



Aviation Investigation Final Report

Location:	MOUNT PLEASANT, Tennessee	Accident Number:	ATL86FA085
Date & Time:	March 4, 1986, 07:35 Local	Registration:	N861K
Aircraft:	BEECH BE-90	Aircraft Damage:	Substantial
Defining Event:		Injuries:	9 None
Flight Conducted Under:	Part 135: Air taxi & commuter - Non-scheduled		

Analysis

ON FINAL APPROACH THE CREW TURNED THE AIRCRAFT CABIN ENVIRONMENTAL CONTROL FROM THE AUTO MODE TO THE OFF POSITION. SHORTLY THEREAFTER, THE COCKPIT AND CABIN BEGAN TO FILL WITH SMOKE. THE OCCUPANT OF THE COPILOTS SEAT FELT HEAT AROUND HIS FEET. A NORMAL LANDING WAS MADE AND THE PASSENGERS AND CREW EXITED THE AIRCRAFT WITH OUT INJURY. EXAMINATION SHOWED THAT THE FIBERGLASS DUCTING ON TOP OF THE HEATER PELEUM CHAMBER HAD CAUGHT FIRE. A HOLE WAS BURNED THROUGHT THE PRESSURE BULKHEAD INTO THE AVIONICS COMPARTMENT.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be:

Findings

Occurrence #1: FIRE
Phase of Operation: APPROACH - VFR PATTERN - FINAL APPROACH

- Findings
1. AIR COND/HEATING/PRESSURIZATION - OVERTEMPERATURE
 2. (C) REASON FOR OCCURRENCE UNDETERMINED
 3. (F) FUEL SYSTEM,FUEL SHUTOFF - LOW COMPRESSION

4. (F) AIR COND/HEATING/PRESSURIZATION,CABIN TEMP CONTROL - SWITCHED OFF
5. (F) FUSELAGE,INSTRUMENT/ELECTRICAL PANEL - BURNED

Factual Information

Pilot Information

Certificate:	Airline transport; Commercial; Flight instructor	Age:	38, Male
Airplane Rating(s):	Single-engine land; Multi-engine land	Seat Occupied:	Right
Other Aircraft Rating(s):	Helicopter	Restraint Used:	
Instrument Rating(s):	Airplane; Helicopter	Second Pilot Present:	Yes
Instructor Rating(s):	Airplane multi-engine; Airplane single-engine; Helicopter	Toxicology Performed:	No
Medical Certification:	Class 1 Valid Medical—no waivers/lim.	Last FAA Medical Exam:	January 29, 1986
Occupational Pilot:	Yes	Last Flight Review or Equivalent:	
Flight Time:			

Aircraft and Owner/Operator Information

Aircraft Make:	BEECH	Registration:	N861K
Model/Series:	BE-90 BE-90	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Normal	Serial Number:	LJ-471
Landing Gear Type:	Retractable - Tricycle	Seats:	10
Date/Type of Last Inspection:	October 15, 1985 100 hour	Certified Max Gross Wt.:	9650 lbs
Time Since Last Inspection:	64 Hrs	Engines:	2 Turbo prop
Airframe Total Time:	3781 Hrs	Engine Manufacturer:	P&W
ELT:	Installed, not activated	Engine Model/Series:	PT6 A-20
Registered Owner:	THE E. RANDEL CO.	Rated Power:	550 Horsepower
Operator:	STEVENS AVIATION,INC.	Operating Certificate(s) Held:	On-demand air taxi (135)
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:	BNA ,599 ft msl	Distance from Accident Site:	42 Nautical Miles
Observation Time:	06:46 Local	Direction from Accident Site:	40°
Lowest Cloud Condition:	Unknown	Visibility	5 miles
Lowest Ceiling:	Overcast / 4000 ft AGL	Visibility (RVR):	
Wind Speed/Gusts:	6 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	290°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30 inches Hg	Temperature/Dew Point:	4°C
Precipitation and Obscuration:	N/A - None - Haze		
Departure Point:	LOUISVILLE , KY (LOU)	Type of Flight Plan Filed:	IFR
Destination:	COLUMBIA , TN (MRC)	Type of Clearance:	None
Departure Time:	07:34 Local	Type of Airspace:	Class G

Airport Information

Airport:	MAURY COUNTY AIRPORT MRC	Runway Surface Type:	Asphalt
Airport Elevation:	677 ft msl	Runway Surface Condition:	Dry
Runway Used:	23	IFR Approach:	None
Runway Length/Width:	5003 ft / 75 ft	VFR Approach/Landing:	Straight-in

Wreckage and Impact Information

Crew Injuries:	2 None	Aircraft Damage:	Substantial
Passenger Injuries:	7 None	Aircraft Fire:	Both in-flight and on-ground
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	9 None	Latitude, Longitude:	35.619346,-87.039199(est)

Administrative Information

Investigator In Charge (IIC):	Fouts, Charles
Additional Participating Persons:	BERNARD K DEESE; NASHVILLE , TN M. J HARDMAN, JR.; WICHITA , KS STEVE G GREER; OSCAR C TIDWELL; LAKELAND , FL
Original Publish Date:	
Last Revision Date:	
Investigation Class:	Class
Note:	
Investigation Docket:	https://data.nts.gov/Docket?ProjectID=6930

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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](#).