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EDITORIAL

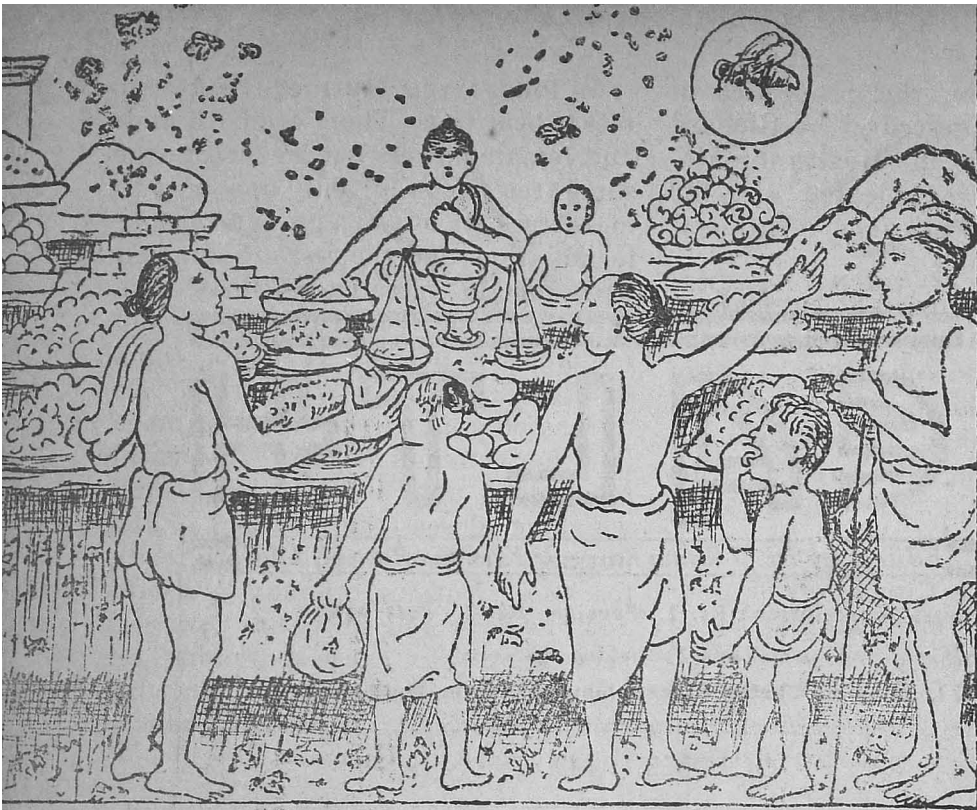
Spices and Condiments

FOR centuries past, people of all races and of all climes have been, and a good many still are, consuming spices, condiments and other hot-tasting foods that tickle their palates, and it is, therefore, worthwhile to examine their food values and find out how far they contribute to the health and happiness of human beings. The spices, generally in use, are cloves, cinnamon, ginger, nutmeg, peppermint etc. It will be interesting to know the early history of the world's spice trade, as, in an effort to obtain spices and capture the spice trade, torrents of blood were shed. In Europe, in the middle ages, faith cure came to be supplanted by the drug cure. The drugs then used were mostly the 'bitter pills or potions', which were thrust down the throats of unwilling patients by unscrupulous quacks. The European taste did not demand aloes, opium, pepper, sandalwood, Persian rhubarb and camphor for its table. The spices that were

sought were used more in medicines than in condiments. From the 9th to the 15th century, the spice trade was largely controlled by the Venetian Republic. Then the Portuguese entered into this trade. The fall of Constantinople in 1453 disrupted the Eastern trade and the price of these spices rose to such a height that the Portuguese and the Spaniards conjointly took up the trade. The Portuguese led by Vasco-de-Gama doubled the Cape and sailed into Calicut. The Venetian supremacy was thus ended. For the next 100 years, Portugal was the centre of the spice trade. Like Vasco-de-Gama, Columbus sought to find a direct route to India and instead landed in America. In the 17th century, the Dutch superseded the Portuguese and the Sunda Islands formed a fertile field for the spice trade. The Dutch, in turn, were displaced by the English, the French coming in also at the same time for a fair share of the fight for the spice

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[HEALTH



A Sweetmeat Bazaar wherein spiced sweets are exposed for sale on which swarms of flies sit and deposit disease germs—a real danger to the health of human beings.

as fruits, vegetable and animal foods. This is the primary use and their property of flavouring is only a secondary consideration. In India, spices are used as stimulants along with pan-chewing and in the preparation of sweetmeats and sweet

trade. To-day, England holds almost the undisputed and unrivalled control of the spice trade. Thus, for the sake of the apparently innocent clove, many a strange land was discovered and many a gruesome war was waged, within the past 500 years.

Now, are these spices *foods* in the real sense of the word? That they are not, needs no emphasis. One can hardly term them foods, though many contain valuable mineral salts and medicinal properties. They are, at best, only adjuncts to the finer art of cooking. It is contended by some that a heavily spiced food would induce perspiration and so, keep the body cool. It is only a half-truth. These spices are products of the tropics and in a tropical climate, when the hot sun is enough to keep the bodies freely perspiring, no hot spices are needed to cool them. The first reason why spices and condiments are used extensively in hot climates is because they have the power of preserving food, which would otherwise quickly deteriorate and go bad, such

drinks. "Continued and excessive use of these stimulants is undoubtedly bad as statistics of countries where they are used a great deal, can prove. When wisely indulged, they can rouse a flagging appetite, excite gastric secretion and stimulate a torpid bowel, though at the best of times, this indulgence may only be considered like the use of crutches. Taken unwisely, condiments and spices are liable to cause catarrh of the mucous lining throughout the entire alimentary and respiratory tract together with congestion of the liver through hyperaemia and severe irritation of the kidneys. Besides this, they are often said to be aphrodisiac and there are many legends existing which relate to the secret charms that are attributable to some spices and herbs. In any case, there is no doubt that, when used in conjunction with other stimulating foods such as alcohol, sugar and flesh foods, they have a deteriorating effect on the cultural and finer sensibilities of man."

We give below the properties of those spices, as described by Richard F. Miller M.N.C.A., in "Health for All" to whom we are indebted also for some of the observations mentioned above :

Cloves are the dried flower buds of an evergreen that grows in the tropics. Even the Greeks and Romans were familiar with this fragrant smelling spice. Cloves have quite a decided action in stopping pain, and, in some parts of the world, are considered a remedy for tuberculosis.

We usually see **Cinnamon** in powdered form, but one can buy it in "stick" form, which is the manner in which it grows. It is the inner bark of a tree and has valuable medicinal properties. It is a powerful astringent and acts as an antiseptic. In addition to essential oils, it contains sugar, gum and tannin.

Ginger is obtained from the roots of a bush of that name. Large quantities are shipped from China, though a great deal grows in Jamaica and the Indies. When the seeds have formed, the roots are dug up and trimmed. They are then washed and scalded to prevent germination and afterwards dried. Ginger is a stimulant.

In foliage, the **Nutmeg** tree resembles a pear tree. There are both male and female flowers but never on the same tree. Usually, only one or two male trees are left in a grove to ensure fecundation, and the rest are grafted with female cuttings, as these give the best fruit. The fruit is small and resembles a peach. It has a thick external covering. When ripe, this opens and exposes the arillus or mace (another common spice) of a beautiful red colour and a thin, hard shell which encloses the nutmeg. The nutmegs are then dried and are ready for use. Nutmeg, though a useful and fine-flavoured spice, has however, been known to cause poisoning on account of a substance it contains called mysticin. Mace also has a slightly narcotic effect.

Peppermint, though not usually considered a spice, but rather a herb, has a similar action as the spice on account of its characteristic oil. It is antiseptic, sedative to the stomach and stimulative to the intestines. It increases the flow of bile, and in colds is useful to relieve pain in the frontal sinuses.

