

LAKE AMPHIBIAN WRECKS—WATER OPS

Our review of the 100 most recent accidents involving Lake Amphibians uncovered the sort of things we would expect when operating a seaplane—nearly half the accidents involved water operations—but also a surprising absence of runway loss of control (RLOC) accidents.

Despite raves by their owners, Lakes are not forgiving when it comes to water operations—one of the reasons insurers require pilots to get annual recurrent training to obtain insurance—and it was reflected in the fact that 46 of 100 accidents involved something going wrong on the water.

Only one accident involved landing on the water gear down. As expected, it was fatal—the airplane flipped. What concerned us more was that several fatal accidents started out with what should have been a prosaic, minor mistake—a bounced landing. They progressed to disaster when the pilot did not get the airplane to the correct pitch attitude and/or correct any yaw before touching down again.

On landing—or takeoff—the wrong pitch attitude can induce porpoising, which can lead to total loss of control. In one landing accident, the pitch excursions became so great that the airplane eventually got high enough on the nose-up cycle that the nose-down cycle went to the vertical before the airplane “pile drivered” into the water, as described by a witness.

Touching down yawed is also a recipe for bad news. Accident reports reflected everything from just ripping off a sponson through serious damage to the airplane to flipping and drowning the occupants.

Hitting submerged objects while landing, taking off or taxiing sank a few Lakes. Boat wakes proved to be a serious consideration—leading to several crashes on landing and takeoff. Glassy water landings put paid to more than a few Lakes. There were two accidents that involved

low-flying Lakes coming to grief upon hitting what was probably glassy water while at cruising speed.

A surprising number of accidents involved engine or mechanical issues—more than 15 engine power losses for either unknown reasons or due to an absence of, or bad, maintenance. Two airplanes suffered the collapse of a gear leg on rollout.

There were only three accidents in the stall/spin category. One also involved an engine power loss after takeoff under circumstances that had us wondering whether the inevitable water in the hull had not been drained prior to takeoff and migrated aft, preventing the pilot from getting the nose down as the airplane pitched further up as the pylon-mounted engine lost power.

Two Lakes simply disappeared—one over the Atlantic on a delivery flight and one in which the bodies of the occupants eventually washed up on the shores of Lake Superior.

Our conclusions? The Lake has unusually good manners on the ground. The engine is challenging to get at—which may explain some of the power loss accidents due to failure to maintain the engine or doing it wrong. High waves and boat wakes are not friendly to Lakes, and the airplane is intolerant of sloppy pilot technique on landing. We think intensive, Lake-specific, training and recurrent training is utterly essential for anyone who desires to fly a Lake Amphibian.

ACCIDENT SUMMARY

