



# Aviation Investigation Final Report

<b>Location:</b>	Taylorsville, Kentucky	<b>Accident Number:</b>	ERA16LA212
<b>Date &amp; Time:</b>	June 12, 2016, 19:31 Local	<b>Registration:</b>	N42JA
<b>Aircraft:</b>	Piper PA28RT	<b>Aircraft Damage:</b>	Destroyed
<b>Defining Event:</b>	Loss of engine power (partial)	<b>Injuries:</b>	1 Serious
<b>Flight Conducted Under:</b>	Part 91: General aviation - Personal		

## Analysis

The commercial pilot was attempting to take off from a 1,750-ft-long tall grass runway with a 4-knot tailwind. About one-quarter of the way down the runway, a witness heard the engine sputtering and observed that the airplane seemed slow. The witness radioed the pilot and asked him if he was going to reject the takeoff, but the pilot did not respond. The airplane rotated and climbed briefly, then descended and impacted downward-sloping terrain about 500 ft below and 250 yards beyond the departure end of the runway. The airplane came to rest inverted in a wooded area and was mostly consumed by a postcrash fire, the damage from which precluded an engine examination.

## Probable Cause and Findings

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

The pilot's improper decision to continue a takeoff with a partial loss of engine power that occurred early in the takeoff roll. The reason for the partial loss of engine power could not be determined because postaccident fire damage to the engine precluded an examination.

## Findings

<b>Personnel issues</b>	Decision making/judgment - Pilot
<b>Not determined</b>	(general) - Unknown/Not determined



## Factual Information

### History of Flight

<b>Takeoff</b>	Loss of engine power (partial) (Defining event)
<b>Initial climb</b>	Aerodynamic stall/spin
<b>Uncontrolled descent</b>	Collision with terr/obj (non-CFIT)
<b>Post-impact</b>	Fire/smoke (post-impact)

On June 12, 2016, at 1931 eastern daylight time, a Piper PA 28RT-201, N42JA, was destroyed when it impacted terrain shortly after takeoff from Little Mount International Airport (7KY3), Taylorsville, Kentucky. The pilot received serious injuries. Visual meteorological conditions prevailed, and no flight plan was filed for the personal flight destined for Samuels Field Airport (BRY), Bardstown, Kentucky. The flight was conducted under the provisions of 14 *Code of Federal Regulations* Part 91.

Due to his injuries, the pilot did not recall the accident.

A witness located near a hangar about one-quarter of the way down the approximate 1,750-foot-long turf runway, observed the airplane during the takeoff roll. The engine was "sputtering" and the airplane "seemed slow" as it passed by, at an estimated speed of about 30 knots. The witness attempted to contact the pilot using a handheld radio and asked him if he was going to reject the takeoff, but the pilot did not respond. The airplane rotated and climbed briefly, then descended and impacted downward sloping terrain about 500 feet below, and 250 yards beyond the departure end of the runway.

Examination of the accident scene by a Federal Aviation Administration (FAA) inspector revealed that the grass on the turf runway was between 4 to 6 inches long throughout its length. The airplane came to rest inverted in a wooded area and was mostly consumed by a postcrash fire. The left wing had separated during the impact sequence and was located about 25 feet up the debris path closer to the runway. The left wing contained fuel and was not fire-damaged. Flight control continuity was confirmed from the cockpit to the rudder, elevator, and right aileron, and from the cockpit to the left wing area.

One propeller blade was bent slightly aft near the root, the other was straight. No gouges were observed in the leading edge of either blade. The engine sustained fire damage and the crankshaft could not be rotated by hand.

Capital City Airport (FFT), Frankfort, Kentucky was located about 17 miles northeast of the accident site, at an elevation of 804 feet. At 1953, the reported weather included winds from 330 degrees at 4 knots, temperature 28 degrees Celsius, dew point 21 degrees Celsius.

