficult to determine: and this consideration will, at the same time, lead us to the reply of the second and third problems.

In the temperate climates of Europe, there can be no doubt that early marriages, together with the prevailing habits of intemperance and luxury, have principally contributed to produce that diminutive size of the human species, which we now witness in the numerous instances of women, and effeminate men.

In order to prevent, or check, this growing evil, it has been imagined, that a *more hardy* education of infants, would restore those degenerating nations to their primitive mental and bodily vigour. There is much truth mingled with error in this hypothetical assumption. Were I called upon to deliver an explicit opinion on the subject, I should be induced to declare, that a proper method of educating youth is indeed a *necessary*, but by no means the *only* requisite to the attainment of the perfect growth, and progressive developement of children. The radical and principal evil must be traced to an earlier period of their existence—to their parents.

After reflecting on the remote, though probable causes of this degeneracy, it cannot be denied, that it chiefly arises from those early and unqualified marriages, against which the legislators of Greece had provided by positive laws. According to these, no young man or woman was permitted to approach the altar of Hymen until they had attained a certain age. In this public manner, the state deemed it necessary to decree, by supreme authority, what had often been, and still is, neglected by those who are the natural guardians of families and their progeny.

As, however, the ill consequences thence arising in modern times, have not yet been of such magnitude as to demand the attention of the legislative power, it is incumbent on every rational inquirer, to point out the evil, and thus to pave the way towards its removal. In every department of national prosperity, this freedom of inquiry has ever been considered as an imprescriptible privilege of authors, and public teachers.

Education of Children ought to be adapted to their Individual Temperament, &c.

Much, indeed, may also be accomplished by a proper method of educating children, if this method be adapted to their individual temperament, bodily constitution, and other concommitant circumstances. But I shall find ample opportunities of shewing in my subsequent Lectures, that in general we have not uniformly followed the path of Nature; that we endeavour, as it were, to raise plants which are not destined to live in a hot-house; and that we must necessarily return to that simple and consistent plan of Nature from which, in many instances, we have greatly deviated.

A few words, then, will be sufficient to recapitulate, what we have actually gained, or lost, by our modern refinements in general. The lower orders of the people, especially in large towns, appear to have acquired immoral habits and relaxed principles, instead of their ancient simplicity of manners, and unshaken integrity; the middle ranks of society are perhaps the greatest gainers, as they are better informed, and have attained more skill in such pursuits as depend upon the combined agency of mental and physical talent; lastly, the higher ranks have become unquestionably more enlightened, with respect to their *true* interest; but I cannot repress the observation, that they have also become subject to hereditary diseases unknown to their ancestors; and that the acquisition of mental powers and abilities appears to be in no just proportion to the obvious decrease of physical energy. In short, our attainments in ethics are more extensive, perhaps more systematic; but I hope to be forgiven, when I assert, that the present age appears to labour under a certain mental and corporeal imbecility, scarcely definable by words, but which is evident in that fickle conduct, in that peculiar want of resolution and mental vigour, which marks the actions of the most cultivated minds, and of which we rarely find instances among our less enlightened, but more consistent and determined forefathers.

Reflections on Human Life, &c.

These, or similar ideas, probably suggested the following reflections to the pathetic Mr. Herder, whose work has already been mentioned:—"The whole career of

human life is a series of changes; its different periods are histories of transformation, and the whole species is a perpetual metamorphosis. Flowers droop and wither, while others sprout and bud; and the vast tree of human nature at once, bears all the seasons on its head.

"A man of eighty is supposed to have renovated his whole body at least four and twenty times, if the insensible perspiration be taken as the basis of this computation: who then can trace the variations of matter, and its forms, through all the race of mankind upon earth, amid all the causes of change? There is not one point on our complicated globe, not one wave in the current of time, which resembles another.

"The history of man is ultimately the theatre of vicissitudes, which He alone can review who animates all these figures. He builds and destroys, improves and modifies forms, while He changes the world around him. The wanderer upon earth, the transient ephemeron, can only admire the wonders of this great Agent, in a narrow circle: He enjoys the form that belongs to him in the general choir, adores, and disappears. '*I too was in Arcadia,*' should therefore be the epitaph of all living beings, in the ever-changing, ever-renovating creation."

PRESCRIPTIONS.

Nitrous Fumigation for Sick Rooms, &c.

Take Nitre, - - - - 4 drachms.
Oil of vitriol, - - - 2 drachms.
In a saucer placed upon hot sand.

Disinfecting Fumigation.

Take Common salt, - - - 3 ounces.
Black manganese, - - } of each, 1 ounce.
Oil of vitriol, - - - }
Water, - - - - - - 2 ounces.
In a cup, carried through the apartments of the sick; or the apartments intended to be fumigated, where sickness has been, may be shut up for an hour or two, and then opened.

Fit Drops.

1. Take Sal ammoniac, - - - 1 pound.
Prepared kali, - - - 1½ pound.
Assafœtida, - - - 4 ounces.
Proof spirit, - - - - - 6 pints.
Distil 5 pints.

2. Take Spirit of ammonia, - - } of each, ½ ounce.
Tincture of assafœtida, - }

Ward's Essence for the Head-Ache.

1. Take Aromatic spirit of ammonia, - 12 ounces.
   Simple spirit of lavender, - - 10 ounces.
   Camphor, - - - - 2 ounces.
   Dissolve.
2. Take Rectified spirit, - - - 4 ounces.
   Spirit of ammonia, - } of each, 2 ounces.
   Camphor, - - - }
   Mix.
3. Take Rectified spirit, - - - 2 pints.
   Water of ammonia, - } of each, 4 ounces.
   Camphor, - - - }
   Essence of lemon, - - - ½ ounce.
   Roche alum, - - - 2 ounces.

Mix and decant.—Stimulant: used externally in local pains, as head-ache or colic.

Edinburgh Paregoric Elixir.

Take Flowers of benzoin, - } of each, 3 drachms.
Saffron, - - - - }
Opium, - - - - 2 drachms.
Oil of aniseed, - - - ½ drachm.
Ammoniated alcohol, - - - 16 ounces.

Digest.—Anodyne and diaphoretic; in dose from ½ drachm to 1 drachm; is four times stronger than the London paregoric—one drachm containing a grain of opium.

House Cordial.

Take Traumatic balsam *(tincture of benzoin)*, 1 pint.
Compound spirit of ammonia, } of each, 8 ounces.
Spirits of sweet nitre, - }

Put up in Bateman's phials, and seal.

Spirit of Wormwood.

1. Take Dried leaves of wormwood, lesser cardamoms, and coriander seed, } ½ pound.
   Proof spirit, - - - 4 gallons.
   Distil 4 gallons.
2. Take Wormwood, - - - 2 pounds.
   Coriander seed, - } of each, 1 pound.
   Calamus aromaticus *(sweet flag)*, }
   Rectified spirit of wine, - - -
   Distil 4 gallons: stomachic.

EMPASSIONED DEPRESSIONS.

In these diseases the predominant passion is accompanied with diminished excitement, anxiety, and love of solitude; the eye is fixed and pensive; the countenance pale and furrowed. The mental emotions productive of these effects, are at least as numerous as those which

harass the frame by increased excitement. The following may serve as examples:

Ungovernable Love.
——————— Avarice.
——————— Anxiety.
——————— Heart-ache.
——————— Despondency.

As increased sensorial excitement produces various symptoms in common, whatever be the governing nature of the passion, there are also various symptoms common to decreased sensorial excitement under each of these depressing passions: as a greater or less degree of torpor in every irritable part, especially in the circulating and absorbent systems; whence paleness of the countenance, coldness of the extremities, a contraction and shrinking of the skin, and general surface of the body: a retardation and smallness of the pulse, want of appetite, deficiency of muscular force, and a sense of languor which overspreads the whole frame.—

Longing, or Ungovernable Love, &c.

Oh! how the spring of love resembleth
Th' uncertain glory of an April day,
Which now shews all the beauty of the sun,
And by and bye a cloud takes all away.

The ardent desire which is distinguished by the name of *longing*, is directed towards objects of various kinds that are absent, and equally relate to places and persons. It is a painful and exhausting emotion, as compounded of hope, love, and fear, and peculiarly agitates the *præcordia;* and hence the striking and beautiful apothegm of the wise man:

"Hope deferred maketh the heart sick."

It is felt by children at a distance from home, and who are eager to return to the embraces of their parents; by foreigners who have a strong and unextinguished love for their country, and are anxious to return to the scenes and the companions of former times; and by the youthful pair who have vowed an eternal attachment, and are sure that they cannot live without each other, but whose union is opposed by bars that are felt to be insurmountable. And hence the present variety includes the three modifications of home-sickness, country-sickness, and love-sickness. The first is for the most part transitory; the second

(the *heimwehr* of the Germans) has sometimes, and especially among the Swiss, when their manners were simpler, and their domestic virtues and feelings much stronger than they seem to have been of late years, produced not only a permanent melancholy, but a hectic fever. It is to the third modification that our attention on the present occasion is chiefly called, from the greater frequency of its occurrence, and the severer and more tragic effects to which it has led, where obstacles have arisen in its progress. On the present occasion, we have nothing to do with the gross passion of concupiscence, which is as different from that of pure and genuine love, as light from darkness. The man of lust has, indeed his love, but it is a love that centres in himself, and seeks alone his own gratification; while the passion we are now speaking of, puts self completely out of the field, and would voluntarily submit to every pain, and sacrifice, even life itself, in promoting the happiness of the beloved object. Yet, constituted as we are by nature for the wisest and best of purposes, a pure corporeal orgasm still interweaves itself with the sentimental desire, though subordinate to it in virtuous minds, and the flame is fed from a double source; and, according to Lord Bacon (*Essay*, No. x.) "Nuptial love maketh mankind; friendly love perfecteth it; but wanton love corrupteth and embaseth it."

The Cause of Love.

What it is that first lights up this flame, is of no importance to the present subject. A peculiar cast of form or of features, acknowledged by all to be moulded according to the finest laws of symmetry, and productive of a high degree of external grace or beauty; or a figure or a manner that to the eye of the enamoured beholder gives to them of a mind adorned with all he can wish for; or an actual knowledge, from long acquaintance, of the existence of such internal cultivation and excellence, may be equally causes of the same common effect. And hence this is of little or no account; for the passion being once excited, the judgment runs a risk of being overpowered by its warmth and violence; and the moment it is overpowered, the new train of ideas that are let loose upon the mind are of a romantic character; and as soon as every obstacle starts up as a barrier in the vista of hope, instead of being damped or repressed, they grow wilder and more vivid, till at length the sensorial system

is worn out by the vehemence of its labour; and though the excitement is really less than at first, because there is less vascular vigour for its support, it is still greater than ever, compared with the weakened state of the sentient organ.

Yet love, sickness itself, whatever mischief it may work in the corporeal frame, by sleepless nights, a feverish pulse, and loss of appetite; and however, from the exalted state of the imagination, and the increased sensibility of the body, it may transpose the reality of life into a kind of visionary existence, and so far produce mental derangement, rarely leads to direct insanity, so long as there is the remotest hope of the attainment of its object. But if hope be suddenly cut off by an inexorable refusal, the intervention of a more fortunate rival, the concealment of the object of adoration, or any other cause whatever, the mind is sometimes incapable of resisting the shock thus produced by the concurrent yet opposite powers of desire and despair; and in a moment when the judgment is completely overwhelmed, the love-sick maniac calls to his aid the demoniacal passion of revenge, and, almost at hazard, determines upon a plan of murder, directed against his rival, his mistress, or himself.

Ungovernable Avarice.

The operation of the passion of *avarice,* when it has once obtained an ascendancy over the mind, is altogether of a different nature from that of the preceding variety, though it often produces a wider and more chronic alienation. It has not a stirring property of any kind belonging to it; but benumbs and chills every energy of the body as well as of the soul, like the stream of Lethe; even the imagination is rendered cold and stagnant; and the only passions with which it forms a confederacy, are the miserable train of gloomy fear, suspicion, and anxiety. The body grows thin in the midst of wealth, the limbs totter, though surrounded by cordials, and the man voluntarily starves himself in the granary of plenty; not from a want of appetite, but from a dread of giving way to it. The individual who is in such a state of mind, must be estranged upon this point, how much soever he may be at home upon others. Yet these are cases that are daily occurring, and have been in all ages; though perhaps one of the most curious is that related by Valerius Maximus, of a miser who took advantage of a famine, to

sell a mouse for two hundred pence, and then famished himself, with the money in his pocket. And hence the madness of the covetous man has been a subject of sarcasm and ridicule by moralists and dramatic writers in every period, of which we have sufficient examples in the writings of Aristophanes, Lucian, and Moliere.

Ungovernable Anxiety.

There is another mental feeling of a very afflictive, and too often, like the last, of a chronic kind, which is frequently found to usurp a dominion over the judgment, and to embitter life with false and visionary ideas; and that is a habit of *anxiety*, or *preying care*, which not only drives the individual who possesses it mad, but runs the risk of doing so to all who are about him, and are harassed with his complaints and discontents. This is sometimes the effect of a long succession of misfortunes or vexatious troubles; but it seems in some persons to depend on a very high degree of nervous sensibility, united with a choleric or melancholic temperament. Their age, wealth, or situation in life, is of no importance; and though their digestive powers are good, and they are not hypochondriacs, they are always apprehensive and full of alarm, and flee from every appearance of joy as they would from an apparition, or even sooner. In the language of Burton, who knew so well how to describe them, "the old are full of aches in their bones, croups, and convulsions; dull of hearing, weak-sighted, hoary, wrinkled, harsh, so much so, that they cannot know themselves in a glass; a burthen to themselves and others. If they be sound, they fear diseases; if sick, weary of their lives. One complains of want; a second of servitude; another of a secret incurable disease, of some deformity of body, of some loss, danger, death of friends, shipwreck, persecution, imprisonment, disgrace, repulse, contumely, calumny, abuse, injury, contempt, ingratitude, unkindness, scoffs, scouts, unfortunate marriage, single life, too many children, no children, false servants, unhappy children, barrenness, banishment, oppression, frustrate hopes, ill success. In the mean time," continues the younger Democritus, "thus much I may say of them, that they generally attenuate our bodies, dry them, wither them, shrivel them up like old apples, and make them as so many anatomies."

Ungovernable Heart-Ache, contrasted with querulous Anxiety.

Nothing can be more different than this constitutional pining, and the pains produced by heart-ache, or the reality of severe grief. The former is talkative and querulous; the latter is dumb, and flies from company. The sensorial exhaustion is so considerable, that the mind, with its attention upon the full stretch, has scarcely strength enough to collect the train of ideas on which alone it resolves to dwell; and hence all conversation is irksome, the presence of a friend disquieting, and the deepest solitude is anxiously sought for; and not unfrequently the discharge of nervous power is so considerable and sudden, as to produce a general torpor of the brain, which, if it do not happily terminate in quiet sleep, is the inlet of apoplexy. Even in the former case, the irritability of the nervous fibres continues to such an excess, that the sufferer has no natural evacuation for perhaps several days, feels no hunger, cannot be persuaded to take food, is incapable of sighing, and sheds no tears: and hence the appearance of tears and sighs are good omens, and are correctly regarded as such; since they shew that the general torpitude is giving way in the organs that associate with this painful emotion of the mind, to a slight return of irritability. As soon as the flow of the sensorial principle is a little increased, the præcordia struggles with great anxiety, and the heart is over-loaded, and feels ready to break or burst, whence the name of heart-ache, so appropriately applied to this variety of suffering. Sometimes, also, hysteric flatulency oppresses the respiration, and convulsions, and, not unfrequently, death itself ensues. But if recovery should take place, it is usually long before the judgment reassumes its proper sway in the mind, and the temporary derangement altogether ceases. At times, indeed, this never returns, and the pitiable sufferer only lives through the shock to endure the severer evil of confirmed insanity; of which Shakspeare has given us an admirable copy in the character of King Lear, finely imagined to be a result of filial ingratitude.

Ungovernable Despondency—Despair, how distinguished from the preceding.

Despair makes a near approach to heart-ache in the overwhelming agony it produces, and its pressing desire

of gloom and solitude; but, generally speaking, the feeling is more selfish, and the mind more hurried; and daring despair, as it commonly shews itself, is utter hopelessness, from mortified pride, blasted expectations, or a sense of personal ruin; heart-ache is either hopelessness from a sense of social bereavement, or relative ruin. The gamester, who cares for no one but himself, may rage with all the horror of despair; but the heart-ache belongs chiefly to the man of a warmer and more generous bosom, stung to the quick by a wound he least expected, or borne down, not by the loss of fortune, but of a dear friend or relative, in whom he had concentrated all his hopes. The well-known picture of Beverley is drawn by the hand of a master; and he is represented as maddened by the thought of the deep distress into which his last hazard had plunged his wife and family; but if his selfish love of gaming had not triumphed over his relative love for those he had thus ruined, he would not have been involved in any such reverse. While Beverley was in despair, it was his wife that was broken-hearted.

Causes of Ungovernable Despondency, &c.

The sources of this most agonizing emotion are innumerable; and from the total shipwreck of all hope on which it is founded, there is no passion of the mind that drives a man so readily to an act of suicide. To live in horror—the infuriated sufferer feels himself an outcast from God and man; and though his judgment may still be correct upon other subjects, it is completely overpowered upon that of his actual distress, and all he thinks of and aims at, is to withdraw, with as much speed as possible, from the present state of torture, totally regardless of the future, or falsely satisfying himself by a perversion of his judgment, that there is no crime in his doing so.

One of the severest causes of despondency, is a conscience labouring under a deep sense of guilt for some

> —— undivulged crime
> Unwhipt of Justice.

And so severe has the anguish been, in many cases, that the tormented wretch, thus haunted by himself, and hating the light of Heaven, has been compelled, as the less evil of the two, to surrender himself to the laws of his country, and court the disgrace of a public execution. Yet the same ideal feeling has sometimes followed from

an ideal cause, especially in a mind of natural timidity, or constitutionally pre-disposed to a gloomy view of nature. For such, by a mere exercise of their own meditations, but far oftener by the coarse, but empassioned oratory of itinerant preachers, are induced to believe that the Almighty has shut them out for ever from the pale of mercy, and that the bottomless pit is yawning to receive them; and under the influence of such an impression, they too frequently work themselves up into a state of permanent insanity, or hurry themselves, by their own hand, into the horrors of a fate from which they feel assured that no repentance, or power of religion, can save them.

The aptitude of Despondency to become Epidemic, &c.

In the midst of great public calamities, the passion of ungovernable despondency is apt to become epidemic, and particularly where the constitution of the atmosphere, from being moist and hot, and consequently relaxing and debilitating, favours its spread. In 1806, the feeling of desperation was so common at Paris, that 60 suicides occurred during the months of June and July; at Copenhagen, in the course of the same year, 300; and in 1793, about 1300 at Versailles alone. The sensation, however, whether general or individual, is most acute where there is little corporeal exertion, and consequently where there is time to cultivate and brood over it. Hence suicide is frequent during the distress of sieges; in the first alarm of civil commotions, or when they have subsided into a state of calmness, and the mischiefs they have induced are well pondered; but it seldom takes place amid the activity of a campaign, whatever may be the fatigue, the privations, or the sufferings endured. On the fall of the Roman Empire, and throughout the Revolution of France, self-destruction was so common at home, as at last to excite but little attention; it does not, however, appear to have stained the retreat of the ten thousand under Xenophon; and according to M. Fabret, was rare in the French army during its flight from Moscow.

Remedial Treatment of Empassioned Depressions, &c.

In all these varieties of empassioned depression, the art of the physician can do but little, and in many of them nothing whatever. Yet, where the heart suffers acutely, and the mind is deeply dejected, sedatives and

antispasmodic cordials may occasionally be found useful; and, as the abdominal viscera are greatly liable to be affected, the appetite to fail, the liver to be congested, and the bowels rendered costive, those organs must be watched, and such relief be afforded, as they may stand in need of. Where aperients are required, the warm and bitter resins will generally answer the purpose best, alone, or combined with rhubarb. Where love is the cause of the disease, and the fair patient is young and delicate, suppressed menstruation, or even chlorosis, is by no means unfrequent, followed by hysteria, and other nervous affections that produce considerable trouble.

Moral Resources, &c.

In all cases of mental dejection, however, a kind and judicious friend is by far the best physician: Medicines may do a little, change of scene and country, of custom and manners, a little also; but the soothing of tenderness and indulgence, and the voice of that friendship which knows how to discriminate opportunities, and seasonably to alternate with consolation, will accomplish more in the way of cure, than all the rest put together. The despondency produced by the real cause of a guilty conscience, or the visionary belief of eternal reprobation, may derive important and most salutary advantage from religious instruction, when conducted with a judicious attention to the exigency of the case. But much circumspection and adroitness are requisite upon this point: so rooted is the feeling to be extirpated, that no ordinary means will suffice for its eradication, while, if it be forcibly snapped off, it will shoot out the wider, and grow ranker than ever.

The excitement of an opposite passion, or train of feelings, has sometimes been accompanied with success: for there are instances in which the slave of imaginary pain and misery has for ever forgotten his sense of visionary grievances under the stroke of poignant and real affliction; and the miser, when reduced by a sudden reverse of fortune, to actual beggary, and thus completely disencumbered of the load that has hitherto so much oppressed him, has returned to his sober senses, and learned a juster estimate of worldly possessions.

Suggestions for the Cure of Disappointed Love, &c.

The same attempt has often been recommended in disappointments under the passion of love; and, according to the concurrent report of the poets of ancient and modern times, many of whom profess to be well versed in this kind of discipline, it has very generally been attended with success. Where the emotion has more of a corporeal than a sentimental origin, this may easily be conceived; and it is possible, that it may also sometimes have occurred under a purer feeling: though, for the honour of the human heart, we do not think this is much to be trusted to. Where the choice between two young persons of fair character is really imprudent, yet the affections are so rivetted, as to bid defiance to all forcible attempts to unfetter them, a promise of consent on the part of the reluctant parent at the distance of a given period of time, as a year and a half, and two years, with an undertaking on the part of the lovers, neither to see nor correspond with each other in the meantime; an engagement easily fallen into, has in many instances been successful. The ardour has gradually cooled on the one side or the other, the judgment has been more impressed with the nature of the imprudence, or a more attracting form has interposed, and settled the question irretrievably! While on the contrary, if the fidelity should hold on both sides, to the end, and the passion be heightened instead of depressed, as in this case there is most reason to suppose it would be, hard, indeed, must be the heart that would extend the restriction farther, and that would not wish joy to so deserving a couple.

EXTRACT FROM PEPYS' MEMOIRS*.

LEAVING of the year 1664, the author records:

"This Christmas I judged it fit to look over all my papers and books; and to tear all that I found either boyish, or not to be worth keeping, or fit to be seen, if it should please God to take me away suddenly. Among others, I found these two or three notes, which I thought fit to keep:

---

* See Antiquary's Portfolio, vol ii. p. 273, 274.

CHARMES.

1. *For stenching Blood.*

Sanguis mane in te
Sicut Christus fuit in se,
Sanguis mane in tua venâ,
Sicut Christus in sua pœnâ;
Sanguis mane fixus,
Sicut Christus, quando fuit crucifixus.

In English, literally thus:

Blood, remain in thyself, as Christ was in himself; blood remain in thy vein, as Christ did under his pain; blood, remain fixed, as Christ when he was crucified.

2. *A Thorn.*

Jesus, that was of Virgin born,
Was pricked both with nail and thorn;
If neither wealed, nor belled, rankled nor boned;
In the name of Jesus, no more shall this.

Or thus—

Christ was of a Virgin born,
And he was pricked with a thorn;
And it did neither bell nor swell;
And I trust in Jesus this never will.

3. *A Cramp.*

Cramp, be thou faintless
As our lady was sinless,
When she bare Jesus.

4. *A Burning.*

There came three Angells out of the East;
The one brought fire, the other brought frost—
Out fire; in frost.
In the name of the Father, and Son, and Holy Ghost. Amen."

Of a peice with these charms, is a notice of the celebrated Sir William Petty:

"Sir William did tell me, that in good earnest he hath in his will left some parts of his estate to him that could invent such and such things. As among others, that could discover truly the way of milk coming into the breasts of women; and he that could invent proper characters to express to another, the mixture of relishes and tastes. And says, that to him that invents gold, he gives nothing, for the philosophers' stone; for (says he) they that find out that, will be able to pay themselves. But, says he, by this means it is better than to go to a lecture; for here my executors, that must part with this, will be sure to be well convinced of the invention before they do part with their money."

Secrets of Trade.—No. VIII.

PETER'S PILLS.

ALOES, scammony, jalap and gamboge, equal parts; two drachms; calomel, one drachm.

PERMANENT INK FOR MARKING LINEN.

A solution of nitrate of silver, thickened with sap-green, or cochineal. The preparing liquid, with which the linen to be marked is previously wetted, is a solution of soda, boiled with gum, or some animal mucilage.

*** It is a curious circumstance, that if potash be used for this purpose, the marking ink will run. The recipe is as follows:

Take Luna caustic, - - -	2 drachms.
Distilled water, - - -	6 ounces.
Dissolve, and add,	
Gum water, - - -	2 drachms.
Dissolve also,	
Prepared natron, - - -	½ ounce.
In four ounces of water, and add,	
Gum water, - - -	½ ounce.

Wet the linen where you intend to write, with this last solution, dry it, and then write upon it with the first liquor, using a clean pen. Greek water is prepared and used in the same manner, for turning the hair black.

PORTLAND'S POWDER, DUKE OF.

Equal quantities of the roots of gentian, and birthwort, *(aristolochia rotunda)* the tops and leaves of germander, *(chamæebrys)* ground pine *(chamæpitys)*, and lesser centaury, *(chironea centaurium)* powdered and mixed together.

*** As this is a combination of bitters, it will, without doubt, be serviceable in certain cases of gout.

PLUNKET'S OINTMENT FOR CANCER.

This consists of arsenious acid, sulphur, and the powdered flowers of the *ranunculus flamula*, and *cotula fœtida*, levigated and made into a paste with the white of an egg, and applied, on a piece of pig's bladder, to the surface of the cancer. (See also *patè arsenicale*, p. 378).

*** With respect to the application of arsenic to the surface of sores, no one acquainted with the properties of this noxious mineral can doubt for a moment. Sir A. Cooper observes, that "arsenic applied to the surfaces of sores is very frequently absorbed into the system, and on this account it is to be regarded as a very dangerous external remedy. As an internal remedy, it ought never

to be employed without extreme caution, and unless the patient is watched from day to day."

Quacks are in the habit of destroying tumours of the breast by the use of arsenic. Women will often undergo any torture that is not inflicted with the knife, rather than submit to an operation that would not give them a tenth part of the pain which they are sure to suffer, and in vain, from such destructive applications. They go to a person who tells them of the number of cures he has performed, by means of a specific used for the purpose of destroying cancerous affections of the breast; and in fact, these quacks very frequently do destroy them, and the patient into the bargain. Patients have been known to die in a week, from the application of arsenical preparations. So much for cancer cures.

The arsenical caustic, so extensively used under the sanction of the late Mr. Justamond, in cases of open cancer, consisted of two parts of antimony, and one of arsenious acid, fluxed together in a crucible, afterwards levigated, and reduced to the requisite degree of mildness by the addition of powdered opium.

The following are the symptoms which appear, when the system is under the influence of arsenic: viz. thickness, redness, and stiffness of the eyelids, soreness of the gums, salivation, itching over the surface of the body, restlessness, cough, pain in the stomach and bowels, head-ache, &c.

RADCLIFFE'S PURGING ELIXIR.

1. Take Socottrine aloes,		6 drachms.
Bark and root of cinnamon,	} of each,	½ drachm.
Zedoary,		
Rhubarb, the root,		1 drachm.
Cochineal,		½ drachm.
Syrup of buckthorn,		2 ounces.
Proof spirit,		1 pint.
Water,		5 ounces.
2. Take Jalap, the root,		6 ounces.
Cape aloes,		5 ounces.
Gentian root,		2 ounces.
White cinnamon,		1½ ounce.
Orange-peel,		1 ounce.
Grains of Paradise,		½ ounce.
Proof spirit,		2 gallons.

Steep for three weeks, strain, and add

Scammony of Aleppo,	} of each,	1½ ounce.
Jalap,		
Senna leaves, in powder,		

3. Take Tincture of aloes, - - - 2 pints.
——— jalap, } of each, 8 ounces.
——— gentian, }
Proof spirit, - - - 2 pints.
Powder of scammony, }
Jalap, - - - - } of each, ½ ounce.
Senna, - - - - }

4. Take Proof spirit, - - - } of each, 4 pints.
Tincture of aloes, - - }
——— gentian, - - } of each, 2 pints.
——— jalap, - - }
Jalap in powder, - - - - 6 ounces.

5. Take Socottrine aloes, - - - 6 drachms.
Cinnamon, - - } of each, ½ drachm.
Zedoary, - - }
Rhubarb root, - - - 1 drachm.
Cochineal, - - - - ½ drachm.
Syrup of buckthorn, - - 2 ounces.
Proof spirit, - - - 1 pint.
Water, - - - - 5 ounces.

6. Take Hiera picra, - - - 1 pound.
Spirits of wine, - - 10 pints.
Water, - - - - 14 pints.
Syrup of buckthorn, - - - 4 pounds.
Cochineal, - - - - 1 ounce.

This last is an inferior sort.

PHYSICIANS' FEES.

In all ages, physicians have generally contrived to get large fees. Thus Eristratus, the physician, got a handsome fee, no less than sixty thousand crowns, from Seleucus, for having discovered his son's (Antiochus) disorder, and prescribing a remedy, though to the father a very unpleasant one. Love was the young man's complaint, and love of Stratonice, his father's favourite concubine, who being handed over, like landed property, from father to son, adjusted matters, and cured the young gentleman. We find also, that Petrus Aponensis, or, as some call him, Pierre D'Avane, a physician of Padua, in the thirteenth century, would not go out of town on a visit to the sick, under one hundred and fifty francs a day. When sent for to Pope Honorius IV. he demanded four hundred ducats a day.

The Toilette.—No. IV.

ROUGE.

FRENCH chalk, prepared, four ounces; oil of almonds, two drachms; carmine, one drachm.

2. Safflower, previously washed in water until it no longer gives out any colour, and dried, four drachms; prepared kali, one drachm; water, one pint: infuse and strain; add French chalk, scraped fine with Dutch rushes, four ounces; precipitate the colour upon with a sufficient quantity of lemon juice.

PERFUMED POWDER FOR SCENTED BOXES.

Coriander seed, orrice root, rose leaves, white flag root, of each four ounces; lavender flowers, eight ounces; musk, one scruple; wood of rhodium, one drachm.

ODORIFEROUS WASH-BALLS.

Starch, twenty ounces; orrice root, twelve ounces; oil of rosemary, oil of lavender, of each a drachm; musk seed, two ounces.

PEARL POWDER.

Magistery of bismuth, French chalk, scraped fine by Dutch rushes, of each equal parts.

VACCINATION.

THE Empress Dowager Mary of Russia, and several foreign potentates, sent gratulatory addresses to Dr. Jenner on his discovery of vaccination, which has rapidly gained ground in every quarter of the globe. A few instances of this kind are worthy of being recorded.

When Dr. Wickham was made prisoner in France, Dr. Jenner was applied to as the fittest person for addressing to Bonaparte a petition soliciting that physician's liberation. This was at the time of Napoleon's greatest animosity to this country. It happened thus: the Emperor was in his carriage, and the horses were being changed. The petition was then presented to him. He exclaimed, "Away! away!" The Empress Josephine, who accompanied him, said, "But, Emperor, do you see whom this comes from? Jenner!" He changed his tone of voice that instant, and said, "What that man asks is not to be refused;" and the petition was immediately granted. The Emperor also liberated many others, even whole families, from time to time, at the request of Dr. Jenner. Indeed, he never refused any request made by Dr. Jenner, who, of course, observed proper delicacy in not applying too often.

Housekeeping and Husbandry.—No. VIII.

Housekeeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

ROASTING POULTRY, GAME, &c.

PARTRIDGES

Are cleaned and trussed in the same manner as a pheasant (but the ridiculous custom of tucking the legs into each other, makes them very troublesome to carve); the breast is so plump, it will require almost as much roasting: send up with them rice sauce, or bread sauce, and good gravy.

If you wish to preserve them longer than you think they will keep good undressed, half roast them; they will keep two or three days longer, or make a pie of them.

BLACK-COCK, MOOR-GAME, and GROUSE,

Are all to be dressed like partridges; the black-cock will take as much as a pheasant, and moor-game and grouse, as the partridge. Send up with them currant jelly, and fried bread crumbs.

WILD DUCKS.

For roasting a wild duck, you must have a clear brisk fire, and a hot spit; it must be browned upon the outside, without being sodden within. To have it well frothed, and full of gravy, is the nicety. Prepare the fire, by stirring and raking it just before the bird is laid down, and fifteen or twenty minutes will do it in the fashionable way; but if you like it a little more done, allow it a few minutes longer; if it is too much it will lose its flavour.

WOODCOCK.

Woodcocks should not be drawn, as the trail is by the lovers of "*haut-goût*" considered a "*bonne bouche;*" truss their legs close to the body, and run an iron skewer through each thigh, close to the body, and tie them on a small bird spit; put them to roast at a clear fire; cut as many slices of bread as you have birds, toast or fry them a delicate brown, and lay them in the dripping-pan, under

the birds, to catch the trail*; baste them with butter, and froth them with flour; lay the toast on a hot dish, and the birds on the toast; pour some good beef gravy into the dish, and send some up in a boat—twenty or thirty minutes will roast them. Garnish with slices of lemon.

Some epicures like this bird very much under-done, and direct, that a woodcock should be just introduced to the cook, for her to show it the fire, and then send it up to table.

PIGEONS.

When the pigeons are ready for roasting, if you are desired to stuff them, chop some green parsley very fine, the liver, and a bit of butter together, with a little pepper and salt, or with the stuffing ordered for a fillet of veal, and fill the belly of each bird with it. They will be enough in about twenty or thirty minutes; send up parsley and butter in the dish under them, and some in a boat, and garnish with crisp parsley, or fried bread crumbs, or bread sauce, or gravy.

When pigeons are fresh, they have their full relish; but it goes entirely off with a very little keeping; nor is it any way so well preserved, as by roasting them; when they are put into a pie, they are generally baked to rags, and taste more of pepper and salt than any thing else.

A little melted butter may be put into the dish with them, and the gravy that runs from them will mix with it into fine sauce. Pigeons are in the greatest perfection from Midsummer to Michaelmas; there is then the most plentiful and best food for them; and their finest growth is just when they are full feathered. When they are in the pen-feathers, they are flabby; when they are full grown, and have flown some time, they are tough. Game and poultry are best when they have just done growing, *i.e.* as soon as Nature has perfected her work.

This was the secret of Solomon, the famous pigeon-feeder of Turnham Green, who is celebrated by the poet Gay, when he says,

> "That Turnham Green, which dainty pigeons fed,
> But feeds no more, for Solomon is dead."

LARKS, AND OTHER SMALL BIRDS.

These delicate little birds are in high season in No-

---

* "This bird has so insinuated itself into the favour of *refined gourmands*, that they pay it the same honours as the grand Lama, making a ragout of its excrements, and devouring them with ecstasy."—Vide *Almanach des Gourmands.*

vember. When they are picked, gutted, and cleaned, truss them; brush them with the yolk of an egg, and then roll them in bread crumbs; spit them on a lark spit, and tie that on to a larger spit; ten or fifteen minutes at a quick fire will be enough; baste them with fresh butter while they are roasting, and sprinkle them with bread crumbs till they are well covered with them.

For the sauce, fry some grated bread in clarified butter, and set it to drain before the fire, that it may harden: serve the crumbs under the larks when you dish them, and garnish them with slices of lemon.

SINGULAR CASE OF POISONING.

THE following ridiculous, and extraordinary instance of poisoning, was related to M. Dutens by an English nobleman, who was an eye-witness of the scene.—"Lord Oxford kept a mistress, who was extremely capricious. One night, when they were sleeping together, after having quarrelled, he was awakened by the cries of his mistress; who beat her face, tore her hair, and exhibited every mark of the greatest despair. He questioned her, and pressed her to tell him the cause of her distress. At last he learnt from her, that, in order to avenge herself for the quarrel which they had had together the day before, she had poisoned him at supper, and had also poisoned herself. Alarmed at this declaration, he called up his servants, and sent for several physicians. They came; antidotes were speedily and properly administered; and after they had both vomited copiously for some hours, every body was surprised at the violent bursts of laughter of the woman; who, falling into an elbow-chair, was more than a quarter of an hour before she was able to explain the cause of such ill-timed gaiety. She at last declared, that neither Lord Oxford nor herself had been poisoned; but that she had only wished to be revenged upon him, by the alarm which she had given him, and in which she had so well succeeded. Lord Oxford thought the jest rather too serious; and as it was possible that she had thought of giving that turn to the transaction, only after the effect of the emetics, he resolved *never to sup* with her again!"

PRACTICAL REMARKS ON THE PRESERVATION OF THE TEETH AND GUMS, CARIES TEETH, AND SWEETENING OF THE BREATH.

THE best time for cleaning the teeth is before breakfast. The first thing every morning, is to rinse the mouth out with cold water; then gently to pass over the gums (inwardly and outwardly) a fine piece of sponge fastened to an ivory handle, moistened with an equal quantity of tincture of myrrh and rose-water; after which, rub the surface of the teeth with a similar piece of sponge, moistened with the diluted tincture of myrrh, as above, with the surface covered with finely-levigated charcoal of the areca-nut. Then finish, by rinsing the mouth out again with cold water. A brush is sufficient for removing any morbid secretion of the gums that may collect on the inside and between the teeth. If this simple treatment be adopted, the person may be assured that he shall remain free from any fresh disease of the teeth, or pains in the jaw, and that the carious teeth which may have existed at the time, will be rendered sweet, and the progress of the disease effectually suspended.

The general adoption of the charcoal of the areca-nut, as a dentifrice, has induced some interested men, terming themselves dentists, to oppose its use, for the ridiculous reason, that no tooth-powder should be used without the advice of a dentist: yet some of these conscientious men puff off the most dangerous compositions as safe and efficacious tooth-powders. The fact is, that if the charcoal of the areca-nut were the only tooth-powder employed in this country, and the directions above given were strictly followed, there would be no necessity of having recourse to dentists.

The charcoal of the areca-nut has been employed by the natives in the East Indies from time immemorial; and it is well known that no people in the world possess more healthy or beautiful teeth, or are more free from caries and tooth-ache. It has been said, that the charcoal of the areca-nut cannot possess any quality superior to that of wood. This is a very erroneous assertion, for the powdered charcoal of the areca-nut is both smooth and alcalescent, while that of the wood is a common dry powder, which, from its firmness and fibrous quality, may do mischief.

As the health of the teeth, as well as every part of the body, greatly depends upon the stomach properly performing its office, it may not be amiss to observe, that whatever tends to disturb its functions should be avoided, especially spirits, and wine in excess. Costiveness being also highly detrimental to the teeth, the bowels should be kept open by the occasional use of an aperient medicine, which will at the same time promote digestion, remove obstructions in the liver, and purge the system of bile.

On the Operation of Brushing the Teeth.

A person cleaning his teeth with a *coarse mineral* tooth-powder and a hard brush, does considerable violence to the gums, especially the edges; indeed so much so, that it is very common to rupture small blood-vessels; in consequence of which, a considerable irritation is produced, and kept up by the daily use of the brush. The edges of the gums inflame and tumefy, and the whole gum becomes spongy; and the hair of the brush spreading in different directions, the gum is separated from the teeth, and thus the source of nourishment of the teeth, and particularly the external part (the enamel), is nearly, if not entirely cut off; in consequence of which the teeth become loose, and in time fall out, if disease do not take place in their substance. From the irritated and detached gum there is also a morbid secretion, which, collecting on the teeth, and becoming of a firm texture, forms what is termed tartar, for the removal of which, the operation of cleaning by the brush, to those unacquainted with the cause, appears to be more necessary; and it frequently happens that many people, at the age of forty, have, by this practice, the substance of their gums so abraded, that the upper part of the fangs of the teeth and aveolar process of the jaw are exposed. Instead, therefore, of advising people to keep their teeth clean by the mechanical friction of a *hard* brush, and a coarse mineral powder, we would seriously advise them to attend to the state of the gums; and when the teeth require cleaning (which they will seldom do if they attend to this advice), not to irritate the edges of the gums by the use of a hard brush or a coarse powder.

Rural Economy.—No. V.

On Cultivating the Mushroom. By Mr. William Hogan.

The exterior form of the bed resembles the old ones as built against a wall, but instead of building it solid, it is hollow; strong stakes are inclined against the wall at an angle of about sixty-five degrees, on which are placed hurdles to support the bed. By this means a cavity is formed under the stakes, between them and the wall and the floor, for the purpose of receiving dung, which being readily changed, an opportunity is thus afforded of keeping up a permanent moist bottom heat in the bed, the absence of which, together with an insufficient depth of mould for the spawn to run in, is the great defect of all other modes of raising mushrooms, with which I am acquainted.—Upon a structure thus contrived, I built two beds, eighteen inches thick, the uppermost four inches of which is mould of a loamy nature, with an admixture of one quarter of road-sand. The substratum was formed of dung, which had laid in the stable-yard a considerable time; this was well shaken, and laid in ridges for about a week, giving it a few turnings in the interim, by which time it became moderately dry; I then added to it one-third of mould collected under a group of common horse-chesnut trees, where different cattle indiscriminately retreat during the heat of summer; this lay in heaps a few weeks previous to use. A layer of straw or long litter was first placed on the hurdles, to prevent the mould and short part of the dung passing through them. In laying on this compost, I beat it with a spade till it became solid, and then left it for a week, before it was spawned and moulded. When the mould was put on, I bestowed no other labour on it, than beating it with the spade.—I did not use a covering of straw or hay, nor do I think it necessary, provided the place where the beds are built be sufficiently closed; but in an open shed such a protection must be provided. When a covering is not used, the whole crop fit for use may be observed at once, which is very advantageous. With respect to watering, it would be difficult to lay down fixed rules—that must depend on the judgment of the gardener; however, from the depth of mould which is used in this plan, I can confidently state that there is no necessity for being so sparing of water as is

usually recommended by writers on the subject.—The beds which I made as above described, were spawned on the 24th of August last; they came into bearing on the 21st of the following month, and would have continued bearing up to the present time without ceasing, and for several weeks longer, if an unfortunate accident had not occurred on the night of the 28th of last month (December), by a fracture in the ceiling of the room, which admitted the frost.—Notwithstanding this accident, however, I propose, after giving the bed a few weeks rest, to renew the linings; and I have the most sanguine hopes that my labour will be successful; for, upon a close examination, I find that the whole mass of dung and mould is completely full of spawn.—The place in which the beds are placed is a dark room, about ten feet square, exposed to the north, and with an earth floor. They are each about eight feet six inches long, and measure seven feet over their surfaces from the floor to the wall. Of the produce of those beds, my master and many gentlemen in the neighbourhood, as well as their gardeners, can bear ample testimony. The appearance of the mushrooms was singularly beautiful. In their growth they formed an apparently powdery substance, resembling the *Aphis Lanigera* in its young state, and this progressively altered till it became more crustaceous and solid, ultimately forming large clusters of from one hundred to two hundred mushrooms.—*Trans. Horti. Soc.*

Of Green Vegetable Manures. By Mr. Young.

This system of manuring has many advocates, and there have been instances of its being attended with great success. It consists in ploughing in a full crop of some succulent vegetable, such as clover, buck-wheat, or tares. To make them turn in well, two circumstances are necessary; they must have a barley-roller run over them, and a trench-plough must follow, going the same way as the roller did. A common plough will do it very incompletely; for if they are not entirely buried, if the points stick out between the furrows, they will not die, and consequently not ferment; but Mr. Ducket's trench-plough, or the small skim-share fixed to any common plough, buries completely. This work should always be done in summer, or very early in the autumn, while the sun has power to forward the fermentation; for in winter little or no use would result from the practice. The benefit will depend on circumstances; but chiefly, I should apprehend, on the disposi-

tion of the soil to promote and forward the putrefactive fermentation; if the mass of vegetables is speedily converted by putrefaction into mucilage, there can be no doubt but you acquire manure. And this will depend on the weather: if a very cold, or cold and wet season followed, the whole perhaps might be nearly lost; but if the weather is moderately moist, and very warm, the fermentation will be speedy. Nothing less than a very great crop should be ploughed in: a large mass putrefies in quite a different manner from a small one: a thin crop might not putrefy at all, that is, in union with the land. A degree of putrefaction ensues wherever any animal dungs, but the soil is very little better for it; but turn in so much dung, that the incumbent earth and the dung shall together feel an excited fermentation, the benefit will be great. But after all, the question yet remains, whether a great crop of clover, buck-wheat, and tares, mown green, for soiling on the farm, will not, in the consumption by cattle, yield more and better manure than can result from ploughing them in? I must own, in my opinion, they might. The experiment, fairly tried, would be both difficult and expensive; and it would demand many repetitions to ascertain it decisively.

Valuable Plant.

The *magny* of Mexico, the plant from which is drawn the liquor called *pulque*, of universal use and celebrity in that country, is not a native of Florida, but thrives as well as if it was. It forms a plant, when full grown, from five to eight feet high in the body, and from ten to eighteen inches in diameter; the leaves of it, if I may be allowed the term, (for they appear more like huge limbs than leaves, but they must be called leaves as they are the only lungs of the plant), descend from the top to the ground, and are so thick and heavy, that two or three would make a man's load. At the age of from six to eight years it flowers, by shooting up a stamina from ten to sixteen feet above the plant, gorgeously hung with flowers like a May-pole. Just before it sends forth this exuberance, a change in the colour of the plant indicates its near approach, when a bowl-formed cavity is cut in the head of the plant, and a cane introduced in the side of it to draw off the liquor. Each plant contains from 50 to 150 gallons of liquor, and dies immediately after; but is succeeded by suckers left in their culture to keep up a constant succession. This

juice, carried through a vinous fermentation, becomes a liquor resembling cider, but more spirituous, which is sought with avidity by all ranks of society. On boiling and clarifying, it becomes a wine; and on distillation affords a fine brandy. The outward coat of leaves yields a membranous substance used for the manufacture of cordage; an inner coat gives a finer substance for clothing; and the internal part of the leaf is an article of food; so that this productive plant, regarded by the Mexicans as one of the most beautiful gifts of nature, affords them cider, wine, brandy, cordage, clothing, food, and fuel. From 12,000 to 15,000 mules are daily employed in supplying the city of Mexico from the surrounding plantations with *pulque*, which is the liquor in a ciderous state. It is in the flowering of this plant, in a degenerate state, in colder climates, that we are deceived by supposing it to be the aloe that flowers once in a century: this flowers in eight or ten years in such climates, and perhaps is not of the aloe tribe; certainly it partakes not of the nauseous bitter, nor cathartic qualities, of the aloes we are acquainted with.

Directions for making a Composition for curing Diseases, Defects, and Injuries, in all kinds of Fruit and Forest Trees, and the Method of preparing the Trees, and laying on the Composition. By William Forsyth.*

TAKE one bushel of fresh cow-dung, half a bushel of lime rubbish of old buildings, (that from the ceilings of rooms is preferable) half a bushel of wood-ashes, and a sixteenth part of a bushel of pit, or river sand. The three last articles are to be sifted fine before they are mixed; then work them well together with a spade, and afterward with a wooden beater, until the stuff is very smooth, like fine plaster used for the ceilings of rooms.

The composition being thus made, care must be taken to prepare the tree properly for its application, by cutting away all the dead, decayed, and injured part, till you come to the fresh, sound, wood; leaving the surface of the wood very smooth, and rounding off the edges of the

* In consequence of an Address of the House of Commons to His late Majesty, and of an examination made respecting the efficacy of a composition discovered by Mr. William Forsyth, for curing injuries and defects in trees, His Majesty was pleased to grant a reward to Mr. Forsyth, for disclosing the method of making and using that composition; and the following directions for that purpose were published accordingly.

the bark with a draw-knife, or other instrument, perfectly smooth, which must be particularly attended to: then lay on the plaster, about one-eighth of an inch thick, all over the part where the wood or bark has been so cut away, finishing off the edges as thin as possible. Then take a quantity of dry powder of wood-ashes, mixed with a sixth part of the same quantity of the ashes of burnt bones; put it into a tin box, with holes in the top, and shake the powder on the surface of the plaster till the whole is covered over with it, letting it remain for half an hour, to absorb the moisture: then apply more powder, rubbing it on gently with the hand, and repeating the application of the powder, till the whole plaster becomes a dry, smooth surface.

All trees cut down near the ground should have the surface made quite smooth, rounding it off in a small degree, as before-mentioned; and the dry powder directed to be used afterward, should have an equal quantity of powder of alabaster mixed with it, in order the better to resist the dripping of trees and heavy rains.

If any of the composition be left for a future occasion, it should be kept in a tub, or other vessel, and urine of any kind poured on it, so as to cover the surface, otherwise the atmosphere will greatly hurt the efficacy of the application.

Where lime rubbish of old buildings cannot be easily got, take powdered chalk, or common lime, after having been slaked a month, at least.

As the growth of the tree will gradually affect the plaster, by raising up its edges next the bark, care should be taken, where that happens, to rub it over with the finger when occasion may require (which is best done when moistened by rain) that the plaster may be kept whole, to prevent the air and wet from penetrating into the wound.

THE GOURMAND'S COMPLAINT.

A GLUTTON complained to a physician, that he was much afflicted with colicky spasms: "What hast thou eaten to-day?" asked the son of Galen; "and how dost thou generally live?" The glutton informed him that he had been at a feast, and rather exceeded his usual fare, which was so and so daily. "Well," said the Doctor, "if happily thou dost not die to-night, I would advise thee to hang thyself to-morrow, for death alone can rid thee of thy complaints."

A SKETCH OF THE HISTORY OF SUGAR, IN THE EARLY TIMES, AND THROUGH THE MIDDLE AGES.

BY W. FALCONER, M. D. F. R. S.

THE use of sugar is probably of high, though not remote antiquity (although its adulteration with salt is of a much more modern date), as no mention of it is made, as far as I can find, in the sacred writings of the Old Testament*. The conquests of Alexander seem to have opened the discovery of it to the western parts of the world.

Nearchus, his admiral (A. C. 325) found the sugar-cane in the East Indies, as appears from his account of it, quoted by Strabo. It is not however clear, from what he says, that any art was used in bringing the juice of the cane to the consistence of sugar.

Theophrastus, who lived not long after (A. C. 303), seems to have had some knowledge of sugar, at least of the cane from which it is prepared. In enumerating the different kinds of honey, he mentions one that is found in reeds, which must have been meant of some of those kinds which produce sugar.

Eratosthenes also (A. C. 223) is quoted by Strabo, as speaking of the roots of large reeds found in India, which were sweet to the taste, both when raw and when boiled.

The next author, in point of time, that makes mention of sugar, is Varro (A. C. 68), who, in a fragment quoted by Isidorus, evidently alludes to this substance. He describes it as a fluid pressed out from reeds of a large size, which was sweeter than honey.

Dioscorides (A. C. 35), speaking of the different kinds of honey, says, that " there is a kind of it, in a concrete state, called *jaccharon*, which is found in reeds in India and Arabia Felix. This, he adds, has the appearance of salt; and, like that, is brittle when chewed. It is beneficial to the bowels and stomach, if taken dissolved in water; and is also useful in diseases of the bladder and kidneys. Being sprinkled on the eye, it removes those

* Since writing the above, the author observed that the *sweet cane* is mentioned in two places of Scripture, and in both as an article of merchandize. It does not seem to have been the produce of Judea, as it is spoken of as coming from a far country. Isaiah, chap. xliii. ver. 24; Jeremiah, chap. vi. ver. 20.—It is worthy of remark, that the word *sachar* signifies, in the Hebrew language, *inebriation*—which makes it probable, that the juice of the cane had been early used for making some fermented liquor.

substances that obscure the sight."—The above is the first account I have seen of the medicinal virtues of sugar.

Galen (A. D. 143) appears to have been well acquainted with sugar, which he describes, nearly as Dioscorides had done, as a kind of honey, called *sacchar*, that came from India and Arabia Felix, and concreted in reeds. He describes it as less sweet than honey, but of similar qualities, as detergent, desiccative, and digerent. He remarks a difference, however, in that sugar is not, like honey, injurious to the stomach, or productive of thirst.

