



# Aviation Investigation Final Report

<b>Location:</b>	DELAWARE CITY, Delaware	<b>Accident Number:</b>	BF085LA019
<b>Date &amp; Time:</b>	March 2, 1985, 23:15 Local	<b>Registration:</b>	N18038
<b>Aircraft:</b>	CESSNA 177	<b>Aircraft Damage:</b>	Substantial
<b>Defining Event:</b>		<b>Injuries:</b>	5 None
<b>Flight Conducted Under:</b>	Part 91: General aviation - Personal		

## Analysis

THE ACFT DEPARTED CHARLESTON, SC AT ABOUT 1730 WITH 42 GALS (5 HRS) OF FUEL ON BOARD FOR THE PLANNED 4 HR FLT TO SMYRNA, DE. HEADWINDS OF 10 TO 20 KTS WERE ENCOUNTERED EN ROUTE, PUTTING THE FLT IN THE SMYRNA AREA 45 MINS LATE WITH ONLY 15 MINS OF FUEL REMAINING. THE PLT FOUND THAT THE PLT-ACTIVATED-RWY-LIGHTS WERE INOP. AFTER SEVERAL ATTEMPTS TO ACTIVATE THE LIGHTS & FLYING THE PATTERN DOWN TO 200 FT, THE PLT DIVERTED TO WILMINGTON ARPT, ABOUT 30 MILES NORTH. THE ENG LOST POWER AT AN ALTITUDE OF 2000 FT WHEN THE ACFT WAS APRX 8 MILES SOUTH OF WILMINGTON. A SUBSEQUENT FORCED LANDING OCCURRED IN A SWAMPY AREA. THE ACFT CAME TO REST INVERTED AFTER THE NOSEWHEEL BECAME MIRED IN MUD DURING THE LANDING. THE PLT STATED THAT HE WAS LATER TOLD THAT PERSONNEL AT SMYRNA HAD SHUT DOWN THE RWY LIGHT SYS FOR MAINTENANCE & HAD NOT REACTIVATED THE LIGHTS WHEN THEY HAD FINISHED.

## Probable Cause and Findings

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

### Findings

Occurrence #1: LOSS OF ENGINE POWER(TOTAL) - NONMECHANICAL  
Phase of Operation: CRUISE

Findings

1. (C) PREFLIGHT PLANNING/PREPARATION - INADEQUATE - PILOT IN COMMAND
2. (F) WEATHER CONDITION - UNFAVORABLE WIND
3. (F) AIRPORT FACILITIES,RUNWAY EDGE LIGHTS - NOT OPERATING
4. (C) FLIGHT TO ALTERNATE DESTINATION - DELAYED - PILOT IN COMMAND
5. (C) FLUID,FUEL - EXHAUSTION
6. (C) FUEL SUPPLY - INADEQUATE - PILOT IN COMMAND

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Occurrence #2: FORCED LANDING

Phase of Operation: DESCENT - EMERGENCY

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Occurrence #3: NOSE OVER

Phase of Operation: LANDING - ROLL

Findings

7. (F) LIGHT CONDITION - NIGHT
8. (F) TERRAIN CONDITION - SOFT
9. (F) TERRAIN CONDITION - WET

## Factual Information

### Pilot Information

<b>Certificate:</b>	Private	<b>Age:</b>	34,Male
<b>Airplane Rating(s):</b>	Single-engine land	<b>Seat Occupied:</b>	Left
<b>Other Aircraft Rating(s):</b>	None	<b>Restraint Used:</b>	
<b>Instrument Rating(s):</b>	None	<b>Second Pilot Present:</b>	No
<b>Instructor Rating(s):</b>	None	<b>Toxicology Performed:</b>	No
<b>Medical Certification:</b>	Class 3 Valid Medical--no waivers/lim.	<b>Last FAA Medical Exam:</b>	February 21, 1985
<b>Occupational Pilot:</b>	No	<b>Last Flight Review or Equivalent:</b>	
<b>Flight Time:</b>	294 hours (Total, all aircraft), 48 hours (Total, this make and model), 258 hours (Pilot In Command, all aircraft), 23 hours (Last 90 days, all aircraft), 5 hours (Last 24 hours, all aircraft)		

