

# **Aviation Investigation Final Report**

Location: NASHVILLE, Tennessee Incident Number: ATL87IA179

Date & Time: June 18, 1987, 22:17 Local Registration: N482DA

Aircraft: BOEING 727-232 Aircraft Damage: None

**Defining Event:** 49 None

Flight Conducted Under: Part 121: Air carrier - Scheduled

## **Analysis**

AT APRX 2211 CDT, DELTA FLT 314 (BOEING 727, N482DA) WAS CLRD TO TAXI TO RWY 31 WITH INFO INDIA. INFO INDIA INDCD RWY 31WAS ACTIVE. SOON THEREAFTER, SOUTHWEST FLT 715 (BOEING 737, N50SW) REQD & RECD TAXI CLNC TO RWY 13 FOR TKOF. TO ACCOMMO-DATE INCOMING TRAFFIC THAT HAD REQD RWY 13 FOR LNDG, FLT 715 (AT THE APCH END OF RWY 13) WAS CLRD FOR IMMEDIATE TKOF. INITIAL ACKNOWLEDGEMENT (OF TKOF CLNC, RECD BY TWR) WAS GARBLED FLWD BY AN AUDIBLE '. . . 715.' THE TWR CTLR DID NOT REALIZE BOTH FLTS HAD ACKNOWLEDGED THE TKOF CLNC, SINCE FLT 314 WAS STILL TAXIING TO RWY 31. BOTH FLTS STARTED DEPG FM OPPOSITE ENDS OF THE RWY. AT 1ST, NEITHER FLT CREW COULD SEE THE OTR DUE TO A CROWN IN THE RWY. WHEN THEY SAW EACH OTR, FLT 715 WAS APCHG V1 SPEED & ELECTED TO CONT THE TKOF. FLT 314 HAD JUST BGN ITS TKOF ROLL & ABORTED BY TURNING OFF ON A TWY. AN INV REVEALED THAT BFR DEPG, WHEN FLT 314 WAS APCHG RWY 31 FOR TKOF, THE 1ST OFFICER (F/O) THOUGHT HE HEARD CLNC FOR TKOF. THE CAPT OF FLT 314 ASKED THE F/O IF HE WAS SURE & THE F/O REPLIED 'YES' & SAID HE HAD ACKNOWLEDGED THE CLNC.

## **Probable Cause and Findings**

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

#### **Findings**

Occurrence #1: NEAR COLLISION BETWEEN AIRCRAFT

Phase of Operation: TAKEOFF - ROLL/RUN

#### Findings

- 1. LIGHT CONDITION DARK NIGHT
- 2. (C) ATC CLEARANCE MISREAD COPILOT/SECOND PILOT
- 3. (C) INSTRUCTIONS, WRITTEN/VERBAL NOT FOLLOWED PILOT IN COMMAND
- 4. (F) AIRPORT FACILITIES, RUNWAY/LANDING AREA CONDITION
- 5. (F) VISUAL LOOKOUT REDUCED

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# **Factual Information**

#### **Pilot Information**

Certificate:	Airline transport	Age:	48,Male
Airplane Rating(s):	Single-engine land; Multi-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	Airplane	Second Pilot Present:	No
Instructor Rating(s):		Toxicology Performed:	No
Medical Certification:	Class 1 Valid Medicalno waivers/lim.	Last FAA Medical Exam:	
Occupational Pilot:	Yes	Last Flight Review or Equivalent:	
Flight Time:	14000 hours (Total, all aircraft), 100 hours, all aircraft)	0 hours (Total, this make and model),	6 hours (Last 24

# **Aircraft and Owner/Operator Information**

Aircraft Make:	BOEING	Registration:	N482DA
Model/Series:	727-232 727-232	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Transport	Serial Number:	20862
Landing Gear Type:	Retractable - Tricycle	Seats:	134
Date/Type of Last Inspection:	AAIP	Certified Max Gross Wt.:	191500 lbs
Time Since Last Inspection:		Engines:	3 Turbo fan
Airframe Total Time:		Engine Manufacturer:	P&W
ELT:	Not installed	Engine Model/Series:	JT8D-15
Registered Owner:	DELTA AIRLINES	Rated Power:	15500 Lbs thrust
Operator:		Operating Certificate(s) Held:	Flag carrier (121)
Operator Does Business As:		Operator Designator Code:	DALA