If the third book of Galen, "Upon Medicines that may be easily procured," be genuine, we have reason to think sugar could not be a scarce article, as it is there repeatedly prescribed.

Lucan alludes to sugar, in his third book, where he speaks of the sweet juices expressed from reeds, which were drank by the people of India.

Seneca the philosopher, likewise speaks of an oily sweet juice in reeds, which probably was sugar.

Pliny was better acquainted with this substance, which he calls by the name of *saccaron;* and says, that it was brought from Arabia and India, but the best from the latter country. He describes it as a kind of honey, obtained from reeds, of a white colour, resembling gum, and brittle when pressed by the teeth, and found in pieces of the size of a hazel nut. It was used in medicine only.

Salmasius, in his Plinianæ Exercitationes, says, that Pliny relates, upon the authority of Juba the historian, that some reeds grew in the Fortunate Islands, which increased to the size of trees, and yielded a liquor that was sweet and agreeable to the palate. This plant he concludes to be the sugar-cane; but I think the passage in Pliny, Hist. Nat. lib. vi. cap. 22, scarcely implies so much.—Hitherto we have had no account of any artificial preparation of sugar, by boiling or otherwise; but there is a passage in Statius, Sylv. I. vi. 15, that seems, if the reading be genuine, to allude to the boiling of sugar, and is thought to refer immediately thereto by Stephens in his Thesaurus.

Arrian, in his Periplus of the Red sea, speaks of the honey from reeds, called *sacchar* (Σαχαρ), as one of the articles of trade between Ariace and Barygaza, two places of the hither India, and some of the ports on the Red Sea.

Ælian, in his Natural History, speaks of a kind of

honey, which was pressed from reeds, that grew among the Prasii, a people that lived near the Ganges.

Tertullian also speaks of sugar, in his book, " De Jujicio Dei," as a kind of honey procured from canes.

Alexander Aphrodisæus appears to have been acquainted with sugar, which was in his time regarded as an Indian production. He says, " that what the Indians called sugar, was a concretion of honey in reeds, resembling grains of salt, of a white colour, and brittle, and possessing a detergent and purgative power like to honey; and which being boiled in the same manner as honey, is rendered less purgative, without impairing its nutritive quality."

Paulus Æginetа speaks of sugar, as growing, in his time, in Europe, and also as brought from Arabia Felix; the latter of which he seems to think less sweet than the sugar produced in Europe, and neither injurious to the stomach, nor causing thirst, as the European sugar was apt to do.

Achmet, a writer, who, according to some, lived about the year 830, speaks familiarly of sugar as common in his time.

Avicenna, the Arab physician, speaks of sugar as being a produce of reeds; but it appears he meant the sugar called Tabaxir, or Tabbarzet, as he calls it by that name.

It does not appear that any of the above-mentioned writers knew of the method of preparing sugar, by boiling down the juice of the reeds to a consistence. It is also thought the sugar they had was not procured from the sugar-cane in use at present, but from another of a larger size, called Tabarzet* by Avicenna, which is the *Arundo Arbor* of Caspar Bauhin, the *Saccar Mambu* of later writers, and the *Arundo Bambos* of Linnæus. This yields a sweet milky juice, and oftentimes a hard crystallized matter, exactly resembling sugar, both in taste and appearance.

The historians of the Crusades make the next mention of sugar, of any that have fallen under my observation.

The author of the Historia Hierosolymitana (A. D.

* Some of the writers say, that it was so called from the name of a place, Σαχαρ Ταβαρζες, τοπος ϑεν καλεμενος εις Συριαν. *Constantinus a Secretis*, MS. quoted from Du Cange Gloss. Græc.—The word *Tabarzet* signifies white, and is translated by Du Cange, *Saccar Album*. Herbelot says that the Persians called by that name the hardest and most refined sugar.—*Bibliothéque Orientale*, p. 810.

1100) says, that the Crusaders found in Syria certain reeds, called Cannameles, of which it was reported a kind of wild honey was made; but does not say that he saw any so manufactured.

Albertus Agnensis relates, that about the same period, "the Crusaders found sweet honeyed reeds, in great quantity, in the meadows about Tripoli, in Syria, which reeds were called Zucra. These the people (the Crusaders' army) sucked, and were much pleased with the sweet taste of them, with which they could scarcely be satisfied. This plant (the author tells us) is cultivated with great labour of the husbandmen every year. At the time of harvest, they bruise it, when ripe, in mortars, and set by the strained juice in vessels, till it is concreted in form of snow, or white salt. This, when scraped, they mix with bread, or rub it with water, and take it as potage; and it is to them more wholesome and pleasing than the honey of bees. The people who were engaged in the sieges of Albaria Marra and Archas, and suffered dreadful hunger, were much refreshed hereby."

The same author, in the account of the reign of Baldwin, mentions eleven camels, laden with sugar, being taken by the Crusaders, so that it must have been made in considerable quantity.

Jacobus de Vitriaco mentions, that "in Syria reeds grow that are full of honey, by which he understands a sweet juice, which, by the pressure of a screw engine, and concreted by fire, becomes sugar." This is the first account I have met with, of the employment of heat or fire in the making of sugar.

About the same period (A. D. 1124), Willermus Tyrensis speaks of sugar as made in the neighbourhood of Tyre, and sent from thence to the farthest parts of the world.

Marinus Sanutus mentions (A. D. 1300), that in the countries subject to the Sultan, sugar was produced in large quantity, and that it likewise was made in Cyprus, Rhodes, Amorea, Marta, Sicily, and other places belonging to the Christians.

Hugo Falcandus, an author who wrote about the time of the Emperor Frederic Barbarossa, speaks of sugar being in his time produced in great quantity in Sicily. It appears to have been used in two states; one wherein the juice was boiled down to the consistence of honey, and another where it was boiled farther, so as to form a solid body of sugar.

The foregoing are all the passages that have occurred to my reading on this subject. They are but few and inconsiderable, but may save trouble to others who are willing to make a deeper enquiry into the history of this substance.

BIOGRAPHICAL PORTRAIT OF VALENTINE GREATRAKES.

THIS singular man, famous for curing many people by the touch of his hand, was descended from a good family in the county of Waterford, where he was born in the reign of Charles the First. His education was as liberal as could be procured in those troublesome times, at Lismore school, where he continued until the term of years qualified him for entering Trinity College, Dublin. At this time the Rebellion broke out; and, owing to the then distracted state of the nation, he was obliged, with his mother (who had several other small children), to fly for refuge into England, where they were relieved by his uncle, Mr. Edward Harris; after whose death, young Greatrakes was committed to the care of Mr. John Daniel Getseus, a German, and then minister of Stoke Damarel, in the county of Devon, who, for several years, instructed him in theology, philosophy, &c.

About the year 1624, he returned to his native country, but was so exceedingly affected by the miserable and reduced state it was in, that he retired to the Castle of Caperquin, where he spent a year in serious contemplation on the vicissitudes of state and fortune.

In the year 1649, he became lieutenant in the regiment of Roger, Lord Broghill, afterwards Earl of Orrery, then acting in Munster against the Irish papists; but, upon the regiment being disbanded (1656), he retired to his estate at Affane, and was soon after appointed clerk of the peace for the county of Cork, and registrar for plantations, and justice of peace.

About the year 1662, Valentine began to conceive himself possessed of an extraordinary virtue, in being able to remove the king's evil, or other diseases, by touching or stroking the parts affected, with the hand. This imagination he concealed for some time; but, at last, revealed it to his wife, who ridiculed the idea. Resolved, however, to make a trial, he began with one William Mayer, who was brought to the house of his father for the purpose of receiving some assistance from

Mrs. Greatrakes, as this lady was always ready to relieve the sick and indigent, as far as lay in her power. This boy was sorely afflicted with the king's evil, but was, to all appearance, cured by Mr. Greatrakes laying his hands upon the parts affected. Several other persons appeared to be cured, in the same manner, of different disorders. He acquired considerable fame in his neighbourhood; but, being cited in the Bishop's Court, at Lismore, and not producing a license for practising, he was prohibited from laying his hands on any person for the future; but he still continued to do so till January, 1665-6, when he came to England, at the request of the Earl of Orrery, in order to cure the lady of the Lord Viscount Conway, of Ragley, in Warwickshire, of a continual violent head-ache. He staid at Ragley about a month, but failed in his endeavours to relieve this lady; notwithstanding, he is said to have performed several miraculous cures here, in the presence of several eminent and skilful persons.

A declaration of his cures in Warwickshire was published by Mr. Stubbe (who was a witness to them) at Oxford, in 4to. in which the author maintained, "that Mr. Greatrakes was possessed of a peculiar temperament, as his body was composed of some particular ferments, the effluvia whereof being introduced, sometimes by a light, sometimes by a violent friction, restore the temperament of the debilitated parts, regenerate the blood, and dissipate all heterogeneous ferments out of the bodies of the diseased, by the eyes, nose, mouth, hands, and feet." This publication was "A Letter," addressed to the Hon. Robert Boyle, Esq. who, in a private letter to the author, expressed his displeasure at being thus publicly addressed on such a subject, particularly as Mr. Stubbe endeavoured to shew that Mr. Greatrakes' gift was miraculous. Mr. Glanville, also, imputed his cures to a sensitive quality inherent in his constitution; and others (perhaps with greater probability) to the force of imagination in his patients; Mr. Boyle, however, having witnessed Mr. Greatrakes' performances in April, 1666, acknowledges his remarkable cures. This extraordinary man afforded much matter for the press, and various pamphlets were published *pro* and *con*, particularly one in 4to and supposed to have been written by Mr. David Lloyd, Reader of the Charter-house, under the title of "Wonders no Miracles; or, Mr. Valentine Greatrakes' gift of healing, examined, upon occasion of a sad effect

of his touching a young Lady, March 7th, 1665, at one Mr. Cressell's house, in Charter-house Yard; in a Letter to a Reverend Divine living near that place." This attack obliged Mr. Greatrakes to vindicate himself; and, accordingly, he published a list of his "strange cures." It is a fact, that this man's reputation rose to a prodigious height, but, latterly, declined almost as fast; for the expectations of the multitude that resorted to him were not always answered.

THE MIRACULOUS ST. BLASE.

THIS Saint has the honour of a place in the church of England calendar, on what account it is difficult to say. All the facts that Alban Butler has collected of him is, that he was Bishop of Sebaste in Armenia, receiver of the relics of St. Eustratius, and executor of his last will; that he is venerated for the cure of sore throats; principal patron of Ragusa, titular patron of the wool-combers; and that he was tormented with iron combs, and martyred under Licinius, in 316.

Ribadeneira is more diffuse. He relates, that St. Blase lived in a cave, whither wild beasts came daily to visit him, and be cured by him; "and if it happened that they came while he was at prayer, they did not interrupt him, but waited till he had ended, and never departed without his benediction. He was discovered in his retirement, imprisoned, and cured a youth who had a fish-bone stuck in his throat, by praying." Ribadeneira further says, that Ætius, an ancient Greek physician, gave the following

Receipt for A Stoppage in the Throat:

"Hold the diseased party by the throat, and pronounce these words: Blase, *the martyr, and servant of Jesus Christ, commands thee to pass up or down!*"

The same Jesuit relates, that St. Blase was scourged, and seven holy women anointed themselves with his blood; whereupon their flesh was combed with iron combs, their wounds ran nothing but milk, their flesh was whiter than snow, angels came visibly and healed their wounds as fast as they were made; and they were put into the fire, which would not consume them; wherefore they were ordered to be beheaded, and beheaded acordingly. Then St. Blase was ordered to be drowned in the lake; but he walked on the water, sat down on it in the

middle, and invited the infidels to a sitting; whereupon threescore and eight, who tried the experiment, were drowned, and St. Blase walked back to be beheaded.

The "Golden Legend" says, that a wolf having run away with a woman's swine, she prayed St. Blase that she might have her swine again, and St. Blase promised her, with a smile, she should, and the wolf brought the swine back; then she slew it, and offered the head and the feet, with some bread and a candle, to St. Blase. "And he thanked God, and ete thereof; and he sayd to her, that every yere she sholde offre in his chirche a candell. And she dyd all her lyf, and she had moche grete prosperyte. And knowe thou that to the, and to all them that so shal do, shal well happen to them."

It is observed in a note on Brand, that the candles offered to St. Blase were said to be good for the tooth-ache, and for diseased cattle.—*Butler's Lives of the Saints.*

Horticulture.

OCTOBER.

THE KITCHEN GARDEN.—In this month all sowing and principal planting should be finished for this year; some necessary for winter, and others to remain for next spring and summer.

At this season many crops will be consumed, or past perfection; the ground should be cleared from the refuse, and weeds hoed down, or the ground digged; and all advancing crops should have a thorough clearing from autumnal seed-weeds, &c.: some want earthing-up, and several sorts of esculent roots should be dug up, to preserve for winter use.

Attend to the necessary sowing and planting—now required; and perform the principal part early in the month (b. m.)

The sowing crops—are but few; chiefly a small crop of lettuce, some radishes, successions of small salading, and a few early peas, to come in forward next summer.

Planting is still necessary—to perform in several crops; as cabbage, cauliflowers, coleworts, celery, endive, lettuce, and late broccoli and borecole; also may plant garlic and shallots, several aromatic of pot-herbs, some plants for seed, and a few early beans for next summer;

also plant in hot-beds, asparagus, mushrooms, and cucumbers occasionally.

Hand-weeding and hoeing—now demand particular attention, to extirpate the numerous productions of autumnal weeds, before the winter sets in.

Prepare vacant ground—by dunging and digging for present and future cropping.

FRUIT-GARDEN AND ORCHARD.—Wall trees will still require some attention, to nail in any projecting shoots; to admit all possible benefit of the sun, to forward the ripening and flavour of late fruit, of peaches, grapes, plums, &c.

Likewise, in this month, many sorts of the autumnal eating and winter fruits, of apples and pears, &c. will require general gathering.

The work of planting and winter-pruning—may also be commenced this month (m. l.) in several sorts of fruit-trees.

FLOWER-GARDEN AND PLEASURE-GROUND.—In this month the several compartments of the flower-garden, pleasure-ground, &c. should be prepared in the best order, to remain clean and neat for the winter season; and in which may commence general autumnal planting in many sorts of plants, roots, shrubs, &c. required.

Preparations for planting—should now be forwarded, by digging vacant beds and borders for bulbous roots, and various fibrous-rooted flower-plants; also compartments for shrubbery-planting.

Planting—may be performed in all sorts of bulbous and tuberous flower-roots, fibrous-rooted perennials and biennials, all kinds of evergreens, and many sorts of other shrubs and trees.

WORK IN THE NURSERY.—In the nursery work of this month, is comprehended a great deal of principal business in preparing for and proceeding in the autumn planting and transplanting of many sorts of young trees and shrubs, and in the works of propagation by seeds, cuttings, suckers, and layers; for which occasions the ground must be got ready by digging or trenching, &c.; also perform several other necessary works of culture.

THE GREEN-HOUSE.—In this month, as cold weather and frosts sometimes prevail, finish removing all the plants into the green-house (b. m.), especially the tenderest kinds.

Oranges and Lemons—and other tenderest exotics not taken in last month, remove into the green-house (b.)

The hardier kinds—as myrtles, oleanders, winter cherries, geraniums, &c. may remain abroad till towards (m.), if fine weather; but after that time, or before, if cold or very rainy, house them as soon as possible; at any rate, take them all in before (m.)

Succulent plants—finish taking all tenderest sorts (b.); American aloes, and all others (b. m.)

Previous to removing into the green-house—clear off decayed leaves, dead shoots, &c. and prune irregular growths; weed the pots, loosen the top earth, and thoroughly wash and clean the heads.

In disposing the plants in the green-house—station the taller sorts more or less back, and the lower plants forward, having the small plants in the front.

Small plants of myrtles—and other green-house plants of similar temperature, if not room in the green-house, may be placed in deep garden-frames, or in a pit defended with frames and glasses.

Fresh air—must now be admitted freely every day or night, if mild weather, till (b. m.); then keep close every night.

Water—give now very moderately once a week to the oranges, lemons, myrtles, and other woody kinds; the succulents more sparingly.

HOT-HOUSE AND STOVE.—As the cold season is now approaching, the bark-bed heat in the pinery or general hot-house is not only necessary, but must have a thorough renewal for the winter; and if cold weather (l.), fire heat must be again commenced, continuing to give proper admission of fresh air in warm days, and occasional waterings.

Water—Continue to apply occasionally to the plants in general; but less to the succulent kinds than the others.

To the hot-house plants in general—give nearly the same occasional culture as suggested last month in the different sorts, according as it may seem necessary in their various orders of growth.

Fire heat—in the hot-house, if cold weather towards (l.), begin again for the winter, moderately every evening.

MISCELLANEOUS DOMESTIC RECIPES.

SPECIES FOR MAKING BITTERS.

1. Take Gentian-root, - - - - - ½ ounce.
Peruvian-bark, - - - 1 ounce.
Orance-peel, - - - 2 drachms.
White cinnamon, - - - 1 drachm.
For two bottles of white wine.

2. Take Gentian-root, - - 2 ounces.
Orange-peel, - - - 1 ounce.
Lesser cardamoms, - - ½ ounce.
For a quart of brandy.

3. Take Gentian-root, - } of each 2 drachms.
Dried orange-peel, - - }
Fresh lemon-peel, - - - ½ ounce.
For a pint and a half of boiling water.

BRANDY BITTERS.

Take Gentian-root, - - 3 pounds.
Orange-peel, - - 2 pounds.
Cardamoms, - - - 1 pound.
Cinnamon, - - - 8 ounces.
Cochineal, - - - 2 ounces.
Rectified spirit, - - - 6 gallons.
Water, - - - 5 gallons.
Put up in four-ounce octagon bottles.

INGREDIENTS FOR DIET-DRINK.

1. Take the wood of guaiacum, - - 1½ ounce.
China-root, - - } of each 2 ounces.
Sarsaparilla-root, - }
Wood of sassafras, - - 3 drachms.
Dried liquorice-root, - - 6 drachms.
For three quarts of water.

2. Take Wood of guaiacum, - }
Root of sarsaparilla, - } of each 1 ounce.
China-root, - - }
Senna-leaves, the best, - - ½ ounce.
Rhubarb, - - - 2 drachms.
For four quarts of water. To which add, before it is boiled,
Subcarbonate of potash, - - 1 drachm.
Crude antimony, - - 4 ounces.
Used in gonorrhœa and in syphilis for common drink; in the secondary symptoms of the latter, with ten grains of the blue pill at night, and five in the morning. Also in eruptions of the skin.

BRITISH HERB TOBACCO.

Take Thyme, - - - - 2 ounces.
Colt's-foot, - - - 3 ounces.
Betony, - - } of each 4 ounces.
Eyebright, - - }
Marjoram, - - } of each 2 ounces.
Hyssop, - - }
Rosemary, - - } of each 8 ounces.
Lavender, - }
Mix, and cut up fine for use.

LECTURES ON THE PHYSICAL EDUCATION OF CHILDREN DURING THE EARLY PART OF THEIR LIVES.

ADDRESSED TO MOTHERS, &c. BY A. F. WILLICH, M. D.

(Continued from p. 402).

LECT. II.

On the Errors and Prejudices prevailing in the Treatment of Children at an Early Age; on the Dangers attending the Improper Application of Medical Remedies in general; Hints towards radical, but gradual Improvements; and satisfactory Proofs that we are not yet in the Possession of a System, founded on Scientific Principles, supported by Experimental Facts, and consistent with the Moral and Physical Constitution of Man.

As the subject of the present Lecture will chiefly relate to a more rational method of managing the physical education of children, I shall commence it with a few *general reflections* on the errors and prejudices prevailing in the treatment of them, especially at an early age.

To avoid and to correct errors, it is only necessary to be acquainted with their pernicious tendency, and to break the slavish fetters of prejudice and custom.—Those happy few who think for themselves, and study the effects of natural causes, will not be easily misled by laws and rules, which are neither warranted by reason nor experience. And though it cannot be denied, that common nurses and servants are ill qualified to conduct this important office, yet fathers are too much accustomed to consider the nursery as the most irksome room in the house; so that children frequently are in a manner orphans, while their parents are alive. Hence we should not be surprized at the most incongruous methods adopted in the management of infants. Nay, I will venture to assert, that until fathers condescend to take an active share in that department which relates to the physical education of their offspring, and co-operate with the views of a solicitous mother, our improvements will neither be radical nor permanent. That many erroneous notions actually prevail in this branch of family affairs, will be admitted by every ingenuous mind: the modern system of bracing children by the cold-bath, of suffering them to go with bare legs and thin dresses in winter, together with a variety of improper habits, will, in the sequel, afford ample proofs of this assertion; especially

as upon these occasions the individual temperament, age, and other circumstances attending the situation of the child, are little, if at all, consulted.

But I cannot, in justice to helpless infancy, forbear to point out a few circumstances, which appear to me of peculiar importance: such, for instance, is the almost general custom of neglecting the constitution of infants, till they become afflicted with pain or disease. For, though medical assistance should be occasionally resorted to, by families either more wealthy or circumspect than their neighbours, yet I am convinced, from painful experience, that it is too frequently done at a very late period, and chiefly with a view of satisfying clamorous relations, or relieving the anxiety of distressed parents; because the prospect of rescuing the little sufferer from the jaws of death is then nearly vanished.—How can it be rationally expected, that a physician, called in upon the spur of the moment, should be able to ascertain the seat and causes of the disease? On such occasions, indeed, I would prefer the account of a judicious nurse, to any examination hastily instituted by the most learned and attentive practitioner, during a conversation seldom exceeding ten minutes. Is it not a most melancholy instance of human indifference, that we often devote a considerable portion of our time to pursuits of an inferior kind, such as rearing trees and shrubs, or even flowers and grasses, while we neglect the most dignified of human offices, namely, that of educating our children upon a plan supported by the dictates of reason? And this unpardonable neglect begins from the hour of a child's birth. It is at that momentous period, when the foundation is frequently laid, of a feeble and sickly life. Hence I shall only observe, that many children have fallen victims to general convulsions, the cause of which was unknown; but, after enquiring into a few circumstances of their early days, I have generally found, that the *meconium* had not been properly discharged, or that some other essential points had been entirely overlooked by those to whom the first treatment of the child was entrusted. Nevertheless, kind Nature often relieves the suffering infant by a spontaneous effort.

Absurd Practices, &c.

Before the child is scarcely two months old, I have often had the mortification to observe, that over-wise

nurses begin to try experiments on its legs. As the bones, however, have not yet acquired sufficient firmness, it may be easily conceived what injury must be done to the formation and growth of the child, by attempts equally preposterous and detrimental.

No less absurd is the practice of confining infants for several hours in walking-machines, as well as the prevailing method of carrying them on *one* arm. Both the nurse and the child often experience the bad effects of this habit; the former may become side-bent or crooked, while the child is unnaturally compressed, so that its joints and bones cannot unfold their organic powers. I shall upon a future occasion, suggest a more rational, and proper method, of carrying infants, than is at present uniformly practised.

There are other very injudicious customs, which deserve severe animadversion. I allude to the strange habit of taking very young children to places of public worship or amusement; sending them to schools, with the view of making them sedate, or confining them, especially during cold weather, in hot and suffocating rooms. By such destructive means, the foundation is laid for that plethoric habit, which disposes them either to apoplectic or eruptive disorders, to convulsions, palsy, epilepsy, in short, to that very general irritability of the system which is the forerunner of consumption. If these effects do not always follow, we ought not to be less attentive to the causes which may imperceptibly produce them; for it is a remark which occurs to every reflecting observer, that the present generation displays an unaccountable debility, and incapacity to withstand the sensible changes of the weather, as well as the influence of the seasons. It seems, from the general conduct of nurses, almost doubtful, that fresh air, in whatever temperature, is the true balm of life.

The digestive organ of children is likewise subject to very furious assaults: their tender stomachs ought not to be measured by those of adults. And in this respect, neither the quantity, nor the quality of nutriment, is properly attended to:—tea, coffee, beer, and wine, all are more or less hurtful, and here generally misapplied. Nor are we sufficiently studious to contrive such exercise as is adapted to the age, strength, temperament, and inclination of the child. Farther, many parents feel an invincible desire to improve the infantile mind, at an age when such attempts cannot be realized, without producing

consequences felt by the child during the whole of its life;—they are anxious to exhibit the progress made by forward children in reading, in history, geography, arithmetic, &c.; not considering that every premature exertion is attended with the most dangerous effects. Thus, the access of the fluids towards the head is promoted; preternatural irritability of the whole nervous system, and a tendency to spasmodic strictures, are thereby occasioned; digestion is likewise impaired, or rendered weak and inactive for life; and lastly, early consumption, or dropsy of the head, terminates the calamitous scene.—"The ancient treatment of children," I have observed in the Introduction to my Lectures on Diet, &c. "being consecrated by time, must not be rudely and precipitately rejected; but old customs may be changed, by prudent and moderate management; and thus we may proceed from one step to another, in extending the boundaries of truth and reason. A *gradual* transition, from a defective to a better state of things, is commonly the most permanent. Let us first oppose the most dangerous notions and prejudices: the conquest of a *single* prejudice, if completely effected, is a triumph of no little moment, inasmuch as it will shake the foundation of many others, more or less connected with it."

There are, however, multitudes who smile with apparent indifference, at every new proposal, which is not suggested by their own mind; but such persons do not reflect, that no useful plan was ever executed, without having previously been started as a proposal; and that no good idea, however repugnant at first, has ever been wholly without its use, in the general mass of knowledge. Should we succeed in improving the corporeal management of infants, we may reasonably expect that their minds will also be improved. Yet, in this important attempt, more real good may be effected by deliberate action, and even occasional omission, than by continual, and officious interference.

Dangers to which helpless Infancy is exposed, when afflicted with Disease.

It is a melancholy, but indisputable truth, that of all patients, children are most neglected. Medical aid, I have before observed, is generally called in at too late a period; as the child is unable to give a distinct account of the disease, or to point out the seat and probable cause

of the complaint. Hence it may be explained, that our progress in the knowledge and cure of infantile disorders, has been remarkably slow, and is not likely to advance, unless we shall be aided by mothers, and guardians of families, instead of being thwarted by inveterate prejudices and customs.

When will the period arrive, that children shall be no longer entrusted to ignorant and superstitious nurses?—It requires no great sagacity to discover the difference between infants educated under the eye of a sensible mother, and those reared by mercenary agents. But as I propose to treat, in this Lecture, chiefly of the dangers attending the administration of medicines to young constitutions, I shall be under the necessity of dividing that subject into particular heads.

Previously to this division, I cannot pass over in silence, what has often appeared to me peculiarly striking in the treatment of diseased children; namely, that most persons are either too anxious, and officious, in removing their complaints, or they shew an almost culpable indifference; believing that the medical art, on such occasions, affords no relief. Others again are excessively partial to domestic remedies, or family-prescriptions, which, like the amulets of barbarous memory, are called in aid upon the slightest indisposition. They conceive it to be of little consequence, to attend to the particular constitution or temperament of the child, provided the remedy has been formerly found of service to others. If, however, medical advice should be asked, it is more with a view to procure instant alleviation of pain, than to await with patience the operation of the medicines. That domestic remedies may, in certain cases, be productive of good effects, cannot be denied; but I hope it is unnecessary to prove that they are *not* altogether harmless; or, if indiscriminately and improperly employed, that they must be attended with dangerous effects. For there is no substance in Nature, even among the different kinds of food and drink, which is so perfectly neutral or ineffectual, when introduced into the human body, that it is not more wholesome or pernicious at one time than at another. Nor is it possible to conceive the existence of any material substance, without attributing to it properties and effects, more or less consonant to the human body. Hence the flagrant absurdity of Nostrums advertised for the cure of infantile disorders; a speculation peculiar to the present age:—

our ancestors, however credulous and superstitious with respect to the influence of medicines on adults, did not encourage tha species of fraud, which has now been extended to the nursery, as well as to public and private infirmaries.

In order to explain the dangers attending such injudicious conduct, I shall divide the different medical remedies into two classes: first, such as are too frequently and incautiously employed; and, secondly, those which are considered as dangerous by the vulgar, but nevertheless deserve to be more generally introduced, when administered with due precaution. Of the former class are *purgatives, sudorifics, composing draughts* or *pills, expectorants,* and *tonics* or *bracing medicines.*—Of the latter, are *emetics, clysters, bathing, blisters,* and *chirurgical operations.*

1. *Purgatives, &c.*

Although Nature appears to have pointed out purgatives as useful remedies, they are liable to much abuse. In febrile attacks, coughs, worms, diseases of the eyes, &c. they are in general resorted to, without considering that the doses, as well as the propriety of taking them, ought to be maturely weighed, and accurately determined. A frequent repetition of laxatives obviously debilitates the body, and the oftener we attempt to evacuate, or, as it is pre-eminently called, to *cleanse* the bowels, the more certainly we lay the basis of a farther accumulation of impurities; and by removing a single symptom of a diseased habit, the body is rendered liable to continual morbid debility; it becomes extremely irritable, and susceptible of new affections, on the slightest occasion. Thus weakly children have often been treated with, and, as it were, fed upon medicines, till at length their constitution resembles a spoiled time-piece, which is of greater service to the artist than to its possessor.—The necessary consequences of frequent and violent cathartics, are translations of morbid matter to the internal parts, especially towards the breast and abdomen: hence we find, that so many children die of dropsical complaints, or, if they survive the age of puberty, they fall a sacrifice to consumption; because convulsions, spasms, and epileptic fits, had been contracted in their infancy, from the administration of laxatives. It is needless to increase the catalogue of these maladies; as prudent parents must be convinced, that the exhibition of a medicine is a very

serious and precarious attempt.—To lay down particular rules and directions, in what cases aperient remedies may be proper and necessary, would lead me too far from the outline of Introductory Lectures: these subjects must be discussed at a future opportunity.

2. *Sudorifics, &c.*

Sudorifics, are either such as promote the insensible perspiration, or occasion a perceptible exudation by the pores: the former cannot easily do mischief, but the latter, if injudiciously administered, may be attended with pernicious effects. This distinction, however, is not very material; as the effect of all diaphoretic remedies is different only in its degree, and this degree depends chiefly on the constitution of the patient; his natural disposition for such evacuation, his conduct during the operation, and other concomitant circumstances. It is therefore an erroneous notion, that diaphoretics, or sweating remedies, are always safe in eruptive diseases of children, or in rheumatic and catarrhal attacks. Dr. Sturve asserts, that he has observed the most obstinate swellings, and even dropsy, to arise from that hurtful practice; and as frequent and profuse perspiration debilitates the solids, it cannot fail to produce a strong tendency to pulmonary consumption, and hectic fevers. Hence it is particularly injurious in the following cases: 1. When the first passages are loaded with impurities; 2. In general relaxation of the body; 3. In plethoric children, or such as are very full of blood and humours; 4. In all diseases previous to what is called the crisis or coction of the fluids; and 5. If there is any other species of action, or evacuation from the body, taking place at the same time.

3. *Composing Draughts, Powders, or Pills,*

Resemble in some degree the sharp and dangerous instruments of the mechanic, which can be safely employed only by the master.—Want of sleep, and loud complaints, may indeed often induce parents and nurses to have recourse to anodynes, paregoric elixirs, and other opiates; but these expedients are the more objectionable, as they frequently become habitual; and though they should regularly cure one symptom of diseased action in the body, that of restlessness and pain, yet it is not in the nature of things, that they could uniformly effect a radical cure of the disease. On the contrary, they in general

stupify the heads of children, produce great relaxation and preternatural irritability, a sickly habit, and at length total imbecility, both of mind and body. Let us therefore keep a watchful eye over indolent and unprincipled nurses, who perhaps often poison our children with narcotics and soporifics, merely to indulge their own convenience.

PRESCRIPTIONS.

Electuary of Tin, for Worms.

Take Powder of tin, - - - - 3 ounces.
Confection of the dog-rose, - 3 drachms.
Syrup, a sufficient quantity.
Make an electuary.

In Tænia.—Dose, 1 to 2 ounces in the morning.

Worm Pills.

Take Soccotrine aloes, } of each, ½ drachm.
Extract of tansy, }
Oil of rue, - - - 12 drops.
Make 12 pills.

In Verminous Colic.—Dose, 1 night and morning.

Clyster for Ascarides, in Maw-worms.

Take Mixture of asafœtida, - - - 3 ounces.
Cows' milk, warm, - - 5 ounces.
Make an injection; to be taken every third night.

Worm Powder.

Take Jalap, - - - - - - 10 grains.
Submuriate of mercury, - - 3 grains.
Mix for a cathartic; to be taken the fourth morning after the electuary of tin; or where an electuary of cowhage has been given; or after the following:
Take Down of cowhage, - 6 to 10 grains.
Filings of tin, - - - 10 grains.
Mix them; to be taken night and morning, mixed with a little syrup.

Electuary for the Piles.

Take Confection of senna, - - 1½ ounce.
Precipitate of sulphur, - - ½ ounce.
Syrup of roses, a sufficient quantity.
Make an electuary. Doze, size of a nutmeg, three or four times a day.

Stomachic Pills.

Take Rhubarb, - - } of each, ½ drachm.
Nutmeg, - - - }
Extract of camomile, - - 1 scruple.
Oil of peppermint, - - - 5 drops.
Make 30 pills. Dose, three—as occasion may require.

Cathartic Powder.

1. Take Rhubarb, - - - ½ drachm.
Magnesia, - - - ½ scruple.
Oil of caraway.
Make a powder.

2. Take Scammony, - - - 5 grains.
Rhubarb, - - - - 15 grains.
Subcarbonate of ammonia, - 5 grains.
Make a powder; to be taken in some appropriate vehicle.

Cathartic Bolus, in Dropsy of the Legs, &c.

Take Extract of elaterium, - 1 to 2 grains.
Ginger, - - - - ½ scruple.
Oil of juniper, - - 3 drops.
Syrup of buckthorn, - - - 1 grain.
Make a bolus.

Opening Pills.

Take Compound extract of colocynthidis, - 1 drachm.
Purified opium, - - - - 3 grains.
Oil of nutmeg, - - - - 4 drops.
Make a mass, and divide into 12 pills. Dose, two every four hours, until the bowels are sufficiently opened.

ANTIDOTES TO VENOMOUS BITES.

THE following collection of antidotes was presented to the public, some time ago, through the medium of a Madras paper; and as far as some of the animated weapons of annoyance and danger are common to both countries, the practical utility of diffusing approved methods of counteracting them, will have a corresponding effect in treating, or more carefully avoiding their baneful influence.

Snakes and Scorpions.—The former of those reptiles of all the class, are by far the most to be dreaded by men; and as we are acquainted with no means of getting entirely rid of them, we must avoid them in the best manner we can; however, much may be done by keeping grounds clear of woods and long grass, clearing away the bottom of hedges, removing nests of white ants, to which snakes are very partial, removing, or not allowing collections of timber near a house, encouraging the abode of the mungouse about the premises, &c.

Scorpions commonly harbour about and under boxes, old papers and books, mud walls, and old timber; all of which should be occasionally examined, and cleared of their nests and young. Green lizards attack scorpions

eagerly. As we are not acquainted with any radical means of getting rid of these reptiles, we must endeavour to obviate the fatal tendency of their attack as much as lies in our power. Perhaps it may be matter of surprise, that no specific has yet been discovered for curing the bite of a snake, as we know that nature in her bounty has provided an antidote for every evil; and it is well known that the mungouse, the natural enemy of the snake, attacks these animals with impunity, by having recourse to a certain antidote of vegetable production, which is to be found every where, and is always at hand for their use. It may be matter of uncertainty whether the same vegetable production, taken by an human subject, would produce the same effect, of counteracting the baneful effects of snake poison as it does in the mungouse, as we are in possession of many substances that produce very different effects on animals of different constitutions, exemplifying the saying, that what is meat to one is poison to another. Whatever may be our ignorance concerning the real specific for snake poisons, I shall endeavour to give such information regarding the preventing the deleterious effects of the bites of these dangerous animals, as we are at present acquainted with.

The chymical analysis of the poisons of snakes and other venomous animals, has discovered them to be of an acid nature; and from this knowledge, remedies of an alkaline description have been recommended, to correct and obviate by decomposition their virulent effects. Tontana, an Italian chymist, who sacrificed many hundred vipers to his experiments, found the poison of a viper to be of a gummy nature, and to resemble in a great measure a solution of gum arabic; to be of a yellow colour, to have no taste, and when applied to the tongue, to produce a numbness.

In the event of a person being bit by a snake, no time should be lost in applying the proper remedies. The indications of cure should be three. 1st, In preventing the poison entering into the constitution of the body; 2d, The withdrawing or destroying the poison in the wound; 3d, The counteracting its baneful effects when it has entered the system. The first of these is to be effected by tying a very tight ligature, or garter twisted with a stick, above the wound about five or six inches, or over the first joint of the limbs; by these means the poisonous liquid may be prevented entering the circulation.

The second indication is that of applying topical remedies to the wound, either by the application of one's own mouth, or that of an assistant, for the purpose of withdrawing by strong suction as much of the poison from the wound as can be effected, and which will do no injury, either to the mouth or stomach of the person if swallowed; after which eau de luce, nitric or sulphuric acid, water of ammonia, or sal volatile, should be dropped into the wound as freely as possible, and the recess washed as completely out with it as can be accomplished.

The practical and beneficial effects of the application of ligatures and suction, is amply exemplified in the case of a soldier who was bit by a snake at Sydney, in New South Wales, which has appeared since writing the above, in the papers of India, and which is here extracted, to illustrate the subject:—

Sydney, March 22.—From a person on whose veracity we place the greatest reliance, we learn that a month ago a private of the Royal Veteran Company was bit by a snake in a pasturage adjoining Liverpool, where he was quartered. Struck with instant horror, and the certainty of a speedy dissolution, the sufferer fell instantly into a state of hopelessness and almost stupor; his body began to swell in a few minutes, and the first of his comrades who visited him, gave him over as lost. In the barrack there happened at the time to be an old native man, who immediately repaired to his assistance. From a bark he stripped a few shreds, and combining them into a strong ligature, applied it a little above the affected part, the bite being a little above the ancle.—He applied the ligature with such excessive strictness, that the patient supposed his leg had been taken off. This done, the native proceeded in rubbing the leg downwards with no less violence for some minutes, and then taking away with a knife, only as much of the skin as the punctures were apparent on, he applied his lips to the wounded part, and took away by suction a quantity of coagulated matter; then pronounced the cure, desiring the regenerated patient to go to his barrack, and keep himself quiet.—It proved effectual, for the man now lives: and, in gratitude to his black physician, gave him all he was possessed of, being to the value of about 5*l.* sterling.

The third indication is to be effected by exhibiting internally a tea-spoonful of eau de luce, water of ammonia, or sal volatile, in half a glass of cold water, every

five minutes, to create a strong and artificial stimulus, and thus to remove the languor and lethargy that immediately succeeds the bite; farther, by rubbing hartshorn on the temples and nostrils, by employing bleeding and electricity, and occasionally brandy, both externally and internally, with frictions of salt, and increased temperature of heat, and blankets; all those exciting means should be employed until the patient recovers, or until no further hopes are entertained of his recovery. The great object of these applications is to support the *vis vitæ*, or power of life, until the constitution, either by its own energy has overcome the virulent effects of the virulence of the imbibed poison, or the remedies exhibited, by mingling with it in the puncture, or meeting it in the circulation, may render it by decomposition inert or harmless. In discontinuing the remedies that have been recommended, a course of gradual diminution should be pursued, as they are apt to occasion by their effects a considerable degree of debility.

The following is a cure given by an intelligent gentleman of this presidency, with success, for scorpion stings, but I should think it equally applicable to snake bites.

Take a pinch of salt of hartshorn and put it on the bite, then drop on a few drops of nitric acid, which may be renewed in a few minutes if it does not succeed in relieving pain.

The application of a certain species of stone to the bites of scorpions and other venomous insects, has been long in use among the natives of the country, and with much effect, although Dr. John Davy, in a letter describing an analysis of some specimens procured in Ceylon*, seems to deny any virtues to them. This species of stone appears to be of a woody and spongy nature, and when applied to the liquor of animal poison, absorbs and imbibes it with avidity from the wound, and which again is easily separated from the stone by immersion in water, in the state of greenish thick fluid, mixt with a portion of blood. It is not to be denied, that this chemico-mechanical property of these stones effects very remarkable and instantaneous cures; and is a remedy not at all to be despised, but should be in every one's possession, either for their own use or for the relief of their domestics, and is to be preferred to their having recourse to the in-

* See Asiatic Journal, vol. vi. p. 475.

cantations and ceremonies of an old and wily moorman, or some superannuated sepoy, performed with an old slipper, and whose frequent failures never deter them from having implicit faith in so useless a remedy, not always without danger, as scorpion bites are sometimes said to have been fatal, especially if they proceed from the large black kind to be met with in the jungles.

Musquitoes, although the last, are not the least of the plagues of India. These insects are, as we all have found, particularly troublesome to new comers. Whether it is that their blood is sweeter, and contains less of the salt than those long resident in the country, is hard to say; but it is known that their bites, if numerous, produce on the former a fever sometimes as severe as that of the measles; and it is in this manner, we are told, that former kings of India used to put to death their nobles. Long as the world has been infested with these pests, it is a matter of surprise that there is not a popular remedy for curing or assuaging the effect of their bites. The best method, however, we are acquainted with is, the anointing the parts with almond oil or cold cream; or even cooling them frequently with a wet towel, often procures great alleviation of the intolerable pain. If there should be much swelling or inflammation, bathing the place with goulard water is the best remedy; and if sores or excoriations should appear, some cooling saturnine ointment should be employed, and the part gently anointed with it.

To remove these troublesome animals from an apartment, perhaps the best method would be to employ that which is practised for catching flies in England: namely, a piece of straw or wicker work, hung in the middle of a room from the ceiling, anointed with bird-lime, having a piece of woollen cloth suspended over it to attract the musquitoes—the cloth itself might also be daubed over with the lime; this will prove an effectual way of destroying numbers of them.

GAMING.

It is to be feared that a habit acquired in youth, more frequently than necessity, is the parent of gaming. A harmless game of cards, as it is termed, often repeated, may grow into a confirmed liking of the amusement. When Plato reproved a young man for playing at dice, "What! for such a trifle of money!'—'Custom,' replied Plato, 'is no trifle.'"

Secrets of Trade.—No. IX.

REFINED LIQUORICE.

1. Take Spanish-liquorice, - - - - 4 pounds.
   Gum arabic, - - - - - 2 pounds.
   Water, a sufficient quantity,

   Dissolve, strain, evaporate gently to a soft extract, roll into cylinders, cut into lengths; and polish by rubbing them together in a box: expectorant in coughs.
2. Take carpenters' glue and Spanish liquorice of each two pounds, with a sufficient quantity of water, and treat as above.

REMEDY FOR THE TOOTH-ACHE.

A remedy for this distressing complaint in much repute, is a solution of camphor in oil of turpentine—a fluid ounce of the latter will dissolve two drachms of the former.

REMEDIES FOR THE HOOPING-COUGH.

The various Quack remedies advertised for the cure of the hooping-cough, are either opiates, or medicines composed of the sulphate of zinc; and are always hurtful, from not being given at proper stages of the disease: an evil attendant on all nostrums.

RIGA BALSAM.

The true Riga Balsam *(Beaume de Carpathes)*, is procured from the shoots of the *Pinus Cembra*, previously bruised and macerated for a month in water. This same fir also affords *Briançon Turpentine*.

ROB ANTISYPHILITIQUE.

(Par M. Laffecteur, Medecin Chemiste).

This French popular nostrum contains, as a principal ingredient, corrosive sublimate. A strong decoction of the bulrush *(Arundo Phragmitis)* is made with the addition of *sarsaparilla*, and anise seed towards the end, which is evaporated and is made into a rob, or syrup, to which the sublimate is added.

ROCHE'S EMBROCATION FOR HOOPING-COUGH.

This stimulating application is simply olive oil mixed with about half its quantity of the oil of cloves, and a litle amber to scent it.

ROYAL PREVENTIVE.

This pretended preventive of venereal infection, is a solution of superacetate of lead: *i. e.* a little sugar of lead dissolved in water.

Housekeeping and Husbandry.—No. IX.

Housekeeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

PICKLING SALT.

Brown sugar, bay salt, common salt, of each two pounds; salt-petre, eight ounces; mix: gives a fine red colour, and renders meat or butter salted, very fine flavoured.

SWEET-SPICE.

Cloves, mace, nutmeg, sugar, cinnamon, equal parts: used in pastry.

SAVOURY SPICE.

Cloves, mace, nutmeg, pepper, salt, equal parts: used in cookery.

EPICES FINE. *(Fine Spices).*

Black pepper, five pounds and a half; cloves and nutmegs, of each one pound and a half; ginger, two pounds and a half; anise seed, coriander seed, three quarters of a pound; powder them together: used by the French sausage-makers.

KITCHEN PEPPER.

Ginger, one pound; cinnamon, black pepper, nutmeg, Jamaica pepper, of each eight ounces; cloves, two drachms; salt, six pounds: grind together.

FLOUR OF MUSTARD. *(Durham Mustard).*

The seeds of black mustard dried until they form a powder when bruised, then ground and sifted, to separate the husks or black skin of the seed, which does not form so fine a powder.

2. Flour of mustard and salt, equal parts.

3. Flour of mustard, wheaten flour, Cayenne pepper, common salt, in large proportion; pea-flour is sometimes used instead of wheat-flour, as also turmeric.

MUSHROOM POWDER.

Mushrooms, half a peck; onions, two; cloves as much as you please; mace, two drachms; white pepper, one ounce; expose to a gentle heat till the liquor the mushrooms yield be dried up, then dry on tins in a slow oven till they can be powdered.

CAYENNE PEPPER.

Capsicum berries and common salt, of each, one pound; grind together, and colour with vermillion; some use red lead, but this is injurious.

2. Capsicum a sufficient quantity, bury in flour, bake till they are dry enough to powder, then, holding them by a pair of pincers, cut them in small pieces: to each ounce add one pound of flour; water and yeast, a sufficient quantity to make them into small cakes; bake, slice the cakes, bake over again, powder the biscuit, and sift it.

CURRIE POWDER.

Coriander seed, eighteen ounces; black pepper, two ounces; Cayenne pepper, one ounce; turmeric root and cumin seed, of each three ounces; seeds of fœnugreek, four drachms.

2. Ginger, pimento, turmeric root, of each one pound; aromatic cloves, one ounce; Cayenne pepper and coriander seed, of each eight ounces.

3. Coriander seed, thirteen ounces; black pepper, five ounces; Cayenne, one ounce; fœnugreek seeds, cumin seeds, of each three ounces; turmeric, six ounces.

4. Coriander seed, one pound; turmeric, eight ounces; ginger, six ounces; cumin seed, Indian pepper, of each four ounces; black pepper, three ounces; cinnamon, lesser cardamoms, of each an ounce; black tamarinds, two pounds.

5. Rice, thirty-six pounds; turmeric, eighteen pounds; coriander seed, sixteen pounds; cumin seed, nine pounds; mustard flour; black pepper, twenty-eight pounds; Cayenne pepper, three pounds eight ounces.

6. Coriander seed, turmeric, of each four pounds; pimento, Cayenne pepper, capsicum berries, of each one pound; lesser cardamom seeds, four ounces; mace, cloves, cinnamon, one ounce of each, *used as a seasoning to meat.*

RHEUMATISM.

Mr. Coxe, in the fifth volume of his travels into Poland, &c. mentions, that the peasants of Norway use the following remedy, as effectual in rheumatic cases: they prepare a decoction of oak leaves in beer, and apply a cloth, dipped in the decoction, to the part affected. A remedy unquestionably simple and harmless, if not really effectual.

PLAIN DIRECTIONS FOR FAMILY-BREWING, ON ECONOMICAL AND SALUTARY PRINCIPLES, &c.

EVERY person intending to brew for himself, must be careful to see his malt measured and ground; by no means trusting to the corn-chandlers, who frequently impose both in quality and quantity, on those who are so incautious as not to see their malt measured and ground in their own presence.

The tubs and vessels intended for use, must be carefully inspected, and proved to be free from dirt or taint, as the least defect of that nature may distaste a whole brewing.

The mash-tub should be particularly attended to; and a whisp of clean hay or straw put over the end of the vessel in the inside, to prevent the malt running off with the liquor. The malt being emptied into the mash-tub, and the water brought to boil, dash the boiling water in the copper with cold water sufficient to stop the boiling, and leave it just hot enough to bite smartly upon your finger: a few trials will enable any person to be exact upon this head. Brewers use a thermometer containing 212 degrees, which is boiling heat: the first mash is usually taken at 180 hot, and the second 190 hot; but as few persons will have opportunity, or afford expence, to purchase a brewing thermometer, the foregoing rule will be found sufficiently instructive, by a little practice, always remembering to draw off your second mash somewhat hotter than the first. The water being thus properly brought to a temper by the addition of cold water, lade it out of your copper over the malt, till it becomes thoroughly wet, mashing it well, to prevent your malt clotting; when the water goes on too hot, it sets the malt, and closes the body of it, and when that happens, it is difficult to recover it, which can only be done by adding cold water. By setting the malt, is to be understood, its closing the body of the grain, instead of opening it so as to dissolve in the liquor. Cover up your mash-tub close, to compress the steam, and prevent the heat from evaporating: in small quantities this should carefully be regarded, in larger ones it does not signify so much.

Let the wort stand after mashing an hour and a half or two hours, then let the liquor run off into a vessel prepared to receive it; if at first it runs thick and discoloured,

draw off one or two pails full, and pour it back again into the mash-tub, to refine again till it runs clear.

In summer it will be necessary to put a few hops into the vessel which receives the liquor out of the mash-tub, to prevent its turning sour, which the heat of the weather will sometimes endanger. Let your second mash run as before, and let the liquor stand an hour and a half, then run it off; but never let your malt stand dry; keep lading fresh liquor over it till the quantity of wort you wish to get is extracted, always allowing for waste in the boiling. The next consideration is boiling of the wort. The first copper-full must be boiled an hour, and while boiling add the ingredients, except ginger and cocculus berries, mentioned in the receipt. The hops are now to be boiled in the wort, but to be carefully strained from the first wort, in order to be boiled again in the second; eight pound is the common proportion to a quarter of malt, but in summer, the weather being hotter, the quantity must be varied from eight pound to twelve pound, according to the heat of the air. After the wort has boiled an hour, lade it out of the copper and cool it, keeping it as thin as possible to cool it quicker; in summer it should be quite cold before it is set to work; in winter it should be kept till a small degree of warmth is perceptible by the finger. When properly cooled, set it to work; add yeast in proportion to your wish to bring it forward. If you want it to work quick, add from one gallon to two; but observe porter should be brought forward quicker than any other liquor except twopenny; let it work till it comes to a good deep head, then cleanse it by adding the ginger. Your liquor is now fit for barrelling, which must be done carefully; fill your barrels full, and let the yeast work out, adding fresh liquor to fill them till they are quite full and have done working; then bung your barrels, but keep a watchful eye upon them for some time, lest the beer should suddenly ferment again, and burst them, which is no uncommon accident where due care is not taken: heat of summer, or sudden change of weather, will occasion the same misfortune, if your barrels are not watched and eased when they require it, by drawing the peg. The only part which now remains to complete your brewing, is fining your beer; to understand which, it is necessary to remark, that porter is composed by brewers of three different sorts of malt—pale, brown, and amber: the reason of using these three sorts, is to attain a peculiar

flavour and colour. Amber is the most wholesome, and I would recommend to use nothing else. In consequence of the subtleness of the essentia, which keeps continually swimming in the beer, porter requires a considerable body of finings; but should any of my readers choose to brew without essentia, with amber malt, and with colour only, their porter will refine of itself very soon. Some, however, will perhaps follow the exact receipt, and therefore I mention that finings are composed of isinglass dissolved in stale beer, till the whole comes to a thin gluey consistence like size, and which must be used discretionally; one pint is the usual proportion to a barrel, but sometimes two, and even three, are found necessary. Particular care must be taken that the stale beer in which the isinglass is dissolved be perfectly clear and thoroughly stale.

