

TRENDS AND DEVELOPMENTS

Additions to the Fleet of U. S. Fishing Vessels

First documents as fishing craft were issued for 68 vessels of 5 net tons and over during March 1954--16 more than in March 1953 (see table). The west coast of Florida led with 20 vessels, followed by Texas with 14 vessels, and Washington with 6 vessels.

Vessels Obtaining Their First Documents as Fishing Craft, March 1954 and Comparisons					
Section	March		Three months ending with March		Total 1953
	1954	1953	1954	1953	
	Number	Number	Number	Number	Number
New England	2	-	3	2	20
Middle Atlantic	-	4	-	4	19
Chesapeake	4	8	23	17	83
South Atlantic	6	7	23	19	116
Gulf	41	16	108	50	264
Pacific	11	12	22	21	164
Great Lakes	1	-	3	2	7
Alaska	3	5	7	10	53
Hawaii	-	-	-	-	3
Total	68	52	189	125	729

Note: Vessels have been assigned to the various sections on the basis of their home port.

In the first quarter of 1954, a total of 189 vessels received their first documentation as fishing vessels, the largest first-quarter total since 1947, according to the Bureau of the Customs.

The Gulf States led in the documentation of fishing craft during January-March 1954 with 108 vessels. The Chesapeake and South Atlantic States followed with 23 vessels each, while 22 vessels were documented in the Pacific Coast States during the quarter.



Alaska Fur-Seal Skin Prices Rise at Spring Auction

Prices for Government-owned fur-seal skins at the semiannual auction held in St. Louis on April 12 showed an average price of \$91.93 per skin as compared with \$71.73 at last October's auction, the Secretary of the Interior announced recently. The rise restores prices to the general level of last year's April auction and compensates for the October decline.

A total of 25,038 skins, products of the sealing industry administered by the Department of the Interior's Fish and Wildlife Service at the Pribilof Islands, Alaska, brought \$2,301,646. This compares with 27,113 skins sold for \$1,944,920 at the October 1953 sale.

Matara-processed skins advanced 28.3 percent. A total of 13,629 of these brown skins was sold at an average of \$88.47 per skin. This compares with 16,017 sold in October at a \$64.03 average. Safari-processed skins showed a rise of 33.8 percent. A total of 1,609 of these lighter brown skins brought an average price of \$62.36. At the October auction 2,900 of these skins sold for an average of \$45.23 each. Black skins climbed 2.2 percent. A total of 9,800 brought an average of \$101.59 per skin as compared with 8,196 averaging \$96.17 in October.



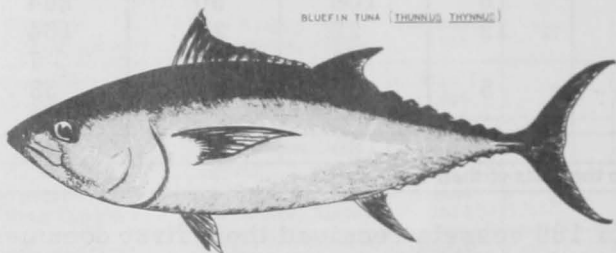
Because sizes and qualities of skins differ somewhat from one auction to another, the comparisons must be considered relative.



Bluefin Tuna Tagging

Commencing in mid-May a bluefin tuna tagging program was begun by a Woods Hole Oceanographic Institution biologist operating from the Lerner Marine Laboratory at Bimini in the Bahama Islands, reports a May 14 release from the Woods Hole, Mass., organization. The tagging will be done in order to learn more about the migration routes of tuna, and the final results will be of benefit to fishermen.

The biologist will set out with the cooperation of sportfishermen to tag the large bluefin tuna at the time of the year when they pass the Bahamas on their northward trek. The biologist and cooperating fishermen will hook the fish by the conventional method, bring it alongside the boat, and then harpoon a small stainless steel dart into the tuna. Attached to the dart is a thin ten-inch plastic streamer marked with a number and the words: "Reward, W.H.O.I., Woods Hole, Mass., U.S." The dart is numbered also in case the streamer is defaced or lost. A reward of \$1 is offered to the fisherman returning a tag from a captured tuna.



BLUEFIN TUNA (*THUNNUS THYNNUS*)

The hook on which the tuna was caught for the tagging will sometimes also be left in the mouth with a number stamped on a sleeve around the shank of the hook. Some tuna will be branded with a number or symbol while others may have all three methods applied. Although in previous years marked hooks have been left in the mouths of large tunas, no returns have come in so far. It is hoped that the new method will have better results although it is not inconceivable that the marked fish may swim around for years before getting caught.

Until recently no satisfactory way to tag the swift and roving game fishes of the sea had been developed. Other migratory fishes have been tagged successfully for years. It is one thing to mark a cod or haddock and another thing to mark a fighting, beating tuna. Last year the California Department of Fish and Game developed a new method for tagging tuna by sewing and knotting a small plastic loop through the back of small tuna just behind the second dorsal fin. Among the recovered fish one albacore was found to have covered a distance of 4,650 miles from California to Japan in 324 days, swimming an average of 15 miles per day.

The drawback to the sewing method is that the fish has to be brought into a boat and held tight in a wooden trough, so that it will not beat itself to death. This method

A total of 32 light stations were occupied and 39 sets were made with the blanket net: 11 stations yielded sardines, 2 yielded anchovies, 5 Pacific mackerel, and 4 jack mackerel. Other species taken by the blanket net included: round herring, thread herring, jacksmelt, topmelt, grunion, slough anchovy, saury, sierra, queenfish, salem, true pompano, California pompano, California barracuda, and squid.

Sardines were taken along the Baja California coast with the greatest concentration occurring in the vicinity of San Juanico Bay. Numerous schools of juvenile northern anchovies were observed in Turtle Bay. The Yellowfin traveled 295 miles while scouting for fish, 37 schools were observed; 26 of these were believed to be sardines, 2 saury, and 9 were unknown.

Sea surface temperatures ranged from 12.4° C. (54.3° F.) to 16.7° C. (62.1° F.) in Baja California. Sardines were taken where surface temperatures ranged from 12.7° C. (54.9° F.) to 16.1° C. (61.0° F.).

