Proposed Amendment to Oleomargarine Laws

New Measure Designed to Extend Restrictions on Butter Substitutes to New Cooking Compound Products

REPRESENTATIVE HAUGEN (Rep.), of Northwood, Ia., chairman of the House Committee on Agriculture, stated orally, April 1, that he expected to introduce in the 71st Congress a bill to amend the oleomargarine act.

The new bill, Mr. Haugen said, would be the same as a measure (H. R. 10958) which failed to receive action in the 70th Congress, although reported favorably by the House Committee on Agriculture. The full text of (H. R. 10958) follows:

A bill to amend the definition of oleomargarine contained in the act entitled "An act defining butter: also imposing a tax upon and regulating the manufacture, sale, importation and exportation of oleomargarine," approved August 2, 1886, as amended.

Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled, that section 2 of the act entitled "An act defining butter; also imposing a tax upon and regulating the manufacture, sale, importation, and exportation of oleomargarine," approved August 2, 1886 as amended, is amended to read as follows:

"Sec. 2. That for the purposes of this act certain manufactured substances, certain extracts, and certain mixtures and compounds, including such mixtures and compounds with butter, shall be known and designated as 'oleomargarine,' namely: All substances heretofore known as oleomargarine, oleo, oleomargarine oil, butterine, lardine, suine, and neutral; all mixtures and compounds of oleomargarine, oleo, oleomargarine oil, butterine, lardine, suine, and neutral; all lard extracts and tallow extracts; and all mixtures and compounds of tallow, beef fat, suet, lard, lard oil, other animal oil or fat, vegetable oil, annotto, and other coloring matter, intestinal fat, and offal fat—if (1) made in imitation or semblance of butter, or (2) calculated or intended to be sold as butter or for butter, or (3) churned, emulsified, or mixed in cream, milk water, or other liquid, and containing moisture in excess of 1 per centum.

"This section shall not apply to puff-pastry, shortening not churned or emulsified in milk or cream, and having a melting point of 118 degrees Fahrenheit or more."

New Legal Restrictions

THE full text of the section of the report of the Committee on Agriculture outlining the purposes of the bill follows:

The purpose of the amendment, in addition to clarifying the language of the act and including the fish oils and fats, as above briefly mentioned, is to bring a third class of fat compounds, in addition to the two specifically enumerated in the existing law, within the definition of oleomargarine, and therefore within the taxing and regulating power of the Bureau of Internal Revenue.

There have come upon the markets in the United States within the past few years, and ample evidence was placed before the Committee to prove this, a flood of fat compounds, made from coconut oil, imported from outside the continental United States, and a small proportion of peanut oil, under the name and disguise of "cooking compounds." These so-called cooking compounds are made by mixing these fats together in water or some other liquid, so they form an emulsion very nearly identical in its form to the emulsion of butter fat and water, which is butter.

Not only are they emulsified and solidified like butter with moisture incorporated in them like the moisture in butter which is provided for and defined in the Act of 1886 to which this is an amendment, but they are also salted, and in most cases colored with annotto to imitate butter in these two essential particulars. In addition to this there was exhibited to the Committee a synthetic butter flavor which may be used to make these cheap fats have the flavor of butter, when properly blended with the synthetic flavor.

These so-called cooking compounds, made in this manner, are not clearly within the definition of oleomargarine as it is stated in the present law, and as this law is interpreted by the courts. The present law after enumerating the fats used in oleomargarine states that these mixtures and compounds are oleomargarine "if made in imitation or semblance of butter, or when so made if so made calculated or intended to be sold as or for butter," and the courts have ruled that these compounds, although of the same materials except one,

(*Turn to Page* 43)

Of What Benefit a Higher Tariff?

Would It Really Aid the Farmer and Oil Crusher? Is Denaturation a Way to Solve the Problem?

By JOHN B. GORDON

PERSONS claiming to represent dairy, livestock and general farming interests, have appeared before the Ways and Means Committee at Washington and asked for a straight 45 per cent ad valorem tariff on vegetable oils and fats. We should produce our own vegetable oil supply, these men say. Cotton seed oil and soya bean oil are the two sources which they claim could be greatly expanded to make up for the billion pound shortage that would result from shutting out the oils we now import.

Nothing but harm could come from any attempt to get the cotton farmer to produce enough more seed to make up any considerable part of the vegetable oil shortage that would result if imported oils are shut out, even if these oils could be substituted for with cotton seed oil which is not the case.

Farmers do not grow cotton for seed. Seed is a by-product. Even if the vegetable oil tariffs were to increase by one or two cents per pound the oil made from the seed which is not required for planting, would scarcely be noticeable in the income from an acre of cotton. It would, in fact, amount to only 15.1 cents per acre, figured at one cent per pound on the average acre yields in the United States in 1927.

Nothing short of artificial stimulation by propaganda would induce farmers to plant more cotton to secure more seed for oil. Such propaganda would be exceedingly injurious to the South. The whole urge in the South today is to *reduce* the acreage of cotton, rather than increase it, so as to bring better prices for cotton lint. The state legislature of Texas recently considered a law to compel cotton acreage restriction, and the foremost cotton co-operatives are counseling acreage *reduction* rather than expansion.

WILL a duty of 45 per cent really help the American crusher and refiner of vegetable oils, and the producer of other fatty substances? Mr. Gordon believes that it will *not*. He sees in it a boomerang. As Washington representative of the Bureau of Raw Materials for American Vegetable Oils and Fats Industries, he is unalterably opposed to the higher tariff because it will "hamstring" large users of non-edible oils and fats, chiefly the soap industry. As a former instructor in economics at an agricultural college, he sees the proposed duties as economically unsound, and "loaded with dynamite" for the cotton farmer and cotton oil crusher. His views are those most strongly opposed to the new tariff proposals.—The Editor.

Every pound of cottonseed oil and peanut oil being produced in America which is suitable for edible purposes (and practically all of it is) is now being used for edible purposes, in such products as salad oil, lard substitute, oleomargarine, etc. This is a higher priced field in which to sell by far than the field in which the non-drying industrial oils are sold for the manufacture of soap, rubber substitute, tanner's oils, lubricating oils and grease, etc. There is no vegetable oil produced in the South with which to supply these kinds of users. The edible oil people are using it all. Why, then, should any cotton farmer favor increased duties on industrial nonedible vegetable oils? Such duties would mean nothing more than a big increase in the costs of dozens of articles he must buy.

The peanut farmer is in the same boat with the cotton farmer. He does not want to produce a surplus of peanuts over and above what the edible nut men need. If he were to do so, he would be obliged to sell the edible nut men at the same price level at which oil mills could afford to buy, and that price level, it is well known, is much below the edible nut prices.