We shall deal with condiments separately in the next issue.

The Quality of Ghee Studies at Dairy Institute

Experiments which make it possible to determine the quality of ghee, and to distinguish genuine ghee from adulterated mixtures or pure substitutes have lately been completed at the Imperial Dairy Institute. Because of the modern methods of hydrogenation and oil fat refining, the solidity, grain structure, colour, taste and aroma do not nowadays completely guarantee the purity of any sample. The only other alternative is to depend upon what are called the physical and chemical constants of ghee such as its Reichert value, Iodine value, etc., which though variable, ordinarily lie within certain limits, depending chiefly on the feed and breed of the cattle. Reichert value indicates the extent to which volatile water soluble acids are present while Iodine value gives the percentage of Iodine with which the unsaturated acids of fat can combine.

The results show that groundnut, linseed, gingili cake and cotton seed increase the Iodine value and decrease the Reichert value while cocoanut cake decreases the former without any appreciable effect on the latter. Oil cakes on the whole bring down the carotene and vitamin A contents of the butterfat, which constitute its nutritive value, while foods rich in carbohydrates increase them.—*The Bengal Public Health Journal*.

of so many yards. Just as length is measured in terms of yards, fluids in ounces, temperature in degrees, so too, heat is measured in terms of calories—a term very annoying to the laity. If, however, the true idea of calorie is once obtained, *viz.*, that it is only a measure to express the amount of heat so that some definite idea may be conveyed by one person to another, the term ceases to be a bugbear. This standard measure of reference indicates the amount of heat that is required to raise the temperature of one seer (2.2 lbs.) of water by one degree centigrade. It is generally agreed that on an average, an adult needs 2600 to 3500 such calories per day. It needs no strenuous thinking to realise that calories required will depend on the size and the work of the machine *i.e.*, age, sex, height, weight and work. The old mother who keeps an extra ounce of butter for her son after a hard day's labour instinctively obeys the simple laws of nutrition. It is easy to understand that a son aged 7 years would need half the food of his father, the wife with home comforts needs 1/5 less than her hard-working husband.

Having thus worked out the total requirements of an individual in correct scientific terms, it may now be possible to state as to how these can be distributed. One cannot live on bread alone or pulses alone, excess or deficiency of any one of these articles is likely to lead to defective feeding.

Common Food Stuff.—For all practical purposes, daily articles of diet available in bazar are :

1. Milk, curds, butter-milk, whey.
2. Eggs, meat, fish, poultry.
3. Wheat, cereals, beans, peas, pulses.
4. Ghee, butter, oil and fatty foods.
5. Sugar, jaggery, honey.
6. Potatoes and root vegetables.
7. Tomatoes, citrus fruits like lemons, oranges.

8. Leafy green vegetables, yellow vegetables.

9. Fresh fruits.

10. Dried fruits and nuts.

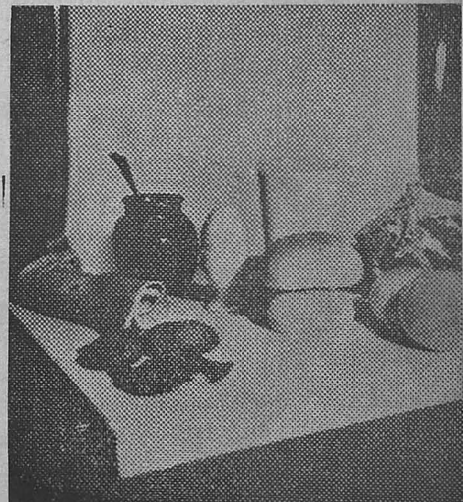
Some of these contribute to the building of the body *viz.*, eggs, meat, pulses; others provide energy like fats, sugars and still others protect the body from disease like green vegetables, fruits and milk. Thus they are either:

(a) Body builders or (b) Energy producers or (c) Body protectors.

Body Builders.—Factors that build body are called "Proteins". This term is derived from the Greek word 'protos' meaning 'first'. Articles rich in body builders (proteins) are milk, cheese, eggs, fish, wheat flour (particularly outer layer of wheat) and pulses. Wheat eating races have better build of body than those who consume rice. An adult needs 90-100 grams of body builders (proteins). If too much of protein, is taken, they remain undigested, producing obnoxious gases and poisons, giving rise to fatigue, pain and loss of appetite. If, conversely too little of this is taken, a person may remain poor in health, as proteins provide body-building materials.

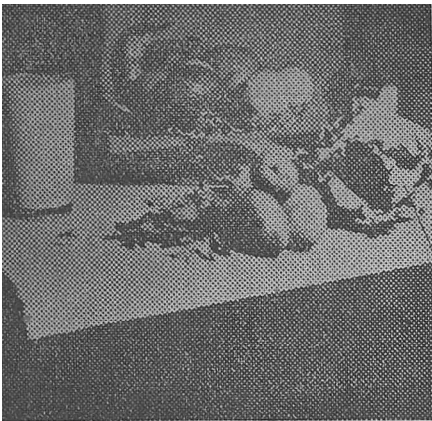
Energy Producers.—Those that supply energy are fats, sugars and starches. About 80 to 90 grams of

fats are consumed daily. An ounce of butter, an ounce of ghee and 20 ounces of milk, these supply all fat requirements. Rest of the energy producing



VITAMIN B

Yeast; Tomatoes; Leafy Vegetables;
Whole Grain Cereal; Bajri. Dhal; Milk;
Egg, Liver, Brain; Heart, Kidneys.



VITAMIN C

Oranges ; Lemons ; Tomatoes ; Fresh Fruits ; Raw Carrots ; Green Leafy Vegetables ; Sprouted Grain ; Milk ; Curds ; Potatoes.

calories are to be derived from sugar and starches. About 400 grams of sugars and starches (carbohydrates) are required for an average adult.

Excess of fat causes indigestion: any increase of sugars and starches sets up diarrhoea, producing foul gases and irritating acids. Deficiency of sugars and starches is also harmful ; because fats burn in the fire of sugar and starches. If there is shortage of fuel, it will be drawn upon from the body itself, which naturally then decays.

Body Protectors.—These protect body by their mineral and vitamin contents. Minerals prevent blood from becoming sour. If blood becomes a little acid, one feels sick. Some minerals like calcium, help in forming strong teeth and bones, others containing iron, help in the formation of blood.

Milk, curds, cheese, butter-milk, whey, egg yolk, dhals, nuts, leafy vegetables and fruits are rich in calcium. Liver, red meat, eggs, dhal, whole wheat, bajri, leafy vegetables and fruits contain iron. Milk, curds, buttermilk, eggs, meat, fish, beans, lentils, nuts, wheat, leafy vegetables, radish, bajri, carrots and cucumbers contain phosphorus ; and sea fish and green vegetables, iodine.

Vitamins.—Vitamins are the greatest body-protectors. 'Vita' means life and surely, life is not worth living without vitamins. Numerous diseases

like night-blindness, bleeding-gums, decaying-teeth, bow-legs, knock-knees, constipation, general debility and even some nervous disorders are due to eating food deficient in vitamins. On account of the ignorance about the exact composition of vitamins, to distinguish one from the other, they were called by the mystic names of A, B, C, D, E, F, G, K. Surely, there are more vitamins than many times A to Z. New composition is being found out, and it is hoped that soon, they will be called by some definite names. Fat, oils from fish, liver, kidney, egg yolk, milk, butter, ghee, green leafy vegetables, sprouted grain grown in sun light, yellow root vegetables, are rich in vitamins A and D. Yeast, tomatoes, leafy vegetables, whole cereals, bajri, dhal, milk, liver, brain, heart, kidneys, eggs are rich in vitamin B, oranges, lemons, tomatoes, fruits, raw carrots, milk food, fresh leafy vegetables are rich in vitamin C and whole bread, seeds, vegetables, egg yolk and meat are rich in vitamin E.

