NUTRITION

Butter Is Better

Even apart from vitamin content, new experiments show butter fat is superior to vegetable oils for nourishing children.

EXPERIMENTS showing for the first time that butter fat, apart from its vitamin content, is superior to vegetable oils for nourishing the young were reported by Dr. E. B. Hart, of the University of Wisconsin College of Agriculture, at the meeting of the American Public Health Association in St. Louis.

The experiments show also, Dr. Hart declared, that "'filled milk' should not be allowed to get into the channels of infant and child nutrition."

Even when vitamins A, D and E were added to vegetable oils, he reported, there was inferior growth of weanling rats fed on them. Not only do the rats on butter fat grow better, but they look better. When kept for reproduction studies, marked superiority in numbers born and reared results. Similar results were obtained fom experiments with calves at the University of Minnesota.

Butter's superior nourishing quality for the young, Dr. Hart discovered, is due to a saturated fatty acid (or acids) of high molecular weight which is not present, at least in quantity, in the vegetable oils he investigated. These included corn oil, cotton seed oil, soy bean oil and cocoanut oil. This fatty acid factor in butter is not the same as the unsaturated fatty acids, like linoleic acid, which are found in vegetable oils and have also recently been declared essential for health.

The discovery some 20 years ago that milk fats were superior to vegetable oils because they contained vitamin A led to state and Federal legislation prohibiting the manufacture of "filled milk," which is milk that has its butter fat removed and replaced by vegetable oils.

"Within the last few years those who would like to make a filled milk have learned how they can add vitamins A and D to these vegetable oils and then claim a nutritive value of the product equal to that of milk," Dr. Hart declared. "By getting out an injunction against the enforcement of 'the filled milk' legislation and prohibiting the enforcement of the law, these companies have succeeded in distributing very considerable quantities of 'filled milk.' In

some states decisions in reference to the validity of the 'filled milk' legislation are pending. In other states licenses are given allowing the manufacture of 'filled milk,' but with an imposed tax."

"Filled milk," he continued, may be "a healthful food but show some deficiencies, just as do many of our staple foods; but where a food becomes the sole nutrient of the young, such as whole milk does, then the commercial distribution of an inferior substitute should be prevented."

Whole milk, he declared, needs only the addition of iron, copper, manganese and vitamin D to make it complete food for growing youngsters. For grown-ups it can serve for complete nutrition for a long time without any fortification, as evidenced by the record now available of a grown woman who lived between three and four years in perfect health on whole milk only.

Science News Letter, October 31, 1942

Wide Protection

➤ HOPE that the T.A.B. vaccine against typhoid and paratyphoid fevers given men in the U. S. Army may protect the men from a number of other diseases caught through contaminated food and drinking water appeared in the report of Lieut. Col. Don Longfellow, M.C., and Major George F. Luippold, S.C., U. S. A.

Their laboratory experiments showed that this vaccine produces in the blood of vaccinated persons protective substances against not only many strains of typhoid fever germs but also against some of the germs which cause food poisoning and some germs believed capable of causing diarrheal diseases.

Proof that the vaccine will actually protect men in the field against these diseases as well as typhoid fever, which it does protect against, will not be available until after records on several years' experience come in. Consequently the Army medical officers are cautious about saying too much for the vaccine other than that it protects against typhoid.

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FOR SKY JUMPERS—Each parachute is periodically aired and inspected. These precious silk parachutes suspended from the umbrellalike frame are hanging in the loft of the Norfolk Naval Operating Base. The picture is an official U.S. Navy photograph.

NUTRITION

Pink Flesh of Fish Contains More Vitamin A

➤ PINK-FLESHED trout, and presumably other fish also, contain more vitamin A than white-fleshed, Dr. C. H. Clausen, of the University of Colorado School of Medicine, reports on the basis of preliminary experiments.

His discovery came in studies undertaken at the request of Director C. N. Feast, of the Colorado Game and Fish Department, who wanted to know why flesh of the same sort of fish, such as brook or rainbow trout, may graduate from white to a deep clear pink.

The pink flesh contains more vitamin A than the white flesh, and Dr. Clausen also found more vitamin A in the flesh of crustacea, main food of the trout, which lived where the pink-fleshed fish do.

Dr. C. E. Hagie, educational manager of the department, points out that foods rich in vitamin A, fed to trout in ponds where they are reared tame for the table, may help pond-owners produce only pink-fleshed fish, which are considered more attractive, as red salmon are considered more attractive than those with paler meat. Experiments are being continued.

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