

## Lower California Green Turtle Fishery

By W. E. Averett

Of the various fishing industries that have had a more or less spectacular growth during the last decade on the Southern and Lower California coasts, one of the most recent to attain importance, and probably the most picturesque of all, is the green turtle fishery. A desultory business has been done in this line for some years, but now that several enterprising concerns have taken to rauning turtles a much larger and more systematic development may be expected. In the article below, the author gives an account of a trip to the turtle grounds during the past fishing season.

**W**E headed due south out of the Bay of San Diego on a 300-mile trip to a point on the coast of Lower California, in Mexican waters. Our schooner, the Catarina, was a queer-looking craft, built especially to handle the turtle trade between Lower California and San Diego. She is a 50-ton vessel, powered with a pair of 30-h.p. Union engines, and carries a crew of seven men. For almost the entire length she is covered with a superstructure, the after half of which contains crew's quarters, galley, dining room, etc., while in the forward end is the compartment allotted to the catch of turtles. This space is divided into great racks all the way round, much resembling a community bunkhouse in a logging camp, with the bottoms of the bunks left out. As this was the first trip of the season, this forward section was filled with gear used in taking the turtles, including several rowboats and piles of nets, ropes and anchors, etc.

On arriving at the turtle grounds we were met by the launch Scout, which is also used in the turtle fishery. On the following morning the nets were hoisted out and placed on the after deck of the Scout in preparation for casting. No one seemed to hurry to get to work that morning, and on inquiring the reason I found that the turtles drift in schools, coming up the bays and lagoons with the tide. The nets are spread on the flood tide, and as the turtles go out on the ebb they find themselves entangled and ultimately captured.

When the tide was just about at the flood we started out on the Scout to spread the nets. These are of 18-in. mesh, and from 300 ft. to 1200 ft. long, and from 12 to 40 ft. deep. By the time our last net was set the tide was turning, and we began to see results around the first nets set, as in several

places the cork floats were snapping and jumping, first under then out of the water, and a general turmoil seemed to be in progress. The row boats were now shoved off from the launch and the fishermen began the task of untying the turtles from the nets and hauling them aboard. In most cases this is no child's play, as many turtles are great fighters, and sometimes weigh as high as 1,000 lbs. The average weight is about 150 lbs. at six years, and this seems to be the age at which the turtle does most of his roaming about. Those caught weighed on the average from 150 to 250 lbs., though in a cargo there will be many above this range.

On filling a rowboat, which would hold not more than four or five turtles, we would row over to the Scout and discharge our load on the deck; and she in turn, when loaded, would run over to the Catarina, a rope would be placed around the turtles' flippers, and they would be hoisted from the launch and dropped into the schooner, to take their places on the rack previously mentioned. Thus the days go until all the rack space is full, and then the Catarina, with 275 to 400 turtles on board heads north for the cannery.

The first day's haul netted 75 of the big green turtles, and by night they were all stowed away and we were ready for the next day's work. On the second day we saw a battle between a big green turtle weighing close to 400 lbs. and a shark from 7 to 8 ft. long. Sharks will not molest a turtle when he is free, even though he is asleep on the water, but let the turtle get entangled and unable to defend himself and a shark will attack him in a minute.

This was a wicked fight, the shark lunging and snapping with those wicked saw teeth of his. After about the fourth lunge I guess that

the shark had enough; anyway we did not see him again and then three of us proceeded to get this big fellow into the row boat and it was just about all that we wanted to do. However we finally got him on his back in the bottom of the boat, and he alone constituted a good load.

