



Aviation Investigation Final Report

Location:	Land O' Lakes, Wisconsin	Accident Number:	CEN15LA351
Date & Time:	July 19, 2015, 13:35 Local	Registration:	N142DD
Aircraft:	ROBERTS BRUCE W VANS AIRCRAFT RV 9A	Aircraft Damage:	Substantial
Defining Event:	Landing gear collapse	Injuries:	2 Minor
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

The pilot and passenger were landing on a grass strip when the airplane landed hard and bounced twice. The nose gear fork embedded in the grass surface, the nose gear collapsed, and the propeller lodged in the soil. The airplane nosed over and came to rest inverted, which resulted in substantial damage to the vertical stabilizer and main spar. Although the pilot thought that the airplane had hit an uneven surface during landing that caused the gear to collapse, an examination of the grass runway did not reveal any irregularities in the surface of the area of the nose gear collapse.

Probable Cause and Findings

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

The pilot's failure to maintain a proper descent rate, which resulted in a hard landing.

Findings

Personnel issues	Incorrect action performance - Pilot
Aircraft	Descent rate - Not attained/maintained

Factual Information

History of Flight

Landing-landing roll	Landing gear collapse (Defining event)
Landing-landing roll	Nose over/nose down

On July 19, 2015, about 1335 central daylight time, a Vans RV-9A, N142DD, was substantially damaged when it was involved in an accident at Kings Land O' Lakes Airport (LNL), Land O' Lakes, Wisconsin. The pilot and passenger received minor injuries. The airplane was operated as a Title 14 *Code of Federal Regulations* Part 91 personal flight.

According to details provided by Federal Aviation Administration (FAA) inspectors, the airplane landed hard on the grass runway and bounced twice. After the second bounce, the nose gear fork embedded into the grass. The nose landing gear leg folded under the cowling. The propeller spinner dug into the ground and the airplane nosed over, coming to rest inverted. The vertical stabilizer and main spar sustained substantial damage.

The pilot reported to the FAA inspectors that the airplane hit uneven surface during the landing and that caused the nose landing gear to collapse. A local mechanic drove the runway in his vehicle and advised the FAA inspectors there were no irregularities in the surface in the area of the nose gear collapse.

The NTSB did not receive a completed "Pilot/Operator Aircraft Accident/Incident Report" from the pilot.

Pilot Information

Certificate:	Private	Age:	42, Male
Airplane Rating(s):	Single-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	Unknown
Instrument Rating(s):	None	Second Pilot Present:	
Instructor Rating(s):	None	Toxicology Performed:	No
Medical Certification:	Class 3	Last FAA Medical Exam:	April 20, 2012
Occupational Pilot:	No	Last Flight Review or Equivalent:	
Flight Time:			

Aircraft and Owner/Operator Information

Aircraft Make:	ROBERTS BRUCE W	Registration:	N142DD
Model/Series:	VANS AIRCRAFT RV 9A A	Aircraft Category:	Airplane
Year of Manufacture:	2006	Amateur Built:	Yes
Airworthiness Certificate:	Experimental (Special)	Serial Number:	90732
Landing Gear Type:	Tricycle	Seats:	
Date/Type of Last Inspection:		Certified Max Gross Wt.:	
Time Since Last Inspection:		Engines:	Reciprocating
Airframe Total Time:		Engine Manufacturer:	Aero Sport Power
ELT:		Engine Model/Series:	O-320-D1A
Registered Owner:	On file	Rated Power:	160 Horsepower
Operator:	On file	Operating Certificate(s) Held:	None

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	KLNL,1704 ft msl	Distance from Accident Site:	0 Nautical Miles
Observation Time:	18:35 Local	Direction from Accident Site:	220°
Lowest Cloud Condition:	Scattered / 7000 ft AGL	Visibility	10 miles
Lowest Ceiling:		Visibility (RVR):	
Wind Speed/Gusts:	12 knots / 19 knots	Turbulence Type Forecast/Actual:	/
Wind Direction:	260°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	29.84 inches Hg	Temperature/Dew Point:	25°C / 11°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:		Type of Flight Plan Filed:	None
Destination:	Land O' Lakes, WI (LNL)	Type of Clearance:	VFR
Departure Time:		Type of Airspace:	Class G

Airport Information

Airport:	KINGS LAND O' LAKES LNL	Runway Surface Type:	Grass/turf
Airport Elevation:	1705 ft msl	Runway Surface Condition:	
Runway Used:	UNK	IFR Approach:	None
Runway Length/Width:	2577 ft / 130 ft	VFR Approach/Landing:	Unknown

Wreckage and Impact Information

Crew Injuries:	1 Minor	Aircraft Damage:	Substantial
Passenger Injuries:	1 Minor	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	2 Minor	Latitude, Longitude:	46.154167,-89.211944(est)

Administrative Information

Investigator In Charge (IIC):	Liedler, Courtney
Additional Participating Persons:	Jurg Grossenbacher; FAA; Milwaukee, WI
Original Publish Date:	August 3, 2020
Last Revision Date:	
Investigation Class:	Class
Note:	The NTSB did not travel to the scene of this accident.
Investigation Docket:	https://data.nts.gov/Docket?ProjectID=91761

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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](#).