



Aviation Investigation Final Report

Location:	LAKE MURRAY, South Carolina	Accident Number:	MIA98LA086
Date & Time:	February 25, 1998, 14:55 Local	Registration:	N3020P
Aircraft:	Lake LA-4-200	Aircraft Damage:	Substantial
Defining Event:		Injuries:	3 Serious
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

The amphibian airplane collided with a partially submerged object during a water landing that ripped and crushed the hull, below the water line, from the nose cone to the left side cockpit door. The airplane subsequently nosed over and submerged in the water..

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: A collision with an unknown submerged.

Findings

Occurrence #1: ON GROUND/WATER COLLISION WITH OBJECT
Phase of Operation: LANDING

Findings

1. (C) OBJECT - SUBMERGED OBJECT

Occurrence #2: LOSS OF CONTROL - ON GROUND/WATER
Phase of Operation: LANDING

Findings

2. AIRCRAFT CONTROL - NOT POSSIBLE

Occurrence #3: ON GROUND/WATER ENCOUNTER WITH TERRAIN/WATER
Phase of Operation: LANDING - ROLL

Findings

3. TERRAIN CONDITION - WATER

Factual Information

On February 25, 1998, about 1455 eastern standard time, a Lake LA-4-200, N3020P, registered to and operated by Sea Flight, Inc., as a 14 CFR Part 91 personal flight, crashed while attempting a water landing on Lake Murray, South Carolina. Visual meteorological conditions prevailed, and no flight plan was filed. The aircraft sank and was substantially damaged. The private-rated pilot and two passengers were seriously injured. The flight originated from Columbia Metropolitan Airport about 27 minutes before the accident.

Following the accident, the pilot stated he thought that either the nose gear had inadvertently extended or that during initial water touchdown, the hull impacted a submerged object. Witnesses on the lake were mixed in their individual observations of whether the landing gear were up or down during the water landing. An eyewitness, the wife of a Lake amphibian owner and an ex-flight attendant, stated that she observed the airplane fly over her lakeside house and that all landing gear were up. The water surface conditions at the landing site were reported as smooth. Because of recent heavy rainfall, the lake level was higher, the water clarity was diminished due to mud run-off, and the lake contained more floating and partially submerged debris than normal. The pilot stated he made three low passes over the landing area prior to his water landing.

Examination of the submerged wreckage by salvage divers revealed the nose and left main gear fully retracted and totally in their respective wheel wells, while the right main gear was not fully retracted. The landing gear control handle was in the up position.

Subsequent examination of the salvaged amphibian by FAA personnel revealed the hull impacted an unknown submerged object of such mass and weight to crush and tear the left front hull from the nose cone to the cockpit. Examination of the landing gear hydraulic actuators, main gear uplocks, and right main gear door damage revealed the probable sequence of events to be impact with a submerged object early in the touchdown followed by a prying action by the water to partially extend the right main landing gear during the postimpact gyrations. (See enclosed FAA Inspector's statement)

Pilot Information

Certificate:	Private	Age:	65, Male
Airplane Rating(s):	Single-engine land; Single-engine sea; Multi-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	Airplane	Second Pilot Present:	No
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Class 3 Valid Medical-w/ waivers/lim	Last FAA Medical Exam:	April 17, 1996
Occupational Pilot:	No	Last Flight Review or Equivalent:	
Flight Time:	12600 hours (Total, all aircraft), 4573 hours (Total, this make and model), 12461 hours (Pilot In Command, all aircraft), 9 hours (Last 90 days, all aircraft), 5 hours (Last 30 days, all aircraft), 2 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Lake	Registration:	N3020P
Model/Series:	LA-4-200 LA-4-200	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	962
Landing Gear Type:	Retractable - Tricycle; Amphibian; Hull	Seats:	4
Date/Type of Last Inspection:	June 6, 1997 Annual	Certified Max Gross Wt.:	2600 lbs
Time Since Last Inspection:	60 Hrs	Engines:	1 Reciprocating
Airframe Total Time:	1442 Hrs	Engine Manufacturer:	Lycoming
ELT:	Installed	Engine Model/Series:	IO-360-A1B
Registered Owner:	SEA FLIGHT, INC.	Rated Power:	200 Horsepower
Operator:		Operating Certificate(s) Held:	None
Operator Does Business As:		Operator Designator Code:	

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	CAE ,236 ft msl	Distance from Accident Site:	18 Nautical Miles
Observation Time:	14:56 Local	Direction from Accident Site:	112°
Lowest Cloud Condition:	Clear	Visibility	10 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	7 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	310°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	29 inches Hg	Temperature/Dew Point:	23°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	COLUMBIA , SC (CAE)	Type of Flight Plan Filed:	None
Destination:		Type of Clearance:	VFR;VFLF
Departure Time:	14:28 Local	Type of Airspace:	Class G

Airport Information

Airport:		Runway Surface Type:	
Airport Elevation:		Runway Surface Condition:	Water-calm
Runway Used:	0	IFR Approach:	None
Runway Length/Width:		VFR Approach/Landing:	Full stop;Traffic pattern

Wreckage and Impact Information

Crew Injuries:	1 Serious	Aircraft Damage:	Substantial
Passenger Injuries:	2 Serious	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	3 Serious	Latitude, Longitude:	33.910449,-81.509223(est)

Administrative Information

Investigator In Charge (IIC): Stone, Alan

Additional Participating Persons: JOHN PIPKIN; COLUMBIA, SC

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Last Revision Date:

Investigation Class: [Class](#)

Note:

Investigation Docket: <https://data.nts.gov/Docket?ProjectID=38463>

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