As regards soya bean oil, there is *much less oil* in soya beans than in cotton seed and proportionately *much more meal*. For each ton of cotton seed oil produced we get about 2.33 tons of meal. But for every ton of soya bean oil produced, we get 7.2 tons of meal. The soya bean cake and meal would pile up three times as fast as cotton seed meal and cake. In crushing soya beans, the oil is really a by-product. The meal is the principal product and there is nothing that can be done by use of the Tariff to raise the price of any kind of oil cake and meal. In 1927 we had to export 785,000 tons of it to Europe. What we would do with more

Natural grouping of oils and fats according to actual usage due to chemical and physical variations of individual oils and fats. This grouping also indicates in general way relative price relationship.

1-Drying Field	*China Wood oil *Perilla oil Linseed oil Soya Bean oil Menhaden oil
2-Edible Field	Lard Cottonseed oil Peanut oil Corn oil Oleo oil Oleo Stearine Edible Tallow Edible Olive oil
3- Nondrying industrial group- all oils in this class to be denatured, i.e., rendered inedible	*Palm oil *Inedible Olive oil *Palm Kernel oil Coconut oil Rapeseed oil *Sesame oil Non drying sea animal oils

This class also includes all offal and refuse oils and fats, such as greases from garbage, tallow rendered from shop fats, etc.

*on free list in tariff act 1922

It is proposed that the following language now in paragraph 1632 Tariff act 1922 be made to apply to all of those oils in bracket three on this page.

"to be duty free if rendered unfit for use as food or for any but mechanical or manufacturing purposes, by such means as shall be satisfactory to the Secretary of the Treasury and under regulations to be prescribed by him.

of it than we now have is hard to see, as while Europe takes our surplus she pays us precious little for it, in proportion to its real value.

Flaxseed is often mentioned as a farm product that could be more extensively grown because of the demand for linseed oil required in paints. Granting that this be true, linseed oil and soya bean oil are classed as "drying oils" and cannot be replaced by such oils as coconut oil, palm oil, palm kernel oil, etc. Linseed oil and soya bean oil are adequately protected by the proposed tariffs, but as already pointed out, the chances for important expansion in the production of soya beans for use by oil mills would have exceedingly hard sledding because of the cake marketing problem.

Since we do not at present grow enough vegetable oils in the United States mainland to supply the demand even for edible oils used in butter substitutes and lard substitute, the stand taken by farm leaders is equivalent to a demand that manufacturers of soap, varnish, tin plate, and other industrial users be forced to use oils now being used for the higher edible purposes. In other words, some of these farm leaders are demanding that higher prices be paid for oils for industrial uses (in an effort to raise prices on edible oils) even though farmers of the United States are not producing the oils needed for these industrial uses.

For illustration: Varnish manufacturers use China wood oil principally. This oil cannot be used in foods; it has a poisonous effect when taken into the stomach. Being forced to pay a 45 per cent duty on China wood oil would have no other effect than to raise the retail price of varnish by perhaps 50 per cent. Producers of the newer cellulose lacquers may be interested in getting this duty on China wood oil in order to plague their rivals, but why should dairy and farm interests help in this raid?

What the Tariff Would Cost

THE farmer is a consumer as well as a producer. He needs to weigh carefully the relative benefits and disadvantages of any proposed tariff. Some agricultural tariffs are of undoubted benefit. The tariff on dairy products is one of the most notable of this class. Other tariffs are merely useless. But the proposed indiscriminate tariff of 45 per cent ad valorem on all vegetable oils and fats, is worse than useless. It would work a positive injury to nearly all classes of farmers and would fail utterly to accomplish any material benefits for its chief backers, spokesmen who claim to represent the dairy groups.

Imported inedible oils and fats enter into a surprisingly large number of articles of common use and are required in a large number of industries. In addition to the better known uses such as for soaps, paints, varnish, linoleum, etc., large quantities are used by tanners in finishing leather, by textile mills both in finishing and in washing fabrics, and by steel mills for finishing tin plate. Every leather belt and every piece of harness requires dressing with oil mixtures; much machinery, including automobiles and our merchant marine fleet which carries our commerce over the seven seas is lubricated in part by vegetable oils.

The increase in prices of manufactured articles that would be necessary if an effective tariff were imposed on inedible vegetable oils would vary, of course, according to the percentage of oil contained, but a 45 per cent ad valorem tariff on vegetable oils would cause a 50 per cent increase in the selling price of laundry soap for instance and the effect would be as heavy in some of the other industrial products.

Fish oil manufacturers in the East are working under the farm banner to get a high tariff on vegetable oils. They see a chance to force paint makers, tanners, and soap manufacturers to use fish oil at higher prices. That is good business for the fish oil people perhaps, but where does the farmer get off who must buy the higher priced paints, shoes and other leather articles, soaps, and numerous other products?

Rapeseed oil is used extensively as a lubricant in ships and automobiles. Rapeseed is not grown in the United States and never would be, yet farmers are asking a 45 per cent increase in the tariff on this oil which they themselves use.

The cost of tariffs on oils and fats would not be reckoned only in increased prices to farmers and other consumers. It must also be reckoned in terms of decreased consumption, not only because of increased cost but because of substitution. For illustration, R. J. Kinzer of the American Hereford Cattle Breeders Association writes me under date of February 13th "when it came to the matter of oils and fats, we did not make any recommendations at all. It is a feeling of some of our Committee that in case higher protective tariff was placed on these products it would only encourage the use of substitutes." There can be no sounder reasoning.

All manufacturers of industrial products made from oils and fats, both vegetable and animal, are constantly warred on by substitutes, *and these substitutes contain no fats and oils at all.* Soaps must battle with chemical washing

powders. Varnish must war with cellulose lacquers. Rubber substitutes must compete with the genuine article—rubber. Tanners' oils must wage war with petroleum products. Lubricating oils containing vegetable oils must battle with straight petroleum lubricating oils. Candles made from fats must compete with candles made from paraffine. And so it is clear on through the gamut of products made from oils and fats. Almost all of them skate on thin ice and any attempt to increase their burden of cost in the way of tariffs imposed on raw materials will force them through the ice and the competitor who cannot be so burdened goes on to win the race for the consumers' favor.

The cost of the duties on industrial oils and fats must be computed in yet another manner: A recent news release from the Department of Commerce calls attention to the fact that the non-manufacturing areas, from whence come the oils and fats discussed here, are using raw materials (such as these oils and fats) to pay for all kinds of American merchandise from automobiles to condensed milk. If these imports are shut off, then our exports to the non-manufacturing areas are simultaneously clipped off!

By Denaturation

AFTER long and careful study of the equities of the case the industrial users of oils and fats propose a solution which should be acceptable to all sincere and legitimate farm representatives. Users of oils for industrial purposes propose that all questions of interchangeability of oils (a badly misunderstood expression) be removed, so far as imported oils are concerned, by denaturizing. That is, all oils that are to be brought in for industrial purposes would be required to be treated, under Federal supervision, with a substance that will render them unfit for food. This plan of denaturizing low grade olive oils to keep them from going into foods, has been used by the Federal government for more than 20 years and without any difficulties. All oils not so denaturized, irrespective of their country of origin, and intended to enter into competition with edible oils produced in the United States, would be required to pay an adequate import duty. By this means dairy interests would be protected against coconut oil now used in making butter substitutes; there would be an ample market at enhanced prices for all the cottonseed oil, corn oil and other edible oils produced in this country, yet the soap, tanners, varnish and numerous other manufacturers would still be able to get moderate priced supplies of inedible oils and the prices of the articles manufactured from them need not be increased to the consumer.

