Aviation Investigation Final Report

Location:	San Martin, California	**Accident Number:**	LAX04LA182
Date & Time:	April 9, 2004, 13:19 Local	**Registration:**	N25645
Aircraft:	Piper PA-38-112	**Aircraft Damage:**	Substantial
Defining Event:		**Injuries:**	1 None
Flight Conducted Under:	Part 91: General aviation - Personal		

Analysis

The airplane collided with a fence during a forced landing due to loss of engine power in the takeoff initial climb. The airplane had not been flown for about 6 weeks. The owner and pilot completed a thorough preflight inspection of the airplane, with special attention to the fuel samples. The pilot was unable to remember when the airplane's fuel tanks were last filled, but opined that it was also nearly 6 weeks previous. The pilot reported the quantity of the fuel tanks as more than 1/2 full, and the fuel samples were clear of water and debris. The pilot operated the engine for about 20 minutes, and then performed before takeoff checks. The pilot stated that all engine and fuel system indications were normal. During initial climb after takeoff, the airplane's engine experienced a loss of power, resulting in a forced landing. During recovery of the airplane, fuel was found in one tank, the other tank had ruptured with evidence of fuel spillage on the ground underneath.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: the loss of engine power for undetermined reasons.

Findings

Occurrence #1: LOSS OF ENGINE POWER
Phase of Operation: TAKEOFF - INITIAL CLIMB

Findings

1. (C) REASON FOR OCCURRENCE UNDETERMINED

Occurrence #2: FORCED LANDING
Phase of Operation: EMERGENCY LANDING AFTER TAKEOFF

Occurrence #3: ON GROUND/WATER COLLISION WITH OBJECT
Phase of Operation: EMERGENCY LANDING AFTER TAKEOFF

Findings
2. OBJECT - FENCE

Factual Information

On April 9, 2004, about 1319 Pacific daylight time, a Piper PA-38-112, N25645, collided with the airport perimeter fence after a loss of engine power during departure from South County Airport of Santa Clara County, San Martin, California. The owner operated the airplane under the provisions of 14 CFR Part 91. The commercial pilot, the sole occupant, was not injured; the airplane sustained substantial damage. Visual meteorological conditions prevailed, and a flight plan had not been filed. The personal local flight was originating at the time of the accident.

In a written statement, the pilot reported that the airplane had not been flown for about 6 weeks. The owner and pilot completed a thorough preflight inspection of the airplane, with special attention to the fuel samples. The pilot was unable to remember when the airplane's fuel tanks were last filled, but opined that it was also nearly 6 weeks previous. The pilot reported the quantity of the fuel tanks as more than 1/2 full, and the fuel samples were clear of water and debris.

The pilot operated the engine for about 20 minutes, and then performed a before takeoff check. The pilot stated that all engine and fuel system indications were normal. During initial climb after takeoff, the airplane's engine experienced a loss of power, resulting in a forced landing. The pilot attempted to land the airplane in an open field and collided with the airport perimeter fence.

In a telephone interview with a National Transportation Safety Board investigator, an airport operations employee, and certified pilot, recalled witnessing the accident. The witness stated that he was performing maintenance on the airport perimeter when he heard sputtering from the airplane's engine. He watched the pilot perform a right turn and make a forced landing in a field. The witness added that during recovery while moving the airplane, he noted that one of the fuel tanks contained fuel. The other fuel tank was ruptured in the accident and he noted evidence of fuel leakage nearby.

The owner of the airplane stated in a telephone conversation that before he purchased the airplane, an annual inspection was performed on May 30, 2003. During the positioning flight from the purchase location in Indiana, to the owner's home base in California, in September 2003, the owner requested additional maintenance after experiencing less than full power during flight. An engine inspection found deterioration in the muffler and a damaged magneto; both were replaced. The pilot operated the airplane an additional 25 hours between September 2003, and the day of the accident. No further maintenance was performed.

Pilot Information

Certificate:	Commercial; Flight instructor	**Age:**	55,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:**	No
Instructor Rating(s):	Airplane single-engine	**Toxicology Performed:**	No
Medical Certification:	Class 2 Valid Medical--w/ waivers/lim	**Last FAA Medical Exam:**	August 29, 2003
Occupational Pilot:	UNK	**Last Flight Review or Equivalent:**	July 5, 2003
Flight Time:	2200 hours (Total, all aircraft), 200 hours (Total, this make and model), 2200 hours (Pilot In Command, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Piper	**Registration:**	N25645
Model/Series:	PA-38-112	**Aircraft Category:**	Airplane
Year of Manufacture:		**Amateur Built:**	
Airworthiness Certificate:	Normal	**Serial Number:**	38-81A0034
Landing Gear Type:	Tricycle	**Seats:**	2
Date/Type of Last Inspection:	May 30, 2003 Annual	**Certified Max Gross Wt.:**	1670 lbs
Time Since Last Inspection:	5 Hrs	**Engines:**	1 Reciprocating
Airframe Total Time:	4800 Hrs as of last inspection	**Engine Manufacturer:**	Lycoming
ELT:	Installed, activated, did not aid in locating accident	**Engine Model/Series:**	O-235
Registered Owner:	On file	**Rated Power:**	112 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:	RHV,133 ft msl	**Distance from Accident Site:**	18 Nautical Miles
Observation Time:	12:47 Local	**Direction from Accident Site:**	330°
Lowest Cloud Condition:	Clear	**Visibility**	6 miles
Lowest Ceiling:	None	**Visibility (RVR):**	
Wind Speed/Gusts:	4 knots /	**Turbulence Type Forecast/Actual:**	/
Wind Direction:	230°	**Turbulence Severity Forecast/Actual:**	/
Altimeter Setting:	30.02 inches Hg	**Temperature/Dew Point:**	22°C / 10°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	San Martin, CA (E16)	**Type of Flight Plan Filed:**	None
Destination:	San Martin, CA (E16)	**Type of Clearance:**	None
Departure Time:	13:19 Local	**Type of Airspace:**	Class E

Airport Information

Airport:	So County Airport/Santa Clara E16	**Runway Surface Type:**	Asphalt
Airport Elevation:	281 ft msl	**Runway Surface Condition:**	Dry
Runway Used:	32	**IFR Approach:**	None
Runway Length/Width:	3100 ft / 75 ft	**VFR Approach/Landing:**	Forced landing

Wreckage and Impact Information

Crew Injuries:	1 None	**Aircraft Damage:**	Substantial
Passenger Injuries:		**Aircraft Fire:**	None
Ground Injuries:	N/A	**Aircraft Explosion:**	None
Total Injuries:	1 None	**Latitude, Longitude:**	37.081665,-121.596946

Administrative Information

Investigator In Charge (IIC):	Petterson, George
Additional Participating Persons:	Wilbert J Robinson, Jr.; Federal Aviation Administration; San Jose, CA
Original Publish Date:	July 7, 2005
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.ntsb.gov/Docket?ProjectID=59037

The National Transportation Safety Board (NTSB) is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant events in other modes of transportation—railroad, transit, highway, marine, pipeline, and commercial space. We determine the probable causes of the accidents and events we investigate, and issue safety recommendations aimed at preventing future occurrences. In addition, we conduct transportation safety research studies and offer information and other assistance to family members and survivors for each accident or event we investigate. We also serve as the appellate authority for enforcement actions involving aviation and mariner certificates issued by the Federal Aviation Administration (FAA) and US Coast Guard, and we adjudicate appeals of civil penalty actions taken by the FAA.

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.