

# From Washington

## **Margarines, shortenings to be analyzed for antioxidant use**

FDA has initiated a new compliance program for fiscal year 1983 to collect and analyze vegetable oil and shortening samples for antioxidant use and abuse. Districts are to collect samples at manufacturing locations during scheduled food inspections in conjunction with the Domestic Food Safety and Domestic Acidified and Low-Acid Canned Foods programs. Details: *Food Chemical News*, Nov. 8, 1982, pp. 7-8.

## **FDA proposes GRAS status for nickel used in hydrogenation**

The Food and Drug Administration has proposed affirming the Generally Recognized as Safe (GRAS) status of nickel as a catalyst in hydrogenation of fats and oils, with no level set other than that following current good manufacturing practice. FDA added that such practice includes removing nickel from fats and oils following hydrogenation. Details: *Food Chemical News*, Oct. 25, 1982, pp. 30-31; *Federal Register*, Tuesday, Oct. 19, 1982, pp. 46545-46547. Also, FDA has proposed affirming the GRAS status of beta-carotene as a direct food ingredient in a number of applications, including fats and oils. The accepted maximum level in fats and oils is 0.004%. Details: *Food Chemical News*, Nov. 1, 1982, pp. 35-36; *Federal Register*, Tuesday, Oct. 26, 1982, pp. 47335-47438.

## **FDA finds chloropropanediol esters in adulterated Spanish oil**

Food and Drug Administration researchers detected chloropropanediol esters in adulterated Spanish cooking oils which were associated with 300 deaths and 15,000 illnesses in Spain last year, according to Albert M. Gardner of FDA's Division of Chemical Technology. Discussing FDA's investigation of the adulterated oil before the October meeting of the Association of Official Analytical Chemists, Gardner said the chloropropanediol esters were not present in Spanish oil not linked to the illnesses. He added that toxicologists, however, have found no information implicating chloropropanediol esters as causing the disease in Spain. Details: *Food Chemical News*, Nov. 8, 1982, pp. 10-11.

## **NTB counselors recommend no testing for linoleic, linolenic**

The National Toxicology Program Board of Scientific Counselors has recommended that no testing be undertaken on cholesterol, cholesterol 5 $\alpha$ , linoleic acid and linolenic acid. Details: *Food Chemical News*, Oct. 4, 1982, pp. 15-16.

## **EPA bans toxaphene use on soybeans, peanuts, cotton**

The Environmental Protection Agency has ordered a ban on most uses of the pesticide toxaphene, including pest control on peanuts, soybeans and cotton. The ban, reported in The Food Institute's *Washington Food Report* on Oct. 23, 1982, was to go into effect 30 days after manufacturers of the chemical were officially notified by EPA. EPA made the ruling after reviewing studies linking toxaphene to reducing the populations of some fish, bird and other wildlife species and possibly causing cancer in humans.

**FDA publishes toxicology book  
on food and color additives**

The Food and Drug Administration's Bureau of Foods has published its "red book" entitled "Toxicological Principles for the Safety Assessment of Direct Food Additives and Color Additives Used in Food." Copies are available from Dockets Management Branch (HFA-305), FDA, Room 4-62, 5600 Fishers Lane, Rockville, MD 20857. Comments must be submitted by Jan. 15, 1983. Details: *Food Chemical News*, Oct. 18, 1982, p. 33.

**EPA establishes tolerances  
for glyphosate, permethrin**

The federal EPA has established a feed additive tolerance of 30 parts per million (ppm) for residues of the herbicide glyphosate and its metabolites in or on soybean hulls effective Oct. 27, 1982, in connection with an experimental use permit. Details: *Federal Register*, Wednesday, Oct. 27, 1982, pp. 47549-47550; *Food Chemical News*, Nov. 1, 1982, p. 2. In addition, EPA has proposed to exempt methyl bis (2-hydroxyethyl) alkyl ammonium chloride from a tolerance requirement where the carbon chain (C<sub>8</sub>-C<sub>18</sub>) is derived from coconut, cottonseed, soybean or tallow acids and when used as an adjuvant in pesticides. Details: *Federal Register*, Wednesday, Nov. 3, 1982, pp. 49874-49875. Another rule by EPA establishes a tolerance of 0.5 ppm of the insecticide permethrin in cottonseed, effective Oct. 13, 1982. Details: *Federal Register*, Wednesday, Oct. 13, 1982, pp. 45008-45010.