Johns-Manville Acquires Celite Products

The entire business of the Celite Products Co., of Los Angeles, manufacturers of Supercel, Filtercel and other adsorbent earths which have wide use as filter aids, and of Sil-O-Cel insulating material and refractories, as well as Celite for concrete, has been purchased by the Johns-Manville Corporation of New York. The Johns-Manville Corporation has taken over the mines of the Celite Products Co. in California and the entire production and sales organization.

The business of the Celite Products Co. will be carried on and developed by the new owners along the same lines as in the past and it is expected that the distribution of Celite products will be materially expanded because of the great scope of Johns-Manville's distributing organization, with offices in all important North and South American cities. Mr. Arthur S. Elsenbast, for many years Filtration Engineer of Celite Products Co., will continue as Manager of the Filtration Department of Johns-Manville.

Professor T. P. Hilditch, of the University of Liverpool recently presented before the Manchester Section of the Society of Chemical Industry a paper entitled "Recent Advances in our Knowledge of the Structure of the More Common Fats." In his paper, Dr. Hilditch reviewed the progress of analytical methods for fats and oils to their present-day efficiency, which is such as to permit the interested user of any of these products to have complete data on their composition and structure.

Two-thirds of the raw materials utilized in Japan for soap manufacture are obtained by the hydrogenation of oils, chiefly whale, fish and soya bean oils. To avoid Australian domination in their markets, the Japanese wish to make themselves independent of the world with an abundance of fish and soya bean oils. The annual Japanese production of whale oil is valued at three to four million yen, nearly half of which production is exported.

Notes of the Industry

Import 30,000 Tons Soya Meal

Between 15,000 and 20,000 tons of soya bean meal are imported annually, according to a letter received by *Oil & Fat Industries* from E. L. Cocke, assistant secretary of the Ashcraft-Wilkinson Company, Atlanta, Ga. Mr. Cocke's letter is in reply to statements made in an article in the February issue of the publication, and states:

"On page 26 of your February, 1929 issue the following sentences are contained in your article entitled 'The Consumers' Side of the Tariff': — 'Unless a satisfactory market can be found for this cake the production of soya beans cannot expand extensively. This finding of a satisfactory market for soya bean cake would be difficult because soya bean cake and meal would be in competition with the products of every farmer who grows feeds.'

"It is not my desire to engage in controversy, but the above statement that it would be difficult to find a satisfactory market for soya bean cake and meal is so erroneous and so misleading I think it should be corrected. The contributor of the article probably does not realize that the growing of soya beans in America, especially the central western states, affords a new revenue of profit to the farmers.

"As far as the demand for soya bean cake and meal is concerned, it has been necessary to import 30,000 tons annually to the Pacific Coast. We ourselves have participated in this importation to the extent of several thousand tons.

"Instead of it being a problem to find a satisfactory market for soya bean cake and meal, the real problem is to get a satisfactorily large enough domestic production. All dairymen will tell you that the protein market in America is entirely too high as evinced by the present $50.00 to $64.00 per ton price for domestic protein concentrates such as cottonseed meal, gluten meal and linseed meal. These actual facts should be given due consideration."

The Third Annual Convention of the Mayonnaise Products Manufacturers Association will be held at Atlantic City on October 28, 29 and 30. Convention headquarters will be at the Hotel Traymore and this progressive organization of mayonnaise manufacturers expects a record-breaking attendance.

Norwegian Codliver Oil

Steps to improve the quality and uniformity of the medicinal codliver oil exported from Norway are being taken by the government of that country, according to a report from Marquad H. Lund, United States commercial attache at Oslo.

Codliver oil intended for domestic consumption has been under government supervision for some time and regulations have just been issued to extend similar supervision to oil extracted for export which is intended for medicinal purposes and human consumption. These regulations have not yet been published in detail, but it is understood that they will confine the pressing of oil for human consumption to cod, haddie and coal fish. Inspectors under the Norwegian Ministry of Commerce will examine plants, equipment, methods and raw materials of the oil extractors, and detailed regulations are to be issued regarding the permissive practices in manipulating the livers. Each export shipment is to be certified by a chemist licensed by the government, and the Ministry of Commerce will prescribe the method to be used in determining the vitamine content of the oil. Producers are to pay a tax of 1 Kr. (26.3 cents) per 100 kilos for this service.

Mr. Lund reports that leaders in the Norwegian codliver oil industry are pointing out the need for a central organization for the exportation of their oil, and propose rigid standards of quality and grading and exploitation under a single trade mark, similar to the export machinery for cheese in Switzerland.

Officers of the British Seed, Oil and Cake Trade Association have been elected as follows: — President, Edward Eric Billington, managing director of Edward Billington & Son, Ltd., Liverpool, and director of W. E. Criddle & Son, Ltd., Liverpool; vice-president, Alexander Chrystals, of James L. Turnbull & Co., Liverpool; treasurer, E. H. Wharton-Davies, managing director of the Cattle Food Supply Company, Ltd., Liverpool and London. W. B. Bibby, J. Bibby & Sons, Ltd., Liverpool, and P. F. Orford, Joseph Crosfield & Sons, Ltd., Warrington, were re-elected to the executive committee.

Liquidating Reduction Plant

Consolidated Products Co., New York, used machinery dealers, have bought the $3,000,000 garbage reduction plant on Staten Island, N. Y., formerly operated by the Metropolitan Disposal Co. and the New Departure Reduction Co. They are now in the process of liquidating the equipment. This includes 179 Bartlett & Snow steam jacketed crystallizing kettles, over 250 tanks of all sizes and types, from 5,000 to 550,000 gallons capacity, 5 boilers of 625 horsepower, 25 pumps, motors and other miscellaneous machinery.

Wood Oil Imports Decline

Exports of China wood oil to the United States from Hankow during February totaled 2,756,000 pounds, a decided drop from the corresponding month of 1928 when 6,919,990 pounds were reported, according to a cable just received in the chemical division of the Department of Commerce from the American consul at Hankow. Shipments to this country in January totaled 12,323,465 pounds. Exports of wood oil to Europe amounted to 560,000 pounds, against 1,948,100 pounds in the preceding month and 1,035,265 pounds in February a year ago. Stocks at Hankow at the close of February were estimated at approximately 5,000 short tons, compared with 700 tons February 29, 1928.

Export Tax Cancelled

The Hankow Surtax Bureau in an order issued in January, placed an export tax of $2. per picul on tung oil exported from Hankow. The new tax did not remain in effect, however, as a review of the new export tax caused the Minister of Affairs, Chinese Government, to publish a decree rescinding the new tax.

