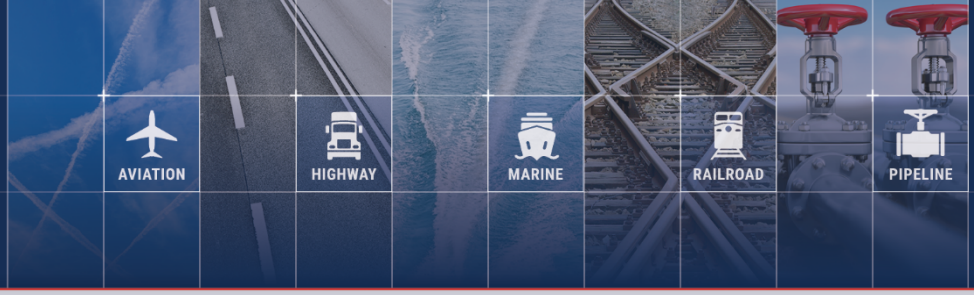

Aviation Investigation Final Report

Location:	BEAUMONT, Pennsylvania	**Accident Number:**	NYC00LA129
Date & Time:	May 6, 2000, 13:30 Local	**Registration:**	N2842N
Aircraft:	Cessna 120	**Aircraft Damage:**	Substantial
Defining Event:		**Injuries:**	2 None
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

While in cruise flight, the pilot experienced a partial power loss and performed a precautionary landing. During the landing to uneven terrain, the airplane came to rest inverted. Examination of the engine revealed a 2 to 3 inch crack in the vicinity of the 'number one' cylinder. At the time of the accident, the engine was approximately 53 years old, with 1,778 hours of operation since its last overhaul in 1961.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: A crack in the crankcase which resulted in a partial power loss.

Findings

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

Findings
1. (C) ENGINE ASSEMBLY,CRANKCASE - CRACKED

Occurrence #2: IN FLIGHT COLLISION WITH TERRAIN/WATER
Phase of Operation: LANDING - FLARE/TOUCHDOWN

Factual Information

On May 6, 2000, about 1330 Eastern Daylight Time, a Cessna 120, N2842N, was substantially damaged during a precautionary landing near Beaumont, Pennsylvania. The certificated private pilot and passenger were not injured. Visual meteorological conditions prevailed, and no flight plan was filed for the personal flight conducted under 14 CFR Part 91. The flight departed Bloomsburg Municipal Airport, Bloomsburg, Pennsylvania, about 1300; and was destined for Skyhaven Airport, Tunkhannock, Pennsylvania.

The pilot stated that he was in cruise flight, about 3,300 feet above mean-sea-level. He observed a decrease in oil pressure, followed by an increase in oil temperature. The engine began to run rough, and the pilot performed a precautionary landing to a field. During the landing, the airplane struck uneven terrain, and came to rest inverted. The propeller, cowling, firewall, and horizontal stabilizer sustained substantial damage.

The pilot further stated that the engine was originally manufactured in 1947. It had an overhaul after approximately 950 hours of operation, in 1961. The pilot added that the overhaul occurred before he purchased the airplane, and the reason for the overhaul was not documented in the airplane logbooks. At the time of the accident, the engine had accumulated approximately 1,778 hours of operation since the overhaul in 1961.

Examination of the wreckage by a Federal Aviation Administration Inspector revealed oil inside the cowling. The Inspector was not able to determine the source of the oil leak. The pilot planned to have a mechanic further examine the engine.

About 1 month after the accident, a mechanic observed a 2 to 3 inch crack in the crankcase. The crack was in the vicinity of the "number one" cylinder. The mechanic said the he could not be positive the crack occurred before the impact, but that it would explain the loss of oil pressure, gain in oil temperature, and partial power loss.

Pilot Information

Certificate:	Private	**Age:**	52,Male
Airplane Rating(s):	Single-engine land	**Seat Occupied:**	Left
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 3 Valid Medical--w/ waivers/lim	**Last FAA Medical Exam:**	April 14, 2000
Occupational Pilot:	UNK	**Last Flight Review or Equivalent:**	
Flight Time:	1046 hours (Total, all aircraft), 851 hours (Total, this make and model), 986 hours (Pilot In Command, all aircraft), 18 hours (Last 90 days, all aircraft), 10 hours (Last 30 days, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Cessna	**Registration:**	N2842N
Model/Series:	120 120	**Aircraft Category:**	Airplane
Year of Manufacture:		**Amateur Built:**	
Airworthiness Certificate:	Normal	**Serial Number:**	13103
Landing Gear Type:	Tailwheel	**Seats:**	2
Date/Type of Last Inspection:	December 14, 1999 Annual	**Certified Max Gross Wt.:**	1450 lbs
Time Since Last Inspection:	26 Hrs	**Engines:**	1 Reciprocating
Airframe Total Time:	2674 Hrs	**Engine Manufacturer:**	Continental
ELT:	Installed, activated, did not aid in locating accident	**Engine Model/Series:**	C-85-12
Registered Owner:	ROGER J. MORTON	**Rated Power:**	85 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:	AVP ,963 ft msl	**Distance from Accident Site:**	10 Nautical Miles
Observation Time:	13:54 Local	**Direction from Accident Site:**	110°
Lowest Cloud Condition:	Clear	**Visibility**	10 miles
Lowest Ceiling:	None	**Visibility (RVR):**	
Wind Speed/Gusts:	6 knots /	**Turbulence Type Forecast/Actual:**	/
Wind Direction:	260°	**Turbulence Severity Forecast/Actual:**	/
Altimeter Setting:	30 inches Hg	**Temperature/Dew Point:**	29°C / 15°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	BLOOMSBURG , PA (N13)	**Type of Flight Plan Filed:**	None
Destination:	TUNKHANNOCK , PA (76N)	**Type of Clearance:**	None
Departure Time:	12:45 Local	**Type of Airspace:**	Class G

Airport Information

Airport:	SKYHAVEN AIRPORT 76N	**Runway Surface Type:**	
Airport Elevation:		**Runway Surface Condition:**	
Runway Used:	0	**IFR Approach:**	None
Runway Length/Width:		**VFR Approach/Landing:**	Precautionary landing

Wreckage and Impact Information

Crew Injuries:	1 None	**Aircraft Damage:**	Substantial
Passenger Injuries:	1 None	**Aircraft Fire:**	None
Ground Injuries:	N/A	**Aircraft Explosion:**	None
Total Injuries:	2 None	**Latitude, Longitude:**	41.370697,-76.020088(est)

Administrative Information

Investigator In Charge (IIC):	Gretz, Robert
Additional Participating Persons:	ROBERT A FERENCE; ALLENTOWN , PA
Original Publish Date:	November 29, 2000
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.ntsb.gov/Docket?ProjectID=51276