**1982 Economic Census forms  
deadline is Feb. 15, 1983**

Deadline for return of 1982 Economic Census forms is Feb. 15, 1983. The forms were to be mailed in late December or early January. The Census of Manufacturers covers the fats and oils business as part of the food industry, as well as soaps, detergents and personal care products as part of the chemical industry. The economic census seeks data on number of employees, payrolls, value of sales or shipments, cost of raw materials, capital investment, and manufactured products. About three million establishments will be surveyed; data for another five million small businesses will be obtained from government records. Preliminary data from the reports will be available late in 1983. The census is taken every five years.

**Researchers:  
soy protein use doesn't affect  
iron availability**

In a paper presented during the USDA Outlook Conference this past November in Washington, researchers reported preliminary analysis of data indicates that extending ground beef with soy protein (up to 20% of protein available) "did not adversely affect iron utilization in the children, women or men studied." The work was done after some studies indicated soy protein might reduce iron availability. The new work, by C.E. Bodwell and others, involved feeding soy protein and control diets to 20-28 participants (families or households) for 180 days. Details: Soy Protein Iron Utilization, speeches on human nutrition delivered during USDA Outlook '83 conference.

# **M O R E M O R E M O R E**

**World fat and oil supplies will continue to expand during the 1982/83 marketing year.**

Production during 1982/83 was forecast at 63.3 million metric tons (oil equivalency basis) during the U.S. Department of Agriculture's annual outlook conference in November by Phil Mackie, head of the fats and oils division of USDA's Foreign Agricultural Service. Total potential oil supply (production plus stocks) could be close to 70 million metric tons for 1982/83, although Mackie gave no estimate of carry-in stocks.

Supplies for the previous year included about 59.3 million metric tons production (oil equivalency basis) plus approximately 6 million metric tons of carry-in stocks for a total of about 65 million metric tons. For 1982/83, a larger U.S. soybean crop, crushed in the U.S. and in Europe, represents the largest portion of the projected increase. Larger supplies of sunflower oil and rapeseed oil forecast world wide account for most of the rest (Table I).

TABLE I

Potential World Fats and Oils Production<sup>a,d</sup>  
(in 1,000 metric tons)

	1978/79	1981/82 <sup>b</sup>	1982/83 <sup>c</sup>
<b>Edible vegetable</b>			
Soybean	11,705	12,931	14,737
Cottonseed	2,988	3,554	3,307
Peanut	3,301	3,202	2,937
Sunflowerseed	4,670	5,118	5,812
Rapeseed	3,658	4,166	4,647
Sesame seed	619	693	663
Safflower seed	326	301	234
Olive	1,577	1,256	1,989
Corn	466	525	600
Coconut	2,803	3,137	3,193
Palm kernel	634	876	929
Babassu	145	130	140
<b>Total</b>	<b>37,160</b>	<b>41,998</b>	<b>45,664</b>
<b>Industrial:</b>			
Linseed	736	634	764
Castor	390	357	371
Olive residue	106	71	126
Oiticica	14	14	15
Tung	101	90	100
<b>Total</b>	<b>1,347</b>	<b>1,166</b>	<b>1,376</b>

<b>Marine oils:</b>			
Fish	1,198	1,278	1,165
Whale	10	10	10
Sperm whale	58	58	58
<b>Total</b>	<b>1,266</b>	<b>1,346</b>	<b>1,233</b>
<b>Animal fats:</b>			
Butter (fat content)	4,987	4,962	4,782
Lard	3,941	3,804	3,804
Tallow and grease	5,814	6,038	6,038
<b>Total</b>	<b>14,742</b>	<b>14,804</b>	<b>14,624</b>
<b>Total (fats and oils)</b>	<b>54,515</b>	<b>59,314</b>	<b>62,898</b>

<sup>a</sup>Split year includes Northern Hemisphere crops harvested in the late months of the first year shown combined with Southern Hemisphere and certain Northern Hemisphere crops harvested in the early months of the following year. Animal, marine, and palm products are calendar year estimates for the second year shown.

<sup>b</sup>Preliminary.

<sup>c</sup>Forecast.