Nature offers all vitamins in fresh and potent form in the food it produces but human ingenuity destroys their efficiency by unduly interfering with them. Just as high heels, pointed toes, tight corsets cause so many aches and pains, so do the faulty ways of cooking, tinning and preserving food stuffs.

Vitamin Crazy.—Here, I must add a word of caution. Lately, a group of people have arisen who are vitamin-crazy. They take glassfuls of fruit juices, several courses of green leafy vegetables and forego butter, bread meat and fish. They should remember that body cannot be built or maintained by fruit juices alone, life cannot subsist without body-building materials. As a matter of fact, in an adequate mixed diet, all the minerals and vitamin requirements are automatically satisfied, and one need not unnecessarily bother about vitamins.

Daily Menu.—Having known that 3000 calories are required for an average adult or thereabout and having realised that it has to be divided into body building, energy producing and body protecting food stuffs it is easy to draw out an adequate diet provided a food table with their food values (caloric, mineral, and vitamin contents) is before us. It is customary to describe a standard ideal diet, but in actual practice, menu depends on the pocket of the family. It does not imply that the ideals or appetites of the rich and poor differ; but it only means that so long as purses are not equalised, the menus suggested should be such as to meet the income of the particular individual.

The Well-to-do.—The well-to-do can divide the following into four meals:—

1. Milk or milk products:— 20 ounces or two glassfulls daily for adults.

2. Cheese: 1 ounce daily ($\frac{1}{2}$ chatak). (Cheese is not relished by many in India, but the freshly prepared, as by the Kashmere or the Bengalee is very delicious.)

3. Eggs: four to six a week.

4. Meat, Fish, Poultry: 2 ounces daily (1 chatak). If cheese is not taken, 4 ounces daily (2 chataks).

5. Butter, Ghee: 3 ounces or $1\frac{1}{2}$ chataks (at least 1 ounce should be Butter).

6. Vegetables: Six to seven servings daily.

7. Fruits: Nine to ten servings daily.

8. Bread, Cereals, Pulse: whole wheat flour: 12 ounces (6 chataks). Rice, hand-pounded: 6 ounces (3 chataks) Pulses: 1 ounce ($\frac{1}{2}$ chatak) If meat is not taken, whole wheat 15 ounces ($7\frac{1}{2}$ chataks); pulses: 3 ounces ($1\frac{1}{2}$ chataks).

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The Middle Class.

—People with moderate income have to take less eggs (2 to 3 eggs a week), less meat (five times a week), cheaper type of fat (Ghee

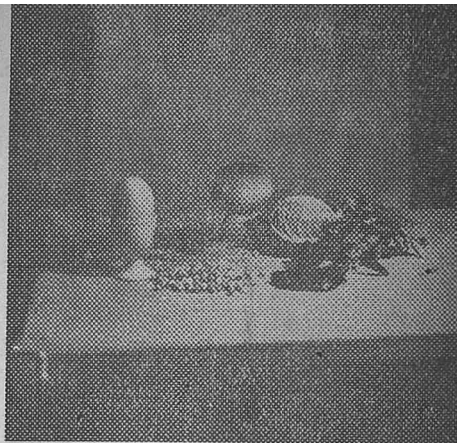
and oil), less vegetables (four servings daily) and less fruits (3 times weekly) than the well-to-do.

The Poor.—The greatest difficulty arises with low income group which unhappily is the largest of all groups, a group which cannot even dream of milk, cheese, butter eggs, meat and fruits. The knowledge that skimmed milk or buttermilk is more or less as nourishing as the whole milk, that potatoes supply suitable proteins in addition to starch and that germinated black gram is a useful supplement to the dietary, gives hope to draw out a cheaper dietary than the above ones.

The cheapest possible diet satisfying dietetic requirements can be as follows:

Non-Vegetarian :

	Chataks.	Ounces.
Whole wheat flour (or cheapest cereal)	... 4	or 8
Rice, hand-pounded	... 3	„ 6
Dhal	... 1	„ 2
Meat (edible)	... 2	„ 4
Potatoes	... 2	„ 4
Green vegetables	... 3	„ 6
Germinated gram	... $\frac{1}{2}$	„ 1
Oil, Ghee or Butter (at least one ounce should be butter or ghee)	... 1	„ 2



VITAMIN E

Whole Bread ; Seeds ; Vegetables ; Egg
Yolk ; Muscle Meat ;

	Chatakas	Ounces.
Butter-milk	... 5	,, 10
(It is presumed that creameries exist and butter-milk is available in market)		
Jaggery	... 1	2
Condiments	... $\frac{1}{4}$	$\frac{1}{2}$
Salt	... $\frac{1}{4}$	$\frac{1}{2}$

Vegetarian.—If meat is not taken, quantity of dhal should be increased by $\frac{1}{2}$ chatak (1 ounce), wheat flour by 1 chatak (2 ounces) and rice by $\frac{1}{2}$ chatak (1 ounce).

Even this diet costs as much as rupees five or six per month. Therefore, with all his scientific and sincere sermonising, a nutrition worker has to keep mum when he is confronted with a mass of humanity suffering from unspeakable misery unable to spend even Rs 5/- per month on diet. A nutrition worker cannot drive his solitary plough. He has to seek the co-operation and help of the economist,

agriculturist, educationist and the State, and unless all of them join hands, the lot of the poor is irremediably doomed.

There is no space to discuss the various aspects of the problem of nutrition, festivals and diet in India, methods of cooking and special diets for mothers, children and the aged. Hence, I hasten to close this note by repeating the advice from Regimen Sanitatis referred to, at the very outset.

“Drink not much wine,
 sup light and soon arise
 When meat is gone long
 sitting breadth smart
 And after-noon still
 waking keep your eyes,
 When moved, you find yourself
 to natures needs,
 Forbear them not for that
 much danger breeds,
 Use three physicians
 first Doctor Quiet
 Next Doctor Merry-Man
 and Doctor Diet.”

Literature :

*Dr. Raina B. L.—(1940) “Health and How to Keep It.”
 New Book Co. Hornby Road, Bombay.*

The Japanese Health Commandments

According to the *Fiji Shimpō*, a Nipponese publication, the ancient Japanese commandments as to health and longevity may be summed up in the following manner:—

1. Spend as much time as possible in the open air.
2. Never eat meat more than once a day.
3. Take a very hot bath daily.
4. Wear rough warm clothes.
5. Early to bed and early to rise.
6. Sleep at least six hours each night and at most, seven and a half, in a dark room with open windows.
7. Rest on the seventh day and during that day, do not read or write.
8. Avoid every expression of anger: never exercise the brain too much or too long.
9. Marry early, widows and widowers should remarry as soon as possible.
10. Drink coffee and tea in strictest moderation: do not smoke at all; and never touch alcohol in any form.
11. Avoid hot rooms, and, indeed, all rooms heated artificially.
12. In order to strengthen such organs as may be weakened by age or use, nourish yourself on the corresponding organs of animal.—(*Medico-Surgical Suggestions.*)

MODERN SCIENCE AND HINDU SASTRAS

THE ancient Hindu *sastrakar*s knew more about the modern germ theory. This very knowledge is seen in the rules laid down by them for conduct in the daily life of the Hindus. The Hindu was prohibited from drinking indiscriminately any water. Why? Some water was classified as polluted. By polluted water they meant what modern science terms "germ-laden" or impure or non-potable water. The Hindus were prohibited from washing clothes or their bodies in tanks and wells from which drinking water was brought. But water from flowing rivers was allowed for drinking purpose. Bathing was also allowed in flowing rivers. The germ theory does not apply there. The flow destroys the germs or the germs are washed away by the current; they are not allowed to spread. The layer of water was always pure. There too the upper layer of water was not allowed to be drunk. Latest investigations show that the under layer of water of rivers which have sufficient flow is free from impurities.

