



Aviation Investigation Final Report

Location:	SAN DIEGO, California	Accident Number:	LAX90LA306
Date & Time:	August 27, 1990, 13:02 Local	Registration:	N4220K
Aircraft:	RYAN NAVION	Aircraft Damage:	Substantial
Defining Event:		Injuries:	2 Serious
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

THE ENGINE LOST POWER DURING INITIAL CLIMB AND THE PILOT WAS UNABLE TO MAINTAIN ALTITUDE. THE AIRCRAFT COLLIDED WITH A FREEWAY GUARDRAIL DURING THE FORCED LANDING. INVESTIGATION DISCLOSED A BLOCKAGE IN THE FUEL INLET SCREEN. THE BLOCKAGE WAS IDENTIFIED AS A SMALL PIECE OF RUBBER HOSE INTERLINER. RECORDS INDICATE THE FUEL HOSE WAS FABRICATED AND INSTALLED ON THE AIRCRAFT ON OR ABOUT JANUARY 19, 1990, AT ABOUT 38 TACH HOURS PRIOR TO THE ACCIDENT. RECORDS ALSO INDICATE THE ENGINE WAS MAJOR OVERHAULED ON DECEMBER 12, 1989, AT WHICH TIME ALL FUEL, OIL AND HYDRAULIC HOSES WERE REPLACED.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: FUEL STARVATION CAUSED BY BLOCKAGE OF FUEL INLET SCREEN BY PIECE OF IMPROPERLY INSTALLED FUEL HOSE.

Findings

Occurrence #1: LOSS OF ENGINE POWER(PARTIAL) - NONMECHANICAL
Phase of Operation: TAKEOFF - INITIAL CLIMB

Findings

1. (C) FLUID,FUEL - STARVATION
2. (C) FUEL SYSTEM,SCREEN - BLOCKED(PARTIAL)

3. (C) MAINTENANCE, INSTALLATION - IMPROPER - OTHER MAINTENANCE PERSONNEL

Occurrence #2: FORCED LANDING

Phase of Operation: DESCENT - EMERGENCY

Findings

4. (F) TERRAIN CONDITION - NONE SUITABLE

Occurrence #3: ON GROUND/WATER COLLISION WITH OBJECT

Phase of Operation: LANDING - FLARE/TOUCHDOWN

Findings

5. OBJECT - WALL/BARRICADE

Factual Information

Pilot Information

Certificate:	Private	Age:	52, Male
Airplane Rating(s):	Single-engine land	Seat Occupied:	Unknown
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	None	Second Pilot Present:	No
Instructor Rating(s):		Toxicology Performed:	No
Medical Certification:	Class 2 Valid Medical--no waivers/lim.	Last FAA Medical Exam:	August 21, 1990
Occupational Pilot:	UNK	Last Flight Review or Equivalent:	
Flight Time:	902 hours (Total, all aircraft), 800 hours (Pilot In Command, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	RYAN	Registration:	N4220K
Model/Series:	NAVION NAVION	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:		Serial Number:	1220
Landing Gear Type:	Retractable - Tricycle	Seats:	4
Date/Type of Last Inspection:	Unknown	Certified Max Gross Wt.:	2750 lbs
Time Since Last Inspection:	0 Hrs	Engines:	1 Reciprocating
Airframe Total Time:		Engine Manufacturer:	CONTINENTAL
ELT:		Engine Model/Series:	E185
Registered Owner:		Rated Power:	205 Horsepower
Operator:	DAVID L. SMITH	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:	MYF	Distance from Accident Site:	
Observation Time:		Direction from Accident Site:	
Lowest Cloud Condition:	Clear	Visibility	15 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	10 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	310°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:		Temperature/Dew Point:	-18°C / -18°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	SAN DIEGO , CA (MYF)	Type of Flight Plan Filed:	None
Destination:		Type of Clearance:	None
Departure Time:	13:02 Local	Type of Airspace:	

Airport Information

Airport:		Runway Surface Type:	
Airport Elevation:	0 ft msl	Runway Surface Condition:	
Runway Used:	0	IFR Approach:	None
Runway Length/Width:	0 ft / 0 ft	VFR Approach/Landing:	Forced landing

Wreckage and Impact Information

Crew Injuries:	1 Serious	Aircraft Damage:	Substantial
Passenger Injuries:	1 Serious	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	2 Serious	Latitude, Longitude:	32.799232,-117.12947(est)

Administrative Information

Investigator In Charge (IIC): Petterson, George

Additional Participating Persons:

Original Publish Date: December 8, 1992

Last Revision Date:

Investigation Class: [Class](#)

Note:

Investigation Docket: <https://data.nts.gov/Docket?ProjectID=26909>

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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](#).