By attending to these directions, any person may brew, as good, if not better porter than can be supplied from the publicans. Many notions have been artfully raised in the public mind, that porter requires to be brewed in large quantities, and to be long stored to render it sound and strong; but let any impartial person give this receipt and these rules a fair trial, and experience, the surest of all guides, and the best of all instructors, will prove the falsehood of those prejudiced conceptions, which have had their origin with the ignorant, and have been cherished by the interested. One brewing under another will afford ample time for porter to refine for use, and every person can best judge of the extent of his consumption. Porter is not the better for being brewed in large quantities, except that the same trouble which brews a peck will brew a bushel; and it is known by experience, that a peck of malt brewed over a fire in a kettle or a saucepan, under the guidance of these rules, will produce porter as good and as wholesome as that which is usually paid for at the public-house; and if but one industrious family in ten throughout this great metropolis, and in the many large towns where porter is now brewed, is induced to try the experiment, I have no doubt of their continuing themselves, and recommending to others, a practice which will be found simple and easy in its operations, essentially useful in point of health and convenience, and extremely moderate in point of trouble and expence.

Having thus clearly explained the nature, ingredients, and composition of porter, together with a certain method of brewing it, even in the smallest quantity, I shall give

a receipt for ale, twopenny, and table-beer. What is to be said upon each will be very short, because the same method in almost every respect as I have previously laid down for porter, is to be pursued. It is only necessary to observe, that the gains of the common brewers who have opportunities and finances to buy the various articles in large quantities, must be enormous to a degree, when the savings of a small family are so considerable.

The following proportions will be found exact for brewing one barrel of ale.

	£	s.	d.
Malt, 2½ bushels - - - - -	0	15	0
Hops, 2½ pounds - - - - -	0	3	0
Sugar just boiled up, allowing for fire and trouble in preparing, 3 pounds - - - - -	0	2	6
Capsicum, 1*d.* coriander-seeds, 1*d.* - -	0	0	2
Cocculus Indicus, 1*d.* salt, 1*d.* - -	0	0	2
	£1	0	10

The small beer, after your ale is brewed, is supposed an equivalent for coals.

	£	s.	d.
A barrel of ale 128 quarts, at 5*d.* per quart bought at the publican's - - - - -	2	13	4
Ditto brewed at home - - - -	1	0	10
Clear gain - - - - - -	£1	12	6

Observations on Ale.

Ale is generally brewed from pale malt, but that is merely an optional point; some persons preferring brown, some amber ales.

The capsicum and coriander-seeds are to be boiled in the wort; observe the method of boiling, mashing as in porter; but let ale stand to work two or three days, and beat it up well once or twice a day: when the head begins to fall, cleanse it by adding a handful of salt, and a little flour mixed up with the cocculus Indicus; then proceed to barrel it according to the foregoing directions.

The only article which deserves particular attention in the composition of ale, is the coriander-seed, which, though in appearance a simple and almost tasteless berry, is of a vehemently poisonous and stupifying quality. Some idea may be formed of its effects, when chymical experiment has proved to us, that one pound of coriander-seeds equals in strength and stupefactive quality one bushel of malt; it is not therefore to be presumed that

those who brew for themselves will use an ingredient, which can only have been introduced into the composition of ale, to satisfy an avaricious desire of an unjust gain.

Twopenny is an article not formed to keep, and is not likely to be brewed by any person for his own consumption; the following sketch of the proportions of one barrel, is inserted only to gratify public curiosity, and conduce to general information in the art of brewing.

Twopenny—One Barrel.	£	*s.*	*d.*
Malt, 1½ bushel	0	9	0
Hops, 1 pound	0	1	9
Liquorice-root, 1½ pound	0	1	6
Capsicum, ¼ ounce	0	0	1
Spanish liquorice, 2 ounces	0	0	3
Treacle, 5 pounds	0	1	3
	£0	13	10
One barrel of twopenny paid for at the publican's, 128 quarts, at 4*d.*	2	2	8
Brewed at home, coals included	0	14	6
Clear gain	£1	8	2

It is sufficient to observe of this liquor, that it requires no storing, being frequently brewed one week and consumed the next: its principal property as an article of trade, is turning money over quicker than any other.

You will observe, the quantity of capsicum in one barrel of twopenny is as much as is commonly contained in two barrels of porter; this readily accounts for the preference given to it in cold winter mornings, as a warmer to the stomach.

Twopenny works also remarkably quick, and must be carefully attended to in the barrels.

Table-beer may be serviceable to a large Family, and therefore the Estimate is given upon a larger proportion.

Table Beer—Ten Barrels.	£	*s.*	*d.*
Malt, 1 quarter	2	2	0
Hops, 8 pounds	0	9	4
Colour, 8 pounds	0	6	8
Spanish liquorice, 8 ounces	0	0	8
Treacle, 10 pounds	0	2	6
Coals	0	4	0
	£3	5	2
Ten barrels at 16*s.* per barrel, bought	8	0	0
Ten ditto brewed at home	3	5	2
Clear gain	£4	14	10

*** Liquorice-root and other flavours may be added. What are here inserted, are only the most general, and, (as some suppose) indispensable requisites.

Analysis of Beer, &c.

Having thus completed the general receipts and instructions for procuring the several liquors, it may not be amiss, to promote general knowledge, to give a slight sketch of the properties of each article, that every person may choose his own ingredients, and increase or decrease their various proportions, as may best suit his taste, opinion, or convenience.

Malt—is a wholesome nutritious grain, containing a soft balsamic, oleaginous essence, highly agreeable to the palate and healthful to the constitution; but by no means intoxicative, except when used in very large quantities. The intoxicating qualities of porter are to be ascribed to the various drugs intermixed with it; it is evident some porter is more heady than other, and it arises from the greater or less quantity of stupefactive ingredients. Malt, to produce intoxication, must be used in such large quantities as would very much diminish, if not totally exclude the brewer's profit, when porter is retailed at seven farthings the pint.

Pale Malt—is most nutritive, being, from the tender method of drying it, nearest to the original barley corn; it likewise contains more of the alcalous and balsamic qualities than the brown malt, which enduring a greater degree of fire in the kiln, is sometimes so crusted and burnt, that its mealy part loses a great share of its essential salts and vital properties.

Amber Malt—is that which is dried in a middle degree, between pale and brown, and is now much in use, being the most pleasant, and free of either extreme. I would therefore recommend the use of it.

Hops—are an aromatic grateful bitter, very wholesome, and undoubtedly efficacious in giving both flavour and strength to the beer.

Yeast—is necessary to give the liquor that portion of elastic air, of which the boiling deprives it. Observe, without fermentation or working, no must or worts, however rich, can inebriate.

Sugar—is a pleasant nutritive extract, and forms the main body of beer, when boiled to a proper temper for essentia, and for what is called colour: it answers both for malt and hops, being in part an agreeable, sweet, and

in part a pleasant bitter. Sugar is likewise a keeper of beer, and gives it that substance which improves with age; it is likewise a cheap substitute for malt, 6lb. being, as was before observed, equal to one bushel of malt. I would therefore advise every person to use sugar prepared for colour: the essentia I leave optional.

Liquorice-root—is pleasant, wholesome, keeps the body gently laxative, and opposes the costive quality of some of the other ingredients; it ought therefore to be used, as should Spanish liquorice, which is of the same quality: porter is said to feed people inclining to corpulency; nothing is more necessary than to keep the body regular, and therefore liquorice is doubtless one of the most salutary ingredients of porter, carrying off the pernicious effects of the other compounds, and producing that regular habit which is the foundation of corpulency.

Capsicum—disperses wind and crudities caused by indigestion; properly used, it cannot be unhealthful: it leaves a warm glow on the stomach, which is perceptible on drinking some beers: but it should be carefully made use of.

Ginger—has the effects of capsicum; it furthermore cleanses and flavours beer; but capsicum being cheaper is more used, and by its tasteless, though extremely hot quality, cannot be so readily discerned in beer as ginger.

Treacle—partakes of many of the properties of liquorice, is a laxative, and inclines to gentle perspiration: by thus promoting the natural secretion, it must be a principal mean of rendering porter and beer in general wholesome and healthy. Treacle is also a cheaper article than sugar, and answers the purposes of colour, where the beer is intended for immediate consumption: but in summer, where the body is required to withstand the temperature of the air, and the draught is not so quick, sugar alone can give body to porter. Treacle will therefore be a discretionary article.

Coriander-seed—used principally in ale, is pernicious, not to say poisonous in the highest degree; and the use of it affords one of the many proofs of the little regard paid to the health of society by interested persons.

Cocculus Indicus—commonly called occulus India berries, is poisonous, stupefactive, and unlawful; but being of excessive strength to attack the head, and when

ground into a fine powder, undiscoverable in the liquor, is but too much used, to the prejudice of the public.

Heading—Salt of steel is the most proper, though not to be recommended; but a mixture of alum and copperas, being much cheaper, has obtained the preference. Alum is a great drier, and causes that thirst which some beers occasion, so that the more you drink, the more you want. Alum gives likewise a smack of age to beer, and is penetrating to the palate. The properties of copperas are well known as dangerous and destructive, and therefore need no comment.

Salt—is highly useful in all beers; it gives a pleasing relish, much as it does to meat, and also fines the liquor.

Having thus analyzed beer, and presented its various component parts to the public view, we shall leave a choice to every individual to prepare it to his own taste. When a man has been long blind, and has his eyes opened, it does not often happen that he walks into a ditch.

Here however, further to promote general information, it must be added, that by Act of Parliament, no common brewer shall have in his house or brewhouse, more than 10lb. of sugar or treacle, under the penalty of 100*l.*; but the public need not be told how easy it is for those who have large detatched warehouses, cooperages, &c. &c. to make compounds, or prepare any ingredients, where excisemen and informers have no access; and as the persons employed in their preparation are subject to the penalties of the law, it will cease to be wonderful that no information takes place. It is not therefore men of large capitals who are endangered by this act, but small beginners, who have not conveniences to prevent discovery, and yet cannot get a livelihood without disobeying the injunctions of the legislature of the country.

We shall now conclude with recommending to all persons to make the experiment, feeling persuaded they will be convinced of the propriety of brewing for themselves; they can suit themselves in taste, in strength, in flavour, in quantity; they will have beer much cheaper; they will have it more wholesome. Every person may judge of his own taste in beer. Grains of paradise, which are of a warm and pleasant quality, cardamom-seeds, and cinnamon, linseed, allspice, and a variety of flavours, may be chosen by different persons. Much unnecessary time spent in public-houses will be saved, much unprofitable discourse avoided,

much waste of liquor prevented;—malt and hops may be had any where, sugar is not difficult to be got; and here perhaps may be seen the reason of the increased demand for sugar of late years, since porter has become an article of exportation, and is brewed in almost every considerable town and city in England. The other necessary articles are neither scarce nor dear, so that no reasonable objection can be urged against the plan. Women can perform the task, and in families where the wife has not much to do, brewing will be both a profitable and pleasurable employment; nothing can be easier. Women are the chief home-brewers throughout England; and I have endeavoured to render every part intelligible and easy to the meanest capacity. Many books apparently written to instruct, are really intended to blind, perplex, and confound. Most books on brewing are of that stamp. Brewing has been a species of monopoly, and monopolists are always avaricious. Should it be urged that brewing upon this plan would diminish the revenue, we answer, it would not. The increased consumption of malt and sugar, which both pay heavy duties, would more than counterbalance the loss of the excise, and the saving made in small hard-working families would be a comfortable relief, and prevent much of that spirit of complaint which now pervades the nation. The only persons who might, and that is all chance, sustain an injury, would be great, brewers who have large fortunes, and small publicans, which the legislature and police seem apparently equally anxious to diminish.

ESSENCE OF SPRUCE,

Is prepared by boiling the twigs of Scotch fir in water, and evaporating the decoction till it grows thick: used to flavour treacle beer, instead of hops.

ESSENCE OF MALT,

Is prepared by infusing malt in water (first boiled and then cooled till it reflects the image of a person's face in it), pouring off the infusion, and evaporating it to the consistence of new honey: used in sea voyages, and places where malt cannot be procured to make beer.

BLACK EXTRACT. *(Hard Multum).*

From cocculus Indicus, by decoction in water, and evaporation to a stiff tenacious mass; narcotic, intoxicating, used in brewing.

Obs.—To make extracts smooth, chymists sometimes

add to each quarter of a hundred weight, one pound of gum arabic, and a pint of olive oil.

2. Or to every three pounds add a little gum, two drachms of olive oil, and one drachm of rectified spirit, which will give it a gloss.

The Toilette.—No. V.

TRANSPARENT SOAP.

DISSOLVE almond soap in spirit of wine, filter, and distil off the spirit.

WHITE WASH BALLS.

White soap, six pounds; starch, three pounds; rose water, eight ounces; rosemary water, four ounces; camphor, four drachms; odoriferous species, two ounces.

2. White Spanish soap, one pound; rose water, three pints; the white of two eggs; liquor of potash, one ounce; boil till hard again; add oil of rhodium, one scruple; oil of cloves, ten drachms; essence of jessamine, one drachm; essence of neroli, half a drachm; and form into squares.

3. White soap, six pounds; Florentine orrice-root, four ounces; starch, three ounces; styrax, one ounce; rose water, a sufficient quantity.

4. White Spanish soap, one pound; blanched almonds, beat up into a paste with rose water and orange-flower water, three ounces; magistery of bismuth, one ounce; prepared kali, two drachms; musk, six grains; civet, three grains; oil of rhodium, one scruple; essence of jasmin, one drachm.

5. White soap, starch, of each one pound; essence of lemons, four drachms; rose water, eight ounces: make into balls of three ounces and a half each.

WASH FOR STRENGTHENING THE TEETH AND GUMS.

Take Lemon juice,	} of each,	½ ounce.
Port wine,		
Sulphate of quinine,		10 grains.
Essence of bergamot,		3 drops.

Mix, and keep in a well-stopped vial for use. A piece of soft linen rag dipped in this wash, and the teeth and gums moistened with it, after they have been previously cleaned by some powdered charcoal, or other equally simple dentifrice, is the manner of using it.

LINIMENT FOR BALDNESS.

Take Spirits of hartshorn,	½ ounce.
Olive oil,	1 ounce.
Eau de Cologne,	1 drachm.

Mix, and apply to the head twice or three times a day, for three months.

*** If the head is very greasy, the spirits of hartshorn alone, or mixed with half the quantity of pure water, rubbed upon the head once a week, will effectually clean the hair, and render it strong and glossy.

OIL FOR THICKENING THE HAIR.

Take Palma Christi oil, - - - -	1½ ounce.
Oil of lavender, - - - - -	½ drachm.

*** Apply morning and evening for three or four months, to those places where the hair is wanting, in consequence of a deficiency of moisture in the skin.

HUMOROUS RECIPE FOR A PHYSICIAN.

[The following *jeu d'esprit* was written by the late ingenious Paul Whitehead to his friend Dr. Thompson, Physician to Frederick Prince of Wales. This eminent practitioner was a man of wit, learning, and liberality; but so great a sloven, that he seldom had his shoes cleaned, which he generally bought at a Yorkshire warehouse, wore them till his feet came through the leather, then shook them off at the same place, and purchased a new pair; and thus he did with all his other habiliments.]

Let not the soil of a preceding day be ever seen on your linen; since your enemies will be apt to impute it rather to an unhappy scarcity of shirts than any philosophical negligence in the wearer of them.

Let not father Time's dilapidations be discoverable in the ragged ruins of your garments; and be particularly careful that no more holes appear in your stockings than the weaver intended; that your shoes preserve the symmetry of two heels; and that your galligaskins betray no poetical insignia; for it will be generally concluded he has very little to do with the repair of others constitutions, who is unable to preserve that of his own apparel.

Let your wig always swell to the true college dimensions; and, as frequently as possible, let the apothecary bob give way to the graduate tye; for, what notable recommendation the head often receives, from the copiousness of its furniture, the venerable full bottoms of the bench may determine.

Thus dressed, let your chariot be always ready to receive you; nor be ever seen trudging the streets with an Herculean oak, and bemired to the knees; since an equipage so unsuitable to a sick lady's chamber will be apt to induce a belief that you have no summons thither.

Forbear to haunt cook-shops, hedge-alehouses, cyder-cellars, &c. and to display your oratory in those inferior

regions; for, however this may agree with your philosophical character, it will by no means enhance your physical one.

Never stay telling a long story in a coffee-house, when you may be writing a short recipe in a patient's chamber; and prudently consider, that the first will cost you sixpence, while the last will gain you a guinea.

Never go out in the morning without leaving word where you may be met with at noon; never depart at noon without letting it be known where you may be found at night; for the sick are apt to be peevish, and impatient; and remember, that suffering a patient to want you, is the ready way for you to want a patient.

Be mindful of all messages, punctual to all appointments, and let but your industry equal your abilities; then shall your physical persecutors become abashed, and the legions of Warwick-lane and Blackfriars shall not be able to prevail against you.

Lastly, read these rules every morning over your tea, and I fancy you will find yourself mend upon it.

SOME OBSERVATIONS ON THE CAUSE OF RABBITS, &c. EATING THEIR YOUNG.

BY MR. H. M. BROWN, OF BANBURY.

Mr. B. believes, that what appears to be a propensity, is nothing more than a necessitous, though truly unnatural, act.

That it is done to satiate the thirst induced by the febrile state of parturition, which thirst they, in consequence of their confinement, have not the natural power to allay. Hence the horrid alternative of sacrificing their young, an extremity to which they are never driven in a state of nature.

Mr. B. observes, "I have had rabbits which have been sold me cheap, in consequence of this seeming proneness to eat their young, which I have entirely avoided by allowing the animal some short time anterior, at the time, and for a week or so after parturition, to drink freely of cold water; and when I have taken this precaution, no such propensity ever evinced itself in the least; and that cold water is in no way injurious, and the animal appears wonderfully gratified by it."

The preceding remarks go to prove, that the propensity is in fact one which has necessity for its origin; and that

of the most imperious nature. Hence it is recommended to all who may have suffered from this cause, to supply the parturient animals with as much cold liquid as they require or can drink.

ANECDOTES ON, AND REMEDIES FOR, OFFENSIVE BREATH.

NOTHING is more common in society, than to meet with persons having a very offensive breath, which is extremely disagreeable to those under the necessity of associating with them; a circumstance to which the following Anecdotes relate.

A nobleman, who laboured under this infirmity, affected to say nothing to a lady who paid him a visit. The lady offended, determined to be revenged for this insulting silence, called the servant and said, "See whether your master be not dead; for my part, I think he is, for he stinks, and is speechless."

A man, standing in the pit of a French Theatre near a musqueteer who had an offensive breath, asked him "what piece was to be performed?" The soldier replied briskly, "Do you take me for a play-bill?" "The bill would be a very dirty one," retorted the other. On this answer they went out, and were immediately sword in hand. The countryman, hesitating a moment, said to his antagonist, "Take care, Sir, what you are going to do; if you kill me, you will not stink a whit the less; but if I kill you, you will stink a great deal more." This repartee produced a laugh, and they shook hands.

A woman reproached Hiero, tyrant of Syracuse, with having an offensive breath. Hiero said nothing; but complained to his wife that she had never told him of this infirmity. "I thought," said this virtuous woman, "that all men's breath smelt so."

After the hyperbolical manner of the Orientals, they said, that the breath of Abdelmalech, fifth Caliph of Bagdad, who conquered Mecca, Medina, and part of India, was so infectious, that it proved instant death to the flies that settled near his mouth.

Cardan, in his book *De Subtilitate*, says, that a brother of the King of France, who was afflicted with an ulcer (he does not tell where situated), was perfectly cured by the breath of a child twelve years of age, who slept with him.

He remarks, that the breath of persons advanced in life is offensive from the diminution of the vital heat, in consequence of which crudities accumulate in the stomach.

The heat of the breath of the Esquimaux and Greenlanders is so great, that it renders the huts in which they live as warm as a stove, and quite insupportable to an European; so that the inhabitants of the coldest country in the world are absolutely ignorant of the use of a chimney.

Bensarade being one day in a company where a young lady, who had an offensive breath, was singing very loudly; after she had finished said, "There is a fine voice, and excellent words, but the *air* is abominable."

The cause of the breath being offensive, is not so often to be ascribed to disease, as to intemperance and irregular living—thus, a person in good bodily health, whose lungs are sound, and perfectly in tune, may have a very disagreeable breath, from drinking and habitual smoking. People who never clean their teeth are subject to the same inconvenience, from animal decomposition taking place betwixt them—the accumulation of tartar and other incrustations disguising and degrading the enamel. Caries or hollow teeth, are not so much the cause as the effect, of offensive breath. Whenever these exist they should be plugged as early as convenient, to prevent them from enlarging and affecting those contiguous to them.

To palliate, and frequently to prevent this inconvenience, washing the mouth every morning with some antiseptic powder, as charcoal, or tincture, as that of myrrh or of Peruvian bark, previously washing the mouth out with water, and retaining the taste of the former until it gradually dissipates of itself, or rubbing the teeth with a dry cloth and bark in powder, will tend considerably to improve the breath: taking occasionally a table spoonful of the following:

Camphor mixture, - - - - - -	7 ounces.
Tincture of myrrh, - - - - -	1 ounce.
Tincture of bark, - - - - -	½ ounce.
Aromatic spirit of vinegar, - - -	1 drachm.

With which also the teeth may be washed.

Chewing a piece of mastich, also corrects the fetor of the breath. And when it is a consequence of continual feverish heat, attention should be paid to the state of the bowels, by the frequent use of gently cooling aperients. —See remarks on the preservation of the teeth and gums, p. 421.

CORNARO'S SECRET OF LONG LIFE—RESTORATIVE PROCESS —OBSERVATIONS ON THE PULSATION OF THE HEART, &c.

THE secret of Cornaro's longevity seems to have been, a gradually increasing temperance, "*in omnibus,*" and probably, after a certain time of life, abstinence from the "*opus magnum.*"

The source of physical and moral Health, Happiness, and Longevity,—

> "Reason's whole pleasure, all the Joys of Sense,
> Lie in three words—Health, Peace, and Competence.
> But Health consists in Temperance alone;
> And Peace, Oh Virtue! Peace is all thy own."—POPE.

Intensive Life can only be purchased at the price of *Extensive.*—If you force the heart to gallop as fast during the second, as it does during the first stage of life, and make the steady fire of 42 to blaze as brightly as the flame of 21, it will very soon be burnt out.

Those who cannot be content to submit to that diminution of action ordained by Nature, against which there is no appeal,—as it is the absolute covenant, by the most attentive and implicit observance of which we can only hope to hold our lease of life comfortably,—will soon bring to the diminished energy of the second stage of life, the paralysis of the third.

"The length of a man's life may be estimated by the number of pulsations which he has strength to perform. Thus, allowing 70 years for the common age of man, and 60 pulses in a minute for the common measure of pulses in his whole life, would amount to 2,207,520,000; but if, by intemperance, he forces his blood into a more rapid motion, so as to give 75 pulses in a minute, the same number of pulses would be completed in 56 years; consequently, his life would be reduced 14 years."

From 40 to 60, a witty French author tells us, is "*La belle saison* pour la Gourmandise;*" for the artificial pleasures of the palate, it may be, and the *bon vivant* cultivates them as the means of prolonging the vigour of youth, and procrastinating the approach of age.

Restoration may certainly be considerably facilitated, by preparing and dressing food so as to render it easily

---

* And for culinary operators from 25 to 40. Before the former, they can hardly accumulate sufficient experience; and after the latter, they every day lose a portion of their "*bon goût*" and activity.

soluble; if the secret of rejuvenization be ever discovered, it will be found in the kitchen.

Very soon after we pass the *Meridian of Life* (which, according to those who train men for athletic exercises, and to Dr. Jameson*, is our 28th, and to Dr. Cheyne, about our 35th year), the elasticity of the animal system imperceptibly diminishes, our senses become less susceptible, and are every hour getting the worse for wear, however self-love, assisted by your hair-dresser and tailor, &c. may endeavour to persuade you to the contrary. Digestion and sleep are less perfect—the restorative process more and more fails to keep pace with the consuming process—the body is insufficiently repaired, more easily deranged, and with more difficulty brought into adjustment again; till at length, the vital power being diminished, and the organs deteriorated, nourishment can neither be received, nor prepared and diffused through the constitution, and consumption so much exceeds renovation, that decay rapidly closes the scene of life.

One may form some idea of *the self-consumption of the human body*, by reflecting that the pulsation of the heart, and the motion of the blood connected with it, takes place 100,000 times every day; *i.e.* on an average the pulse† beats 70 times in a minute,

multiplied by 60 minutes in an hour,

4200

24 hours in a day,

16800
8400

100800 pulsations in a day.

---

* See his sensible Essay on the Changes of the Human Body at different Ages. 8vo. 1811, p. 89.

† "The Pulse in the new-born Infant, while placidly sleeping, is about - - - - - - 140 in a minute.

Towards the end of the First Year - - -	124
Towards the end of the Second Year - - -	110
Towards the end of the Third and Fourth Years -	96
When the first Teeth drop out - - - -	86
At Puberty - - - - - - -	80
At Manhood - - - - - - -	75
At Sixty, about - - - - - -	60"

BLUMENBACH'S *Physiology*, p. 40.

What machine, of the most adamantine material, will not soon be the worse for wear, from such incessant vibration, especially if the main-springs of it are not preserved in a state of due regulation?

The generative faculties, which are the last that Nature finishes, are the first that fail. Economy in the exercise of them, especially before and after the second stage of life, is the grand precept for the restoration and accumulation of strength, the preservation of health, and the prolongation of life;—we are vigorous, in proportion to the perfection of the performance of the restorative process, *i.e.* as we eat hearty, and sleep soundly; as our body loses the power of renovating itself, in like ratio fails its faculty of creating; what may be a salutary subduction of the superfluous health of the second, during the third period of life will be a destructive sacrifice of the strength of both the mind and the body.—See also the 9th chapter of the first edition of WILLICH *on Diet*, 8vo. 1799.

The next organic defect (we perceive too plainly for our self-love to mistake it) is manifested by the eye. To read a small print, you must remove it from the eye further than you have been accustomed to do, and place it in a better light.

The falsetto voice now begins to fail, and the ear loses some of its quickness; several extraordinary musicians have been able till then, if a handful of the keys of a harpsichord were put down, so as to produce the most

---

The expectations of Life are thus calculated by De Moivre: Subtract the age of the person from 86; half the remainder will be the expectation of that Life.

The following Table, founded on experience, may serve as a proof of the relative duration of Human Life at present:

Of 100 men who are born,
50 die before the 10th Year,
20 between the 10th and the 20th,
10 between the 20th and the 30th,
6 between the 30th and the 40th,
5 between the 40th and the 50th,
3 between the 50th and the 60th;
Therefore, 6 only live to be above the age of 60.

Haller, who collected the greatest number of instances respecting the Age of Man, found the relative duration of Life to be on the following proportion:
Of men who lived from 100 to 110 Years, the instances have been 1000,
Of from 110 to 130 - - - - - 60,
120 to 130.

HUFFELAND'S *Art of Prolonging Life*, vol. i. p. 178.

See also "*Long Livers*," 8vo. 1722; and EASTON *on Human Longevity*, 8vo. 1799.

irrelative combinations, to name each half note without a mistake. When I mentioned this to that excellent organ player, Mr. Charles Wesley, he said, "At the age of 20, I could do it myself—but I can't now." He was then in his 55th year.

About the same time, the palate is no longer contented with being employed as a mere shovel to the stomach; and as it finds its master becomes every day more difficult to please, learns to be a more watchful purveyor.

After 40, the strongest people begin to talk about being *bilious,* or *nervous,* &c. &c.; the stomach will no longer do its duty properly, unless the food offered to it is perfectly agreeable to it; when offended, *indigestion* brings with it all that melancholy depression of the animal spirits, which disables a man from either thinking with precision, or acting with vigour, during the distressing suspension of the restorative process—arise all those miseries of mind and body, which drive fools to get drunk, and make madmen commit suicide. Without due attention to diet, &c. the third period of life is little better than a chronic disease.

As our assimilating powers become enfeebled, we must endeavour to entertain them with food so prepared, as to give them the least trouble, and the most nourishment*.

In the proportion that our food is restorative, and properly digested, our bodies are preserved in health and strength, and all our faculties continue vigorous and perfect. If it is unwholesome, ill-prepared, and indigestible, the body languishes, and is exhausted even in its youth; its strength and faculties daily decrease, and it sinks beneath the weight of the painful sensations attendant on a state of decay.

Would to Heaven that a cook could help our stomachs as much as an optician can our eyes! our existence would be as much more perfect than it now is, as our sight is superior to our other senses.

"The vigour of the mind decays with that of the body; and not only humour and invention, but even judgment and resolution, change and languish with ill constitution of body and of health."—*Sir William Temple.*

---

* "In proportion as the powers of the stomach are weak, so ought we to diminish the quantity of our food, and take care that it be as nutritive and as easy of digestion as possible."—ABERNETHY'S *Surgical Observations,* p. 67.

The following account of the successful *reduction of corpulence*, and *improvement of health*, the Editor can vouch for being a faithful statement of facts:

30th January, 1821.

MY DEAR SIR,

In consequence of the conversation I had with you, upon the advantages I had derived from exercise and attention to diet, in the reduction of weight, and your desire that I should communicate, as far as I recollect them, the particulars of my case, I have great pleasure in forwarding to you the following statement.

I measure in height six feet and half an inch; possess a sound constitution, and considerable activity. At *the age of thirty* I weighed about eighteen stone; two years afterwards I had reached the great weight of nineteen stone, in perfect health, always sleeping well, and enjoying good appetite and spirits; soon after, however, I began to experience the usual attendants on fulness of habit, a disinclination to rise in the morning, from drowsiness, heaviness about the forehead after I had risen, and disposition to giddiness; I was also attacked by a complaint in one of my eyes, the symptoms of which it is unnecessary to describe, but it proved to be occasioned by fulness of blood, as it was removed by cupping in the temple. I lost four ounces of blood from the temple; and thinking that the loss of a little more might be advantageous, I had eight ounces taken from the back; and in order to prevent the necessity, as far as possible, of future bleeding, I resolved to reduce the system, by increasing my exercise and diminishing my diet. I therefore took an early opportunity of seeing Mr. Jackson (whose respectability and skill as a teacher of Sparring is universally acknowledged), and after some conversation with him, determined upon acting under his advice.

I accordingly commenced *sparring*, having provided myself with flannel dresses, which I always used, being extremely careful on changing them to avoid the risk of cold, and I recollect no instance in which I was not successful.

I also had recourse to *riding-schools*, riding without stirrups, so as to have the advantage of the most powerful exercise the horse could give; these exercises I took in the morning, in the proportion, probably, of sparring twice a week, and riding three or four times.

Frequently at night I resumed my exercise, *walking*, and sometimes *running*, generally performing about five miles an hour, till I again produced perspiration; every other opportunity I could resort to of bodily exercise, I also availed myself of.

In respect to diet, I had accustomed myself to suppers, and drinking excellent table beer in large quantities, and for probably ten years had indulged myself with brandy and water after supper; this practice I entirely discontinued, substituting toast and water with my dinner, and tea and a good allowance of toast for supper, always avoiding copious draughts.

I left off drinking malt liquor as a habit, and, indeed, very seldom drank it at all. I took somewhat less meat at dinner, avoiding pies and puddings as much as possible, but always took three or four glasses of Port after dinner.

During the time I was under this training, I took the opinion of an eminent physician upon the subject, who entirely approved of my plan, and recommended the occasional use of aperient medicine, but which I seldom resorted to.

The result of all this, was *a reduction of my weight of upwards of three stone*, or about forty-five pounds, *in about six or seven months*. I found my activity very much increased, and my wind excellent, but I think, my strength not quite so great, though I did not experience any material reduction of it: my health was perfect throughout.

I then relaxed my system a little, and have, up to the present time, being a period of ten years, avoided the necessity of bleeding, and have enjoyed an almost uninterrupted continuance of good health, although my weight has gradually increased; sometimes, however, fluctuating between seven or eight pounds and a stone, according to my means of exercise, always increasing in winter, and losing in summer; and at this moment (January 29, 1821), I am about a stone more than I ought to be, having ascertained, that my best bodily strength is at sixteen stone and a half.

When the object is to *reduce weight*, rest and moderate food will always sufficiently restore the exhaustion arising from exercise; if an additional quantity of food, and nourishing liquors, be resorted to, the body will, in general, be restored to the weight it was before the exercise.

I have sometimes lost from ten ounces to a pound in weight by an hour's sparring. If the object be not to reduce the weight, the food may safely be proportioned to the exercise.

You will readily perceive, that the plan I adopted ought only to be resorted to by persons of sound constitution, and of athletic bodily frame; it would be absurd to lay down a general rule for the adoption of all fat men.

I think, with all lusty men, the drinking of malt liquor of any kind is injurious; meat, taken more than once a day, is liable to the same objection. I still persevere in the disuse of malt liquors and spirits, and suppers, seldom taking more than four glasses of wine as a habit; although I do not now deem it necessary to make myself so far the slave of habit, as to refuse the pleasures of the table when they offer.

I am, dear Sir,

Yours, very truly,

—*The Art of Invigorating and Prolonging Life. By* Dr. KITCHINER.

Useful Memoranda.—No. III.

THREE EASY RULES TO PRESERVE HEALTH IN HOT CLIMATES.

I. Abstain from all excess in spirituous liquors.

II. Avoid the evening dews, or wetting the feet; or if these be at any time unavoidable, plunge, as soon as possible, the whole body into water.

III. Bathe every morning in sea-water, if it can be conveniently done; but where that cannot easily be come at, dissolve an ounce of salt in a bason of water, and wash the skin all over with it; and having so done, put on the clothes without drying the skin.

Those who will take the trouble to observe these easy rules, may live as safely, and enjoy as good health, in the hottest, as they do in the most temperate climates.

REMEDIAL REMARKS ON SOME COMMON COMPLAINTS, &c.

CORNS AND BUNNIONS,

are small hard tumours, commonly seated on the toes, and other parts of the feet; sometimes on the hands. In other instances the skin is altogether the seat of the disorder, &c. In the first kind, the hardened part is moveable, in the second fixed. They are not unfrequently characterized by acute pain, and more or less inability to walk: arising for the most part from pressure by wearing shoes of small dimensions.

Treatment of Corns.

The common method of treating corns is to bathe the feet for about half an hour in warm water, and then with a keen razor or penknife paring off as much of the part as possible, without causing pain by going too near the quick. A little bit of adhesive plaster is afterwards applied; and the same process occasionally repeated: and, if the causes which produced the corns in the first instance, be removed, the above method generally proves an effectual remedy.

As a preventive of corns, the size and figure of the shoes ought to be strictly attended to, by making them sufficiently large, and of a shape corresponding to that of the foot. People who wear *rights and lefts* are seldom troubled with corns.—People advanced in years should use extreme caution in paring their corns.

WARTS,

are sometimes so troublesome on the hands of people who have to earn their living by the sweat of their brow, that very bad sores have frequently been known to be produced from wounding them. These small, hard, scabby tumours, which arise on every part of the body, but principally affecting the hands and face, are sufficiently known to require any further description. They sometimes disappear of their own accord, at other times they continue for a length of time; and even when removed, are liable to return.

Treatment of Warts.

Hartshorn rubbed upon them two or three times a day, will often produce the desired effect. Savine powder, or a

strong infusion of the leaves applied externally, will frequently remove them. *A fine piece* of silk thread waxed, or a hair tied round them, and gradually tightened, by way of cutting off all nourishment from the body, will frequently cause them to fall off. Should they be large, livid and irritable, they may be extirpated with a sharp knife; as stimulating applications in this case are generally found to produce unpleasant sores.

CRAMP,

as here expressed, is a well known muscular action affecting the stomach and the legs from various causes.

When cramp seizes the stomach, it is attended with flatulence and excruciating pain. Errors in diet, and the other ordinary acting powers improperly regulated, such as air, exercise, rest and motion, &c. may produce it, as well as diseases, gout for instance, when its termination is not unfrequently fatal.

Treatment of Cramp of the Stomach.

Brandy and water, madeira and sherry, must be taken immediately when cramp attacks the stomach; and to those liable to a repetition of similar attacks, a generous diet ought to be adopted and persevered in.

Cramp in the Legs.

This, in females, is generally a consequence of the condition of the womb during the last months of pregnancy from its pressure on the great nerves leading to the extremities; this comes and goes, and is only to be effectually relieved by parturition.

Cramps in all cases may frequently be prevented by pressure and tight bandages. Friction with the warm hand, or warm cloths, and spirituous and volatile embrocation, such as hartshorn or ammonia, are of service. The persons troubled with cramps in the leg should wear woollen stockings in bed. Laudanum may be taken to the extent of thirty or forty drops with half a drachm of æther, let the seat of the disease be where it may, particularly where the stomach is affected. There are a variety of other remedies in slight affections of cramp, known almost to every one.

ULCERS, OR ULCERATED SORES—BAD LEGS.

Ulcers are degenerated states of sores, from having been neglected, or improperly treated, to which many of

the working-classes are exposed. The following may be regarded as the leading features of ulcers in general.

Various Kinds of Ulcers.

The *simple ulcer*.—This kind of ulcer is one arising from a superficial wound being neglected.—The *sinuous ulcer* runs round the integuments, with a narrow, but not callous orifice.—The surface of a *fistulous ulcer*, on the contrary, is deeply seated with a narrow and callous orifice.—A *fungous ulcer* is covered with fungous, or proud flesh.—A *gangrenous ulcer* has a fœtid smell, a livid appearance, and is in a state bordering upon mortification.—There are also *scorbutic*, *scrofulous*, and *venereal ulcers;* as well as *carious ulcers*, or such as arise from diseased bones.—*Inveterate ulcers*, are those of long standing, and which resist the ordinary applications.

Treatment of Ulcers.

Simple applications to this species of sores, are unquestionably the best, such as soothing poultices; the most skilful attention, nevertheless, is required, to remove or destroy fungous flesh, callous parts, &c. as well as caries bones.

If an ulcer of long standing be seated on the leg, it should be poulticed, and the edges of it brought close together by slips of adhesive strapping, over which, a bandage, continued from the foot along the leg, somewhat tight, should be applied, and afterwards kept moist with spring water.

An ulcer may be distinguished from a wound, by the former discharging a thin watery humour, which is often so acrid as to inflame and corrode the skin; also by the hardness and perpendicular situation of its sides, and by the time it has continued, &c.

It requires some judgment to say when some old ulcers ought to be dried up. Those, in general, which proceed from a bad habit of body, should, at least, be suffered to continue open, till the constitution be so far changed by proper regimen, or the use of medicine, that they seem to heal of their own accord. Those which are the effect of malignant fevers, or other acute diseases, may, in general, be safely healed a short time after the health has been restored. The cure, nevertheless, ought not to be attempted too soon, not at any time without having previously used purging medicine and nutritious diet.

When wounds or bruises, by wrong treatment, have

degenerated into ulcers, they may be healed, if the constitution be good, with safety; but when ulcers are a consequence of some chronic disease, or are substituted for them, they must be healed with proper caution and consideration, lest they bring back the original disease in a more virulent and dangerous form: and, if any ulcer conduce to the patient's health, which the healing of it up would be likely to molest, it ought not to be healed; but, on the contrary, if it exhaust the patient, by consuming his strength in a slow fever, it should be healed as soon as possible.

Lime-water has frequently been of singular service in the cure of obstinate ulcers, given both internally and used as in gravel; and externally as a lotion: or, to ill-conditioned ulcers, the following may be applied often:

Take Muriate of ammonia, - }
Sulphate of magnesia, - } of each, ½ drachm.
——— soda, - - }
Spring water, - - - - 4 ounces.

Make a lotion: to be applied often during the day—a bread and milk poultice at bed-time.

The hard and callous sides and bottoms of ulcers may be sprinkled twice a-day with a little red precipitate, and afterwards dressed with basilicon.

The best diet for promoting the cure of ulcers, is to avoid high-seasoned food, strong liquors, and to use a smaller quantity of animal food than usual. The body should be kept gently open; and the patient should use moderate exercise, and be kept as cheerful as possible, in an airy situation.

HEAD-ACH.

There are various kinds of head-ach, proceeding from different causes, such as hard labour, emptiness of the stomach, obstruction of the blood through the vessels of the head, &c. It may also arise from too great a flow of blood towards the head, as coldness of the extremities, hanging down the head for a long time, tight neckcloths, stoppage of a running at the nose, repelled humours or diseases, fumes of noxious metals, &c.

Treatment of Head-Ach.

When head-ach is occasioned by great heat, hard labour, or violent exercise of any kind, it may be allayed by cooling medicines, as Epsom salts, small doses of

nitre. If it proceed from fulness of habit, bleeding and purging will relieve it, also bathing the feet in warm water, and applying leeches to the temples, blisters behind the ears, and at the back of the neck, &c.

A little æther dropt into the palm of the hands, and applied to the forehead, will sometimes relieve a violent head-ach; vinegar used in the same manner, and snuffed up the nose, will often have the same effect.

SPITTING OF BLOOD.

This disease generally arises between the ages of sixteen and twenty-five, sometimes later, and may be occasioned, as it most frequently is, by violent exertion in lifting heavy weights, running, jumping, wrestling, singing, speaking loud, or blowing wind-instruments. It also proceeds from wounds, fulness of habit, inflammation of the lungs, weak vessels, violent coughs, irregular living, excessive drinking, suppression of accustomed discharges, as piles, &c. It may likewise be occasioned by breathing unwholesome air, or air that is too much rarefied to be able properly to expand the lungs, narrow chest, &c.

A spitting of blood is not, however, to be always considered as a primary disease. It is often only a symptom; and in many disorders, if only very slight, is the presage of a favourable termination: and although it is not usually attended with danger, where the discharge of blood this way is unaccompanied, and not preceded by consumption, and where it leaves no cough, shortness of breath, or other affection of the lungs; and where there exists no malformation of the chest, and other connexions with the pulmonary system; neither is it dangerous in strong healthy persons, unless the loss of blood be very great from the rupture of some important vessel; still, when it attacks persons of a weak and lax constitution, and of a delicate habit, it is often difficult to remove it.

Treatment of Spitting of Blood.

In spitting of blood, in proportion to the symptoms, the patient must observe a low diet; carefully avoiding heat, and every kind of bodily exertion; and even speaking, where the case is severe. Cooling purgatives, as manna, salts, tamarinds, a light vegetable diet, ice, and other cooling substances. Cold water acidulated with a little vinegar, should be taken for ordinary drink, immersing the feet and lower part of the body in cold water. If the pa-

tient be hot and feverish, youthful, and of a full habit, and has a hard jerking pulse, bleeding from the arm may be adopted with considerable benefit, and the operation repeated according to circumstances. On the contrary, where there are marks of debility and laxity, and the blood is of a dark colour, this step will be improper.

Draughts in Spitting of Blood.

1. Take Infusion of roses, - - - - 1½ ounce.
   Epsom salts, - - - - - 3 drachms.
   Mix, and take twice a day, as a cooling purgative.

2. Take Infusion of roses, - - - - 1½ ounce.
   Nitrate of potass, - - - - 15 grains.
   Tincture of opium, - - - - 15 drops.
   To be taken every four hours, after the purgative draught has operated, as a refrigerant and cooling draught.

3. Take Cream of tartar, - - - - 3 drachms.
   Nitre, - - - - - - 2 drachms.
   Divide into ten equal parts, and take one in a tea-cupful of barley-water, every three or four hours.

4. Take Alum, - - - - - - 8 grains.
   Extract of catechu, - - - - 10 grains.
   Confection of roses, enough to make a bolus.
   To be taken every four hours, washing it down with three table-spoonsful of the infusion of roses, as an astringent.

More powerful astringents may be used, should this fail, such as a grain of the superacetate of lead every four or six hours; and in cases of emergency, and attended with imminent danger, from the loss of blood, two or even three grains may be given, in infusion of roses, with a few drops of the tincture of opium: or if more agreeable, it may be given in the form of a pill.

After the effusion is stopped, every possible means must be adopted to prevent its return, by avoiding the causes that may have given rise to it. Should a pain in the chest arise, or remain as a consequence of this disease, a blister applied over the part, will be attended with considerable relief.

PILES.

The piles are small tumours arising on the verge of the fundament, from the distention of small veins; sometimes separate, round and prominent; at other times of a tumour consisting only of one tumid ring surrounding it. There is a discharge of blood, in some cases, from these tumours, particularly when the patient goes to stool; the disease is then known by the name of the *bleeding piles;* and in others, there is no discharge; they then take the name of blind piles.

These affections are the consequence of habitual costiveness, fulness of habit, hard riding, excesses of various kinds, the suppression of some long accustomed discharge, and from the use of aloes taken as purges, abuse of fermented liquors, &c. They are mostly met with in people of a robust habit, in those who lead sedentary lives, and in pregnant women.

The piles are by no means dangerous, although they often prove tedious, troublesome, and extremely disagreeable; and in some cases are to be viewed as a salutary evacuation. In some instances, however, they are apt to degenerate into fistula, a disease still more dangerous and harassing.

Treatment of Piles.

In treating the piles, particular attention should be paid to the cause that gave rise to them; and as a bound body is one of the most frequent, the bowels should be kept regularly open by gently aperient medicines; for example:—

Laxative Medicine for Piles.

1. Take Lenitive electuary, - - - - 2 ounces.
   Powdered jalap, - - - - - 2 drachms.
   Nitre, - - - - - - 1½ drachm.
   Syrup of buckthorn, enough to make an electuary.
   Of which let the patient take the bulk of a large nutmeg occasionally.

2. Take Flour of sulphur, - - - - 1 ounce.
   Lenitive electuary, - - - - 2 ounces
   Cream of tartar, - - - - 3 drachms.
   Syrup of roses, enough to make the whole into an electuary.
   To be taken as above.

3. Take Castor-oil, ½ ounce, to - - - 1 ounce.

Though, in the bleeding piles, the discharge of blood be greater than one could suppose the body able to sustain, it seldom proves fatal. It has been deemed imprudent by some to check the bleeding piles, when they frequently recur, and the flow of blood is inconsiderable. It may, however, be laid down as a rule, to which the bleeding piles form no exception, that discharges, of whatever kind, which, while they do not abate inflammatory predisposition, are profuse, weakening and unnatural, as being deviations from the healthy state, will require more of suitable attention and restriction.

By the occasional use of gently aperient medicines, the patient may acquire the habit of obtaining motions at stated times of the day, without straining. But should none be procured by this means, he may use clysters of tepid water, with soap and oil.

When the tumours are large, and attended with much pain, it will be advisable to apply a few leeches to them; after which pledgets of lint or linen rag, wetted in the following lotion, may be applied, the patient after each stool anointing the part with some emollient ointment.

Lotion for painful Piles.

Take Sulphate of zinc, or sugar of lead, - - 20 grains.
Water, - - - - - - - 1 pint.
To be applied as directed.

Emollient Ointment to be used after each Stool.

Take Spermaceti ointment, - - } of each, ½ ounce.
Cerate of the superacetate of lead, }
Opium in powder, - - - - - ½ drachm.
To be intimately mixed together.

If falling down of the fundament be occasioned by the piles, the part is to be carefully replaced each time after going to stool; and if the patient cannot perform this himself he must procure some one to do it for him; when he must lie in a horizontal posture, while his assistant, or medical attendant, gently presses up the gut; the return of which, is to be prevented by avoiding, as much as possible, the cause which occasioned its descent. When it proceeds from laxity, besides applying a proper bandage, the astringents advised under spitting of blood, may be taken internally; also the following externally, removing costiveness by some of the preceding laxatives.

Astringent injection for the falling down of the fundament in piles, or bleeding considerable.

1. Take Decoction of oak bark, - - - 1 pint.
Alum, powdered, - - - - 2 drachms.
Tincture of opium, - - - - 1 drachm.
Mix for an injection, and throw up enough to fill the rectum.

2. Take Bruised oak gall, - - - - ½ ounce.
Hot water, - - - - - - 2 pints.
Infuse and strain, to be used as above.

When the bleeding from the piles has been very considerable, in addition to the above astringent injections, much benefit has been derived from the early application of pressure by means of a piece of pig's or sheep's gut, introduced up the *rectum*, tying it at one end, and filling it at the other extremity with some cold water and vinegar, forcing up the liquid, so as to increase the strength of pressure, and then securing it with a proper bandage.

Where piles have been of long standing, the excrescences become sometimes so troublesome as to render it

necessary to extirpate them either with the knife or ligature; although this method is not unattended with danger. When, in consequence of piles, the rectum becomes so much affected as to threaten a fistula, the use of Ward's celebrated paste is recommended; made as follows:—

Take Pepper, - - - - - - - - 2 drachms.
Elecampane, - - - - } of each, ½ ounce.
Fennel seeds, - - - - }

Mixed up with honey in the form of an electuary, of which a tea-spoonful may be taken three times a day.

DIAGNOSTIC SIGNS, OR SYMPTOMS, PRECEDING OR ACCOMPANYING DISEASES.

(*Continued from* p. 387).

TASTE, BITTER, sickness, want of appetite, and pain at the stomach, are *symptoms of indigestion and weakness* of the stomach. An acid taste, accompanied by the preceding symptoms, also occur in weakness of the stomach.

TEETH, GRINDING OF,—in fever, a symptom of danger.—In children, a symptom of worms.

———, ACHING OF, a symptom of inflammation, or *caries*. The teeth covered with dark, foul, viscous matter, in fevers, generally marks malignancy.

TENDONS, twitching at the wrist, in fevers, shew danger.

TESTICLE SWELLED, occurs sometimes at close of the disease called *mumps*. When the testicles are drawn up and affected with an aching pain, with pain in the back, stretching forwards and downwards, with sickness at the stomach, are symptoms of gravel in the kidneys or *ureter*.

THIRST generally present in fever frequently occurs; but when wanting, and the tongue parched and foul, shews danger. It is generally a troublesome symptom in dropsy.

THROAT SWELLED AND RED, and swallowing very painful, mark the inflammatory sore throat.

——— of a deep crimson colour, with whitish specks, spreading and deepening; extreme debility, and the pulse small and quick, *distinguish the putrid ulcerated throat*.

THRUSH OR APTHÆ, little ulcers, generally white, appearing on the tongue, inside of the lips, cheeks, &c. When these occur to children, it may in general be concluded either that the food of the child is not sufficiently nutritious, or that the child breathes an air too impure. These apthæ frequently appear in the latter stage of consumption. When they appear in fever they are not always

to be considered as a symptom of extreme danger, but sometimes as a mark of a critical, and even favourable change having taken place.

TONGUE TREMBLING AND BLACK, a symptom of danger in fever. Parched, without thirst, in fevers, is a bad symptom.

——— Hard tumours of, though small, demand immediate care.

TOSSING ABOUT, a frequent symptom in dangerous fevers.

TREMOR, in fever, a sign of great weakness.

Horticulture.

NOVEMBER.

THE KITCHEN-GARDEN.—The business now in the kitchen-garden is sowing and planting some few articles for early crops next year; some to force in hot-beds for winter consumption; and to give occasional weeding, and sometimes hoeing to advancing late young crops; also to apply dung, where necessary, and to dig vacant ground.

The business of sowing and planting is inconsiderable at this season; but is necessary in a few articles, both in the open ground and in hot-beds.

Articles for sowing—are only some early peas and beans, and small salading; the two former in warm borders, and the latter under glasses, or in hot-beds.

Planting—is required principally to finish what was omitted last month, as cauliflowers, lettuce, cabbages, coleworts, celery, endive, garlic, and shallots; a few early beans, and some plants for seed; and in hot-beds to plant asparagus, mushroom spawn, mint, tarragon, and lettuce.

FRUIT-GARDEN AND ORCHARD.—In this month all late fruit may be gathered (b).; and general autumn planting and winter pruning must be commenced in all sorts of fruit trees.

Late fruit—of apples, pears, grapes, medlars, and services, finish gathering (b).

FLOWER-GARDEN AND PLEASURE-GROUND.—In this season give attention to finish clearing all parts of these districts from every sort of litter, to remain in good appearance all winter; and generally to complete or forward all principal planting of roots, plants, and tree and shrub kinds intended.

WORK IN THE NURSERY.—In this month, the nursery

demands particular attention in the necessary works of planting, and propagating many sorts of trees and shrubs; in continuing the preparation of ground for these occasions, and forwarding the completion of the principal autumn planting; also in drawing various sorts of trees and shrubs for garden plantations: finishing the autumn sowing of tree and shrub seeds, and of making layers, planting cuttings, suckers, &c. likewise in removing plants in pots to shelter or warm situations for the winter, and in some other occasional works hereafter-mentioned.