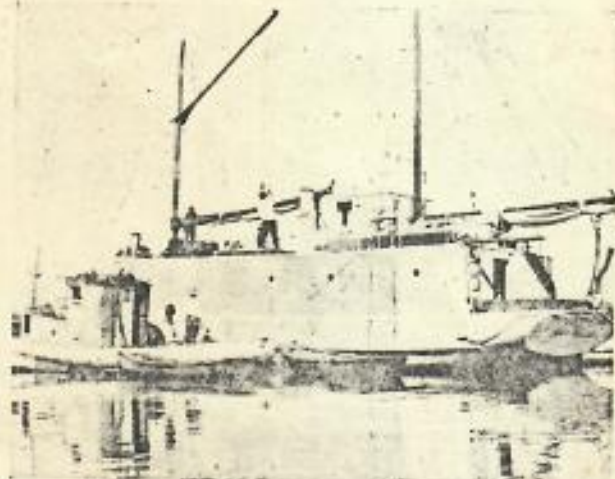
It is estimated that some of these big fellows are over 150 years old. They live only in warm waters and it seems that as a general thing the largest of the species are found in the Gulf of California. The summer season is their breeding time, and the females go up on the sandy beaches on moon-light nights and deposit their eggs in the warm sand, where they later hatch. The female turtle deposits from 300 to 1000 eggs in this way, and after the young are hatched they crawl to the water by instinct and begin eating the seaweed and grasses. From that moment they shift for themselves through life. The turtle is strictly a vegetarian and eats nothing but weeds and grasses.

Our stay at the lagoons was three days and we brought back a cargo of 350 turtles, the largest being the one that had the fight with the shark. After a pleasant trip up the coast we dropped anchor once more in San Diego bay opposite the plant of the National City Commercial Company, who are the largest producers of green turtle products in the United States. The hatch was thrown open and once more the turtle was hoisted at a rope's end and dropped over the side into a scow and then was transported to the killing pen. This is a large pond from 3 to 5 feet deep, and the entire catch is first placed in this pen and used as they are wanted, the average killing about 2 tons a day.

There is practically no waste at all to the green turtle and it is surprising to note that what is called the shell or the back is made up into a