A total of 27 yellowtail were tagged and released in the area covered by the survey. One of the tagged fish was caught trolling in 15 fathoms of water off San Juanico Point, and the remaining 26 were caught trolling on Hutchins Bank. Seventeen of these fish were tagged with the new commercially-printed and laminated plastic jaw tags, and 10 were tagged with vinylite tubing tags. Scale samples were taken from 17 of the tagged fish.

Because of prevailing heavy seas and high winds throughout the cruise, the survey was limited almost entirely to sheltered areas. Ocean waters in the survey area were extremely murky along the entire coast.



Cans--Shipments for Fishery Products, January-March 1954



Total shipments of metal cans for fish and sea food during January-March 1954 amounted to 13,118 short tons of steel (based on the amount of steel consumed in the manufacture of cans), compared to 13,882 short tons for the same period last year.

Note: Statistics cover all commercial and captive plants known to be producing metal cans. Reported in base boxes of steel consumed in the manufacture of cans, the data for fishery products are converted to tons of steel by using the factor: 23.0 base boxes of steel equal one short ton of steel.



Federal Purchases of Fishery Products

FRESH AND FROZEN FISHERY PRODUCTS PURCHASED BY DEPARTMENT OF THE ARMY, APRIL 1954: The Army Quartermaster Corps in April 1954 purchased 1,825,048 pounds (valued at \$754,744) of fresh and frozen fishery products for the military feeding of the U. S. Army, Navy, Marine Corps, and Air Force (see table). This was 33.1 percent greater in quantity and 18.3 percent higher in value than purchases in March; compared with a year ago, April purchases were higher by 25.4 percent in quantity and 15.3 percent in value, respectively.

Purchases of Fresh and Frozen Fishery Products by Department of the Army (April and the First Four Months of 1954 and 1953)							
QUANTITY				VALUE			
April		January-April		April		January-April	
1954	1953	1954	1953	1954	1953	1954	1953
Lbs.	Lbs.	Lbs.	Lbs.	\$	\$	\$	\$
1,825,048	1,455,915	6,946,175	5,826,872	754,744	654,757	3,001,900	3,125,183

Fresh and frozen fish purchases by the Army Quartermaster Corps during the first four months in 1954 totaled 6,946,175 pounds (valued at \$3,001,900)--19.2 per cent more in quantity, but 3.9 percent lower in value as compared with the similar period a year earlier.

The over-all average price paid for fresh and frozen fishery products by the Department of the Army in April was 41.3 cents per pound, compared with 46.5 cents in March and 45.0 cents in April 1953.

In addition to the purchases of fresh and frozen fishery products indicated above, the Armed Forces generally make some local purchases which are not included in the above figures. Therefore, actual purchases are somewhat higher than indicated, but it is not possible to obtain data on the local purchases made by military installations throughout the country.



Florida

RED TIDE RESEARCH VESSEL DELIVERED TO SERVICE: A new research vessel was delivered to Ft. Myers, Florida, on May 14 for use in studying ocean conditions which cause red tides, a marine plague that kills millions of fish in west coast Florida waters, Secretary of the Interior McKay announced on May 24.

The new vessel, now partially equipped, will be used immediately by the U. S. Fish and Wildlife Service, for limited operations until it is fully outfitted with instruments to measure water temperatures and to obtain water samples for tracing occurrences of the microorganism which cause red tides. Final outfitting was to be completed in early June.

The vessel will be used to make routine surveys to locate concentrations of microorganisms and to experiment with control chemicals, and to pursue studies of ocean currents along the Florida coast.

Red tides result from rapid reproduction of a microbe called Gymnodinium brevis, which is so small that it is invisible to the human eye. Billions of these microscopic creatures color the sea water red or amber because of pigment granules contained in each one.

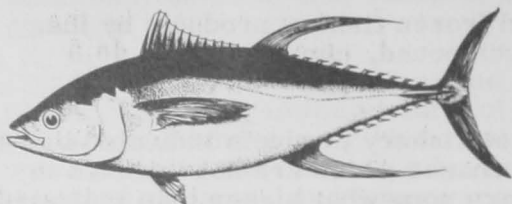
Poisons, which are deadly to fish and other marine animals, are also produced. These are sometimes carried inland in tiny droplets and wind-borne spray causing persons in areas near the beaches to develop symptoms similar to a cold or severe respiratory irritation.

After a large outbreak in 1946-47, the Fish and Wildlife Service commenced biological studies to learn the principles underlying causes of red tides, with the aim of developing control or preventive measures. The studies to date indicate that they seem to occur after periods of heavy rain followed by light winds blowing toward the shore. The water, enriched by land drainage, is held along the coast, thus developing conditions suitable for rapid reproduction of the microorganisms. As fish are killed, their decaying bodies are believed to release nutrients to the waters. These nutrients may nourish the bloom and serve to intensify it.



Gulf Exploratory Fishery Program

GOOD YELLOWFIN TUNA CATCHES IN GULF OF MEXICO BY "OREGON"
(Cruise 23): Significant catches of large yellowfin tuna in the Gulf of Mexico were reported in a brief message from the Service's exploratory fishing vessel Oregon on May 19. The vessel has been fishing with floating long-line gear near the 92nd meridian in the central Gulf and in the Gulf of Campeche to waters off Vera Cruz, Mexico.



Yellowfin Tuna (*Neothunnus Macropterus*)

Using only experimental quantities of long line, the Oregon has taken tuna on every set in this area of the Gulf. The best catch to date was six large yellowfin tuna caught on a set of approximately 200 hooks. A few shark and marlin have also been taken along with the tuna. The successful catches indicate a wide distribution of tuna in the Western Gulf at this season of the year. The report indicated that the tuna appeared to be spawning in these waters.

The Oregon is scheduled to terminate this cruise at Pascagoula on June 16.



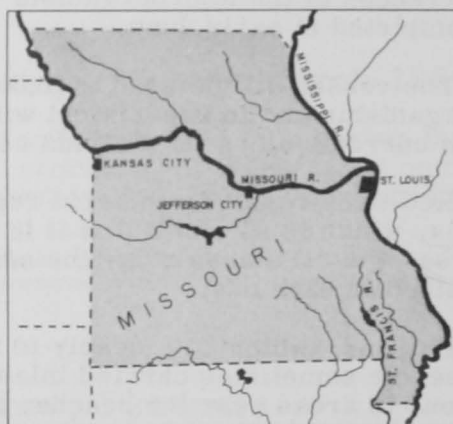
Missouri

COMMERCIAL FISH CATCH, 1953: The total commercial fish catch by Missouri fishermen in 1953 was about 384,322 pounds, about 25 percent less than the previous year, according to data gathered by the Missouri Conservation Commission.