THE GREEN-HOUSE.—The green-house plants being all housed for the winter, they require air admitted freely in mild days, and moderate supplies of water occasionally.

As decayed leaves—will frequently occur, in many of the plants, constantly pick them off.

If the earth in any of the pots crust or bind—stir and loosen the surface.

Clean the leaves—of oranges, lemons, &c. if they become foul.

Decayed shoots—when any occur, cut them off.

THE HOT-HOUSE AND STOVE.—In the general hot-house, the pines and other plants of that department will now require the joint assistance of the continued bark-bed heat, and of evening and morning fires, with occasional admission of air moderately in fine sunny calm days, and some gentle waterings.

SENTENCE AGAINST AN APOTHECARY.

ON the 12th of April, 1776, an Act of the Parliament of Provence sentenced an Apothecary to pay a fine of a thousand livres, and not to open his shop for three months, for having sold drugs to a woman, who died after having poisoned herself with them. It is to be desired, to prevent the frequent abuses which arise from the retailing noxious drugs, that the venders of them should be always punished with the greatest severity; and yet we witness frequent accidents of this description, without farther notice than some trifling animadversion made by the coroner who is called to hold an inquest, on the effects of oxalic acid or other deleterious drugs, sold by mistake—a mistake, in fact, which ought to admit of no excuse; and one at least, that ought to subject the offending party to a punishment as clearly allied to that of manslaughter, as the law could possibly make it.

HISTORY AND USES OF THE ALOE PLANT.

[*From Travels through various Provinces of the Kingdom of Naples, by Charles Ulysses, of Salis Marschlins.*]

THE plant which we call aloe, and which grows in great abundance in Persia, under the name of zabar, is commonly termed zabbara in Sicily and Spain, where, as well as in India and the American Islands, it is found in great plenty. The southern coasts of Italy also furnish a very considerable number; but it is not equally flourishing every where, neither does the stem always attain the height of which it is susceptible, and which some travellers declare to arrive at thirty-four feet—*(pieds de roi)*—and indeed I saw some near Girgenti, in Sicily, whose stems were upward of twenty-eight feet high.

As the figure of this plant is too well known to need any description, I shall content myself with noting its varieties, and its use in medicine; after which I shall enter into a detail relative as well to the extraction of the thread, as to the articles of commerce, in which it is and might be employed by prudent regulations, and a well understood spirit of economy and order.

Most of the botanists, predecessors of Linnæus, were so attached to the more striking varieties of plants, that they classed them according to their exterior characteristic differences, and reckoned five species of the aloe-plant; but the celebrated botanist of Sweden, more exact in his observations, has enumerated eight species, under the titles of aloes perfoliata, variegata, disticha, spiralis, retusa, viscosa, pumila, and varia, among which he likewise notices the necessary subdivisions. But this analysis not being the intermediate object of attention, I shall proceed to observe, that none but the aloes perfoliata and viscosa are used in furnishing the thread; the fibres of the others being too tender for that purpose; but the agave Americana affords a much better sort of thread.

The juice of the aloe-plant was employed in ancient much more than in modern pharmacy, in chronic and obstinate disorders, especially those of the hypochondriac cast, acidities of the stomach, worms, obstructions of the bowels, and other disorders arising therefrom; provided the patients were not subject to spitting of blood, or to any hemorrhoidal flux, whether internal or external, and particularly to that of the inward carotid, where the liga-

ture being impossible, the violent motion occasioned in the blood by the juice of the aloe, rendered useless the application of every salutary styptic, and destroyed its effect.

Pomet, in his history of drugs, mentions three sorts of aloe; the socotrine, so called either from its coming to us in a concrete form, or more probably because the greatest quantity comes from the Isle of Socotra, in the Red Sea. According to Chomel, this is the purest sort, and is of a yellow colour, bordering upon red, shining, friable in winter, but easily softened in summer, and its smell resembles, that of myrrh. The second is the hepatic aloe, which takes its name from its being of a liver colour; and the third is the caballine aloe, and is used only in remedies for horses. It is the bark or rape of the two other sorts, is of a black colour, and full of dirt.

The aloe forms also an ingredient in the hiera-diacolocynthedos, in the Catholic extract of Frankfort, and Sennert, in the cachectic pills of Charas, in those of Ambra of the London Pharmacopeia, and in the pestilential, or fetid pills; and according to the same author, the aloe gives name to the dialoes, or hierapicra of Galen, is an ingredient in the elixir proprietatis of Paracelsus, in the balm of the commander, and in many other vulnerary and detersive compositions, as extremely well adapted to the resistance of putrefactions.

Sicily furnishes every species of aloe, and especially the perfoliata and viscosa, in great abundance. As the same kinds grow also in Spain, the phlegmatic inhabitants of that kingdom first thought of procuring from them a thread, whose extraction requires all the patience and *sang-froid* which seem to be the peculiar characteristics of that nation. The Spanish soldiers who were sent to Sicily when that island was subject to the crown of Spain, and who remained there attached to the service of the King of the Two Sicilies, brought with them the art of making the thread, and are the only persons in the island employed in its manufacture.

After stripping the plant of all the green leaves that compose its first coat, they cut off all those which cover the stem, and which are generally white, smooth, tender, and less compact than the exterior ones. This operation is performed from May till the end of August, when the leaves become too hard and brittle. After cutting off the leaves, they fasten one end of them to a cord, at the dis-

tance of two or three inches from each other, and stretching the cord upon the brink of a running water, suffer the leaves to soak during eight or ten days, according to the greater or less degree of heat, and the greater or less hardness of the leaves. After they have been sufficiently soaked, they are placed upon a flat stone, and beaten with another stone, cut into a half circumference, until the skin and the parenchyma are bruised, and the alimentary juice forced out of the first fibres, which are always coarser and larger than the rest. In this state the leaves are placed singly upon a table, their larger end remaining loose, but the other being fastened to the table with a nail; when the leaves are scraped with a blunt and smooth iron, shaped like the sides of a bayonet, of which weapon the soldiers generally make use, from an unwillingness to purchase an iron instrument merely for that purpose. After the leaves have been scraped about twenty or thirty times, the transverse and unequal fibres are broken off, and thrown away, and the table is covered with a greenish juice, exhaling alkaline particles of so caustic a quality, that the hands of the soldiers are usually rendered quite raw, and their eyes exceedingly inflamed. But as cold water is the only remedy they employ, I am inclined to think that the styptic quality of this plant is of the same nature as that of the leaves of the clemmatis, better known by the name of the beggar's herb, because it is employed by vagabonds and beggars in making supposed inflammations and ulcers, in order to excite our commiseration, and of which they can quickly cure themselves by the use of cold water.

As this first operation of scraping only forward the work by the removal of the coarser fibres, those of which the thread is to be made, are as yet scarcely to be perceived; but after the leaf has been turned, with the point remaining loose, and the larger end fastened to the table, and after it has again undergone the operation of scraping, the fibres, freed from every extraneous body, display themselves in full force, and form as many filaments, of a yellow colour, like that of raw silk, not of the orange kind, but of that which comes from off the white cocoons. To deprive the thread of that colour, and preserve it from the corruption which might take place if it were left covered with the juice of the plant, it is soaked during three days in a tub of cold water, after which it is washed and beaten in a running stream, by which means the thread

becomes softer and richer, without losing any thing of its consistence.

Each leaf affords a complete skain, more or less thick, according to the size of the leaf. Fifteen or twenty of these skains are tied to a cord, and hung up in a garret, or other airy place, where there is a constant shade; for if the sun were to shine upon the thread in that state, it would immediately turn it yellow, and give it a stiffness which it would be afterward impossible to remedy.

When properly made and dried, this thread is much used in Sicily, and still more in Spain, where manufactories have been established, particularly in Catalonia, in which this thread is employed not only in making harness for horses in the tournaments, nets of various kinds, women's neck handkerchiefs, night-caps, ruffles *de gros-botté*, men's ruffles, and cauls of caps; but as the thread will take any colour, they also use it in making a variety of stuffs, and especially handkerchiefs, which they sell us for India handkerchiefs made of the bark of trees; but as the thread can never be of greater length than the leaf, it is only employed in the web, the rest of the work being done with silk. These stuffs have, however, a very evident defect in the visible difference between the softness and richness of the silk, and the coarse quality of the thread, which renders them by no means lasting; for after a certain time, the silk is worn out by the mere friction of the harder body. The tint of the silk also is different, and presents to the touch a soft and smooth surface, while the thread takes its colour almost in the same manner as the Russia leather; that is to say, that the epidermis of its exterior surface alone imbibes it, while the body of the thread remains unaffected.

It is now some years since a proposal relative to the thread of the aloe-plant was made to the merchants at Palermo by a Frenchman, of the name of Gouion, born at Hanover, and descended from one of those refugee families who, after the revocation of the edict of Nantes, enriched other countries with arts before familiar to the French alone. This person, uniting a knowledge of the mechanical arts to that of the fabrication of silks, velvets, and taffetas, proposed to make a machine, which, by the help of water, should divide each thread into two parts, and thus produce the double advantage of rendering the thread finer and more supple, and of offering to the manufacturer a smoother surface, extremely suitable to several

articles of a peculiar kind; but as he required a considerable reward for his ingenuity, his invention was not deemed sufficiently useful to merit so high a premium, and he was suffered to leave the country; of which the merchants have since repented.

I think that it would not be difficult to give this thread a more penetrating dye, by following either the method of M. Hellot, or those practised at Lyons, Florence, Paris, or Genoa. The arts in Sicily have indeed by no means attained the desirable degree of maturity; and it is with the art of dying as with the rest; there being some theoretical knowledge, but no practice, for want of established principles, good will, and due encouragement. The black of Messina and Palermo begins, however, to acquire a certain consistence, which gives it all the lustre of that of Genoa for the velvets; but it has not yet gained its solidity, and turns red as quickly as that of other European countries.

Notwithstanding all these defects, I consider the aloe thread as a useful article, which in process of time might form a lucrative and necessary branch of commerce, and in years when the silk-worms should happen to fail, might furnish employment to many manufacturers, and produce a quantity of neutral stuffs (if I may so call them) which being neither silk, thread, nor wool, might afford habiliments, either from choice or fashion, to the great and opulent, and might be very useful to those of inferior fortune, on account of the low price which might be put upon them.

This object has not escaped the patriotic views of the new minister, the Marquis della Sambuca, whose zeal for the glory of his master and his country leads him to analyse every thing that presents a prospect of real advantage and utility. Some necessary perquisitions have been made by his order, and as the aloe grows abundantly in Sicily, and is extremely prolific, and consequently very easily multiplied, that plant may be considered as an inexhaustible fund, and of a product doubly beneficial, inasmuch as it would usefully employ a number of idle wretches, who either infect the island, or uselessly people the prisons, and would considerably augment the royal revenue, by causing a circulation of cash in the interior of the country.

There being nothing at present fixed relative to the aloe-thread, the *rotolo* (equal to a pound and three quarters,

French measure) is sold for eight *carlini*—(three shillings. But if the minister should form a permanent establishment, I am persuaded that it would not cost the king more than half that price, and that the manufacturers would still be gainers, since the idlest workmen might easily make two *rotoli* a day, while the more industrious would make three, and even three and a half in the longest days. But I think it would be necessary to forbid the use of the bayonet in the operation of scraping; for the styptic quality of the juice not only eats into that weapon in the course of time, but the ferruginous particles of it blacken the thread, or at least form blueish spots, extremely difficult to eradicate. It would be more advisable to employ scrapers of wood, stone, or any hard body, such as glass, or any other vitrified substance except metal, and especially iron and steel.

SOCOTRINE ALOES.

Medicinal Properties.—Cathartic, stomachic, emmenagogue, anthelmintic. In cachectic and chlorotic cases, hypochondriasis, habitual costiveness, the consequence of a sedentary life; torpor of the intestinal canal, &c.

Dose.—Grs. v. to xv. as a purge; when given as an emmenagogue or gentle laxative, Grs. ij. to v. twice or three times a day.

*** The long continued use of aloes is apt to bring on hemorrhoids; it is scarcely necessary therefore to remark, that it is an improper cathartic in hemorrhoidal and pulmonic affections, pregnancy, &c.

BARBADOES ALOES.

This is given as a cathartic in similar doses to the former; it is not however often employed, unless by farriers. In smell and taste, it is more disagreeable and nauseous than the socotrine, and possesses infinitely less aromatic flavour.

As the socotrine aloes contain more extractive matter, in which the purgative quality resides, and less resin than the Barbadoes aloes, the former is preferable when a stimulus is required; for instance, in promoting or exciting the menstrual discharge; whilst the latter is better calculated for a common cathartic.

Different Preparations of Aloes, directed by the London College.

	Dose.
Aloes, compound powder of, *L.*	grs. x. to ʒj.
——, pills of, with myrrh, *L. E. D.*	grs. x. to ℈j.
——, compound pills of, ...	grs. x. to ʒss.
——, pills of, with assafœtida, *E.*	grs. x. to ℈j.
——— colocynth, *E.*	grs. v. to x.
Compound pills of gamboge, *L.*	grs. x. to ℈j.
——— rhubarb, *E.*	grs. x. to ℈j.
Pills of scammony, with aloes, *D.*	grs. v. to ℈j.
Compound decoction of aloes, *L.*	ʒss. to ʒij.
Extract of purified aloes, *L. D.*	grs. v. to xv.
Compound extract of colocynth, *L. D.*	grs. v. to ʒss.
Tincture of aloes, *L. E. D.*	ʒss. to ʒj.
——— compound, *L. E. D.*	ʒss. to ʒij.
Compound tincture of benzoin, *L. E. D.*	ʒss. to ʒss.
Tincture of rhubarb and aloes, *E.*	ʒss. to ʒiss.
Wine of aloes, *L. E. D.*	ʒss. to ʒij.
Aloes, æthereal tincture of, *E.*	ʒss. to ʒij.

*** Aloes is frequently adulterated with common resin; but the fraud more generally committed is that of mixing with, or substituting the inferior species of the socotrine: but the Barbadoes aloes may, independent of its want of aromatic flavour, be distinguished from the socotrine by a simple test, for the latter dissolves entirely in boiling water and alcohol, whereas the former, when treated in a similar manner, leaves a considerable residue. Sometimes, the horse aloes is made so bright and pure, as not to be easily distinguished by the eye even from the socotrine; but its rank odour, of which no art can divest it, will readily betray the fraud.

"For obviating the effects of opium upon the intestinal secretions, the judicial addition of some purgative will offer the most effectual corrigent, and according to my own experience the aloetic preparations are to be preferred for such an occasion."—*New London Medical Pocket Book.*

DR. HUNTER TO HIS BROTHER WILLIAM HUNTER.

AMONGST the papers of the late Dr. Baillie, is a note to Dr. William Hunter from his brother John. The following is a copy:—

"Dear Brother,—The bearer is very desirous of having your opinion. I don't know his case. He has no money, and you don't want any; so that you are well met.

Ever your's,

Jermyn Street, Saturday. JOHN HUNTER.

LECTURES ON THE PHYSICAL EDUCATION OF CHILDREN DURING THE EARLY PART OF THEIR LIVES.

ADDRESSED TO MOTHERS, &c. BY A. F. WILLICH, M. D.

(Continued from p. 446.)

4. *Expectorants, or Pectoral Remedies,*

Are usually administered with the view of relieving cough, and procuring an easy discharge of mucus: but, as children have not sufficient muscular strength to promote the evacuation of matter from the vessels of the breast, it will be readily conceived, that the numberless preparations of sweet and oily substances given to them with that intention, must load their tender stomachs, and occasion infinite harm. Besides, it is excessively absurd to meddle with such remedies, when it is certain that cough, and consequent stricture of the chest, may arise from a great variety of causes. Of these, I shall enumerate only the principal; namely, an inflammatory state of the organs of respiration; spasms in the exhalent orifices of the arteries; too great an acrimony, or viscidity, of the particles to be evacuated; and an accumulation of peccant humours in the lungs and windpipe, together with the want of strength in the patient to discharge them by expectoration. How, then, can it be reasonably expected, that in such a variety of causes the same remedies should answer an uniform purpose? And yet all cough-medicines are given to children with a design to resolve and attenuate thick mucus or phlegm. It would be needless to refute the prevailing popular error, that such medicines are calculated to promote the expectoration of stagnating matter, or actually to dissolve viscid mucus. Their operation consists chiefly in exciting the activity of the lymphatic system; and hence they may be said to dilute incrassated humours. The consequence of such dilution, however, is, that by this stimulating process, the secretion of matter is necessarily increased; and as children are not vigorous enough to expectorate, thence arises wheezing and rattling of the breast; the expansion of the lungs is rendered progressively more difficult; respiration is impeded; and, at length, suffocation terminates the scene. Besides, pectoral remedies, in the least dangerous cases, if long continued, always weaken the stomach, and thus prolong the cough, which

is ultimately attended with a chronic inflammation of the lungs.—Such are the effects of ignorance and delusion.

5. *Tonics, or Strengthening Remedies,*

are given with an intention to support the sinking vital power, or to brace the whole system. In the opinion of those who are unacquainted with the laws of the animal economy, and the nature of diseases, these medicines appear to be of inestimable value; yet their virtues and effects are extremely precarious. There is indeed a great difference between direct and indirect debility, or in other words, between true and apparent weakness; a distinction which is not always manifest, even to the most experienced physician. For extreme reduction of strength, when the expiring patient seems to have arrived at the verge of the grave, may be the consequence of a morbid cause, but not of the disease itself.—How often does it happen, that a single emetic, or bleeding, at once raises the pulse, relieves the stricture of the breast, enlivens the faint, languid eyes, and diffuses new vigour over the supposed victim of death. From any such remedies, the non-professional spectator would predict, or at least apprehend, certain dissolution.

Farther, the cause of general debility is frequently found in the accumulation of blood, in obstructions and pituitous stagnations of the abdomen. In these instances, it would be extremely hazardous to stimulate the succumbing patient with wine, strong broths, or any animal food; which is a common practice. Nay, it is a notorious fact, that heating and exciting substances are often taken from empirics of every description, while cooling and moderating remedies ought to have been prescribed. It is therefore an obnoxious error, to hasten the recovery of a patient by *bracing* means; and to believe that every thing depends on the return of his appetite for eating. Tender mothers likewise labour under a great mistake, when they imagine that there can be no danger in the disease, as long as the child takes its food. Conformably to this erroneous notion, the infant is loaded with aliment, though its stomach be relaxed and vitiated; so that additional food cannot fail to increase the cause of weakness, and, consequently, also the disease. Nay, overwise nurses go a step farther, and literally stuff the child every time it begins to cry, without attempting to distinguish whether the cries arise from hunger or pain. I

must, on this occasion, with reluctance observe, that mothers are guilty of similar imprudence, when they place a diseased infant more frequently than Nature requires, to their breasts; and hence appears to have originated the absurd expression, "*to still a child.*" But, if mothers were informed that they contribute to the destruction of the child, while endeavouring to promote its welfare, they would not load it with a superfluity of milk; which vitiates the stomach, produces acidity, and by remaining in the mouth of the infant, even *there* becomes sour and acrimonious, generates aphthous eruptions, and disposes the little patient to habitual flatulency.

On the whole, it cannot be disputed, that the diet and regimen of children are shamefully neglected; because mankind almost uniformly place too implicit a reliance on medicinal substances; and, while searching for distant means of relief, are apt to slight those which kind Nature has placed within their reach. Thus, the source of retarded recovery, or premature death, arises principally from an improper management during the first attack of the disease; because the dietetic treatment unfortunately was in direct opposition to the medicines prescribed.

Having now treated of such remedies as are most generally subject to abuse, let us also take a concise view of those, the application of which is often dreaded and procrastinated in infantile disorders; as it is erroneously imagined, that they manifest too powerful an effect on young constitutions, and are apt to injure them.

The Operation and Effects of Emetics in the Diseases of Children, &c.

Among all the remedies which mankind have adopted in consequence of the hints given them by Nature, none appear to be more beneficial and conformable to the constitution of children, than *emetics.* It is, therefore, extremely imprudent to substitute laxatives, merely because these are erroneously considered as less dangerous and oppressive to the child. On the contrary, it cannot be disputed, that purgatives are attended with much greater relaxation of the stomach and bowels, especially in young children; and it is a certain fact, that a single emetic has often relieved the most distressing symptoms, prevented suffocation, and produced the most desirable effects.

Where Emetics are improper.

There are, however, a variety of cases, in which the administration of emetics would be equally improper for children and adults; for instance—1. In general plethora, or a determination of blood towards the head, breast, stomach, and particularly the liver, which is but rarely the case in infancy;—2. In actual inflammation of the intestines;—3. In great debility of the system;—4. In ruptures, prolapses, and other deformities of the body; lastly—5. In obstructions of the bowels, and a few other cases, chiefly relative to adults.

As it is to be presumed that parents will not, without proper medical advice, venture upon the administration of emetics, it would be superfluous to state those cases where they are of the greatest service; my principal aim is to shew that, upon the whole, vomiting is less dangerous and detrimental, to the young as well as to the delicate, than purging. This assertion will not be discredited, when it is considered that the former inverts the motion of the stomach, suspends the equilibrium of the muscular fibres of that organ, *only during its operation*, and serves in a manner as an useful exercise to the whole body; while the latter, or laxatives, act by their mechanical stimulus on the stomach and intestines; increase the access of the fluids to those parts, even beyond the alimentary canal; diminish the mass of the circulating blood; and thus, at one and the same time, affect the liver, the pancreas, and other viscera, which partake of the subsequent debility.

On the Administration of Clysters to Children, &c.

Clysters have often, though with injustice, been held, as it were, in contempt and disgust. Their use, however, is great, and, I would almost say, boundless. A remedy in itself so harmless, and calculated to afford almost instantaneous relief, deserves to be better understood, and ought to become more general. Many powerful objections have hitherto prevailed against *lavemens*, which are now effectually removed by the invention of convenient apparatus.

To enforce the importance of this remedy, I shall observe, that Nature has certainly not appointed the stomach to be the field of battle for medicinal, but for alimentary substances; that she has provided the abdomen with an intestine of uncommon firmness and elasticity,

and that absorption is carried on in the bowels, as well as the stomach.

On the Bathing of Children, &c.

Bathing has been likewise too little, and sometimes improperly, employed in the nursery. Like emetics and clysters, it has been dreaded only because its properties have not been sufficiently understood. It would be unnecessary to prove, in this place, its salutary and unparalleled effects in cutaneous eruptions of children, in scrofula or the king's evil, the rickets, and even consumption, which destroys about one-third of the number of those who die in the metropolis. It has been very generally, though without foundation, believed, that *cold* baths only are bracing or strengthening, and that warm, as well as hot baths, produce a contrary effect. This opinion requires but a short refutation.

If the temperature of the warm bath exceed the heat of the human boy, or 98° of Fahrenheit's thermometer, it is then no longer a *warm*, but a *hot* bath; and as such, ought to be used only in certain diseases, by the direction and advice of a medical practitioner; if, however, the bath be prepared at a temperature varying, according to circumstances, from the 80th to the 85th, or even 96th degree, it then forms a luke-warm or tepid bath. This remedy is truly valuable, particularly to children born of weak and enervated parents; inasmuch as it relaxes the rigid fibres, relieves the spasmodic stricture of the cutaneous vessels, resolves the tough pituitous humours, which clog the pores of the skin, promotes the discharge of noxious perspirable matter, and imparts tone and vigour to all the functions of the body. It is therefore much to be regretted, that so powerful and excellent a mean of restoring health and energy, cannot be more easily resorted to in domestic economy.

Blistering of Children, &c.

Of blisters, I shall say but little. For children, I should give the preference to sinapisms, or plasters made of mustard-seed, horse-radish, and the like, to those prepared of the Spanish fly. The former are attended with the additional advantages, that they sooner affect the skin, and do not act on the fluids with such violence as the latter. They are excellent, and generally safe remedies; the temporary pain they occasion, is in no

proportion to their good effects; and if the blister raised on the surface of the body, be opened with precaution, so that the epidermis, or scarf-skin, is not lacerated, the superficial wound heals in a very short time. Hence parents ought not to object to their application, especially as they are well calculated to relieve pain arising from internal inflammation; to dislodge catarrhal and rheumatic humours from the parts more essential to life; to discharge them by the nearest extremities, and to excite the indolent powers of the system in general. Good mothers require only to be informed of such advantages, and they will cheerfully co-operate with the views of the physician, instead of prejudicing the helpless child against the application of means so powerful and anodyne. By making this petty sacrifice, they often would save their children much greater, and more durable pain.

Observations on Surgical Operations, as they relate to Children.

Lastly, *Chirurgical Operations* are generally considered by parents as unnecessary tortures to the child. It is an almost unpardonable weakness, to suffer children to languish, and sometimes even to die, rather than submit for a few minutes to the knife of the surgeon. For pain certainly is less afflictive to children than adults; because the former cannot reflect upon its consequences, and the remembrance of their sufferings is so faint, that the whole is generally forgotten with the departure of the operator.

I hope I have not exceeded the limits of patience, in exposing prejudices, which, if not checked in time, may prove extremely detrimental to the future health, and the longevity of children. If the hints and cautions here suggested, be duly considered, it will be found that they are not taken from fancy, but derived from experience and observation. There is another mischievous practice, which deserves severe censure. Nurses and unthinking mothers often imagine they do service to the child, when they threaten it with the appearance of what is vulgarly styled the *Doctor*, who shall be called to perform an operation, or to punish the little offender with bitter medicines. In this absurd manner, the young mind is often prejudiced against medical assistance, merely because patience and prudence were wanting, to suggest more rational means of appeasing a fretful temper. If, therefore, proper measures were adopted, at the age of

adolescence, to impress young persons entering the world, with a due sense of the consequences arising from an indiscriminate use of quack and other patent medicines, more permanent good would thence result to society, than by all the endeavours to persuade children, that medicinal aid is intended only as a punishment for their refractory behaviour.

Great precaution, however, is required in contending against prejudices, so general and inveterate: one step too forward would deprive us of all confidence, and frustrate the most benevolent design. Power and severity cannot accomplish, what reflection and rational conviction will always perform; because mankind evince the greatest reluctance to comply with laws and regulations, the utility of which is not manifest. Hence, to extirpate those noxious weeds of society, the public and private empirics, I presume to suggest the following, as the most effectual, perhaps the only method:

Let us first convince the multitude, that there is no such thing in nature, as a medicine which either cures the same disease in *all* patients, or serves as a preventive for *all* diseases. Yet the most scientific demonstration will be of little, if any service, to banish quackery, if it be not aided by the attractive power of example. It would, therefore, be the first step towards its extirpation, if the higher ranks would dutifully support the efforts of well-meaning individuals. I will not decide, whether they would not ultimately derive equal benefit and satisfaction, from such co-operation. For, how can it be expected that those whom they are obliged to employ in domestic affairs, will assist in opposing hurtful prejudices, if they themselves are not sufficiently instructed, respecting the most common phenomena of Nature? But there is a more important point.

If every clergyman or curate—and who is better qualified to be employed in the services of humanity? were to bestow a small portion of his time in inquiring, not only of what disorder the person died, who is to be entered in the bills of mortality, but likewise, whether he had employed empirics, and taken any patent or other medicines made up for sale—not unlike those of the Veterinary Surgeons—I am convinced that such information, if laid before the public, would be attended with the best effects. Besides, this scheme would be productive of the following advantages:—1. That the relatives of the deceased

would learn, from clerical authority, what distemper has deprived them of a friend;—2. That it would excite more attention to the nature of epidemics, especially those connected with the seasons;—3. That we may also learn to appreciate, with more scrupulous accuracy, the operation of medicines in general; and,—4. That it would serve as an effectual check on every species of domestic and foreign quackery.

Although I do not wish to insinuate too many novel proposals, yet I think it would answer the most desirable purpose, if an annual *memorandum* were annexed to the bills of mortality, stating the exact and attested number of those who have fallen victims to the most celebrated nostrums advertised in newspapers. Such a regulation would be perfectly consistent with justice; as we are now obliged to pay for a considerable part of the daily prints, in which we are pompously informed of their wonderful effects.

Perhaps some apology may be necessary for trespassing upon the rugged path of empiricism; but I can speak positively from the experience of many unfortunate individuals, who have either fallen victims to fatal credulity and delusion, or whose health has suffered irreparable injury; hence, I claim indulgence for those invectives and demonstrations which are directed against so baneful a practice.

If the public were in possession of a system of education, founded on just principles, such mistaken notions and glaring impositions could not prevail. But how, it will be asked, can this desirable object be effected? It is doubtful, whether the example of the more enlightened would *alone* be sufficient: it appears to me indispensibly requisite, that youth of both sexes, in public and private schools, should be made acquainted with the constitution of the human body; they should be instructed in the elementary knowledge of the animal economy, particularly with respect to those parts of the frame which are most vulnerable, and essential to life. There can be no doubt, that the moral and physical attributes of human nature are inseparable; so that the cultivation of the one, without the other, must frequently lead to paradoxical and inconsistent actions. Nothing, indeed, is more common, than that propensity which the most judicious persons display in search of *general* rules for regulating the complicated art of education. Had the great Author of

Nature thought proper to form all his creatures upon the same plan, and to give each of them an equal portion of mental and bodily capacities, we might then reasonably expect to establish rules and maxims applicable to every individual. Such uniformity, however, does not exist: hence, the necessity of attending to the peculiarities of constitution, climate, season, and many other particulars, before we can venture to reduce any principles to general practice. In this manner only, experimental facts will become truly valuable and useful—and the important office of educating children, will receive every day new accessions and practical improvements.

TREATMENT TO BE ADOPTED DURING SUSPENDED ANIMATION, FROM COLD, HANGING, INTOXICATION, APOPLEXY, SUFFOCATION FROM NOXIOUS VAPOURS, LIGHTNING, &c.

OBSERVE the following cautions:—1. Lose no time.—2. Avoid all rough usage.—3. Never hold the body up by the feet.—4. Do not roll the body on casks.—5. Do not rub the body with salt or spirits.—6. Do not inject tobacco smoke, or infusion of tobacco.

Restorative Means, if apparently Drowned.—Send quickly for medical assistance; but do not delay the following means:—I. Convey the body carefully, with the head and shoulders in a raised position, to the nearest house.—II. Strip the body and rub it dry; then wrap it in hot blankets, and place it in a warm bed, in a warm apartment.—III. Wipe and cleanse the mouth and nostrils.—IV. In order to restore the natural heat of the body:

1. Move a heated covered warming-pan over the back and spine.—2. Place bladders, or bottles full of hot water, or heated bricks, to the pit of the stomach, the arm-pits, between the thighs, and to the soles of the feet.—3. Foment the body with hot flannels; but, if possible, immerse the body in a warm bath, as hot as the hand can bear without pain, as this is preferable to the other means of restoring warmth.—4. Rub the body briskly with the hand; do not however suspend the use of the other means at the same time.

V. In order to restore breathing, introduce the pipe of a common bellows, (where the apparatus of the Royal Society is not at hand) into one nostril, carefully closing

the other and the mouth; at the same time drawing downwards and pushing gently backwards the upper part of the windpipe, to allow a more free admission of air: blow the bellows gently, in order to inflate the lungs, till the breast be a little raised; the mouth and nostrils should then be set free, and a moderate pressure made with the hand upon the chest. Continue this process until signs of life appear.

VI. Electricity is to be employed early by a medical assistant.

VII. Inject into the stomach, by means of an elastic tube and syringe, half a pint of warm brandy and water, or wine and water.

VIII. Apply sal volatile, or hartshorn, to the nostrils.

If apparently dead from intense cold—Rub the body with ice, snow, or cold water. Restore warmth by slow degrees; and, after some time, if necessary, employ the means recommended for the drowned. In these accidents it is highly dangerous to apply heat too soon.

If apparently dead from hanging—In addition to the means recommended for the drowned, bleeding from the jugular vein or temporal artery, should be early adopted.

If apparently dead from noxious vapours, or lightning—1. Remove the body into a cool fresh current of air.—2. Dash cold water on the neck, face, and breast, frequently.—3. If the body be cold, apply warmth, as recommended for the drowned.—4. Use the means recommended for inflating the lungs, in direction V.—5. Let electricity (particularly in accidents from lightning) be early employed by a medical assistant or other competent person.

If apparently dead from intoxication—Lay the body on a bed, with the head raised: remove the neckcloth and loosen the clothes. Obtain instantly medical assistance, as the treatment must be regulated by the state of the patient; but, in the mean time, apply cloths soaked in cold water to the head, and bottles of hot water, or hot bricks, to the calves of the legs and feet.

If apparently dead from apoplexy—The patient should be placed in a cool air, and the clothes loosened, particularly about the neck and breast. Bleeding must be early employed, and the quantity of blood abstracted regulated by the state of the pulse. Cloths soaked in cold water, or vinegar and water, or spirits, should be constantly applied to the head, which should be instantly

shaved. All stimulants should be avoided. In cases of *coups de soleil* (strokes of the sun) the same means are to be used as in apoplexy.

*** On restoration to life, a tea-spoonful of warm water should be given; and then, if the power of swallowing be returned, small quantities of warm wine, or weak brandy and water, warm; the patient should be kept in bed, and a disposition to sleep encouraged, except in cases of apoplexy, intoxication, and *strokes of the sun*. Great care is requisite to maintain the restored vital actions; and, at the same time, to prevent undue excitement. The treatment here recommended is to be persevered in for three or four hours. It is an erroneous opinion that persons are irrecoverable, because life does not soon make its appearance; and it is absurd to suppose, that a body must not be meddled with or removed without the permission of a coroner.—See *New London Medical Pocket Book*, p. 18, &c.

THE EFFECTS OF PREJUDICE.

MONSIEUR, brother of Louis XIV. had an extreme aversion to being let blood. In 1701, he had a bleeding of the nose, which he concealed from the physicians, fearing that they would order him to be bled. Being at table with the King one day at Marly, he was seized with a bleeding at the nose, so considerable that the whole company was alarmed. M. Fochon, first physician, to whom long experience had given the right of speaking to the princes with a salutary boldness, said, after having examined him, "You are threatened with apoplexy, and you cannot be too soon blooded." The King, at different times, joined himself with the physician, in order to overcome the resistance of his brother to being bled; but never being able to succeed, he at length said, "You will find what your obstinacy will cost you. We shall be awoke some of these nights to be told—that you are dead."—The prediction was soon accomplished; for, at the end of a short time, after having supped very gaily at St. Cloud, Monsieur was about to retire, when he dropped down dead, as he was asking M. De Ventadour, who was near him, for a liqueur which the Duke of Savoy had sent him.

PRESCRIPTIONS.

Spermaceti Ointment.

Take Olive oil, - - - } of each, 4 ounces.
White wax, - - - - }
Spermaceti, - - - - - ½ ounce.

LONDON PHARMACOPŒIA.

Itch Ointment.

Take Prepared hog's lard, - - - - 1½ pound.
Flour of sulphur, - - - ½ pound.
White hellebore root, - - - - 2 ounces.
Nitre, - - - - - - - 1 drachm.
Soft soap, - - - - - - ½ pound.

To be well rubbed in at bed-time.

Turner's Cerate.

Take Olive oil, - - - - - - - 1 pound.
Yellow wax, - - - - - ½ pound.

Melt, cool, and, when it begins to set, add

Lapis calaminaris, - - - - ½ pound.

Red Lip-Salve.

Take White wax, - - - - - - - 4 ounces.
Olive oil, - - - - - - 5 ounces.
Spermaceti, - - - - - - 6 drachms.
Oil of lavender, - - - - - 20 drops.
Alkanet, - - - - - - 2 ounces.

Melt and strain.

White Lip-Salve.

Take Oil of almonds, and spermaceti, white wax, and white sugar candy, equal parts, of each, &c.

White Precipitate Ointment.

1. Take Simple ointment, or hog's lard, - - 1½ ounce.
Precipitate of sulphur, - - - - 2 drachms.
White precipitate of mercury, - - 2 scruples.
Solution of potash, - - - - - a few drops.

2. Take Hog's lard, - - - - - - 1½ ounce.
White precipitate of mercury, - - 1 drachm.

This last is good enough for the purpose of destroying animalculæ in children's heads, &c.

Red Precipitate.

1. Take Red precipitate of mercury, - - - 1 ounce.
Hog's lard, - - - - - - 8 ounces.

2. Take Red precipitate, - - - - - ½ ounce.
Ointment of white wax, - - - - ½ pound.

Stimulant.—To ill conditioned ulcers; also weakened with lard as an eye-salve.

Cephalic Plaster.

1. Take Burgundy pitch, - - - - - 2 pounds.
Labdanum, - - - - - - 1 pound.
Yellow resin, *(Basilicon)*, - } of each, 4 ounces.
Yellow wax, - - - }
Oil of mace, - - - - - 1 ounce.

2. Take Dry pitch, - - - - - - 2 pounds.
Frankincense, - - - - - 1 pound.
Basilicon, - - - - } of each, 4 ounces.
Yellow wax, - - - }
Expressed oil of nutmegs, - - - 1 ounce.

Major Cochrane's Cough Drops.

Take White poppy heads, without seeds, - ½ pound.
Water, - - - - - - 6 pints.

Boil to two pints; strain with expression, and boil again to one pound; strain once more, and add vinegar and brown sugar, of each one pound —boil to a syrup, add sulphuric acid, a sufficient quantity to make it gratefully acid.—Dose one tea-spoonful to three at bed-time.

Rhubarb Pills.

Take Rhubarb, - - - - - - 1 ounce.
Socotrine aloes, - - - - - 6 drachms.
Myrrh, - - - - - - ½ ounce.
Oil of peppermint, - - - - ½ drachm.

Syrup of orange peel, enough to be made into pills of ten grains each; two of which are to be taken twice a day.

Hooper's Pills.

Take Salt of steel, - - - - - - 2 ounces.
Powder of aloes with cinnamon, - - 1 pound.
Mucilage of gum tragacanth, - } of each, a sufficient quantity.
Tincture of aloes, - - }

Cut each drachm into eighteen pills—two or three for a dose.

Tonic Pills.

Take Ammoniated iron, - - - - 1 drachm.
Extract of gentian, - - } of each, ½ drachm.
Socotrine, - - - }

Make thirty pills, dose three times a day. MONRO.

Worm Pills.

Take Calomel, - - - - - - 1 ounce.
Sugar, - - - - - - - 2 ounces.
Starch, - - - - - - 1 ounce.

Mucilage of gum Arabic; enough—make 248 pills, or in proportion to the ingredients.—Dose, one, night and morning, for children.

Worm Cakes.

Take Aleppo scammony, - - - - 2 ounces.
Calomel prepared, - - - - - 3 ounces.
Resin of jalap, - - - - - 2 ounces.
Cream of tartar, - - - - - 4 ounces.
White sugar, - - - - - - 3 pounds.

Mucilage of gum tragacanth, enough to make into lozenges, each to contain one grain of calomel.

Cephalic Snuff.

1. Take Dried leaves of asarum, - - - - 1 ounce.
Lavender leaves, - - - - - 2 drachms.

2. Take Leaves of asarum, - - - - - 8 ounces.

Marjoram leaves, and flowers of lavender, of each, one ounce, in bead-ach a grain or two snuffed up the nose.

Earl of Warwick's Powder.

Take Scammony, - - - - - - 2 ounces.
Powder of antimony, - - - - 1 ounce.
Cream of tartar, - - - - - ½ ounce.

Embrocation for Rheumatism.

Take Olive oil—oil of turpentine, of each, - 1½ ounce.
Sulphuric acid, - - - - - 3 drachms.

This is the famous Guestonian embrocation used in chronic rheumatism.

Eye-Salve.

1. Take Powder of sulphate of zinc, - - - 1 ounce.
   Hog's lard, prepared, - - - - 6 ounces.
2. Take prepared tutty, - - - - - 2 ounces.
   Spermaceti ointment, - - - - 8 ounces.

In weak watery eyes, smear the edges of the eyelid night and morning.

Humid Cough in Old People.

Take Sulphate of zinc, - - - - - 10 grains.
Myrrh, in powder, - - - - - 1½ drachms.

Confection of roses enough, to make the mass, which is to be divided into 20 pills, two to be taken twice a day. PARIS.

Heartburn.

Take Magnesia, - - - - - - - 3 drachms.
Prepared chalk, - - - - - - 10 grains.
Ginger, - - - - - - - - 10 grains.

Mix for a powder.

For Colic in Old People.

Take Tincture of rhubarb, - - - - - 3 drachms.
——— senna, - - - - - - 2 drachms.
——— ginger, - - } of each, 1 drachm.
——— cardamom, - }

Mix for a draught.

Rheumatic Pills.

Take Gum of guaiacum, - - - - - ½ drachm.
Compound powder of ipecacuanha, - - ½ drachm.
Confection of opium, - - - - 10 grains.

Mix, and divide into twenty pills.—Two to be taken at bed-time.

For the Ague.

Take Peruvian bark, - - - - - - 1 ounce.
Snake root, - - - - - - - 1 drachm.
Ginger, in powder, - - - - - ½ ounce.
Syrup of cloves, enough to make an electuary.

The size of a walnut may be taken every three hours, or more if the stomach will bear it, during the intermissions; and to prevent a relapse, the same quantity should be taken every six hours for a week or ten days after the disease has been stopped. FORSYTH.

Mixture for a common Cough.

Take Vinegar of squills, - - - - - 3 drachms.
Tincture of the same, - - - - 2 drachms.
Spirits of nitre, - - - - - 1 drachm.
Tincture of foxglove, - - - - 10 drops.
Common water, - - - - - 4 ounces.
Syrup, - - - - - - - - 1 ounce.

Mix, and take a table-spoonful three or four times a day. This will ease the chest, and promote a free expectoration.

Chilblains.

Take Compound camphor liniment, } of each, ½ ounce.
Soap liniment, *(opodeldoc)* }
Oil of turpentine, - - - - - 3 drachms.

Mix.—As long as the skin remains entire, this liniment will be useful; or the parts may be bathed with warm spirits of rosemary at night, and covered with calico. Should the parts ulcerate, they may be dressed with an ointment made with ten grains of red precipitate and half an ounce of spermaceti ointment.

A Liniment for the Itch in Children.

Take Sulphuric acid, - - - - - - 5 drops.
Rose water, - - - - - - 15 drops.
Prepared hog's lard, - - - - 1 ounce.
Essence of lemon, - - - - - 15 drops.

To be used night and morning. This is a neat preparation, and will answer the intention well. For adults, a wash composed of half an ounce of sulphuric acid to a pint of water, will answer the same purpose.

Tooth-ach.

Take Purified opium, Camphor, - - - - - - of each, 2 grains.
Oil of cloves, Oil of pepper, - - - - - - of each, 2 drops.

Make a pill to be put into the tooth.

For Bilious Head-ach.

Take Antimonial powder, - - - - - 1 scruple.
Calomel, - - - - - - - 15 grains.
Compound extract of colocynth, - - 1 drachm.

Mix, and divide into twenty pills; two to be taken at bed time; and a small dose of the sulphate of magnesia *(Epsom salts)*, the next morning.

Diuretic Pill.

Take Powder of digitalis, - - - - 12 grains.
Squill pill, - - - - - - 2 scruples.

Mix, and make twelve pills. Dose, one every six hours. In dropsy, asthma, and cough.

For the Thrush in Children.

The honey of roses is often used to slight ulcerations or excoriations about the mouth and lips: and if borax be mixed up with it, in the proportion of about two scruples or a drachm of the latter to an ounce of the former, it forms a very excellent application for the thrush in children;—a small piece of which may be put into the mouth, and suffered to dissolve with the saliva.

Expectorating Powder.

1. Take Myrrh, - - - - - - - ½ drachm.
Sugar, - - - - - - - ½ ounce.
To be taken in the course of the day, in divided doses.

2. Take Myrrh, - - - - - - - 12 grains.
Ipecacuanha, - - - - - - 6 grains.
Nitre, - - - - - - - ½ drachm.
Make four powders.—Dose, one every four hours.

Antacid Powder.

Take Compound powder of chalk with opium, - 1 scruple.
Catechu, - - - - - - - 15 grains.

For one Dose—To be taken after each liquid stool, *in looseness arising from acidity in the intestines.*

Expectorating Pills in Asthma.

Take Squill pill, - - - - - - 1 drachm.
Calomel, - - - - - - 10 grains.
Antimonial powder, - - - - 20 grains.

To be made into twenty pills. Dose, one at night, and continued where the expectoration is scanty.

To recover a lost Voice.

1. Take a drachm of crabs-eyes, for three successive days.

2. Take ten drops of the balsam of sulphur, on a little sugar, twice or thrice a day, washing down with half a tumbler of pump water.

3. Drink half-a-pint of the decoction of the herb *fluellin*, twice a day.

For the Colic.

Infuse an ounce of the best rhubarb, cut small, in a quart of mountain wine, for twelve hours at least; then take four table-spoonsful, and fill up the bottle again. This is an excellent family medicine.

To give ease in Colic.

Boil four spoonsful of Irish usquebaugh in half-a-pint of ale, with a slice of ginger, and sweeten it with syrup of rhubarb.

THE BITE OF VENOMOUS REPTILES CURED BY OLIVE OIL.

In Tunis, when any person is stung by a scorpion, or bit by any other venomous reptile, they immediately scarify the part with a knife, and rub in olive oil as quick as possible, which arrests the progress of the venom. If oil is not applied in a few minutes, death is inevitable, particularly from the sting of a scorpion. Those in the kingdom of Tunis are the most venomous in the world.—*Jackson's Reflections on the Commerce of the Mediterranean.*

A CURE FOR DEAFNESS.

Roast an onion before bed-time—put an inner division of it into the ear affected, as warm as the patient can bear it—keep it in with a warm flannel bandage till morning, in the course of which perspiration will be excited, and on being taken away, the impediment will be removed, and the hearing restored, if the directions here given are carefully attended to.

ANTHELMINTICS; OR, MEDICINES WHICH PROCURE THE EVACUATION OF WORMS FROM THE STOMACH AND INTESTINES.

THE greater number of these act mechanically, dislodging the worms by the sharpness or roughness of their particles, or by their cathartic operation. Some seem to have no other qualities than those of powerful bitters, by which they either prove noxious to these animals, or remove that debility of the digestive organs, by which the food is not properly assimilated, or the secreted fluids poured into the intestines are not properly prepared: circumstances from which it has been supposed the generation of worms may arise.

The principal Medicines, with their respective Doses, belonging to this class.

	Dose.
Aloes	grs. v. to xv.
Asafœtida	grs. x. to ʒss.
Camphor	grs. v. to ϑj.
Cabbage bark tree	grs. x. to ϑiij.
Calomel	grs. iv. to x.
Castor oil	ʒss. to ʒij.
Cowhage	grs. v. to x.
Carolina pink	grs. v. to ʒij.
Camomile	ϑj. to ʒj.
Iron filings	grs. v. to ϑj.
Jalap	grs. x. to ʒss.
Garlick	ϑj. to ʒij.
Gamboge	grs. ij. to xij.
Hedge hyssop	grs. x. to ʒss.
Male fern-root	ʒj. to ʒiij.
Muriated barytes	drops iv. to x.
Muriate of soda (common salt)	ʒss. to Oj. of water.
Oil of almonds	ʒss. to ʒj.
—— olives	ʒss. to ʒjss.
Savine	grs. x. to ʒss.
Scammony	grs. v. to ϑj.
Tobacco	gr. ss. to v.
Tin filings	ʒj. to &c.
Wormseed	ϑj. to ʒj.

*** Anthelmintics or vermifuges are usually given on an empty stomach, blended with treacle, &c. Those that do not operate by purging, require the interposition of a cathartic, *e. g.* the male fern-root, tin filings, the Carolina pink, &c. In administering the last, it is generally premised by an emetic.—*New London Medical Pocket Book*, p. 22.

Secrets of Trade.—No. X.

RUSPINI'S TINCTURE FOR THE TEETH.

TAKE eight ounces of the root of Florentine iris; cloves, one ounce; rectified spirit, two pints; *ambergris*, one scruple.

RYMER'S CARDIAC TINCTURE,

consists of capsicum, camphor, lesser cardamoms, rhubarb, aloes, and castor, in proof spirit, with a few drops of the oil of vitriol.

SCOURING DROPS.

The peculiar odour which distinguishes oil of turpentine, may be destroyed by the addition of a few drops of some fragrant volatile oil, as that of lemons: a combination of this kind is commonly sold under the name of scouring drops, for the purpose of removing paint, oil, or grease, from cloth.

SEIDLITZ POWDERS, PATENT.

These powders consist of two different ingredients: that contained in a white paper, consists of two drachms of *tartarized soda*, and two scruples of carbonate of soda; that in the blue paper, of thirty-five grains of tartaric acid.

The contents of the white paper are to be dissolved in half a pint of spring water, to which those of the blue paper are to be added; the draught is to be taken in a state of effervescence. The acid being in excess, renders it more grateful, and no less efficacious as a purgative.

SENNA, PREPARED ESSENCE OF (SELWAY'S).

This is a concentrated infusion of senna, in combination with an alkali. It is well adapted for domestic use.—Sold at the usual quack depôts.

SINGLETON'S EYE-SALVE *(Golden Ointment)*.

Under this name, is sold a preparation which consists of sulphuret of arsenic (orpiment), mixed with lard, or spermaceti ointment. The ointment of the nitric oxyde of quicksilver, is sold under the same name.

*** In Paris, arsenic forms the basis of several blistering cerates. Such applications cannot be safe. Leonardo di Capoa tells us of a child killed by the violent vomiting and purging, occasioned from a slight wound made in the

head by a comb wet with oil, in which arsenic had been infused for the purpose of killing vermin. The arsenical amulets which were worn during the Plague of London, are said to have occasionally produced mischievous effects. Accordingly, Crato (*Epistol.* 168) observed an ulcer in the breast, caused by this application; Verzarcha, violent pains and fainting fits; Diemerbroech (*de Peste Hestor.* 99 *Annotat.*) and Dr. Hodges (*de Peste Lond.* p. 239), death itself.

SIROP DE CUISINIERE (*Kitchen, or Cook's Syrup*).

This consists of decoctions of sarsaparilla, burrage flowers, white roses, senna, and aniseed, to which corrosive sublimate is added; the whole is then made into a syrup with sugar and honey.

SMELLOME'S OINTMENT FOR THE EYES,

consists of half a drachm of verdigris, finely powdered, and rubbed with oil, and then mixed with an ounce of yellow basilicon. (*The cerate of resin of the London Pharmacopœia*).

SODAIC POWDERS. (See *Cheltenham Salts*, p. 11).

SOLOMON'S ANTI-IMPETIGINES.

A solution of corrosive sublimate: used in ring-worm, tetters, or other eruptions of the skin, where milder and less dangerous applications would be more effectual.

SOLOMON'S BALM OF GILEAD.

An aromatic tincture, of which cardamoms form a leading ingredient, made with brandy. It is also supposed that the Spanish fly enters its composition.

*** This boasted nostrum is nothing more or less than a simply medicated dram. The Balm of Gilead is now the slang phrase for the gin-bottle; and every old woman who can afford to purchase a bottle of Solomon, the better to disguise her propensity, extols it to the skies as a sovereign remedy for the "colic and the phthisic;" and in those circles where the Balm of Gilead is not to be attained, a glass or two of Hodges' cordial gin goes down as an excellent substitute. Among modern empirics, Solomon bears the bell. He knew brandy to be the *elixir* best calculated to give energy to the drooping spirits; and also, that, by adding a little of the powder, or rather the tincture, of the Spanish, that a miracle for the moment might be wrought, that would require, every time, an

additional stimulus, to produce similar effects: and so on in succession, until the Balm of Gilead becomes as inert as a glass of pump water.

SPEEDIMAN'S PILLS.

Aloes, myrrh, rhubarb, extract of chamomile, and some essential oil of chamomile.

SPILSBURY'S ANTI-SCORBUTIC DROPS.

Take Corrosive sublimate,		2 drachms.
Prepared sulphuret of antimony,		1 drachm.
Gentian root,	equal parts,	2 drachms.
Orange peel,		
Shavings of red saunders,		1 drachm.

Made with a pint of proof spirit into a tincture, which is to be digested and strained.

SQUIRES' ELIXIR.

Opium, camphor, snake-root, sub-carbonate of potass, anise and fennel seeds, made into a tincture, and coloured with cochineal.

STARKEY'S PILLS. (See *Mathews' Pills*, p. 377).

STEERS' OPODELDOC.

