

National Transportation Safety Board Aviation Accident Final Report

Location:	HILO, HI	Accident Number:	LAX94LA012
Date & Time:	10/13/1993, 1414 HST	Registration:	N7079J
Aircraft:	PIPER PA-31	Aircraft Damage:	Destroyed
Defining Event:		Injuries:	2 Minor
Flight Conducted Under:	Part 91: General Aviation - Ferry		

Analysis

DURING AN OCEANIC FERRY FLIGHT, THE RIGHT ENGINE DEVELOPED MAGNETO PROBLEMS WHICH RESULTED IN ONLY RESIDUAL POWER BEING AVAILABLE. THE PIC INCREASED THE POWER ON THE REMAINING LEFT ENGINE, BUT IT SOON OVERHEATED. THE PIC ELECTED TO DITCH THE AIRPLANE INTO THE PACIFIC OCEAN. BOTH CREWMEMBERS WERE SUCCESSFULLY RESCUED.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: the failure of the right engine's magnetos for undetermined reasons and the resulting overtemperature of the remaining left engine.

Findings

Occurrence #1: LOSS OF ENGINE POWER(TOTAL) - MECH FAILURE/MALF Phase of Operation: CRUISE

Findings 1. 1 ENGINE 2. (C) IGNITION SYSTEM, MAGNETO - UNDETERMINED

Occurrence #2: LOSS OF ENGINE POWER(PARTIAL) - MECH FAILURE/MALF Phase of Operation: LANDING

Findings 3. ALL ENGINES 4. (C) POWERPLANT - OVERTEMPERATURE 5. TERRAIN CONDITION - WATER

Occurrence #3: FORCED LANDING Phase of Operation: DESCENT - EMERGENCY

Occurrence #4: DITCHING Phase of Operation: DESCENT - EMERGENCY

Factual Information

On October 13, 1993, at 1414 hours Hawaii standard time (HST), a Piper PA-31, N7079J, experienced a loss of power on both engines and ditched into the Pacific Ocean about 600 nautical miles south of Hilo, Hawaii. The pilots were conducting an instrument flight rules ferry flight to Santa Monica, California, with a planned scheduled fuel stop at Hilo, Hawaii. The airplane, owned by Kruger Aviation Inc., Santa Monica, California, and operated by Flight Contract Services, Yelm, Washington, was destroyed when it sunk into the ocean. Both certificated airline transport pilots received minor injuries. The flight originated at Tahiti and landed at Christmas Island on October 12, 1993; the flight departed Christmas Island on October 13, 1993, at 1036 hours.

The pilot-in-command (PIC) reported in the Pilot/Operator Aircraft Accident Report, NTSB Form 6120.1/2, that about 3.5 hours (1406 hours) after departing Christmas Island the right engine "started to fluctuate and developed only residual power." The PIC determined the engine problem was caused by the magnetos.

The PIC increased the power to the left engine; however, it soon overheated. The PIC elected to ditch the airplane.

The second pilot confirmed the PIC's statement in the Pilot/Operator Aircraft Accident Report, NTSB Form 6120.1/2, that he submitted.

The accident coordinates are: 09 degrees, 36.18 minutes north latitude and 156 degrees, 23.82 minutes west longitude.

Thoe information			
Certificate:	Airline Transport	Age:	30, Male
Airplane Rating(s):	Multi-engine Land; Single-engine Land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	Seatbelt, Shoulder harness
Instrument Rating(s):	Airplane	Second Pilot Present:	Yes
Instructor Rating(s):	Airplane Multi-engine; Airplane Single-engine; Instrument Airplane	Toxicology Performed:	
Medical Certification:	Class 1 Valid Medicalno waivers/lim.	Last FAA Medical Exam:	05/18/1993
Occupational Pilot:		Last Flight Review or Equivalent:	
Flight Time:	3500 hours (Total, all aircraft), 100 hours (Total, this make and model), 3200 hours (Pilot In Command, all aircraft), 200 hours (Last 90 days, all aircraft), 80 hours (Last 30 days, all aircraft), 8 hours (Last 24 hours, all aircraft)		

Pilot Information

Aircraft and Owner/Operator Information

Aircraft Make:	PIPER	Registration:	N7079J
Model/Series:	PA-31 PA-31	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	No
Airworthiness Certificate:	Special Flight	Serial Number:	31-663
Landing Gear Type:	Retractable - Tricycle	Seats:	8
Date/Type of Last Inspection:	10/25/1993, AAIP	Certified Max Gross Wt.:	6800 lbs
Time Since Last Inspection:	8 Hours	Engines:	2 Reciprocating
Airframe Total Time:	4356 Hours	Engine Manufacturer:	Lycoming
ELT:	Installed, activated, aided in locating accident	Engine Model/Series:	TSIO-540-A2B
Registered Owner:	KRUGER AVIATION INC.	Rated Power:	310 hp
Operator:	FLIGHT CONTRACT SERVICES	Operating Certificate(s) Held:	None

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual Conditions	Condition of Light:	Day
Observation Facility, Elevation:	, 0 ft msl	Distance from Accident Site:	0 Nautical Miles
Observation Time:	0000	Direction from Accident Site:	0 °
Lowest Cloud Condition:	Scattered / 1500 ft agl	Visibility	15 Miles
Lowest Ceiling:	None / 0 ft agl	Visibility (RVR):	0 ft
Wind Speed/Gusts:	10 knots /	Turbulence Type Forecast/Actual:	1
Wind Direction:	90°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:		Temperature/Dew Point:	29°C
Precipitation and Obscuration:			
Departure Point:	CHRISTMAS IS, HI (PLCH)	Type of Flight Plan Filed:	IFR
Destination:		Type of Clearance:	IFR
Departure Time:	1036 HST	Type of Airspace:	Class G

Wreckage and Impact Information

Crew Injuries:	2 Minor	Aircraft Damage:	Destroyed
Passenger Injuries:	N/A	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	2 Minor	Latitude, Longitude:	

Administrative Information

Investigator In Charge (IIC):	Α.	D LLORENTE,	Report Date:	08/01/1994
Additional Participating Persons:	DAVIE	ANDERSON, JR; SAN FRANCISCO, CA		
Publish Date:				
Investigation Docket:	NTSB accident and incident dockets serve as permanent archival information for the NTSB's investigations. Dockets released prior to June 1, 2009 are publicly available from the NTSB's Record Management Division at <u>pubing@ntsb.gov</u> , or at 800-877-6799. Dockets released after this date are available at <u>http://dms.ntsb.gov/pubdms/</u> .			

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The Independent Safety Board Act, as codified at 49 U.S.C. Section 1154(b), precludes the admission into evidence or use of any part of an NTSB report related to an incident or accident in a civil action for damages resulting from a matter mentioned in the report. A factual report that may be admissible under 49 U.S.C. § 1154(b) is available <u>here</u>.