



# National Transportation Safety Board Aviation Accident Final Report

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<b>Location:</b>	GULKANA, AK	<b>Accident Number:</b>	ANC85MA157
<b>Date &amp; Time:</b>	08/20/1985, 0205 AKD	<b>Registration:</b>	N455JA
<b>Aircraft:</b>	GATES LEARJET 24D	<b>Aircraft Damage:</b>	Destroyed
<b>Defining Event:</b>		<b>Injuries:</b>	3 Fatal
<b>Flight Conducted Under:</b>	Part 135: Air Taxi & Commuter - Non-scheduled		

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## Analysis

DURING A NIGHT ARRIVAL, THE FLT WAS ON AN INSTRUMENT APCH TO THE GULKANA ARPT WHEN RADIO CONTACT WITH THE ACFT WAS LOST. A SEARCH WAS INITIATED & THE WRECKAGE WAS FOUND 7.4 MI NORTH OF THE TERMINAL VOR ON THE 330 DEG RADIAL. THE INBOUND COURSE FOR THE VOR RWY 14 APCH WAS ON THE 315 DEG RADIAL. AN ON-SCENE EXAM REVEALED THE ACFT WAS TRACKING INBOUND WHEN IT COLLIDED WITH TREES, CRASHED & BURNED ABOUT 2.4 MI BEFORE REACHING THE FINAL APCH FIX. BOTH ENGS WERE OPERATING DURING IMPACT & BOTH HAD INJECTED CONSIDERABLE TREE MATERIAL. NO PREIMPACT MECHANICAL FAILURE WAS EVIDENT. THE CAPTAIN & 1ST OFFICER WERE CURRENTLY RESPONSIBLE FOR FLYING BOTH THE LEARJET & DHC-7 ACFT. THIS WAS THE CAPTAIN'S 1ST DAY OF WORK AFTER RETURNING FROM A VACATION TRIP TO HAWAII (APRX 1-1/2 WEEKS). THE 1ST OFFICER HAD AN ADEQUATE PERIOD FOR CREW REST PRIOR TO REPORTING FOR WORK; HOWEVER, HE HAD PREVIOUSLY BEEN WORKING A VARIED SCHEDULE. THE OPERATOR REPEATEDLY SHIFTED PLTS FROM 14 CFR 135 REST/DUTY REQUIREMENTS TO THOSE OF 14 CFR 121.

## Probable Cause and Findings

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

## Findings

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Occurrence #1: IN FLIGHT COLLISION WITH OBJECT

Phase of Operation: APPROACH - IAF TO FAF/OUTER MARKER (IFR)

### Findings

1. (F) WEATHER CONDITION - RAIN
  2. (F) LIGHT CONDITION - DARK NIGHT
  3. (C) IFR PROCEDURE - IMPROPER - PILOT IN COMMAND
  4. (C) REMEDIAL ACTION - NOT ATTAINED - COPILOT/SECOND PILOT
  5. (F) FATIGUE(CIRCADIAN RHYTHM) - COPILOT/SECOND PILOT
  6. (F) FATIGUE(FLIGHT SCHEDULE) - COMPANY/OPERATOR MANAGEMENT
  7. (F) OBJECT - TREE(S)
  8. (C) MINIMUM DESCENT ALTITUDE - NOT MAINTAINED
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Occurrence #2: IN FLIGHT COLLISION WITH TERRAIN/WATER