Castile soap, one ounce; rectified spirit, eight ounces; camphor, three ounces and an half; oil of rosemary, half a drachm; oil of marjoram, one drachm; solution of ammonia, six drachms.

STERRY'S PLASTER.

Ammoniacum, reduced to a suitable consistence by distilled vinegar. It adheres to the skin without irritating it, and without being attended with any unpleasant smell. This is the Emplastrum Ammoniaci of the London Pharmacopœia; and a person of the name of Sterry, in the Borough, prepares a plaster somewhat of the same description, which, among the lower orders, is eagerly sought after.

*** What a blessing it would be, if every nostrum were as harmless as this!

STEPHENS' REMEDY FOR THE STONE.

Mrs. Stephens, in 1733, offered to the world, for the small sum of 5000*l.* only, a medicinal composition, that was a *sure* dissolvent of the stone in the bladder. Several of the nobility and gentry, from friendship, or other motives, or in some way or other convinced of its efficacy, and affected with the sufferings of many of their fellow creatures, that laboured under the symptoms of stone,

subscribed from ten to forty guineas for the purchase; but after exhausting themselves with advertisements that did not fulfil their expectation, she had interest enough to attract notice from another quarter; viz. to Parliament, who, after mature deliberation, and with equal goodness and wisdom, did actually grant unto the said Mrs. Stephens, the afore-mentioned sum of 5000*l.* sterling, for her wonderful stone dissolvent; which was considered of too weighty importance to be longer withheld from the public, &c.

This said remedy for the stone, for which the above consideration was actually paid, consisted of lime, which was produced by calcining the shells of eggs and snails, and made into pills with soap. A decoction was also administered, consisting of chamomile, fennel, parsley, and burdock, together with a portion of Alicant soap. This is a very rational practice, and is very much what the practitioners of the present day depend upon: the observations of Mrs. Stephens respecting their administration, is equally judicious: "If these medicines," says she, "produce pain, it will be necessary to give an opiate with them, and it must be at all times a principal care to prevent a looseness, for if this should happen, it would carry off the medicines: under such circumstances, the quantity of the decoction, since it is laxative, must be diminished, and other suitable means taken, by the advice of a physician."

The credit, however, of introducing alkaline medicine * in cases of stone, does not rest with Mrs. Stephens; for we find that Basil Valentine employed a fixed alkaline salt in such cases; and it may be here added, that Sennertus, in his *Praxis Medica*, mentions a lithontriptic, or stone dissolver, that was in great repute, and in general use in his time; which consisted of one ounce of salt of tartar dissolved in a pint of barley-water, and afterwards tinged yellow with orange-peel.

*** Lime-water, soap, acidulous soda-water, caustic alkali, and bitters, are useful in cases of stone. Of soap, as much may be taken as the stomach will bear, or as much as will prove gently laxative; but of lime-water, few can take more than a pint daily, in consequence of the

---

* Dr. Chittick's remedy for the stone consisted of a fixed alkali in veal broth; the broth was usually made by his patients, and sent to him fresh every day, in order to be medicated.—A. D. 1766.

derangement it causes to the organs of digestion. The acidulous soda water may be taken in large quantities, as it is more agreeable.

There is a remedy celebrated in Holland, under the name of *Liquor lithontriptica loosii*, which, according to an accurate analysis, contains muriate of lime; which Professor Hufeland recommends in the following form:

Take Muriate of lime, - - - - - - 1 drachm.
Distilled water, - - - - - - 2 ounces.

Make a solution: thirty drops are to be taken four times a day, which may be increased as far as the stomach will bear.

It may be necessary nevertheless to observe, that for the cure of stone, little reliance can be placed on any lithontriptics hitherto discovered, though they may rationally be given, with a confident hope of procuring an alleviation of the fits of pain attending the presence of stone in the bladder. After all, the only certain method of getting rid of this troublesome and superfluous appendage, is by the operation, which may safely be performed at almost every time of life.

STOREY'S WORM CAKES.

Calomel and jalap made into cakes, and coloured by cinnabar. (See *Ching's Worm Lozenges*—the same observation applies here).

STROUGHTON'S ELIXIR.

This is a tincture of gentian, with the addition of snake-root, orange-peel, cardamoms, and some other *aromatics*.

STRUVE'S LOTION FOR THE HOOPING COUGH.

This once famous nostrum consisted of a drachm of tartarized antimony, dissolved in two ounces of water, to which was added an ounce of the tincture of cantharides.

TAYLOR'S REMEDY FOR DEAFNESS.

Garlick infused in the oil of almonds, and coloured by alkanet root.

THOMPSON'S CHELTENHAM SALTS. (*See* p. 72).

TOLU LOZENGES.

Take Sugar, - - - - - - - - 8 ounces.
Cream of tartar, - - - - - - 1 ounce.
Starch, - - - - - - - - 2 drachms.

Make into lozenges of the usual bulk.

THE MIRACULOUS CURE OF TOBIT.

Sir Everard Home, in his Cronian Lecture, 1797, observes, that it is an extremely curious circumstance, and probably the most so that can be met with in the history of medicine, that a local application should have been discovered to be of service, in a particular disease, 2513 years ago; that the same application, or those of a similar kind, should have been in very general use ever since; and, in all that time, no rational principle, on which such medicines produced their beneficial effects, should have been ascertained. This appears from the following account, to have been the case with respect to stimulating applications to the cornea*, in a diseased state, and can only be accounted for by a want of knowledge of the structure of the parts, which is an argument of uncommon weight in favour of the study of anatomy.

In the Apocrypha we find, in the book of Tobit, a very circumstantial account of an opacity of the cornea. successfully treated by stimulating applications. It is there treated as a miracle, but we have the authority of Jerome, a father of the church, who wrote in the fourth century, to say, "the church reads the books of Tobit, &c. for examples of life and instruction of manners;" we shall therefore, consider the account which is given in extracts from the book of Tobit in that view:

Tob. chap. vi. ver. 2. "When Tobias went down to wash himself in the river Tigris, a fish leaped out of the river, and would have devoured him. The angel of the Lord told him to take out the gall, and put it up in safety." —Ver. 6. "Tobias asked the angel what was the use of the gall?"—Ver. 8. "As for the gall, said the angel, it is good to anoint a man who hath whiteness in his eyes, and he shall be healed."—Chap. xi. ver. 11. "Tobias took hold of his father, and strake off the gall in his father's eyes, saying, be of good hope, my father."—Ver. 12. "And when his eyes began to smart he rubbed them."—Ver. 13. "And the whiteness peeled away from the corners of his eyes, and when he saw his son he fell upon his neck."

Dr. Russell, in his Travels in the East, gives the following account of the manner in which the Arabians treat inflammations and opacities of the cornea:

* The name of one of the membranes (the *sclerotic*) of the eye, is so called, from its horny consistence.—See "*New London Surgical and Medical Dictionary.*"

"Respecting," says he, "the practice of the Arabians in disorders of the eyes, I find nothing of consequence in my papers. An oculist, among them, is a distinct profession; and the collyria they apply are secret compositions, which pass hereditarily from father to son. The Arabian writers give a number of receipts, most of which are taken from Galen, and the Greek physicians. One composition in Avicenna contains the gall of a crow, crane, partridge, goat, &c. At Aleppo, the gall of the shee-fish, *siburus glanis* of Linn. was in particular request; but it should be remarked, that they always add to the gall other ingredients, it being a material circumstance, in that country, that a recipe should consist of a multitude of ingredients. What often struck me in their practice, was the successful application of sharp or acid remedies, at a time I should have been induced to make use of the mildest emollient applications."

From this account, given by Dr. Russell, there can be no doubt of gall having continued in use, as an application to the eye, among the Eastern nations, from the time of Tobit down to the present day.

"I have," continues Sir Everard, "in the course of the last three years made many trials of the effects of gall, as an application to the cornea in a diseased state. I have used it pure and diluted; and compared its effects with those of the nitrated ointment of quicksilver; and the solution of the nitrate of silver; and find, in old cases of opacity, it is in some instances, the best application. The gall of quadrupeds, in these trials, gave more pain than the gall of fish. The painful sensation was very severe for an hour or two, and then went off. The beneficial effects it produces appear to be in proportion to the local violence at the time of its application.

"Since this paper," says Sir Everard, "was read before the Royal Society, my friend Dr. Wells, acquainted me with the following case, published in the Annual Register, for the year 1678. 'One of the Paris newspapers gives an account of an extraordinary cure effected by the gall of a barbel, in a case of blindness, in substance as follows: A journeyman watchmaker, named Censier, having heard that the gall of a barbel was the remedy which Tobias employed to cure his father's blindness, resolved to try its effects on the widow Germain, his mother-in-law, whose eyes had, for six months, been afflicted with ulcers, and covered with a film, which rendered them totally

blind. Censier having obtained the gall of that fish, squeezed the liquor out of it into a phial, and in the evening he rubbed it, with the end of a feather, into his mother's eyes. It gave her great pain for about half an hour, which abated by degrees, and her eyes watered very much. Next morning she could not open them, the water, as it were, glueing her eyes up; the son bathed them with pure water, and she began to see with the eye which had received the most liquor. He used the gall again in the evening; the inflammation dispersed, the white of her eyes became red, their colour returned by degrees, and her sight became strong. He repeated it a third time, with all the desired success. In short, she recovered her sight without any other remedy. The widow Germain is in her 53d year. She had been pronounced blind by the surgeons of the Hôtel Dieu. Her blindness and her cure have been attested by order of the Lieutenant-general of police. She sees stronger and clearer now, than before the accident.'"—*Ann. Reg.* vol. xi. p. 143—*Orig.*

Housekeeping and Husbandry.—No. X.

Housekeeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

FARINACEOUS SUBSTANCES, &c.

BAKING.

WHEATEN FLOUR, HOW PREPARED FOR BREAD, COMMIXTURES, PRODUCE, &c.

The most nourishing of the flours, as containing a substance of an animal nature, called the gluten of flour, and which also causes it to make the best bread when properly fermented, is the flour made of wheat; the mixture of the flour and water being raised either by a portion of old dough, leaven, or the froth of fermenting wort, yeast or barm.

There are six sorts of wheat sold in London—namely, fine flour, second flour, middlings, fine middlings, coarse middlings, twenty-penny flour—all of which depends on the fineness of the sieves through which it is successively made to pass.

Sixty-one pounds, or a bushel of wheat, produces in grinding sixty pounds three quarters, which by dressing is resolved into forty-eight pounds second flour; four pounds and a half of fine pollard; four pounds of coarse pollard, and two pounds three quarters of bran; two pounds being lost in the process.

Five bushels, or a sack of second flour, weighing by law, two hundred and fifty pounds, requires generally three or four ounces of alum, sometimes from two to eight, with four pounds of common salt, half a gallon of yeast, and about three gallons of water, producing about eighty quartern loaves, sometimes eighty-two or eighty-three. A sack of flour, three ounces of alum, six pounds of common salt, one bushel of potatoes, three pounds yeast, with a sufficient quantity of water, produces a light and highly valuable bread.—A sack of indifferent flour, one pound of magnesia, with salt, yeast, and water as usual, makes excellent bread.

It is generally supposed that an imperfect kind of fermentation, similar to that in the preparation of wine or beer, takes place in making bread; but others deny this, because dough made in this manner does not yield any ardent spirit on distillation, although the same dough diluted with water, and suffered to ferment for sixteen hours, yielded a portion of spirit. The dough also falls so rapidly, that it cannot be supposed the fermentation has ceased.

In the summer time, when the yeast has turned acid, bakers are in the habit of adding a little subcarbonate of potass or of ammonia, which raises the dough in a few minutes. Mineral waters containing much carbonic acid, raise dough in a few minutes, without the help of yeast; and other substances which contain much enclosed air, also render the dough spongy, as eggs beaten to a froth, snow-water, &c.

RYE FLOUR.

This species of flour is used either to make a sweet bread, raising the dough by yeast, or an acid bread by using leaven for that purpose. The last is cooling, not so nourishing as the former, but more suited to an animal diet.

BARLEY FLOUR.

When barley flour is made into yeast, it requires the dough to be baked very soon after it is made, as it almost immediately becomes sour. A paste of barley meal and

water, is also used to take the hair off skins, previous to being tanned.

OATMEAL.

Used to make gruel, also thin unleavened cakes; and when employed as a poultice, is very resolvent.

WHEAT STARCH.

This is made from wheat flour, by washing it in sacks in a current of water, which carries off the starch and saccharine substance, and leaves the gluten in the sacks: the water being received in troughs, is left to ferment, which, decomposing the saccharine, renders the starch that is deposited, on standing, very pure and white. This starch is friable, easily pulverized, crimp between the fingers, without smell or taste. Wheat in France yielded almost three-fourths its weight; but in Sweden, not quite half its weight. Its properties are demulcent, and perhaps astringent; it is used for clysters, in diarrhœa and dysentery, &c.

COMMON STARCH.

This consists of starch mixed with powdered blue, to give a blueish tinge to the linen, which is stiffened with its solution in boiling water: this colour being given to it in opposition to the yellow starch, tinged with saffron or turmeric, formerly employed, but which went out of fashion on the execution of the famous midwife, Mrs. Cellier, who was hanged in a ruff of that colour. It is used as a cement, but unfit for internal use.

SEMOLINA.

This is wheat flour, granulated while moist, and dried so as to deprive it in part of its solubility in hot water.

KISEL.

Mix one or two pounds of wheat flour, with a handful of wheat bran, and a little yeast with some water; let it stand in a warm place for a fortnight, when the liquor on the surface is to be skimmed off, and the starch washed with cold water: boil this starch while still moist, with a little cow's milk, put it into moulds to become solid, and eat it with cream, or wine and sugar.

RYE STARCH.

Floury, greyish white, scarcely crimp, and retains the smell and taste of the grain, which yields about half its weight of starch.

BARLEY STARCH.

Powdery, greyish white, scarcely crimp, and retains the smell and taste of the grain, which yields rather more than half its weight of starch.

OAT STARCH.

Floury, greyish, not crimp, with a weak smell and taste of water-gruel: the grain yields half its weight of starch.

INDIAN ARROW ROOT,

Is made from the root of maranta arundinacea, by pounding or grating it in water, and letting the fecule settle. When rubbed up smooth with a little cold water, and boiling water poured upon this paste, it dissolves easily by stirring up a transparent jelly, without requiring to be boiled.—Its properties are nutritive.

POTATOE STARCH.

This may be made from frozen potatoes, in as large a quantity, and as good as from those which have not been spoiled by the frost; very white, crimp to the finger, and colours them—friable, heavy, sinking in water. When held towards the light, it has shining particles in it, dissolves in boiling water as easily as true arrow-root: 100lbs. of potatoes will yield 10lbs. of starch.

STARCH FROM PEAS AND BEANS, &c.

Dwarf Kidney-bean starch is white and crimp: one ounce of beans yielded forty-eight grains. *Pea starch,* white and crimp and good; the peas yield one-fourth of their weight. *Earth pea starch* is procured from the bulbs of lathyrus bellerosus; one pound of the bulbs yielded three ounces. *Bean starch* is white and crimp: one ounce yielded seventy-five grains. *Lentil starch,* is also white and crimp: one ounce yielded ninety-eight grains. *Chich pea starch,* from the seeds of cicer arietinum; white and good; one ounce yielded one hundred and two grains.

MEADOW SAFFRON STARCH,

May be prepared from the root of meadow saffron, where those plants are plentiful: when boiled with water, it is brown like sago, and cements well.

Fecule of Briony, Gersa serpentaria. All the above species of starch are prepared in a manner similar to that of wheat or potatoes, and others may be made from different roots or seeds; they are all nutritive.

SAGO,

Prepared from the trunk of the sago tree, by splitting it, bruising the logs in water to separate the fecule, pouring off the water and letting it stand to settle: when the sediment is half dried in the air, it is granulated by being passed through a coarse sieve, and the drying finished first in the sun, and then by fire: a single tree yields from three to four hundred weight of sago. Flat cakes are also made of the half-dried fecule by baking it in moulds.

CASSAVA.

Prepared from the root of the jatropha maninot, by expression of the juice, which is extremely acrid, and baking the cake that is left; also from *yucca gloriosa.*

TAPIOCA.

Prepared from the same root, in the manner of potatoe starch, breaking the moist fecule into roundish lumps, and drying them in that form: this and cassava only swell and soften in water, and thus make good puddings.

LINT-SEED MEAL.

Emollient; used in poultices, but the ground cake is usually sold for it.

LINT-SEED CAKE.

Left after the oil has been expressed from the lint-seed; used for fattening cattle, for short-breathed horses, and for manure.

GROUND LINT-SEED CAKE.—*Lint-seed Powder.*

Used for poultices, but requires in general some oil or fat to be added, to keep it from drying up too hard.

ALMOND CAKE.

Left after the expression of the oil, is principally composed of albumen.

GROUND ALMOND CAKE.—*Almond Powder.*

Used instead of soap, for washing the hands.

LOCK SOY.

Rice boiled to a kind of paste, and drawn out into threads: the Cochin Chinese is transparent; the Chinese opaque and less esteemed, used to thicken soups.

CRUST FOR FAMILY PIES WHEN BUTTER IS DEAR.

Cut some slices of beef-suet very thin; put some flour on your board; lay the suet upon it; roll it with a rolling-pin, till it is quite soft; rub it very fine into some flour, and mix it with cold water. It is much better done this

way than chopped, and makes a very good crust for any pie that is to be eaten hot, or for fruit puddings.

PREPARED HOG'S LARD.

Take any quantity of the leaf-fat of a large hog; cut it into bits about an inch square; put it over a slow fire in a clean, bright, brass kettle (if it is put in a pot that is tinned it will fetch the tin off); let the heat increase gradually, till it boils, and a good quantity of fat is melted; (keep stirring it often); then pour it through a cullender into an earthen pot or pan; when the liquid part of the fat has run through, return what was left in the cullender into the kettle, and put it over the fire till more is melted; then put it into the cullender, as before; do this three or four times to draw out all the lard; take care it does not scorch, as that would spoil the flavour and colour, and render it unfit for use; when it begins to cool, put it into small bladders; tie them up close, and hang them in a cool dry place, if it is to be kept a long time; but if it is only for a month or two's use, it may remain in the pot, with a paper tied over it. Beef-suet may be done in the same way, and is very good for pastry or frying.

TO BOIL A TONGUE.

If the tongue is dried, it must lie in water one night before you boil it; if a pickled one, only wash it in a good quantity of water; put it into the pot, with the water cold, and let it boil very slowly, three hours and a half; if a large one, four hours or more, according to the size of it. When you take it up, be careful not to stick a fork in it; take off the peel, put it on a dish, and garnish it with any kind of herbs you think proper. If the tongue is to be eaten cold, when the peel is taken off, put it into an earthen pan, with as much of the liquor it was boiled in as will cover it; let it remain till cold; then take it out, and dry it with a clean cloth; cut it in slices, and send it to table, garnished with green parsley.

FAMOUS AMERICAN RECIPE FOR RHEUMATISM.

TAKE garlic, two cloves; gum ammonia, one drachm; pound them together, and make them into six boluses, with water. Take one or two at night and morning, drinking in the interim strong sassafras tea.

*** This, it is said, has generally been found to banish the rheumatism, and even contraction of the joints, in five times taking.

Rural Economy.—No. VI.

INSTRUCTIONS FOR CULTIVATING AND CURING TOBACCO IN ENGLAND.

(From Mr. Carver's Treatise on that subject).

Soil.

THE best ground for raising the plant, is a warm rich soil, not subject to be over-run with weeds; for from these it must be totally cleared. The soil in which it grows in Virginia, is inclining to sandy, consequently warm and light; the nearer, therefore, the nature of the land approaches to that, the greater probability there is of its flourishing here. The situation most preferable for a plantation, is the southern declivity of a hill, or a spot that is sheltered from the blighting north winds which so frequently blow, during the spring months, in this island. But at the same time the plants must enjoy a free current of air; for if that be obstructed, they will not prosper.

Seed.

As the tobacco plant, being an annual, is only to be raised from seed, the greatest care in purchasing these is necessary; lest, by sowing such as is not good, we lose, with the expected crop, the season. The different sorts of the seeds not being distinguishable from each other, nor the goodness to be ascertained by their appearance, the purchaser should apply to a person of character in that profession. In describing the manner in which the plant ought to be raised from the seed, as well as in the succeeding progress, I shall confine myself to the practice of the northern colonies of America, as these are more parallel in their latitude to England.

Time to sow the Seed, &c.

About the middle of April, or rather sooner in a forward spring, sow the seed in beds first prepared for the purpose with some warm rich manure. In a cold spring, regular hot-beds would be most eligible for this purpose; and indeed the gardeners of this county are persuaded, that the Nicotania cannot be raised in any other way; but these are seldom to be found in common gardens, and I am convinced that if the weather is not remarkably severe,

they might be reared without doors. A square yard of land, for which a small quantity of seed is sufficient, will produce above five hundred plants, and allow proper space for their nurture till they are fit to transplant.

Directions after the Plants appear, &c.

Having sown the seed in the manner directed, on the least apprehension of a frost after the plants appear, it will be necessary to spread mats over the beds, elevated from the ground by poles laid across. These, however, must be removed in the morning, soon after the sun appears, that they may receive as much benefit as possible from its warmth, and from the air. In this manner proceed till the leaves have attained the size of about two inches in length, and one in breadth, which they will do in about a month, or near the middle of May. One invariable rule for their being able to bear removal is, when the fourth leaf is sprouted, and the fifth just appears. Then take the opportunity of the first rains, or gentle showers, to transplant them into such a soil and situation as before described. The land must be ploughed, or dug up with spades, as mellow and light as possible. Raise, with the hoe, small hillocks, at the distance of two feet, or a little more, from each other, taking care that no hard sods or lumps are in it, and then just indent the middle of each, without dibbling the holes as for some other plants. When your ground is thus prepared, dig up the plants in a gentle manner from their native bed, and insert a plant gently into the centre of each hillock, pressing the soil around it with your fingers, and taking the greatest care during the operation, that you do not break off any of the leaves, which are at this time exquisitely tender. If the weather proves dry after they are thus transplanted, they must be watered with soft water, in the same manner as is usually done to coleworts, or plants of a similar kind. From this time, great care must be taken to keep the ground soft, and free from weeds, by often stirring with your hoe the mould round the roots, and pruning off the dead leaves that sometimes are found near the bottom of the stalk.

Time of Topping the Tobacco, &c.

The difference of this climate from that in which I have been accustomed to observe the progress of this plant, will not permit me to direct with certainty the time which

is most proper to take off the top of it, to prevent it from running to seed. This knowledge can only be perfectly acquired by experience. When it has risen to upwards of two feet, it commonly begins to put forth the branches on which the flowers and seeds are produced; but as this expansion, if suffered to take place, would drain the nutriment from the leaves, and thereby lessen their size and efficacy, it becomes needful, at this stage, to nip off the extremity of the stalk, to prevent its growing higher. In some other climates, the top is commonly cut off when the plant has fifteen leaves; if the tobacco is intended to be a little stronger than usual, this is done when it has only thirteen; and sometimes, when it is chosen to be remarkably powerful, eleven or twelve leaves only are allowed to expand. On the contrary, if the planter is desirous to have his crop very mild, he suffers it to put forth eighteen or twenty; but in this calculation, the three or four lower leaves next the ground are not to be reckoned.

This is denominated "topping the tobacco," and is much better done by the finger and thumb, than with any instrument; because the former close, at the same time, the pores of the plants; whereas, when it is done with the latter, the juices are in some degree exhausted. And though this might appear unimportant, yet every method that tends to give vigour to the leaves, should be carefully pursued. For the same reason, care must be taken to nip off the sprouts that will be continually springing up at the junction of the leaves with the stalks. This is termed "suckering the tobacco," and ought to be repeated as often as occasion requires.

How to Destroy the Tobacco Worm.

The last, and not the least concern in the cultivation of this plant, is the destruction of the worm that Nature has given it for an enemy, and which, like many other reptiles, preys on its benefactor. To destroy these, which are the only insects that molest this plant, every leaf must be carefully searched. As soon as such a wound is discovered, the cause of it, who will be found near it, from his unsubstantial texture, which I shall presently describe, may be easily crushed; but the best method is to pluck it away by the horn, and then crush it. Without a constant attention to these noxious insects, a whole field of plants may be soon destroyed. This is termed

"worming the tobacco;" and as these worms are found most predominant the latter end of July, and the beginning of August, they must be particularly attended to at that season.

Uncertainty of the Time of Ripening.

As I have just observed, that it is impossible, without experience, to point out the due time for topping the plant, so it is equally as impossible to ascertain the time it will take to ripen in this climate. That can only be known by future observations; for as it is at present only cultivated in England as an ornament for the garden, no particular attention has, I believe, been hitherto bestowed on the preservation of its leaves. The apparent signs, however, of its maturity are, that the leaves, as they approach a state of ripeness, become more corrugated or rough; and when fully ripe, appear mottled with yellowish spots on the raised parts, whilst the cavities retain their usual green colour. They are, at this time, also thicker than they have before been, and are covered with a kind of downy velvet. If heavy rains happen at this critical period, they will wash this excrescent substance off, and thereby damage the plants. In such a case, if the frosty nights are not begun, it is proper to let them stand a few days longer; when, if the weather be more moderate, they will recover this substance again. But if a frost unexpectedly happens during the night, they must be carefully examined in the morning before the sun has any influence on them: and those which are found to be covered with frosty particles, whether thoroughly ripe or not, must be cut up: for though they may not at all appear to be arrived at a state of maturity, yet they cannot be far from it, and will differ but little in goodness from those that are perfectly so.

Description of the Tobacco Worm.

Having now given every instruction that occurs to my memory relative to the culture of the plant, I shall describe the worm that infests it. It is of the horned species, and appears to be peculiar to this plant; so that in many parts of America it is distinguished by the name of the tobacco-worm. The first time it is discernible is when the plants have gained about half their height: it then appears to be nearly as large as a gnat; soon after which it lengthens into a worm, and by degrees increases to the size of a man's finger. In shape it is regular from its head

to its tail, without any diminution at either extremity: indented or ribbed round at equal distances, nearly a quarter of an inch from each other, and having at every one of these divisions a pair of claws, by which it fastens itself to the plant. Its mouth, like that of the caterpillar, is placed under the fore part of the head. On the top of the head, between the eyes, grows a horn about half an inch in length, and greatly resembling a thorn; the extreme part of which is brown, of a firm texture, and sharp pointed. By this horn, as before observed, it is usually plucked from the leaf.

Directions for Gathering, and after-Management, &c.

When the plant is fit for gathering, on the first morning that promises a fair day, before the sun is risen, take a long knife, and holding the stalk near the top with one hand, sever it from its root with the other, as low as possible. Having done this, lay it gently on the ground, and there let it remain exposed to the sun throughout the day, or until the leaves are entirely wilted, as it is termed in America; that is, till they become limper, and will bend any way without breaking. If, on the contrary, the rain should continue without any intervals, and the plant appears to be full ripe, they must be cut down and housed immediately. This must be done, however, with great care, that the leaves, which are in this state very brittle, may not be broken. Being placed under proper shelter, either in a barn or a covered hovel, where they cannot be affected by the rain or too much air, they must be thinly scattered on the floor, and if the sun does not appear for several days, so that they can be laid out again, they must remain to wilt in that manner; which is not indeed so desirable as in the sun, nor will the tobacco prove quite so good.

When the leaves have acquired the flexibility before described, the plants must be laid in heaps, or rather in one heap, if the quantity be not too great, and in about twenty-four hours they will be found to sweat. But during this time, when they have lain for a little while, and begin to ferment, it is necessary to turn them, that the whole quantity may be equally fermented. The longer they lie in this situation the darker coloured the tobacco becomes. This is termed "sweating the tobacco."

After they have lain in this manner for three or four days, for in a longer time they grow mouldy, the plants

may be tied together in pairs, and hung across a pole, in the same covered place, a proper interval being left between each pair. In about a month they will be thoroughly dried, and of a proper temperature to be taken down. This state may be ascertained by their appearing of the same colour as those imported from America, with which few are unacquainted. But this can be done at no other season than during wet weather; for the tobacco greatly abounding with salts, it is always affected if there is the least humidity in the atmosphere, even though it be hung in a dry place. If this rule be not observed, but they are removed in dry weather, the leaves will crumble, and a considerable waste will attend its removal.

The Second, or last Sweating, &c.

As soon as the plants are taken down, they must once more be laid in a heap, and pressed with heavy logs of wood for about a week. This climate, however, may require a longer time. Whilst they remain in this state, it will be necessary to introduce your hand frequently into the heap, to discover whether the heat be not too intense; for in large quantities this will sometimes be the case, and considerable damage will accrue from it. When the heat exceeds a moderate glowing warmth, part of the weight by which they are compressed must be taken away; and the cause being removed, the effect will cease. This is called "the second, or last sweating," and when completed, which it generally will be in about the time just mentioned, the leaves may be stripped from the stalks for use. Many omit this last operation, but it takes away any remaining harshness, and renders the tobacco more mellow. When the leaves are stripped from the stalks, they are to be tied up in bunches and kept in a cellar, or any other place that is damp; though if not handled in dry weather, but only during a rainy season, it is of little consequence in what part of the house or barn they are laid up. At this period the tobacco is thoroughly cured, and equally proper for manufacturing as that imported from the colonies. If it has been properly managed, that raw fiery taste so frequently found in the common sale tobacco will be totally eradicated; and though it retains all its strength, will be soft and pleasing in its flavour. Those who are curious in their tobacco in the northern colonies of America, sprinkle it, when made up into rolls for keeping, with small common white wines or cyder,

instead of salt water, which gives it an inexpressibly fine flavour.

Observations.

*** By pursuing the rules which I have endeavoured to give in as explicit terms as possible, country gentlemen and landholders in general will be enabled to raise much better tobacco than that which is usually imported from Maryland or Virginia: for notwithstanding there are not wanting prohibitory laws in those countries to prevent the planters from sending to market any but the principal leaves, yet they frequently, to increase their profit, suffer the sprouts to grow, and mix the smaller leaves of these with the others, which renders them much inferior in goodness.

The crops that I have reason to believe may be raised in England, will greatly exceed in flavour and efficacy any that is imported from the southern colonies: for though northern climates require far more care and exactness to bring tobacco to a proper state of maturity than warmer latitudes, yet this tardiness of growth tends to impregnate the plants with a greater quantity of salts, and consequently with that aromatic flavour for which it is prized, than is to be found in the produce of hotter climates, where it is brought to a state of perfection, from the seed, in half the time required in colder regions.

A pound of tobacco raised in New England or Nova Scotia, is supposed to contain as much real strength as two pounds from Virginia; and I doubt not but that near double the quantity of salts might be extracted from it by a chymical process.

I shall also just add, though the example can only be followed in particular parts of these kingdoms, that the Americans usually choose for the place where they intend to make the seedling bed, part of a copse, or a spot of ground covered with wood, of which they burn down such a portion as they think necessary. Having done this, they rake up the subjacent mould, and mixing it with the ashes thus produced, sow therein the seed, without adding any other manure, or taking any other steps. Where this method cannot be pursued, wood-ashes may be strewed over the mould in which the seed is designed to be sown.

To the uses already known, there is another to which tobacco might be applied, that I believe has never been thought of by Europeans; and which may render it much more estimable than any other. It has been found by the

Americans to answer the purpose of tanning leather, as well, if not better, than bark; and was not the latter so plentiful in their country, would be generally used by them instead of it. I have been witness to many experiments wherein it has proved successful, especially on the thinner sorts of hides, and can safely pronounce it to be, in countries where bark is scarce, a valuable substitute for that article.

Horticulture.

DECEMBER.

THE KITCHEN-GARDEN.—In this month some sowing and planting will be required, and to forward the business of manuring, digging, or trenching vacant ground, laying it in ridges; preparing hot dung, and making hot-beds where early crops are in request; earthing and tying up particular plants to blanch, and to protect some tender plants from frost.

All sowing and planting—in the open ground, perform only in open dry weather.

——— The business of sowing and planting is necessary only in a few articles, some in south borders and warm quarters, and others in hot-beds; all for early crops.

Sowing articles—are only a few early peas and radishes on warm borders, and small salading and cucumbers in hot-beds.

Articles for planting—are some early beans, and strong cabbage plants and coleworts; and in hot-beds, asparagus, cucumbers, and occasionally mint and tarragon.

Continue preparing vacant ground—by occasional manuring, or general digging or trenching in ridges, to enrich for spring sowing and planting.

For early crops—of peas, beans, and radishes, dig some warm south borders, and warmest dry quarters of ground.

FRUIT-GARDEN AND ORCHARD.—The work of this month is to complete any principal planting intended, while open weather, and to forward all winter pruning.

Ground intended for planting—with any kind of fruit trees, if improvement in the soil is thought necessary, let it be done according to the intimations given in the two last months; but remark that fruit trees will prosper in any good mellow ground, the soil of which is one or two spades deep, and that is not liable to be very wet; but where the latter unavoidably occurs, endeavour to amend

and raise it as much as possible, especially where the trees are to be set.

Ground intended for planting—or where the ground is of a very poor, light, hungry, or otherwise unfavourable nature, apply a compost of good earth, loam, and rotten dung, at least to the places where the trees are to stand, which may be increased at leisure, as observed on former occasions.

Planting may be performed—in all wall trees, espaliers, and standards, when the weather is open.

But in planting—it is advisable to complete what is intended at this season, as soon as possible, while open weather prevails; and not continue it, or have the trees removed for that occasion if there is the appearance of expected frost setting in severe.

Flower-Garden and Pleasure-Ground.—The business of the flower-garden, pleasure-ground, &c. consists in finishing all intended winter planting, if mild weather, in roots, plants, shrubs, and trees; and in forwarding any requisite pruning in trees and shrubs: also to keep the principal compartments of walks, borders, and lawns, decently clean; and in severe frost to give occasional protection to tender or curious plants.

For intended planting—dig beds, borders, and shrubberry compartments.

Planting—may still be performed in open mild weather, in bulbous roots, hardy perennials and biennials, and most sorts of trees and shrubs: but more freely in the deciduous than in the evergreen kinds.

Keep clean all principal compartments—by eradicating weeds in the borders, and sometimes raking them; pole and roll grass, sweep and roll principal gravel-walks, and prune and dig shrubberies: also dig beds and borders, to destroy weeds effectually, and to appear clean, neat, and ready for planting, &c.

Work in the Nursery.—In this season, as severe frosts often prevail or are expected, no considerable works of removing or transplanting of young trees, &c. is advisable, nor of sowing seed thereof, or propagating by cuttings and layers; but several other necessary works will be required, which should now be performed occasionally; such as forwarding the digging of vacant ground for spring planting and sowing; digging between the rows of trees and shrubs; mulching the ground between the stems of some of the more curious or less hardy kinds, to preserve them more securely from the power of rigorous frost; giving other occasional protection in severe weather

to any more tender or curious exotics; pruning and trimming the stems of trees, &c. wheeling in dung for manure; and some other occasional works, as hereafter directed.

The work of transplanting—may be occasionally performed moderately in open weather, where required, especially in most of the hardy deciduous trees and shrubs, both in some nursery planting, and for final planting in garden and shrubbery plantations, &c. but if appearance of frost setting in, should decline all planting, or at least removal or transplanting of any kind of trees and shrubs.

——— However, in continuation of open settled weather, any particularly necessary planting and drawing of trees may be forwarded in dry light ground, without any great risk of injury; and may transplant some hardier sorts of evergreens (b. m.) for gardens, shrubberies, and other plantations; but they will be more safely removed with balls of earth about the roots.

The work of transplanting—but in evergreens particularly, it is not at all advisable to perform any general transplanting at this season in the nursery way.

THE GREEN-HOUSE.—In the green-house particular attention is required, to admit air to the plants in all mild weather, and to give occasional moderate waterings; likewise to protect them effectually from frost.

Fresh air—admit only in mild open weather, every day, by opening some of the glasses moderately, from nine or ten in the morning till three or four in the afternoon; then shut close for the night.

Fresh air—But in giving air, if the weather changes sharply cold, shut close, or only draw down the glasses a little at top.

——— Never admit air in foggy or very damp weather, nor when sharp frost or much wind.

In frosty weather—keep the glasses constantly close; and when very severe, put up shutters, or nail mats against the glasses; also where flues, make gentle fires.

Water—will be required occasionally, but always very moderately at this season, and never in frost; water the succulent plants, but seldom and sparingly.

Stir the surface of the earth—in the pots, where it appears crusted or bound.

Decayed leaves and shoots, &c.—always clear off from the plants.

HOT-HOUSE AND STOVE.—At this season be careful to keep a constant regular heat in the pinery and general

hot-house, by continuing the bark-beds of a proper temperature, and by fires every evening and cold mornings, or sometimes all day, when intemperately cold, or severe frosts; and in mild sunny weather give occasional moderate supplies of air and water.

As most hot-houses, &c. compromise not only a principal supply of pines, but also of many other curious tender exotics, the same degree of internal heat suits the whole; only the pines in particular, must be continued always plunged in the bark-bed; and most of the other plants may be disposed in different parts of the hot-house or pinery, upon shelves at top of the flues, &c. and some occasionally in the bark-bed, particularly any more curious tender kinds; or sometimes to forward any particular sorts for flowering more effectually, and occasionally to strike cuttings, layers, and suckers; or also to vegetate seeds, or to expedite the fresh-roots of some newly-planted exotics.

The Toilette.—No. VI.

TOOTH POWDER TO REMEDY A BAD BREATH.

Take Cream of tartar, Chalk, } of each, ½ ounce.
Myrrh, powdered, 1 drachm.
Orrice-root, powdered, ½ drachm.
Powdered bark, 2 drachms.
Mix all together, and rub down the mass well in a mortar.

A WASH TO BE USED TO THE ARM-PITS WHEN THE PERSPIRATION IS UNPLEASANT.

Take Pure spring water as cold as can be got, 2 pints.
Tincture of myrrh, 1 ounce.
Sulphate of zinc, ½ ounce.
Rose water, 2 ounces.
Mix all together, and sponge the arm-pits occasionally with it.

TO MODERATE PERSPIRATION.

Take Spring water, 4 ounces.
Diluted sulphuric acid, 40 drops.
Compound spirits of lavender, 2 drachms.
Mix.—A table-spooonful twice a day; keeping the bowels regular by rhubarb.

WASH TO WHITEN THE NAILS.

Take Diluted sulphuric acid, 2 drachms.
Pump water, 4 ounces.
Tincture of myrrh, 1 drachm.
Mix.—First cleanse with white soap, and then dip the fingers into the wash.

TO IMPROVE THE VOICE.

Add twenty drops of the oil of sweet almonds to half a glass of port wine.

TABLE OF THE PROBABILITIES OF THE DURATION OF THE LIFE OF MAN:

Calculated from the Mortality Bills of Three Parishes in the City of Paris, and Twelve Country Parishes in the Neighbourhood of that city, with Remarks. By M. Buffon.

THE first column of each of the two divisions of this table contains the age of the person, and the second column contains the number of years and months, during which a person of that age has an equal chance to live.

Age.	Durat. of Life.	Age.	Durat. of Life.
Years.	Years. Months	Years.	Years. Months.
0	8 — 0	43	20 — 4
1	33 — 0	44	19 — 9
2	38 — 0	45	19 — 3
3	40 — 0	46	18 — 9
4	41 — 0	47	18 — 2
5	41 — 6	48	17 — 8
6	42 — 0	49	17 — 2
7	42 — 3	50	16 — 7
8	41 — 6	51	16 — 0
9	40 — 10	52	15 — 6
10	40 — 2	53	15 — 0
11	39 — 6	54	14 — 6
12	38 — 9	55	14 — 0
13	38 — 1	56	13 — 5
14	37 — 5	57	12 — 10
15	36 — 9	58	12 — 3
16	36 — 0	59	11 — 8
17	35 — 4	60	11 — 1
18	34 — 8	61	10 — 6
19	34 — 0	62	10 — 0
20	33 — 5	63	9 — 6
21	32 — 11	64	9 — 0
22	32 — 4	65	8 — 6
23	31 — 10	66	8 — 0
24	31 — 3	67	7 — 6
25	30 — 9	68	7 — 0
26	30 — 2	69	6 — 7
27	29 — 7	70	6 — 2
28	29 — 0	71	5 — 8
29	28 — 6	72	5 — 4
30	28 — 0	73	5 — 0
31	27 — 6	74	4 — 9
32	26 — 11	75	4 — 6
33	26 — 3	76	4 — 3
34	25 — 7	77	4 — 1
35	25 — 0	78	3 — 11
36	24 — 5	79	3 — 9
37	23 — 10	80	3 — 7
38	23 — 3	81	3 — 5
39	22 — 8	82	3 — 3
40	22 — 1	83	3 — 2
41	21 — 6	84	3 — 1
42	20 — 11	85	3 — 0

By this table, says the author, we may see, that it may be reasonably hoped, that is to say, we may lay or bet one to one, that a new-born infant will live eight years; that a child of one year old will live 33 years more; that a child of full two years old will live 38 years more; that a man of 20 complete, will live 33 years and five months more; that a man of 30 will live 28 years more, and so of all the other ages. And he adds the following observations:—1. That the age at which the longest life is to be expected is the age of 7, because we may lay an equal wager, or one to one, that a child of that age will live 42 years and 3 months longer.—2. That at the age of 12 or 13, we have lived a fourth part of our life, because we cannot reasonably expect to live above 38 or 39 years longer; that in like manner, at the age of 28 or 29, we have lived one half of our life, because we have but 28 years more to live; and lastly, that before 50 we have lived three-fourths of our life, because we can hope but for 16 or 17 years more. But, says he, these physical truths, however mortifying in themselves, may be alleviated by moral considerations; for a man ought to consider the first fifteen years of his life as nothing: all that happened to him, all that passed in that long interval of time, is effaced out of his memory; or at least has so little relation to the views and the affairs which after that time take up his thoughts, that it gives him no concern. It is no longer the same succession of ideas, or, we may say, the same life. We do not begin our moral life until after we have begun to regulate our thoughts, to direct them to a certain future view, and to assume a sort of consistency, a relation to what we ought to be afterwards. By considering the duration of life in this light, which is the true one, we shall find from the table, that at the age of 25 we have lived but a fourth part of our life, that at the age of 38 we have lived but half of it, and that we have not passed three-fourths of it until the 56th year of our age.

These are the author's observations, to which we shall add, with regard to insurances upon lives, that for insuring for one year the life of a child of three years old, we ought to pay but $2\frac{1}{2}$ per cent. for as it has by this table an equal chance of living 40 years, it is forty to one that it does not die in a year. In the same manner we ought to pay but 3 per cent. for insuring for one year the life of a lad of 19 or 20; but 4 per cent. for insuring for one year

the life of a man of 35; and but 5 per cent. for insuring for one year the life of a man of 43; after which the insurance ought to rise above 5 per cent. in proportion to the advance of a person's age above 43; so that a man of 77 ought to pay 25 per cent. and a man of 85, $33\frac{1}{3}$ per cent. for insuring his life for one year.

And from the same the table we may see, that those who insure lives at the rate of 5 per cent. per ann. that is to say, who have 5*l.* paid them yearly for every hundred pounds they engage to pay upon the death of any person; such insurers, we may see, must be great gainers, even at the present low rate of interest, if the persons whose lives are thus insured, be above one, and under 51 years of age, because 5*l.* per ann. at 3*l.* per cent. compound interest, supposing the money to be laid out at interest half yearly only, produces above 100*l.* in 16 years; whereas it appears by this table, that all persons above one, and under 51 years of age, have an equal chance for living more than 16 years. Nay as 5*l.* per ann. at 3*l.* per cent. compound interest, produces above 200*l.* in 27 years, the insurers must be above cent. per cent. gainers upon the lives of all persons above one, and under 31 years of age.

Then with regard to the purchase or sale of annuities for life, we may from this table, and the tables of compound interest, easily see what a person of any age ought to pay for an annuity for life; because in this table we may see what number of years a person of any age has an equal chance to live, and in the tables of compound interest, we may see what is the present value of any annuity for that number of years, at the then common rate of interest. Thus a person of 30 has by this table an equal chance to live 28 years, and by the tables of compound interest we may see, that the present value of 1*l.* per ann. for 28 years, reckoning interest at 3*l.* per cent. is a little above 18*l.* 15*s.* Therefore a person of that age ought to pay, at the present low rate of interest, near nineteen years' purchase for an annuity for life: whereas, if the common rate of interest were still at 5*l.* per cent. he ought to pay full fifteen years' purchase; and as there were always more sellers than buyers, the common price was generally under this rate.

LECTURES ON THE PHYSICAL EDUCATION OF CHILDREN, DURING THE EARLY PART OF THEIR LIVES.

ADDRESSED TO MOTHERS, &c. BY A. F. WILLICH, M. D.

(Continued from p. 502).

LECT. III.

Abstract of Professor Hufeland's Opinions relative to the Food and Drink, Sleep and Cries, of Children.

Of Food, &c.

HAPPY is the child who, during the first period of its existence, is fed upon no other aliment than the milk of its mother, or that of a healthy nurse: if other food becomes necessary before the child has acquired teeth, it ought to be of a liquid form; for instance, biscuits, or stale bread, boiled in an equal mixture of milk and water, to the consistence of a thick soup; but by no means even this in the first week of its life. Flour or meal ought never to be used for soup, as it produces viscid humours, instead of a wholesome nutritious chyle, while it lays the foundation for worms, and obstructs the mesentery. After the first six months, weak veal or chicken broth may be given, and also, progressively, vegetables that are not very flatulent; for instance, carrots, endive, spinach, parsneps, scorzonera made into pudding, with broth and boiled fruit, such as apples, pears, plums, and cherries. When the infant is weaned, and has acquired its proper teeth, it is advisable to let it have small portions of meat, and other vegetables, as well as dishes prepared of flour, &c. so that it may gradually become accustomed to every kind of strong and wholesome food. We ought, however, to be cautious, and not, upon any account, to allow a child pastry, confectionary, cheese, heavy dishes made of boiled or baked flour, onions, horse-radish, mustard, smoaked and salted meat, especially pork, and all compound dishes; for the most simple food is the most salubrious. Potatoes should be allowed only in moderation, and not to be eaten with butter, but rather with other vegetables, either mashed up or in broth.

The time of taking food is not a matter of indifference: very young infants make an exception; for as their consumption of vital power is more rapid, they may be more frequently indulged with aliment. It is, however, advisable to accustom even them to a certain regularity, so

as to allow them their victuals at stated periods of the day; for it has been observed, that those children which were fed indiscriminately through the whole day, were subject to debility and disease. The stomach should be allowed to recover its tone, and to collect the juices necessary for digestion, before it is supplied with a new portion of food. According to the experience of Professor Hufeland, the following order of giving food to children has been found the most proper, and conducive to their health:—after rising in the morning, suppose about six o'clock, a moderate portion of luke-warm milk, with well-baked bread, which should by no means be new; at nine o'clock, bread with some fruit, or, if fruit be scarce, a small quantity of fresh butter; about twelve o'clock, the dinner, of a sufficient quantity; between four and five o'clock, some bread with fruit, or, in winter, the jam of plums, as a substitute for fruit, or the inspissated juice of carrots, which is a very wholesome preparation, and an excellent vermifuge. On this occasion, children should be allowed to eat till they are satisfied, without surfeiting themselves, that they may not crave for a heavy supper, which disturbs their rest, and is productive of bad humours: lastly, about seven o'clock they may be permitted a light supper, consisting either of milk, soup, fruit, or boiled vegetables, and the like, but neither meat nor mealy dishes, nor any articles of food which produce flatulency; in short, they ought then to eat but little, and remain awake at least for one hour after it.

It has often been contended that bread is hurtful to children; but this applies only to new bread, or such as is not sufficiently baked; for instance, our rolls, muffins, and crumpets, than which nothing can be more hurtful and oppressive. Good wheaten bread is extremely proper during the first years of infancy; but that made of rye, or a mixture of wheat and rye, would be more conducive to health after the age of childhood.

Among all the different articles of vegetable food, there is, in the opinion of Professor Hufeland, perhaps none more nutritive, in the most concentrated form, than the salep-root. By this domestic remedy he has restored weakly and emaciated children in a few weeks, so that they recovered their former healthful appearance, together with muscular strength and plumpness; nay, the learned Professor even asserts, that thus he has rescued

them from the jaws of death. A single drachm of the powder of this root boiled in a pint of water, makes a very strong jelly; and two drachms would afford sufficient nourishment to an adult for twenty-four hours. He is not acquainted with any substance which possesses equal virtues in nourishing weakly children, who are reduced by diarrhœas and other evacuations, and re-producing a salubrious mass of blood, so speedily as this excellent root; and what enhances its value beyond any comparison, is the circumstance of its being perfectly harmless, or productive of no bad consequences. This, indeed, is a great consideration with respect to children, as it is not a matter of indifference, by what means they are nourished and strengthened. Thus, if we were to nurture them with concentrated animal food, we might also attain the purpose, but their blood would become so heated, and the whole body rendered so irritable, that fevers, inflammations, convulsions, and apoplexy, might be easily induced. The before-mentioned root, however, is not subject to any of these objections, as it affords a mild nutriment, and agrees with the most irritable constitutions. For this reason, every mother may give her child, daily, a small tea-spoon full, or one drachm, of finely-powdered salep-root, reduced to jelly in milk, broth, or soup: it ought, however, to be previously stirred and dissolved in a little cold water, before it is added to the boiling liquid.

Drink, &c.

With respect to *drink*, Professor Hufeland is decidedly against giving it to children in large quantities, and at irregular periods, whether it consist of the mother's milk, or any other equally mild liquor. It is improper and pernicious to keep infants continually at the breast; and it would be less hurtful, nay even judicious, to let them cry for a few nights, rather than to fill them incessantly with milk, which readily turns sour on the stomach, weakens the digestive organs, obstructs the mesenteric glands, and ultimately generates scrofulous and ricketty affections. In the latter part of the first year, pure water may occasionally be given; and if this cannot be procured, a light and well-fermented table-beer might be substituted. Those parents who accustom their children to drink water only, bestow on them a fortune, the value and importance of which will be sensibly felt through

life. Many children, however, acquire a habit of drinking during their meals; it would be more conducive to digestion, if they were accustomed to drink only after having made a meal. This useful rule is too often neglected, though it be certain that inundations of the stomach, during the mastication and maceration of food, not only vitiate digestion, but they may be attended with other bad consequences; as cold drink, when brought in contact with the teeth previously heated, may easily occasion cracks or chinks in these useful bones, and pave the way for their carious dissolution.

Of Sleep.

Infants cannot sleep too long; and it is a favourable symptom, when they enjoy a calm and long-continued rest, of which they should by no means be deprived, as this is the greatest support granted to them by Nature. A child lives, comparatively, much faster than an adult; its blood flows more rapidly; every stimulus operates more powerfully; and not only its constituent parts, but its vital resources also, are more speedily consumed. Sleep promotes a more calm and uniform circulation of the blood; it facilitates the assimilation of the nutriment received, and contributes towards a more copious and regular deposition of alimentary matter, while the horizontal posture is the most favourable to the growth and bodily development of the child.

Sleep ought to be in proportion to the age of the infant. After an uninterrupted rest of nine months in the state of a fœtus, this salutary refreshment should continue to fill up the greater part of a child's existence; and Professor Hufeland affirms, that a continued watchfulness of twenty-four hours would prove destructive. After the age of six months, the periods of sleep, as well as all other animal functions, may in some degree be regulated; yet, even then, a child should be suffered to sleep the whole night, and several hours both in the morning and afternoon. Mothers and nurses should endeavour to accustom infants, from the time of their birth, to sleep in the night preferably to the day, and for this purpose they ought to remove all external impressions which may disturb their rest, such as noise, light, &c. but especially not to obey every call for taking them up, and giving food at improper times. After the second year of their age, they will not instinctively require to sleep in the forenoon, though

after dinner it may be continued to the third and fourth year of life, if the child shews a particular inclination to repose; because, till that age, the full half of its time may safely be allotted to sleep. From that period, however, it ought to be shortened for the space of one hour with every succeeding year; so that a child of seven years old may sleep about eight, and not exceeding nine hours: this proportion may be continued to the age of adolescence, and even manhood.

To awaken children from their sleep with a noise, or in an impetuous manner, is extremely injudicious and hurtful: nor is it proper to carry them from a dark room immediately into a glaring light, or against a dazzling wall; for the sudden impression of light debilitates the organs of vision, and lays the foundation of weak eyes, from early infancy.

