



AVIATION



HIGHWAY



MARINE



RAILROAD



PIPELINE

Aviation Investigation Final Report

Location:	Hartford, Connecticut	Accident Number:	GAA18CA529
Date & Time:	August 28, 2018, 09:30 Local	Registration:	N178DB
Aircraft:	Piper PA46	Aircraft Damage:	Substantial
Defining Event:	Hard landing	Injuries:	4 None
Flight Conducted Under:	Part 91: General aviation		

Analysis

The pilot reported that, during the approach, the tower controller instructed him to stay "high and close." Once he turned to final, he reduced the power, and the airplane began rapidly descending. He added that he applied some power and back pressure to arrest the descent rate as he began to flare, but the airplane landed hard and faster than normal. As the nose landing gear touched down, he applied reverse thrust and braked aggressively. Subsequently, the nose landing gear collapsed, and the airplane came to rest on the runway.

The airplane sustained substantial damage to the fuselage and engine mount.

The pilot reported that postaccident examination revealed that a nose landing gear actuator bolt had sheared off.

The pilot reported that the primary cause of the accident was his failure to maintain a stabilized approach, which resulted in a hard landing and higher-than-normal ground speed upon touchdown.

Probable Cause and Findings

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

The pilot's unstabilized approach and hard landing, which resulted in a nose landing gear collapse.

Findings

Personnel issues

Aircraft control - Pilot

Aircraft

Descent/approach/glide path - Not attained/maintained

Factual Information

History of Flight

Landing	Miscellaneous/other
Landing	Hard landing (Defining event)
Landing	Attempted remediation/recovery
Landing	Landing gear collapse

Pilot Information

Certificate:	Private	Age:	61,Male
Airplane Rating(s):	Single-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	3-point
Instrument Rating(s):	Airplane	Second Pilot Present:	No
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Class 3 Without waivers/limitations	Last FAA Medical Exam:	May 30, 2017
Occupational Pilot:	No	Last Flight Review or Equivalent:	May 11, 2018
Flight Time:	(Estimated) 3407 hours (Total, all aircraft), 540 hours (Total, this make and model), 3282 hours (Pilot In Command, all aircraft), 27 hours (Last 90 days, all aircraft), 5 hours (Last 30 days, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Piper	Registration:	N178DB
Model/Series:	PA46 350P	Aircraft Category:	Airplane
Year of Manufacture:	2002	Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	4636333
Landing Gear Type:	Retractable - Tricycle	Seats:	6
Date/Type of Last Inspection:	April 11, 2018 Annual	Certified Max Gross Wt.:	4340 lbs
Time Since Last Inspection:		Engines:	1 Turbo prop
Airframe Total Time:	1896 Hrs as of last inspection	Engine Manufacturer:	Pratt & Whitney
ELT:	C126 installed, activated, did not aid in locating accident	Engine Model/Series:	PT6A-35
Registered Owner:		Rated Power:	560 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:	KHFD, 19 ft msl	Distance from Accident Site:	0 Nautical Miles
Observation Time:	13:31 Local	Direction from Accident Site:	230°
Lowest Cloud Condition:	Clear	Visibility	8 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	/	Turbulence Type Forecast/Actual:	None / None
Wind Direction:		Turbulence Severity Forecast/Actual:	N/A / N/A
Altimeter Setting:	30.02 inches Hg	Temperature/Dew Point:	29°C / 23°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	Manchester, NH (MHT)	Type of Flight Plan Filed:	IFR
Destination:	Hartford, CT (HFD)	Type of Clearance:	IFR
Departure Time:	08:45 Local	Type of Airspace:	Class D

Airport Information

Airport:	HARTFORD-BRAINARD HFD	Runway Surface Type:	Asphalt
Airport Elevation:	18 ft msl	Runway Surface Condition:	Dry
Runway Used:	20	IFR Approach:	None
Runway Length/Width:	4417 ft / 150 ft	VFR Approach/Landing:	Full stop;Straight-in

Wreckage and Impact Information

Crew Injuries:	1 None	Aircraft Damage:	Substantial
Passenger Injuries:	3 None	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	4 None	Latitude, Longitude:	41.737499,-72.648612(est)

Administrative Information

Investigator In Charge (IIC):	Swenson, Eric
Additional Participating Persons:	Dennis Oparowski; FAA; Bradley, CT
Original Publish Date:	March 18, 2019
Note:	This accident report documents the factual circumstances of this accident as described to the NTSB.
Investigation Docket:	https://data.nts.gov/Docket?ProjectID=98233

The National Transportation Safety Board (NTSB), established in 1967, is an independent federal agency mandated by Congress through the Independent Safety Board Act of 1974 to investigate transportation accidents, determine the probable causes of the accidents, issue safety recommendations, study transportation safety issues, and evaluate the safety effectiveness of government agencies involved in transportation. The NTSB makes public its actions and decisions through accident reports, safety studies, special investigation reports, safety recommendations, and statistical reviews.

The Independent Safety Board Act, as codified at 49 U.S.C. Section 1154(b), precludes the admission into evidence or use of any part of an NTSB report related to an incident or accident in a civil action for damages resulting from a matter mentioned in the report. A factual report that may be admissible under 49 U.S.C. § 1154(b) is available [here](#).