The Hindu was ordained to wash his hands and feet and face, after going out and before entering the house. The reason is obvious. In those days foot-wear was not so common. Only the rich and others used foot-wear. On the road many germs accumulate. These will stick to the feet. And if not washed clean, disease will spread. Modern science proves hook-worm, tetanus, guinea worm, and other diseases are foot-borne diseases, and hence advises men to use foot-wear. The doctors will appreciate the rule

By

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of the Hindus to wash hands and feet on entering a house as a sort of sterilization. The Hindus believe that prevention is better than cure and on that dictum have laid down all these rules.

After drinking water or any liquid from a cup or vessel, the cup is to be put inverted. The object is the same. When the cup is inverted, people know that it was used and will not use it for drinking water before cleansing it well again. One suffering from a disease will transmit the germs of that disease through the vessel—notably tuberculosis, diphtheria, etc. For washing vessels again, ash or earth is to be used. The ash contains an alkali which destroys the germs of many diseases. The earth has also disinfecting properties. The modern theory of sterilization was known to the ancient *rishis* who gave these rules. In certain cases the men were ordained to boil the vessels or instruments in water for an hour or two, or put them in fire and heat them for sometime—to destroy the germs that may lurk in them even after cleansing.

They were ordained not to spit anywhere or clean their nose everywhere—on pain of some punishment which here took the name of sin for which

hell is the result—as the only thing which will threaten a Hindu is sin and no amount of mundane punishment will make him obey a rule or reform his recalcitrance. The hell meant is only sickness through infection. This rule tallies perfectly with the modern germ theory.

Their knowledge of oral hygiene is exemplified in the rule asking every one to wash and gargle the mouth before and after taking anything in, liquid or solid. Particles of food stick in the interstices of teeth and putrefy, giving rise to disease. This is prevented by the general rule that the mouth should be washed after anything enters the mouth. It has been already mentioned that teeth are required to be cleaned early morning using twigs like neem, mango or ஆல், வேல் etc., which contain astringent acids to disinfect the teeth and destroy germs. These strengthen the gums too.

There is a Tamil saying கழானாலும் குளித்து விட்டுக் குடி. “Even if it be gruel, drink it after a bath”) and another கந்தையாகிலும் கச்சக்கி கட்டு, (“Even if it be a rag, wear it after washing”). What an amount of hygiene is contained in these two rustic sayings!

Infection through clothes is prevented by washing; so also bathing removes dirt and infection through skin. This need not be dilated upon.

“Exercise delays digestion, both the secretion of gastric juice and the emptying of the stomach being retarded. Lighter exercise as walking does not delay the secretion of the gastric juice but increases the rate of emptying. Hot baths after meal delay secretion probably by the withdrawal of blood from stomach.....”

Hindu *sastras* ordain bath before meals but not afterwards. In rare cases, bath or wash is allowed after meal, but that should be in cold water. Thereby more blood is drawn to the stomach. Rest after food with betel etc. to aid digestion is also given. There is a saying in Sanskrit which means “one should walk a hundred steps after food”. Compare this with the English “Walk a mile after dinner”. How closely science follows the *sastras*. Even at food, there is to be *abhisravana* — the repetition of certain mantras. Or some *slokas* are chanted. That is, music is provided. And, music and joy



aid digestion. Of course, the music should be an elevating one and not the bawdy one.

Col. King, lately Sanitary Commissioner at Madras, said that the Institutes of Vishnu closely follow the principles of modern sanitation. Thus the sastras are not meaningless jargon or rank superstition or nonsense as some may think. Only the rules were given without explaining the underlying principles.

No one should put on the clothes once used without washing them. One should also not use another's clothes. Why? for fear of catching infection.

Kissing is not allowed by the sastras. The greatest infection is

carried by kissing as modern discoveries and researches show. Even touching is disallowed by the sastras. Untouchability had its origin in this holy and wholesome rule. Sastras prohibit touching any one except one's wife. How wholesome is this rule!

To greet one by shaking hands is the mode of modern civilization. This has now been proved to be a means of spreading infection. A bow with folded hands, uttering *Namaskaram* or *Vandanam* or God's name is the Hindu way of greeting one. By this, spread of infection is prevented and we are made to remember God as often as we meet another. How wholesome was this practice!

WAYS TO PRESERVE YOUR HEALTH

Wake up when the clock chimes six,
And take a walk three miles brisk.
Your bowels then won't play hide and seek,
So you needn't worry much 'bout falling sick.

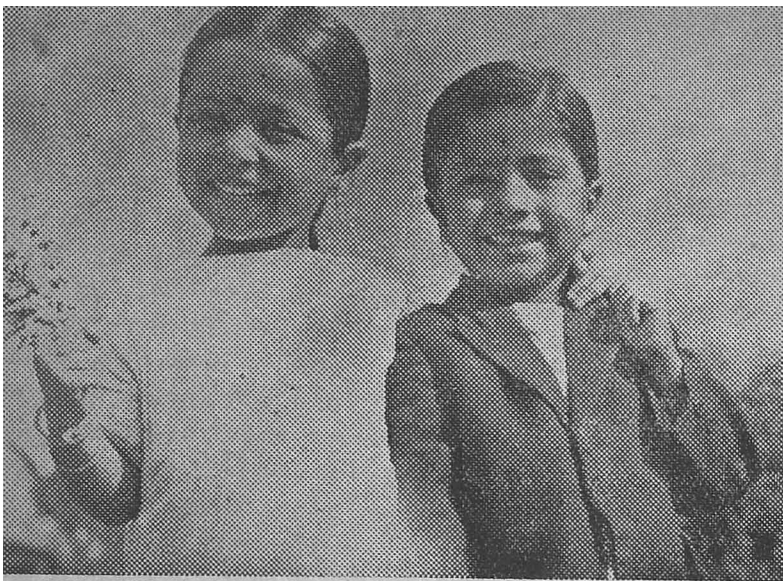
Teeth should be cleaned—clean and bright,
Once in the morn and once in the night.

Pastes and brushes are not essential quite,
Raw twigs of margosa—they too make your teeth white.
Every day must you have a decent bath,
Saturdays with oil if that's your chosen path.
Even if cats and dogs doth it rain,
Remember, cold baths refresh your body and brain.
Vegetarians in their diet they must include,
Even quantites of wheat, curds and fruits.

Your rice and *sambhar* even in bulks unlimited,
Oh! they tax your stomach and keep you dejected.
Under no circumstances should you neglect,
Rules of general hygiene and health perfect.

Health once lost can never be fully regained,
Even at the cost of all your savings closely retained.
And so eat and drink when there's the real need,
Live a moderate life with a regulated speed.
Try to be pure in thought word and deed,
Health is your wealth—handsome indeed.

—P. V. Achar, M.B., B.S., Madras.



Thank God! We have escaped massacre. We are happy.

The Massacre of the Innocents

HOW TO PREVENT IT?

By Nanigopal Debdas, M.B., Bogra.

The figures for British India are of course unreliable because registration of births and deaths is very defective. Still more disheartening is the outstanding fact that here, in British India, the infant mortality

rate shows no definite decline, whereas in England and Wales, with the institution of Child Welfare Schemes and Notification of Births Act, there has been a fall from 132 in 1906 to 57 in 1935. It is a pity that the authorities here are moving with the snail-speed with regard to national welfare schemes.

The question that naturally arises is, who is responsible for the massacre of the innocents? Surely, there is the apathy of the powers that be (not excluding the so-called popular ministries—the product of provincial autonomy.) But should we end by singing a hymn of hate and cursing those in power? It is true that the State should take lead in a matter which concerns the whole nation. Still there is no denying the fact that private and voluntary organisations can do a great deal. Shall not this awful tragedy ever stir us to action? Let us hope that the Rip Van Winkle in us will awake once from his deep slumber—the sooner the better.

