

Aviation Investigation Final Report

Location: ROSWELL, New Mexico Accident Number: DEN90LA167

Date & Time: August 3, 1990, 11:47 Local Registration: N5677Q

Aircraft: MOONEY M20C Aircraft Damage: Substantial

Defining Event: 1 None

Flight Conducted Under: Part 91: General aviation - Personal

Analysis

PLT SAID HE HAD 52 GALS FUEL ON BOARD WHEN HE DEPARTED EL PASO, TX, EN ROUTE TO ROSWELL, NM ON PRACTICE X-COUNTRY FLT. HE MADE TWO PRACTICE ILS APCHS AT ROSWELL, THEN STARTED CLIMBING TOWARDS ROSWELL VORTAC, EN ROUTE BACK TO EL PASO. AS HE REACHED 4500 FEET MSL, ENG LOST PWR. PLT TURNED BACK TOWARDS ROSWELL, ESTABLISHED GLIDE, AND DECLARED EMERG. HE ATTEMPTED TO RESTART ENG BUT HAD NO SUCCESS. REALIZING HE HAD INSUFFICIENT ALT TO REACH ARPT, PLT MADE INTENTIONAL WHEELS-UP LANDING ON SOFT, IRREGULAR TERRAIN. POSTACCIDENT EXAMINATION DISCLOSED FUEL SELECTOR WAS BETWEEN OFF AND RIGHT TANK DETENTS. FUEL SUPPLY LINE WAS DISCONNECTED. WHEN MASTER AND BOOST PUMP SWITCHES WERE TURNED ON, NO FUEL CAME OUT. WHEN FUEL SELECTOR WAS SWITCHED COMPLETELY TO RIGHT TANK, STILL NO FUEL CAME OUT. WHEN FUEL SELECTOR WAS SWITCHED TO LEFT TANK, FUEL POURED OUT OF FUEL SUPPLY LINE. EXAMINATION OF INTACT FUEL TANKS REVEALED LEFT TANK CONTAINED FUEL; RIGHT TANK DID NOT.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: THE INTENTIONAL WHEELS UP LANDING IN SOFT TERRAIN. CONTRIBUTING TO THE ACCIDENT WAS THE FUEL STARVATION INDUCED POWER LOSS, FAILURE OF THE PILOT TO SWITCH FUEL TANKS, IMPROPER POSITIONING OF THE FUEL SELECTOR DURING ATTEMPTED RESTARTS, AND THE SOFT TERRAIN.

Findings

Occurrence #1: LOSS OF ENGINE POWER(TOTAL) - NONMECHANICAL

Phase of Operation: CLIMB - TO CRUISE

Findings

1. SINGLE ENGINE AIRCRAFT

2. (F) FUEL TANK SELECTOR POSITION - IMPROPER - PILOT IN COMMAND

3. (F) FLUID, FUEL - STARVATION

Occurrence #2: FORCED LANDING

Phase of Operation: DESCENT - EMERGENCY

Occurrence #3: IN FLIGHT COLLISION WITH TERRAIN/WATER

Phase of Operation: LANDING - FLARE/TOUCHDOWN

Findings

4. (F) TERRAIN CONDITION - SOFT

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Factual Information

Pilot Information

Certificate:	Private	Age:	65,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 Medicalw/ waivers/lim	Last FAA Medical Exam:	July 3, 1990
Occupational Pilot:	UNK	Last Flight Review or Equivalent:	
Flight Time:	525 hours (Total, all aircraft), 270 hours (Total, this make and model), 381 hours (Pilot In Command, all aircraft), 66 hours (Last 90 days, all aircraft), 35 hours (Last 30 days, all aircraft), 4 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	MOONEY	Registration:	N5677Q
Model/Series:	M20C M20C	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:		Serial Number:	3037
Landing Gear Type:	Retractable - Tricycle	Seats:	4
Date/Type of Last Inspection:	Unknown	Certified Max Gross Wt.:	2575 lbs
Time Since Last Inspection:	0 Hrs	Engines:	1 Reciprocating
Airframe Total Time:		Engine Manufacturer:	LYCOMING
ELT:	Installed, not activated	Engine Model/Series:	O-360-A1D
Registered Owner:		Rated Power:	180 Horsepower
Operator:	SMITH, GEORGE F.	Operating Certificate(s) Held:	None
Operator Does Business As:		Operator Designator Code:	

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Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	ROW ,3669 ft msl	Distance from Accident Site:	1 Nautical Miles
Observation Time:	11:56 Local	Direction from Accident Site:	360°
Lowest Cloud Condition:	Scattered / 4000 ft AGL	Visibility	60 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	3 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	60°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:		Temperature/Dew Point:	-18°C / -18°C
Precipitation and Obscuration:	No Obscuration; No Precipita	ation	
Departure Point:	EL PASO , TX (ELP)	Type of Flight Plan Filed:	None
Destination:		Type of Clearance:	None
Departure Time:	09:15 Local	Type of Airspace:	

Airport Information

Airport:		Runway Surface Type:	
Airport Elevation:	3669 ft msl	Runway Surface Condition:	
Runway Used:	0	IFR Approach:	None
Runway Length/Width:		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:	33.639461,-104.379913(est)

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Administrative Information

Investigator In Charge (IIC): Scott, Arnold

Additional Participating Persons: WALTER PTIDMORE; ALBUQUERQUE, NM

Original Publish Date: September 15, 1992

Last Revision Date:
Investigation Class: Class

Note:
Investigation Docket: https://data.ntsb.gov/Docket?ProjectID=17976

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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.

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