The low water resulting from drought conditions and pollution in some sections curtailed fishing somewhat, but also there were fewer commercial fishermen. Only 1,039 Missourians purchased commercial-fishing permits in 1953 as compared to 1,247 in 1952.

Mississippi River fishermen reported catching 198,685 pounds of fish; Missouri River fishermen took 184,160 pounds; and St. Francis River fishermen only 1,477 pounds. The live-weight retail value of the total harvest amounted to about \$95,000. Carp ranked first in Missouri's commercial fish catch. Other species taken included buffalo, flathead catfish, drum, blue catfish, paddlefish, gar, channel cat, quillback, suckers, sturgeon, dogfish, bullheads, and eel.

About 506 fishermen operated on the Mississippi River, 519 on the Missouri River, and 14 on the St. Francis River. These fishermen purchased permits for 4,000 yards of seines, 26,600 yards of trammel nets, 2,471 hoop nets, and 71,000 hooks.



North Carolina

OUT-OF-STATE SHRIMP TRAWLER REGULATIONS TO BE RIGIDLY ENFORCED: The regulations covering out-of-state shrimp trawlers operating in North Carolina-controlled waters will be enforced "without fear or favor," the Board of Conservation and Development announced recently.

This regulation, designed to protect North Carolina fishermen and to encourage use of state ports by shrimp fishermen, provides that any person, firm or corporation, other than a common carrier, who takes out of the State of North Carolina in any trawler or other vessel owned by a non-resident any shrimp taken in the inland commercial waters of the State will, upon conviction, be punished by law. All shrimp so taken will be confiscated and sold or otherwise disposed of in the best interests of the State. Non-resident shrimpers may have the same shrimping privileges permitted to resident shrimpers of North Carolina if they comply with state laws by paying the usual license fees and taxes imposed by this State for commercial fishing. Under the Board's regulation, shrimping privileges in North Carolina waters will not be extended to any non-resident shrimper seeking to operate in the State's inland commercial waters if the state of which he is a resident and in which his boat is registered prohibits North Carolina shrimpers from operating in the inland waters of that state.

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FISHERIES RESEARCH VESSEL LAUNCHED: The Machapunga, a 46-foot fishing vessel, built solely for fisheries research, was launched at Williston, N. C., recently. The vessel is the property of the University of North Carolina Institute of Fisheries Research, and has been especially designed to work in the shoal waters of the sounds as well as in the ocean. It is equipped with a recording depth finder, automatic steering device, radiotelephone, oceanographic winch, trawl winch, standard-sized otter trawl, oyster dredge, plankton nets, water samplers, and temperature-measuring devices for different levels. The Machapunga was designed by the staff of the Institute, reports the Service's Fishery Marketing Specialist in North Carolina.



Pacific Salmon Investigations

FINGERLING SALMON DIVERTED BY LIGHT: The effect of light on migrating fingerling salmon is being studied by the Service's Pacific Salmon Investigations and the Washington State Department of Fisheries. At the Department's fish-counting weir on Minter Creek, Washington, a row of lights above the surface of the water is extended diagonally from the weir to the shore.

Very young salmon, according to first results, are diverted in this manner. During nights when lights were operated fewer fish were taken on the side with lights than on nights when lights were not used. The lights significantly change the results for both fry and yearlings of silver and chum salmon.



U. S. Canned Packs of Selected Fishery Products, 1953

SHAD: The United States pack of canned shad in 1953 amounted to 7,603 standard cases, valued at \$57,571 to the canners (table 1). This pack was 437 cases

State	Quantity	Value to Canners	Canners' Avg. Price
	<u>Std. Cases^{2/}</u>	\$	<u>\$/Std. Case^{2/}</u>
Maryland, Oregon, and California ..	7,603	57,571	7.57

^{1/}Preliminary.
^{2/}Cases of various sizes converted to the uniform basis of 48 No. 1 tall cans to the case, each can containing 15 ounces net.

less than the previous year and was only a fraction of the record 1944 pack of 41,368 cases. In 1953 shad were canned in 4 plants in Oregon, and 1 plant each in Washington and California.



Shad fishing in the Hudson River.

The 1953 average price of \$7.57 per standard case to the canners (table 2) was only very slightly higher than the 1952 average of \$7.54, but 6 percent less than the \$8.05 in 1951.

Year	Pacific Coast			Atlantic Coast			Total		
	Quantity	Value to Canners	Canners' Avg. Price	Quantity	Value to Canners	Canners' Avg. Price	Quantity	Value to Canners	Canners' Avg. Price
	<u>Std. Case^{2/}</u>	\$	<u>\$/Std. Case^{2/}</u>	<u>Std. Case^{2/}</u>	\$	<u>\$/Std. Case^{2/}</u>	<u>Std. Case^{2/}</u>	\$	<u>\$/Std. Case^{2/}</u>
1953 ^{3/}	7,603	57,571	7.57	-	-	-	7,603	57,571	7.57
1952	4/8,040	4/60,607	7.54	4/	4/	-	8,040	60,607	7.54
1951	10,130	79,753	7.87	698	7,372	10.56	10,828	87,125	8.05
1950	14,049	89,851	6.40	-	-	-	14,049	89,851	6.40
1949	12,984	96,194	7.41	851	10,000	11.75	13,835	106,194	7.68
1948	11,908	110,196	9.25	2,865	26,655	9.30	14,773	136,851	9.26
1947	18,808	169,777	9.03	3,910	29,496	7.54	22,718	199,273	8.77
1946	5/	5/	-	5/24,403	5/224,387	9.20	24,403	224,387	9.20
1945	1,996	17,810	8.92	17,345	182,554	10.52	19,341	200,364	10.36
1944	17,820	103,003	5.78	23,548	243,239	10.33	41,368	346,242	8.37
1943	14,171	78,762	5.56	3,860	48,618	12.60	18,031	127,380	7.06

^{1/}Does not include the production of canned smoked shad.
^{2/}Cases of various sizes converted to the uniform basis of 48 No. 1 tall cans to the case, each can containing 15 ounces net.
^{3/}Preliminary.
^{4/}A small-pack of Atlantic Coast shad included with the Pacific Coast production.
^{5/}A small pack of Pacific Coast shad included with the Atlantic Coast production.