Another habit still more dangerous, and often destructive in its consequences, deserves severe animadversion: it is the practice of playing with children after sleep, while they remain in bed, or suffering them to indulge their fancy, when awake in the morning. Thus, alas! the stimulating heat of the couch, together with the accumulated matters destined for evacuation, almost inevitably rouses certain sensations, which but too frequently unfold the dormant sexual instinct, at an early period of life. Those parents and guardians who are anxious to preserve their children from vice, ought cautiously to guard against such habits. The most proper regulation with respect to the sleep of children upwards of seven years of age, appears to be the following: to send them to their beds, at the latest, at nine o'clock, and to awaken them at six o'clock in the morning.

A bed-room, or nursery, ought to be spacious and lofty, dry, airy, and not inhabited through the day. No servants, if possible, should be suffered to sleep in the same room, and no linen or washed clothes should ever be hung there to dry, as they contaminate the air in which so considerable a portion of infantine life must be spent. The consequences attending a vitiated atmosphere in such rooms, are various, and often fatal. Feather-beds should be banished from nurseries, as they are an unnatural and debilitating contrivance. The windows should never be opened at night, but left open the whole day, in fine clear weather. Lastly, the bedstead must not be placed too low on the floor; nor is it proper to let

children sleep on a couch which is made without any elevation from the ground; because the most mephitic and pernicious stratum of air in an apartment, is that within one or two feet from the floor, while the most wholesome, or atmospheric air, is in the middle of the room, and the inflammable gas ascends to the top.

Of the Crying of Children.

Man, when first he enters the world, announces himself by his plaintive voice, and we thence form no other conclusion than that he lives. Instead of being alarmed by his cries, we justly rejoice; because they indicate expanded lungs and vital action. In a similar manner we ought to regard the squalling of infants when they advance in age, as they generally imply little more than the loud expressions of their existence. Frequently, however, tender mothers and officious nurses are not only extremely concerned at every demonstration of the pulmonic powers of a child, but even busy in relieving the clamorous noise, by means generally the most absurd and pernicious. In order to prevent such mischievous attempts, and to prove that the crying of children is useful and salutary to them, rather than hurtful, let us take a more comprehensive view of this subject.

If we inquire into the causes which produce the crying of infants, we shall find that it seldom originates from pain, or uncomfortable sensations; for those who are apt to imagine that such causes must *always* operate on the body of an infant, are egregiously mistaken; inasmuch as they conceive that the physical condition, together with the method of expressing sensations, is the same in infants and adults. It requires, however, no demonstration that the state of the former is essentially different from that of the latter. In the first years of infancy, many expressions of the tender organs are to be considered only as efforts, or manifestations of power. We observe, for instance, that a child, as soon as it is undressed, or disencumbered from swaddling clothes, moves its arms and legs, and often makes a variety of strong exertions; yet no reasonable person would suppose that such attempts arise from a preternatural or oppressive state of the little agent. It is therefore equally absurd, to draw an unfavourable inference from every inarticulate cry; because, in most instances, these vociferating sounds imply the effort which children necessarily make to dis-

play the strength of their lungs, and exercise the organs of respiration. Nature has wisely ordained, that by these very efforts the power and utility of functions so essential to life, should be developed, and rendered more perfect with every inspiration. Hence it follows, that those over-anxious parents or nurses, who continually endeavour to prevent infants from crying, do them a material injury; for, by such imprudent management, their children seldom or never acquire a perfect form of the breast, while the foundation is laid in the pectoral vessels for obstructions, and other diseases.

Let us however suppose, that there really prevails a morbid sensation, or pain, which occasions the complaints of the infant: such expressions then are very frequently the most effectual means of removing the cause. Thus, flatulency, which presses upon the diaphragm, occasions pain, and involuntarily stimulates the child to procure itself relief by cries; these are necessarily accompanied with increased respiration; the safest means of dissipating the stagnant air in the abdominal region. Another cause of loud complaints is, accumulations of viscid matter, or congestions of blood in the pulmonary vessels: these also cannot be relieved more speedily and certainly than by vociferation. Even in those cases where the circulation of the fluid towards the external parts of the body is languid, which very often occurs in children, and produces uncomfortable sensations, there is no better remedy to promote a due and more uniform circulation, than these efforts of Nature.

But, independently of any particular causes, the cries of children, with regard to their general effects, are highly beneficial and necessary. In the first period of life, such exertions are the almost only exercise of the infant: thus the circulation of the blood, and all the other fluids, is rendered more uniform; digestion, nutrition, and the growth of the body, are thereby promoted; and the different secretions, together with the very important office of the skin, or insensible perspiration, are duly performed. Hence it is extremely improper to consider every noise of an infant as a claim upon our assistance, and to intrude either food or drink, with a view to satisfy its supposed wants. By such injudicious conduct, children readily acquire the injurious habit of demanding things, or nutriment, at improper times, and without necessity; their digestion becomes impaired; and con-

sequently, at this early age, the whole mass of the fluids is gradually corrupted. If, however, the mother or nurse has no recourse to the administration of aliment, they at least remove the child from its couch, carry it about, frequently in the middle of the night, and thus expose it to repeated colds, which are in their effects infinitely more dangerous than the most violent cries. Others will be so much alarmed as to call in medical assistance; and as a physician or surgeon would be thought a very ignorant or unfeeling man, if he should prescribe no remedy, even though the cause of the complaint remain obscure, we may easily imagine the mischievous consequences thence resulting. Let us even suppose, that none of these expedients be adopted, it will be found that infants very soon become sensible of the anxious attention paid to their cries, especially when they perceive that things are given to them with a view to satisfy their claims: by such imprudent management, the foundation is laid for a troublesome and obstinate temper; while their habitual complaints, so far from abating, daily increase. Professor Hufeland has uniformly remarked, that those infants whose cries were anxiously attended to, became the most violent; as, on the contrary, those who were treated with apparent indifference, soon relinquished this unpleasant custom: in short, it cannot be denied, that too anxious and rigid an attention bestowed on those little darlings, is the most certain way of enervating their mind and body.

We learn indeed from daily experience, that children who have been the least indulged, thrive much better, unfold all their faculties quicker, and acquire more muscular strength and vigour of mind, than those who have been constantly favoured, and treated by their parents with the most solicitous attention: bodily weakness and mental imbecility are the usual attributes of the latter. The first and principal rule of education ought never to be forgotten; that man is intended to be a free and independent agent; that his moral and physical powers ought to be *spontaneously* developed; and that he should as soon as possible be made acquainted with the nature and uses of all his faculties, in order to attain that degree of perfection which is consistent with the structure of his organs; and that he is not originally designed for what we endeavour to make of him by artificial aid. Hence the greatest art in educating children, consists in the conti-

nual vigilance over all their actions, without ever giving them an opportunity of discovering that they are guided and watched.

There are, however, instances in which the loud complaints of infants deserve our attention. Thus, if their cries be unusually violent and long continued, while they draw their legs towards the belly, we may conclude that they are troubled with colic pains; if, on such occasions, they move their arms and hands repeatedly towards the face, painful teething may account for the cause; and if other morbid phenomena accompany their cries, or if these expressions be repeated at certain periods of the day, we ought not to slight them, but endeavour to discover their proximate or remote causes.

Secrets of Trade.—No. XI.

TRANSPARENT SOAP.

TRANSPARENT soap is made by carefully evaporating the alcoholic solution. The solution itself is sold under the name of shaving liquid, or, "*Essence Royale pour faire la barbe.*"

*** With regard to the solubility of soap, water dissolves about one-third of its weight, if genuine soap, and forms a milky solution; alcohol also disolves it, and affords a solution nearly transparent, although somewhat gelatinous, from which by evaporation the transparent soap is made.

VELNO'S VEGETABLE SYRUP.

The genuine composition of this nostrum is enveloped in much obscurity. It is supposed to consist of sublimate rubbed up with honey and mucilage. There is reason, however, to believe, that it contains antimony, and the syrup of marsh-mallows. Swediaur says, that volatile alkali enters into it as an ingredient; this alkali was proposed by Dr. Peyrite, as a substitute for mercury, and it constitutes the active ingredient of the following composition, which was proposed by Mr. Bernard, Physician to the King of Bavaria: viz.

Tinctura Syphilitica.

Take Subcarbonate of potass,	- -	1 pound.
Dissolve in cinnamon water,	- -	½ pint.
Purified opium,	- - -	2 ounces.
Dissolved in spirits of cinnamon,	-	4 ounces.

Mix these separate solutions, and put them in a water-bath for three weeks, taking care to shake the vessel frequently; to them add,

Gum arabic, - - -	2 ounces.
Carbonate of ammonia, - - -	1 ounce.

Dissolve in cinnamon water.

Mix, filter, and keep for use. Dose, twenty-four drops, three times a day, in a glass of the cold decoction of marsh-mallow roots.

The external use of these rops is also advised for local syphilitic complaints.

VIRGIN'S MILK.

A spirituous solution of Gum Benjamin, mixed with about twenty parts of rose water, forms a cosmetic long known by this name. Under the same title also a very different preparation is sold, which is a sulphate of lead, and is prepared as follows:—To a saturated solution of alum, add one-third part of Goulard's extract. Shake them together. Used as a lotion to inflamed surfaces.

WADE'S DROPS. (See *Friar's Balsam).*

WALKER'S & WESSELS' JESUITS DROPS.

This is nothing more than the elixir ante-venereum of of Quincey, consisting of guaiacum, balsam of copaiba, and oil of sassafras, made into a tincture by spirit.

WARD'S ESSENCE FOR THE HEAD-ACH.

Nothing more than compound camphor liniment—opodeldoc.

WARD'S PASTE FOR FISTULA, PILES, &c.

The following is the recipe for preparing this composition. Take of black pepper and elecampane powdered, equal parts, half a pound; of the seeds of sweet fennel, one pound and a half; of honey and sugar, equal parts, one pound; beat, and mix the ingredients well together in a mortar. *Dose:*—the size of a nutmeg, three times a day.

*** With respect to the value of this remedy, it may be observed, that it is principally useful in those cases attended with considerable debility, in leuco-phlegmatic habits, and when piles arise from a deficient secretion in the rectum. On the other hand, the composition will as certainly prove injurious in those cases which are accompanied with erisypelatous inflammation, and which require cooling laxatives, and a total abstinence from all stimulants, for their cure.

Ward was originally a footman, and during his attend-

ance on the Continent, obtained from the monks, those receipts, which he afterwards vended as *nostrums*.

WARD'S WHITE DROPS.

1. Take Quicksilver, - - - 12 ounces.
Spirit of sweet nitre, - - - 2 pounds.
Dissolve, and add
Ammonia prepared, - - - 14 ounces.
Evaporate so as to form a slight salt, which drain and dissolve in
Rose-water, - - - - 3½ pints.

2. Take Quicksilver, - - - - 4 ounces.
Spirit of sweet nitre, - - 1 pound.
Prepared ammonia, - - - 7 ounces.
Evaporate and crystallise, then dissolve each pound of salt in
Rose-water, - - - 3½ pints.

A very inferior kind is made with one drachm and a half of corrosive sublimate; two ounces of the spirit of salt; one pint and a half of water.

WARNER'S SWEATING POWDER.

A combination of white hellebore and opium.

WARNER'S CORDIAL.

Take Bruised rhubarb, - - - 1 ounce.
Senna, - - - - ½ ounce.
Saffron, - - - - 1 drachm.
Powdered liquorice, - - - ½ ounce.
Raisins pounded, - - - 1 pound.
Brandy, - - - - - 3 pints.
Digest for a week, and strain.

COOKERY FOR THE SICK, AND FOR THE POOR.

(From the Lady's New System of Domestic Cookery).

A clear Broth that will keep long.

PUT the mouse-round of beef, a knuckle-bone of veal, and a few shanks of mutton, into a deep pan, and cover close with a dish or coarse crust; bake till the beef is done enough for eating, with only as much water as will cover it. When cold, cover it close in a cool place. When to be used, give what flavour may be approved.

A quick-made Broth.

Take a bone or two of a neck or loin of mutton, take off the fat and skin, set it on the fire in a small tin sauce-pan, that has a cover, with three quarters of a pint of water, the meat being first beaten, and cut in thin bits; put a bit of thyme and parsley, and, if approved, a slice

of onion. Let it boil very quick; skim it nicely; take off the cover, if likely to be too weak; else cover it. Half an hour is sufficient for the whole process.

A very supporting Broth against any kind of Weakness.

Boil two pounds of loin of mutton, with a very large handful of chervil, in two quarts of water, to one. Take off part of the fat. Any other herb or roots may be added. Take half a pint three or four times a day.

A very nourishing Veal Broth.

Put the knuckle of a leg or shoulder of veal, with very little meat to it, an old fowl, and four shank-bones of mutton extremely well soaked and bruised, three blades of mace, ten peppercorns, an onion, and a large bit of bread, and three quarts of water, into a stew-pot that covers close, and simmer in the slowest manner after it has boiled up, and been skimmed; or bake it; strain, and take off the fat. Salt is wanted. It will require four hours.

Broth of Beef, Mutton, and Veal.

Put two pounds of lean beef, one pound of scrag of veal, one pound of scrag of mutton, sweet herbs, and ten peppercorns, into a nice tin saucepan, with five quarts of water; simmer to three quarts, and clear from the fat when cold. Add one onion, if approved.

Soup and broth made of different meats are more supporting, as well as better flavoured.

To remove the fat, take it off when cold as clean as possible; and if there be still any remaining, lay a bit of clean blotting or cap paper on the broth when in the basin, and it will take up every particle.

Calves' Feet Broth.

Boil two feet in three quarts of water to half; strain and set it by; when to be used, take off the fat, put a large tea-cupful of the jelly into a saucepan, with half a glass of sweet wine, a little sugar and nutmeg, and heat it up till it be ready to boil, then take a little of it, and beat by degrees to the yoke of an egg, and adding a bit of butter, the size of a nutmeg, stir it all together, but do not let it boil. Grate a bit of fresh lemon-peel into it.

2. Boil two calves' feet, two ounces of veal, and two of beef, the bottom of a penny loaf, two or three blades of mace, half a nutmeg sliced, and a little salt, in three quarts of water, to three pints; strain, and take off the fat.

Chicken Broth.

Put the body and legs of the fowl that chicken panada was made of, after taking off the skin and rump, into the water it was boiled in, with one blade of mace, one slice of onion, and ten white peppercorns. Simmer till the broth be of a pleasant flavour. If not water enough, add a little. Beat a quarter of an ounce of sweet almonds with a tea-spoonful of water, fine, boil it in the broth, strain, and, when cold, remove the fat.

Eel Broth.

Clean half a pound of small eels, and set them on with three pints of water, some parsley, one slice of onion, a few peppercorns; let them simmer till the eels are broken, and the broth good. Add salt, and strain it off.

The above should make three half-pints of broth.

Tench Broth.

Make as eel broth. They are both very nutritious, and light of digestion.

Beef Tea.

Cut a pound of fleshy beef in thin slices; simmer with a quart of water twenty minutes, after it has once boiled, and been skimmed. Season, if approved; but it has generally only salt.

Dr. Ratcliff's Restorative Pork Jelly.

Take a leg of well-fed pork, just as cut up, beat it, and break the bone. Set it over a gentle fire, with three gallons of water, and simmer to one. Let half an ounce of mace, and the same of nutmegs, stew in it. Strain through a fine sieve. When cold, take off the fat. Give a chocolate-cup the first and last thing, and at noon, putting salt to taste.

Arrow-root Jelly.

Of this beware of having the wrong sort, for it has been counterfeited with bad effect. If genuine, it is very nourishing, especially for weak bowels. Put into a saucepan half a pint of water, a glass of sherry or a spoonful of brandy, grated nutmeg, and fine sugar; boil up once, then mix it by degrees into a dessert-spoonful of arrow-root, previously rubbed smooth with two spoonsful of cold water; then return the whole into the saucepan; stir, and boil it three minutes.

NATURAL HISTORY OF ANIMALS OF THE LOBSTER KIND.

(From Dr. Goldsmith and other Natural Historians.)

Anatomy of the Lobster, &c.

THE lobster is an animal of so extraordinary a form, that those who first see it are apt to mistake the head for the tail; but it is soon discovered that the animal moves with its claws foremost; and that the part which plays within itself by joints, like a coat of armour, is the tail. The two great claws are the lobster's instrument of provision and defence; these, by opening like a pair of nippers, have great strength, and take a firm hold, by being notched like a saw. Beside these powerful instruments, the lobster has eight legs, four on each side; and these, with the tail, serve to give the animal its progressive motion. Between the two claws is the animal's head, very small, and furnished with eyes that seem like two black horny specks; and these it has a power of advancing out of the socket, and drawing in at pleasure. The mouth, like that of insects, opens the long way of the body; not crossways, as with the higher race of animals. It is furnished with two teeth for the communition of its food; but as these are not sufficient, it has three more in the stomach; one on each side, and the other below. Between the two teeth there is a fleshy substance, in the shape of a tongue. The intestines consist of one long bowel, which reaches from the mouth to the vent; but what this animal differs in from all others, is, that the spinal marrow is in the breast-bone. It is furnished with two long feelers or horns, that issue on each side of the head, that seem to correct the dimness of its sight, and apprize the animal of its danger, or prey. Every lobster is an hermaphrodite, and is supposed to be self-impregnated! The ovary, or place where the spawn is first produced, is backwards, toward the tail, where a red substance is found, when too full for exclusion. From this receptacle there go two canals, that open on each side at the jointures of the shell, at the belly; and through these passages the spawn is excluded, and placed under the tail, where the animal preserves them from danger for some time, until they come to maturity; when, being furnished with limbs and motion, they drop off into the water.

Mode of Living, increase and change—casting of the Shell, &c.

When the young lobsters leave the parent, they immediately seek for refuge in the smallest clefts of rocks, and crevices at the bottom of the sea, where the entrance is but small, and the opening can be easily defended. There, without seeming to take any food, they grow larger in a few weeks time, from the mere accidental substances which the water washes to their retreats. By this time also they acquire an hard, firm shell, which furnishes them with both offensive and defensive armour. They then issue from their fortresses, and boldly creep along the bottom, in hopes of meeting with more diminutive plunder. The spawn of fish, the smaller animals of their own kind, but chiefly the worms that keep at the bottom of the sea, supply them with plenty. They keep in this manner close among the rocks, busily employed in scratching up the sand with their claws for worms, or surprising such heedless animals as fall within their grasp: thus they have little to apprehend, except from each other; for in them, as among other sea animals, the large are formidable enemies to the small.

But this life of abundance and security is soon to have a most dangerous interruption; for the body of the lobster still continuing to increase, while its shell remains unalterably the same, there comes on a necessity of getting free. The young of this kind, therefore, change their shell oftener than the old, who remain in the same shell often for two years together. In general, however, all these animals change their shell once a year; and this is not only a most painful operation, but dangerous. Their molting season is generally about the beginning of summer; at which time their food is in plenty, and their strength and vigour in the highest perfection. For some days before their change, the animal discontinues its usual voraciousness; it lies torpid and motionless, as if in anxious expectation of the approaching change. Just before casting its shell, it throws itself upon its back, strikes its claws against each other, and every limb seems to tremble; its feelers are agitated, and the whole body is in violent motion; it then swells itself in an unusual manner, and at last the shell begins to divide at its junctures; particularly at the junctures of the belly. It also seems turned inside out; and its stomach comes away with its shell. After this, by the same operation, it disengages itself of the

claws, which burst at the joints; the animal, with a tremulous motion, casting them off as a man would kick off a boot.

Thus, in a short time, this wonderful creature finds itself at liberty; but in so weak and enfeebled a state, that it continues for several hours motionless. Indeed, so violent is the operation, that many of them die under it. Immediately after this change, they have not only the softness, but the timidity of a worm. Every animal of the deep is then a powerful enemy, which they can neither escape nor oppose; and this, in fact, is the time when the dog-fish, the cod, and the ray, devour them by hundreds. But this imbecility continues only a short time; for the animal, in less than two days, is seen to have the skin that covered its body grown almost as hard as before; its appetite increases; and, strange to behold! the first object that tempts its gluttony, is its own stomach, which it so lately was disengaged from. This it devours with great eagerness; and some time after eats even its former shell. In about forty-eight hours, in proportion to the animal's health and strength, the new shell is perfectly formed, and as hard as that which was but just thrown aside.

When the lobster is completely equipped in its new shell, it then appears how much it has grown in the space of a very few days; the dimensions of the old shell being compared with those of the new, it will be found that the creature has increased above a third in size.

The creature, thus furnished not only with a new covering, but also a greater share of strength and courage, ventures more boldly among the animals at bottom; and in its combat it often suffers mutilation. A joint, or even a whole claw, is sometimes snapped off in these encounters. To come off with the loss of a leg, or even a claw, is no great calamity; the victor carries off the spoil to feast upon at his leisure, while the other retires from the defeat to wait for a thorough repair. This repair is not long in procuring. From the place where the joint of the claw was cut away, is seen in a most surprising manner the renovation of a new claw. This, at first, is small and tender, but grows, in the space of three weeks, to be almost as large and as powerful as the old one, but never arrives to the full size; and this is the reason we generally find the claws of the lobsters of unequal magnitude.

Varieties of the Lobster, &c.

Of this extraordinary, yet well known animal, there are many varieties, with some differences in the claws, but little in conformation. Some are found above three feet long; and if we may admit the shrimp and the prawn into the class, though unfurnished with claws, it is seen not above an inch. These all live in the water, and can bear its absence for but a few hours. The shell is black when taken out of the water, but turns red by boiling. The most common way of taking the lobster is in a basket, or pot, as the fishermen call it, made of wicker wood, in which they put some kind of garbage for a bait, and then throw it to the bottom of the sea, in six or ten fathom water. The lobsters creep into this for the sake of the bait, but are not able to get out again. The river crawfish differs little from the lobster, but in size, and that it lives in fresh water, and the other only in the sea.

NATURAL HISTORY OF THE CRAB, &c.

The crab is an animal found equally in fresh and salt water; upon land and in the ocean. In shape it differs much from the lobster, but entirely resembles it in conformation. The tail in this animal is not so apparent as in the former, being a broad flap, that seems to cover a part of the belly, and when lifted discovers the spawn, situated there in great abundance. It resembles the lobster in the number of its great claws, which are two; and its legs, which are eight.

As the crab is found upon land as well as in the water, the peculiarity of its situation produces a difference in its way of life, which it is proper to describe. The land crab is found in some of the warmer regions of Europe, and in great abundance in all the tropical climates in Africa and America. They are of various kinds, and endued with various properties; some being healthful, delicious, and nourishing food: others, poisonous or malignant to the last degree; some are not above half an inch broad; others are found a foot over; some are of a dirty brown, and others beautifully mottled. That animal called the violet crab of the Caribbee islands, is the most noted both for its shape, the delicacy of its flesh, and the singularity of its manners.

Description of the Violet Crab, &c.

The violet crab somewhat resembles two hands cut

through the middle and joined together; for each side looks like four fingers, and the two nippers or claws resemble the thumbs. The body is covered with a shell, bunched in the middle, on the fore-part of which there are two long eyes of the size of a grain of barley, as transparent as crystal and as hard as horn. A little below these is the mouth, covered with a sort of barbs, under which there are two broad sharp teeth as white as snow. With these teeth they can easily cut leaves, fruits, and rotten wood, which is their usual food. But their principal instrument for cutting and seizing their food is their nippers, which catch such an hold, that the animal loses the limb sooner than its grasp, and is often seen scampering off, having left its claw still holding fast upon the enemy. In fact, it loses no great matter by leaving a leg or an arm, for they soon grow again, and the animal is found as perfect as before.

Mode of living in the Mountains, &c.

This, however, is the least surprising part of this creature's history: and what remains, were it not as well known and as confidently confirmed as any other circumstance in natural history, might well stagger our belief. These animals live not only in a kind of orderly society in their retreats in the mountains, but regularly once a year march down to the sea-side in a body of some millions at a time. They choose the months of April or May to begin their expedition; and then sally out by thousands from the stumps of hollow trees, from the clefts of rocks, and from the holes which they dig for themselves under the surface of the earth. At that time the whole ground is covered with this band of adventurers. The sea is the place to which they direct their march with right-lined precision; they neither turn to the right or left, and even if they meet with a house, they will attempt to scale the walls to keep the unbroken tenor of their way. But though this be the general order of their route, they are upon some occasions compelled to conform to the face of the country; and if it be intersected by rivers, they are then seen to wind along the course of the stream. They are commonly divided into three battalions; of which, the first consists of the strongest and boldest males, that, like pioneers, march forward to clear the route and face the greatest dangers. These are often obliged to halt for want of rain, and go into the most convenient encampment till the weather

changes. The main body of the army is composed of females, which never leave the mountains till the rain is set in for some time, and then descend in regular battalia, being formed into columns of fifty paces broad and three miles deep, and so close that they almost cover the ground. Three or four days after this the rear-guard follows: a straggling undisciplined tribe, consisting of males and females, neither so robust nor so numerous as the former. The night is their chief time of proceeding; but if it rains by day, they do not fail to profit by the occasion; and they continue to move forward in their slow uniform manner. When the sun shines, and is hot upon the surface of the ground, they make an universal halt, and wait till the cool of the evening. When they are terrified, they march back in a confused disorderly manner. They try to intimidate their enemies; by often clattering their nippers together, as if to threaten those that disturb them. But though they thus strive to be formidable to man, they are much more so to each other; for they are possessed of one most unsocial property, which is, that if any of them by accident is maimed in such a manner as to be incapable of proceeding, the rest fall upon and devour it on the spot, and then pursue their journey.

Spawning Time, &c.

When, after a fatiguing march, and escaping a thousand dangers, they have arrived at their destined port, they prepare to cast their spawn. The peas are as yet within their bodies, and not excluded, for the creature waits the benefit of sea water to help the delivery. For this purpose, the crab has no sooner reached the shore, than it eagerly goes to the edge of the water, and lets the waves wash over its body two or three times. This seems only a preparation for bringing their spawn to maturity; for without farther delay they withdraw to seek a lodging upon land: in the mean time, the spawn grows larger, is excluded out of the body, and sticks to the barbs under the tail. This bunch is seen as big as an hen's egg, and exactly resembling the roes of herrings. In this state of pregnancy, they once more seek the shore for the last time, and shaking off their spawn into the water, leave accident to bring it to maturity. At this time whole shoals of hungry fish are in expectation of this annual supply; the sea to a great distance seems black with them; and about two-thirds of the crabs' eggs are immediately de-

voured by these rapacious invaders. Those that escape are hatched under the sand; and soon after millions at a time of these little crabs are seen quitting the shore, and slowly travelling up to the mountains.

The old ones are not so active to return; they become so feeble and lean, that they can hardly creep along, and the flesh at that time changes its colour. Most of them, therefore, are obliged to continue in the flat parts of the country till they recover, making holes in the earth, which they cover at the mouth with leaves and dirt. There they cast their old shells and lie quite naked, almost without motion, for six days together, when they become so fat as to be delicious food.

Cautions to Crab Eaters, &c.

These crabs are of considerable advantage to the natives; and the slaves very often feed entirely upon them. In Jamaica, where they are found in great plenty, they are considered as one of the greatest delicacies of the place. Yet still the eating of them is attended with some danger; for even of this kind many are found poisonous, being fed, as it is thought, upon the manchineel apple; and whenever they are found under that noxious plant, they are always rejected with caution. It is thus with almost all the productions of those luxurious climates; however tempting they may be to the appetite, they but too often are found destructive; and scarce a delicacy among them that does not carry its own alloy.

OF POISONS.

1. *Opium.*—When this medicine is swallowed in a large dose, it becomes a poison capable of destroying life. Its first effects are, a disposition to sickness, remarkable faintness, and continued insensible drowsiness. As soon as it is discovered that a poisonous dose of opium is swallowed, an emetic of white vitriol, (twenty grains), should immediately be got down, and the dose repeated every ten minutes till vomiting ensues. After this is effected, the patient should not be suffered to dose, but kept in a state of agitation.

2. *Corrosive Sublimate or Arsenic.*—When either of these active minerals has been swallowed, the plan of treatment to be followed will be the same in each. An

active emetic of ipecacuanha must be got down, and the dose followed up at short intervals, as in the preceding case, till vomiting is excited; this must be kept up for a long time with copious draughts of warm drink. If the substance swallowed be corrosive sublimate, the white of eight or ten eggs, beat up with a quantity of warm water, is an antidote which effectually destroys the effect of the poison.

3. *Verdigris.*—An emetic of ipecacuanha in the first instance, to be followed by copious draughts of sugared water, is the best antidote to this poison.

4. *Oxalic Acid.*—This preparation has of late years been often the cause of accidental poisoning, being taken by mistake sometimes for common salts. It is particularly used for the cleaning of boot-tops, and certain kinds of harness; and its poisonous qualities were not, for a long time, suspected. It has, however, proved to be one of the most formidable of the mineral poisons in common use. So violent is its action, that it is generally found to destroy life within an hour, and sometimes within a quarter of that time, after being swallowed. Little time consequently is given for deliberation, and it is necessary to have recourse instantly to the first remedy that comes to hand. Amongst these, the best is calcined magnesia, which should be administered in as large a quantity as can be got down: should this not be at hand, recourse should be had to prepared chalk or lime-water.

In all cases of poison it should be recollected, that the most speedy means of diminishing the mischief, is that of exciting vomiting; this is most certainly effected by putting the finger down the throat, or should the patient be incapable of doing this, some other person should employ a feather dipped in oil, and persevere till vomiting is produced.

*** The stomach pump, if soon procured, ought to be used immediately by some experienced practitioner, in all cases of poison, as the speediest means of removing the effects.

HIPPOCRATES' COMPARISON.

The art of Physic is properly enough compared by Hippocrates to a battle, and also to a farce, acted between three persons—the Patient, the Doctor, and the Disease. The Doctor and the Disease, however, risque nothing; the danger is always with the Patient.—*Rabelais.*

Rural Economy.—No. VII.

THE RURAL INDUSTRY AND ECONOMY OF THE CHINESE, PROPOSED AS AN EXAMPLE TO ALL THE OTHER NATIONS OF THE UNIVERSE.

(By the Abbé RAYNAL).

Rural Varieties of China, &c.

IN a country where the government is so ancient, we may every where expect to find deep traces of the continual force of industry. Its roads have been levelled with the exactest care, and, in general, have no greater declivity than is necessary to facilitate the watering of the land, which they consider, with reason, as one of the greatest helps in agriculture; they have but few, even of the most useful trees, as their fruits would rob the corn of its nourishment. There are gardens, it is true, interspersed with flowers, fine turf, shrubberies, and fountains; but however agreeable these scenes might be to an idle spectator, they seem to be concealed and removed from the public eye, as if the owners were afraid of shewing how much their amusements had encroached upon the soil, that ought to be cultivated for the support of life. They have no parks or extensive forests, which are not near so serviceable to mankind by the wood they furnish, as prejudicial by preventing agriculture; and while they contribute to the pleasure of the great, by the beasts that range in them, prove a real misfortune to the husbandman. In China, the beauty of a country-seat consists in its being happily situated, surrounded with an agreeable variety of cultivated fields, and interspersed with trees, planted irregularly, and with some heaps of a porous stone, which at a distance have the appearance of rocks or mountains.

The hills are generally cut into terraces, supported by dry walls. Here there are reservoirs, constructed with great ingenuity, for the reception of rain and spring water. It is not uncommon to see the bottom, summit, and declivity of a hill, watered by the same canal, by means of a number of engines of a simple construction, which save manual labour, and perform with two men what could not be done with a thousand in the ordinary way. These heights commonly yield three crops in a year. They are first sown with a kind of radish, which produces an oil; then

with cotton, and after that with potatoes. This is the common method of culture; but the rule is not without exception.

Upon most of the mountains, which are incapable of being cultivated for the subsistence of man, proper trees are planted for building houses or ships. Many of them contain iron, tin, and copper mines, for supplying the empire. The gold mines have been neglected, either because their produce did not defray the expence of working them, or because the gold dust, washed down by the torrents, was found sufficient for the purposes of exchange. The sandy plains, saved from the ravages of the ocean (which changes its bed as rivers do their course, in a space of time so exactly proportioned to their different moments, that a small encroachment of the sea causes a thousand revolutions on the surface of the globe), form at this day the provinces of Nankin and Tchekiang, which are the finest in the empire. As the Egyptians checked the course of the Nile, the Chinese have repulsed, restrained, and given laws to the ocean. They have reunited to the continent, tracts of land which had been disjoined by this element. They still exert their endeavours to oppose that over-ruling effect of the earth's motion, which, in conformity with the celestial system, drives the ocean from east to west. To the actions of the globe, the Chinese oppose the labours of industry; and while nations, the most celebrated in history, have, by the rage of conquest, increased the ravages that time is perpetually making upon this globe, they exert such efforts to retard the progress of universal devastation, as might appear supernatural, if daily experience did not afford us strong evidence to the contrary.

Aquatic Improvements.

To the improvements of land this nation adds, if we may be allowed the expression, the improvement of the water: the rivers, which communicate with each other by canals, and run under the walls of most of the towns, present us with the prospect of floating cities, composed of an infinite number filled with people, who live constantly upon the water, and whose sole employment is fishing. The sea itself is covered with numberless vessels, whose masts, at a distance, appear like moving forests. Anson mentions it as a reproach to the fishermen belonging to the boats, that they did not give themselves a

moment's intermission from their work to look at his ship, which was the largest that had ever anchored in those latitudes. But this inattention to an object which appeared to a Chinese sailor to be of no use, though it was in the way of his profession, is perhaps a proof of the happiness of a people, who prefer business to matters of mere curiosity.

Mode of Culture not Uniform, &c.

The manner of culture is by no means uniform throughout this empire, but varies according to the nature of the soil, and the difference of the climate. In the low countries, towards the south, they sow rice, which being always under water, grows to a great size, and yields two crops in a year. In the inland parts of the country, where the situation is lofty and dry, the soil produces a species of rice, which is neither so large, so well tasted, or so nourishing, and makes the husbandman but one return in the year for his labour. In the northern parts the same kinds of grain are cultivated as in Europe, which grow in as great plenty, and are of as good a quality as in any of our fertile countries. From one end of China to the other, there are large quantities of vegetables, particularly in the south, where, together with fish, they supply the place of meat, which is the general food of the other provinces. But the improvement of lands is universally understood and attended to; all the different kinds of manure are carefully preserved, and skilfully distributed to the best advantage: and that which arises from fertile lands, is applied to make them still more fertile. This grand system of nature, which is sustained by destruction and re-production, is better understood and attended to in China, than in any other country in the world.

Causes of the Rural Economy of the Chinese, &c.

A philosopher, whom the spirit of observation has led into their empire, has found out and explained the causes of the rural economy of the Chinese.

The first of these causes, is that character of industry by which these people are particularly distinguished, who in their nature require a less share of repose. Every day in the year is devoted to labour, except the first, which is employed in paying and receiving visits among relations; and the last, which is sacred to the memory of their ancestors. The first is a social duty, the latter a part of domestic worship. In this nation of Sages, whatever

unites and civilizes mankind is religion; and religion itself is nothing more than the practice of the social virtues. These sober and rational people want nothing more than the controul of civil laws to make them just. Their private worship consists in the love of their parents, whether living or dead; and their public worship in the love of labour; and that labour which is held in the most sacred veneration is agriculture.

Royal Husbandmen, &c.

The generosity of two of their Emperors is much revered, who, preferring the interest of the state to those of their family, kept their own children from the throne to make room for men taken from the plough. They revere the memory of these husbandmen, who sowed the seeds of the happiness and stability of the empire in the fertile bosom of the earth; that inexhaustible source of whatever conduces to the nourishment, and consequently to the increase of mankind.

In imitation of these royal husbandmen, the Emperors of China become husbandmen officially. It is one of their public functions to break up the ground in the spring; and the parade and magnificence that accompanies this ceremony draws together all the farmers in the neighbourhood of the capital. They flock in crowds to see their Prince perform this solemnity, in honour of the first of all the arts. It is not, as in the fables of Greece, a God who attends the flocks of a King; it is the father of his people, who, holding the plough with his own hands, shews his children what are the true riches of the state. In a little time he repairs again to the field he has ploughed himself, to sow seed that is most proper for the ground. The example of the Prince is followed in all the provinces, and the same ceremonies are performed in the presence of a numerous concourse of husbandmen. The Europeans, who have been present at this solemnity at Canton, never speak of it without emotion; and make us regret that this festival, whose political aim is the encouragement of labour, is not established in our climate, instead of that number of religious feasts, which seem to be invented by idleness, to make the country a barren waste.

WENS.

THE Marquis de Lionne had a wen upon his right arm. In January, 1731, he put himself under the care of

a farrier, who had obtained a reputation for the cure of these kind of tumours. He first attempted to discuss it, but this only tended to render the tumour more painful: and the caustics which he afterwards employed, causing the most excruciating pain, reduced the patient to the last extremity. Mr. Faget, and Messrs. Sylva and Petit, were then consulted. They unanimously agreed that extirpation was the sole means of saving the patient. The operation was performed by Mr. Faget with complete success.

History states, that ruffs were first introduced into England in the reign of Edward the Sixth, by an Italian or Spanish lady, desirous of concealing a wen which grew upon her neck.

In the Memoirs of the Academy of Sciences for the year 1728, mention is made of a very extraordinary wen, by a Dr. Guisard. In 1724, this wen occupied the whole extent of the thigh from the hip to the knee, and resembled the crowns of two hats joined together. In 1727, it had increased so much, that the patient could no longer walk. It then weighed forty pounds. At length it burst, and by degrees all the cysts (probably hydatids) it contained were discharged, so that by the 8th of August it was quite empty. The thigh-bone was exposed for a considerable length, although apparently quite healthy. The patient, however, died in a short time, apparently of mere debility, accompanied with frequent fainting fits.

The celebrated Mr. John Hunter obtained great celebrity, in early life, by removing a large wen from the neck; an operation which some of his contemporaries had declared, rather rashly, none but a fool or a madman would attempt. The patient, however, got perfectly well. The tumour, after it was removed, and the blood and other fluids had exuded, weighed nine pounds.

TEMPERANCE THE BEST PHYSIC.

Sir William Paulett, who died in the reign of Queen Elizabeth, at the age of 97, gave the following answer to a person who enquired how he had preserved his health:

Late supping I forbear;
Wine and Women I forswear;
My neck and feet, I keep from cold;
No marvel then, tho' I be old:
I am a willow, not an oak;
I chide, but never hurt with stroke.

Housekeeping and Husbandry.—No. XI.

Housekeeping and husbandry, if it be good,
Must love one another as cousins in blood;
The wife too must husband, as well as the man;
Or farewell thy husbandry, do what thou can.

PICKLES.

Pickling is a branch of domestic economy which comprises a great variety of articles essentially necessary to the convenience of families. It is too prevalent a practice to make use of brass utensils to give pickles a fine colour. This pernicious custom is easily avoided by heating the liquor, and keeping it in a proper degree of warmth before it is poured upon the pickle Stone or glass jars are the best adapted for sound keeping.—Pickle should be handled with the fingers, but taken out by a spoon, with holes in it, kept for the purpose.—The strongest vinegar must be used for pickling. It must not be boiled, as thereby the strength of the vinegar and spices will be evaporated. By parboiling the pickles in brine, they will be ready in half the time they would otherwise be. When taken out of the hot brine, let them get cold and quite dry before you put them into the pickle.—The articles to be pickled should be perforated with a larding pin, in several places, by which means they will the more readily imbibe the flavour of the pickle.—The spices, &c. generally used, are those mentioned in the following receipt for walnuts.

To every quart of the strongest vinegar, add one ounce each of black pepper, ginger, shalots, and salt; half an ounce of allspice, and half a drachm of Cayenne. Put these into a stone jar, covered with a bladder, wetted with the pickle; tie over that some leather, and set the jar on a trivet, by the side of a fire, for three days, shaking it three times a day, and then pour it, while hot, on the walnuts, and cover them down with a bladder, wetted with the pickle, &c. This pickle is the best, easiest prepared, and cheapest of any, for every kind of article. It is also an excellent savoury sauce for cold meats.

TO PICKLE WALNUTS.

Make a brine of salt and water, with a quarter of a pound of salt to a quart of water. Soak the walnuts in this for a week, and if you wish to have them ready the

sooner, run a larding pin through them, in half a dozen places, which will make them much softer and better flavoured. Put them into a stew-pan with the brine, and give them a gentle simmer. Lay them on a sieve to drain, then put them on a fish plate in the open air, a couple of days, or till they turn black. Put them into unglazed or stone jars, about three parts full, and fill up the jars with the preceding pickle; and when they have been done about a week, open them and fill them up again, and so on continually, or else they will be spoiled.

ONIONS.

Put a sufficient quantity into salt and water for nine days, observing to change the water every day; next put them into jars, and pour fresh boiling salt and water over them; cover them close up till they are cold, then make a second decoction of salt and water, and pour it on boiling. When it is cold drain the onions on a hair sieve, and put them into wide-mouthed bottles; fill them up with distilled vinegar; put into every bottle a slice or two of ginger, a blade of mace, and a tea-spoonful of sweet oil, which will keep the onions white. Cork them well up, and keep them in a dry place.

SAUR KRAUT.

Take a large strong wooden vessel, or cask, resembling a salt beef cask, and capable of containing as much as is sufficient for the winter's consumption of a family. Gradually break down or chop the cabbages (deprived of outside green leaves), into very small pieces; begin with one or two cabbages at the bottom of the cask, and add others at intervals, pressing them by means of a wooden spade, against the side of the cask, until it is full. Then place a heavy weight upon the top of it, and allow it to stand near to a warm place, for four or five days. By this time it will have undergone fermentation, and be ready for use. Whilst the cabbages are passing through the process of fermentation, a very disagreeable fetid, acid smell is exhaled from them; now remove the cask to a cool situation, and keep it always covered up. Strew aniseeds among the layers of the cabbage during its preparation, which communicates a peculiar flavour to the Saur Kraut at an after period.

In boiling it for the table, two hours is the period for it to be on the fire. It forms an excellent nutritious and antiscorbutic food for winter use.

PECCALILLI.—*(Indian Method).*

This consists of all kinds of pickles mixed, and put into one large jar—girkins, sliced cucumbers, button onions, cauliflowers, broken in pieces. Salt them, or put them in a large hair sieve in the sun to dry for three days, then scald them in vinegar for a few minutes; when cold put them together. Cut a large white cabbage in quarters, with the outside leaves taken off and cut fine, salt it, and put it in the sun to dry for three or four days; then scald it in vinegar, the same as cauliflower, carrots, three parts boiled in vinegar and a little bay salt; French beans, rock-samphire, radish pods, and nastertiums, all go through the same process as girkins, capsicums, &c. To one gallon of vinegar put four ounces of ginger bruised, two ounces of whole white pepper, two ounces of all-spice, half an ounce of chillies bruised, four ounces of turmeric, one pound of the best mustard, half a pound of shalots, one ounce of garlic and half a pound of bay salt. The vinegar, spice, and other ingredients, except the mustard, must boil half an hour; then strain it into a pan, put the mustard into a large basin, with a little vinegar; mix it quite fine and free from lumps, then add more; when well mixed put it to the vinegar just strained off, and when quite cold put the pickles into a large pan, and the liquor over them; stir them repeatedly so as to mix them all; finally, put them into a jar, and tie them over first with a bladder, and afterwards with leather. The capsicums want no preparation.

SAMPHIRE.

Put what quantity is wanted into a clean pan, throw over it two or three handsful of salt, and cover it with spring water for twenty-four hours; next put it into a clean saucepan, throw in a handful of salt, and cover it with good vinegar. Close the pan tight, set it over a slow fire, and let it stand till the samphire is green and crisp; then take it off instantly, for should it remain till it is soft, it will be totally spoiled. Put it into the pickling pot and cover it close; when it is quite cold tie it down with a bladder and leather, and set it by for use. Samphire may be preserved all the year, by keeping it in a very strong brine of salt and water, and just before using it, put it for a few minutes into some of the best vinegar.

MUSHROOMS.

Put the smallest that can be got into spring water, and rub them with a piece of new flannel dipped in salt.

Throw them into cold water as they are cleaned, which will make them keep their colour; next put them into a saucepan with a handful of salt upon them. Cover them close and set them over the fire four or five minutes, or till the heat draws the liquor from them; next lay them betwixt two dry cloths till they are cold; put them into glass bottles, and fill them up with distilled vinegar, with a blade of mace, and a tea-spoonful of sweet oil in every bottle, cork them up close and set them in a dry cool place; as a substitute for distilled vinegar, use white wine vinegar, or ale. Allegon will do, but it must be boiled with a little mace, salt, and a few slices of ginger, and it must be quite cold before it is poured upon the mushrooms.

Another Method.

Bruise a quantity of well-grown flaps of mushrooms with the hands, and then strew a fair proportion of salt over them; let them stand all night, and the next day put them into stew pans; set them in a quick oven for twelve hours, and strain them through a hair sieve. To every gallon of liquor put of cloves, Jamaica black pepper, and ginger, one ounce each, and half a pound of common salt; set it on a slow fire, and let it boil till half the liquor is wasted; then put it into a clean pot, and when cold bottle it for use.

CUCUMBERS.

Let them be as free from spots as possible; take the smallest that can be got, put them into strong salt and water for nine days, till they become yellow; stir them at least twice a day; should they become perfectly yellow, pour the water off and cover them with plenty of vine leaves. Set the water over the fire, and when it boils, pour it over them, and set them upon the earth to keep warm. When the water is almost cold make it boil again, and pour it upon them: proceed thus till they are of a fine green, which they will be in four or five times; keep them well covered with vine leaves, with a cloth and dish over the top to keep in the steam, which will help to green them.

When they are greened put them in a hair sieve to drain, and then to every two quarts of white wine vinegar put half an ounce of mace, ten or twelve cloves, an ounce of ginger cut into slices, an ounce of black pepper, and a handful of salt. Boil them all together for five minutes; pour it hot on the pickles, and tie them down for use.

They may also be pickled with ale, ale vinegar, or distilled vinegar, and adding three or four cloves of garlic and shalots.

ARTIFICIAL ANCHOVIES.

To a peck of sprats put two pounds of salt, three ounces of bay-salt, one pound of salt-petre, two ounces of prunella, and a few grains of cochineal; pound all in a mortar; put into a stone pan, first a layer of sprats, and then one of the compound, and so on alternately to the top. Press them down hard; cover them close for six months, and they will be fit for use, and will really produce a most excellent flavoured sauce.

SALMON.

Boil the fish gently till done, and then take it up, strain the liquor, add bay leaves, pepper-corns, and salt; give these a boil, and when cold add the best vinegar to them; then put the whole sufficiently over the fish to cover it, and let it remain a month at least.

TO PRESERVE FISH BY SUGAR.

Fish may be preserved in a dry state, and perfectly fresh, by means of sugar alone, and even with a very small quantity of it.

Fresh fish may be kept in that state for some days, so as to be as good when boiled as if just caught. If dried, and kept free from mouldiness, there seems no limit to their preservation; and they are much better in this way than when salted. The sugar gives no disagreeable taste.

This process is particularly valuable in making what is called kippered salmon: and the fish preserved in this manner are far superior in quality and flavour to those which are salted or smoked. If desired, as much salt may be used as to give the taste that may be required; but this substance does not conduce to their preservation.

In the preparation, it is barely necessary to open the fish, and to apply the sugar to the muscular parts, placing it in a horizontal position for two or three days, that this substance may penetrate. After this it may be dried; and it is only further necessary to wipe and ventilate it occasionally, to prevent mouldiness.

A table-spoonful of brown sugar is sufficient in this manner for a salmon of five or six pounds weight; and if salt is desired, a tea-spoonful or more may be added. Saltpetre may be used instead, in the same proportion, if it is desired to make the kipper hard.

TO SALT HAMS.

For three hams, pound and mix together half a peck of salt, half an ounce of salt prunella, three ounces of salt-petre, and four pounds of coarse salt; rub the hams well with this, and lay what is to spare over them; let them lie three days, then hang them up. Take the pickle in which the hams were, put water enough to cover the hams, with more common salt, till it will bear an egg, then boil and skim well, put it in the salting tub, and the next morning put in the hams; keep them down the same as pickled pork; in a fortnight take them out of the liquor, rub them well with brine, and hang them up to dry.

TO DRY SALT BEEF AND PORK.

Lay the meat on a table or in a tub with a double bottom, that the brine may drain off as fast as it forms, rub the salt well in, and be careful to apply it to every niche; afterwards put it into either of the above utensils, when it must be frequently turned; after the brine has ceased running, it must be quite buried in salt, and kept closely packed. Meat which has had the bones taken out is the best for salting. In some places the salted meat is pressed by heavy weights, or a screw, to extract the moisture sooner.

TO PICKLE IN BRINE.

A good brine is made of bay salt and water, thoroughly saturated, so that some of the salt remains undissolved; into this brine the substances to be preserved are plunged, and kept covered with it. Among vegetables, French beans, artichokes, olives, and the different sorts of samphire, may be thus preserved, and among animals herrings.

To Salt by another Method.

Mix brown sugar, bay salt, common salt, each two pounds, salt-petre eight ounces, water two gallons; this pickle gives meat a fine red colour, while the sugar renders them mild and of excellent flavour. Large quantities are to be managed by the above proportions.

THE WINE CELLAR.

MANAGEMENT OF FRENCH WINES.

THE first object to be attended to previous to laying in a stock of French wines, is to provide *a good cellar*. The exposition ought to be to the north if possible; it should be properly ventilated, and, as repose is a grand requisite in the preservation of French wines, a cellar under the house ought always to be preferred to one under the street; it must be kept constantly clean, free from cobwebs, and care must be taken that cats cannot enter and deposit their filth in it. Any unpleasant smell in the cellar when French wines are bottling, is calculated to spoil them, so delicate are the finer kinds, and so susceptible of combining with any offensive odours in the atmosphere. The cellar ought to be of an equal temperature all the year round; if damp, it is very injurious to their quality; in this case they ought to be ranged in the bins, at least three inches from the wall, and the first layer on pieces of wood, so as not to touch the ground; and, if the cellar be very damp, the roof and walls ought to be covered with lead, (that of the tea chests will do), so that all the humidity may be collected, and a channel ought to be made to carry it off out of the cave.

Choice of a Cellar.

Count Chaptal, in his Art of Making Wines, thus expresses himself in the care to be taken in the choice of a cellar.

1. The exposition ought to be to the north, as the temperature is then less variable than when the openings are towards the south.

2. It ought to be deep enough for the temperature to be always the same.

3. The humidity ought to be regular without being excessive. When too damp, the paper, corks, and casks become mouldy; if too dry, the casks will give way and the wine will exude.

4. The light ought to be moderate; a strong light dries too much, and absolute darkness, or nearly so, rots every thing.

5. The cellar ought to be free from all shocks. Motion, or sudden agitation, or the shaking by the passage of carriages in the street, stirs up the lees, which incorporate

again with the wine and remain suspended in it, and thereby often turn the wine sour. Thunder, and all sudden shocks, are calculated to produce the same effect.

6. Green wood, vinegar, and all matters susceptible of fermentation, ought carefully to be kept at a distance from the cellar.

7. The reverberation of the sun's rays, if they enter a cellar, change the temperature and alter the properties of the wine.

8. Hence a good cellar ought to be several fathoms under ground, it opening towards the north, and out of the way of streets, roads, workshops, sewers, currents of water, water-closets, wood cellars, &c. and vaulted.

Methods of remedying Defects of Cellars.

If the cellar be very damp, the wine in wood ought to be placed at a considerable distance from the ground, which must constantly be swept clean. The casks must be examined from time to time, and especially at the equinoxes, at those periods the staves may appear quite good at the top, while the bottom staves are quite rotten; the humidity may be lessened by increasing the air apertures, and by the method we have already laid down, which is in use in powder cellars, under the ramparts in fortified towns.

When the cellar is of a proper temperature, the ullage in a hogshead of French wine, will not be above two or three glasses a month; but, if the cellar be too dry, the evaporation will sometimes be as much as two bottles a month; the cellar may be rendered less dry by lessening the admission of air.

It cannot be too strongly impressed on the butler, that very damp cellars in marshy ground, and infected by bad smells, will spoil all French wines, even those in bottle. Cellars covered with sand are very good for wines in bottle.

