



Aviation Investigation Final Report

Location: New London, New Hampshire Accident Number: IAD05LA089

Date & Time: July 2, 2005, 15:03 Local Registration: N795JL

Aircraft: Longtin Kitfox Model III Aircraft Damage: Substantial

Defining Event: Injuries: 1 Fatal

Flight Conducted Under: Part 91: General aviation - Personal

Analysis

The airplane took off from runway 14 and after clearing a tree line, it entered a right spin, and vertically impacted a golf course. A retired airline pilot stated that winds at the time were from the west, gusting to about 30 mph, and the windsock was "straight out." The airline pilot further stated that the pilots normally took off from runway 14 and landed on runway 32 because of the slope of the runway, but the policy wasn't "cut in stone." The airplane was purchased by the pilot about a month earlier; however, he and another pilot had previously owned the same make and model, which was substantially damaged when a hangar roof collapsed on it about 4 years earlier. The pilot had accrued an estimated 15-20 hours in the accident airplane, and had taken off under similar wind conditions "many times." The pilot had a heart condition, but there was no evidence that it contributed to the accident. An examination of the wreckage revealed no mechanical anomalies.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: The pilot's failure to maintain airspeed, which resulted in an inadvertent stall/spin. A factor in the accident was the tail wind condition.

Findings

Occurrence #1: LOSS OF CONTROL - IN FLIGHT

Phase of Operation: CLIMB

Findings

1. (C) AIRSPEED - NOT MAINTAINED - PILOT IN COMMAND 2. STALL/SPIN - INADVERTENT - PILOT IN COMMAND

3. (F) WEATHER CONDITION - TAILWIND

Occurrence #2: IN FLIGHT COLLISION WITH TERRAIN/WATER

Phase of Operation: DESCENT - UNCONTROLLED

Findings

4. TERRAIN CONDITION - GROUND

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Factual Information

On July 2, 2005, at 1503 eastern daylight time, a homebuilt Kitfox Model III, N795JL, was substantially damaged when it impacted terrain shortly after taking off from runway 14 at Eagles Nest Airport (NH40), New London, New Hampshire. The certificated commercial pilot was fatally injured. Visual meteorological conditions prevailed, and no flight plan had been filed for the local personal flight, which was conducted under 14 CFR Part 91.

According to a witness on a nearby golf course, the airplane took off toward the south, and the engine was "laboring." Once the airplane cleared some trees, it "turned hard" to the right, the nose rose, and the witness could see the underside of the airplane. It then appeared that the airplane continued to turn harder to the right, then entered a spin, and subsequently impacted the ground on the golf course vertically.

Another witness, who was also on the golf course, stated that the first witness told her to look up, and when she did so, she saw the airplane spinning to the right until it impacted the ground.

A third witness "saw the plane rise and bank right above the tree line. Lost airspeed and spiraled down nose first."

A retired airline pilot stated to a Federal Aviation Administration (FAA) inspector that winds at the time were from the west, gusting to about 30 mph, and the windsock was "straight out." The airline pilot, who also had an airplane based at Eagles Nest, further stated that the pilots normally took off from runway 14 and landed on runway 32 because of the slope of the runway, but the policy wasn't "cut in stone."

The accident pilot held a commercial pilot certificate with single engine land, multi-engine land, glider, and instrument commercial ratings. He also held ratings in the DC-3 and DC-B26. On his latest application for an FAA third class medical certificate, dated March 13, 2003, the pilot reported 3,200 hours of flight time.

According to the FAA registration data base, the accident pilot and another pilot built a first Kitfox III in 1997. The other pilot confirmed that the first Kitfox was substantially damaged about 2001, when a heavy snow build-up collapsed a hangar roof on it.

According to the registration, the accident pilot purchased the already-completed accident airplane on May 28, 2005. The co-builder of the original Kitfox stated that he thought the accident pilot had accrued an estimated 15-20 hours of flight time in the new airplane prior to the accident. He also felt certain that a failure of the new airplane was not a cause of the accident, and thought the accident pilot may have been distracted or disabled. He further noted that the accident pilot was well acquainted with the takeoff wind conditions, having

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taken off under similar conditions "many times" previously.