No shad were canned on the Atlantic Coast in 1953. During the years 1944 to 1946, as a result of wartime demand for canned shad, over 20,000 cases of these fish were packed on the Atlantic Coast.

MAINE SARDINES (INCLUDING SEA HERRING): The pack of Maine sardines (including sea herring) in 1953 amounted to 2,782,495 standard cases, valued at \$16,954,119 to the packers--a decrease of 21 percent both in quantity and value as compared with the previous year (table 1). Sardines (including sea herring) were canned in 44 plants in Maine and 2 in Massachusetts.

Table 1 - Maine Sardine (Including Sea Herring) Pack by Style of Pack, 1953

Style of pack	Quantity	Value to Cannerns
	Std. cases	\$
Natural, without sauce or oil	483,926	1,595,912
In soybean oil	1,599,522	11,470,872
In mustard sauce	302,378	2,001,731
In tomato sauce	366,139	1,634,339
In olive oil	16,127	138,208
Other 1/	14,403	113,057
Total	2,782,495	16,954,119

1/Includes special packs of sardines (including sea herring) in cottonseed oil, peanut oil, and kippered.
 Note: "Standard cases"--cases of various sizes converted to the uniform basis of 100 1/4-oz cans (3-1/4 oz. net) to the case.

Table 2 - Maine Sardine (Including Sea Herring) Pack by Size of Can and Case, 1953

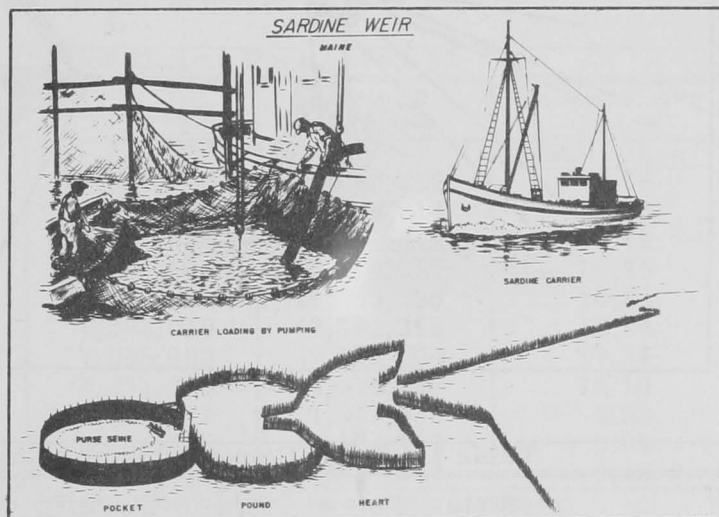
Can Contents and No. of Cans Per Case	Quantity	Value to Cannerns
	Actual cases	\$
3 1/4 oz. net (100 cans) ..	1,833,567	13,348,682
5 oz. net (100 cans) ...	24,887	172,089
9 oz. net (48 cans)	94,433	659,599
10 oz. net (48 cans) ...	10,986	77,170
15 oz. net (48 cans) ...	338,757	2,629,415
Other sizes converted to 3 1/4 oz. net (100 cans)	18,415	67,164
Total	2,321,045	16,954,119

The pack in the standard 3 1/4-ounce cans (100 to the case) amounted to 1,833,567 cases as compared with 2,952,735 cases the previous year (table 2). The pack in 15-ounce cans (48 to the case) in 1953 amounted to 338,757 cases, a sharp increase compared with the previous year when 169,735 of these cases were packed.

Table 3 - Pack of Maine Sardines (Including Sea Herring), 1948-53

Year	Quantity	Value to Cannerns
	Std. cases	\$
1953	2,782,495	16,954,119
1952	3,530,876	21,502,970
1951	1,676,764	14,635,352
1950	3,844,164	21,209,033
1949	3,074,523	21,051,675
1948	3,682,392	29,359,114

Note: The pack of herring previously reported as "canned sea herring" has been converted to the equivalent of 100 1/4-oz cans (3-1/4 oz. net) to the case and included with the pack of sardines.



The Maine pack of sardines and sea herring is canned from fish taken by Maine fishermen and imports from Canada. In 1953 the United States catch of these fish amounted to 100,586,000 pounds, while imports from Canada totaled 23,175,000 pounds. In the previous year the catch was 144,661,000 pounds and imports amounted to 30,341,000 pounds.

The over-all cannerns' average price for Maine sardines in 1953 was \$6.09 per standard case, compared with \$6.19 in 1952 and \$8.73 in 1951. However, prices for each style of pack were higher in 1953 than in 1952; the decline in the cannerns' standard case average price was due entirely to a larger production of the lower-priced natural pack.

SHRIMP: The United States pack of canned shrimp in 1953 totaled 1,016,116 standard cases, valued at \$18,946,622 to the canners, or an average price of \$18.65