The cellar being thus duly prepared, we will suppose the order for wines to be given; the selection depends greatly on the taste of the consumer. However, Clarets form a necessary part of the stock of every good cellar, and they will support any climate; whereas the Hermitage wines are very tender and bad travellers; if poor, they turn sour; if good, bitter, especially the Beaune wines, and the tender delicate Volnay. But Chamberton la Romance, Corton le Roi, and a few others of the good

vintages, may be safely imported, and will, if properly attended to, give the owner a high reputation for the choice of his wines.

The order should be given for the importation of wines when the seasons are temperate, as great heat or great cold is equally injurious to wine; so that they should neither be imported in the depth of winter, nor in the height of summer, especially Champagnes. The wines of the south of France, as Hermitage and the Cote de Rhone wines, are the hardiest, and require the least care.

Fining of Wines.

The wines being arrived at the cellar, they are to be placed for fining *perfectly level*, and not inclining forwards, as some erroneously advise.

The very best finings are those prepared by M. Jullien, of Paris, and which cost only twopence or threepence for fining a hogshead; if they are not to be procured proceed as follows: for red wine, draw off a couple of bottles of wine, then take the whites of five eggs, beat them up with water to a fine froth, pour it into the cask, and fill it up with the wine you took out, then take a cleft stick and stir the wine well up in every part, to do which, the stick must be long enough to go to the bottom, and all the lower angles of the cask; it must be stirred for five minutes, that the finings may be equally dispersed throughout the whole body of the wine; put in the bung, and do not touch the cask for a week or ten days, in which time it will be completely fine. It is highly important that fine dry clear weather should be selected, both for the fining of the wine and the bottling of it; if not, it may be necessary to fine it over again, on account of its not being clear.

For white wines, a solution of isinglass is the best, when M. Jullien's powders cannot be obtained; the same method is to be pursued, and the same precautions as to the weather. We must again enforce the importance of the casks being placed perfectly level and solid, so that they cannot move in any direction. If they incline forward, the cock must be put in much higher, that the dregs may not run off with the wine; if they are inclined backwards, you will be obliged, on getting near the bottom, to change the position; this will disturb the lees, and mix them with the good wine.

Before we speak of bottling the wine, we must instruct

the butler how he is to manage the wines in wood, which are not ripe enough to put in bottle.

Management of French Wines in Wood.

Unless you have an honest wine-merchant, he will always tell you that the wine is much older than it really is; the vintages of several years are very bad, which is known to every body, so that you never hear the wine merchant tell you the wine is of a bad year. Your own taste must, therefore, guide you, as to the age and ripeness of the wine. New wines have a violet tinge, are hard and sour in the mouth, and leave an unpleasant sensation on the palate; but, if the wine be of a fine ruby colour, soft and mild to the palate, having both a pleasant flavour and *bouquet* (the aromatic odour of the wine, which, in Claret, resembles the smell of violets), you may bottle the wines as soon as you please. When they require to be kept, the following observations must be carefully attended to.

In the first place, the casks must constantly be kept filled; *ullage* is said not to be injurious to Port and Madeira, but it is fatal to French wines, therefore the casks must be examined every month, and the ullage filled up with wine of the same quality, if possible, but invariably of the same nature; for if you mix Burgundies or Hermitage with Claret, you produce a mixture which possesses no specific character, and becomes, as Dryden has it, "neither flesh, nor fish, nor good red herring."

If you neglect filling up every month, the waste becomes much greater proportionally, owing to the rarefaction of a larger portion of air in the cask, acting upon a larger surface of the fluid, so that if it required only a pint to fill the cask at the end of the first month, it would take at least three pints at the end of two months. We have already made an observation of the superior attention required at the equinoxes: M. Jullien, and most French writers on the subject, attribute it to exhalations from the earth at this season; we would assign another cause, and say of vines,

"E'en in their juices live their wonted fires."

The equinoxes seem to have nothing more to do with the deterioration of wines, than from their being about the periods of the shooting of the vines in the spring, and the maturity of the grape in the autumn; and it is a remarkable fact, that wines are more liable to fermentation

at those periods than any other; this is the case even with preserved fruits kept in store closets, so that we need seek no cause in *the exhalations of the earth.* If the casks are not kept full, the mephitic air in the space tends to turn the wine sour, and a mustiness is generated on the surface of the wine, the same as we see in vinegar and ink in hot weather: when this mould appears on the surface, it is absolutely necessary to draw off the wine into another cask, which must be pure, and to be certain it is so, it should be fumigated with the vapour of sulphur. This operation of putting wine into fresh casks must, in all cases, be done at least once a year. New wines deposit tartar; and, at the periods of fermentation, in spring and fall, this tartar or dregs, being acted on more strongly than the wine, it incorporates again with it, and the wine holding it a second time in solution, does not part with it readily. In drawing off wines which are mouldy, it is necessary to cover the end of the cock which goes into the cask with crape or gauze, to prevent any of the mould getting into the second cask.

We cannot too strongly impress the necessity of choosing dry clear weather for all operations on French wines.

Whenever the wines are drawn off into the new cask, it must never be stirred, but should there be any necessity for doing so, it would be well to draw it off again before removal, that any new deposit of tartar may not mix with the wine. If, on drawing off, the wines are not bright, they must be fined and drawn off again.

The neglect of these precautions is the cause of so much indifferent French wines in the market; it is called sick, or not in condition, whereas, if the simple rules we have laid down be attended to, you have the wines in the full perfection of their nature.

On Bottling French Wines.

The ancient injunction, not to put new wine into old bottles, when they were made of skins, holds equally good, even with glass bottles; but as it may happen in the country, that one is obliged to employ old bottles, the greatest care must be taken to have them perfectly clean, and especially divested of the crust left on them by Port wines.

If the following method be exactly followed for cleaning the bottles, they will be as good as new.

Dissolve eight ounces of potash in two gallons of water

over the fire, when lukewarm, or even cold, put half a pint of the solution into a bottle, shake it well; if there be a crust on the bottle add shot; when it appears clean, pour the same liquid into another bottle, as it will do until it becomes black, when it must be thrown away; the bottles, if very foul, should then be rinsed with scraped potatoes and water, and after that with clean water, till not the least bubble or froth is to be seen on the water poured off. The quantity of potass above is sufficient to clean from two hundred and fifty to five hundred bottles; when rinsed they must be turned upside down on bottle racks, and perfectly dry before they are used.

The preservation and melioration of wines in bottle, says M. Jullien, depend—1. On the maturity of the wine in wood; this we have already treated upon.—2. Their limpidity or brightness when bottled.—3. The proper time for bottling.—4. The bottles employed.—5. The quality of the corks.—6. The care employed in bottling. 7. The method of arranging the bottles; and 8. The perforation of the wax to preserve the corks from humidity and insects.

If the bottles be not left a sufficient time to dry, the drops of water in them suffice to injure the wine; if the wines be very valuable, it is well to give the last rinsing with spirits of wine or strong brandy; this will make them keep longer, and be finer.

Choice of Corks.

The choice of corks is a very important matter; they must be supple, and as little porous as possible. We know a gentleman whose wines are constantly in bad order, from his saving sixpence or one shilling a hundred in the price of his corks; the very best ought to be chosen, therefore, it is always cheapest to have the very best corks. It is for this reason that the Champagne wine merchants pay for their corks six times the price of common corks.

In bottling the wine, the bottles must stand in a vase so elevated, that the neck of the bottle takes the end of the cock, while the bottle forms an angle with the horizon of about sixty degrees: if the bottle be upright, the wine will froth, and bubbles of air be contained in it, which are injurious to its preservation. There ought always to be two persons to bottle off wine; one to draw it off, and the other with his corks ready in water, to cork it: the

corks ought to be driven in as tight as is consistent with the strength of the bottle, for if carelessly wetted, the wine oozes out and communicates with the wax, which will in time infuse the whole wine with its bad taste. There ought to be about three quarters of an inch space between the wine and the cork, for if there be not space enough, the compression of the air will burst the bottles.

When all is drawn off that is clear, let the remainder be poured into a vase and covered up, and filtering paper adapted inside a funnel, which place in a bottle to filter: by this means you have no waste, and save eight or ten bottles of wine which the cooper would like for himself, under the pretext that it is good for nothing; whereas, it is very good, and scarcely discernible from the rest; only it ought to be used for immediate consumption.

It may be proper here to notice the various changes of which wine is susceptible, in wood and in bottle. Poor wines are apt to turn sour; some of the Burgundies turn bitter; white wines, especially Champagne, are subject to what the French call *la graisse*, that is, to become *ropy;* these are disorders incident to the wines themselves. Another disorder, that of becoming mouldy or musty, arises from the carelessness of the person having the care of the cellar, as it only happens when the vessels are not kept filled.

The remedies generally in use for recovering wines, are, fining them over again, sulphuric fumigations, and drawing them off into other casks. When these methods are not successful, they may be mixed with an equal quantity of the same wine of the last vintage, which generally produces the effect desired; or if, which is rare in England, you have abundance of fresh lees, that is still better.

When the wines have a bad or putrid taste, they must neither be mixed with good wine nor lees, until the bad flavour is destroyed by sulphuric fumigation.

TO FREE PLANTS FROM LEAF-LICE.

Mr. Braun, of Vienna, gives the following as a cheap and easy mode of effecting it. Mix an ounce of flowers of sulphur with a bushel of saw-dust; scatter this over the plants infested with these insects, and they will soon be freed, though a second application may possibly be necessary.

THE IMPERIAL AROMATIC MARINE TINCTURE,

AGAINST SEA-SICKNESS, SCURVY, DYSENTERY, INDIGESTION, AND THE DISEASES OF WARM CLIMATES, &c.

It has long been asserted, that sea-sickness is only to be cured by habit; but before this habit can be acquired, all the sufferings usually concomitant with this affection must be endured, to the great inconvenience and danger of the individual affected with it. Few people are able to resist the giddiness, nausea, and retching, induced by the slightest motion of a vessel on the surface of the water. Many are equally affected by the motion of a carriage, swinging, waltzing, &c.; while on the other hand, many are not the least affected by any of these actions, however varied or violent. It cannot therefore be denied, that this variation in the effect must chiefly depend on idiosyncrasy or peculiarity of constitution; consequently, arising, as sea-sickness does, from one cause only, without the existence of any morbid affection, the means of treatment become more simplified than when a similar affection arises from a variety of causes. To remove the vertigo, and consequent nausea and vomiting, and its consequences, produced by the motion of a vessel on the water, &c. which few, in fact, more or less escape, is the boasted property of the "Aromatic Marine Tincture," which for many years past has been prepared and sold in the private practice of a respectable medical practitioner, who, from the numerous well-authenticated vouchers of its combined properties (it being also anti-scorbutic, anti-dysenteric, and prophylactic) is inclined to make it more public; and it may reasonably be inferred, that it possesses some claim to the general consideration of sea-travellers, as well as debilitatad constitutions on shore, as a safe, elegant, and no less useful preparation, which it might be advisable never to be without. To the fair sex, whose delicate constitutions are more liable to be affected with sea-sickness, &c. and in whom excessive vomiting might be attended with the greatest risk, we conceive such a nostrum must prove of essential service, as well as to all in whom an excessive action of this nature might expose to equal danger, as it has the effect of immediately arresting the vomiting, removing the nausea, and reconciling the irritation of the stomach, by acting in sympathy with the brain, and of warding them off by repeated doses, until the constitution either be-

comes habituated, or has adapted itself to the cause. A table spoonful every morning, diluted with twice the same quantity of water, is said to be a prophylactic against the fevers of warm climates,—to strengthen the stomach, promote the powers of digestion to act as a general strengthener to the constitution, so liable to be relaxed by change of climate, and to preserve that general tonicity so essential to health, without requiring any additional stimulus to continue the effect.

As many people have been, and still are, deterred from undertaking sea-voyages, from the dread of encountering the hitherto invincible terror, called sea-sickness, we trust that those who henceforward would prefer this mode of travelling, either from choice or cheapness; but who, for the reasons just mentioned, have been prevented, will now be enabled to gratify their predilection, secure from the evil they have so long dreaded to encounter. With the general virtues of the Aromatic Marine Tincture, the public will be soon in possession, as it is understood the author has a pamphlet in the press on the subject. We also understand, that an analysis of this peculiar preparation has several times been unsuccessfully attempted by two eminent chymists*.

MILK.

At this day in use among almost all nations, was, in the first ages, the most common article of food. Pliny and some Historians make mention of certain nations who lived on milk only. But the art of cooking has converted into a mere ingredient, what was the chief nourishment of man; while medicine has drawn from it a useful and salutary resource in those desperate cases in which the weakness of the patients render them unable to take any solid nourishment. There is scarcely any state of feebleness, according to Dr. Cheyne, from which this liquor cannot raise the body.

TO PREVENT THE SMOKING OF A LAMP.

Soak the wick in strong vinegar, and dry it well before you use it; it will then burn both sweet and pleasant, and give much satisfaction for the trifling trouble in preparing it.

---

* Purely vegetable compositions are with extreme difficulty, if at all, capable of correct analysis. This appears to be the case with the "Aromatic Marine Tincture."

DR. LOBB'S METHOD OF CURING A SPRAIN.

A SPRAIN, (which more properly may be called a strain) whether of the foot, or hand, frequently happens among people; and, if it is great, occasions a painful lameness of the part for a while, and hinders the doing their usual business: and therefore the proposing a method which may hasten the recovery of the part strained, to its natural state, doubtless will be acceptable to the public, and of service to those who may want it.—It may lead us to a right management of the part strained, if we consider the effects of a strain, when it is very great, *viz.*

1. Such an extension of the tendons and vessels of the muscles strained, that they cannot contract themselves to their natural lengths.

2. That the great elongation of the vessels, (which deprives them of their contractive power) lessens the diameter of their cavities, obstructs the free course of their fluids through them, makes them swell, and become painful, and incapable of their usual services, or of being moved by the acts of the will, as before the accident happened.—These effects of violent strains may lead us to conclude that the best remedies are those applications which may best attenuate the obstructed fluids, recover an easy circulation of them, and sufficiently contract the elongated vessels.—For these purposes I advise vinegar, the rectified spirits of wine, such as are burnt in lamps, friction, and motion, in the following manner, *viz.*

Suppose the Ancle to be Sprained.

1. Let it be fomented with vinegar a little warm, for four or five minutes at a time, once every four hours: this will render the circulation of the fluids in the parts affected more easy, and either prevent a swelling, or promote its subsiding.—2. Let the person stand three or four minutes at a time on both his feet, in their natural posture, and sometimes move the strained foot: and sometimes when sitting with his foot on a low stool, let him move it this way and that, as he can bear it: this will contribute much to contract the over-stretched vessels, and to recover a due circulation of their fluids through them.—3. Let a gentle dry friction, with a warm hand, be sometimes used to the parts affected, which will conduce much to the same ends.—4. Two hours after every application of the

vinegar, let the part affected be just wetted with the rectified spirits of wine, and then gently rubbed.

By these means persons to whom I have advised them, have recovered from the effects of very violent sprains in a few days, while some others have been weeks in recovering by different ways of management, such as a continual resting of the strained foot, and disuse of its motions.

RECEIPT FOR A DROPSY.

TAKE the large leaves that grow upon the stem of the artichoke; wipe (not wash) them; stamp them in a mortar, and strain out the juice through a linen cloth, forcing it out; then put a pint of the juice into a quart bottle, with a pint of Madeira wine (or Mountain if you cannot get good Madeira). Take three spoonfuls every morning fasting, and three spoonfuls likewise at going to bed; the dose may be increased to four or five, if the case requires, and the stomach will bear. Mind to shake the bottle well, whenever you take it.

N. B. It is a very safe medicine, being a fine bitter for the stomach, and is among the most approved by experience that is known.

THE PHYSICIAN, THE DISEASE, AND THE PATIENT.

DR. JOHNSON said, that in sickness there were three things that were material: the Physician, the Disease, and the Patient. If any two of these joined, then they got the victory; for *ne Herculus quidem contra duos.* If the Physician and the Patient join, then down goes the Disease; for the Patient recovers. If the Physician and the Disease join, that is a strong disease; and the Physician mistaking the cure, then down goes the Patient. If the Patient and the Disease join, then down goes the Physician, for he is discredited.—*Bacon.*

PRESERVATION OF BOOKS.

A FEW drops of any *perfumed* oil will secure libraries from the consuming effects of mouldiness and damp. Russian leather, which is perfumed with the tar of the birch-tree, never moulds; and merchants suffer large bales of this article to lie in the London-docks in the most careless manner, knowing that it cannot sustain any injury from damp.

MOVEABLE FEASTS.

SHROVE TUESDAY regulates most of the moveable feasts. *Shrove Tuesday* itself is the next after the first new moon in the month of February. If such new moon should happen on a Tuesday, the next Tuesday following is Shrove Tuesday. A recently published volume furnishes a list, the introduction of which puts the reader in possession of serviceable knowledge on this point, and affords an opportunity for affirming, that Mr. Nicolas's book contains a variety of correct and valuable information.

(Moveable Feasts, from Tables, Calendars, &c. for the Use of Historians, Antiquarians, and the Legal Professions, by N. H. Nicolas, Esq.)

Advent Sunday, is the nearest Sunday to the feast of St. Andrew, November 30th, whether before or after.

Ascension Day, or *Holy Thursday*, is the Thursday in Rogation week, *i.e.* the week following Rogation Sunday.

Ash Wednesday, or the first day in Lent, is the day after Shrove Tuesday.

Carle, or *Care Sunday*, or the fifth Sunday in Lent, is the fifth Sunday after Shrove Tuesday.

Corpus Christi, or *Body of Christ*, is a festival kept on the Thursday after Trinity Sunday; and was instituted in the year 1264.

Easter Day. The Paschal Sabbath. The Eucharist, or *Lord's Supper*, is the seventh Sunday after Shrove Tuesday, and is always the first Sunday after the first full moon, which happens on or next after the 21st of March.

Easter Monday, } are the Monday and Tuesday following
Easter Tuesday, } Easter day.

Ember Days, are the Wednesdays, Fridays, and Saturdays, after the first Sunday in Lent; after the Feast of Pentecost; after Holy-rood Day, or the Feast of the Exaltation of the Holy Cross, viz. 14th of September; and after St. Lucia's day, 15th December.

Ember Weeks, are those weeks in which the Ember days fall.

The Eucharist. See Easter Day.

Good Friday, is the Friday in Passion Week, and the next Friday before Easter day.

Holy Thursday. See Ascension day.

Lent, a Fast from Ash Wednesday, to the Feast of Easter, viz. forty days.

Lord's Supper. See Easter day.

Low Sunday, is the Sunday next after Easter day.
Maunday Thursday, is the day before Good Friday.
Midlent, or the fourth Sunday in Lent, is the fourth Sunday after Shrove Tuesday.
Palm Sunday, or the sixth Sunday in Lent, is the sixth Sunday after Shrove Tuesday.
Paschal Sabbath. See Easter day.
Passion Week, is the week next ensuing after Palm Sunday.
Pentecost, or *Whit Sunday*, is the fiftieth day and seventh Sunday after Easter day.
Quinquagesima Sunday, is so named from its being about the fiftieth day before Easter. It is also called *Shrove Sunday.*
Relick Sunday, is the third Sunday after Midsummer-day.
Rogation Sunday, is the fifth Sunday after Easter day.
Rogation Days are the Monday, Tuesday, and Wednesday following Rogation Sunday.
Shrove Sunday, is the Sunday next before Shrove Tuesday. It is also called *Quinquagesima Sunday.*
Septuagesima Sunday, so called from its being about the seventieth day before Easter, is the third Sunday before Lent, and the *ninth* before Easter Sunday.
Sexagesima Sunday, is the second Sunday before Lent, or the next to Shrove Sunday, so called as being about the sixtieth day before Easter.
Trinity Sunday, or the *Feast* of the *Holy Trinity*, is the next Sunday after Pentecost or Whitsuntide.
Whit Sunday. See Pentecost.
Whit Monday, } are the Monday and Tuesday following
Whit Tuesday, } Whit Sunday.
Whitsuntide, is the three days above-mentioned.

The Vigil or Eve of a feast, is the day before it occurs. Thus the Vigil of the feast of St. John the Baptist is the 23d of June. If the feast-day falls upon a Monday, then the Vigil or the Eve is kept upon the Saturday preceding.
The Morrow of a feast is the day following: thus the feast of All Souls is November 2d, and the Morrow of All Souls is consequently the 3d of November.
The Octave or *Utas* of each feast, is always the eighth day after it occurs; for example, the feast of St. Hillary is the 13th of February; hence the Octave of St. Hillary, is the 20th of that month.
In the Octaves, means within the eight days following any particular feast.

PAINTINGS IN FISHMONGERS' HALL, &c.

In the parlour of the Court of Assistants of the Fishmongers' Company, at their hall in Thames-street, are eight capital paintings of fish, of which the following are the descriptions. They were cleaned in 1781, by Mr. Spiridiona Roma, and are the only capital paintings belonging to the Company.

Names of Fish, and their best Seasons.

No. I.

1. A codlin, November, December, January.
2. A Scotch lobster, October.
3. A barbel, September.
4. A good jack pike, in most months.
5. A maid, all the year.
6. A grey mullett, October.
7. A sole, all the year.
8. A red gurnet, September and October.
9. The gold and silver eel, all the year.
10. The larger river flounder, March, August, December, January.
11. A tench, November and December.
12. A small roach, January and September.
13. A small dace, January and September.
14. A green smelt, September.
15. A gudgeon, most months.
16. A lamprey, September.
17. A dab, October, November, December, January.
18. A small river flounder, most months.
19. A horse-mackerel, September.
20. A common mackerel, September.
21. A Feversham oyster, from October to January.

No. II.

1. A turbot, March, and most months.
2. A haddock, October, November, December.
3. A sea-crab, March, April, May.
4. A green river carp, January.
5. A sea cray-fish, November, April, May.
6. A whiting, October, November, December.
7. A perch, October.
8. A herring, May, June, September.
9. A Scotch haddock, November.

10. A shrimp, all the year.
11. A cockle, December, January, February.
12. A Colchester oyster, from October to February.

No. III.

1. A cod, November, December, January, February.
2. A ling, November and December.
3. A river-pike, most months.
4. A sea-flounder, December, January, February, March.
5. A weaver, December.
6. A pouting, November, December.
7. A char, December, January, February, March.
8. A scolop, in mackerel-season.
9. A green Welfleet oyster, November, December, January.
10. A muscle, December.
11. A sprat, November, December, January.

No. IV.

1. A hallibut, January, February, March.
2. A golden pond-carp, most months.
3. A grailing or Humber, January.
4. A golden smelt, January.
5. A chub, February.
6. A roach, most months.
7. Large dace, February.
8. Large roach, February.
9. A cole-fish, January.
10. A grey lump, January.
11. A Melton oyster, November, December, January.
12. A white Welfleet, November, December, January.

No. V.

1. A salmon, from November to July.
2. A lamper eel, April.
3. A plaice, most months.
4. A bass, March.
5. The allis, March.
6. A red lump, December and January.
7. A guard-fish, May.
8. A pilchard, April and October.
9. A bream, February.
10. A silver smelt, March.
11. A sea tench, March.
12. A willis, March.

No. VI.

1. A river-trout, from February to August.
2. A thorn-back, all the year.
3. A black lobster, June.
4. A smeer-dab, August.
5. A silver-eel, most months.
6. A Kingston, March.
7. A homeling, September.
8. A river coney-fish, December.
9. A sea-perch, February.
10. A bleak, most months.
11. A grig, most months.

No. VII.

1. A sturgeon, most months.
2. A salmon-trout, from February to August.
3. A beautiful large mackerel, May and June.
4. A fire-flaw, April.
5. A pope, most months.
6. A red prawne, most months.
7. A white prawne, May.
8. A brown shrimp, or bunting, May and December,
9. A river-crab, May.
10. A shadd, May.
11. A periwinkle, May and June.

No. VIII.

1. A Joanna Doree, August.
2. A scate, most months.
3. A river cray-fish, most months.
4. A red mullet, May, June, July.
5. A brill, September.
6. A sea-eel, or congre, most months.
7. A ruff, August.
8. A grey gurnet, gurnard gurney, September.
9. Post, or miller's thumb, November.
10. A right anchovie, the beginning of July.

DIRECTIONS FOR PURIFYING ANY GIVEN QUANTITY OF CORRUPTED WATER—SPRING WATERS, &c.

When it is intended to purify any given quantity of corrupted water, we should begin by adding to it as much powder of charcoal as is necessary to deprive it entirely of its bad smell; and in order to ascertain whether the quantity added be sufficient to clarify the said water, a small quantity of it may be passed through a linen bag, two or three inches long; if the water thus filtered has still a turbid appearance, a fresh quantity of powdered charcoal must be added until it becomes perfectly clear: the whole of the water may thus be passed through a filtering-bag, the size of which should be proportioned to the quantity of water. If vitriolic or any other acid can be procured, a small quantity of it should be added to the water, before the charcoal-powder is used; the quantity of acid being regulated in proportion to the state of putridity in which the water is found; and which should be added in quantity sufficient to communicate to the water a degree of acidity just perceptible to the taste.

If the water be merely intended for dressing meat and vegetables, instead of acid, such a quantity of sea-salt as would have been proper for seasoning the above articles, may be employed. Saline substances, like acids, hasten the effects of the charcoal-powder; by making use of acids (as has already been observed), a much less quantity of powdered charcoal is necessary; and so easy is the process to any one accustomed to operations of this kind, that four or five minutes only are required to render several gallons of putrid water fit to drink. In like manner, to improve the taste of those spring waters which have an hepatic flavour, and are therefore unpleasant to use, nothing more is necessary than to filter them through a bag half filled with powdered charcoal; if such waters are not very much loaded with mucilaginous particles, the addition of an acid is not necessary.—*See Natural and Medical Dieteticon; or, Practical Rules for Eating and Drinking, &c.* 12mo. Lond. p. 284, &c. *by J. S. Forsyth, Surgeon, &c.*

LAWS RESPECTING SERVANTS.

The following abstracts of Acts of Parliament respecting servants, ought to be read and attended to, not

only by all persons in service, but by masters and mistresses also.

A servant setting fire carelessly to a house, is liable to pay, on the oath of one witness, a hundred pounds to the sufferer, or be committed to prison and hard labour for eighteen months. 14 *Geo.* 3, *c.* 48.

Where servants are hired by the year, they cannot be put away before the expiration of that term, without some reasonable cause to be allowed by one magistrate; nor after the ending of the term, without a quarter's warning, given before witness. If a master discharge a servant otherwise, he is liable to a penalty of forty shillings. 5 *Eliz. c.* 4.

If a servant refuse to serve his term, he may be committed till he give security to serve the time; or he may be sent to the House of Correction, and punished there as a disorderly person. 5 *Eliz. c.* 4; 7 *Jac. c.* 4.

A yearly servant is not to be discharged, by reason of sickness, or any other disability by the act of God; nor may his wages be abated. *Dalt.* 129.

All hiring, without stipulation of time, is, strictly speaking, hiring for a year, and the law so construes it. 2 *Inst.* 42.

Both master and servant may, however, part by mutual consent. A master detaining a servant's wages, or not allowing sufficient meat, drink, &c. is a good cause for a servant's leaving his place, but it must be allowed by a justice of peace. *Dalt.*

If a servant hired for a term, quit his service before the end of it, he loses all his wages, unless his master puts him away.

A woman servant, who marries, is obliged to serve out her time; and, if both man and wife are servants by the year, they must both serve their time. *Dalt.* 92.

Should a woman with child hire herself for a term, and the master she hires with knew not of her being with child, he may discharge her, but before a magistrate. If she prove with child during her service, he may do the same; but if he do not discharge her before a magistrate, when he knows of it, and keeps her on, he must provide for her till her delivery, and one month after, and then she is to be sent to her place of settlement. *Dalt.*

A servant hired at a month's wages, or warning, cannot quit his place, or be discharged a day before the expiration of the month, without the whole month's wages be

paid; unless by the authority of a magistrate, for some reasonable complaint. If a servant, after warning is given, is insolent, or refuses to do his duty, a magistrate, on complaint, will commit him to prison for the time he has to serve; but the master will be ordered to pay him his wages whilst there.

No agreement a servant shall make with his master to his disadvantage, whilst he is under the age of 21, shall operate against him. *Dalt. c.* 58.

If a servant assault his master or mistress, or any other, having charge over him, he may be bound over to his good behaviour, or be committed for a year, or less, at the discretion of two magistrates. 5 *Eliz. c.* 4, *s.* 21.

If any servant shall purloin, or make away with his master's goods to the amount of 40*s.* it is felony. 12 *Ann, c.* 7. Disputes with servants about wages under 10*l.* a year, and other things, if they cannot be amicably settled, should be referred to a neighbouring magistrate, who is authorized to hear complaints, and redress them; the expence is but trifling. But the wages of coachmen, grooms, and the like, magistrates can take no cognizance of, as they come within the jurisdiction of the office that regulates the hackney coaches, post horses, &c.

If masters or mistresses, when they hire servants, deliver into the custody of such servants, plate, china, linen, &c. and tell them, before a witness, that they must be responsible for such things; then, if they lose any part of them, the law will oblige them, as far as they are able, to replace them. As to breaking of china, a servant cannot be compelled to make it good, unless it was done designedly, and the servant, when hired, agreed to pay for what he might break.

A servant may stand up in his master or mistress's defence, and assault any one that assaults them, without being liable to any punishment by law. 1 *Salk.* 407.

Whatever trespasses a servant commits, by order of his master, the master is answerable for it, not the servant. *Lord Raymond,* 264.

Masters are justifiable in insisting on their servants going to church. Every person who shall keep a servant that shall be absent from church one month, without a reasonable excuse, shall forfeit 10*l.* for every month he so keeps that servant. 3 *Jac. c.* 5; *s.* 8, 22.

Servants gaming at a public-house, with cards, dice, draughts, shuffle-board, Mississippi, skittles, nine-pins,

billiard-tables, &c. are liable to be apprehended, and forfeit from 5*s.* to 20*s.* one fourth to the informer, or be committed to hard labour for a month, or till the penalty is paid. 30 *Geo.* 2, *c.* 24.

Masters are responsible for the acts of servants who act by their direction.

If any servant shall curse or swear, and be convicted on the oath of one witness, before one justice, within eight days of the offence, he shall forfeit 1*s.* for the first offence, 2*s.* if convicted a second time, and 3*s.* the third time; or be committed to hard labour for ten days. 19 *Geo.* 2, *c.* 21.

Every person convicted of having been drunk, within six months of the complaint made, before one justice, on the oath of one witness, shall forfeit 5*s.* for the first offence, or be set in the stocks for six hours; and, if convicted a second time, shall give security not to offend so again. 4 *Jac. c.* 5; 21 *Jac. c.* 7.

If a master deliver the key of a room to a servant, and he steal to the value of one shilling, it is felony. *Dalt. c.* 155.

If any goods be delivered to the care of a servant, and he go away with them, or convert them to his own use, it is felony, if he be more than 18 years old. 21 *Hen.* 8, *c.* 7.

Servants pawning their masters' goods without orders shall forfeit 20*s.* and the value of the goods so pawned, or be sent to the House of Correction for three months, and publicly whipped. 29 *Geo.* 3.

Such goods unlawfully pawned may be searched for, by a search-warrant, and shall be restored to the owner. *Ibid.*

AVOIRDUPOISE WEIGHT.

16 Drachms	make	1 ounce.
16 Ounces	——	1 pound.
28 Pounds	——	1 quarter of a hundred
4 Quarters	——	1 hundred, or 112 lb.
20 Hundred	——	1 ton.

Bread, butter, cheese, flesh, grocery wares, and all goods that have waste, are weighed by this.

APOTHECARIES' WEIGHT.

20 Grains	make	1 scruple.
3 Scruples	——	1 drachm.
8 Drachms	——	1 ounce.
12 Ounces	——	1 pound.

Apothecaries compound their Medicines by this weight; but buy and sell by Avoirdupoise.

Housekeeping, &c.—No. XII.

To join Glass together.

Take a little isinglass, and melt it in spirits of wine; it will form a transparent glue, which will unite glass, so that the fracture will be almost imperceptible. The greatest care is necessary, that the spirits of wine shall not boil over into the fire.

To loosen the Glass Stoppers of Smelling Bottles and Wine Decanters.

Put one or two drops of sweet oil round the stopper, close to the mouth of the bottle, then put it a little distance from the fire; when the decanter gets warm, have a wooden instrument with a cloth wrapped tight round it, then strike the stopper, first on one side then on the other; by persevering a little while, you will most likely get it out. Or you may put the bottle in warm water, so that the neck of the stopper may be under water. Let it soak for a time, then knock it with a wooden instrument as before; a hard knock is not necessary; besides, it would endanger the safety of the bottle or decanter.

To take Stains out of Scarlet Cloth.

Take soap wort, bruise it, strain out the juice, and add to it a small quantity of black soap; wash the stains a few times with this liquor, suffering it to dry between whiles, and in a day or two they will disappear.

To take the Stains out of Black Cloth, Silk, Crape, &c.

Boil a large handful of fig-leaves in two quarts of water, until reduced to a pint. Squeeze the leaves, and put the liquor into bottle for use. The articles need only be rubbed with a sponge dipped in the liquor, and the stains will instantly disappear.

Wash for Leather Gloves.

If you wish to have your gloves quite yellow, take yellow ochre; if quite white, pipe-clay; if between the two, mix a little of each together; if dark, take rotten-stone and fuller's earth. By proper mixture of these you may produce any shade you desire; mix the colour you fix on with beer or vinegar, not water, and apply it as before directed.

To clean Gold and Silver Lace.

Sew the lace in linen cloth, boil it in a pint of water and two ounces of soap, and then wash it in water. When it is tarnished, apply a little warm spirits of wine to the tarnished part.

To clean Gilt Buckles, Chains, &c.

Dip a soft brush in water, rub a little soap on it, and brush the article for a minute or two, then wash it clean, wipe it, and place it near the fire till dry, then brush it with burnt bread finely powdered.

To manage Razor Strops.

Keep them moderately moist with a drop or two of sweet oil: a little crocus martis, and a few drops of sweet oil, rubbed well in with a glass bottle, will give the razor a fine edge; pass it afterwards on the inside of your hand when warm, and dip it in hot water just before using.

To make Spruce Beer.

Take eight gallons of boiling water, and add it to eight gallons of cold. Mix with it sixteen pounds of treacle or molasses, six table-spoonfuls of essence of spruce, and half a pint of yeast. Keep it in a temperate situation with the bung-hole open, two days; then close up the cork, or bottle it off, and it will be fit to drink in a few days afterwards.

To make Coffee.

To two ounces of the best coffee, fresh ground, put eight coffee-cups of boiling water, let it boil six minutes, pour out a cupful two or three times, and return it again; then put two or three isinglass chips or a few harts-horn shavings into it, and pour one large spoonful of boiling water on it: boil it five minutes more, and let the pot stand by the fire ten minutes, for the coffee to settle. It will then be clear and bright. If it is wished to be particularly strong, three ounces of coffee must be used for eight cups; and if it is not fresh roasted, let it be made perfectly hot and dry, before or over the fire, before it is used. A tea-spoonful of the best mustard-flour added to every ounce of coffee, greatly improves it, both in clearness and flavour. Serve hot milk or cream with it, and pounded sugar-candy, or fine Lisbon sugar.

To know whether a Bed be damp or not.

After the bed is warmed put a glass goblet in, between

the sheets, and if the bed be damp, in a few minutes drops of wet will appear in the inside of the glass. This is of great consequence to be attended to in travelling, as many persons have laid the foundation of incurable and fatal disorders by sleeping in a damp bed.

To destroy Rats or Mice.

Bait your traps with flour of malt mixed up into little balls, with butter, and scented with a drop or two of oil of aniseed.

To correct bad Smells.

Throw five or six pounds of quick-lime, with a sufficient quantity of ashes or soap-suds, into the place affected.

To extinguish Fire in Female Dress.

Seize any thing sufficiently large, such as a green cloth, hearth-rug, drugget, or even a linen cloth, if there is no woollen at hand, and wrap it round the sufferer; at the same time lay her gently down on the floor, as it is evident the flames must have much less power on a horizontal than on a perpendicular surface; this should be done even when there is no wrapper at hand. Cold water is the best assuager of pain, and the only safe application until medical assistance be procured, which should immediately be sent for: never apply oil or spirits of any kind.

MUCILAGINOUS OILS.

OIL OF SWEET ALMONDS,

Is usually made from bitter almonds for cheapness, or from old Jordan almonds, by heat; the oil from which soon grows rank, while that from fresh Barbary almonds, drawn cold, will keep good for some time. The almonds are sometimes blanched by dipping in boiling water, or by soaking some hours in cold water, so as to part with their skin easily; but are more usually ground to a paste, which is put into canvass bags, and pressed between iron plates in a screw-press, or by means of a wedge: one hundred weight of bitter almonds, unblanched, produces forty-six pounds of oil; the cake pays for pressing.

GROUND PEA OIL.

From the arachis hypogæa; eatable, but has a strong taste; keeps and burns well, and makes good soap.

OIL OF BEN.

From the nuts of the guilandia moringa; scentless, colourless, keeps long without growing rank; used in perfumery, to receive and retain the odour of those vegetables that yield but little essential oil, and thus forms the basis of the best sort of Huiles antiques.

CAMELLIA OIL.

From the seeds of camellia aleosa: used for the table.

HEMP OIL.

From hemp seed; good for frying in: used by the painters as a drying oil.

NETTLE-TREE OIL.

From seeds of celtis australis: excellent for the lamp.

CORNEL OIL.

From the seeds of cornus mascula and sanguinea: answers for lamps, but not for the table.

OIL OF COMMON PHYSIC-NUT.

Used as castor oil for a purge.

NUT OIL.

From the kernel of the hazel nut; very fine substitute for oil of Ben: as it will keep better than that of almonds, it has been proposed to be substituted for that oil in the College lists, being nearly equal to it; is drank with tea in China, probably in lieu of cream: used by painters as a superior vehicle for their colours.

BEECH MAST OIL.

Very clear, keeps well, and is a very good salad oil: is used in Silesia in lieu of butter.

BUCK-WHEAT OIL.

From the seeds of buck-wheat, or fagopyrum.

HEMP NETTLE OIL.

From the seeds of galeopsis tetrahit. Yielded very plentifully.

GINGKO OIL.

From the seeds of gingko beloba: used for the table.

SUN-FLOWER SEED OIL.

From the seeds of helianthus annuus: they yield well, and are recommended for cultivation; perhaps the Jerusalem artichoke would answer better, as both the root and seed would be saleable.

WALNUT OIL.

Makes good plaisters, will not keep; used by painters, is very drying; they yield about half their weight of oil.

COLD DRAWN LINT-SEED OIL.

Viscous, bitter; makes but a soft soap; used in lamps, but chiefly in painting, is very drying; dissolve one-fourth of litharge, and forms with it a kind of transparent varnish.

OIL OF MACE IN JARS.

Obtained from nutmegs, by the press; buttery, having the smell and colour of mace, but grows paler and harder by age: two pounds of nutmegs in Europe yielded six ounces of this oil.

TRUE OIL OF MACE BY EXPRESSION.

Red, remains always liquid and soft, has as trong smell of mace, subacid taste, imported in jars or bottles, the lower part being rather thicker than the top; one pound and a half of mace yielded in Europe one drachm and a half of oil.

OLIVE OIL.

Salad oil, sweet oil. The most agreeable of the oils; demulcent, emollient, gently laxative, also used as an emetic with warm water, dose one ounce, or one large spoonful; externally when warm, to the bites of serpents, and cold to tumours and dropsies; rank oil is best for plaisters; but fresh oil makes the best hard soap.

OIL OF POPPY SEEDS.

Poppy oil. Used as a salad oil; is not narcotic, as has been supposed; keeps well, is drying, does not burn well, and smokes very much; makes a soft soap, but very good in plaisters.

OIL OF STONE-PINE KERNELS.

Grows rank very soon: sixteen pounds of kernels yield five pounds of oil.

APRICOCK OIL.

Agreeable to the taste, used for that of almonds.

ARGAN OIL.

From the seeds of rhamnus siculus: sold for olive oil.

CASTOR OIL.

Commonly distinguished into the foreign oil, imported either from the West Indies, where it is obtained by decoction in water: ten pounds of seeds yield one pound of oil;—2. Or from the East Indies, where it is obtained by grinding in a mortar, with a hole in the side, for the

supernatant oil to run off, being in common use there for lamp oil.—3. That made at home by the press, which is the best, especially some that is prepared from cold blanched seeds, with the eye taken out: some chymists are said to take out the colour from the foreign oils, by certain additions, and sell them for English, or as it is called, cold drawn castor oil. The verosity communicated to the oil by the eyes of the seeds, may be got rid of by washing the oil in boiling water, or with weak spirit of vitriol, but it is seldom done in this country. It is soluble in warm spirit of wine, and its adulteration may thus be discovered if thought necessary: but as all the fat oils have nearly the same qualities, the taste is sufficient for practical purposes: purgative, in doses of half an ounce to one ounce and a half, floated on some distilled water, or some wine; or, if it does not usually stay well on the stomach, on some tincture of senna; or made into an emulsion with yolk of egg, and a little distilled water, with twenty drops of lavender drops, and a spoonful of simple syrup; it may also be used in clysters: is particularly useful where a stimulant would be hurtful, as it operates quickly, without disturbing the system; externally, in swelling pains. Contrary to most medicines, on frequent repetition, a less dose is sufficient.

RAPE OIL,

Is made from rape seed, dries slowly, makes but a softish soap, fit for ointments, but does not make good plaisters: the mucilage it contains may be got rid of in a great measure, by adding half an ounce of oil of vitriol, to two pints of the oil.

GINGELLY OIL.

From the seeds of the sesamum orientale; used for food, and in painting.

OIL OF SESAMUM.

From the seeds of gold of pleasure, myagrum sativum; used for burning in lamps, and in ointments, &c.

MUSTARD OIL.

From the hulls of black mustard, after the flour has been sifted from them: resembles rape oil, and sold for it.

OLEUN SINAPEOS.

Obtained from mustard seed, after the common mild oil has been procured; is acrid, and recommended by Dr. Rutty, in rheumatism.

OIL OF VERNICIA MONTANA.

Yellow, used as a varnish, is extracted from the kernels.

(For various purposes in the Arts, &c.)

OIL OF ROSES BY INFUSION.

Rose petals, not fully blown, picked, peeled, and beat to a pulp, four ounces; olive oil, one pint: expose to the sun for a week, press out the oil, repeat the insolation with fresh roses twice more; then leave the roses in the oil for use.

OIL OF CAMOMILE BY INFUSION.

From the flowers, in the same manner as that of roses: *used in sprains.*

OIL OF ST. JOHN'S WORT.

Flowers of St. John's wort, four ounces, olive oil, two pounds; infuse till the oil is well coloured. The expressed oil of the seeds of St. John's wort was used instead of olive oil.

2. Green oil rendered paler by adding rape oil.

3. Common olive oil, one gallon; alkanet root, eight ounces; *applied to wounds.*

OIL OF WHITE LILIES.

Prepared in the same manner as oil of roses: olive oil is usually sold for it.

OIL OF EARTH WORMS.

Earth-worms, half a pound; olive oil, two pints; white wine, half a pint: boil till the wine is consumed, then press out the oil.

2. Common olive oil and lintseed oil, equal parts.

OIL OF ELDER-FLOWERS.

Elder-flowers, one pound; olive oil, two pounds; boil till crisp, press out the oil and let it settle: emollient.

EXETER OIL.

Green oil is usually sold under this name: the original formula required about twenty different herbs to be infused in it, and euphorbium, mustard-seed, castor, pellitory of Spain, each an ounce to sixteen pints of oil; but is seldom if ever made.

OIL OF MUCILAGES.

Fresh mallow-roots, half a pound; lintseed, fœnugreek seed, each three ounces; water, two pints; boil for half an hour, and add olive oil, four pints; continue boiling till the water is nearly consumed, and pour off the oil.

2. Fresh mallow root, four pounds; fœnugreek seed and lintseed, of each two pints; a mixture of common olive oil, sperm oil, and seal oil, in equal parts; four gallons.

3. Seeds of fœnugreek, eight ounces; lintseed oil, two pints; infuse for a week, and strain. *Very emollient.*

GREEN OIL.

Leaves of laurel, rice, marjoram, sea-wormwood, camomile (all fresh), of each, three ounces; olive oil, two pints; boil till crisp, press out the oil, and let settle. *Emollient.*

OIL OF SCORPIONS.

Live scorpions, thirty; oil of almonds, two pints: expose to the sun for forty days. Centipedes are usually substituted for scorpions, as being more easily procured: *Externally emollient; internally, diaphoretic, occasioning a prickly heat on the skin.*

CAMPHORATED OIL.

Camphor, half an ounce; olive oil, two ounces; dissolve. *Anodyne discutient.*

*** The only compound oil in the College lists, although all the preceding are in high repute with private practitioners.

MIXTURE FOR BUGS.

Corrosive sublimate, two drachms; rectified spirits, eight ounces; rub together, and add oil of turpentine, eight ounces.

COMMON OIL OF SPIKE.

Oil of turpentine, three pints; oil of lavender, one pint; *used by enamellers to mix their colours.*

2. Oil of turpentine coloured with alkanet.

3. Oil of turpentine, six pints; Barbadoes tar, four ounces; alkanet root, two ounces, used by farriers as a liniment.

MIXED OIL.

(Nine oils). Train oil, 23 pints; oil of turpentine, six pints; oil of bricks and oil of amber, of each one pint; camphorated spirit of wine, two pints; Barbadoes tar, seven pints; oil of vitriol, one ounce.

2. *The oils.* Oil of vitriol, oil of turpentine, common olive oil, equal parts.

3. *Newmarket oil.* Lintseed oil, oil of turpentine, oil of St. John's wort, each, three pints; oil of vitriol one ounce: used in sprains, also in lumbago and rheumatism.

OIL FOR THE TOOTH-ACH.

Oil of turpentine, an ounce, camphor, two drachms.

TAYLOR'S REMEDY FOR DEAFNESS.

Oil of almonds, one pint; bruised garlic, two ounces; alkanet root, half an ounce: infuse and strain.

ROCHE'S EMBROCATION FOR THE HOOPING COUGH.

(See *Patent Medicines.*)

DRYING OIL.

Nut or lintseed oil, eight pints; white lead, dried, sugar of lead, dried, white vitriol dried, of each, one ounce; litharge, twelve ounces; boil slightly, and scum until a pellicle is formed, then cool, and let it settle.

2. Lintseed or nut oil, sixteen ounces; litharge, one ounce and a half; white vitriol, three drachms: boil.

3. Lintseed or nut oil, sixteen ounces; litharge, three or four ounces: boil.

4. Lintseed or nut oil, sixteen ounces; litharge, three or four ounces; mix, and let it stand for some time.

5. Nut oil, two pounds; water, three pounds; white vitriol, two ounces: boil till nearly all the water is consumed, then expose it to the sun for some time.

6. Oil, mix with snow or powdered ice, and keep it from thawing as long as possible; in two months the oil will have acquired the drying property: used to mix with colours, to cause them to dry quickly.

PAINTER'S CREAM.

Nut oil, three ounces; mastich, half an ounce; dissolve, acid of sugar of lead, one drachm, and then water gradually to the consistence of cream: used by painters to cover the work which they are obliged to leave some time: when they begin again, it is washed off with a wet sponge.

FURNITURE VARNISH.

White wax eight ounces, oil of turpentine one pint.

PICTURE VARNISH.

Mastich, twelve ounces; Venice turpentine, two ounces four drachms; thirty grains of camphor; pounded glass, four ounces; oil of turpentine, three pints and a half; pour off the clear: used to oil paintings.

GOLD VARNISH FOR LEATHER.

Turmeric, gambooge, of each one scruple and a half; oil of turpentine, two pints; add seed lac, gum sandarac, of each four ounces; dragon's blood, four drachms; Venice turpentine, two ounces; pounded glass, four ounces: pour off the clear.

COPAL VARNISH.

Oil of turpentine, thickened by keeping, eight ounces; copal two ounces and a half.

2. Oil of turpentine six ounces; oil of lavender, two ounces; copal, one ounce.

JAPANNER'S COPAL VARNISH.

Copal, four pounds, is melted in a glass matrass, till the water is evaporated.

MARKETTING TABLE, BY THE POUND, YARD, STONE, &c.

No.	2½d.			3½d.			4½d.			5½d.			6½d.			7½d.			8½d.			9½d.			10½d.			11½d.		
	s.	d.	f.	s.	d.	f.	s.	d.	f.	s.	d.	f.	s.	d.	f.	s.	d.	f.	s.	d.	f.	s.	d.	f.	s.	d.	f.	s.	d.	f.
1	0	2	2	0	3	2	0	4	2	0	5	2	0	6	2	0	7	2	0	8	2	0	9	2	0	10	2	0	11	2
2	0	5	0	0	7	0	0	9	0	0	11	0	1	1	0	1	3	0	1	5	0	1	7	0	1	9	0	1	11	0
3	0	7	2	0	10	2	1	1	2	1	4	2	1	7	2	1	10	2	2	1	2	2	4	2	2	7	2	2	10	2
4	0	10	0	1	2	0	1	6	0	1	10	0	2	2	0	2	6	0	2	10	0	3	2	0	3	6	0	3	10	0
5	1	0	2	1	5	2	1	10	2	2	3	2	2	8	2	3	1	2	3	6	2	3	11	2	4	4	2	4	9	2
6	1	3	0	1	9	0	2	3	0	2	9	0	3	3	0	3	9	0	4	3	0	4	9	0	5	3	0	5	9	0
7	1	5	2	2	0	2	2	7	2	3	2	2	3	9	2	4	4	2	4	11	2	5	6	2	6	1	2	6	8	2
8	1	8	0	2	4	0	3	0	0	3	8	0	4	4	0	5	0	0	5	8	0	6	4	0	7	0	0	7	8	0
9	1	10	2	2	7	2	3	4	2	4	1	2	4	10	2	5	7	2	6	4	2	7	1	2	7	10	2	8	7	2
10	2	1	0	2	11	0	3	9	0	4	7	0	5	5	0	6	3	0	7	1	0	7	11	0	8	9	0	9	7	0
11	2	3	2	3	2	2	4	1	2	5	0	2	5	11	2	6	10	2	7	9	2	8	8	2	9	7	2	10	6	2
12	2	6	0	3	6	0	4	6	0	5	6	0	6	6	0	7	6	0	8	6	0	9	6	0	10	6	0	11	6	0
13	2	8	2	3	9	2	4	10	2	5	11	2	7	0	2	8	1	2	9	2	2	10	3	2	11	4	2	12	5	2
14	2	11	0	4	1	0	5	3	0	6	5	0	7	7	0	8	9	0	9	11	0	11	1	0	12	3	0	13	5	0
15	3	1	2	4	4	2	5	7	2	6	10	2	8	1	2	9	4	2	10	7	2	11	10	2	13	1	2	14	4	2
16	3	4	0	4	8	0	6	0	0	7	4	0	8	8	0	10	0	0	11	4	0	12	8	0	14	0	0	15	4	0
17	3	6	2	4	11	2	6	4	2	7	9	2	9	2	2	10	7	2	12	0	2	13	5	2	14	10	2	16	3	2
18	3	9	0	5	3	0	6	9	0	8	3	0	9	9	0	11	3	0	12	9	0	14	3	0	15	9	0	17	3	0
19	3	11	2	5	6	2	7	1	2	8	8	2	10	3	2	11	10	2	12	5	2	15	0	2	16	7	2	18	2	2
20	4	2	0	5	10	0	7	6	0	9	2	0	10	10	0	12	6	0	13	2	0	15	10	0	17	6	0	19	2	0
21	4	4	2	6	1	2	7	10	2	9	7	2	11	4	2	13	1	2	14	10	2	16	7	2	18	4	2	20	1	2
22	4	7	0	6	5	0	8	3	0	10	1	0	11	11	0	13	9	0	14	7	0	17	5	0	19	3	0	21	1	0
23	4	9	2	6	8	2	8	7	2	10	6	2	12	5	2	14	4	2	15	3	2	18	2	2	20	1	2	22	0	2
24	5	0	0	7	0	0	9	0	0	11	0	0	13	0	0	15	0	0	16	0	0	19	0	0	21	0	0	23	0	0
25	5	2	2	7	3	2	9	4	2	11	5	2	13	6	2	15	7	2	17	8	2	19	9	2	21	10	2	23	11	2
26	5	5	0	7	7	0	9	9	0	11	11	0	14	1	0	16	3	0	18	5	0	20	7	0	22	9	0	24	11	0
27	5	7	2	7	10	2	10	1	2	12	4	2	14	7	2	16	10	2	18	1	2	21	4	2	23	7	2	25	10	2
28	5	10	0	8	2	0	10	6	0	12	10	0	15	2	0	17	6	0	19	10	0	22	2	0	24	6	0	26	10	0
42	8	9	0	12	3	2	15	9	0	19	3	0	22	2	0	26	3	0	29	9	0	33	3	0	36	9	0	40	3	0
56	11	8	0	16	4	0	21	0	0	25	8	0	30	4	0	35	0	0	39	8	0	44	4	0	49	0	0	53	8	0

A USEFUL TABLE OF EXPENCES, INCOME, OR WAGES;

Shewing, at one View, what any Sum, from One Pound to One Thousand per Annum, is per Calendar Month, Week, or Day.

