



Aviation Investigation Final Report

Location:	Philadelphia, Pennsylvania	Accident Number:	NYC02LA007
Date & Time:	October 10, 2001, 16:00 Local	Registration:	N91284
Aircraft:	Piper PA-34-200T	Aircraft Damage:	Substantial
Defining Event:		Injuries:	2 None
Flight Conducted Under:	Part 91: General aviation - Instructional		

Analysis

The pilot and flight instructor were conducting a VFR training flight, and had completed the departure and en route portions without incident. Once in the terminal area, the tower advised the pilot to enter a right base for runway 24. The pilot lowered the landing gear, and verbalized it was down with "three in the green" and "one in the mirror." The instructor looked at the landing gear indicator, and confirmed the gear was down and locked. The instructor called for the "prelanding checklist," and the pilot confirmed it was complete. The airplane was cleared to land. On short final, the instructor called out mixture rich, propellers full forward, and landing gear down with "three green." The airplane touched down and the instructor commented to the pilot, "nice landing." The right main landing gear then collapsed, and the airplane veered to the right. The right wing struck a runway light, and the nose gear collapsed. The airplane came to a stop up right with the left main landing gear still down and locked. The instructor along with the pilot exited the airplane. Examination of the right main landing gear revealed no preimpact failures or malfunctions. In addition, a witness saw the nose wheel, along with the left and right main landing gear in the down position when the airplane landed.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: The collapse of the right main landing gear for undetermined reasons.

Findings

Occurrence #1: GEAR COLLAPSED

Phase of Operation: LANDING - ROLL

Findings

1. REASON FOR OCCURRENCE UNDETERMINED

Factual Information

On October 10, 2001, about 1600 eastern daylight time, a Piper PA-34-200T, N91284, was substantially damaged during landing at the Northeast Philadelphia Airport (PNE), Philadelphia, Pennsylvania. The certificated flight instructor and commercial pilot were not injured. Visual meteorological conditions prevailed for the instructional flight that departed Perkiomen Valley Airport (N10), Collegeville, Pennsylvania. No flight plan was filed for the flight conducted under 14 CFR Part 91.

According to the flight instructor, the tower advised them to enter a right base for runway 24. The pilot reduced the airspeed, and added one notch of flaps. He then lowered the landing gear, and verbalized it was down with "three in the green" and "one in the mirror." The instructor looked at the landing gear indicator, and confirmed that the gear was down and locked. The instructor called for the "prelanding checklist," and the pilot confirmed it was complete.

The tower cleared the airplane to land. On short final, the instructor called out mixture rich, propellers full forward, and landing gear down with "three green." The airplane touched down and everything seemed normal. The instructor even commented to the pilot, "nice landing." While the airplane was rolling-out, the right main landing gear collapsed, and the airplane veered to the right. The instructor stepped on the left rudder in an attempt to maintain directional control. The right wing struck a runway light, and the nose gear collapsed. The airplane came to a stop, and the instructor along with the pilot exited under their own power.

According to a Federal Aviation Administration inspector, the airplane came to rest with the left main landing gear down and locked. Examination of the right main landing gear revealed no preimpact failures or malfunctions.

According to a witness, the nose wheel, along with the left and right main landing gear were down when the airplane landed.

Flight instructor Information

Certificate:	Commercial; Flight instructor	Age:	37, Male
Airplane Rating(s):	Single-engine land; Multi-engine land	Seat Occupied:	Right
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	Airplane	Second Pilot Present:	Yes
Instructor Rating(s):	Airplane multi-engine; Airplane single-engine; Instrument airplane	Toxicology Performed:	No
Medical Certification:	Class 1 Valid Medical--no waivers/lim.	Last FAA Medical Exam:	April 4, 2001
Occupational Pilot:	Yes	Last Flight Review or Equivalent:	January 23, 2001
Flight Time:	9800 hours (Total, all aircraft), 1800 hours (Total, this make and model), 9306 hours (Pilot In Command, all aircraft), 55 hours (Last 90 days, all aircraft), 20 hours (Last 30 days, all aircraft), 4 hours (Last 24 hours, all aircraft)		

Student pilot Information

Certificate:	Commercial	Age:	59, Male
Airplane Rating(s):	Single-engine land; Multi-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	Airplane	Second Pilot Present:	Yes
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Class 2 Valid Medical--w/ waivers/lim	Last FAA Medical Exam:	February 23, 2001
Occupational Pilot:	No	Last Flight Review or Equivalent:	September 27, 2000
Flight Time:	836 hours (Total, all aircraft), 636 hours (Total, this make and model), 563 hours (Pilot In Command, all aircraft), 12 hours (Last 90 days, all aircraft), 6 hours (Last 30 days, all aircraft), 3 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Piper	Registration:	N91284
Model/Series:	PA-34-200T	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	34-7970111
Landing Gear Type:	Retractable - Tricycle	Seats:	6
Date/Type of Last Inspection:	October 3, 2001 Annual	Certified Max Gross Wt.:	3800 lbs
Time Since Last Inspection:	5 Hrs	Engines:	2 Reciprocating
Airframe Total Time:	4900 Hrs at time of accident	Engine Manufacturer:	Lycoming
ELT:	Installed, not activated	Engine Model/Series:	IO-360
Registered Owner:	Air King International INC	Rated Power:	200 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:	PNE,121 ft msl	Distance from Accident Site:	0 Nautical Miles
Observation Time:	15:54 Local	Direction from Accident Site:	0°
Lowest Cloud Condition:	Clear	Visibility	10 miles
Lowest Ceiling:		Visibility (RVR):	
Wind Speed/Gusts:	9 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	200°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30.38 inches Hg	Temperature/Dew Point:	21°C / 10°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	COLLEGEVILLE, PA (N10)	Type of Flight Plan Filed:	None
Destination:	Philadelphia, PA (PNE)	Type of Clearance:	None
Departure Time:	15:56 Local	Type of Airspace:	Class B

Airport Information

Airport:	NORTHEAST PHILADELPHIA PNE	Runway Surface Type:	Asphalt
Airport Elevation:	121 ft msl	Runway Surface Condition:	Dry
Runway Used:	24	IFR Approach:	None
Runway Length/Width:	7000 ft / 150 ft	VFR Approach/Landing:	Full stop;Traffic pattern

Wreckage and Impact Information

Crew Injuries:	2 None	Aircraft Damage:	Substantial
Passenger Injuries:		Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	2 None	Latitude, Longitude:	40.069847,-74.999191(est)

Administrative Information

Investigator In Charge (IIC): Muzio, David

Additional Participating Persons: Jim Moll; FAA/FSDO; Philadelphia, PA

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Last Revision Date:

Investigation Class: [Class](#)

Note:

Investigation Docket: <https://data.ntsb.gov/Docket?ProjectID=53597>

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