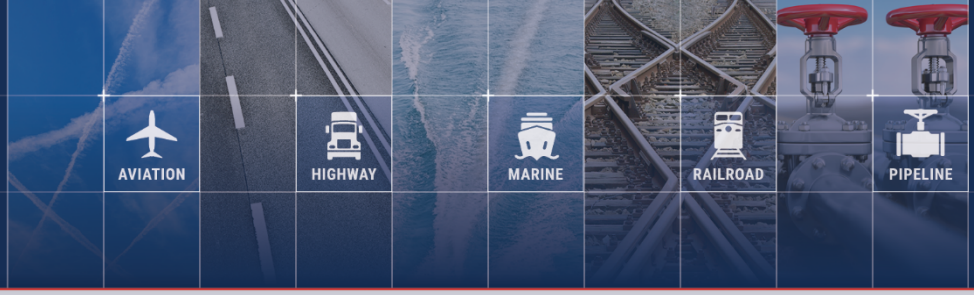

Aviation Investigation Final Report

Location:	MAMMOTH LAKES, California	**Accident Number:**	LAX99LA254
Date & Time:	July 17, 1999, 13:17 Local	**Registration:**	N1692H
Aircraft:	Piper PA32R-300	**Aircraft Damage:**	Substantial
Defining Event:		**Injuries:**	2 None
Flight Conducted Under:	Part 91: General aviation		

Analysis

The pilot added full fuel prior to departure. The AWOS (Automated Weather Observing System) reported the density altitude was 9,400 feet. He reviewed the procedures for a high altitude takeoff, completed an engine run up, and leaned for departure. After taxiing into position for takeoff, he applied the brakes then power. The runway was slightly uphill and the pilot did not feel the airplane was developing full power, but he did not abort the takeoff. The airplane climbed approximately 200 feet, but would not climb higher. After deciding an attempt to turn could induce a stall, the pilot lowered the landing gear and airspeed as much as possible. He maintained a controlled descent into the terrain and estimated his speed at touchdown was 50 to 60 knots. The pilot felt the density altitude prevented the airplane from climbing. The airport had an elevation of 7,128 feet msl (mean sea level). An aviation routine weather report (METAR) issued reported the temperature was 73 degrees Fahrenheit and the altimeter setting was 30.22 inHg.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: The pilot's failure to attain and maintain an adequate airspeed for the prevailing density altitude. The pilot's failure to abort the takeoff is also causal.

Findings

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

Findings
1. AIRPORT FACILITIES,RUNWAY/LANDING AREA CONDITION - UPHILL
2. PLANNING/DECISION - INADEQUATE - PILOT IN COMMAND
3. (F) WEATHER CONDITION - HIGH DENSITY ALTITUDE
4. (C) AIRSPEED - INADEQUATE - PILOT IN COMMAND
5. (C) ABORTED TAKEOFF - NOT PERFORMED - PILOT IN COMMAND
6. STALL/MUSH - ENCOUNTERED - PILOT IN COMMAND

Occurrence #2: IN FLIGHT COLLISION WITH TERRAIN/WATER
Phase of Operation: DESCENT - UNCONTROLLED

Factual Information

On July 17, 1999, at 1317 hours Pacific daylight time, a Piper PA32R-300, N1692H, sustained substantial damage when it collided with terrain during the takeoff initial climb from the Mammoth Lakes, California, airport. The commercial pilot and his passenger were not injured. The airplane was owned and operated by the pilot under the provisions of 14 CFR Part 91 for a cross-country personal flight. The pilot departed Mammoth Lakes 3 to 4 minutes prior to the accident en route to Oxnard, California. Visual meteorological conditions prevailed and a VFR flight plan was filed, but not yet activated.

The pilot stated he flew into Mammoth Lakes the day before the accident. He was planning to fly to Oxnard and then on to Monterrey, California, where the airplane was based. He added full fuel prior to departure. The pilot listened to the AWOS (Automated Weather Observing System), which reported a density altitude of 9,400 feet. He reviewed the procedures for a high altitude takeoff, completed an engine run up, and leaned for departure. After taxiing into position for takeoff, he applied the brakes, then power. The pilot stated the runway was slightly uphill and he did not feel the airplane was developing full power, but did not abort the takeoff. The airplane climbed approximately 200 feet, but would not climb higher. After deciding an attempt to turn could induce a stall, the pilot lowered the landing gear and airspeed as much as possible. He maintained a controlled descent into the terrain and estimated his speed at touchdown was 50 to 60 knots.