Per Year.			Per Month.			Per Week.			Per Day.		
£	s.		£	s.	d.	£	s.	d.	£	s.	d.
1	0	is	0	1	8	0	0	4½	0	0	0¾
1	10	—	0	2	6	0	0	7	0	0	1
2	0	—	0	3	4	0	0	9¼	0	0	1¼
2	2	—	0	3	6	0	0	9¾	0	0	1¼
2	10	—	0	4	2	0	0	11¼	0	0	1¾
3	0	—	0	5	0	0	1	1¾	0	0	2
3	3	—	0	5	3	0	1	2¼	0	0	2
3	10	—	0	5	10	0	1	4¼	0	0	2¼
4	0	—	0	6	8	0	1	6½	0	0	2¾
4	4	—	0	7	0	0	1	7½	0	0	2¾
4	10	—	0	7	6	0	1	8¾	0	0	3
5	0	—	0	8	4	0	1	11	0	0	3¼
5	5	—	0	8	9	0	2	0¼	0	0	3½
5	10	—	0	9	2	0	2	1½	0	0	3¾
6	0	—	0	10	0	0	2	3¾	0	0	4
6	6	—	0	10	6	0	2	5	0	0	4¼
6	10	—	0	10	10	0	2	6	0	0	4¼
7	0	—	0	11	8	0	2	8¼	0	0	4½
7	7	—	0	12	3	0	2	10	0	0	4¾
7	10	—	0	12	6	0	2	10½	0	0	5
8	0	—	0	13	4	0	3	1	0	0	5¼
8	8	is	0	14	0	0	3	2¾	0	0	5½
8	10	—	0	14	2	0	3	3¼	0	0	5½
9	0	—	0	15	0	0	3	5½	0	0	6
9	9	—	0	15	9	0	3	7½	0	0	6¼
10	0	—	0	16	8	0	3	10	0	0	6½
10	10	—	0	17	6	0	4	0½	0	0	7
11	0	—	0	18	4	0	4	3	0	0	7¼
11	11	—	0	19	3	0	4	5¼	0	0	7½
12	0	—	1	0	0	0	4	7½	0	0	8
12	12	—	1	1	0	0	4	10	0	0	8¼
13	0	—	1	1	8	0	5	0	0	0	8½
13	13	—	1	2	9	0	5	3	0	0	9
14	0	—	1	3	4	0	5	4½	0	0	9¼
14	14	—	1	4	6	0	5	8	0	0	9¾
15	0	—	1	5	0	0	5	9	0	0	10
15	15	—	1	6	3	0	6	0½	0	0	10¼
16	0	—	1	6	8	0	6	2	0	0	10½
16	16	—	1	8	0	0	6	5½	0	0	11
17	0	—	1	8	4	0	6	6½	0	0	11¼
17	17	—	1	9	9	0	6	10½	0	0	11¾
18	0	—	1	10	0	0	6	11	0	0	11¾
18	18	is	1	11	6	0	7	3	0	1	0½
19	0	—	1	11	8	0	7	3½	0	1	0½
20	0	—	1	13	4	0	7	8	0	1	1¼
30	0	—	2	10	0	0	11	6	0	1	1¾
40	0	—	3	6	8	0	15	4½	0	2	2¼
50	0	—	4	3	4	0	19	3	0	2	9
60	0	—	5	0	0	1	3	0¾	0	3	3½
70	0	—	5	16	8	1	6	11	0	3	10
80	0	—	6	13	4	1	10	9	0	4	4½
90	0	—	7	10	0	1	14	7¼	0	4	11
100	0	—	8	6	8	1	18	5½	0	5	5¾
200	0	—	16	13	4	3	16	11	0	10	11½
300	0	—	25	0	0	5	15	4½	0	16	5¼
400	0	—	33	6	8	7	13	10	1	1	11
500	0	—	41	13	4	9	12	3½	1	7	4¾
600	0	—	50	0	0	11	10	9	1	12	10½
700	0	—	58	6	8	13	9	2¾	1	18	4¼
800	0	—	66	13	4	15	7	8¼	2	3	10
900	0	—	75	0	0	17	6	1¾	2	9	3¾
1000	0	—	83	6	8	19	4	7¼	2	14	9½

INDEX.

PAGE

ABORTION, anulet to prevent 200
Accidents, cautions for the better prevention of - - - 62
Advice, Dr. Darwin's, to the men of Nottingham - - - 76
Agriculture, animal substances in 170
Ague-drop - - - 66
Air, influence of - - 1
Aloe plant, history and uses - 487
Aloes, socotrine - - 492
—— Barbadoes - - *ib.*
—— different preparations of - 493
Almond paste - - - 67
——— pills (Anderson's) - *ib.*
——— cake - - - 522
——— ground cake - - *ib.*
AMULETS AND CHARMS, in the cure of diseases, protection from evil spirits, &c.; on the origin and imaginary efficacy of - 193
——— decline of - - *ib.*
——— origin and cause of the use of, &c. - - 195
——— for ague and other diseases - - - 197
——— general definition of, &c. *ib.*
——— Lord Verulam's observations on, &c. - - 198
——— effect of imagination on the mind, &c. - - *ib.*
——— Dr. Willis's amulet for the cure of epilepsy, &c. - 199
——— to prevent abortion, and to facilitate delivery - - 200
——— Belort's amulets against the plague, &c. - - *ib.*
——— doctrine of effluvia applied to, &c. - - 201
——— charms used by the Moors of Barbary, &c. - 202
Anchovies, essence of - - 385
Anisette de Bourdeaux - - 329
Animal substances, loss sustained in the cooking of, &c. - 189
Animation, suspended, treatment of, when caused by cold, hanging, intoxication, apoplexy - 502
——— suffocation from noxious vapours, lightning, &c. - 503
Anthelmintics, or worm medicines, principal of this class, with their doses - - - 510
Anti-attrition (mixture) - 138
Anti-rheumatic embrocation - 15
Antiscorbutic drops (Marsden's) 376
Anodyne necklaces - - 67
——— balsam (Bateman's) - 69
Anxiety, ungovernable - 407
Apothecary, sentence against one 486
Armenian cement - - 136
Armpits, wash for, &c. - 334
Aromatic lozenges of steel - 67
Aromatic vinegar (Henry's) - 68
Arrack, mock - - 377
——— China - - *ib.*
Arrow-root, Indian - - 521
Arts, recipes in - - - 136
Artichokes, method of preserving 289
Asparagus, method of preserving *ib.*
Asthma, prescriptions in humid, electuary for - - 158
——— dry ditto - - *ib.*
Avarice, ungovernable - 406

BAKING - - - 518
Baldness, liniment for - - 464
Balls, furniture - - 141
—— black - - *ib.*
Balm of Gilead (Solomon's) - 512
Balm, spirit of - - 315
Balsam of horehound (Ford's) - 112
——— Godbold's vegetable - 167
——— Riga - - 452
——— of honey - - 210
Bardana, Hill's essence of - 210
Bark, essential salt of - - 69
BATHS, WELLS, MINERAL WATERS, &c.
BRIGHTON—Hot wells, hot and cold baths, air-pump, water-baths, Gilburd's baths, New Steyne hotel, Mahomed's baths, chalybeate spring - 302, 303
BATH—King's bath, cross bath, the hot bath, properties, &c.; chymical properties of the Bath waters; effects of the Bath water; diseases in which the Bath waters are used, &c.; dose of the water - - 393, 398

PAGE

Bath, shower - - 263
—— vapour - - *ib.*
—— medicated - - 264
———— Buonaparte's - 265
—— warm, artificial, advantages, &c. - - - 266
—— directions for - - 258
—— diseases used for - *ib.*
—— hot - - - 264
Bathing, manner of, at Scio - 251
———— generally - - 257
———— of children - - 498
Baths of the ancients, historical observations on - - 248
—— Greek - - - 249
—— Roman, description of - *ib.*
Bathers, advice to - - 260
Bed, damp, to know - - 591
Beef-tea - - - 550
Beef and pork, to dry-salt - 569
Beer, analysis, &c.; malt in; pale; amber - - 460
—— ginger - - 293
—— hops, yeast, sugar in - 460
—— liquorice root, capsicum, ginger, treacle, coriander seed in 461
—— coeculus indicus, heading, salt, &c. - - - 462
—— spruce, to make - - 591
Beetle, turnip, means to destroy 173
Bites, venomous, antidotes for - 447
Bitter almonds, essence of - 111
Bitters, species for making - 438
———— brandy - - *ib.*
Black-ball - - - 141
Black drop - - - 70
Black extract - - 463
Blackman's colours in bladders - 142
Blacking - - - 143
Blase, St. the miraculous - 434
Beaume de vie - - 70
Bleaching liquid - - 140
Blistering of children - - 498
Blood, in consequence of wound, method of stopping - - 213
———— spitting of - 480, 481
———— treatment of - - *ib.*
———— draughts for - - *ib.*
Blue, Saxon (Scott's liquid blue) 140
Bodily health, signs of good - 20
Bolus, cathartic, for dropsy in the legs - - - 447
Boot-top liquid - - 142
Books, preservation of - - 580
Boxes, snuff and tin-plate - 184
Boyle's fuming liquor - - 136
Brandy, the origin of - - 63
Breakfast-powder, Hunt's economical - - - 110

PAGE

Breath, bad, tooth-powder to remedy - - - 534
Breath, sweetness of - - 421
———— shortness of, or difficult breathing, prescription in - 158
———— offensive, anecdotes on, and remedies for - - 467
Breeches-ball - - 139
Brewing, family, plain directions for, on economical and salutary principles, &c. - - 455
———— proportions for a barrel of ale - - - 458
———————— two-penny, a barrel - - 459
———————— table-beer - - - *ib.*
BROADSTAIRS, bathing at - 253
Brodum's nervous cordial - 70
Bronzing liquor - - 136
Broth, clear, that will keep long - 548
———— a quick made - *ib.*
———— a very supporting, against any kind of weakness - 549
———— a very nourishing veal - *ib.*
———— of beef, mutton, and veal *ib.*
———— calves' feet - - *ib.*
———— chicken - - 550
———— eel - - *ib.*
———— tench - - - *ib.*
Buchan, Dr., on cleanliness - 155
Buckles, gilt, to clean - - 591
Bugs, mixture for - - 597
Builders' work, receipt to estimate 135
Bunnions and corns, treatment of 476
BUXTON, the baths of; analysis and use of the water - 310

CATERPILLARS, frog, a destroyer of 327
Cancer ointment (Plunkett's) - 415
———— Davidson's remedy for - 109
Cashmirians, physical character of the - - - 374
Cassava - - - 522
Caution - - - 230
Cedrats - - - 332
Cement, Botany-bay - 152
———— seal engravers - *ib.*
Cephalic snuff - - 72
Chamomile drops - - 72
Charcoal, concentrated solution of *ib.*
———— prepared (Lardner's) - 376
Cheese, damson, making of - 284
———— Stilton - - 323
Chelsea pensioner - - 72
CHELTENHAM; the Montpelier of Britain; the Well-walk; the Spa, or long-room; Montpelier spa; terms of drinking at the

PAGE

spa, and of walking and riding in the pleasure-grounds; the Spa, its qualities and virtues; medicinal virtues; the King's, the Orchard, the Essex, the Lord Sherborne's, and Montpelier wells; waters in the octagon turret; in Hygeia-house; Allstone villa, new spa; chalybeate springs; hot baths, the spa, or long room - 348, 361
Chenevix's antimonial powder - 271
Chilblains - - - 507
Children, practical remarks on the early exertion and overstraining of the physical powers of - - - - - 148
——— Sir Astley Cooper's opinion on the confinement of - 151
——— exertion, over, the bad effects of - - 151
——— absurd practices relating to - - - 439
——— purgatives, their use to 444
——— sudorifics - - 445
——— composing draughts, powders, pills, &c. to - *ib.*
——— Lacedemonian law relative to weakly; Spartan maxims, &c. - - 366
——— deformed, treatment of by the savages of Guiana; the women of Kamtschatka and their twins; custom of the Ostiak Kozaks - - - 367
——— lectures on the physical education of, during the early part of their lives, addressed to mothers - - 364
——— education of - 217
——— how to be adapted, &c. - - 401
——— important reflections on the health, education, and morals of - - - 27
Chinese, art of preserving health 20
——— physicians - - 21
——— aphorisms from the, respecting medicine - - 22
——— industry and rural economy of - - - 561
Cleanliness, Dr. Buchan on, its beneficial and salutary effects; personal, local, and general - 145
Clothes-ball - - 138
——— powder - - *ib.*
Clothing, observations on - 1
Clysters, their use in children - 496
Cochrane's, Major, cough-drops 506

PAGE

Coffee, essence of - - 111
——— to make - - 591
Colic in old people - - 507
—— to give ease in - - 509
Colley's depilatory - - 75
Cologne water.—See *Eau de Cologne.*
Colours in bladders (Blackman's) 142
Coltsfoot, essence of - - 111
COMMON COMPLAINTS, remedial remarks on some - - 476
Warts, treatment of - - *ib.*
Cramp in the stomach - 477
——— legs - - *ib.*
Ulcers, or ulcerated sores; bad legs - - - *ib.*
——— various kinds of - 478
——— treatment of - - *ib.*
Head-ach, treatment of - 479
Spitting of blood, treatment - 480
——— draughts in - 481
Piles, treatment, lotions for - *ib.*
——— cough, mixture for - 507
Complaint, Gourmand's - 427
Composition for curing trees - 426
——— directions for using the *ib.*
CONDIMENTS, &c. - 384-386
CONFECTIONS, to make various hard - - - 239
CONSERVES, making of - 283
——— Rob de berberis; de cerasis; de cornis; cydoniorum; of plums; of elder-berries with sugar; diacaryon; diamorum, making of - 283, 284
——— of wormwood; of oranges - - - - 284
Contentment, health and - 54
Convalescents, advice to - 53
Cooking of fish, observations on - 220
——— animal substances, loss sustained in the - - 189
Cookery for the sick and poor.—See *Broths.* - - 548
Cook, qualifications of a good - 41
Cooks, advice to - - 190
Cooper, Sir Astley, his opinion on the confinement of children - 151
Cordial, house - - 403
Cornea, inflammations and opacities of, how treated by the Arabians 516
Corn-plaster - - 74
Corns and bunnions, treatment of 476
Corpulence, reduction of - 473
Cosmetics.—See *Toilette.*
Cottage, cheap recipe for white-washing - - - - 93
Cottager's garden, directions for white-washing, &c. - - 94

PAGE

Cotton, method of vein-marbling and staining, &c. - - 143
Cough-drops (Grindle's) - 210
——— (Cochrane's) - *ib.*
Cough, winter, electuary; prescription in - - 158
——— humid, in old people - 507
Cough-drops - - 74
Country excursions - - 247
Court-plaster - - 74
Crab, natural history of - 554
—— description of the violet - *ib.*
—— mode of living in the mountains - - - *ib.*
—— spawning time - - 556
—— caution to crab-eaters - 557
Cramp in stomach and legs, treatment of - - - 477
Crayons, lithographic - 141
Cream of Barbadoes.—See *Creme de Barbades.* - - 331
——— Tartar.—See *Rhubarb.*
——— Orange.—See *Creme d'Orange.* - - 332
—— painters' - - - 598
Creme de Barbades - - 331
—— de Noyau - - 332
—— d'Orange - - *ib.*
Crespigny, Lady, her pills; dinner pills; Lady Webster's, or Lady Crespigny's pills - - 74
Croup and hooping-cough, specific for - - - 328
Currie-powder, to make, &c. - 454

Daffy's elixir - - 75
Dalby's carminative - - 76
Davidson's remedy for cancer - 109
Deafness, cure of - - 509
——— Taylor's remedy for - 598
Death - - - 8
Depressions, empassioned - 403
——— remedial treatment, &c. - - - 410
Despair, how distinguished, &c. 408
De La Motte's golden drops - 109
Despondency, ungovernable - 408
——— causes of - 409
——— aptitude to become epidemic - - 410
Diacydonium conserve, making of - - - 283
Diagnostic signs, or symptoms, preceding or accompanying diseases 125
Diet, Chinese proverbs pertaining to - - - 23
—— drink, ingredients for - 438
Disease and Exercise - - 49
——— the philosophy of - 58

PAGE

Diseases of Tradesmen, Mechanics, Labourers, &c. &c. - 148
Preliminary observations - *ib.*
On the early exertion and overstraining of the physical powers of children; Mr. Owen's remarks, &c. - 150
Sir A. Cooper's opinion on the confinement of children, &c. - - 151
The bad effects of over-exertion - - - *ib.*
Arising from exposure to deleterious fumes, &c. - 152
Effects of exposure to mercurial vapour - - *ib.*
Mode of attack, and symptoms of mercurial palsy - 153
Dangerous parts of the process of gilding, &c. - 155
——— diagnostic signs, or symptoms, preceding or accompanying - - 45, 64
Distilled Waters, directions for making, — succory-water, spearwort, strawberry, simple lavender, silver-weed, sassafras, saxifrage, small snail, of black cherries, vanilla, white poppy, of pale roses, of red roses, &c. &c. - - - - 286
Divine Water. See *Eau Divine.*
Domestic economy, practical observations, &c. - - 30
Door or windows, caution against sitting near, in heated rooms, &c. 19
Dover, bathing at - - 253
Dreams, pleasant, Dr. Franklin's rules for having - - 61
Dress, a hint to the Ladies, on a certain article of - - 87
Drops (Morris's) - - 377
———, antiscorbutic (Spilsbury's)
———, Dutch, or Hærlem - 109
———, Grindle's cough - 210
Dropsy of the legs, bolus for - 447
———, receipt for cure of - 580
Dye, pink - - - - 140
Dyer's spirit — (composition for scarlet dye) - - 137
Dyspepsy, or indigestion, history of - - - - 298

Eaton's styptic - - - 110
Eau de Barbades. See *Citronelle* 15
——— Cologne - - - 315
—— Divine - - 329
—— Medicinale D'Husson - 110
—— Sans pareil - - 315

PAGE
Economical breakfast-powder, (Hunt's) - - 110
Economy, the genuine golden rules of - - - 17
———, rural, and industry of the Chinese - - 135
——— domestic, practical observations on - - 36
Edinburgh ointment - - 110
Eggs, new laid, to procure plenty at Christmas - - 327
Elixir of longevity, Dr. Jernizt's, of Sweden - - 110
——— of long life - - 13
——— vitriol - - 110
——— paregoric, Edinburgh - 403
Embrocation, tooth-ach - 15
———, anti-rheumatic - 15
Emetics, history of - - 162
———, their use in children - 496
———, where improper - *ib.*
Empirics, cautions against, as regards children - - 500
Escuba - - - 330
Essence of spruce - - 112
Establishment, useful outlines of an - - - 62
Expectorants, or pectoral remedies, their use in children - 494
Exercise and Disease - - 49
———, general rules for taking, &c. - - - 51
———, influence of - - 1
——— and rest - - 5
———, manner of taking - 6
Eyes, rules for the preservation and treatment of the - 113
———, conduct to be observed in weak - - - 114
———, best defence of weak, by candle-light, &c. - - *ib.*
———, the advantage of candles over lamps, &c. - - *ib.*
———, miscellaneous observations on weak - - - 115
——— (sight) with regard to an apartment or sitting-room - 116
———, position of the writing-desk - - *ib.*
———, directions for placing the candle - - 117
———, directions for placing the bed-room light - *ib.*
——— (bathing the) in cold water 118
———, wash - - - *ib.*

Famines, accounted for in earlier times - - - 48
Farinaceous substances - 185
Female dress, to extinguish fire in 592
Fenouillette de l'Ile de Rhé - 331
Fish, to preserve by sugar - 568
——— names of, when in season - 583
Fishmongers'-hall, pictures in - *ib.*
Fisheries at Fulham - - 84
Flies, to prevent from settling on pictures, picture-frames, and other furniture - - 386
Flour, wheaten, how prepared for bread - - - 518
——— Rye - - 519
——— Barley - - *ib.*
——— Oatmeal - - 520
Fly-water - - - 136
Food, preparation of, connected with cookery, and its processes, fuel, &c. - - - 186
——— loss sustained in the cooking ing of animal substances, &c. - - - 189
——— and drink, sleep and cries of children, Professor Hufeland's opinion - - 538 546
Footman, qualifications of a - 275
Ford's balsam of horehound - 112
———-laudanum - - *ib.*
Freeman's bathing spirits - 112
French polish - - 137
Friar's balsam - - 117
Friendship, true, a recipe to establish - - - 52
Frog, a destroyer of caterpillars 327
Fruit trees, directions for preserving the buds - - 171
Fumigation, nitrous, for sick rooms - - - 402
——— disinfecting - *ib.*
Fumigating pastilles - 112
Furniture balls - - 141

GALL, applied to the eye, by Sir Everard Home; his paper read to the Royal Society - - 516
Game, preservation of - - 169
——— to roast - - 419
Gaming - - - 451
Green's drops - - 168
Greenlanders, physical character, &c. of - - - 370
Greenough's tincture for the teeth 210
Gilding, dangerous parts of the process of, &c. - - 155
Gilders' wax - - - 152
Ginger, Oxley's concentrated essence of Jamaica - - 377
Glasses, to join together - 590
GLOUCESTER, saline chalybeate spa 361
Godbold's vegetable balsam - 167

PAGE
Godfrey's cordial - - 167
——— smelling salts - 168
Golden ointment.—See *Singleton's Eye-salve.*
——— spirits of scurvy-grass - 168
Gout, pills; Wilmot's prescription for; Hartley's; cataplasm in; to prevent costiveness in; powder of the extract of monkshood 267
—— singular cures of the, &c. 36
—— the, a fragment from an ancient manuscript - - 85
—— tincture (Wilson's) - 168
Gowland's lotion - - 168
Greatrakes, Valentine, biographical portrait of - - 432
Greeks, physical character of the 375
Grindle's cough drops - - 210
Grose, original letter from - - 216
Guiana, treatment of children by the savages of - - 367

HABITS of early life, and physical character of various nations considered - - 395
Hair, oil to thicken - - 465
Hams, to salt - - 569
——- German mode of curing - 324
Hannay's lotion - - 210
Hard multum.—See *Extract, black.*
HARROGATE, properties and virtues of the wells of - 308-309
HASTINGS, bathing at - - 256
Hatfield's tincture - - 210
Hay-making, best method of - 325
Health - - - 8
——— and population, comparative, in England - - 183
——— rules to preserve, in hot climates - - - 475
——— and quackery - - 15
——— Chinese art of preserving 20
——— and contentment - 54
——————— an ode to, set to music - - 55
——— Chinese proverbs pertaining to - - - 23
——— an allegory - - 177
Head-ach, Ward's essence for the 402
——————— bilious - - 508
——————— nervous - - 301
Heart, pulsation of, observations on - - - 469
Heartburn, prescription for - 507
Heart-ach, ungovernable, contrasted, &c. - - 408
Heel ointment - - 139
Hens, their fecundity - - 172
Hill's essence of Bardana - 210

PAGE
Hindoos, physical character of the 374
Hippocrates, comparison of - 558
Hog's-lard, prepared - - 523
Honey of bees, to take without destroying them - - 325
Honey, balsam of - - 68
——— water - - 210
Horehound, balsam of (Ford's) - 68
Horses, management of, in case of fire - - - 184
Horticulture for every month in the year, 89, 132, 181, 231, 287, 333, 388, 435, 485, 531
Hot weather, important precautions for - - 268
HOUSEKEEPING and HUSBANDRY:
No. I.—Cookery, &c.; cheap and palatable receipts in cookery - - 77
The laundry, &c. - - 79
No. II.—Directions for cooking and preparing vegetables for the table - - 128
No. III.—Advice to cooks - 190
No. IV.—Kitchiner on carving, &c. - - 218
Observations on the cooking of fish - - 220
To boil a leg of lamb - 222
To dress a hind quarter of house lamb - - *ib.*
To render tea at 5*s.* a pound, equal to that at 12*s.* - 223
To boil, broil, to souse or pickle salmon; lobster sauce; to pot mackerel; gooseberry fool - - 223
No. V.—Boiling, &c. - 276
Estimation of the loss of weight which takes place in cooking animal food - 282
No. VI.—Roasting beef, mutton, veal, lamb - 318-322
To make mushroom ketchup, walnut ketchup, fish-sauce 323
No. VII. — Roasting poultry, game, &c. - - 379
Capons or fowls, goose, green goose, duck; recipe for sauce to wild fowls; haunch of venison, hare, rabbit, pheasant; browning 380-383
No. VIII.—Roasting poultry, game, &c. — Partridges, black-cock, moor-game and grouse, wild-ducks, woodcock, pigeons, larks, and other small birds - 418-419
No. IX.—Pickling salt, sweet

PAGE

spice, savoury spice, spices fine, kitchen pepper, flour of mustard, mushroom powder, Cayenne pepper, currie powder - 453-454

No. X.—Farinaceous substances, &c. Baking. Wheaten flour, how prepared for bread, commixtures, produce, &c. Rye flour, barley flour, oatmeal, wheat-starch, common starch, semolina, kisel, rye starch, barley starch, oat starch, Indian arrow-root, potatoe starch, starch from peas and beans, &c., meadow saffron starch, sago, cassava, tapioca, linseed meal, linseed cake, ground linseed cake, almond cake, ground almond cake, lock soy, crust for family pies when butter is dear, prepared hog's-lard, to boil a tongue 518-523

No. XI.—Pickles. To pickle walnuts, onions, saur kraut, peccalilli, samphire, mushrooms, cucumbers, artificial anchovies, salmon; to preserve fish by sugar, to salt hams, to dry-salt beef and pork, to pickle in brine 564-569

Hooper's pills - - 270
Hooping-cough, remedies for - 452
——— Roche's embrocation for - - *ib.*
Hudson's preservative for the teeth and gums - - - 270
Huiles antiques; a la rose, a la tuberose, a la fleur d'orange, au jasmin, a la violette, au mille fleurs - - - 270
Huile de vanille - - 331
——- d'anise - - 329
——- de Venus - - 332
Human passions, short sketch of 11
Hunt's economical breakfast-powder - - - 110
Hunter, John, his letter to Dr. W. Hunter - - 493
——— life, reflections on, &c. - 401
Hydrophobia, history of - 336
——— symptoms of - *ib.*
——— prevention and treatment - - - 337
Hypochondriacs, advice to - 53

PAGE

Indigestion or dyspepsy, history of - - - 298
——— Dr. Gregory's tabular view of primary and secondary, &c. - - - 299
——— treatment of - 300
——— prescription for - 301
Indian remedies - - 86
Industry and economy, rural, of the Chinese - - 559
——— rural, varieties of - *ib.*
——— aquatic improvements - 560
——— mode of culture, not uniform - - - 561
——— cause of the rural economy of the Chinese -
——— royal husbandmen - 563
Infancy, helpless, danger to which exposed, when affected with disease - - - 442
Infants, treatment of, in several parts of America - - 397
Ink, green sympathetic - 136
—— blue ditto - - - *ib.*
—— permanent, for marking linen 414
—— patent, used in the Prerogative Office - - 141
Insect destroyer - - 144
Insects, on the means of destroying, in orchards - - 229
Invalids, advice to - - 53
Ipecacuanha lozenges - - 271
Itch ointment (Bailey's) - 68
—— liniment for, in children - 508

Jackson's bathing spirits - 313
James's powder - - 271
Jelly, currant, making of, apple, strawberry, gooseberry 283-284
—— arrow-root - - 550
Jesuits' drops - - 312

Kidney beans, method of preserving - - - 287
King's evil, touching for - 393
——— origin of 394
——— golden touch - *ib.*
Kisel - - - 520
Kitchen, or cook's syrup - 512
Kitchiner on carving - - 218

Labourers, &c. practical remarks on the diseases of - - 148
Lace, gold and silver to clean -591
Lacquer - - - 138
Ladies, consolation for, at the turn of life - - 35
——— a hint to the, on a certain article of dress - - 87

PAGE

Lamp, to prevent the smoking of - - - 578
Laplanders, physical character, &c. of - - - 371
Lardner's prepared charcoal.—See *Secrets of Trade.* - - 376
Leaf lice, to free plants from - 576
Leather, dressing for, to render it water-proof - - 139
——— gloves, wash for - - 590
Legacy duties - - - 88
Legs, sore, treatment of - 478
Lemons, essential salt of - 112
Lemon pickle - - 386
Life, human, probabilities of the duration - - - 535
Lime, linen bleached with - 316
Linseed meal - - 522
——— cake - - *ib.*
——— powder - - - *ib.*
Linen and wood, means of rendering incombustible - - 317
——— method of vein-marbling and staining - - - 143
Liqueurs - - - 329
LIQUOR OPII SEDATIVUS.—See *Black Drop.* - - 376
Liquors, treatment to counteract the effects of drinking large quantities of - - 123
Liquorice, refined - - 452
——— pectoral balsam of - 68
Liquid, bleaching - - 140
——— boot-top - - 142
Lobster kind, animals of, the natural history - - 551
——— mode of living - 552
——— increase and change - *ib.*
——— casting of the shell - *ib.*
——— varieties of - - 554
Lock soy - - - 522
Long life, Cornaro's secret for - 469
——— elixir of - - 13
Longevity - - - 8
Longing.—See *Ungovernable love.*
Lotion (Gowland's) - - 168
Love, two remedies for - 88
——— cause of - - 405
——— disappointed, suggestion for cure of, &c. - - 412
Lozenges, Tolu - - 515

MACHINES intended to expedite labour, Judge Buller's observations on the utility and benefit to be derived from destroying - 267
Madden's vegetable essence - 376
Mad dog, appearance of a - 337
——— how to cure - - 340

PAGE

Magnesia, Cheltenham.—See *Cheltenham Salts.* - - 376
——— and iron, murio-sulphate of - - - 73
Malt, essence of - - 463
——— liquor, the preference due to, in a cottager's family, (compared with tea) - - 119
MANKIND, influence of the soil and climate on the moral and physical condition of, &c. - 368
Manufactures, recipes in - - 136
Manures, green vegetable - 423
Maps, wash colours for - 140
Marasquin de groseilles - 332
MARGATE, bathing-rooms and machines - - - 252
——— terms of bathing at - *ib.*
——— general sea-bathing infirmary - - - *ib.*
Marmalade, Scotch, making of - 284
Marseilles vinegar - - 68
Marshall's cerate - - 377
Masters and servants - - 183
Materials, raw, astonishing accumulation of value from - 285
Matthews' pills (Starkey's pills) 377
Mead, cowslip - - 292
Meadows, flooding - - 169
Mechanics, &c. practical remarks on the diseases of - - 814
Medicine, aphorisms from the Chinese, respecting - - 22
Memoranda, useful - 183, 268, 475
Mice, powder for destroying - 139
——, to destroy - - - 592
Milk, its general utility and consumption - - 578
——— virgin's - - 547
Mothers and nursery maids, advice to - - - 52
MOVEABLE FEASTS - - 581
Advent Sunday, Ascension Day, Ash Wednesday, Carle, or Care Sunday, Corpus Christi, &c. Easter Day, Easter Monday, Easter Tuesday, Ember days, Ember weeks, Eucharist, Good Friday, Holy Thursday, Palm Sunday, Paschal Sabbath, Passion week, Pentecost, Quinquagesima Sunday, Relick Sunday, Rogation Sunday, Rogation days, Shrove Sunday, Shrove Tuesday, Septuagesima Sunday, Sexagesima Sunday, Trinity Sunday, Whit Sunday, Whit Monday, Whit Tuesday, Whitsuntide, The Vigil or Eve of a

PAGE

Feast, Morrow of a Feast, Octave or Utas of each feast, In the Octaves, the meaning of - - - 581
Mushrooms, cultivation of - 423
Mustard, essence of - 111
——— flour of - - 493
——— Durham - - *ib.*
Mushroom powder - 453
——— cultivation of - 423

Nails, wash to whiten - - 534
Nankin dye - - 140
Night-mare - - 58
Non-pareil water.—See *Eau Sans-pareil.*
Norris's drops - - 377
Noufflers', Madame, vermifuge for tape-worm.—See *Prescriptions*, 362 - - 377
Nursery-maids and mothers, advice to - - 52

Oil of Aniseed.—See *Huile d'Anise.*
Oils, mucilaginous - - 592
Oil of sweet almonds - - *ib.*
—— ground pea - - *ib.*
—— Ben - - - 593
—— Cambellia - - *ib.*
—— hemp - - - *ib.*
—— nettle tree - - *ib.*
—— cornel - - *ib.*
—— common physic-nut - *ib.*
—— nut - - - *ib.*
—— beech mast - - - *ib.*
—— buck-wheat - - *ib.*
—— hemp nettle - - - *ib.*
—— ginko - - - *ib.*
—— sun-flower - - *ib.*
—— walnut - - 594
—— cold drawn lint-seed - *ib.*
—— mace in jars - - *ib.*
——— true, by expression - *ib.*
—— olive - - *ib.*
—— poppy-seeds - - *ib.*
—— stone-pine kernels - *ib.*
—— apricock - - - *ib.*
—— argan - - *ib.*
—— castor - - - *ib.*
—— rape - - - 595
—— gingelly - - - *ib.*
—— sesamum - - *ib.*
—— mustard - - - *ib.*
—— sinapeos - - *ib.*
—— vernicia montana - - *ib.*
—— roses by infusion - - 596
—— camomile - - *ib.*
—— white lilies - - - *ib.*
—— earth worms , - *ib.*

PAGE

Oil of elder-flowers - - 595
—— Exeter - - - *ib.*
—— mucilages - - *ib.*
—— green - - - *ib.*
—— scorpions - - 597
—— camphorated - - *ib.*
—— spike - - *ib.*
—— mixed - - - - *ib.*
—— tooth-ach - - - *ib.*
—— drying - - - 598
Ointment, heel - - 139
Ointment, spermaceti - 505
——— itch - *ib.*
——— white precipitate - *ib.*
——— red precipitate - *ib.*
Opodeldoc (Steers') - 513
Orcharding, observations relative to - - 225
Orchards, on the means of destroying insects in - 229
Organic defects - - 472
Ostiak Kozaks, custom of the - 367
Otto of roses - - 315
Ox-gall, refined - - 142
Oxley's concentrated essence of Jamaica ginger - - 377

Paine, Tom, on yellow fever - 158
Palsy, mercurial, mode of attack, and symptoms of - - 152
Paper, method of vein-marbling, and staining - - 143
Pastilles, fumigating - *ib.*
Patent medicines.—See *Secrets of Trade.*
Paté arsenicale - (See p. 112) 378
Pearl powder - - 417
Pease, Appert's method of preserving - - 289
Pectoral drops (Bateman's) - 69
Peppermint, essence of - 111
Pepper, kitchen - - 453
——— Cayenne - - 454
Pepy's Memoirs, extract from - 412
Perfect love. See *Parfait Amour.*
Perfumes.—See *Toilette.*
Perspiration, to moderate - 534
Peter's pills - - 414
Physic, temperance the best 569
Physical Character, &c. of the Greenlander, Laplander, Samoide, Tungooses, Tartars, Cashmirians, Hindoos, Greeks 370-375
Physical education of children, lectures on - - 395
Physicians, Chinese - 21
Pickles and Pickling - 564
——— walnuts - *ib.*
——— onions, saur kraut - 565

PAGE

Pickles, peccalilli, Indian method, samphire - - 566
——— mushrooms - *ib.*
——— cucumbers - - 567
——— artificial anchovies, salmon - - 568
——— in brine - - 569
Pickling - - 453
Pies, family, crust for, when butter is dear - - 522
Piles, treatment of; laxative medicine for; lotion for; emollient ointment - - 482
—— falling down of fundament, in - - - 483
Pills, bilious, head-ach, opening 202
—— female, gout - 267
—— rhubarb, Hooper's, tonic, worm, rheumatic - 506
—— in asthma - - 509
—— dinner, Dixon's anti-bilious 109
—— Matthews' - 377
—— cathartic - - 447
—— opening - - *ib.*
—— anti-bilious - - 101
—— Lady Crespigny's, dinner, &c. 74
—— Chamberlain's restorative, for scrofula - - 71
—— Fothergill's - - 112
—— analeptic (James's) - 312
—— Keyser's (anti-venereal) - 376
—— worm laxative - 56
—— stomachic - - 15
—— anti-bilious (Barclay's) - 69
——— (Starkey's) - 513
Pink dye - - - 140
Plant, a valuable one - - 426
Plantations, to prevent rabbits and hares from barking - 176
Plate powder - - 139
Plunket's ointment for cancers 415
Poisons:—opium, corrosive sublimate, arsenic - 557
——— verdegris, oxalic acid 558
Poisoning, singular case of - 420
Poor settlement - - 168
—— and sick, cookery for - - 548
Pork and beef, to dry salt - 563
—— jelly, restorative, Dr. Radcliffe's - - 550
Portland's, Duke of, powder - 414
Potatoes, method of increasing 135
Pots, porter, and pewter - 184
Poultry, to roast - 418
Powder, expectorating - 508
——— antacid - - *ib.*
——— cathartic - - 447
——— perfumed, for scented boxes - - 417

PAGE

Powder, silver boiling, plate, for destroying mice - 139
——— laxative, active purgative - - 202
Prejudice, the effects of - 504
Prescriptions: — For laxative powder, active purgative powder, bilious head-ach, opening pills - - 202
——— female pills; gout; Sir Edward Wilmot's prescription for the gout; Dr. Hartley's for the same; cataplasm in gout; to prevent costiveness in gout; powder of the extract of monks-hood - - 267
——— indigestion, to restore the tone of the stomach; nervous head-ach; cooling purgative - - 301
——— solvent drops, in gravel and stone; Madame Noufflers' remedy for the tape-worm; cowhage electuary; camphorated enima, or clyster; acute rheumatism - 362-363
——— electuary of tin, for worms; worm-pills; clyster for ascarides, in maw-worms; worm-powder; electuary for the piles; stomachic pills; cathartic powder; cathartic bolus, in dropsy of the legs, &c.; opening pills - - 446-447
——— spermaceti ointment; itch ointment; Turner's cerate; red lip-salve; white lip-salve; white precipitate ointment; red precipitate ointment: red precipitate; cephalic plaster; Major Cochrane's cough drops; rhubarb pills; Hooper's pills, tonic pills, worm pills; cephalic snuff; Earl of Warwick's powder; embrocation for rheumatism; eye-salve; humid cough in old people; heart-burn; for colic in old people; rheumatic pills; for the ague; mixture for a common cough; chilblains; a liniment for the itch in children; tooth-ach; for bilious head-ach; diuretic pills; for the thrush in children; expectorating powder; antacid powder; expectorating pills in asthma; to recover a lost voice; for the colic; to give ease in colic 505-509
Preserving health, Chinese art of 20

PAGE

Present age, obsservations on supposed degeneracy of - - 398
Purgative, cooling - 301

QUACK MEDICINES.—See *Secrets of Trade.*
Quackery, health, &c. - 15
Quin's sauce - - 386

RABBITS, cause of eating their young - - 466
Radcliffe's purging elixir - 415
RAMSGATE, bathing at - 253
Ratafia of Angelica; aniseed; coffee; orange-peel; provincial; violets; kernels - 321
——— of young walnuts; juniper berries; quinces; strawberries; chocolate; Grenoble; cherries; cassis; orange-flowers; à la violette; balsam of Tolu - - - 330
Rats, to destroy - - 592
Razors, for sharpening - 145
RECIPES, DOMESTIC - - 438
——— miscellaneous, in domestic economy, manufactures, and the arts, &c. - - 136
Remedies, Indian - 86
Restorative, process - 469
Rheumatism, embrocation for - 506
——— and gout - 101
——— anti-bilious pills - 101
——— and dropsy, prescriptions in - - 101
——— prescriptions in acute 101
——— Norwegian remedy for 454
——— famous American recipe for - - 523
Rhubarb combined with cream of tartar, an account of the virtues of - - 285
Ring-worms - - 341
Roasting poultry, game, &c. 418-419
Rob antisyphilitique - 452
Roman polish - - 138
Rooms, heated; caution against sitting near doors or windows in 19
Rose pearls - - 378
Roses, honey of - - 283
Rouge - - 417
Royal preventive - - 452
RURAL ECONOMY.
N°. I.—Method of increasing potatoes - - 135
No. II.—On flooding meadows 169
Preservation of game - 169
Animal substances in agriculture - - 170

PAGE

Directions for preserving the buds of fruit-trees for conveyance - - 171
Observations on eggs, and the fecundity of hens - 172
Virtues of the potatoe - 173
Means to destroy the turnip-fly, or beetle - 173
Rules for the collection and payment of tithes - 175
Method to prevent hares and rabbits barking young plantations - - 176
Method of preserving seeds when sown, from vermin 177
No. III.—Communications relative to orcharding - 225
On the means of destroying insects in orchards - 229
No. IV.—Best method of haymaking; to take the honey of bees, without destroying them - 325-326
To prevent sheep from catching cold after being shorn; to destroy maggots in sheep; how in every year to procure plenty of new-laid eggs at Christmas; the frog a destroyer of caterpillars - 325-327
No. V.—On cultivating mushrooms; of green vegetable manures; valuable plant; directions for making a composition for curing diseases, defects, and injuries, in all kinds of fruit and forest trees, and the method of preparing the trees, and laying on the composition - 423-426
No. VI.—Instructions for cultivating and curing tobacco in England - - 524
No. VII.—The rural industry and economy of the Chinese, proposed as an example to all the other nations of the universe - - 559
Rural varieties of China, &c. 559
Aquatic improvements - 560
Mode of culture not uniform, &c.: causes of the rural economy of the Chinese, &c. - - 561
Royal husbandmen, &c. - 562
Recipe, a humorous one, for a physician - - 465

PAGE

Sago - - 522
Salts, Cheltenham - - 72
——— efflorescence of real Cheltenham - - 73
Salves:—red lip, white, Turner's cerate, Singleton's eye - 506
Samoides, physical character, &c. of - - 371
Sandgate, bathing at - 254
Sauce, Quin's - - 386
Savings bank, produce of - 94
Saxon blue - - 140
Scarborough, bathing, warm baths, the spa, its situation, properties, &c. - - 307
——— the chalybeate magnesia spa - - - 73
Scott's liquid blue - - 140
Scouring drops - - 511
Scurvy-grass, golden spirit of - 168
Sea-bathing, and sea-air.—See *Bathing, cold, in cutaneous diseases*, &c. - - 297
Seal engravers' cement - 152
Sedative liquor of opium, Battley's - - 69
Seeds, method of preserving from vermin, when sown - 177
Seidlitz patent powders - 511
Selway's prepared essence of mustard - - 111
Semolina - - 520
Senna, prepared essence of (Selway's) - - - 51
——— prepared essence of - 111
Servants, laws respecting 585-588
Sheep, to prevent catching cold after being shorn - 326
——— to destroy maggots in - *ib.*
Shoulder of mutton, bakers' way of growing one - 324
Sight, general rules for the preservation of the; the use of spectacles, &c. - 163
——— optical remarks, illustrative, and experimental remedy, and directions to short-sighted people - - 166
Signs, diagnostic, preceding or accompanying diseases - 45
Signs of good bodily health - 20
Silk, method of vein-marbling and staining - - 143
Silver boiling powder - 139
Singleton's eye-salve - 511
Skin, diseases of - - 295
——— sympathy between stomach, bowels, liver, &c. - 296
Sleep, general rules regarding - 97

PAGE

Sleep, remarks on posture during 56
——— causes which prevent - 57
——— means of procuring - 59
Sleep-walking - - 59
———, Chinese method of promoting - - 60
——— Dr. Adair's suggestions to induce - - *ib.*
——— Dr. Franklin's rules for sleeping well, and having pleasant dreams - - 61
——— Dr. Buchan on the means of procuring; directions to remedy cold feet in bed, &c. - *ib.*
Small-pox, and vaccination - 87
Smellome's ointment for the eyes 512
Smells, bad, to correct - - 592
Soap, economy and safety in making - - 324
——— transparent - 546
Sodaic powders.—See *Cheltenham Salts.* - - - 512
Somnambulism - - 59
Soy - - - 386
Speediman's pills - - 513
Spice, sweet, savoury, fine - 453
Sprain, Dr. Lobb's method of curing one - - 579
——— of the ancle - - *ib.*
Spruce, essence of - - 463
——— beer, the process for making - - - 274
Squire's elixir - - 513
Stains, to take out of scarlet - 590
——————— black cloth, silk, crape, &c. - - *ib.*
Starch, wheat, common, rye - 520
——— barley, oat, potatoe, from peas and beans, meadow saffron 521
Starkey's pills - - 513
Steers' opodeldoc - - 377
Sterrey's plaster - - 513
Stomach pills - - 15
——— to restore the tone of - 301
Stone, remedy for (Stephens's) - 513
Stoppers, glass, to loosen - 590
Stroughton's elixir - - 515
Struve's lotion for the hooping-cough - - - 515
Style, how to do things in - 294
Sugar, history of, in early times - 428
Summer bathing - - 247
Surgical operations on children - 499
Sweet balls - - 378
Symptoms, diagnostic signs, preceding or accompanying diseases - - - 45
Syrup, Velno's vegetable - 546

PAGE

TAPIOCA - - - 522
Tartars, physical character, &c. of - - - 372
Taylor's remedy for deafness - 515
Taxes, list of - - 185
——— assessed - - 186
Tea, observations on, directions for choosing it, and distinguishing the good from the indifferent, &c.; detections of adulterations, &c. - - 23
—— division of, in Great Britain 24
—— adulterations in, method of detecting - - 25
—— the manner in which the Tartars, Japanese, and Chinese, prepare their - - 26
—— on the cost of, and the preference due to malt liquor in a cottager's family - - 119
—— at 5*s.* to render it equal to tea at 12*s.* - - - 223
Teeth, Greenough's tincture for the 210
——— practical remarks on the preservation of - - 421
——— operation of brushing the 422
——— and gums, wash for - 464
——————— Hudson's preservative for the - - 270
Thieves' vinegar - - 68
Thompson's Cheltenham salts - 72
Throat, sore, a miraculous cure of one - - - 516
Thrush, in children - - 508
Tincture, syphilitica - - 546
——— Ruspini's for the teeth 511
——— cardiac (Rymer's) - *ib.*
——— marine, imperial aromatic, against sea-sickness, &c. 577
Tithes, rule for the collection and payment of - - 175
Toad, economy of - - 313
Tobacco, herb, British - 438
——— instructions for cultivating and curing in England; soil, seed, time to sow - 524
——— directions after the plants appear; time of topping - 525
——— to destroy the worm - 526
——— uncertainty of ripening; worm, description of - *ib.*
——— directions for gathering, and after management - 528
——— second or last sweating 529
——— observations - 550
TOILETTE, the, 272, 273, 315, 378, 417, 464, 465, 534
Tomatoe sauce - - 386
Tonics, their use in children - 495

PAGE

Tongue, directions to boil one - 523
Tooth-ach, embrocation - 15
——— remedy for - - 452
——— powder - - 378
TRADE, SECRETS OF, or ANALYTICAL HISTORY of all PATENT MEDICINES, COSMETICS, and other QUACK NOSTRA, shewing their various ingredients, proportions, medicinal properties, doses, &c. with proper cautions, &c. 66, 109, 167, 210, 270, 312, 313, 376, 378, 414, 416, 453, 518, 523, 546, 548
TRADESMEN, MECHANICS, LABOURERS, &c., practical - - 148
——— remarks on the diseases of - - - - 211
——— method of stopping blood in consequence of a wound; dressing of wounds - - 213
TUNBRIDGE WELLS, virtues and qualities - - - 255
Tungooses, physical character, &c. of - - - 372
Turner's cerate.—See *Salves.*
Turnip fly, means to destroy - 173

ULCERS or ulcerated sores - 478
——— various kinds of; treatment of - - - *ib.*
Ungovernable love - - 404
Urine d'elephant.—See *Elephant's Milk.* - - - 331
Useful establishment, outlines of an - - - - - 62
Usquebaugh.—See *Escuba.*

VACCINATION - - 417
——————— and small-pox - 87
Valetudinarians, advice to - 53
Vanilla oil.—See *Huile de Vanille.*
Vapour, mercurial, effects of exposure to - - - - 152
Varnish, transparent, white, white hard, transparent copal, white polishing, French polish - 137
——— Roman polish, soft brilliant, lacquer, red - - 138
——— common - - 137
——— furniture - - 598
——— picture - - *ib.*
——— gold, for leather - *ib.*
Vegetable balsam (Godbold's) - 167
Vegetables, directions for cooking and preparing for the table - 128
Vein-marbling, and staining silk, linen, cotton, paper, &c. method of - - - 143

PAGE

Venomous reptiles, bite of, how cured - - - 509
Vervain, the herb, botanical description of - - 391
——— former reputation, &c. - *ib.*
——— Morley's directions, &c. 392
Vestries - - - 179
Vinegars, Acid Liquors, &c. - 384
——— distilled - - 385
——— of wood (pyroligneous acid) - - - *ib.*
Vitriol, essence of; elixir of - 111
——— how to improve - - 534
——— lost, to recover - - 509
Voice, falsetto - - - 471

Wade's drops - - 112
Wagers, the law of - - 383
Ward's essence for the head-ach 547
——— paste for fistula and piles *ib.*
——— white drops - - 458
Warner's sweating-powder - 548
——— cordial - - *ib.*
Warts, treatment of - - 476
Warwick's, Earl of, powder - 506
Wash-balls, odoriferous - 417
Wash for strengthening teeth and gums - - - 414
——— colours, for maps or writing 140
——— balls, white - - 464
Water, directions for purifying, &c. - - - 589
Waters, distilled, directions for making, &c. 243, 244, 245 & 286
Wealth, the way to - - 203
Wearing apparel, directions for the regulation of, &c. - 3
Weather, foul, prognostics of - 131
——— influence of - 1
Weight, avoirdupoise - - 588
——— apothecaries' - - *ib.*
Wens, curious instances of - 363
Whitehead's essence of mustard - 111
Will, ancient, a curious - 42
—— another curious - 44
Wills, on the propriety of making a 102
——, different species of - *ib.*
——, consequence of unjust or whimsical - - *ib.*
Wills, knowledge of making a - 103

PAGE

Wills, the folly of delaying to make a - - 104
——, preventive cause to will-making - - - 105
——, if not to be deferred, when ought to be made - 106
——, consequences of neglecting to make a - - *ib.*
—— ought to be written clearly and distinctly - - 108
Windows or doors, caution against sitting near, in heated rooms, &c. - - - 19
Wine Cellar:—Management of French wines, and choice of a cellar - - - 570
—— Methods to remedy defects of cellars - - 571
—— fining of wines - 572
—— management of French wine in wood - - 573
—— bottling French wines - 574
—— choice of corks - 575
—— tests - - 385
Wines; some rare and seasonable recipes for making genuine family, currant wine, black currant, cowslip, mead, cherry, elder, white elder, French, mixed fruit, grape, gooseberry, ginger - - 291, 293
Wood and linen, means of rendering incombustible - - 317
Women, hysterical, a draught for 101
Worm lozenges (Ching's) - 73
——— cakes (Storey's) - 515
Worms, electuary for; pills for; clysters; powders - 446-447
Wormwood, spirit of - - 403
Wounds, method of stopping blood in consequence of - - 213
——— dressing of - - *ib.*
Writings, wash colours for - 140

Yeast, artificial - - 151
Yellow Fever, "Tom" Paine on the - - - 158
——— plagiarism of Dr. Miller of New York, and others *ib.*

Finis.

B. M'Millan, Printer,
Bow Street, Covent Garden