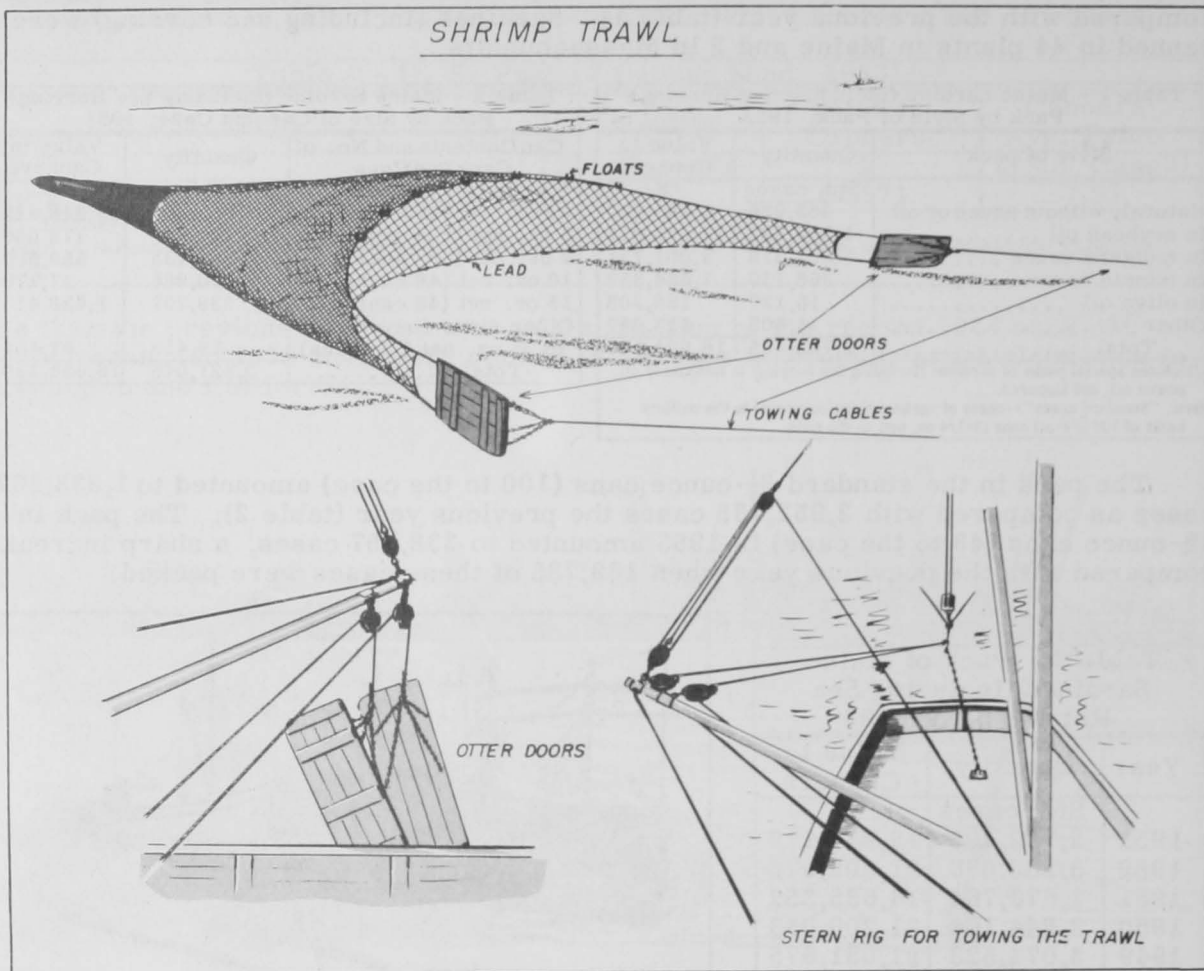


Table 1 - U. S. Canned Shrimp Pack by States, 1953^{1/}

State	Quantity Std. Cases ^{2/}	Value to Canners \$	Canners' Avg. Price \$/Std. Case ^{2/}
Mississippi	204,665	4,116,067	20.11
Louisiana ^{3/}	742,372	13,345,175	17.98
Alabama, South Carolina, and Georgia	69,079	1,485,380	21.50
Total	1,016,116	18,946,622	18.65

^{1/}Preliminary.

^{2/}Cases of various sizes converted to the equivalent of 48 cans to the case, each can containing 5 ounces net.

^{3/}Includes a small pack of dry shrimp.

per standard case (table 1). This is the first time since 1940 that canned shrimp production has exceeded one million cases, and the value is the highest on record.

Louisiana canners packed 73 percent of the 1953 production, while Mississippi canners accounted for 20 percent. The remaining 7 percent was canned in South Carolina, Georgia, and Alabama.

The bulk of the canned shrimp was put up in 5-ounce cans in 1953, packed 24 and 48 cans to the case (table 2). Most of the remainder was packed in 4½-ounce cans.

Table 2 - U. S. Canned Shrimp Pack by Can and Case Size, 1953^{1/}

Can Size and No. of Cans Per Case	Quantity	Value to Canners	Canners' Avg. Price
	Actual Cases	\$	\$/Std. Case ^{2/}
4½ ounces net (24 cans)	309,575	3,361,691	10.86
4½ ounces net (48 cans)	33,635	450,666	13.40
5 ounces net (24 cans)	758,007	6,669,440	8.80
5 ounces net (48 cans)	438,005	7,721,003	17.63
7 ounces net (24 cans)	7,201	134,113	18.62
38 ounces net (12 cans)	7,762	356,135	45.88
Other sizes (converted to stand- ard cases)	9,737	253,574	26.04
Total	1,563,922	18,946,622	-

^{1/}Preliminary.
^{2/}Cases of various sizes converted to the equivalent of 48 cans to the case, each can containing 5 ounces net.

The 1953 shrimp pack was 24 percent greater in quantity and 46 percent higher in value than the 1952 pack (table 3). The 1953 over-all canners' average price was \$18.65 per standard case, the highest on record, and 17 percent above the \$15.89 for 1952. The previous high was \$17.34 per standard case in 1947.

Table 3 - U. S. Canned Shrimp Pack, 1943-53

Year	Quantity	Net Weight	Value to Canners	Canners' Avg. Price
	Std. Cases ^{1/}	Lbs.	\$	\$/Std. Case ^{1/}
1953 ^{2/}	1,016,116	15,241,740	18,946,622	18.65
1952	817,910	12,268,650	12,998,814	15.89
1951	871,171	13,067,565	12,187,049	13.99
1950	786,506	11,797,590	12,775,619	16.25
1949	664,721	9,970,815	11,203,325	16.85
1948	558,870	8,383,050	7,791,313	13.94
1947	472,366	7,085,490	8,192,004	17.34
1946	522,130	7,831,950	8,428,735	16.14
1945	214,971	3,224,571	1,918,633	8.93
1944	561,649	8,424,738	4,854,799	8.64
1943	660,436	9,906,534	5,360,647	3.12

^{1/}Cases of various sizes converted to the equivalent of 48 cans to the case, each can containing 5 ounces net.
^{2/}Preliminary.

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SPECIALTY FISHERY PRODUCTS: In 1953 the U. S. and Alaska pack of miscellaneous or specialty canned fishery products not generally reported separately totaled 661,626 standard cases, valued at \$7,168,343 to the canners (see table). This was a substantial increase over the 1953 pack of 221,791 standard cases, valued at \$3,123,426 to the canners. The principal factor in the substantial increase was the introduction of the canned tuna and noodles included under the "fish specialties" item. The market for this new product was reported as very good during 1953.