The pilot said he felt the density altitude prevented the airplane from climbing. The airport facilities/directory indicated Mammoth Lakes had an elevation of 7,128 feet msl (mean sea level). An aviation routine weather report (METAR) issued for Mammoth Lakes at 1251 reported the temperature was 73 degrees Fahrenheit and the altimeter setting was 30.22 inHg.

Pilot Information

Certificate:	Commercial; Flight instructor	**Age:**	51,Male
Airplane Rating(s):	Single-engine land; Multi-engine land	**Seat Occupied:**	Left
Other Aircraft Rating(s):	Glider	**Restraint Used:**	
Instrument Rating(s):	Airplane	**Second Pilot Present:**	No
Instructor Rating(s):	Airplane multi-engine; Airplane single-engine; Instrument airplane	**Toxicology Performed:**	No
Medical Certification:	Class 3 Valid Medical--w/ waivers/lim	**Last FAA Medical Exam:**	January 14, 1999
Occupational Pilot:	UNK	**Last Flight Review or Equivalent:**	
Flight Time:	1280 hours (Total, all aircraft), 12 hours (Total, this make and model), 972 hours (Pilot In Command, all aircraft), 12 hours (Last 90 days, all aircraft), 12 hours (Last 30 days, all aircraft), 4 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	Piper	**Registration:**	N1692H
Model/Series:	PA32R-300 PA32R-300	**Aircraft Category:**	Airplane
Year of Manufacture:		**Amateur Built:**	
Airworthiness Certificate:	Normal	**Serial Number:**	32R-7780177
Landing Gear Type:	Retractable - Tricycle	**Seats:**	6
Date/Type of Last Inspection:	February 19, 1999 Annual	**Certified Max Gross Wt.:**	3600 lbs
Time Since Last Inspection:	22 Hrs	**Engines:**	1 Reciprocating
Airframe Total Time:	3089 Hrs	**Engine Manufacturer:**	Lycoming
ELT:	Installed, activated, did not aid in locating accident	**Engine Model/Series:**	IO-540-KIG5D
Registered Owner:	MICHAEL L. PHILLIPS	**Rated Power:**	300 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:	MMH ,7128 ft msl	**Distance from Accident Site:**	
Observation Time:	12:51 Local	**Direction from Accident Site:**	
Lowest Cloud Condition:	Clear	**Visibility**	10 miles
Lowest Ceiling:	None	**Visibility (RVR):**	
Wind Speed/Gusts:	11 knots / 14 knots	**Turbulence Type Forecast/Actual:**	/
Wind Direction:	200°	**Turbulence Severity Forecast/Actual:**	/
Altimeter Setting:	30 inches Hg	**Temperature/Dew Point:**	23°C / -1°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	(MMH)	**Type of Flight Plan Filed:**	VFR
Destination:	OXNARD , CA (OXR)	**Type of Clearance:**	VFR
Departure Time:	13:13 Local	**Type of Airspace:**	Class G

Airport Information

Airport:	MAMMOTH LAKES MMH	**Runway Surface Type:**	Asphalt
Airport Elevation:	7128 ft msl	**Runway Surface Condition:**	Dry
Runway Used:	27	**IFR Approach:**	None
Runway Length/Width:	7000 ft / 100 ft	**VFR Approach/Landing:**	None

Wreckage and Impact Information

Crew Injuries:	1 None	**Aircraft Damage:**	Substantial
Passenger Injuries:	1 None	**Aircraft Fire:**	None
Ground Injuries:	N/A	**Aircraft Explosion:**	None
Total Injuries:	2 None	**Latitude, Longitude:**	37.580505,-118.840583(est)

Administrative Information

Investigator In Charge (IIC):	Plagens, Howard
Additional Participating Persons:	KEN KELLY; RENO , NV
Original Publish Date:	August 14, 2001
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.ntsb.gov/Docket?ProjectID=46810