Cook, Swan & Young Sold

Receivers of the Cook, Swan & Young Corporation have been ordered by Judge Runyon to accept the offer of $245,000 made by Gilbert P. Smith, president, and J. Howard Smith, a director of the company, for the plant at Bayway, N. J., land, building, machinery, corporate name and good will, providing a better offer is not made to the court or receivers prior to April 15th, in which case the court will withhold designation of the successful buyer until April 19. The Smiths also intend to take over the inventories, chiefly stocks of crude and refined oil, at inventory costs less discounts of from 10 to 20 per cent.

Glidden Expands

Adrian D. Joyce, president of the Glidden Company, in a letter to the stockholders explaining the purpose of the proposed increase in capital from 500,000 to 600,000 shares, advises that the company has acquired control of the Metals Refining Co., Hammond, Ind.; the Voco Nut Oil Products, Inc., Berkeley, Cal.; the Dunham Mfg. Co., Brooklyn; the Wisconsin Food Products Co., Jefferson, Wis., and The Troco Food Products Co., Chicago.

Mr. Joyce estimates that the acquisition of these concerns, with sales aggregating more than $13,000,000 last year, will increase the business of the Glidden Company by nearly 50 percent. Sales of the Glidden Company for the four months ended February 28 exceeded those of the same period a year ago by $1,100,000.

Butter Trade Falls Off

Exports of dairy products from the United States have declined since 1925 and in 1928 were the lowest since 1922. In 1928 they had a value of $2,732,080—$353,665 less than in 1927. Exports of butter had a value of $1,860,773, cheese $798,744, and milk and cream $72,563. Exports of butter and cheese decreased, and those of milk and cream increased slightly, as compared with 1927. Imports of dairy products in 1928 had a value of $32,248,952, which was $3,508,615 lower than the value of those of the previous year. Of this import value, $24,695,314 was for cheese, $5,897,726 for cream, $1,659,402 for butter, and $996,510 for milk. Imports of cheese and milk were larger, while those of cream and butter were lower than in 1927—the butter imports being the lowest since 1918.

Exports of whale oil to the United States from Victoria, British Columbia, for the year 1928 amounted to 1,053,304 pounds with a value of $49,347 as compared with 2,320,000 pounds valued at $89,323 for the previous year.

The following figures are the exports of fish oils from Bergen, Norway, for the period of January 1 to January 26, 1929:—

	Barrels
Medicinal Cod Liver Oil	5,776
Industrial Cod Liver Oil	3,509
Greenland Shark Oil	248
Hardened Whale Oil	1,148
Whale Oil	170
Seal Oil	717
Herring Oil	12,972

Palm Oil Merger Planned

The African & Eastern Trading Company and the Niger Company, the two largest and oldest concerns engaged in the African palm oil industry, are to be merged. This was announced in cables received in New York early last week from London where the headquarters of the companies are located. At the offices of these companies in New York only the fact that plans for the merger have been completed was known, and final details are not expected to be available for several days or, perhaps, not for a week or two.

It is estimated that the African and Niger companies, which have been in existence for many years, now control about two-thirds of the palm oil industry of West Africa, the Niger company being a very important factor in the trade with this country. The New York offices of the Niger Company are located at 82 Beaver street, under the management of J. H. Redding, while the offices of the African & Eastern Trading Company are at 8 Bridge street, under the direction of R. G. Morris. Both companies also have branch offices in various other large cities in Europe and the Far East.

Tri-States Superintendents

Cottonseed oil mill superintendents from all over the Tri-States will establish headquarters at the Auditorium, Memphis, Tenn., June 18-19-20-21, for their annual convention.

All Memphis concerns representing out-of-town manufacturers will have exhibits at the Auditorium. Entertainments will be held at the Hotel Peabody.

R. D. Ryan of Bellevue Cotton Oil Co., president of the association, announced that oil mill superintendents from Illinois and Indiana would be invited to attend the exposition.

Leningrad Margarine Factory

The "Maslobone Zhirovoye Dyelo" states that the projected Leningrad margarine factory has been confirmed. This factory is designed to produce twenty tons of margarine, and it will be built on the ground of the Kassnaya Svyezda oil factory, next to the town slaughterhouse, as it is particularly convenient for the supply of raw materials. (Report from Assistant Trade Commissioner Frank Messenger at London, England.)

Solvay Issues Booklet

The Solvay Sales Corporation of 40 Rector Street, New York, has issued a most attractive brochure describing the alkali products of the Solvay Process Company, for which the former organization are exclusive sales agents. The booklet describes the grades, qualities and uses of soda ash, caustic soda, modified sodas, calcium chloride, chlorine, ammonium chloride and various chlorinated products, among others. Many useful tables relating to the dilution of alkali solutions and their properties are included. The booklet will be mailed without charge to any user of alkali products upon request.

The operation of revised freight rate schedules which involve substantial reductions in the freight rates on imported flaxseed from gulf ports to interior points was suspended by the Interstate Commerce Commission and an investigation ordered in I & S docket 3254.

The railroads proposed to establish proportional import commodity rates on carload shipments of flaxseed, so that, from New Orleans, the present rates of 77 cents per 100 pounds to Fredonia, Kans., and 56 cents to Kansas City, Mo., would be reduced to 30 cents per 100 pounds, while the present 60-cent rate to Omaha, Neb., would be reduced to 37 cents per 100 pounds.

P. H. Dorsett, agricultural explorer of the United States Department of Agriculture, and W. J. Morse, soybean specialist of the department, left Washington recently on a two-year expedition to the Orient. Soybean culture in Japan, Chosen, Manchuria and Java will be one of the main features of the exploration program.

The D. H. Litter Co., Inc., New York and Philadelphia, have been appointed exclusive selling agents for the Pacific Vegetable Oil Co. of San Francisco, who supply wood oil direct from the Orient. Stocks are carried in the East.

Arthur F. Berglund, Secretary of the Archer-Daniels-Midland Company, died at his home in Minneapolis on March 20, of pleural pneumonia. Mr. Berglund had been associated with the Midland and Archer-Daniels-Midland companies throughout his business career.

A Market Opportunity

Donald Renshaw, American Trade Commissioner at Singapore, writes to the Bureau of Foreign and Domestic Commerce, Department of Commerce, that a good market exists in the Straits Settlements for a cheap vegetable oil for cooking or eating purposes. There is considerable peanut oil consumed by the Chinese, who form a considerable portion of the population, but Mr. Renshaw advises that there is a demand among importers for other grades of oil. The complete text of his letter is as follows:—

7A, Ocean Building,
Singapore, S. S.

Director, Bureau of Foreign and Domestic Commerce,
Department of Commerce,
Washington, D. C.

Reference: 30.

SUBJECT: Samples of Vegetable Oil.

There is a good market in Brisish Malaya for a cheap vegetable oil, suitable for cooking or eating purposes. Statistics unfortunately do not separate cooking oils from fats, hence the extent of the local market is unknown, but from importers we learn that among the native population vegetable cooking oil is a staple article.

