Margarine Consumption Increasing

Increased Use of Domestic Products Due to Demand for High Quality Foods and the Balanced Diet.

THE increasing consumption of vegetable oils and oleomargarine, by the American public is cited as an important recent change in our dietary habits by Dr. Leo Wolman in the survey of the National Bureau of Economic Research published with the report of the Committee on Recent Economic Changes under the title "Recent Economic Changes."

"One of the most striking changes in the American diet of the past half century, and especially since the war," writes Dr. Wolman, "has been the increasing use of vegetable oils, either in the place of fats or as supplements to them. The change can be observed even in the composition of oleomargarine, a product containing both animal and vegetable fats. Prior to the war, vegetable oils usually furnished less than one third of the total fatty ingredients; with the increasing use of cocoanut oil, which is solid at ordinary temperatures, the proportion of vegetable oils has risen until recently they have constituted over 50 per cent.

"The consumption of margarin has never been as high in the United States as in several countries of Europe where it has been highest in a few small countries which are large producers of dairy products. Since the war, in spite of the recovery in production of animal fats and dairy products, the consumption of margarin has tended upward, largely because of technical improvements making for higher palatability, perhaps also because of truer knowledge of its food value. In the United States, legislation has been restrictive, and there is some popular prejudice against margarin. The consumption rose to unusually high levels during the war and immediately thereafter when butter prices were relatively high. From a peak in 1920, per capita consumption of margarin sharply declined to a level in 1922 less than half the 1920 figure, while butter consumption increased by about the same amount. The increase in per capita consumption of butter represented in part a recovery from a temporary decrease in consumption during 1917, 1918 and 1919. Since 1922 butter and margarin consumption have both tended upward though preliminary figures for 1927 show a decline in butter greater than the increase of oleo. Taking the products together the net increase in terms of calories per capita was only about 12 per cent between 1919 and 1926.

"Another important factor in the displacement of animal fat by vegetable oil is the increased use of vegetable oils as shortenings and cooking fats. This began in the Eighties with the adulteration of lard with cotton seed oil. Later lard substitutes were manufactured from oleostearin and cotton seed oil. About 1910, with the development of the process of hydrogenating oils, solid cooking fats were produced from cotton seed and similar oils alone. They now represent one of the most important types of fats for cooking and shortening purposes. The volume consumed is of the same order of magnitude as the quantity of lard exported. If it were not for the extensive use of vegetable oils, but a small lard export would be possible in some years. Consequently, cottonseed oil has been extensively diverted from industrial to dietary uses.

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THE growth in the consumption of margarine has been accelerated by improvements in the methods of refining oils and of compounding margarines, which have resulted in the production of products of superior quality, believed to closely approximate butter in flavor, consistency and nutrient values. Properly prepared margarines are said to contain all the vitamins which are inherent in butter and to be just as satisfactory a product for the promotion of growth and health of children. The consumption of both margarine and butter in the United States is still much lower on a per capita basis, than that in most European countries, which shows that the opportunity for growth of the margarine industry in this country is extensive.

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Margarine Consumption

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"Finally, with the increase in consumption of fresh fruits and vegetables in the form of salads throughout the year, goes an increased use of salad oil. This is in part olive oil, but largely carefully refined deodorized and decolorized cottonseed oil. Salad oil may be consumed as such, but a large part of the consumption is in the form of prepared mayonnaise and other dressings, and their manufacture has become a considerable industry. Altogether, the increased use of vegetable oils has contributed to diversification of the diet, to convenience in the kitchen and to some actual and more potential cheapening of the food fats as a whole. It has come about largely as a result of improved technology, supplemented by vast commercial advertising. Provided the nutritive deficiencies of vegetable oils are made up by other components in the diet, as is ordinarily the case, there are no offsetting dietary disadvantages."

Virgin Olive Oil

(*from p.* 19)

forwarded to the Bureau of Standards had a fluorescence similar to that of a second pressing European olive oil obtained in very much the same manner. Moreover, although it was suggested at that time that one difficulty might be that California oils appeared differently fluorescent than European olive oils, we have obtained authentic samples of California olive oils which do appear identical with European oils. These California oils, in order to appear as "Virgin" under the lamp, must be taken from the first of the four expressions, or, if a machine is used similar in type to the Anderson expeller, the oil must be taken from the first part of the machine, and must have been cold-pressed.

Another objection raised more recently is to the effect that chlorophyll or other coloring constituents may be added to a refined olive oil to produce a "Virgin" oil type of fluorescence. We have obtained samples of five different chlorophylls, including those used by the Italian investigator who raised this question; but find that the blue fluorescence of a refined oil may not be covered by the deep green coloration of chlorophyll—no matter in how great quantities it has been added. We want to confirm our earlier reports that it is apparent the blue fluorescence of a refined oil is due to a destruction of the chlorophylls present rather than to oxidation, and that the only connection between the two phenonema occurs when, during the process of the development of rancidity, part of the coloring matter has been destroyed or changed — as indicated by the difference in fluorescence. Although it has been found in our laboratory that by the addition of a small quantity of annatto in oil to a refined olive oil there may be produced a fluorescence similar to that of "Virgin" olive oil, the usual chemical test for annatto is sufficient to detect the presence of this adulterant.

Kellogg & Sons Earnings

THE annual report of Spencer Kellogg & Sons, Inc., flaxseed oil, Buffalo, for the fiscal year ending September 28, shows net profits of $1,297,730, or $2.55 a common share, after depreciation, interest, and Federal taxes. The net profit in the preceding fiscal year equalled $3.59 a share. The decrease in the company's earnings is attributed largely to larger expenses of a non-repeating nature. The outlook for the present fiscal year is reported to be more optimistic. James L. Wickstead, treasurer of the company has been elected a director.