## Pilot Information

<b>Certificate:</b>	Commercial	<b>Age:</b>	70, Male
<b>Airplane Rating(s):</b>	Single-engine land; Single-engine sea; Multi-engine land	<b>Seat Occupied:</b>	Left
<b>Other Aircraft Rating(s):</b>	None	<b>Restraint Used:</b>	3-point
<b>Instrument Rating(s):</b>	None	<b>Second Pilot Present:</b>	No
<b>Instructor Rating(s):</b>	None	<b>Toxicology Performed:</b>	No
<b>Medical Certification:</b>	Class 2 With waivers/limitations	<b>Last FAA Medical Exam:</b>	July 29, 2015
<b>Occupational Pilot:</b>	No	<b>Last Flight Review or Equivalent:</b>	December 12, 2015
<b>Flight Time:</b>	2225 hours (Total, all aircraft), 10 hours (Last 90 days, all aircraft)		

## Aircraft and Owner/Operator Information

<b>Aircraft Make:</b>	Piper	<b>Registration:</b>	N42JA
<b>Model/Series:</b>	PA28RT 201	<b>Aircraft Category:</b>	Airplane
<b>Year of Manufacture:</b>	1979	<b>Amateur Built:</b>	
<b>Airworthiness Certificate:</b>	Normal	<b>Serial Number:</b>	28R-7918110
<b>Landing Gear Type:</b>	Retractable - Tricycle	<b>Seats:</b>	4
<b>Date/Type of Last Inspection:</b>	July 18, 2015 Annual	<b>Certified Max Gross Wt.:</b>	2749 lbs
<b>Time Since Last Inspection:</b>	250 Hrs	<b>Engines:</b>	1 Reciprocating
<b>Airframe Total Time:</b>	9000 Hrs at time of accident	<b>Engine Manufacturer:</b>	LYCOMING
<b>ELT:</b>	Installed, not activated	<b>Engine Model/Series:</b>	I0360-C1C6
<b>Registered Owner:</b>	On file	<b>Rated Power:</b>	210 Horsepower
<b>Operator:</b>	On file	<b>Operating Certificate(s) Held:</b>	None

## Meteorological Information and Flight Plan

<b>Conditions at Accident Site:</b>	Visual (VMC)	<b>Condition of Light:</b>	Day
<b>Observation Facility, Elevation:</b>	KFFT,804 ft msl	<b>Distance from Accident Site:</b>	17 Nautical Miles
<b>Observation Time:</b>	19:53 Local	<b>Direction from Accident Site:</b>	66°
<b>Lowest Cloud Condition:</b>	Clear	<b>Visibility</b>	10 miles
<b>Lowest Ceiling:</b>	None	<b>Visibility (RVR):</b>	
<b>Wind Speed/Gusts:</b>	4 knots /	<b>Turbulence Type Forecast/Actual:</b>	None / None
<b>Wind Direction:</b>	330°	<b>Turbulence Severity Forecast/Actual:</b>	N/A / N/A
<b>Altimeter Setting:</b>	30 inches Hg	<b>Temperature/Dew Point:</b>	28°C / 21°C
<b>Precipitation and Obscuration:</b>	No Obscuration; No Precipitation		
<b>Departure Point:</b>	Taylorsville, KY (7KY3)	<b>Type of Flight Plan Filed:</b>	None
<b>Destination:</b>	BARDSTOWN, KY (BRY )	<b>Type of Clearance:</b>	None
<b>Departure Time:</b>	19:31 Local	<b>Type of Airspace:</b>	

## Airport Information

<b>Airport:</b>	LITTLE MOUNT INTL 7KY3	<b>Runway Surface Type:</b>	Grass/turf
<b>Airport Elevation:</b>	750 ft msl	<b>Runway Surface Condition:</b>	Vegetation
<b>Runway Used:</b>	15	<b>IFR Approach:</b>	None
<b>Runway Length/Width:</b>	1750 ft / 70 ft	<b>VFR Approach/Landing:</b>	None

## Wreckage and Impact Information

<b>Crew Injuries:</b>	1 Serious	<b>Aircraft Damage:</b>	Destroyed
<b>Passenger Injuries:</b>	N/A	<b>Aircraft Fire:</b>	On-ground
<b>Ground Injuries:</b>	N/A	<b>Aircraft Explosion:</b>	None
<b>Total Injuries:</b>	1 Serious	<b>Latitude, Longitude:</b>	38.072223,-85.233886(est)

## Administrative Information

<b>Investigator In Charge (IIC):</b>	Brazy, Douglass
<b>Additional Participating Persons:</b>	Wayne Cummings; FAA/FSDO; Louisville , KY Mike McClure; Piper Aircraft; Vero Beach, FL John Butler; Lycoming Engines; Williamsport, PA
<b>Original Publish Date:</b>	March 18, 2019
<b>Last Revision Date:</b>	
<b>Investigation Class:</b>	<a href="#">Class</a>
<b>Note:</b>	The NTSB did not travel to the scene of this accident.
<b>Investigation Docket:</b>	<a href="https://data.nts.gov/Docket?ProjectID=93369">https://data.nts.gov/Docket?ProjectID=93369</a>

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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](#).