Peanut oil is a very popular oil among the Chinese, who use it for many purposes in addition to its use as a cooking oil. During 1927, the local market consumed over 220 tons of peanut oil alone valued at $2,500,000. Hongkong and China furnished practically all of this oil.

Corn oil and coconut oil have a limited sale here. It has occurred to us that possibly some of our cheaper grades of vegetable oil might be introduced to this market by having some American manufacturers send us samples together with c. i. f. prices. The actual possibilities of cotton seed oil and corn oil in this market are frankly unknown to us, until they have been tried out.

If American manufacturers could be interested, we, for our part, will be glad to see that the samples are properly tried out by interested importers.

Signed: Donald Renshaw.
American Trade Commissioner.

The oil storage building at the plant of A. Gross & Co., makers of stearic acid and red oil, Newark, N. J., which was destroyed by fire recently, is being rebuilt and is expected to be ready for occupancy in about a month.

Procter and Gamble Company have issued $12,500,000. of 5% cumulative preferred stock, par value $100. per share. Proceeds will be used to reimburse the treasury of the company for the redemption of the outstanding 6% cumulative preferred stock at 110 and accrued dividends, to provide funds for the large new plant now in course of erection at Baltimore, and for other corporate purposes.

Wesson Oil & Snowdrift Company, Inc., has declared a 100 percent stock dividend, payable to stock of record February 28.

Mathieson 300% Dividend

In announcing a stock dividend of 300 percent recently, the Mathieson Alkali Works declared one of the largest bonuses of the current year. This dividend is subject to the approval by the stockholders of an increase in the authorized common stock from 200,000 shares to 1,000,000 no par shares. The payment date of the dividend will be announced at a later date.

The annual report of the American Tung Oil Corporation is being distributed to the industry in a 10-page booklet. Excerpts from the report of Ludington Patton, president, follow:—

Development of the groves was continued during 1928. There was obtained from the groves approximately 30,000 pounds of tung oil fruit. This fruit has been carefully separated, the cluster variety being held in reserve for planting purposes, while the single fruiting variety will be used for crushing tests at the new mill recently erected in Gainesville by the Alachua Tung Oil Company. Many requests for seed for 1929 planting have been received by the corporation.

Estimates have been made which indicate that up to the fall of 1928 the acreage of tung oil planted in Florida as a result of the educational work of the American Tung Oil Corporation may aggregate approximately 4,000 acres. Further indications are that during the winter of 1929 an additional 1,000 acres of tung oil trees may be planted in the State of Florida.

After December 31, 1930, it is expected that the groves may be self-sustaining, and that the income from sales may be sufficient to keep the groves in condition in the future.

Ralph Bolton, president of the Ankeny Linseed Manufacturing Company, died at his home in Des Moines, Ia., on March 15, of acute asthma and heart disease after a very short illness.

AMERICAN OIL CHEMISTS' SOCIETY

Notes and Correspondence

Oil Chemists' Golf Tournament

N. C. Hamner, Chairman of the Golf Committee of The American Oil Chemists' Society Twentieth Anniversary Convention at New Orleans, May 13th and 14th, announces that the golf tournament to be held in connection with the convention will be a large and important event, with prizes offered in all handicap classes and a blind bogey handicap as well, which will give each participant the opportunity to win a prize. All members of the Society are urged to be sure to bring their golf clubs to New Orleans with them and take part in this tournament.

"Official" Cotton Seed Analysis

By LEHMAN JOHNSON

THE consensus of opinion among chemists who are called upon to make complete analysis of cottonseed, which includes, 1—Moisture. 2—Oil, 3—Ammonia and 4—Free fatty acids in the oil; is that the present "Official cottonseed analysis," as provided for in Rule 269 of the Interstate Cotton Seed Crushers' Association, must be discarded and a better method found and adopted in its place. The method is so poor and gives such discordant results that it is hardly worth while discussing except to point out its faults for the bearing they may have on finding a better method.

The faults of the "official" method are:—

1st Three different portions of the sample to be tested must be taken to secure the four analyses, a very decided objection and prolific source of error in material as irregular as cottonseed.

2nd The oil and ammonia tests are dependent for correctness upon two different tests for moisture on different portions of the sample, that is upon a test which at present is the least satisfactory and least uniform among chemists, namely the moisture test.

3rd A preliminary treatment of the seed by a chemical, HCl, is required before the analysis is begun, a decided disadvantage even if, as some chemists contend, increased solubility of something in the seed is not caused thereby, which would vitiate the oil test and certainly prevent the possibility of the free fatty acid test being made on the same portion on which the oil test is made.

4th "The eating of the pudding," the use of the analytical methods in practice on varying conditions of seed and by different chemists, shows that they are neither chemist nor fool proof. Complaint is loud and long against them.

Keeping these faults in mind and profiting by them it will certainly be a great gain if

A—We can simplify and render less expensive the over-elaboration of the cottonseed test.

B—We can carefully take one *and one only* portion of the sample of sufficient quantity to be fairly representative and make from that the four required tests.

C—We can use more of the chemist's inexpensive chemicals and thereby save more of the chemist's expensive time.

I suggest the procedure below and ask all chemists interested to set to work immediately on it to that we may present it or something better for adoption at our annual convention of the American Oil Chemists' Society in May.

Suggested Procedure for Simplified Seed Analysis

1—Take with all proper precautions a single portion of ten grams plus a leeway of one or two seed of the cleaned cotton seed as nearly representative of the sample as received as possible and make all four determinations on this single portion as follows:-

2—Crack, without grinding or separating, the entire portion in a mortar.

3—Weigh out exactly ten grams into a tared or balanced moisture dish.

4—Dry exactly four hours at 102-3 degrees C. for MOISTURE.

5—Immediately, without absorption of moisture, grind in an iron mortar (ten inch best with good heavy pestle) the whole after adding 2.5 grams of ground glass to the uniform mixture which is easily possible.

6—Place the whole in filter papers, using a Butt tube and a 50 cc. extraction flask having a file mark on the next showing 66 cc. contents when filled to this mark.

7—Add 30 cc. of the standard petrolic ether and extract four hours without regrinding.

8—Without evaporating the ether fill with more ether to the 60 cc. mark.

9—Mix thoroughly till all fat is dissolved. Remove and set aside for the free fatty acid test 30 cc. of the mixture.

10—Evaporate off the ether from the half portion remaining in the flask and weigh for OIL.

11—Remove the entire residue from the filter into an 800 cc., Kjeldahl flask which has a file mark on the neck to show when filled to 900 cc.

12—Add 1 gram of mercuric oxide, 15 grams of postassium sulfate and 50 cc. of sulfuric acid.

13—Digest in the usual way (the previous removal of the oil and moisture makes this fairly easy).

14—Fill with water to the 900 cc. mark. Pour off 600 cc., preserving in case duplicate or triplicate test for ammonia is wanted. Add the usual reagents, distill as usual and calculate AMMONIA.