<sup>d</sup>Oil production calculated from assumed extraction rates represent potential not actual production.

Source: Counselor and attache reports, official statistics, FAS Washington estimates.

Date: November 1982.

No dramatic increase in demand for fats and oils is expected, so consumption may not increase as much as supplies. *Oil World*, a German weekly newsletter, has suggested, however, that while total fats and oils supplies at the end of 1982/83 may be larger in volume, they will represent a lower percentage of world use.

Total world oilseed production for 1982/83 was forecast at 184.9 million metric tons by Mackie, compared to an estimated 171.9 million metric tons for 1981/82. Of the 1982/83 total, U.S. production was estimated at 71.4 million metric tons, up from 64.4 million metric tons the previous year.

"The outlook for the world oilseeds sector in 1982/83 is essentially a repeat of last year," Mackie said. "We are looking at record world production of oilseeds and related products, and continued weak demand. This

will lead to a situation of lower prices and a buildup of stocks — particularly of soybeans."

World soybean supply for 1982/83 was estimated at 112.2 million metric tons by Mackie, with about 29.1 million tons expected to move into export channels. The export total includes about 25.6 million tons from the United States and 2.9 million metric tons from Argentina.

World soybean oil production was estimated at 13.75 million metric tons. Net world exports were forecast at 3.1 million metric tons, including 0.9 million metric tons each from the United States and Brazil, 0.5 million metric tons from EEC, and 0.5 million metric tons from Spain. World use was estimated at 13.71 million metric tons, including 4.4 million tons in the United States, 1.6 million tons in Brazil, 1.5 million tons in the EEC, and 0.7 million tons in India. Mackie forecast world soybean oil

stocks at the end of 1982/83 would be about 20.4 million metric tons, equivalent to about 1.2 months' supply, compared to a 1.3 months' supply at the end of 1981/82.

The three oilseed speakers at the Outlook Conference — Mackie, USDA Commodity analyst Sam Evans and Sparks Commodities vice president Carroll Brunthaver — all agreed on several factors that could affect ultimate usage. If the U.S. dollar weakens relative to other currencies, demand would increase for U.S. oilseeds and products. Brunthaver noted that Mexico and Eastern European nations would import more U.S. products if liberalized credit terms were available. Analysts were unable to say whether heavy Soviet soybean meal purchases in late November represented the USSR buying more of its annual needs at one time or the start of much greater use of soybean meal to

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**TABLE II**
**Potential U.S. Fats and Oils Production<sup>a</sup> (in 1,000 metric tons)**

	1978/79	1980/81	1981/82 <sup>b</sup>	1982/83 <sup>c</sup>
<b>Edible vegetable</b>				
Soybean	8,462	8,115	9,057	10,413
Cottonseed	625	655	937	696
Peanut	169	99	171	147
Sunflower	620	594	713	866
Safflower	57	36	31	34
Corn	337	373	380	380
<b>Industrial</b>				
Linseed	74	67	66	100
<b>Marine oils</b>				
Fish	122	83	160	90
<b>Animal fats</b>				
Butter (fat content)	358	445	435	435
Lard	517	454	408	408
Tallow and grease	3,112	3,351	3,351	3,351
<b>Total fats and oils</b>	<b>14,454</b>	<b>14,272</b>	<b>15,710</b>	<b>16,919</b>

<sup>a</sup>Split year includes crops harvested in the late months of the first year shown. Animal and marine products are calendar year estimated for the second year shown. Oilseed oil production calculated from assumed crushing rates applied to that portion of each crop available for crushing and/or export represent potential but not actual production.

<sup>b</sup>Preliminary.

<sup>c</sup>Forecast.

Source: Counselor and attache reports, official estimates, FAS Washington estimates.

Date: November 1982.

improve the nutritional value of livestock feed. If the latter, then world demand for soybean meal could rise and so could prices. As always at the Outlook Conference, speakers noted planting of South American soybean acreage was under way, but no accurate estimates of the crop could yet be made. Brunthaver said his firm anticipates about 13.5 million metric tons of soybeans to be produced in Brazil, 4.9 million metric tons in Argentina.

There was relatively little discussion of oils other than soybeans, but Mackie noted that European mills will be busy crushing European rapeseed and U.S. soybeans and this probably will mean reduced exports of sunflowerseed — and increased exports of sunflower oil — from

the U.S. to Europe.

