



National Transportation Safety Board Aviation Accident Final Report

Location:	CEDAR RAPIDS, IA	Accident Number:	CHI93LA052
Date & Time:	12/13/1992, 1801 CST	Registration:	N17CH
Aircraft:	CESSNA 402B	Aircraft Damage:	Substantial
Defining Event:		Injuries:	7 Minor

Flight Conducted Under: Part 91: General Aviation - Personal

Analysis

DURING THE SECOND ILS APPROACH THE AIRPLANE DESCENDED BELOW THE GLIDEPATH AND IMPACTED THE TERRAIN 2,500 FEET SHORT OF THE INTENDED LANDING RUNWAY. THE PILOT INDICATED THAT A FAILURE IN THE APPROACH LIGHTING SYSTEM CONTRIBUTED TO THE ACCIDENT. A POST ACCIDENT FUNCTIONAL CHECK OF THE APPROACH LIGHTING SYSTEM FAILED TO REVEAL ANY ANOMALIES.

Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be:
THE PILOT-IN-COMMAND'S FAILURE TO MAINTAIN A PROPER GLIDEPATH.

Findings

Occurrence #1: IN FLIGHT COLLISION WITH TERRAIN/WATER
Phase of Operation: APPROACH - FAF/OUTER MARKER TO THRESHOLD (IFR)

Findings

1. (F) LIGHT CONDITION - DARK NIGHT
2. (F) WEATHER CONDITION - FOG
3. (F) WEATHER CONDITION - LOW CEILING
4. (C) PROPER GLIDEPATH - NOT MAINTAINED - PILOT IN COMMAND

Factual Information

Pilot Information

Certificate:	Airline Transport	Age:	34, 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:	No
Medical Certification:	Class 1 Valid Medical--no waivers/lim.	Last FAA Medical Exam:	09/30/1992
Occupational Pilot:		Last Flight Review or Equivalent:	
Flight Time:	3700 hours (Total, all aircraft), 1200 hours (Total, this make and model), 2600 hours (Pilot In Command, all aircraft), 20 hours (Last 90 days, all aircraft), 15 hours (Last 30 days, all aircraft), 4 hours (Last 24 hours, all aircraft)		

Aircraft and Owner/Operator Information

Aircraft Make:	CESSNA	Registration:	N17CH
Model/Series:	402B 402B	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	No
Airworthiness Certificate:	Normal	Serial Number:	402B0519
Landing Gear Type:	Retractable - Tricycle	Seats:	8
Date/Type of Last Inspection:	06/16/1992, Annual	Certified Max Gross Wt.:	6300 lbs
Time Since Last Inspection:	60 Hours	Engines:	2 Reciprocating
Airframe Total Time:	5929 Hours	Engine Manufacturer:	CONTINENTAL
ELT:	Installed, activated, did not aid in locating accident	Engine Model/Series:	TSIO-520-E
Registered Owner:	CARNEY AND HANDCOCK, INC.	Rated Power:	300 hp
Operator:	DWYER AIRCRAFT SALES, INC.	Operating Certificate(s) Held:	None
Operator Does Business As:	DWYER AIR	Operator Designator Code:	DFSA

Meteorological Information and Flight Plan

Conditions at Accident Site:	Instrument Conditions	Condition of Light:	Night/Dark
Observation Facility, Elevation:	CID, 864 ft msl	Distance from Accident Site:	1 Nautical Miles
Observation Time:	1804 CST	Direction from Accident Site:	90°
Lowest Cloud Condition:	Unknown / 300 ft agl	Visibility	1 Miles
Lowest Ceiling:	Overcast / 300 ft agl	Visibility (RVR):	0 ft
Wind Speed/Gusts:	15 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	120°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30 inches Hg	Temperature/Dew Point:	0°C / -1°C
Precipitation and Obscuration:			
Departure Point:	KANSAS CITY, MO (MKC)	Type of Flight Plan Filed:	IFR
Destination:		Type of Clearance:	IFR
Departure Time:	1700 CST	Type of Airspace:	Class D; Class E

Airport Information

Airport:	CEDAR RAPIDS MUNICIPAL (CID)	Runway Surface Type:	Asphalt
Airport Elevation:	864 ft	Runway Surface Condition:	
Runway Used:	9	IFR Approach:	ILS
Runway Length/Width:	8600 ft / 150 ft	VFR Approach/Landing:	None

Wreckage and Impact Information

Crew Injuries:	1 Minor	Aircraft Damage:	Substantial
Passenger Injuries:	6 Minor	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	7 Minor	Latitude, Longitude:	

Administrative Information

Investigator In Charge (IIC):	STEPHEN A WILSON	Report Date:	09/28/1993
Additional Participating Persons:	BOB BOLLINGER; DES MOINES, IA		
Publish Date:			
Investigation Docket:	NTSB accident and incident dockets serve as permanent archival information for the NTSB's investigations. Dockets released prior to June 1, 2009 are publicly available from the NTSB's Record Management Division at pubinq@ntsb.gov , or at 800-877-6799. Dockets released after this date are available at http://dms.nts.gov/pubdms/ .		

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](#).