The pack of specialty canned fishery products includes numerous varieties of cakes, spread, soups of all kinds, and many other items processed in plants on the East Coast, in the Gulf States, on the West Coast, and in Alaska. Canned squid, fish cakes, and oyster stew were the other principal items in addition to tuna and noodles.

U. S. Pack of Specialty Canned Fishery Products, 1953 ^{1/}				
Products	Quantity	Value to Canners	Canners' Avg. Price	State Packed and Number of Plants
	Std. Cases ^{2/}	\$	\$/Std. Case ^{2/}	
FISH:				
Fish cakes (mainly groundfish)	75,529	888,158	11.76	Maine 2, Mass. 2, Va. 1
Fish flakes (groundfish) and fish paste and spread (anchovy, herring, and salmon)	9,568	237,806	24.85	Maine 1, Mass. 1, N. Y. 2, Md. 1
Fish, smoked or kippered:				
Salmon	699	36,791	52.63	Wash. 3, Ore. 3, Calif. 1, Alaska 8
Sturgeon	709	45,631	64.36	Wash. 2, Oreg. 3
Fish specialties (fish bait, fish chowder, deviled fish, and tuna and noodles)	283,232	3,092,240	10.92	Maine 1, Mass. 1, Va. 1, Fla. 1, Calif. 6
Miscellaneous fish (salted cod, halibut, menhaden, and whiting)	4,782	68,359	14.30	Mass. 1, Md. 1, Wash. 1
SHELLFISH:				
Crab specialties: Bisque, cocktail, curry, creole, deviled, newburg, paste, soft crabs, smoked legs and meat, and soup	6,514	173,027	25.56	N. Y. 1, Penna. 1, Md. 2, N. C. 1, Fla. 1, La. 1, Wash. 2, Ore. 2
Lobster specialties: Bisque, meat, newburg, paste, Savannah, soup, spread, stew, and thermidor	8,113	283,031	34.89	Maine 2, Mass. 1, N. Y. 2, Penna. 1, La. 1
Shrimp specialties: Aspic, bisque, cakes, cocktail, creole, curry, gumbo, newburg, paste, smoked, and soup	8,540	205,155	24.02	N. Y. 2, Penna. 1, Md. 2, S. C. 1, Fla. 1, La. 4, Wash. 1, Ore. 2
Clam bisque, cakes, and whole in the shell ...	3,685	26,796	7.27	Maine 1, Md. 1, Wash. 2
Oyster specialties:				
Smoked	2,049	190,843	93.14	Wash. 5, Ore. 1
Stew	71,018	856,247	12.06	Wash. 5, Ore. 1
Bisque, cocktail, and soup	418	9,622	23.02	Md. 1, La. 1, Wash. 1, Ore. 1
Squid	163,518	702,766	4.30	Calif. 17
Terrapin and turtle:				
Meat	1,303	45,252	34.73	N. Y. 1, Ga. 1, Fla. 1
Soup, stew, and chile	17,620	209,928	11.91	N. Y. 1, Penna. 1, Ohio 1, Ga. 1, Fla. 1, La. 3
Miscellaneous shellfish and specialties: Crayfish bisque, conchs, mussels, scallops, frog legs newburg, bouillabaisse, creole gumbo, and sea-food newburg	4,329	96,691	22.34	Maine 1, N. Y. 1, N. J. 1, La. 2
Total	661,626	7,168,343	-	

^{1/}Preliminary.^{2/}Cases of various sizes converted to the equivalent of 48 cans, each containing 16 ounces net.

U. S. Production of Menhaden and Menhaden Products, 1953

The United States catch of menhaden in 1953 amounted to 1,670,888,200 pounds and was by far the largest catch of these fish in the history of the fishery; was also the largest catch of a single species ever taken by United States fishermen. The previous record was held by the Pacific Coast sardine (pilchard) which in 1936 yielded a catch of 1,502,000,000 pounds.

Table 1 - Manufacturers' Receipts of Menhaden and Production of Menhaden Products, 1953 (Preliminary) ^{1/}							
States (Number of Plants)	Menhaden Utilized		Products Manufactured				Value of Products to Manufacturers
			Dry Scrap & Meal		Oil		
	Quantity	Quantity	Product Value	Quantity	Product Value		
	Pounds	No. of Fish	Tons	Value	Gallons	Value	Value
Mass. (3), R. I. (1)	24,903,900	37,170,000	2,417	320,837	482,065	233,061	553,898
N. Y. (1), N. J. (3), and Del. (2)	850,999,830	1,270,149,000	90,480	11,061,547	7,985,857	4,122,314	15,183,861
Virginia (5)	162,954,050	243,215,000	17,439	2,271,000	1,177,922	552,800	2,823,800
N. C. (7), S. C. (1)	133,800,340	199,702,000	13,936	1,792,842	1,180,947	548,922	2,341,764
Florida (3), Texas (2)	135,793,590	202,677,000	14,607	1,877,909	1,403,975	667,167	2,545,076
Mississippi (4)	54,944,020	82,006,000	5,084	646,838	653,403	312,336	959,174
Louisiana (4)	307,492,480	458,944,000	30,789	3,796,232	4,940,308	2,369,717	6,165,949
Total (36)	1,670,888,210	2,493,863,000	174,752	21,767,205	17,824,477	8,806,317	30,573,522

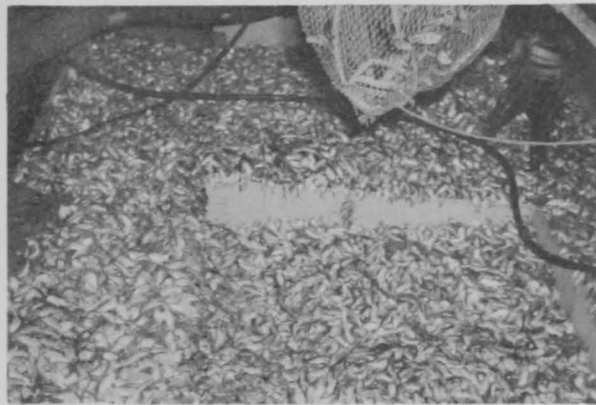
^{1/} Production of menhaden solubles not included.