Demand for soybean meal is stronger than that for oil, so the meal demand affects fats and oils production. Soy meal remains an economically attractive feed for European livestock relative to grains, so increased use may be recorded there.

For the domestic outlook, Evans said large supplies and low prices will dominate soybean trade. Evans estimated 1982 U.S. soybean production at 2.3 billion bushels (62.6 million metric tons), 14% above 1981. This coupled with carry-in stocks of 268 million bushels could push total U.S. soybean supplies to a record 2.57 billion bushels.

Evans said 1982/83 domestic soybean consumption could reach 2.12 billion bushels, up 3%

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from 1981/82. His projections showed domestic crush about 1.09 billion bushels, up 60 million bushels from last season, with exports reaching 940 million bushels, an increase of 11 million bushels. Ending stocks are expected to total 450 million bushels. Evans said domestic soybean oil consumption could reach a record 9.8 billion pounds while exports will remain about the same as last season's 2.08 billion pounds, resulting in 1.1 billion pounds in stocks. Domestic soy meal use, he said, could total 18.1 million tons, with exports of 7.85 million tons, leaving stocks of 225 thousand tons.

Evans forecast domestic prices of \$5.25 to \$5.75 a bushel during the marketing year, compared to an average season price of \$6.08 in 1981/82. Brunthaver said prices may be higher during the first half than during the latter.

Looking ahead to planting, Evans said soybean acreage in 1983 could drop to 70 million acres. He cited factors as lower soybean prices, stronger incentive for farmers to participate in the feed grain acreage reduction program and continued high participation in cotton program support.

Projections for other major U.S. oilseed crops outlined by Evans in his text include the following:

**Sunflower seed.** U.S. sunflower seed crushings may reach 800,000 metric tons, partially as a result of a crushing capacity increase created with two new plants in North Dakota. The 1982 harvest is estimated to reach 2.5 million metric tons, up from nearly 2.1 million the previous year. Exports of sunflower oil, meanwhile, are expected to jump 76%, to 180,000 metric tons.

**Cottonseed.** A crop of 2.2 million metric tons is estimated, down from nearly 2.9 million met-

TABLE III

U.S. Exports of Soybean Oil, Sunflowerseed, Sunflowerseed Oil, Cottonseed Oil, and Peanuts: Marketing Years 1979/80-1982/83 (in 1,000 metric tons)

	1979/80	1980/81	1981/82	1982/83
<b>Soybean Oil</b>				
Brazil	76	0	6	
Other South America	179	220	207	
North America	133	121	181	
India	428	62	68	
Pakistan	147	126	260	
China	100	26	0	
Eastern Europe	4	42	26	
<b>Sunflowerseed (Sept.-Aug.)</b>				
Production	3,409	1,748	2,098	2,547
Exports	1,821	1,505	1,555	1,500
EC	1,247	945	542	
Portugal	221	225	176	
Mexico	198	272	620	
Spain	0	1	145	
<b>Sunflowerseed Oil (Oct.-Sept.)</b>				
Production	224	298	137	315
Exports	86	301	103	180
EC	4	62	1	
Venezuela	33	89	31	
Algeria	12	80	5	
Egypt	10	43	3	
USSR	0	0	41	
<b>Cottonseed Oil (Oct.-Sept.)</b>				
Production	645	542	710	594
Exports	330	322	384	322
Venezuela	72	109	91	
Egypt	157	76	156	
Japan	23	40	41	
Dominican Republic	28	33	27	
<b>Peanuts (Aug.-July)</b>				
Production	1,800	1,044	1,809	1,557
Exports	360	172	196	250
EC	204	101	106	
Canada	65	31	44	
Japan	30	13	16	

EC = European Economic Community.

ric tons in 1981. Despite lower production and a decrease in stocks, cottonseed prices are expected to average even lower than last season's depressed levels. Record soybean oil supplies will keep cottonseed oil and meal prices relatively low, with cottonseed prices expected

to average \$75 a short ton.

**Peanuts.** Supplies of peanuts for export will exceed demand, leading to lower farm prices this year. The 1982 harvest is estimated at 1.6 million metric tons, down from 1.8 million metric tons in 1981.