

Why Drink Milk?

*MILK IS THE INDISPENSABLE
FOOD FOR CHILDREN*



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MILK THE CHILD'S BEST FOOD

Milk should be the foundation of every child's diet. It is the child's best food, and no other food can take its place. Milk provides some of every food element that the child needs, though it does not provide enough of every one of these elements.

If the child is to get enough of all the elements that he needs, he must be given not only milk but also foods that are rich in the elements in which milk is deficient. For details on feeding children, see the Children's Bureau publications, *Infant Care* (No. 8) and *The Child from One to Six* (No. 30).

Milk, if taken daily in sufficient amounts, can be depended upon for protein, calcium, vitamins A and B₂ (or G), and fat, but not for the other food elements. Milk needs supplementing particularly for vitamins B₁ (or F), C, and D, for iron, and for energy food.

MILK FOR PROTEIN

Protein is a food element that is necessary for building and repairing tissue—brain, blood, muscle, and other parts of the body. As the growing child is constantly building and repairing tissue, protein is extremely important in his diet. It is also important in the diet of the expectant and nursing mother, for the baby depends upon his mother for nourishment before birth and during the nursing period—when he is building new tissue rapidly.

Not many foods contain proteins that are adequate for building tissue. Milk contains proteins that are especially valuable for this purpose, and so do eggs, meat, and fish. Cereals and vegetables, so necessary in the diet for other purposes, can not supply enough adequate protein to meet the needs of a growing child.

Milk not only furnishes protein that is adequate for body building but is the cheapest source of such protein. A quart of milk supplies about as much protein as 7 ounces of steak or 4 large eggs.

MILK FOR ENERGY FOOD

Fat and sugar, food elements that warm the body and supply energy, are plentiful in milk. Another food element that warms the body and supplies energy is starch; this is not contained in milk, but is abundant in cereals, bread, potatoes, rice, and macaroni. These foods are needed in the child's diet to supplement milk.

There Is Nothing Just as Good as Milk

MILK FOR MINERALS

The growing child, as well as the expectant mother and the nursing mother, should have an abundance of minerals in the diet. Special care must be taken to select foods rich in calcium, phosphorus, and iron. Milk is the best source of calcium and a good source of phosphorus, but other foods are needed to provide iron and sometimes iodine.

Milk Is the Best Source of Calcium

Calcium helps to build bones and teeth. It is also a necessary part of the blood and of all body organs. Although many other foods, such as vegetables and fruit, supply small amounts of calcium, milk is the chief source of calcium in the diet, and other sources should not be relied on. A quart of milk furnishes about as much calcium as 13 large oranges or 2 pounds of cauliflower.

If the child is to get enough calcium he must be given plenty of milk.

Milk a Good Source of Phosphorus

Phosphorus helps to build bones, teeth, and nerve tissue. Milk furnishes the body with considerable phosphorus. Eggs, meat, fish, and whole-grain cereals are the best foods for furnishing additional phosphorus.

How to Supplement Milk for Iron

Iron helps to build red blood cells and thus to prevent anemia. Milk supplies some iron, but not enough. Egg yolk, dark-green leafy vegetables, fruit, whole-grain cereals, and meat—especially liver—supply a great deal of iron.

How to Supplement Milk for Iodine

Iodine is needed to bring about proper action of the thyroid gland and to prevent certain forms of goiter. In many regions iodine is found in milk, but it is lacking in milk produced in "goiter regions." Sea food is rich in iodine.

Milk Builds Blood and Bone and Teeth

SUPPLEMENTING MILK FOR VITAMINS

If the child is to be healthy and develop normally, he must be supplied with certain essential food elements called vitamins. Milk is rich in vitamin A, but other foods must be given to the child if he is to get enough of the other vitamins.

Vitamin A helps the child to grow normally and to resist infections and prevents xerophthalmia, an eye disease. *Whole milk and butter (not butter substitute) contain vitamin A in abundance.* Other good sources are egg yolk, liver, dark-green leafy vegetables, and cod-liver oil.

Vitamin B is generally believed to consist of two independent vitamins, B₁ (or F), which prevents beriberi, and B₂ (or G), which is said to prevent pellagra. Vitamin B₁ also helps normal growth and stimulates appetite. *Milk is a fair source of vitamin B₂, but can not be depended upon to supply enough.* Vitamin B₁ occurs plentifully in vegetables—especially leafy vegetables—whole-grain cereals, and fruit. Vitamin B₂ is more abundant in milk than is B₁.

Vitamin C prevents scurvy, helps to build good teeth, and helps normal growth. *Milk can not be depended upon to supply enough vitamin C.* Cow's milk especially can not be depended upon, as the heating necessary to make it safe destroys much of its vitamin C. Foods rich in vitamin C are: Raw fruits—especially citrus fruits—and raw vegetables. Tomatoes, either raw or canned, are rich in vitamin C. If the child is to get enough vitamin C, he should be given orange juice or tomato juice daily from his second week on, and after he is 2 years old he should be given some raw fruit daily. The child over 2 may have also some raw vegetables, carefully washed and chopped or grated—lettuce, carrots, turnips, and cabbage.