Table 2 - Menhaden Utilized and Production of Menhaden Products, 1949-53
(Quantity and Product Value to Manufacturers)

Year	Menhaden Utilized	Products Manufactured						Value Products to Manufacturers
		Dry Scrap and Meal		Acidulated Scrap		Oil		
	Quantity	Quantity	Value	Quantity	Value	Quantity	Value	
	Lbs.	Tons	\$	Tons	\$	Gallons 2/	\$	\$
1953	1,670,888,210	174,752	21,767,205	-	-	17,824,477	8,806,317	30,573,522
1952	1,386,280,920	1/144,025	1/17,847,361	1/	1/	12,888,646	5,785,395	23,632,756
1951	1,106,706,670	1/115,464	1/13,879,523	1/	1/	12,537,115	9,771,154	23,650,677
1950	1,000,497,734	1/103,365	1/12,864,751	1/	1/	10,209,958	5,866,554	18,731,305
1949	1,072,630,265	1/113,393	1/17,813,339	1/	1/	8,293,911	3,407,510	21,220,849

1/ A small production of acidulated scrap included with dry scrap and meal.

2/ A gallon of oil weighs 7.74 pounds.



Close up of a catch of menhaden aboard a Gulf of Mexico purse seiner.

The 1953 catch of menhaden was used to produce 174,752 tons of dry scrap and meal (valued at \$21,767,205) and 17,824,477 gallons of oil (valued at \$8,806,317). In addition, the production of condensed fish solubles amounted to 78,077,000 pounds (valued at \$3,593,000).

The menhaden accounted for nearly 40 percent of the domestic catch of fish and shellfish in 1953. The total catch of these fish since the inception of the fishery is well over 40 billion pounds--far more than the catch of any other species taken by United States fishermen.



U. S. Foreign Trade in Edible Fishery Products

MARCH 1954: United States imports of fresh, frozen, and processed edible fish and shellfish during March 1954 totaled over 64.3 million pounds (valued at \$15.5 million), according to the March United States Foreign Trade, a Department of Commerce publication (see table). This is an increase of 16 percent in quantity

UNITED STATES FOREIGN TRADE IN EDIBLE FISHERY PRODUCTS, MARCH 1954 WITH COMPARISONS

Item	Mar. 1954		Mar 1953		Year 1953	
	Quantity	Value	Quantity	Value	Quantity	Value
IMPORTS:	1,000 Lbs.	Million \$	1,000 Lbs.	Million \$	1,000 Lbs.	Million \$
Fish & shellfish: Fresh, frozen, & processed ^{1/}	64,328	15.5	67,188	17.7	724,656	193.2
EXPORTS:						
Fish & shellfish: Processed ^{1/} only (excluding fresh and frozen)	4,133	1.4	5,269	1.0	58,920	14.4

^{1/} Includes pastes, sauces, clam chowder and juice, and other specialties.

Source: United States Foreign Trade (Trade by Commodity), Summary Report FT 930, Feb. 1954, U. S. Department of Commerce.

and 5 percent in value as compared with February imports of 55.4 million pounds (valued at \$14.7 million). Compared with a year earlier, March imports were lower by 4 percent in quantity and 12 percent in value.

Exports of processed edible fish and shellfish (excluding fresh and frozen) in March 1954 totaled over 4.1 million pounds (valued at \$1.4 million)--higher by 70 percent in quantity and 75 percent in value as compared with February exports of over 2.4 million pounds (valued at \$0.8 million). March exports were down 22 percent in quantity, but 40 percent higher than a year earlier.

JANUARY-MARCH 1954 TRENDS: Imports: Marked gains in imports of many fishery products during the first three months of 1954 over the similar period of 1953 are shown in preliminary information compiled from data collected by the Bureau of the Census. Principal increases noted amounted to 60 percent in imports of fresh and frozen tuna; 46 percent in tuna canned in brine; 45 percent in bonito canned in oil; 23 percent in shrimp; and 18 percent in fillets of groundfish and ocean perch.

Imports of sardines canned in oil January-March 1954 were 7 percent below those of the same period of 1953. However, sardines canned not in oil totaled over 4 million pounds during the three months of 1954, compared with less than a million pounds during that period of the previous year. Principal source of these imports was the Union of South Africa, followed by Japan. March imports of sardines from Japan exceeded those from South Africa.

Among the items showing notable import decreases during the first quarter of 1954 were: tuna canned in oil, with decreased imports of 71 percent; fresh and frozen lobster imports which decreased by 34 percent. Fish-meal imports remained at the same level as a year ago.

Exports: Exports of canned salmon during January-March 1954 were almost four times those of the same period a year earlier as a result of large shipments to the United Kingdom. Exports of canned mackerel and sardines were below those for the first three months of 1953.

Fish-oil exports during the first three months of 1954 were double those of the same period in 1953.

EXPORTS OF MARINE OILS INCREASE: Domestic use of marine oils in the six-months' period ending March 1954 declined, while disappearance of other non-food oils (except tallow and greases and linseed oil) remained about the same, according to The Fats and Oils Situation (May 28), a Department of Agriculture publication. Exports of marine oils in the period were up substantially from a year ago, with most of them going to Netherlands and Western Germany. Marine oils also are priced below our edible oils and thus provide a low-priced ingredient for use in margarine in Europe.



Wholesale Prices, May 1954

Substantially lower fresh-water fish prices (exceptionally high prices in April were due to Hebraic holidays) in May were offset only partially by higher salt-water fish prices. This caused the over-all wholesale price index of edible fish and shellfish to decline from April to May. Very poor weather in the North Atlantic early in May reduced supplies of salt-water fish and prices were higher than in April. The over-all edible fish and shellfish (fresh, frozen, and canned) wholesale index in May was 103.7 percent of the 1947-49 average (see table)--1.9 percent less than the April index, and 2.6 percent lower than a year earlier.

Groundfish landings in New England were light and the demand good, accounting for a 33.3 percent rise in the ex-vessel price at Boston for offshore drawn large

haddock during May. Also, there was a slight increase in Western halibut prices at New York City in May. But these increases were more than wiped out by the substantially lower prices for fresh-water fish. The drawn, dressed, or whole finfish subgroup index for May was 4.2 percent lower than April, but 10.8 percent higher than a year earlier.

