



Aviation Investigation Final Report

Location:	Tulsa, Oklahoma	Accident Number:	FTW04LA171
Date & Time:	June 29, 2004, 14:12 Local	Registration:	N6183M
Aircraft:	Stinson 108-3	Aircraft Damage:	Substantial
Defining Event:		Injuries:	1 Serious, 2 Minor
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

During the takeoff roll, as the 25,000-hour pilot began to rotate, the engine started losing power and then completely stopped. He made a 45 degree turn to the right to avoid a church and collided with the ground about 300 feet from the departure end of runway 17 (a 2,800 foot long and 40 foot wide asphalt runway) and 225 to the right of the runway. The passenger said that she did not recall any decrease in engine power and that the sound of the engine remained constant until impact.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: The loss of engine power for undetermined reasons.

Findings

Occurrence #1: LOSS OF ENGINE POWER
Phase of Operation: TAKEOFF

Findings
1. (C) REASON FOR OCCURRENCE UNDETERMINED

Occurrence #2: FORCED LANDING
Phase of Operation: DESCENT - EMERGENCY

Occurrence #3: IN FLIGHT COLLISION WITH TERRAIN/WATER
Phase of Operation: DESCENT - UNCONTROLLED

Findings

2. TERRAIN CONDITION - GROUND

Factual Information

On June 29, 2004, at 1412 central daylight time, a Stinson 108-3 single-engine airplane, N6183M, was substantially damaged after a forced landing following a loss of engine power when it impacted the ground shortly after takeoff from runway 17 at the Harvey Young Airport (1H6), near Tulsa, Oklahoma. The commercial pilot was seriously injured, and the two passengers sustained minor injuries. The airplane was registered to and operated by the pilot. Visual meteorological conditions prevailed, and no flight plan was filed for the 14 Code of Federal Regulations Part 91 personal flight. The flight was originating at the time of the accident.

In a written statement, the pilot reported that shortly after the airplane lifted off the runway, the engine started losing power and then completely stopped. He made a 45 degree turn to the right to avoid a church and collided with the ground about 300 feet from the departure end of the runway.

A passenger, who was a commercial pilot, sat in the right front seat next to the pilot. During the take-off roll, as the pilot began to rotate, she noticed him pointing to the airspeed indicator, which indicated 60 to 65 (she wasn't sure if it was knots or miles per hour). The airplane became airborne, but stayed in "ground effect" for a while until it began to drift right of the runway. Then the right wing dropped and the airplane struck the ground approximately 2,000 feet down and 225 to the right of runway 17 (a 2,580 foot long and 40 foot wide asphalt runway at a field elevation of 750 feet mean sea level (msl)). The passenger said that she did not recall any decrease in engine power and that the sound of the engine remained constant until impact.

Examination of the airplane by a Federal Aviation Administration (FAA) inspector, who responded to the accident site, revealed that the right wing spar was bent and wrinkled, the left wing was wrinkled, and the engine completely separated from its mounts.

The pilot reported a total of 25,000 flight hours; 12,000 in single-engine aircraft, of which, 500 hours were in make and model.

Weather conditions at the time of accident were wind from 100 degrees at 4 knots, broken clouds at 3,400 feet above ground level (agl), overcast clouds at 6,500 feet agl, temperature 82 degrees Fahrenheit, dew point 70 degrees Fahrenheit, and a barometric pressure setting of 30.08 inches of Mercury. The density altitude was calculated at 2,321 feet msl.

Pilot Information

Certificate:	Commercial	Age:	83, 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:	
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Class 3 Valid Medical-w/ waivers/lim	Last FAA Medical Exam:	June 13, 2003
Occupational Pilot:		Last Flight Review or Equivalent:	August 1, 2002
Flight Time:	25000 hours (Total, all aircraft), 500 hours (Total, this make and model), 24500 hours (Pilot In Command, all aircraft), 2 hours (Last 90 days, all aircraft), 1 hours (Last 30 days, all aircraft), 1 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Stinson	Registration:	N6183M
Model/Series:	108-3	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	108-4183
Landing Gear Type:	Tailwheel	Seats:	4
Date/Type of Last Inspection:	May 27, 2004 Annual	Certified Max Gross Wt.:	2400 lbs
Time Since Last Inspection:	1 Hrs	Engines:	1 Reciprocating
Airframe Total Time:	1711 Hrs at time of accident	Engine Manufacturer:	Franklin
ELT:	Installed, not activated	Engine Model/Series:	6A-4-165-B3
Registered Owner:	Robert W. Coates	Rated Power:	165 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:	TUL,739 ft msl	Distance from Accident Site:	5 Nautical Miles
Observation Time:	13:53 Local	Direction from Accident Site:	335°
Lowest Cloud Condition:	3400 ft AGL	Visibility	9 miles
Lowest Ceiling:	Overcast / 6500 ft AGL	Visibility (RVR):	
Wind Speed/Gusts:	4 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	100°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30.07 inches Hg	Temperature/Dew Point:	28°C / 21°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	Tulsa, OK (1H6)	Type of Flight Plan Filed:	None
Destination:		Type of Clearance:	VFR
Departure Time:	14:00 Local	Type of Airspace:	Class G

Airport Information

Airport:	Harvey Young Airport 1H6	Runway Surface Type:	Asphalt
Airport Elevation:	750 ft msl	Runway Surface Condition:	Dry
Runway Used:	17	IFR Approach:	None
Runway Length/Width:	2580 ft / 40 ft	VFR Approach/Landing:	None

Wreckage and Impact Information

Crew Injuries:	1 Serious	Aircraft Damage:	Substantial
Passenger Injuries:	2 Minor	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	1 Serious, 2 Minor	Latitude, Longitude:	36.138889,-95.824722

Administrative Information

Investigator In Charge (IIC):	Yeager, Leah
Additional Participating Persons:	Cary Wilcox; FAA Flight Standards District Office; Oklahoma City, OK
Original Publish Date:	September 29, 2004
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.nts.gov/Docket?ProjectID=59528

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](#).