Causes.—It is unfortunate that except in the Bombay Presidency, an investigation into the causes of infant mortality has not been carried out. In this respect also, we are in the

In this cursed land of ours, where disease and death are rampant, life is without any charm—it is not worth living. A long lease of life means a long tale of misery. Starvation stares us constantly in the face. Adversity is our bed fellow. So, when cruel death snatches away a young, lovely one, we are but little moved. So unflinching is our faith in God that we never care to pause and ponder over the tragedy which, in His infinite mercy, is ordained for us. At best, we cry out in utter despair, “O! Lord! Let Thy will be done”

I am referring here to Infant Mortality. The Public Health Commissioner with the Government of India, describes it as *slaughter of innocents*. Perhaps, it is the finest expression for the most cruel event. Scientifically, deaths under 1 year per 1000 births registered in the same year comprise infant mortality. Is it not a disgrace that the infant mortality rate of British India is the highest in the world! Let us compare the figures:

Year	British India	England & Wales
1912	208	95
1935	164	57

injuries received during labour by interference or otherwise.)

In England and Wales, the death rate from diseases of the respiratory system is twice as much as from digestive disturbances. India presents an exactly opposite picture. Here, errors of diet and digestive disturbances take comparatively greater toll on infant life. In this connection, it is well to remember that food and water-borne diseases are the easiest to control. Thus, we see a satisfactory decline in infant mortality rate in England and Wales coinciding with the control of digestive disturbances by standardisation of milk production and construction of dust-proof road surface. In contrast, air-borne diseases are, to a certain extent, beyond human control. The result is that, after a steady downward fall, the infant mortality rate of England and Wales has been maintaining an almost steady level for the past few years in spite of the earnest efforts to bring it still lower.

Prevention.—There are certain causes of infant deaths which it is beyond human means to prevent, *e.g.*, congenital defect. Bearing in mind that healthy parents beget healthy children, the level of nutrition of prospective parents should be raised by improving the conditions of living. In other words, economic regeneration is urgently called for. Hence also the need for good breeding or eugenics. Looking deeply into the problem, one finds a great stumbling block, *viz.*, age-old superstition and colossal ignorance which surround management and feeding of infants. We have to fight this by propaganda and health education. Milk, the only suitable food for this age-period, is denied to many babies of the proverbially poor masses. The result is malnutrition and death. Free milk kitchens can meet this requirement.

dark. A study of the subject in other countries has revealed certain facts. These are:—

1. Half the infant mortality occurs in the first month of life and nearly one-half of the deaths in the first month occur during the first week.
2. The decline of neo-natal mortality has been very slow whereas general infantile rate has come down considerably.
3. 20% of the infant mortality is due to prematurity and 18% due to respiratory infection.
4. Urban death rate is higher than the rural.

The Committee of the League of Nations, as a result of their investigations, gives out the following as the principal causes of death.

1. Digestive disturbances.
2. Diseases of respiratory system.
3. Deaths associated with the period immediately following birth, *viz.*, infantile debility, congenital malformations, premature birth, sepsis, etc.

If we consider the neo-natal deaths, it will be found that the main causes of death during the period are:—

1. Prematurity (from toxæmia, external violence, syphilis, premature separation of placenta.)
2. Asphyxia.
3. Pneumonia.
4. Intra-cranial hæmorrhage (from

The establishment of a net-work of Infant Welfare Centres throughout the length and breadth of the country is the urgent need of the hour. The centre forms the training ground for mothers. It should encourage breast feeding and deprecate the tendency of the fashionable women not to nurse their babies. In other countries, they have established breast milk dairy or wet-nurse bureaus as a measure to supply breast milk to babies who, for some reason or other, cannot receive milk from their own mothers. A close contact between mothers and their babies and the welfare centre is of primary importance in this scheme. Home-visiting by trained lady health visitors, who must be willing co-operators and of cheerful disposition, is thus an essential link. This to be thorough and systematic compulsory notification of birth is necessary so that each and every house may be visited. It should also be the duty of the centre to supply free milk, vitamins, chief cereal, *e.g.*, suji to needy parents.

The following measures are suggested for the prevention of deaths in the new-born period.

1. Prevention of premature birth.
2. Provision of adequate care during pregnancy.
3. Skilled assistance during labour and delivery.
4. Best possible care for complications of pregnancy.

In fact, good antenatal work and skilled midwifery could lower the infant mortality rate considerably.

We have seen that the urban death rate is higher than the rural. The reasons are over-crowding and bad ventilation with consequent respiratory infections, etc. Only improved housing accommodation can better the position. Some such thing as the 'Creche' is needed for the adequate

care of the babies of working class women. The orphans should be housed in asylums for their efficient rearing up. Preventorium and convalescent homes also form part of regular campaign against this scourge.

In the few maternity hospitals we have, the arrangement leaves much to be desired. Mothers are huddled together and the new-born babies are most often neglected. There is practically no arrangement for the special care of the premature babies. Maternity Hospital service should, therefore, be well-organised. Grave jaundice and hæmorrhagic disease of the newborn should be treated in special wards attached to maternity Hospitals. The premature ones are better accommodated and cared for in institutions specially meant for them.

Hospital accommodation for sick infants and children is very meagre. Barring a few, we have no Children's Hospital worth its name in the whole of India. For any welfare scheme to be really successful, there should be closest co-operation between pre and post natal clinics, maternity service, infant welfare centres and children's hospitals (indoor and outdoor departments). In fact, a complete national welfare unit should consist of each of the above sections. The united effort of the obstetrician and the pediatrician can bring the issue to a successful end.

A complete solution of the problem includes prevention of still births. Leaving aside those due to foetal abnormalities, a large proportion of these can be prevented by better obstetrics. The death of viable foetus is more due to causes operating during labour than before it. One very potent cause of still birth is syphilis of the pregnant woman which should be treated adequately and in time to ensure live birth.

One word about the responsibility

of the medical profession. The medical curriculum of Universities and medical faculties does not lay stress on the study of children's diseases. There being no well-equipped Children's Hospital, students do not receive sufficient training. Moreover, as no examination is held on the subject, it is most often neglected. The average medical man is, therefore,

not in a position to do full justice to his child patient. What is usually done is that the child is taken as the diminutive edition of humanity ignoring fundamental differences. The result is often disastrous. In the face of all these, the duty of the teaching and examining authorities is to lay special emphasis on the study of Pediatrics.

SIGNS OF HEALTH

BY DR. V. KRISHNA ROW, L.M. & S.
Medical Officer, Presidency College, Madras

formed and well enamelled. They are set far enough apart to be completely even, in

HEALTH is dynamic—an active state of living. It is not mere absence of disease. It means much more than physical fitness. It is a condition, produced by the combined influences of wholesome food, perfect sleep, exercise, regular work, and cleanliness. It is the absence of these that are more responsible for the misery of body than anything else. Healthful living, therefore, covers a period of 24 hours a day, and includes all activities.

The *signs*, by which a doctor, teacher, or any lay person could assess his own 'health' or that of others, are by (I) the manifestations of a well-built and (II) properly functioning body.

I. The outward manifestations of a well-built body are.—(1) *Hair* :—plentiful, with a lustre due to sufficient natural oil.

(2) *Eyes* :—Bright and clear, moving normally, no squinting nor black fatigue rings under the eyes; mucous membrane pink and free from inflammation.

(3) *Unobstructed nasal breathing* :—The ability to breathe deeply and easily through the nose, without mouth closed, especially when exercising and sleeping.

(4) *Teeth* :—Normal teeth are well

jaws wide enough to provide sufficient space. The grinding surfaces of the double teeth meet directly. The upper incisors and canines slightly overlap the lower, providing the scissors like action intended for those teeth. They are all clean and free from cavities.

(5) *Colour of mucous membrane* :—Nearly always in health, the colour of the mucous membrane of the lips, eyelids and that of the finger-nails is definitely pink.

(6) *Quality of skin* :—Slightly moist, clear, soft, and smooth.