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## **Meteorological Information and Flight Plan**

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Night/dark
Observation Facility, Elevation:	BNA ,599 ft msl	Distance from Accident Site:	
Observation Time:	22:00 Local	Direction from Accident Site:	
<b>Lowest Cloud Condition:</b>	Unknown / 4000 ft AGL	Visibility	7 miles
Lowest Ceiling:	Broken / 4000 ft AGL	Visibility (RVR):	
Wind Speed/Gusts:	7 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	60°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30 inches Hg	Temperature/Dew Point:	24°C / 23°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	(BNA)	Type of Flight Plan Filed:	IFR
Destination:	KNOXVILLE , TN (TYS)	Type of Clearance:	IFR
Departure Time:	22:17 Local	Type of Airspace:	Class E

# **Airport Information**

Airport:	NASHVILLE BNA	Runway Surface Type:	Asphalt
Airport Elevation:	599 ft msl	<b>Runway Surface Condition:</b>	Dry
Runway Used:	31	IFR Approach:	None
Runway Length/Width:	8500 ft / 150 ft	VFR Approach/Landing:	None

# **Wreckage and Impact Information**

Crew Injuries:	7 None	Aircraft Damage:	None
Passenger Injuries:	42 None	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	49 None	Latitude, Longitude:	36.109962,-86.660255(est)

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#### **Administrative Information**

Investigator In Charge (IIC): Coleman, Ben

Additional Participating Persons: CURTIS WILKES; NASHVILLE , TN

Original Publish Date: October 17, 1988

Last Revision Date: Investigation Class: Class
Note: https://data.ntsb.gov/Docket?ProjectID=7335

The National Transportation Safety Board (NTSB) is an independent federal agency charged by Congress with investigating every civil aviation accident in the United States and significant events in other modes of transportation—railroad, transit, highway, marine, pipeline, and commercial space. We determine the probable causes of the accidents and events we investigate, and issue safety recommendations aimed at preventing future occurrences. In addition, we conduct transportation safety research studies and offer information and other assistance to family members and survivors for each accident or event we investigate. We also serve as the appellate authority for enforcement actions involving aviation and mariner certificates issued by the Federal Aviation Administration (FAA) and US Coast Guard, and we adjudicate appeals of civil penalty actions taken by the FAA.

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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# **Aviation Investigation Final Report**

Location: NASHVILLE, Tennessee Incident Number: ATL87IA179

Date & Time: June 18, 1987, 22:17 Local Registration: N50SW

Aircraft: BOEING 737-2H4 Aircraft Damage: None

**Defining Event:** Injuries: 112 None

Flight Conducted Under: Part 121: Air carrier - Scheduled

## **Analysis**

AT APRX 2211 CDT, DELTA FLT 314 (BOEING 727, N482DA) WAS CLRD TO TAXI TO RWY 31 WITH INFO INDIA. INFO INDIA INDCD RWY 31WAS ACTIVE. SOON THEREAFTER, SOUTHWEST FLT 715 (BOEING 737, N50SW) REQD & RECD TAXI CLNC TO RWY 13 FOR TKOF. TO ACCOMMO-DATE INCOMING TRAFFIC THAT HAD REQD RWY 13 FOR LNDG, FLT 715 (AT THE APCH END OF RWY 13) WAS CLRD FOR IMMEDIATE TKOF. INITIAL ACKNOWLEDGEMENT (OF TKOF CLNC, RECD BY TWR) WAS GARBLED FLWD BY AN AUDIBLE '. . . 715.' THE TWR CTLR DID NOT REALIZE BOTH FLTS HAD ACKNOWLEDGED THE TKOF CLNC, SINCE FLT 314 WAS STILL TAXIING TO RWY 31. BOTH FLTS STARTED DEPG FM OPPOSITE ENDS OF THE RWY. AT 1ST, NEITHER FLT CREW COULD SEE THE OTR DUE TO A CROWN IN THE RWY. WHEN THEY SAW EACH OTR, FLT 715 WAS APCHG V1 SPEED & ELECTED TO CONT THE TKOF. FLT 314 HAD JUST BGN ITS TKOF ROLL & ABORTED BY TURNING OFF ON A TWY. AN INV REVEALED THAT BFR DEPG, WHEN FLT 314 WAS APCHG RWY 31 FOR TKOF, THE 1ST OFFICER (F/O) THOUGHT HE HEARD CLNC FOR TKOF. THE CAPT OF FLT 314 ASKED THE F/O IF HE WAS SURE & THE F/O REPLIED 'YES' & SAID HE HAD ACKNOWLEDGED THE CLNC.

