



AVIATION



HIGHWAY



MARINE



RAILROAD



PIPELINE

Aviation Investigation Final Report

Location:	Wasilla, Alaska	Accident Number:	ANC23LA013
Date & Time:	January 13, 2023, 15:30 Local	Registration:	N29886
Aircraft:	Taylorcraft BL-65	Aircraft Damage:	Substantial
Defining Event:	Fuel contamination	Injuries:	1 None
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

Before the day of the accident, the nose fuel tank cap had been dislodged during a snowstorm, which allowed snow to enter the fuel tank. During preflight inspection, the pilot drained fuel from the fuel tank and discovered water in the fuel. He continued to drain the fuel until no water was visible. The pilot took off and during cruise flight the engine began to run rough so he performed a precautionary landing on a road. He drained fuel from the fuel tank again and once again found water in the fuel. He continued to drain fuel until there was no more sign of water. The pilot's mechanic responded to the site to assist the pilot. The mechanic drained all of the fuel from the carburetor to ensure there was no water.

They started the engine, and it ran normally again so the pilot decided to take off. Shortly after departure from the road, the engine began to run rough again. The pilot landed back on the road. During the landing roll, the right wing impacted a street sign, and the airplane came to rest in a ditch. Postaccident examination of the engine revealed water in fuel samples drained from the gascolator and carburetor. Other than the presence of water, no anomalies were noted with the engine that would have precluded normal operation.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be:

The pilot's failure to remove all water from the fuel tank, which resulted in fuel contamination and a subsequent partial loss of engine power.

Findings

Environmental issues	Snow - Effect on operation
Aircraft	Fuel - Fluid condition
Personnel issues	Preflight inspection - Pilot

Factual Information

History of Flight

Landing	Loss of engine power (partial)
Prior to flight	Aircraft inspection event
Takeoff	Fuel contamination
Landing	Off-field or emergency landing
Enroute	Fuel contamination (Defining event)

On January 13, 2023, about 1530 Alaska daylight time, a Taylorcraft BL-65 airplane, N29886, was substantially damaged when it was involved in an accident near Point Mackenzie, Alaska. The pilot was not injured. The airplane was operated as a Title 14 *Code of Federal Regulations* Part 91 personal flight.

According to the pilot, last month after a heavy snow fall, the nose fuel tank cap was found dislodged, allowing snow to accumulate into the tank. On the day of the accident, during the airplane preflight inspection, the pilot sampled fuel from the fuel tank and found water in the fuel. He drained fuel until there was no more sign of water. He departed from Lake hood Airport (LHD) and during cruise flight the engine began to run rough. He performed a precautionary landing to a road.

The pilot drained fuel from the fuel tank again and found water in the fuel. He drained fuel until there was no more sign of water. His mechanic responded to the site to assist the pilot. The mechanic drained all the fuel from the carburetor to ensure there was no water. They started the engine, and it ran smoothly for 10 minutes. The pilot departed from the road to fly back to LHD and shortly after departure the engine began to run rough again. The pilot performed a precautionary landing back on the road. During the landing roll the right wing impacted a street sign, and the airplane came to rest in a ditch. The airplane sustained substantial damage to the right wing.

Postaccident examination of the engine revealed water in fuel samples drained from the gascolator and carburetor. Other than the presence of water, no anomalies were noted with the engine that would have precluded normal operation.

Pilot Information

Certificate:	Private	Age:	69,Male
Airplane Rating(s):	Single-engine land; Single-engine sea	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	Unknown
Instrument Rating(s):	None	Second Pilot Present:	No
Instructor Rating(s):	None	Toxicology Performed:	
Medical Certification:	BasicMed Unknown	Last FAA Medical Exam:	
Occupational Pilot:	Yes	Last Flight Review or Equivalent:	
Flight Time:			

Aircraft and Owner/Operator Information

Aircraft Make:	Taylorcraft	Registration:	N29886
Model/Series:	BL-65	Aircraft Category:	Airplane
Year of Manufacture:	1941	Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	2737
Landing Gear Type:	Tailwheel	Seats:	2
Date/Type of Last Inspection:	January 1, 2022 Annual	Certified Max Gross Wt.:	1500 lbs
Time Since Last Inspection:	66 Hrs	Engines:	1 Reciprocating
Airframe Total Time:	5700 Hrs	Engine Manufacturer:	Continental
ELT:	C91 installed, not activated	Engine Model/Series:	O-200
Registered Owner:	On file	Rated Power:	90 Horsepower
Operator:	On file	Operating Certificate(s) Held:	None

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	PALH,82 ft msl	Distance from Accident Site:	10 Nautical Miles
Observation Time:	15:53 Local	Direction from Accident Site:	161°
Lowest Cloud Condition:		Visibility	10 miles
Lowest Ceiling:	Broken / 5500 ft AGL	Visibility (RVR):	
Wind Speed/Gusts:	7 knots /	Turbulence Type Forecast/Actual:	None / None
Wind Direction:	50°	Turbulence Severity Forecast/Actual:	N/A / N/A
Altimeter Setting:	29.45 inches Hg	Temperature/Dew Point:	-6°C / -9°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	Anchorage, AK (PALH)	Type of Flight Plan Filed:	None
Destination:	Anchorage, AK (PALH)	Type of Clearance:	None
Departure Time:	13:00 Local	Type of Airspace:	Class E

Wreckage and Impact Information

Crew Injuries:	1 None	Aircraft Damage:	Substantial
Passenger Injuries:		Aircraft Fire:	None
Ground Injuries:		Aircraft Explosion:	None
Total Injuries:	1 None	Latitude, Longitude:	61.332529,-150.07709(est)

Administrative Information

Investigator In Charge (IIC):	Ward, Mark
Additional Participating Persons:	Steve Szymanski; FAA; Anchorage, AK
Original Publish Date:	October 5, 2023
Last Revision Date:	
Investigation Class:	Class 3
Note:	The NTSB did not travel to the scene of this accident.
Investigation Docket:	https://data.nts.gov/Docket?ProjectID=106592

The National Transportation Safety Board (NTSB) is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant events in other modes of transportation—railroad, transit, highway, marine, pipeline, and commercial space. We determine the probable causes of the accidents and events we investigate, and issue safety recommendations aimed at preventing future occurrences. In addition, we conduct transportation safety research studies and offer information and other assistance to family members and survivors for each accident or event we investigate. We also serve as the appellate authority for enforcement actions involving aviation and mariner certificates issued by the Federal Aviation Administration (FAA) and US Coast Guard, and we adjudicate appeals of civil penalty actions taken by the FAA.

The NTSB does not assign fault or blame for an accident or incident; rather, as specified by NTSB regulation, “accident/incident investigations are fact-finding proceedings with no formal issues and no adverse parties ... and are not conducted for the purpose of determining the rights or liabilities of any person” (Title 49 *Code of Federal Regulations* section 831.4). Assignment of fault or legal liability is not relevant to the NTSB’s statutory mission to improve transportation safety by investigating accidents and incidents and issuing safety recommendations. In addition, statutory language prohibits the admission into evidence or use of any part of an NTSB report related to an accident in a civil action for damages resulting from a matter mentioned in the report (Title 49 *United States Code* section 1154(b)). A factual report that may be admissible under 49 *United States Code* section 1154(b) is available [here](#).