(7) *Subcutaneous tissue* :—Fat beneath the skin plentiful, and so firm that the skin cannot be raised in deep, thin folds between the fingers.

(8) *Muscles* :—Firm and strong. It is more important that there should be a general muscular development than that certain groups of muscles be exceptionally developed.

(9) *Shoulders* :—May be sloping or squarely built but should not be rounded forward.

(10) *Chest* :—Broad and deep, with good expansion, from two to three inches is normal expansion, depending upon the age of the child.

(11) *Arms and legs* :—The long bones are straight. The legs are neither bowed outward nor inclined inward so that the knees knock

together. The joints are not enlarged out of proportion with the rest of the limbs, and are strong, indicating well-developed ligaments and overlying structures (muscles).

(12) *Ankles* ;—Inner and outer sides equally prominent; the inner not projecting abnormally as when the arches of the feet are weak.

(13) *Feet* :—Arches strong and limber. Some are normally higher than others. Inner borders straight from heel to tip of great toe.

(14) *Weight* :—Increases regularly during childhood and remains optimal in adult life.

II. Outward manifestations of a well-functioning body.—(1) *Alert, happy expression* ;—The close relationship between bodily and mental health cannot be too strongly emphasised. It is the reflection of good physical health in a child's character which makes the effort to improve his health most worth while.

(2) *Tongue* :—Moist, red, clean.

(3) *Breath* :—Sweet, and not any bad odour.

(4) *Indications of good standing posture* :—Body is balanced equally upon the ball and heel of the foot.

(5) Feet are parallel, great toes pointing forward. Abdomen is held flat on its lower part. It may be somewhat rounded where it meets the ribs.

(6) Normally, the *spine* curves slightly backward at the shoulder level and again slightly forward at the waist line. None of these normal curves are exaggerated, if there is good posture.

(7) *Shoulder blades* are held fast across the back.

(8) *Head* is held erect, chin in, and shoulders level.

(9) *Posture* should be judged not merely when a child is standing, but even more, by the way, he stands, sits, and walks, when not conscious of being observed. It is the *habitual* unconscious posture of the child, we are discussing.

(10) *Muscular co-ordination* :—Prompt, and efficient.

(11) *Bodily repose* :—Freedom from constant and unnecessary activity.

(12) *Endurance* :—Ability to indulge in all ordinary exercise without undue fatigue.

A method of assessing nutritional status of children is by the use of series of measurements, height, weight, chest depth, hip width, etc.. A number of formulae have been worked out in this connection, which it is beyond the scope of this paper to discuss. The best assessment (approved by the Chief Medical Officer, Board of Education, England) is the judgment of the examining doctor, which is classified as "Excellent", "Normal", "Sub-normal", and "Bad". This would naturally vary with each doctor's eye. But he is a good judge.

I have had the privilege of examining the normally 'healthy' college youths, for the last 14 years, belonging to well-to-do classes. I place this knowledge, as well as that derived from my research work into the physical fitness of South Indian students' population, at the disposal of the entire public and the youths. I hope every teacher and student would profit by studying these signs of health, and become individually "health conscious", so that he or she may grow healthy and physically fit, in any walk of life.

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CONSTIPATION IN CHILDREN

BY Dr. S. A. SUBEDAR, L.C.P.S., *Kutiyana, W. Kathiawar.*

THIS subject can be divided into two heads. (1) constipation in childhood and (2) constipation in infancy. We shall take the second first. Before we enter into the treatment of constipation in infants, there are various conditions which ought to be considered. Constipation in infants may be due to semi-starvation, deficient intake of food, abnormal condition of colon, contracted anal canal, defective nervous impulses as in nutritional deficiency, and faulty treatment.

Usually, constipation in infants is mainly due to underfeeding or overfeeding. When it is due to underfeeding, stools are small and well digested, abdomen is flat, child's weight lessens, crying may be due to hunger. This discomfort is not noticeable when underfeeding is established gradually. In breast-fed infants, underfeeding may be recognised by watching the effects of a single feed a day. Weighing before and after each breast feed is the true indication of underfeeding. But such a method is not practicable in all cases.

In cases of overfeeding, the milk is to be blamed. The residue is so large that the colon has difficulty in passing it on. The same thing occurs in citrated milk. The stools are large, pale, dry, the child is strong and robust and gains weight. Abdomen is distended, the child suffers from colic which is relieved by passing of flatus.

Treatment.—In underfed cases, little is to be done except to increase the intake of food. Cow's milk in suitable form may be substituted for mother's milk. Milk may be diluted

with water. Cream, cod liver oil, cane sugar, malt and orange juice may serve as aperients. Mellin's food is also a mild laxative. Where further measures are required, emulsion of paraffin and milk of magnesia, may be tried. Stronger drugs are rarely required.

When quick relief is required, glycerine enema or glycerine suppositories may be tried. To relieve occasionally, castor oil is preferable to many preparations.

2. **In Childhood.**—Three types are described. (1) Atonic constipation. (2) Spastic constipation. (3) Hold up in the rectum. Majority are of the first type. There are again two types of children. One with good health and the other suffering from ill-health.

Treatment.—Atonic constipation: Distention of abdomen, flatulence and hiccough are generally found. The bulk of the contents of the bowels may be too small or too large. It may be too dry from stasis or inadequate flow of digestive juice. In such cases, glycerine enema or glycerine suppositories may be used. Begin with mild aperients—liquid paraffin night and morning after meals with magnesia before breakfast. In order that the residue in the bowels may not become too dry, at least one pint of water should be taken daily, Massage, exercise, strychnine and fresh air must also be employed.

Constipation due to intestinal toxæmia: The child should be well rested. Colon lavage is called for. This may be employed 5 to 6 times a day. Milk of magnesia and paraffin may be useful. Cascara senna may be avoided. The dose for the child can be adjusted after study of the case.

CLEANLINESS—

THE WAY to HEALTH

TYPHOID fever, cholera and dysentery are infectious diseases caused by specific germs. The infection takes place by mouth. Typhoid fever begets typhoid fever, cholera begets cholera and dysentery causes dysentery. The infection spreads by germs thrown out by the patient in the process of elimination. A dysentery patient throws out germs through stools, a cholera patient through stools and vomitus and the germs of typhoid fever are passed through stools and urine of a typhoid patient as well as a convalescent.

Each case should, therefore, be regarded as the source of infection. Epidemics in hostels, barracks and boarding houses are not unknown from a single case of typhoid fever, the infection being carried through food

contaminated by persons engaged in nursing the patient or through flies. Tank or well water may set up widespread epidemics, if infected by washing infected linen, or hands, bed-pans, urinals, etc.

A single case of cholera may create havoc in the locality, if prompt measure is not taken to prevent its spread. The possibilities of the infection being carried away to far off countries with the migration of people should also be remembered. Widespread epidemics throughout India after the *Khumba Mela* are known to

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By

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every one. The congregation of the susceptibles with the infected, on festive occasions favours the recurrence of the disease, if the susceptibles

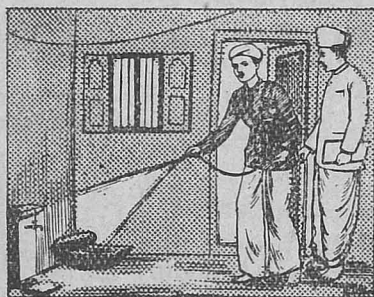
are not previously immunised against cholera and their migration helps the transmission of infection abroad. Quicker the means of transport the more rapid the disease is liable to spread.

Similarly, dysentery begets dysentery which sometimes assumes an epidemic form. It generally follows closely monsoon and fly inci-

dence. It is often fatal to children and the aged who suffer most. The disease is chiefly associated with jails, asylums, camps, ships, etc. Like typhoid fever, it has association with filth and bad sewerage. Low economic condition and over-crowding are no less important factors for the causation of dysentery. Proper measures, if adopted for the hygienic disposal of sewage, are sure to reduce the morbidity and mortality from these infectious diseases to a minimum as has happened in the civilised countries of the West.

