

Fishery Basics — Fishing Vessels

Fishing Vessel Types

Fishing vessels are typically designed with a specific purpose. That purpose is to locate, **catch**, and preserve fish while out at sea. The planned operations of a vessel determine the overall size of the vessel, the arrangement of the deck, **carrying capacity**, as well as the machinery and types of equipment that will be supported by the vessel. Due to the inherent differences in **fishing communities** around the world, there is a wide range of types and styles of fishing vessels. Vessel sizes can range from the 2 m (6 ft) dug out canoes used in **subsistence** and **artisanal** fisheries, to factory ships that exceed 130 m (427 ft) in length. Commercial fishing vessels can also be characterized by a variety of criteria: **types of fish** (See Biology & Ecology) they catch, **fishing gear and methods used** (See Fishing Gear), capacity and **processing** capabilities, and the geographical origin of the vessel. In 2002, the United Nations Food and Agriculture Organization (FAO) estimated the **world fishing fleet** had approximately four million vessels, with an average vessel size ranging from 10-15 m (33-49 ft). Based on a **quarterly catch statistics report**, published by the **Pacific Fisheries Information Network** (**PacFIN**), approximately 1,950 vessels landed their catches in California ports.

Due to the technological innovations that began in the 1950s, many fishing vessels are now classified as <u>multi-purpose vessels</u>, because of the ability to switch out gear types depending on the targeted species. However, single use vessels still exist in the world fishing fleet today. The <u>United Nations Food and Agriculture Organization (FAO)</u> has identified eight general vessel classifications by fishing method, which we have provided detailed information on. Most, if not all, modern <u>commercial</u> vessels are also equipped with advanced technological equipment for navigation and fish finding.

Trap Setters

Trap setters are vessels designed for using **traps or pots** (See Fishing Gear) to catch **shellfish**, such as **Dungeness Crab** (See California Fisheries), and other **demersal** fish species. Pots may be left on the seafloor from 1-3 days or longer. In contrast with most other vessels that use sonar, **echosounders**, or other types of fish finding equipment, captains of trap setters typically rely on their knowledge of the local fishing grounds to determine where to set their traps and thus where to find the targeted species.

Trap setters can range in size from small open boats that operate in coastal waters to vessels ranging in size from 20-50 m (66-164 ft) operating along the edge of the **continental shelf**. The smaller vessels are typically equipped with hydraulic or mechanical **pot haulers** (See Fishing Gear – Traps), whereas the larger vessels are equipped with cranes for **hauling** 100 to 300 pots on board.



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In 2010, the <u>Pacific States Marine Fisheries Commission</u> reported 668-1,211 vessels targeting <u>Dungeness Crab</u> (See California Fisheries), the primary pot fishery on the west coast, landed their catches at ports in California, Oregon, and Washington.

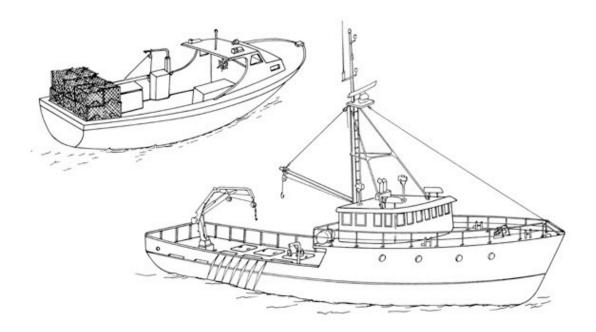


Illustration of a small trap setter (top) and a large trap setter (bottom). (Credit: Food and Agriculture Organization of the United Nations)

References

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Additional Resources

National Marine Fisheries Services: Fisheries Gear

(link to: http://www.nmfs.noaa.gov/fishwatch/fishinggears.htm)

National Marine Fisheries Services: Interactive Illustration with Vessels, Gears and Species (link to: http://www.nmfs.noaa.gov/speciesid/Sustainability.html)