### Aircraft and Owner/Operator Information

<b>Aircraft Make:</b>	CESSNA	<b>Registration:</b>	N18038
<b>Model/Series:</b>	177 177	<b>Aircraft Category:</b>	Airplane
<b>Year of Manufacture:</b>		<b>Amateur Built:</b>	
<b>Airworthiness Certificate:</b>	Normal	<b>Serial Number:</b>	17702526
<b>Landing Gear Type:</b>	Tricycle	<b>Seats:</b>	4
<b>Date/Type of Last Inspection:</b>	Unknown	<b>Certified Max Gross Wt.:</b>	2500 lbs
<b>Time Since Last Inspection:</b>		<b>Engines:</b>	1 Reciprocating
<b>Airframe Total Time:</b>	1250 Hrs	<b>Engine Manufacturer:</b>	LYCOMING
<b>ELT:</b>	Installed, not activated	<b>Engine Model/Series:</b>	O-360
<b>Registered Owner:</b>	SMYRNA PILOTS ASSOC.	<b>Rated Power:</b>	180 Horsepower
<b>Operator:</b>		<b>Operating Certificate(s) Held:</b>	None
<b>Operator Does Business As:</b>		<b>Operator Designator Code:</b>	

## Meteorological Information and Flight Plan

<b>Conditions at Accident Site:</b>	Visual (VMC)	<b>Condition of Light:</b>	Night/bright
<b>Observation Facility, Elevation:</b>	ILG ,10 ft msl	<b>Distance from Accident Site:</b>	10 Nautical Miles
<b>Observation Time:</b>	22:52 Local	<b>Direction from Accident Site:</b>	350°
<b>Lowest Cloud Condition:</b>	Clear	<b>Visibility</b>	15 miles
<b>Lowest Ceiling:</b>	None	<b>Visibility (RVR):</b>	
<b>Wind Speed/Gusts:</b>	11 knots / None	<b>Turbulence Type Forecast/Actual:</b>	/
<b>Wind Direction:</b>	340°	<b>Turbulence Severity Forecast/Actual:</b>	/
<b>Altimeter Setting:</b>	30 inches Hg	<b>Temperature/Dew Point:</b>	6°C / -6°C
<b>Precipitation and Obscuration:</b>	No Obscuration; No Precipitation		
<b>Departure Point:</b>	CHARLESTON (CHS )	<b>Type of Flight Plan Filed:</b>	None
<b>Destination:</b>	SMYRNA (38N )	<b>Type of Clearance:</b>	None
<b>Departure Time:</b>	17:30 Local	<b>Type of Airspace:</b>	Class G

## Airport Information

<b>Airport:</b>	GREATER WILMINGTON ILG	<b>Runway Surface Type:</b>	
<b>Airport Elevation:</b>	0 ft msl	<b>Runway Surface Condition:</b>	
<b>Runway Used:</b>	0	<b>IFR Approach:</b>	None
<b>Runway Length/Width:</b>	0 ft / 0 ft	<b>VFR Approach/Landing:</b>	Forced landing

## Wreckage and Impact Information

<b>Crew Injuries:</b>	1 None	<b>Aircraft Damage:</b>	Substantial
<b>Passenger Injuries:</b>	4 None	<b>Aircraft Fire:</b>	None
<b>Ground Injuries:</b>	N/A	<b>Aircraft Explosion:</b>	None
<b>Total Injuries:</b>	5 None	<b>Latitude, Longitude:</b>	39.569278,-75.600791(est)

## Administrative Information

**Investigator In Charge (IIC):** Richardson, Brian

**Additional Participating Persons:**

**Original Publish Date:**

**Last Revision Date:**

**Investigation Class:** [Class](#)

**Note:**

**Investigation Docket:** <https://data.nts.gov/Docket?ProjectID=11161>

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