Airpower Classics

Artwork by Zaur Eylanbekov

PBY Catalina

The US Navy PBY Catalina was by far the most-produced and most-important flying boat or seaplane in history. It provided stellar service throughout World War II in many roles, flying in all US armed services and in the fleets of many nations. USAAF's version was known as the OA-10A. Consolidated Aircraft Co. designers gave it a rugged structure and a high-wing configuration that allowed it to operate in rough seas. The PBY-5A amphibian, introduced in 1939, was even more versatile than its predecessors.

The PB in the acronym PBY denoted "patrol bomber," while the final letter, Y, signified its builder, Consolidated, in naval parlance. The Catalina was all metal, except for a few fabriccovered areas, and so was far cleaner in design than previous Navy patrol airplanes. It had a semicantilever, strut-braced, pylon-mounted wing, and retractable wing-tip floats. Amazingly successful in its original roles as a long-range patrol bomber, the Catalina also excelled in antisubmarine warfare, air-sea rescue, landing assault forces, mine-laying, reconnaissance, convoy escort, and transport work.

The Catalina's long range brought it into prominence in many historic actions, including the sighting of the German battleship *Bismarck*, the sighting of the Imperial Japanese fleet in 1942 at Midway, its torpedo attacks against that fleet, and suppression of German U-boats with constant surveillance and attack. The Cat's most highly regarded achievements were its "Dumbo" air-sea rescue efforts, when it would descend to the sea to scoop up downed airmen, even under intense hostile fire.

-Walter J. Boyne

This aircraft: United States Navy PBY-5A Catalina—*Bureau No. 48318*—as it looked in late 1944 when assigned to VPB-63 in Port Lyautey, French Morocco.





The ocean was its landing strip.

In Brief

Designed by Consolidated \star built by Consolidated, Boeing, Canadian-Vickers, others \star first flight May 19, 1936 \star crew of eight \star two Pratt & Whitney R-1830 engines \star number built 4,051 \star **Specific to PBY-5A:** max speed 179 mph \star cruise speed 125 mph \star max range 2,545 mi \star armament, three .30 cal machine guns, two .50 cal machine guns \star max load, 4,000 lb of bombs, depth charges, mines, torpedoes \star weight (max) 35,300 lb \star span 104 ft \star length 63 ft 10 in \star height 20 ft 2 in.

Famous Fliers

Medal of Honor: Nathan Gordon. Victoria Cross: John Cruickshank (RAF), David Hornell (RCAF). Notables: Knefler McGinnis, Leonard B. Smith, Howard Ady, Thomas Moorer, L. J. Birchall, Adrian Marks, Jacques Cousteau, Philippe Cousteau.

Interesting Facts

Built in at least 25 variants \star served in some 30 air forces \star used engine exhaust as de-icing mechanism—a first \star named by the RAF \star mounted first US air action of World War II (helping attack a Japanese midget sub at Pearl Harbor) \star flew first round-theworld flight by seaplane \star nicknamed Cat, Black Cat, Canso, Nomad, Pig Boat, P-Boat.