



AVIATION



HIGHWAY



MARINE



RAILROAD



PIPELINE

Aviation Investigation Final Report

Location:	Cape Carteret, North Carolina	Accident Number:	GAA18CA281
Date & Time:	May 14, 2018, 12:30 Local	Registration:	N25WE
Aircraft:	Piper PA 32R	Aircraft Damage:	Substantial
Defining Event:	Abnormal runway contact	Injuries:	2 None
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

According to the pilot in the retractable-landing gear-equipped airplane, he set up for an extended final approach to the sandy turf runway. He waited until he cleared the trees and "then...dropped down to land." The main landing gear touched down first, followed by the nose landing gear. The main and nose landing gear collapsed upon contact with the runway. The pilot reported that the airplane slid about 300 ft before it came to a stop on the right side of the runway.

The airplane sustained substantial damage to both wings and the lower fuselage.

The Federal Aviation Administration aviation safety inspector who examined the airplane at the accident site reported that witnesses stated that the pilot landed the airplane hard on the sandy turf surface. However, the pilot stated that he did not. However, the pilot did state that he really had to bring the airplane in steep over the trees to get it on the runway.

Photographs provided by the operator showed vertical deformation of both wings at the main landing gear mount location.

Probable Cause and Findings

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

The pilot's steep approach, which resulted in a hard landing and the collapse of the landing gear during touchdown.

Findings

Aircraft	Descent rate - Not attained/maintained
Aircraft	Main landing gear - Capability exceeded
Personnel issues	Aircraft control - Pilot

Factual Information

History of Flight

Landing-landing roll	Landing gear collapse
Landing-landing roll	Abnormal runway contact (Defining event)

Pilot Information

Certificate:	Private	Age:	38,Male
Airplane Rating(s):	Single-engine land; Multi-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	3-point
Instrument Rating(s):	None	Second Pilot Present:	No
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Class 3 Without waivers/limitations	Last FAA Medical Exam:	March 2, 2017
Occupational Pilot:	No	Last Flight Review or Equivalent:	January 13, 2017
Flight Time:	(Estimated) 600 hours (Total, all aircraft), 250 hours (Total, this make and model), 425 hours (Pilot In Command, all aircraft), 44 hours (Last 90 days, all aircraft), 1.2 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Piper	Registration:	N25WE
Model/Series:	PA 32R 300	Aircraft Category:	Airplane
Year of Manufacture:	1981	Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	32R-8113039
Landing Gear Type:	Retractable - Tricycle	Seats:	6
Date/Type of Last Inspection:	November 15, 2017 Unknown	Certified Max Gross Wt.:	3600 lbs
Time Since Last Inspection:		Engines:	1 Reciprocating
Airframe Total Time:	6025 Hrs as of last inspection	Engine Manufacturer:	Lycoming
ELT:	Installed, not activated	Engine Model/Series:	IO-540-K1G5D
Registered Owner:		Rated Power:	300
Operator:		Operating Certificate(s) Held:	None

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	KNJM,22 ft msl	Distance from Accident Site:	2 Nautical Miles
Observation Time:	16:57 Local	Direction from Accident Site:	146°
Lowest Cloud Condition:	Clear	Visibility	10 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	13 knots /	Turbulence Type Forecast/Actual:	/ None
Wind Direction:	230°	Turbulence Severity Forecast/Actual:	/ N/A
Altimeter Setting:	30.09 inches Hg	Temperature/Dew Point:	26°C / 22°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	Burlington, NC (BUY)	Type of Flight Plan Filed:	VFR
Destination:	Cape Carteret, NC (60NC)	Type of Clearance:	VFR flight following
Departure Time:	11:15 Local	Type of Airspace:	Class D

Airport Information

Airport:	STAR HILL GOLF CLUB 60NC	Runway Surface Type:	Grass/turf
Airport Elevation:	40 ft msl	Runway Surface Condition:	Dry
Runway Used:	06	IFR Approach:	None
Runway Length/Width:	2800 ft / 75 ft	VFR Approach/Landing:	Go around;Traffic pattern

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:	34.705276,-77.051109(est)

Administrative Information

Investigator In Charge (IIC):	Hicks, Michael
Additional Participating Persons:	Timothy Hahn; FAA; Greensboro, NC
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=97264

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](#).