Table 1 - Wholesale Average Prices and Indexes for Edible Fish and Shellfish, May 1954 and Comparisons

Group, Subgroup, and Item Specification	Point of Pricing	Unit	Avg. Prices ^{1/}		Indexes (1947-49=100)			
			(\$)		May	Apr.	Mar.	May
			1954	1954	1954	1954	1954	1953
ALL FISH & SHELLFISH (Fresh, Frozen, & Canned)					103.7	105.7	107.5	106.5
Fresh & Frozen Fishery Products:					107.0	2/109.8	2/112.3	112.2
Drawn, Dressed, or Whole Finfish:					107.1	2/111.8	111.4	96.7
Haddock, lge., offshore, drawn, fresh	Boston	lb.	.10	.08	102.1	76.6	95.4	90.1
Halibut, West., 20/80 lbs., drsd., fresh or froz.	New York	lb.	.32	.31	97.5	94.9	97.0	90.5
Salmon, king, lge. & med., drsd., fresh or froz.	New York	lb.	.54	.54	120.8	120.2	125.8	104.5
Whitefish, L. Superior, drawn, fresh	Chicago	lb.	.46	.98	114.0	241.7	161.1	122.7
Whitefish, L. Erie pound or gill net, rnd., fresh	New York	lb.	.61	2/1.55	123.3	2/313.5	126.4	121.3
Lake trout, domestic, No. 1, drawn, fresh	Chicago	lb.	.39	.81	79.9	166.0	133.2	98.4
Yellow pike, L. Michigan, rnd., fresh	New York	lb.	.36	.55	84.4	129.0	146.6	72.7
Processed, Fresh (Fish & Shellfish):					107.8	111.1	114.9	134.2
Fillets, haddock, sml., skins on, 20-lb. tins	Boston	lb.	.32	.28	107.2	95.3	113.1	91.9
Shrimp, lge. (26-30 count), headless, fresh	New York	lb.	.63	.69	99.6	109.1	113.0	158.1
Oysters, shucked, standards	Norfolk	gal.	4.75	4.75	117.5	117.5	117.5	117.5
Processed, Frozen (Fish & Shellfish):					104.5	99.4	110.5	124.3
Fillets: Flounder (yellowtail), skinless, 1-lb. pkg.	Boston	lb.	.37	.38	96.9	98.2	98.2	108.7
Haddock, sml., skins on, 1-lb. pkg.	Boston	lb.	.34	.33	105.1	102.0	105.1	70.7
Ocean perch, skins on, 1-lb. pkg.	Boston	lb.	.29	.29	117.8	117.8	117.8	108.3
Shrimp, lge. (26-30 count), 5-lb. pkg.	Chicago	lb.	.65	.57	99.5	88.0	113.0	163.5
Canned Fishery Products:					98.8	99.6	100.4	98.0
Salmon, pink, No. 1 tall (16 oz.), 48 cans/cs.	Seattle	case	18.70	18.70	99.1	99.1	99.1	104.4
Tuna, lt. meat, chunk, No. 1/2 tuna (6-1/2 oz.), 48 cans/cs.	Los Angeles	case	14.20	14.20	102.4	102.4	102.4	92.4
Sardines, Maine, keyless oil, No. 1/4 drawn (3-1/4 oz.), 100 cans/cs.	New York	case	7.70	8.20	81.9	87.3	92.6	76.6

^{1/}Represent average prices for one day (Monday or Tuesday) during the week in which the 15th of the month occurs. These prices are published as indicators of movement and not necessarily absolute level. Daily Market News Service "Fishery Products Reports" should be referred to for actual prices.

^{2/}Revised.

Fresh shrimp supplies were good and demand only light to moderate--May prices were down 8.3 percent from a month earlier. This was the main factor causing the May fresh processed fish and shellfish index to drop 3.0 percent. Fresh haddock fillet prices were quoted substantially higher in May. The May index for the fresh processed subgroup was 19.7 percent lower than a year ago, due also to the lower shrimp prices.

Higher prices for frozen haddock fillets and shrimp in May were responsible for the frozen processed fish and shellfish index going up 5.1 percent over April. Flounder fillet prices decreased slightly in May, while ocean perch fillets remained the same as in April. When compared with a year ago, the May processed frozen index was down 15.9 percent with various changes in the individual items--prices were higher for flounder fillets and shrimp and lower for haddock fillets and ocean perch fillets.

Canned Maine sardines were lower by 6.2 percent as dealers continued to clean out last season's stocks, causing the canned fishery products subgroup index to drop 0.8 percent from April to May. There were no price changes in the other canned fish items. The May index was 0.8 percent higher than a year ago due to higher tuna and sardine prices, but canned salmon was priced lower than a year earlier.



U. S. FISH STICK PRODUCTION SOARS IN 1954

Approximately 9 million pounds of fish sticks, the popular new breaded food item, were produced in the United States during the first quarter of 1954, the U. S. Fish and Wildlife Service announced on May 25. This exceeds by $1\frac{1}{2}$ million pounds the Nation's entire output last year.

A report of the Service shows that the 13 firms making fish sticks last year produced $7\frac{1}{2}$ million pounds in 1953. These same firms, which now form only a nucleus of total producers, accounted for 8.9 million pounds during the January-March 1954 period alone.

A number of new firms, for which figures are not yet available, have begun the manufacture of this fast-selling commodity since January 1. Total United States production for this year's first quarter, therefore, is certain to have exceeded the 9-million-pound mark. It is estimated that the total output for the year will exceed 40 million pounds.



Packing fish sticks in consumer-size packages at Gloucester, Mass., plant.

Fish sticks are uniformly shaped pieces of fish dipped in batter, breaded, and frozen in consumer-size packages. Closely resembling French-fried potatoes in appearance, they can be purchased in precooked or uncooked form. The precooked sticks, which have been deep-fat fried before freezing, are easily heated in the oven at home for serving. The uncooked sticks are designed for those housewives who prefer to do the frying themselves. Consumer acceptance of fish sticks has been so widespread that some sources expect them to do for the fishing industry what fruit juice concentrates have done for the citrus fruit trade.

During the last quarter of 1953 the demand for fish sticks was so great that producers were unable to keep current with their orders. With new firms constantly entering the field, however, the supply in 1954 is expected to cope satisfactorily with the demand.