Vitamin D helps to build bones and teeth and prevents and cures rickets. *Milk contains some vitamin D, but not enough.* The chief food source of vitamin D is cod-liver oil. Sunlight falling directly on the skin produces vitamin D in the body, and the child under 2 needs cod-liver oil daily as well as plenty of sunlight in order to escape rickets. Foods and medicines that have been irradiated with ultra-violet light contain vitamin D, but these should not be given to children except on the advice of a doctor.

Milk Helps to Keep Your Child Well

A WELL-PLANNED, GENEROUS DIET BUILT AROUND MILK

Milk is the child's most important food, but many other foods besides milk must be given to children if they are to be strong and healthy and grow normally. Beginning with cod-liver oil and orange juice or tomato juice, which are given to the baby 2 or 3 weeks old, from time to time a number of foods are added to the diet to provide the vitamins, minerals, starch, and roughage that are not sufficiently provided by milk. By the time the child reaches his first birthday he should be receiving a variety of food, including milk, cod-liver oil, orange juice or tomato juice, cereals, egg yolk, vegetables—especially green leafy vegetables—stewed fruits, and dried bread.

A well-planned diet for an average child 1 to 6 years old contains:

A pint and a half of whole milk a day.

Fruit once or twice a day, including at least one raw fruit, such as orange, grapefruit, apple, or banana.

One or more fresh vegetables a day, including a green leafy vegetable, such as spinach or beet greens, at least three or four times a week—preferably daily.

A "starchy vegetable," such as potato, rice, or macaroni, once a day.

An egg daily.

A serving of fresh meat or fish daily by the time the child is 18 months old; before that three or four times a week.

Cereal once or twice a day.

Bread and butter two or three times a day.

Cod-liver oil daily (at least for children under 2 years).

Milk Is the Foundation of the Diet

PRODUCTION OF MILK

Milk is perishable and is easily contaminated with disease germs from cows and from human beings. It should be taken only from healthy animals, and it should be chilled at once, kept clean, cold, and covered, and handled carefully throughout by clean, healthy persons. Persons handling milk for distribution should have frequent medical examinations, and cows should be examined and tested regularly for tuberculosis.

Because of the great danger of transmitting diseases through milk, all milk should be pasteurized—even “certified milk” (milk produced and handled under as nearly ideal conditions as possible and certified by a medical milk commission). Proper pasteurization—heating for 30 minutes at a temperature that kills disease germs (142° to 145° F.)—is necessary to make milk safe. It does not make poor milk a good food, nor does it justify the use of dirty milk—the quality and conditions of production should be as good for milk that is to be pasteurized as for milk that is to be sold raw—but it adds an important factor of safety to any milk. Milk should not be used for children under 2 more than 36 hours after pasteurization.

WHAT MILK TO BUY

The cleanest and best milk obtainable should be bought. Whole milk, whether fresh or canned, should be bought for children, unless the doctor advises otherwise. When good liquid milk is not available, either evaporated or dried milk may be used.

Wherever pasteurized milk is available it should be bought—never raw milk unless it is certified. In districts where as yet pasteurized milk can not be had, only milk from tuberculin-tested cows, produced and handled under good conditions, should be used. As much care should be taken with milk for use on the premises or for distribution to neighbors as is taken in the larger dairies.

Buy Pasteurized Milk

HOME CARE OF MILK

Any milk, however carefully produced and handled, may become contaminated with disease germs accidentally. To prevent the growth of any such germs, milk should be kept in the refrigerator, at a temperature below 50° F.

HOW TO PREPARE MILK FOR CHILDREN

Milk should never be given raw to children. For children under 2, all milk, even certified, should be boiled before use to kill any disease germs that may have got into it. For children over 2, when properly pasteurized milk is bought, it need not be boiled; but if raw milk must be bought, or if there is any question whether the milk has been properly pasteurized or not, it should be boiled. Boiling milk not only makes it safe but also easier to digest.

HOW MUCH MILK IS NEEDED

The average child should receive a pint and a half of milk daily. Some children grow best if they receive a quart daily, some if they receive only a pint. Expectant and nursing mothers and many children need a quart of milk a day, but not more. Milk taken in other foods, such as milk soups and milk puddings, may be counted toward the daily allowance of milk.

A child properly trained from babyhood will drink milk at every meal. Parents should drink milk as an example to their children. Sometimes a child dislikes milk merely because his father or mother shows dislike for milk. For method of teaching a child to drink milk see *The Child from One to Six*, page 46.

FOODS MADE FROM MILK

Milk products, such as butter, cottage cheese, and ice cream, are valuable in the diet. All milk products that are to be given to children should be made from pasteurized or boiled milk.

Milk Products Are Valuable Foods