Man is, therefore, the enemy of man

[HEALTH



Disinfection of an infected house carried on by the sanitary staff.

and the community. By way of prevention, isolation of the sick to a hospital should be the early measure adopted. Wherever this is not possible, isolation of the patient in his own house and immediate disposal of the excremental matter and the infected linen by burying them under earth and proper disinfection thereafter with bleaching powder of approved chlorine content, should be made.

That the infection takes place by mouth should be borne in mind and the chief means of the propagation of the infection are 3 F's.—fingers, food and flies. It is difficult for a nurse or a nursing mother to avoid finger contamination and, without scrupulous care, the germs are liable to be distributed among the other members of the family through food. Infection of water sources may take place by washing infected hands, linen, bedpans, utensils, etc. This favours the disease to assume an epidemic form. Milk may also be contaminated by infected water used in cleaning cans, cups or feeding bowls.

Flies alternately visit and feed on the infected faecal matter and our food, and thus play a very important part in the transmission of the disease. The infection may thus be also carried to the neighbouring houses. Conditions favourable for the breeding of flies should be removed. If everybody takes care to keep his own house and its surroundings clean, fly incidence is reduced to a minimum and the possibilities of transmission of the disease also become remote.

Food should always be kept covered and taken fresh and hot, whenever possible. Fruits, cut to pieces and sold in the market at a cheaper rate are dangerous as they are often liable to be contaminated by flies. Care should be taken not to upset digestion by taking undigestible food or too much

food as derangement of bowels favours the infection.

Filth, bad sewerage or cesspools furnish conditions suitable for the preservation of the germs and favouring their propagation.

To sum up, the following three conditions, when fulfilled, favour an epidemic. (1) A case. (2) The means of transmission—3 Fs. (3) The susceptible community.

The occurrence of the first case should be notified to the public health authorities without delay, who should be given the facilities to adopt preventive measures in the right direction. The inmates and people should follow what is advised by them. Co-operation is necessary. The inmates and the other people of the community should offer themselves to be immunised against typhoid fever or cholera as the case may be, without unnecessary delay. If this is done, the susceptibility to infection of the contacts and local people is reduced and consequently, the possibilities of its widespread infection. It has been observed that congregation of various people in connection with *melas* and festivals favours an outbreak of cholera, which is liable to be carried away to far off countries with the migration of the people. It is very important that the people in pilgrimage should get themselves inoculated with cholera vaccine, before they leave for their destination.

Other preventive measures have already been discussed. Keep the patient and his room clean. Make the infected linen clean by boiling or washing with proper disinfectants. Disinfect your hands before you touch food. Keep your house and surroundings clean and help your neighbours to do so. Remove the filth and thereby reduce the conditions suitable for the preservation of germs and fly-breeding. In short, cleanliness is the way to health.

GRASS AS HUMAN DIET

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found", writes 'Time' of Chicago, in its issue of 22nd April of the current year, "that grain grass contains all the

FROM times immemorial, grass has been the diet of most of the beasts of burden and cattle. The cow was given it and she manufactured nourishing milk for humanity; the bull ate it and did the ploughing. The sturdy grass eating horse is still the unit of all mechanical motion and with similar fodder, elephant still hauls timber in the inaccessible forests. Grass fodder gave these animals a sturdy health and an excellent power of endurance. Yet no one tried to look into the secrets of this diet as source of health till recently. No doubt various grass grains and tender shoots of bamboo, which is after all a majestic member of grass family, were used in most of the kitchens in various parts of the world, but grass as such was never, except perhaps in the very early history of man, used as a diet.

Early Aryans, who moved from place to place with their herds of cattle, must have looked upon grass with feelings of joy. In fact, it was the factor of getting grass for their flock that led them to new lands, where they established centres of culture and civilisation in due course. It is conceivable that grass must have thatched their early cottages and bamboo must have provided for their wallings, raftings and ceilings. Thus, though from very early times grass has been indirectly responsible for human health wealth and comfort, no body did ever imagine that science, which has made of man a fodder to cannon, could make for man a fodder such as grass. Yet this astounding feat has been achieved recently by chemists George O. Kohler, W. R. Graham and C. F. Schnabel of Kansas City, Mo, who have after four years of research succeeded in proving that there is power in grass. "They

vitamins except D, has 28 times more vitamins per pound than dried fruits or vegetables. Its riches: 23 times more vitamin A than carrots; 9 times more vitamin B₁ than leafy green vegetables; 22 times more vitamin B₂ than lettuce; 14 times more vitamin C than tomatoes and citrus fruits."

"To make grass fit for human consumption," continues the same paper, "the chemists dried, bleached and ground the leaves of wheat, barley, oats and rye, produced a white powder with a slight malt flavor. The scientists ate this grass all winter, caught no colds, enjoyed excellent health. Three U. S. factories and one Canadian are now making powdered grass. Approximate cost: 6 c. per lb."

"Said the grass-eaters to the American Chemical Society meeting in Cincinnati last week: "continues the paper" "The use of only twelve pounds of powdered grass a year..... will supply the necessary factors for a liberal diet to all U. S. families at a price they can afford for the first time in history'".

This discovery brings to one's memory the picture of His Majesty Nebuchadnezzar, the king of Babylon, who 'drove the Egyptians out of Asia, conquered Syria, destroyed Jerusalem' and who, in his later years, in hours of his mental depression occasioned by some mental disease, used to crawl out of the palace in early hours of the morn, fall on his knees and elbows and eat grass. We wonder if history is going to be repeated on a gigantic scale now! But, no fear! The stamp of science is enough to give respectable airs to anything. At least there will be one advantage—a great one too—the universal kinship of man and beast in diet and health.

The Menace of Rats

THE unenviable position which rats have come to occupy as a proven factor in the transmission of certain diseases is well known. Their possible involvement in the transmission of certain infections whose method of communicability is at present unknown can only be surmised. The medical profession definitely realizes that rats are a menace to human beings: that there cannot be recognized a single favourable attribute of the rat; and that all that is known of the rat points to its inevitable involvement with human destiny in both an economic way and in spheres of health.

In writing on this subject in a recent issue of *Hygeia*, John M. Gibson estimates the country's rat population at twice its human population. He also estimates that each of these approximately two hundred million disease carrying rodents consumes food costing at least \$ 2.00 a year each. The nation's annual rat food bill, therefore amounts to considerably more than half a billion dollars.

Hans Zinsser in his book *Rat, Lice and History*, has recently emphasized an interesting fact usually overlooked by historians. He points out that the ravages of certain diseases have been able to change the course of history and determine the fate of empires. Although there is no certain historical knowledge of the rat in Europe before the twelfth century, it is highly probable that some similar form of rodent was responsible for the spread of such devastating epidemics as the bubonic plague. However, we do know that at about this time the black rat came into Europe from Asia and in an incredibly short time swept

the country although at the present time it has been replaced by the brown rat. Wherever this rat has gone, it has driven out the black rat and all rodents that compete with it. Again there is nothing that can be said in its favour. It can live anywhere and eat anything. It burrows for itself when it has to, but when it can it takes over the habitations of other animals such as rabbits and kills them and their young. It climbs and it swims. It is known to carry the following diseases of men and animals, plague, typhus, trichinella spiralis, rat-bite fever, infectious jaundice, possibly trench fever, probably foot and mouth diseases and a form of equine "influenza." Its connection with other diseases as a vector is quite possible although unproven.—Bull. Sangamon Co. M. S.,—*Illinois Medical Journal*, May, '40.

