



Aviation Investigation Final Report

Location:	Anchorage, Alaska	Accident Number:	ANC07LA056
Date & Time:	June 26, 2007, 19:30 Local	Registration:	N78456
Aircraft:	Piper PA-12	Aircraft Damage:	Substantial
Defining Event:		Injuries:	1 None
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

The private certificated pilot was conducting a personal local flight under Title 14, CFR Part 91, when the accident occurred. The pilot said that during cruise flight the engine started to run rough. He was unable to get the engine to run smoothly, and elected to make a precautionary landing on a grass-covered field. He said the grass was knee to waist high, and the airplane nosed over during the landing roll. The pilot indicated that the wings and rudder were damaged when the airplane nosed over. An aircraft mechanic who examined the airplane after recovery said that during a test run of the engine, the engine appeared to have a malfunctioning magneto. The magneto was sent to a shop for examination, and the technician who examined the magneto, said the upper housing had fractured, allowing the wire-lugs to float internally, and the engine to run rough. He said the damage to the magneto did not appear to be the result of the accident, and that the failure of the upper housing was not uncommon in older airplanes.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: The malfunction of an engine magneto during cruise flight, which resulted in a partial loss of engine power, and an on-ground encounter with terrain. A factor associated with the accident was the high vegetation at the off-airport landing site.

Findings

Occurrence #1: LOSS OF ENGINE POWER(PARTIAL) - MECH FAILURE/MALF
Phase of Operation: CRUISE - NORMAL

Findings

1. (C) IGNITION SYSTEM,MAGNETO - FAILURE,PARTIAL

Occurrence #2: ON GROUND/WATER ENCOUNTER WITH TERRAIN/WATER
Phase of Operation: LANDING - ROLL

Findings

2. (F) TERRAIN CONDITION - HIGH VEGETATION
3. PRECAUTIONARY LANDING - PERFORMED - PILOT IN COMMAND

Occurrence #3: NOSE OVER
Phase of Operation: LANDING - ROLL

Factual Information

On June 26, 2007, about 1930 Alaska daylight time, a Piper PA-12 airplane, N78456, sustained substantial damage when it nosed over during an off-airport precautionary landing, about 6 miles northwest of Anchorage, Alaska. The airplane was being operated by the pilot as a visual flight rules (VFR) personal local flight under Title 14, CFR Part 91, when the accident occurred. The solo private certificated pilot was not injured. Visual meteorological conditions prevailed, and no flight plan was filed. The flight departed Merrill Field, Anchorage, about 1910.

During a telephone conversation with the National Transportation Safety Board (NTSB) investigator-in-charge (IIC) on June 27, the pilot said that during cruise flight the engine started to run rough, and he was unable to get the engine to run smoothly, and elected to make a precautionary landing on a grass-covered field, where he had landed on previous occasions. He said the grass was knee to waist high, and the airplane nosed over during the landing roll. The pilot indicated that the wings and rudder were damaged when the airplane nosed over.

After the airplane was recovered, a certificated aircraft mechanic who examined the airplane, told the IIC that during a test run of the engine, the engine appeared to have a malfunctioning magneto. He said the magneto was sent to a shop for examination. During a telephone conversation with the IIC on July 17, the technician who examined the magneto, said the upper housing had fractured, allowing the wire-lugs to float internally, and the engine to run rough. He said the damage to the magneto, in his experience, did not appear to be the result of the accident. He said the failure of the upper housing was not uncommon in older airplanes.

Pilot Information

Certificate:	Private	Age:	44, Male
Airplane Rating(s):	Single-engine land	Seat Occupied:	Front
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	None	Second Pilot Present:	No
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Class 2 With waivers/limitations	Last FAA Medical Exam:	March 1, 2007
Occupational Pilot:	No	Last Flight Review or Equivalent:	December 1, 2006
Flight Time:			

Aircraft and Owner/Operator Information

Aircraft Make:	Piper	Registration:	N78456
Model/Series:	PA-12	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	12-1965
Landing Gear Type:	Tailwheel	Seats:	3
Date/Type of Last Inspection:	December 1, 2006 Annual	Certified Max Gross Wt.:	1935 lbs
Time Since Last Inspection:		Engines:	1 Reciprocating
Airframe Total Time:	4149 Hrs at time of accident	Engine Manufacturer:	Lycoming
ELT:	Installed, activated, did not aid in locating accident	Engine Model/Series:	O-320-A2B
Registered Owner:	Demitrios Deoudes	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:	Clear	Visibility	10 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	/	Turbulence Type Forecast/Actual:	/
Wind Direction:		Turbulence Severity Forecast/Actual:	/
Altimeter Setting:		Temperature/Dew Point:	16°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	Anchorage, AK (PAMR)	Type of Flight Plan Filed:	None
Destination:	Deshka River, AK	Type of Clearance:	None
Departure Time:	19:10 Local	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:	61.210571,-149.88916(est)

Administrative Information

Investigator In Charge (IIC):	Lewis, Lawrence
Additional Participating Persons:	Dave Doerner; Anchorage FSDO-03; Anchorage, AK
Original Publish Date:	August 30, 2007
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.ntsb.gov/Docket?ProjectID=66143

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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](#).