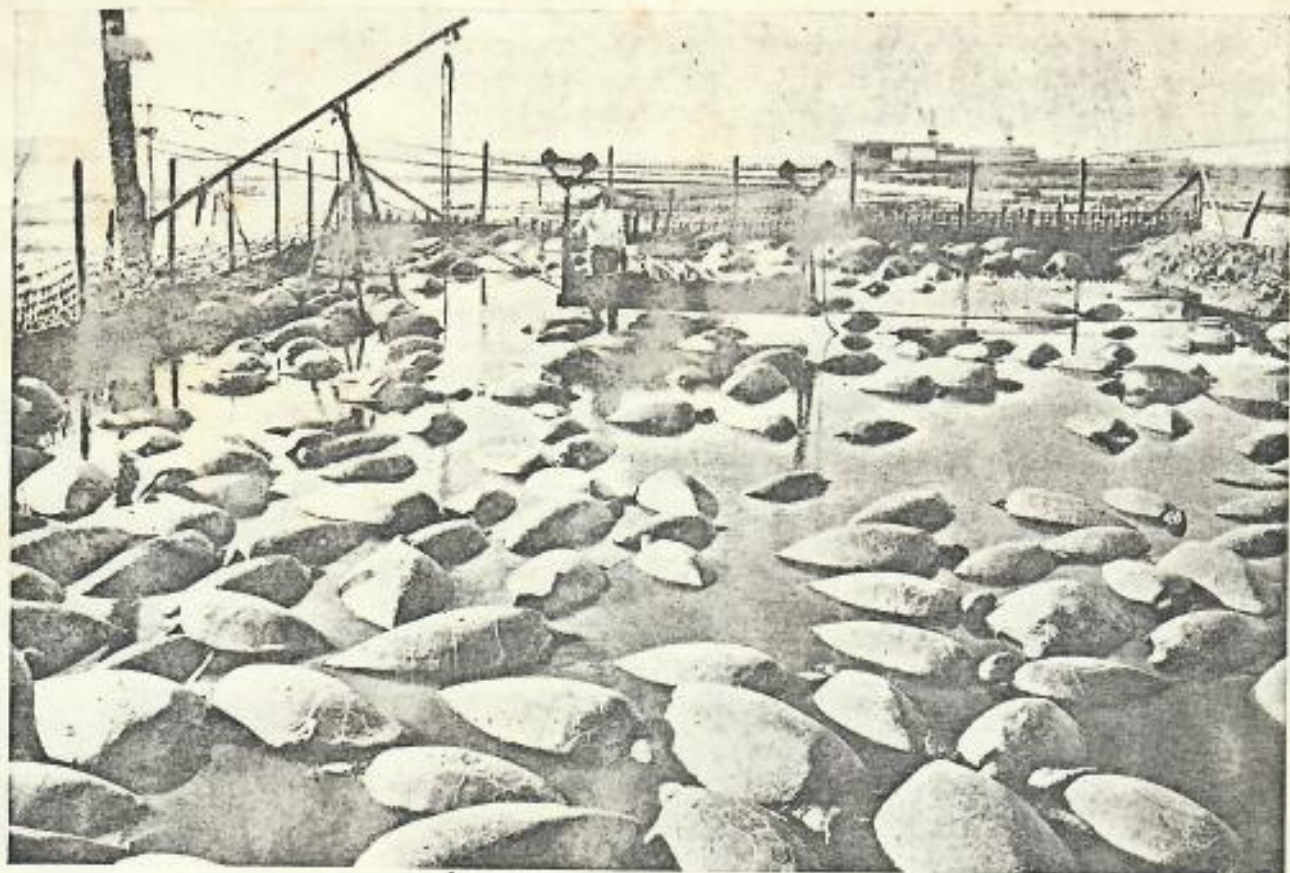


Butchering Tables Outside the Cannery, San Diego



Schr. Catarina. Used in Transporting Turtles from the Fishing Grounds





Killing Pen, Into Which Turtles are Discharged from the Schooner and Held until Wanted at the Cannery

very palatable dish called green meat. After killing, the carcass is quartered and there are two varieties of meat known as green and white, the green being the back, the head, the flippers, and all parts which are exposed. Under these lie the white meat, and from this is taken the delicacy known as turtle steaks, which resembles chicken; it is very white in color after cooking. The first process is scaling, and this is done in much the same manner as scaling a fish. The flippers are then cut out and split in several places as also are the heads and necks. They are then thrown into vats and cooked 24 hours. In the process of cooking, seven different vegetables and nine different spices are used. After 24 hours cooking the green meat has loosened from the white, and the two are separated and are ready for canning.

The products put out are; thick

soup, clear soup, white meat, and green meat and also a white and green meat mixed. These are put up in  $\frac{1}{2}$  lb, 1 lb, and 2 lb, tins. A valuable oil also is produced. Many of these turtles are very fat, the fat forming in layers on the inside of the back. This is all gathered very carefully and rendered out giving a beautiful golden colored oil, which is used for many purposes. It is however, known and used more in Mexico than in the United States, and brings as high as \$10.00 per gallon. Mexican tortillas or corn cakes fried in turtle oil are a rare delicacy indeed. While the turtle products as yet are not what might be considered a well-known household food, yet they are fast becoming recognized as a very palatable delicacy and this company disposed of two carloads this last season and find a constantly growing demand for its output.

#### EXAMINATION FOR SCIENTIFIC ASSISTANT

The U. S. Civil Service Commission announces an examination for the position of scientific assistant for the U. S. Bureau of Fisheries to take place August 4, 1920. Three vacancies at least are to be filled: At Fairport, Ia., \$1,200 a year; at Beaufort, N. C., \$1,400 a year, and on the steamer Albatross, \$1,200 a year. The examination has been postponed from June 23, owing to the insufficient number of applications, and qualified persons are urged to apply at once to the Civil Service Commission for Form 1312, stating the title of examination desired.

#### NEW OFFICES FOR OREGON COMMISSION

The Oregon State Fish Commission, formerly located in the Oregon building, has established new headquarters at 1104 Gasco building, Portland.

#### SHIPPING CARP

The Northwestern Fish Products company, of Portland, Ore., according to an announcement from Yakima, Wash., will take a quarter of a million pounds of carp out of the streams and lakes of Yakima county next fall for shipment to Eastern markets. The company will also take a large quantity of other fish for use in its by-products plant.

#### A. P. F. SHIPPING FRESH FISH.

A. J. Sonsthagen, representing the Alaska Pacific Fisheries, recently took space on the city dock at Juneau for a fresh fish station, shipping the fish south in boxes.



Removing Turtles From the Nets

INTER-LIBRARY LOAN

579 Balaza, George

Pacific Fisherman

V. 18, no. 7, 1920

Wau