Mental Contentment and Happiness

MENTAL contentment, happiness, lack of worry, are all part of physical fitness. Some emotions as hate and love are invigorating—others, like jealousy, resentment and regret, fatigue the soul. The mind as well as the body must be adjusted to the environment. Just as the body can be trained to a supreme muscular effort, so can the mind be controlled in its reaction to situations. It is only by complete self-sacrifice to some objective that anything of magnitude can be achieved in life. A man has never reached his limits of achievement until he has trained himself to use, on occasion, his last reserves.—*The General Practitioner*.

American Longevity

WHEN compared with most of the countries for which data are available, the United States now ranks very high in expectation of life at birth. Thus, in recent comparable periods, the expectation of life at birth in the United States was greater than that in Belgium by about three years, Czechoslovakia by almost eight years, England and Wales by a little over one-half year, Irish Free State by three and three-quarters years, Finland by six years, France by four and two-thirds years, Germany by somewhat over one year, Italy by almost six and one-half years, Poland by twelve and one-third years, and Scotland by four years. Switzerland, in the period from 1929 to 1932, and the Union of South Africa, in 1936, had expectations of life at birth not far different from that of white persons in the United States in the same periods. On the other hand, the Scandinavian countries, Australia and New Zealand still rank above the United States in average length of life. The differences in favor of these countries in recent comparable periods are: Sweden, two years; Denmark, one-half year; Norway, two and two-third years; Netherlands, three and one-third years; Australia, two and three quarter years, and New Zealand, four and three-quarter years. Although these countries make better showings than the United States as a whole, several of our states compare favorably with them. These states, which form a solid block in the Midwest, include the Dakotas, Iowa, Kansas and Nebraska.

Although the expectation of life at birth in the United States is continuing in its upward trend the pace has slackened in more recent years. This situation may be quite normal, for it could hardly be expected that the rapid advance experienced in the years from 1910 to 1930 could continue indefinitely into the future. There

is, however, no good reason why the improvement in our longevity should not be fast enough to enable us to catch up, in a relatively short time, with those countries whose expectations of life at birth are now greater than ours. Certainly we have available the knowledge, skill and wealth which should help us into first place among the countries of the world in regard to longevity.—*Calif. and West. Med.—South Western, Medicine.*

Health Education of the Public in America

IGNORANCE is responsible for many tragedies. Organized medicine will not fulfil its functions as the protector and promoter of the public health unless it continues with greater enthusiasm and greater determination to educate the people in every phase of healthful living and without reservation warns them against the dangers of untreated communicable diseases. Plain talk in unpleasant language must not be shirked if necessary to shock ignorance into intelligence.

We must not take negative positions at a time like this when all sorts of wild theorists are shouting into the public ear. The people seem to be eager for Health education and we must give it to them honestly and freely if we really want America to be a better and happier place in which to live.—*Nathan B. Van Elten, M. D. in J. A. M. A.*

The Advantages of a "Non-flesh" Diet

THE advantages of a "non-flesh" diet date back to a very ancient period. The prophet Daniel, with certain noble youths, was given pulse to eat and water to drink, and at the end of a ten days' experiment "their countenance appeared fairer and fatter in flesh than all the youths which did eat the king's meat."—*Medical World.*

Home Smoke in Calcutta : Deleterious Effects on Health

"HOME smoke is the dangerous smoke. This smoke consists of obnoxious waste matter. When this drifts on to any surface the tar makes it stick like a fine varnish. It is a matter of common observation that a stream of ordinary water cannot remove smoke containing tar from polished glass.

"There is not a spot in the whole house into which smoke does not penetrate. Food even cannot be set out to cool without smuts falling into it. Open the window and smuts come in. Close it and the danger is still there if one has a raw-fuel fire-place indoors. Dirty food is dangerous food. If you cook at an unsuitable 'chula' smuts and soot settle on your food." Thus observes the Thirty-Third Annual Report of the Bengal Smoke Nuisances Commission for the year 1938.—*The Bengal Public Health Journal*.

Faulty Shoes

THE majority of foot troubles are caused by faulty shoes. High heels and pointed toes lead sooner or later to general ill-health, because they contradict every natural position. Shoes should be just long enough, wide enough, and roomy enough, for the toes to lie straight and slightly separate, and for the heel and instep to be snugly eneased.

A baby's feet are generally perfect. Every care should be taken during their development. Early walking should be avoided and as much fresh air and freedom allowed them as possible. It is important that shoes and stockings fit perfectly from the very beginning.—*Home and Homeopathy*.)

Health Tit-Bits

Better to hunt in fields for health
unbought,
Than fee the doctor for a nauseous
draught,
The wise for cure on exercise depend,
God never made his work for man to
mend.—*Dryden*.

Artificial Excitements

A HEALTHY man needs no artificial excitants; the vital principle in its normal vigor is an all sufficient stimulus; the inspiration bought at the rum shop is but a poor substitute for the spontaneous exaltations of a healthy mind in a healthy body.—*Felix Oswald*.—*Good Health (U. S. A.)*

The Young Doctor

"THE average young doctor sits like Patience on a Monument waiting for clients," says a daily paper. That is better than having the Monuments on the Patients.—*Illinois Medl. Journal*.

Men are Peculiar

MEN are peculiar, just as women have long suspected. For instance, a fellow who hadn't kissed his wife in five years, shot a fellow who did.—*Illinois Medical Journal*.

Hypochondria

"How are you?"

"My head is swollen, my feet too, my stomach is upset, my liver down, my heart in disorder and I myself don't feel very well, either."

To Prevent Caries

IN order to prevent caries we must have a certain amount of coarse and fibrous food-material together with fresh fruits and vegetables. The latter act as cleansers of the mouth and teeth.—*Medical World*.

The Ideal Woman

HERE are the physical proportions of the "ideal" woman according to the Women's League of Health and Beauty :

Hips	...	36 inches
Bust	...	34 inches
Waist	...	26 inches
Height	...	5 ft. 6 in.

* * *

The Soda Habit Harmful

RECENT studies of the stomach and conditions of health and disease have clearly shown that soda is quite capable of doing much harm. It destroys the acidity of the gastric juice and so interferes with the functions of the stomach. Instead of seeking health by swallowing large doses of soda, an effort should be made to find the real cause of the sickness.—*Good Health*. (U. S. A.)

Correspondence

Enlargement of Liver and Spleen in Children

Mr. B. Govindarajan, Advocate, Devacottah, writes to us as follows:—

Please accord to me the hospitality of your columns to awaken the authorities and the medical profession to the necessity of combating a medically much-neglected but the most dreadful of infants' diseases. Enlargement of the liver and the spleen in children is the most cruel of children's diseases. The suffering which it inflicts is simply heart-rending. The misery of the child when the disease had gone out of control is so appalling and also so prolonged that its fond parents pray for its early demise. They even wish that the law would be humane

enough to permit its termination by infliction of death by some painless process. The agony of mind more than the bodily strain which attendance on the child causes to its parents and such of its relatives as have the heart to partake of the burden of mitigating its suffering, is too acute to bear.

The onset of the disease is so insidious that it is hardly detected even by the doctor till after it had taken a strong foot-hold. The predisposing causes of the disease as also its prognosis remain problems still. It is a pity that the talent of Medical Research in South India where the disease is levying a heavy toll amongst children has not yet bestirred itself to tackle this fell disease. It is beyond dispute that only the Indian systems of medicine offer dependable cures for it. But the medicines in vogue have not been scientifically tested and standardised.

The price of the patent medicines for the disease that are in the market is profiteering in nature and prohibitive from the view point of even the middle classes. Further, they take such an inordinately long time to effect a cure even in simple cases, that one easily gives credence to the popular theory that they are purposely so devised that the maximum possible profit may be made out of the misery of children.

It is imperative that the Government must take up the matter and devise steps to cause a scientific study of the origin and cure of the disease and evolve a cheap, effective and expeditious remedy for it. Any philanthropist on the look out for a *dharmaic* object for his bequest may well consider the eradication and cure of this fell disease as worthy of his benefaction. It behoves the medical profession to bestow its resources on this problem.