



AVIATION



HIGHWAY



MARINE



RAILROAD



PIPELINE

Aviation Investigation Final Report

Location:	Anaktuvuk Pass, Alaska	Accident Number:	ANC07CA072
Date & Time:	August 1, 2007, 11:00 Local	Registration:	N40832
Aircraft:	Piper PA-18	Aircraft Damage:	Substantial
Defining Event:		Injuries:	1 None
Flight Conducted Under:	Part 91: General aviation		

Analysis

The commercial certificated pilot was landing the tundra tire-equipped, tailwheel airplane at an unimproved, off-airport site under Title 14, CFR Part 91, when the accident occurred. According to the pilot, during the base leg of the approach for landing, the engine lost power, and the airplane collided with terrain during an emergency descent/landing. The airplane's owner reported that he observed the airplane's preflight inspection, and watched the pilot sump the fuel tanks, finding a small quantity of water in the tanks. He said the airplane departed, and upon returning, during landing, the engine lost power. While inspecting the airplane after the accident, the owner said he found water in the airplane's gascolator, carburetor, and fuel lines. He said the airplane was fueled from drums with filters, and it had rained during the preceding days. He said he suspected water contaminated fuel was the cause of the engine stoppage, and that after refueling the airplane with clean fuel, the engine started and ran without any problems. The owner said the airplane received damage to its fuselage, wings, lift-struts, and landing gear during the accident.

Probable Cause and Findings

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

The pilot's inadequate preflight inspection, which resulted in a loss of engine power during approach due to water contaminated fuel.

Findings

Occurrence #1: LOSS OF ENGINE POWER

Phase of Operation: APPROACH

Findings

1. (C) FLUID,FUEL - CONTAMINATION,WATER
2. (C) AIRCRAFT PREFLIGHT - INADEQUATE - PILOT IN COMMAND

Occurrence #2: FORCED LANDING

Phase of Operation: DESCENT - EMERGENCY

Occurrence #3: IN FLIGHT COLLISION WITH TERRAIN/WATER

Phase of Operation: DESCENT - EMERGENCY

Findings

3. TERRAIN CONDITION - GROUND

Factual Information

The commercial certificated pilot was landing the tundra tire-equipped, tailwheel airplane at an unimproved, off-airport site under Title 14, CFR Part 91, when the accident occurred. According to the pilot, during the base leg of the approach for landing, the engine quit, and the airplane collided with terrain during an emergency descent/landing. The airplane's owner reported that he observed the airplane's preflight inspection, and watched the pilot sump the fuel tanks, finding a small quantity of water in the tanks. He said the airplane departed, and upon returning, during landing, the engine quit. While inspecting the airplane after the accident, the owner said he found water in the airplane's gascolator, carburetor, and fuel lines. He said the airplane was fueled from drums with filters, and it had rained during the preceding days. He said he suspected water contaminated fuel was the cause of the engine stoppage, and that after refueling the airplane with clean fuel, the engine started and ran without any problems. The owner said the airplane received damage to its fuselage, wings, lift-struts, and landing gear during the accident.

Pilot Information

Certificate:	Commercial; Flight instructor	Age:	55, Male
Airplane Rating(s):	Single-engine land; Single-engine sea; Multi-engine land	Seat Occupied:	Front
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	Airplane	Second Pilot Present:	No
Instructor Rating(s):	Airplane multi-engine; Airplane single-engine; Instrument airplane	Toxicology Performed:	No
Medical Certification:	Class 2 Unknown	Last FAA Medical Exam:	
Occupational Pilot:	Yes	Last Flight Review or Equivalent:	
Flight Time:	1000 hours (Total, all aircraft), 1000 hours (Total, this make and model)		

Aircraft and Owner/Operator Information

Aircraft Make:	Piper	Registration:	N40832
Model/Series:	PA-18	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	18-4468
Landing Gear Type:	Tailwheel	Seats:	2
Date/Type of Last Inspection:	Annual	Certified Max Gross Wt.:	2150 lbs
Time Since Last Inspection:		Engines:	1 Reciprocating
Airframe Total Time:		Engine Manufacturer:	Lycoming
ELT:	Installed, not activated	Engine Model/Series:	O-320
Registered Owner:	Phillip D. Byrd	Rated Power:	150 Horsepower
Operator:		Operating Certificate(s) Held:	None

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:		Distance from Accident Site:	
Observation Time:		Direction from Accident Site:	
Lowest Cloud Condition:	Few	Visibility	10 miles
Lowest Ceiling:	Overcast / 4000 ft AGL	Visibility (RVR):	
Wind Speed/Gusts:	8 knots / None	Turbulence Type Forecast/Actual:	/
Wind Direction:	360°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:		Temperature/Dew Point:	16°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	Anaktuvuk Pass, AK	Type of Flight Plan Filed:	None
Destination:		Type of Clearance:	None
Departure Time:		Type of Airspace:	

Wreckage and Impact Information

Crew Injuries:	1 None	Aircraft Damage:	Substantial
Passenger Injuries:		Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	1 None	Latitude, Longitude:	68.687774,-151.880828

Administrative Information

Investigator In Charge (IIC):	Lewis, Lawrence
Additional Participating Persons:	Ken Thomas; Fairbanks, FSDO-01
Original Publish Date:	November 29, 2007
Last Revision Date:	
Investigation Class:	Class
Note:	This accident report documents the factual circumstances of this accident as described to the NTSB.
Investigation Docket:	https://data.nts.gov/Docket?ProjectID=66688

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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](#).