## **Probable Cause and Findings**

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

#### **Findings**

Occurrence #1: NEAR COLLISION BETWEEN AIRCRAFT

Phase of Operation: TAKEOFF

#### Findings

- 1. LIGHT CONDITION DARK NIGHT
- 2. (C) ATC CLEARANCE MISREAD PILOT OF OTHER AIRCRAFT
- 3. (C) INSTRUCTIONS, WRITTEN/VERBAL NOT FOLLOWED PILOT OF OTHER AIRCRAFT
- 4. (F) AIRPORT FACILITIES, RUNWAY/LANDING AREA CONDITION
- 5. (F) VISUAL LOOKOUT REDUCED

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# **Factual Information**

#### **Pilot Information**

Certificate:	Airline transport	Age:	44,Male
Airplane Rating(s):	Single-engine land; Multi-engine land	Seat Occupied:	Left
Other Aircraft Rating(s):	None	Restraint Used:	
Instrument Rating(s):	Airplane	Second Pilot Present:	Yes
Instructor Rating(s):	Airplane multi-engine; Airplane single-engine; Instrument airplane	Toxicology Performed:	No
Medical Certification:	Class 1 Valid Medicalw/ waivers/lim	Last FAA Medical Exam:	January 31, 1987
Occupational Pilot:	Yes	Last Flight Review or Equivalent:	
Flight Time:	10000 hours (Total, all aircraft)		

# Aircraft and Owner/Operator Information

Aircraft Make:	BOEING	Registration:	N50SW
Model/Series:	737-2H4 737-2H4	Aircraft Category:	Airplane
Year of Manufacture:		Amateur Built:	
Airworthiness Certificate:	Transport	Serial Number:	21447
Landing Gear Type:	Retractable - Tricycle	Seats:	124
Date/Type of Last Inspection:	AAIP	Certified Max Gross Wt.:	100800 lbs
Time Since Last Inspection:		Engines:	2 Turbo fan
Airframe Total Time:		Engine Manufacturer:	P&W
ELT:	Not installed	Engine Model/Series:	JT8D-9A
Registered Owner:	SOUTHWEST AIRLINES	Rated Power:	14500 Lbs thrust
Operator:		Operating Certificate(s) Held:	Flag carrier (121)
Operator Does Business As:		Operator Designator Code:	SWAA

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# Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual (VMC)	Condition of Light:	Night/dark
Observation Facility, Elevation:	BNA ,599 ft msl	Distance from Accident Site:	
Observation Time:	22:00 Local	Direction from Accident Site:	
<b>Lowest Cloud Condition:</b>	Unknown / 4000 ft AGL	Visibility	7 miles
Lowest Ceiling:	Broken / 4000 ft AGL	Visibility (RVR):	
Wind Speed/Gusts:	7 knots /	Turbulence Type Forecast/Actual:	/
Wind Direction:	60°	Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30 inches Hg	Temperature/Dew Point:	24°C / 23°C
Precipitation and Obscuration:	No Obscuration; No Precipitation		
Departure Point:	(BNA)	Type of Flight Plan Filed:	IFR
Destination:	CHICAGO , IL (MID )	Type of Clearance:	IFR
Departure Time:	22:17 Local	Type of Airspace:	

# **Airport Information**

Airport:	NASHVILLE BNA	Runway Surface Type:	Asphalt
Airport Elevation:	599 ft msl	<b>Runway Surface Condition:</b>	Dry
Runway Used:	31	IFR Approach:	None
Runway Length/Width:	8500 ft / 150 ft	VFR Approach/Landing:	None

# **Wreckage and Impact Information**

Crew Injuries:	5 None	Aircraft Damage:	None
Passenger Injuries:	107 None	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	112 None	Latitude, Longitude:	36.109962,-86.660255(est)

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#### **Administrative Information**

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Last Revision Date: Investigation Class: Class
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