

National Transportation Safety Board Aviation Accident Final Report

Location: NOME, AK Accident Number: ANC93FA034

Date & Time: 02/20/1993, 0900 AST Registration: N4182G

Aircraft: CESSNA 402C Aircraft Damage: Destroyed

Defining Event: 2 None

Flight Conducted Under: Part 135: Air Taxi & Commuter - Scheduled

Analysis

THE AIRPLANE WAS REMOVED FROM A HANGER ABOUT ONE HOUR BEFORE DEPARTURE. DURING THE INTERIM PERIOD, THE AMBIENT TEMPERATURE WAS ABOUT 32 DEGREES FAHRENHEIT AND IT WAS SNOWING LIGHTLY. NO DEICING FLUID WAS USED ON THE AIRPLANE. THE PILOT REPORTED OBSERVING ONLY WATER ON THE PLANE'S WINGS. THE PASSENGER (A RATED PILOT) REPORTED TO AN ALASKA STATE TROOPER THAT THE AIRPLANE HAD ACCUMULATED A LITTLE ICE BEFORE THE FLIGHT DEPARTED. THE AIRPLANE BECAME AIRBORNE ABOUT 1,000 FT FROM THE END OF THE 5,576 FT LONG RUNWAY. SHORTLY AFTER ROTATION, THE AIRPLANE BEGAN TO BUFFET AND WOULD NOT CLIMB. THE AIRPLANE IMPACTED IN A NEAR HORIZONTAL ATTITUDE ON LEVEL SNOW COVERED TUNDRA. THE PILOT REPORTED THAT IMMEDIATELY AFTER EXITING THE AIRPLANE, HE OBSERVED A COARSE LAYER OF ICE ON THE AFT TWO THIRDS OF THE WINGS. DURING THE TEST RUN OF BOTH ENGINES, NO PROBLEMS WERE NOTED THAT WOULD HAVE CAUSED AND/OR CONTRIBUTED TOWARD THE INABILITY OF THE AIRPLANE TO SUSTAIN FLIGHT.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: THE PILOT IN COMMAND NOT REMOVING THE ICE FROM THE PLANE'S AIRFOIL SURFACES BEFORE TAKEOFF. THE WEATHER CONDITION WAS A FACTOR.

Findings

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

Findings

- 1. (F) WEATHER CONDITION SNOW
- 2. (C) ICE/FROST REMOVAL FROM AIRCRAFT NOT PERFORMED PILOT IN COMMAND
- 3. STALL/MUSH ENCOUNTERED PILOT IN COMMAND

Occurrence #2: IN FLIGHT COLLISION WITH TERRAIN/WATER

Phase of Operation: DESCENT - UNCONTROLLED

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Factual Information

Pilot Information

Certificate:	Airline Transport	Age:	27, 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:	No
Instructor Rating(s):	None	Toxicology Performed:	Yes
Medical Certification:	Class 1 Valid Medicalno waivers/lim.	Last FAA Medical Exam:	08/26/1992
Occupational Pilot:		Last Flight Review or Equivalent:	
Flight Time:	3201 hours (Total, all aircraft), 736 hours (Total, this make and model), 2982 hours (Pilot In Command, all aircraft), 198 hours (Last 90 days, all aircraft), 95 hours (Last 30 days, all aircraft), 7 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	CESSNA	Registration:	N4182G
Model/Series:	402C 402C	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	No
Airworthiness Certificate:	Normal	Serial Number:	402C0284
Landing Gear Type:	Retractable - Tricycle	Seats:	10
Date/Type of Last Inspection:	02/06/1993, AAIP	Certified Max Gross Wt.:	6850 lbs
Time Since Last Inspection:	40 Hours	Engines:	2 Reciprocating
Airframe Total Time:	5905 Hours	Engine Manufacturer:	CONTINENTAL
ELT:	Installed, activated, did not aid in locating accident	Engine Model/Series:	TSIO-520-VB
Registered Owner:	RYAN AIR SERVICE	Rated Power:	325 hp
Operator:	RYAN AIR SERVICE	Operating Certificate(s) Held:	Commuter Air Carrier (135)
Operator Does Business As:		Operator Designator Code:	UATA

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Meteorological Information and Flight Plan

Conditions at Accident Site:	Instrument Conditions	Condition of Light:	Dawn
Observation Facility, Elevation:	OME, 37 ft msl	Distance from Accident Site:	1 Nautical Miles
Observation Time:	0855 AST	Direction from Accident Site:	20°
Lowest Cloud Condition:	Scattered / 800 ft agl	Visibility	1 Miles
Lowest Ceiling:	Overcast / 1400 ft agl	Visibility (RVR):	0 ft
Wind Speed/Gusts:	5 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	60°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30 inches Hg	Temperature/Dew Point:	-2°C / -3°C
Precipitation and Obscuration:			
Departure Point:	(OME)	Type of Flight Plan Filed:	IFR
Destination:	SAVOONGA, AK (SVA)	Type of Clearance:	IFR
Departure Time:	0859 AST	Type of Airspace:	Class E

Airport Information

Airport:	NOME (OME)	Runway Surface Type:	Asphalt
Airport Elevation:	37 ft	Runway Surface Condition:	Snowdry
Runway Used:	2	IFR Approach:	None
Runway Length/Width:	5576 ft / 150 ft	VFR Approach/Landing:	Forced Landing

Wreckage and Impact Information

Crew Injuries:	1 None	Aircraft Damage:	Destroyed
Passenger Injuries:	1 None	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	In-Flight
Total Injuries:	2 None	Latitude, Longitude:	

Administrative Information

Investigator In Charge (IIC):	TIMOTHY A BORSON	Report Date:	11/15/1993
Additional Participating Persons:	STEVE LINDSEY; FAIRBANKS, AK HUGH KEITH; FAIRBANKS, AK		
Publish Date:			
Investigation Docket:	NTSB accident and incident dockets serv investigations. Dockets released prior to Record Management Division at publing@ this date are available at http://dms.nts	June 1, 2009 are public ntsb.gov, or at 800-877	ly available from the NTSB's

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The National Transportation Safety Board (NTSB), established in 1967, is an independent federal agency mandated by Congress through the Independent Safety Board Act of 1974 to investigate transportation accidents, determine the probable causes of the accidents, issue safety recommendations, study transportation safety issues, and evaluate the safety effectiveness of government agencies involved in transportation. The NTSB makes public its actions and decisions through accident reports, safety studies, special investigation reports, safety recommendations, and statistical reviews.

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 here.

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