Phase of Operation: DESCENT - UNCONTROLLED

## Factual Information

### Pilot Information

<b>Certificate:</b>	Airline Transport; Flight Instructor; Commercial	<b>Age:</b>	31, Male
<b>Airplane Rating(s):</b>	Multi-engine Land; Single-engine Land; Single-engine Sea	<b>Seat Occupied:</b>	Left
<b>Other Aircraft Rating(s):</b>	Glider	<b>Restraint Used:</b>	
<b>Instrument Rating(s):</b>	Airplane	<b>Second Pilot Present:</b>	Yes
<b>Instructor Rating(s):</b>	Airplane Multi-engine; Airplane Single-engine; Instrument Airplane	<b>Toxicology Performed:</b>	Yes
<b>Medical Certification:</b>	Class 1 Valid Medical--w/ waivers/lim.	<b>Last FAA Medical Exam:</b>	05/21/1985
<b>Occupational Pilot:</b>		<b>Last Flight Review or Equivalent:</b>	
<b>Flight Time:</b>	5582 hours (Total, all aircraft), 801 hours (Total, this make and model), 3468 hours (Pilot In Command, all aircraft), 190 hours (Last 90 days, all aircraft), 4 hours (Last 24 hours, all aircraft)		

### Aircraft and Owner/Operator Information

<b>Aircraft Make:</b>	GATES LEARJET	<b>Registration:</b>	N455JA
<b>Model/Series:</b>	24D 24D	<b>Aircraft Category:</b>	Airplane
<b>Year of Manufacture:</b>		<b>Amateur Built:</b>	No
<b>Airworthiness Certificate:</b>	Normal	<b>Serial Number:</b>	300
<b>Landing Gear Type:</b>	Retractable - Tricycle	<b>Seats:</b>	8
<b>Date/Type of Last Inspection:</b>	07/01/1985, AAIP	<b>Certified Max Gross Wt.:</b>	13500 lbs
<b>Time Since Last Inspection:</b>	86 Hours	<b>Engines:</b>	2 Turbo Jet
<b>Airframe Total Time:</b>	6645 Hours	<b>Engine Manufacturer:</b>	GE
<b>ELT:</b>	Installed, activated, aided in locating accident	<b>Engine Model/Series:</b>	CJ-610-6
<b>Registered Owner:</b>		<b>Rated Power:</b>	2950 lbs
<b>Operator:</b>	ERA HELICOPTERS, INC.	<b>Operating Certificate(s) Held:</b>	Commuter Air Carrier (135)
<b>Operator Does Business As:</b>	JET ALASKA	<b>Operator Designator Code:</b>	

## Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual Conditions	Condition of Light:	Night/Dark
Observation Facility, Elevation:	GKN, 1578 ft msl	Distance from Accident Site:	7 Nautical Miles
Observation Time:	0320 ADT	Direction from Accident Site:	137°
Lowest Cloud Condition:	Scattered / 1200 ft agl	Visibility	7 Miles
Lowest Ceiling:	Overcast / 9000 ft agl	Visibility (RVR):	0 ft
Wind Speed/Gusts:	11 knots / 12 knots	Turbulence Type Forecast/Actual:	/
Wind Direction:	180°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:		Temperature/Dew Point:	
Precipitation and Obscuration:			
Departure Point:	ANCHORAGE, AK (ANC)	Type of Flight Plan Filed:	IFR
Destination:	(GKN)	Type of Clearance:	IFR
Departure Time:	0129 ADT	Type of Airspace:	Class E

## Airport Information

Airport:	GULKANA (GKN)	Runway Surface Type:	Asphalt
Airport Elevation:	1578 ft	Runway Surface Condition:	Wet
Runway Used:	14	IFR Approach:	VOR
Runway Length/Width:	4200 ft / 100 ft	VFR Approach/Landing:	None

## Wreckage and Impact Information

Crew Injuries:	2 Fatal	Aircraft Damage:	Destroyed
Passenger Injuries:	1 Fatal	Aircraft Fire:	On-Ground
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	3 Fatal	Latitude, Longitude:	

## Administrative Information

Investigator In Charge (IIC):	MARC STELLA	Report Date:	
Additional Participating Persons:	ROBERT L HOFFMAN KENT C ADAMS JAMES HALL; GLENNALLEN, OF		
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 <a href="mailto:pubinquiry@ntsb.gov">pubinquiry@ntsb.gov</a> , or at 800-877-6799. Dockets released after this date are available at <a href="http://dms.nts.gov/pubdms/">http://dms.nts.gov/pubdms/</a> .		

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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](#).