Aviation Investigation Final Report

Location:	INVERNESS, Florida	**Accident Number:**	MIA96LA004
Date & Time:	October 7, 1995, 13:52 Local	**Registration:**	N912XL
Aircraft:	LOUKS PULSAR XP	**Aircraft Damage:**	Substantial
Defining Event:		**Injuries:**	1 Fatal, 1 Serious
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

The pilot stated that he performed an engine run-up before departure with no discrepancies noted. He initiated a takeoff in a no-wind condition with the flaps retracted. The pilot stated that after lift-off, he leveled off about 4 to 5 feet above the runway to build airspeed. He stated that the 'plane dropped, left wing more that right, aircraft skidded off runway, and hit runway marker along edge of runway at approximately 10 mph.' A postcrash fire erupted in the right wing area after the airplane came to rest. Both occupants were seriously burned. The passenger died later due to burns. The pilot stated that there was no preimpact failure or malfunction of the engine or flight control.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: Premature rotation by the pilot during takeoff, which resulted in an inadvertent stall/mush, while attempting to accelerate in ground effect after lift-off.

Findings

Occurrence #1: LOSS OF CONTROL - IN FLIGHT
Phase of Operation: TAKEOFF

Findings
1. (C) ROTATION - PREMATURE - PILOT IN COMMAND
2. (C) STALL/MUSH - INADVERTENT - PILOT IN COMMAND

Occurrence #2: ON GROUND/WATER COLLISION WITH OBJECT
Phase of Operation: TAKEOFF - ABORTED

Findings
3. OBJECT - AIRPORT SIGN/MARKER

Factual Information

On October 7, 1995, about 1352 eastern daylight time, a homebuilt Pulsar XP, N912XL, crashed during takeoff from the Inverness Airport, Inverness, Florida. Visual meteorological conditions prevailed at the time and no flight plan was filed for the 14 CFR Part 91 personal flight. The airplane was substantially damaged by impact and a postcrash fire and the commercial-rated pilot sustained serious injuries. One passenger who was seriously injured died 13 days after the accident. The flight was originating at the time of the accident.

The pilot stated that he performed an engine run-up before takeoff with no discrepancies noted. During the takeoff ground roll under no wind condition with the flaps retracted, he intentionally remained on the ground for a longer time. After rotation he lowered the nose of the airplane to accelerate during which the airplane rolled to the left, descended, and touched down. While on the ground travelling about 10-15 miles per hour, the right wing of the airplane collided with a runway marker sign. The airplane then spun to the right and came to rest on a heading of about 085 degrees. A postcrash fire started on the right side of the airplane after it came to rest. He reported that he rescued his wife who was uninjured as a result of the collision with the sign, out the left side of the airplane. He further stated that there was no preimpact failure or malfunction of the engine or flight controls.

A witness who was located about 150 yards south of the airport observed the airplane during the takeoff ground roll and stated that it appeared to him that the airplane was in a nose high attitude. The airplane climbed to 6-7 feet above the runway then was observed to roll to his right and disappeared behind trees.

Information pertaining to the weather is contained in an NTSB Weather Factual Report. The pilot later reported that the wind condition was calm at the time of the accident.

According to the designer of the airplane, the calculated stall speed at the time of the accident was about 48 miles per hour.

Pilot Information

Certificate:	Commercial	**Age:**	55,Male
Airplane Rating(s):	Single-engine land	**Seat Occupied:**	Left
Other Aircraft Rating(s):	None	**Restraint Used:**	
Instrument Rating(s):	Airplane	**Second Pilot Present:**	No
Instructor Rating(s):	None	**Toxicology Performed:**	No
Medical Certification:	Class 3 Valid Medical--w/ waivers/lim	**Last FAA Medical Exam:**	July 6, 1995
Occupational Pilot:	UNK	**Last Flight Review or Equivalent:**	
Flight Time:	900 hours (Total, all aircraft), 75 hours (Total, this make and model), 725 hours (Pilot In Command, all aircraft), 4 hours (Last 90 days, all aircraft), 3 hours (Last 30 days, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	LOUKS	**Registration:**	N912XL
Model/Series:	PULSAR XP PULSAR XP	**Aircraft Category:**	Airplane
Year of Manufacture:		**Amateur Built:**	Yes
Airworthiness Certificate:	Experimental (Special)	**Serial Number:**	251
Landing Gear Type:	Tricycle	**Seats:**	2
Date/Type of Last Inspection:	September 7, 1995 Annual	**Certified Max Gross Wt.:**	1060 lbs
Time Since Last Inspection:	1 Hrs	**Engines:**	1 Reciprocating
Airframe Total Time:	93 Hrs	**Engine Manufacturer:**	ROTAX
ELT:	Installed	**Engine Model/Series:**	912
Registered Owner:	RAYMOND L. LOUKS	**Rated Power:**	80 Horsepower
Operator:		**Operating Certificate(s) Held:**	None
Operator Does Business As:		**Operator Designator Code:**	

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	**Condition of Light:**	Day
Observation Facility, Elevation:	OCF ,90 ft msl	**Distance from Accident Site:**	23 Nautical Miles
Observation Time:	14:15 Local	**Direction from Accident Site:**	16°
Lowest Cloud Condition:	Scattered / 2200 ft AGL	**Visibility**	10 miles
Lowest Ceiling:	None	**Visibility (RVR):**	
Wind Speed/Gusts:	/ None	**Turbulence Type Forecast/Actual:**	/
Wind Direction:	0°	**Turbulence Severity Forecast/Actual:**	/
Altimeter Setting:	29 inches Hg	**Temperature/Dew Point:**	29°C / 22°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	(X40)	**Type of Flight Plan Filed:**	None
Destination:		**Type of Clearance:**	None
Departure Time:	13:52 Local	**Type of Airspace:**	Class G

Airport Information

Airport:	INVERNESS X40	**Runway Surface Type:**	Asphalt
Airport Elevation:	50 ft msl	**Runway Surface Condition:**	Dry
Runway Used:	19	**IFR Approach:**	None
Runway Length/Width:	3792 ft / 60 ft	**VFR Approach/Landing:**	None

Wreckage and Impact Information

Crew Injuries:	1 Serious	**Aircraft Damage:**	Substantial
Passenger Injuries:	1 Fatal	**Aircraft Fire:**	On-ground
Ground Injuries:	N/A	**Aircraft Explosion:**	Unknown
Total Injuries:	1 Fatal, 1 Serious	**Latitude, Longitude:**	28.830974,-82.270637(est)

Administrative Information

Investigator In Charge (IIC):	Monville, Timothy
Additional Participating Persons:	ROBERT L CUNNINGHAM; ORLANDO , FL
Original Publish Date:	May 9, 1996
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.ntsb.gov/Docket?ProjectID=37927

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