15—Return to the 30 cc. petrolic ether oil solution. Add 15 cc. of neutral alcohol, 0.5 cc. of 1% phenolphthalein solution and titrate with tenth-normal alkali. The weight of the oil is known from the other half evaporated off for oil and the calculation is easy for—FREE FATTY ACID.

I happen to have a large sample of uniform cottonseed on which much cooperative work is being done and of which I will send a portion to any chemist applying who will send 10 cts. in stamps for container and postage and will report his results to me.
Memphis, Tenn.

Goldsboro, N. C.

The Editor,
Oil & Fat Industries,
New York, N. Y.

Sir:

Your readers may be interested in the following modification of the method for determining ammonia in cottonseed, which contains nothing new except the large quantity of seed taken for the analysis. I have tried out this method pretty thoroughly and have found it very satisfactory. The method is as follows:-

Weigh 17 grams of cottonseed into a Kjeldahl flask containing 2.5 grams metallic mercury, or its equivalent in mercuric oxide, and 50 grams anhydrous sodium or potassium sulphate. Add 125 ml concentrated sulphuric acid and digest for two hours. Cool. Make up to 500 ml and pipette 50 ml aliquot into the usual distillation flask. Add about 300 ml water and sufficient sodium or potassium sulphide solution to precipitate the mercury (half the quantity usually used is sufficient, since the aliquot employed contains only 0.25 grams of mercury). Add slightly more than enough sodium hydroxide solution to neutralize the acid present—the aliquot used contains 12.5 ml acid. Add zinc and distil in the usual manner, calculating the results on the basis of 1.7 grams sample. It is better to use an 800 ml Kjeldahl flask for the digestion because when such a large sample is used serious frothing sometimes occurs if the smaller flask is used. It will be found convenient to have a mark on the digestion flask at the 500 ml level so that the melt may be diluted to the proper volume without transferring to a regular volumetric flask. Distillations should be done in duplicate.

Very truly yours,
W. B. BYERS

19, Lockwood St.
Driffield.
Yorks. E.
England.

The Editor,
"Oil and Fat Industries"
136, Liberty St.
New York.
U. S. A.

Sir:

I am very sorry to see from the Editorial Note on Page 43, Vol. VI, No. 1, of the *"Oil and Fat Industries"* that I have not made myself clear on the question of heating with either hot water or with steam at the same temperature.

Your note refers to the amount of heat given up by saturated steam when heating another medium, being itself condensed at the same pressure in so doing. My remarks in the first paragraph that you asterisk refer neither to the amount of heat nor to the available heat on condensation.

You will see on re-reading the paragraph that my remarks refer entirely to the subject of rate of heat transference and the only reference to amount of heat is in reference to the furnace heating the two media. Unfortunately in paragraphing, a device not adopted by me in my original paper, you have separated the statement "the furnace is only called upon (in the case of the hot water closed circuit) to make good the loss" from its context. Moreover you have lost sight of the fact that rate of

transference is the subject of the sentence and *not* quantity of heat transmitted.

In the second statement that you asterisk I state that the "Sensible Heat" is liable to be lost. Since the "Total Heat" of the steam is this "Sensible Heat" plus the "Latent Heat" it follows that if the latent heat is used, as stated in the note, that the sensible heat is liable to be lost and thus my statement and your note on it are only different ways of saying the same thing. As you go on to remark, even this sensible heat may be largely recovered and I, in my paper, carefully covered this aspect by saying that the sensible heat is *liable* to be lost.

Under any given set of conditions it is the temperature of the heating medium which determines the actual rate of transference of heat. Now the question which I set myself to answer was "What is the comparison between the heat which must be supplied to cold water in order to use it as a heating medium in the form of (a) Hot water under pressure; (b) Steam at the same pressure. You will notice that the quantity of heat available for heating from the media did not enter into the question at all.

The answer to the question is that the hot water will require less heat than the steam to the extent of the latent heat of the steam for the pressure. (Note;—Owing to slight differences in the specific heats of the steam and of the hot water this answer is not *theoretically* accurate, but for all practical purposes it is.)

You will thus see that the statements as read are in order and therefore must stand as they were read.

You will pardon the length with which I have dealt with this matter but if the result is that a little less confusion exists regarding the matters of heat transference and quantity of heat transmitted the discussion will have been worth while.

Thanking you for the opportunity you have given me for replying to your Editorial Note, I am,

Yours truly,
THOMAS ANDREWS.

Louis M. Roeg, since 1925 chief chemist of Brewer & Company, Inc., Worcester, Mass. and recently reappointed Chairman of the Olive Oil Committee of The American Oil Chemists' Society, has become Sales Manager of Lucidol Corporation, Buffalo, N. Y., manufacturers of organic peroxides, which are used for bleaching oils, fats and waxes, as well as other substances.

Referee Applicant

Mr. Harry M. Bulbrook, Industrial Laboratories, Fort Worth, Texas, has applied for Referee Chemist's Certificate of the American Oil Chemists' Society on all products covered by the Rules of the Interstate Cottonseed Crushers' Association.

Conventions Scheduled

The thirty-third annual meeting of the Interstate Cotton Seed Crushers Association will be held May 15 to 17 at the Roosevelt Hotel, New Orleans. The rules committee will be in session May 13 and 14, also at the Roosevelt.

Arrangements have been made for reduced railroad rates on the certificate plan.

The program for the convention will include many important subjects for discussion and problems to be solved, among them the code of trade practice, unification or reorganization, seed grading and the like.

The thirty-fifth annual convention of the Texas Cotton Seed Crushers' Association will be held at El Paso June 5 to 7. The rules committee will meet June 3 and 4.

Swift & Co. has filed a complaint with the Interstate Commerce Commission seeking lower freight rates on shipments of fertilizer

Exports of China wood oil from Hankow and fertilizing compounds from its plant in Baltimore to points on Long Island.

Tunis Boosts Oils Duties

The duty on olive oil, pure or mixed, exported from Tunis to all destinations has been increased from 35 francs to 40 francs per 100 net kilos. The decree also increases the duty on olive husk oil exported to France or Algeria from 2.50 francs to 7.50 francs per 100 net kilos, effective on the same date. Another decree, effective January 1, increases the export surtax on olive husk oils originating in the fourth and fifth regions of Tunis from 1 franc to 1.50 francs per 100 net kilos. The duty on olive husk oil exported to foreign countries remains 15 francs per 100 net kilos.

V. H. Hunter, broker in vegetable and fish oils and New York representative of the Werner G. Smith Co., has removed his offices from the Woolworth Building to Room 3102, Chanin Building, 42nd St. and Lexington Ave.

Market Report on

FATS, OILS AND GREASES

(As of April 1, 1929.)

NEW YORK—The price trend for oils, fats and greases was generally downward throughout the recent period, a usual occurrence at this time of the year. The downward movement was accentuated by the uncertainty about contemplated tariff action. Consumers were holding off their purchases until they could learn what action to expect from Congress on the proposed tariff changes. Coconut oil and tallow were substantially lower. Corn oil lost its recent price gains. Cottonseed oil and linseed oil were both slightly lower as a result of forced liquidation on the various exchanges. Olive oil, olive oil foots and red oil were unchanged, with stearic acid lower. The only firmness noted was in rapeseed oil. Grease was slightly lower in keeping with the generally easier conditions in the market.