An autopsy was conducted on the pilot by the State of New Hampshire Office of the Chief Medical Examiner, Concord. New Hampshire. Toxicological testing was performed by the FAA Forensic Toxicology Research Team, Oklahoma City, Oklahoma.

A review of FAA medical, autopsy and toxicological records revealed that the pilot had a "history of heart condition," and had been taking atenolol, but there was no evidence that the heart condition contributed to the accident.

An on-scene FAA examination of the wreckage confirmed that the entire airplane was in one location, with the exception of one propeller blade that was 90 feet to the east of the main wreckage. Control continuity was also confirmed, and there was a strong odor of automobile fuel, as well as fuel leaking from the airplane when it was lifted by a tow truck. Photographic evidence revealed that all three propeller blades had separated from the hub, with one having been split near its hub. FAA inspectors did not note any mechanical anomalies with either the airframe or engine.

The airport, a private use facility, was not listed in the Airport/Facility Directory. However, an internet source listed runway 14 as asphalt, 2,800 feet in length and 30 feet wide, at an elevation of about 998 feet.

Weather, reported at an airport about 17 nautical miles to the southeast at 1451, included clear skies, winds from 310, variable 290 to 360 degrees true, at 10 knots, and temperature 79 degrees Fahrenheit. Weather, reported at an airport about 22 nautical miles to the northwest at 1453, included clear skies and winds from 330 degrees true at 8 knots.

Pilot Information

Certificate:	Commercial	Age:	75,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):	None	Toxicology Performed:	Yes
Medical Certification:	None	Last FAA Medical Exam:	March 1, 2000
Occupational Pilot:	No	Last Flight Review or Equivalent:	
Flight Time:	3200 hours (Total, all aircraft)		

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Aircraft and Owner/Operator Information

Aircraft Make:	Longtin	Registration:	N795JL
Model/Series:	Kitfox Model III	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	Yes
Airworthiness Certificate:	Experimental (Special)	Serial Number:	795
Landing Gear Type:	Tailwheel	Seats:	2
Date/Type of Last Inspection:	Unknown	Certified Max Gross Wt.:	1050 lbs
Time Since Last Inspection:		Engines:	1 Reciprocating
Airframe Total Time:	697 Hrs at time of accident	Engine Manufacturer:	Rotax
ELT:	Installed, not activated	Engine Model/Series:	582 UL
Registered Owner:	Allan E. Macnicol	Rated Power:	64
Operator:		Operating Certificate(s) Held:	None

Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Day
Observation Facility, Elevation:	CON,346 ft msl	Distance from Accident Site:	17 Nautical Miles
Observation Time:	14:51 Local	Direction from Accident Site:	120°
Lowest Cloud Condition:	Clear	Visibility	10 miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	10 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	310°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	29.86 inches Hg	Temperature/Dew Point:	26°C / 9°C
Precipitation and Obscuration:	No Obscuration; No Precipita	ition	
Departure Point:	New London, NH (NH40)	Type of Flight Plan Filed:	None
Destination:		Type of Clearance:	None
Departure Time:	15:03 Local	Type of Airspace:	

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Airport Information

Airport:	EAGLES NEST NH40	Runway Surface Type:	
Airport Elevation:		Runway Surface Condition:	
Runway Used:	14	IFR Approach:	None
Runway Length/Width:	2800 ft / 30 ft	VFR Approach/Landing:	None

Wreckage and Impact Information

Crew Injuries:	1 Fatal	Aircraft Damage:	Substantial
Passenger Injuries:		Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	1 Fatal	Latitude, Longitude:	43.404445,-71.950279

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Administrative Information

Investigator In Charge (IIC):	Cox, Paul	
Additional Participating Persons:	Dennis Tremblay; FAA/FSDO; Portland, ME	
Original Publish Date:	May 30, 2006	
Last Revision Date:		
Investigation Class:	<u>Class</u>	
Note:		
Investigation Docket:	https://data.ntsb.gov/Docket?ProjectID=61870	

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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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