Coconut Oil

Coconut oil prices declined all along the line, and the various oils were quoted ¼c to ¾c lb. lower than at the close of last period. The offerings at these prices were light, keeping the market steady. Ceylon bbls. were priced at 9⅛c to 9¼c lb., with Manila at 9c to 9⅛c. Coast tanks were at 7⅝c to 7¾c lb. for Ceylon and Manila grades. Copra was lower at 4⅝c to 4¾c lb.

Corn Oil

Crude corn oil was priced substantially lower than at the close of last period. The recent price gains were pretty well wiped out during the period as a result of the general weakness of the market. Tanks were quoted at 8½c to 8⅝c lb., with bbls. at 11c. Refined was still priced at 12c, and the fatty acid at 11c.

Cottonseed Oil

The influence of the securities market caused a slight drop in the price of cottonseed oil. Prices were quoted lower as support was withdrawn from the market. The closing quotations were: crude, 8¾c lb.; P. S. Y., 10½c to 10¾c lb.; fatty acid, 11¼c lb.

Grease

Quotations were lower on all the greases in harmony with conditions in allied products. Demand was inactive. White grease was priced at 8⅜c to 9¾c lb., yellow and house at 8⅛c to 8¼c, and brown at 7⅞c to 8c lb.

Lard

Lard resisted the general tendency toward decline, and advanced ¼c lb. to 12c lb. on city tierces. Compound was slightly lower at the close, being priced at 12¼c to 12½c lb. Demand was moderately active.

Linseed Oil

Linseed lost the 10c a hundred gain which was recorded in the previous period, with the result that the base price for crude oil in car lots is now back at 10⅒c lb. Boiled oil in tanks was quoted at 9⅒c, with refined in bbls. at 10⅖c lb. Caked and meal were still unchanged in price.

Olive Oil and Olive Oil Foots

In spite of the fact that stocks were light and future deliveries uncertain, there were no changes in the prices of olive oil or olive oil foots. An advance might well have resulted, had it not been for the generally weakened condition of the market. Closing prices were $1.35 to $1.40 for oil, and 10½c to 11c lb. for foots.

Red Oil and Stearic Acid

Red oil was unchanged at previous prices. The market was quiet, but consumption was proceeding normally. The price of stearic acid dropped off during the period as a result of easier conditions in raw materials. Demand continued active. Double pressed was quoted at 16½c to 17c lb., with triple pressed at 18c to 18½c.

Rapeseed Oil

The market on this oil was firm due to reports from India that the yield of seed was expected to be about ⅛ below normal. Refined oil in bbls. was quoted at 86c to 87c lb.

Tallow

Tallow was quoted ¾c lb. under last month's closing quotations on all grades. Competition among sellers, coupled with the generally weak condition of the market caused the decline. Edible was priced at 9⅜c to 9⅝c lb., city extra at 8½c, and special at 8¼c.

Prices

Candles, adamantine 6s 16 oz.			
20-set cases	set.	.14½	.15¾
40-set cases	set.	.14	.14½
Candles, paraffin, cs., 14 oz., case of			
40 sets	set.	.10	.10¼
6s 14 oz., case of six cartons containing			
36 sets	set.	.11	.11¼
6s 12 oz., 40 set cases	set.	.09	.09¼
6s 12 oz. cases of six cartons containing			
36 sets	set.	.10	.10¼
Patent ends	set.	.17¾	.18
Stearin 6s 16 oz., plain, cases	set.	.16¾	.17
Castor, No. 1, bbls.	lb.	.13¾	.14
No. 3, bbls.	lb.	.13¼	.13½
Chinawood, bbls. or drs.	lb.	.14½	.14¾
Coast, tanks, spot	lb.	.13	.13⅛
Futures	lb.	.13	.13⅛
Coconut, Ceylon grade, bbls.	lb.	.09⅛	.09¼
Coast, tanks	lb.	.07⅝	.07¾
Cochin grade, bbls.	lb.	.09⅜	—
Manila, bbls.	lb.	.09	.09⅛
Tanks, N. Y.	lb.	.08	.08⅛
Coast tanks	lb.	.07⅝	.07¾
Fatty acids, mill, tanks	lb.	.12	—
Cod, Newfoundland, bbls.	gal.	.63	.64
Copra, bags, Coast	lb.	.04⅝	.04¾
Corn, tank, mills	lb.	.08½	.08⅝
Bbls., New York	lb.	.11	—
Refined, bbls.	lb.	.12	—
Fatty acid	lb.	.11	—
Cottonseed, crude, tanks, mill	lb.	.08¾	—
P. S. Y.	lb.	.10½	.10¾
Fatty acids, mill, bbls.	lb.	.11¼	
Degras, domestic, bbls.	lb.	.04¼	.05½
English, bbls.	lb.	.05	.05¼
German, bbls.	lb.	.03¾	.04¼
Neutral, domestic, bbls.	lb.	.07¾	.09½
English, bbls.	lb.	.08¼	.09
German, bbls.	lb.	.06½	.07
Greases, choice white, bbls. N. Y.	lb.	.08⅜	.09¾
Yellow	lb.	.08⅛	.08¼
Brown	lb.	.07⅞	.08
House	lb.	.08⅛	.08¼
Bone Naphtha	lb.	—	.08⅛
Herring, coast tanks	gal.	.45	.47
Horse, bbls.	lb.	.09½	.10
Lard, city, tierces	lb.	.12	—
Compound, tierces	lb.	.12¼	.12½
Middle Western, tierces	lb.	—	.12¼
Neutral, tierces	lb.	—	.14
Prime Western, tierces	lb.	.12½	—
Lard oil, No. 1, bbls.	lb.	.13	—
No. 2, bbls	lb.	.12¾	—
Extra, bbls.	lb.	.13½	—
No. 1, bbls.	lb.	.13¼	—
Winter strained, bbls.	lb.	.13¾	—
Prime, bbls.	lb.	.15½	—
Linseed Oil, boiled, taks	lb.	.0970	—
Car lots, bbls.	lb.	.1050	—
Less car lots, bbls.	lb.	.1090	—
Less than 5 bbls.	lb.	.1130	—
Double boiled, less than five bbls.	lb.	.1160	.1170
Raw, tanks	lb.	.0930	—
Car lots, bbls.	lb.	.1010	—
Less car lots, bbls.	lb.	.1050	—
Less than 5 bbls.	lb.	.1090	—
Calcutta, bbls.	lb.	.1590	—
Refined, bbls.	lb.	.1080	.1130
Varnish grades, bbls.	lb.	.1100	.1140
Linseed cake, bags	ton	47.00	48.00
Meal, bags	ton	57.00	—
Menhaden, crude, tanks, Baltimore	gal.	—	Nom.
Light pressed, bbls.	gal.	.71	.73
Yellow bleached, bbls.	gal.	.73	.75
White bleached, bbls.	gal.	.76	.78
Mustard, bbls.	gal.	.90	—
Neatsfoot, cold pressed, bbls.	lb.	.19	—
Extra, bbls.	lb.	.13½	—
No. 1, bbls.	lb.	.13¼	—
Pure, bbls.	lb.	.15	—
Oleo, No. 1, bbls.	lb.	.11½	—
No. 2, bbls.	lb.	.11	—
No. 3, bbls.	lb.	.10½	—
Olive, denatured, bbls., N. Y.	gal.	1.35	1.40
Shipments	gal.	1.25	1.27
Foots, bbls.	lb.	.10½	.11
Shipments	lb.	.10¼	.10½
Edible, bbls.	lb.	2.25	2.40
Palm, Lagos, casks spot	lb.	.09	.09¼
Shipments	lb.	.08¼	—
Niger, casks, spot	lb.	.08¼	—
Shipments	lb.	.07¾	—
Palm Kernel, pkgs.	lb.	.08¾	.09
Tank cars	lb.	.07¾	.07⅞
Peanut, crude bbls.	lb.	.12	—
Mills, tanks	lb.	.10¼	—
Refined, bbls.	lb.	.13½	—
Perilla, bbls.	lb.	.14½	Nom.
Poppy Seed, bbls.	gal.	1.70	—
Rapeseed, blown, bbls.	gal.	1.05	1.07
Refined, bbls.	lb.	.86	.87
Red Oil, distilled, bbls.	lb.	.11	.11½
Tanks	lb.	.10¼	—
Saponified, bbls.	lb.	.11	.11½
Tanks	lb.	.10¼	—
Salmon, coast, tanks	gal.	.42½	.45
Sardine, coast, tanks	gal.	.47½	.50
Sesame, refined, drums	lb.	.12½	.14
Soya Bean, blown, bbls.	lb.	.13¼	.13½
Crude, bbls.	lb.	.12¼	.12½
Orient, coast tanks	lb.	.09¾	.10
Sperm, bleached f.o.b., New Bedford, bbls.	gal.	.84	.86
Natural, f.o.b., New Bedford, bbls.	gal.	.78	.80
Stearic Acid, Double pressed, bags	lb.	.16½	.17
Triple pressed, bags	lb.	.18	.18½
Stearine oleo, bbls.	lb.	.11¼	.11½
Tallow, edible, bbls.	lb.	.09⅜	.09⅝
City extra, works, loose	lb.	.08½	—
Special, works, loose	lb.	.08¼	—
Tallow oil, acidless, bbls.	lb.	.11¾	—
Tanks, N. Y.	lb.	.11½	—
Vegetable tallow, coast, mats	lb.	.08⅛	—
Whale, crude, No. 1, coast, tanks	lb.	.07	—
No. 2, coast, tanks	lb.	.06½	—
Refined, winter bleached, bbls.	gal.	.80	—
Extra, bbls.	gal.	.82	—
Natural, bbls.	gal.	.78	—

Oleomargarine Amendment

(*From Page 23*)

which are used in oleomargarine, namely, the milk or cream in which oleomargarine compounds are mixed and emulsified, are "cooking compounds" and not oleomargarine.

Definition of Product Denied

IT was testified to before the Committee that one reason for these court decisions was that at the beginning of the development of this industry an official of the Bureau of Internal Revenue issued a permit for the manufacturer to make and sell without designating his products as oleomargarine. That ruling appears in the printed record of the hearings, and it is disclosed that this permit was coupled with certain restrictions relative to the methods of handling and sale; that is, that the product could be made and sold as a "cooking compound" as long as it was kept in distinctive packages, and its sale kept free from any efforts to make it a substitute for or in place of butter or oleomargarine.

Finding later that these considerations were not being observed, the Bureau of Internal Revenue sought to have the products declared to be oleomargarine within the meaning of the present law, but up to this time has been defeated in the courts both in equity actions upon injunction proceedings directed against the enforcement of the law as to these products, and in direct test cases of seizure for nonpayment of taxes.

Margarine Statistics

According to data collected at the 1927 biennial census of manufactures, establishments engaged primarily in the manufacture of oleomargarin and other butter substitutes reported products valued at $39,282,364, a decrease of 1.4 percent as compared with $39,856,034 reported for 1925, the last preceding census year. For the purposes of this report, all these products are covered by the single designation "oleomargarin." The total production of oleomargarin in the United States in 1927 was 293,455,016 pounds, valued at $51,688,564, of which 180,103,026 pounds, valued at $33,024,819, was made in establishments engaged primarily in the manufacture of this product: 86,651,746 pounds, valued at $14,501,799, was made in the slaughtering and meat-packing industry, and 26,700,244 pounds, valued at $4,161,946, was made as a secondary product of other industries.

This industry embraces establishments engaged primarily in the manufacture of the commodities known as "oleomargarin," "butterine," "nut margarin," "nut butter," etc. The materials used in their manufacture comprise both animal and vegetable substances, such as coconut oil, peanut oil, oleo oil, milk, butter, etc.

Of the 36 establishments reporting for 1927, 6 were located in California, 5 in Illinois, 4 in Rhode Island, 3 in Maryland, 3 in New Jersey, 3 in Ohio, 2 in Missouri, 2 in Wisconsin, and 1 each in Florida, Indiana, Kansas, Louisiana, Massachusetts, Tennessee, Texas and Washington. In 1925 the industry was represented by 38 establishments, the decrease to 36 in 1927 being the net result of a loss of 7 establishments and a gain of 5. Of the 7 establishments lost, 4 went out of business prior to 1927, 1 was idle throughout the year, and 2 reported commodities other than butter substitutes as their principal products and were therefore transferred to the appropriate industries. Of the 5 establishments gained, 1 had manufactured commodities other than butter substitutes as its chief products in 1925 and 4 reported for the first time at the present census.

Shortening and Oil Output

According to data collected at the 1927 biennial census of manufactures, establishments engaged primarily in the manufacture of lard substitutes, cooking fats and vegetable cooking oils reported products valued at $148,468,076. The total production of lard substitutes and cooking fats in 1927 was 1,239,046,167 pounds, valued at $142,571,286, of which amount 775,006,564 pounds, valued at $89,319,769, was made in establishments engaged primarily in the manufacture of these products; 438,036,969 pounds, valued at $50,331,376, was made in the slaughtering and meat-packing industry, and 26,002,634 pounds, valued at $2,920,139, was made as secondary products of other industries. The total production of vegetable cooking oils in 1927 was 515,615,999 pounds, valued at $50,134,530, of which amount 468,224,705 pounds, valued at $45,561,305, was made in the lard substitutes, cooking fats and vegetable cooking oils industry, and 47,391,294 pounds, valued at $4,573,225, was made as secondary products in other industries.

The establishments classified in this industry are engaged primarily in the manufacture of lard substitutes, cooking fats and vegetable cooking oils from animal and vegetable fats and oils.