



# **Aviation Investigation Final Report**

| Location:               | WICHITA, Kansas                      | Accident Number:     | CHI93LA007  |
|-------------------------|--------------------------------------|----------------------|-------------|
| Date & Time:            | October 8, 1992, 15:15 Local         | <b>Registration:</b> | N67433      |
| Aircraft:               | Howard Aircraft Corp. DGA-15P        | Aircraft Damage:     | Substantial |
| Defining Event:         |                                      | Injuries:            | 2 None      |
| Flight Conducted Under: | Part 91: General aviation - Personal |                      |             |

# Analysis

THE PILOT OF THE CLASSIC TAILWHEEL AIRPLANE WAS PERFORMING A CROSSWIND LANDING. THE WINDS THE AIRPLANE ENCOUNTERED WERE APPROXIMATELY 60 TO 80 DEGREES TO THE LEFT OF THE AIRPLANE'S NOSE AND 23 TO 35 KNOTS IN VELOCITY. THE PILOT STATED THE AIRPLANE BEGAN A TURN TO THE LEFT UPON LANDING WHICH COULD NOT BE STOPPED WITH RUDDER AND BRAKE. THE PILOT SAID HE HAD PERFORMED MANY SUCCESSFUL CROSSWIND LANDINGS BEFORE, UNDER CONDITIONS SIMILAR TO THAT WHICH HE HAD ENCOUNTERED ON THE ACCIDENT DATE. THE AIRPLANE'S LEFT MAIN LANDING GEAR SEPARATED FROM THE AIRFRAME SHORTLY AFTER IT DEPARTED THE RUNWAY ENVIRONMENT. THE LEFT WING SHATTERED, ACCORDING TO THE PILOT, WHEN IT CONTACTED THE GROUND. ACCORDING TO THE AIRPLANE'S PILOT OPERATING HANDBOOK, THE MAXIMUM 90 DEGREE CROSSWIND COMPONENT IS 12 MILES PER HOUR.

### **Probable Cause and Findings**

The National Transportation Safety Board determines the probable cause(s) of this accident to be: INADEQUATE PREFLIGHT PLANNING/PREPARATION BY THE PILOT, THE PILOT'S OVER CONFIDENCE IN HIS PERSONAL ABILITY, AND AIRPLANE PERFORMANCE DATA NOT FOLLOWED BY THE PILOT.

Findings

Occurrence #1: LOSS OF CONTROL - ON GROUND/WATER Phase of Operation: LANDING - ROLL

Findings

1. (C) PREFLIGHT PLANNING/PREPARATION - INADEQUATE - PILOT IN COMMAND

- 2. (C) OVERCONFIDENCE IN PERSONAL ABILITY PILOT IN COMMAND
- 3. (C) PERFORMANCE DATA NOT FOLLOWED PILOT IN COMMAND

4. (F) DIRECTIONAL CONTROL - NOT POSSIBLE - PILOT IN COMMAND

5. COMPENSATION FOR WIND CONDITIONS - ATTEMPTED - PILOT IN COMMAND

6. (F) GROUND LOOP/SWERVE - ENCOUNTERED - PILOT IN COMMAND

Occurrence #2: MAIN GEAR COLLAPSED Phase of Operation: DESCENT - UNCONTROLLED

Findings

7. TERRAIN CONDITION - GRASS

# **Factual Information**

#### **Pilot Information**

| Certificate:              | Commercial                                                                                                                                                                                     | Age:                              | 76,Male       |
|---------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------------------|---------------|
| Airplane Rating(s):       | Single-engine land; Multi-engine<br>land                                                                                                                                                       | Seat Occupied:                    | Left          |
| Other Aircraft Rating(s): | None                                                                                                                                                                                           | Restraint Used:                   |               |
| Instrument Rating(s):     | Airplane                                                                                                                                                                                       | Second Pilot Present:             | No            |
| Instructor Rating(s):     | None                                                                                                                                                                                           | Toxicology Performed:             | No            |
| Medical Certification:    | Class 2 Valid Medicalw/<br>waivers/lim                                                                                                                                                         | Last FAA Medical Exam:            | April 9, 1992 |
| Occupational Pilot:       | No                                                                                                                                                                                             | Last Flight Review or Equivalent: |               |
| Flight Time:              | 30000 hours (Total, all aircraft), 860 hours (Total, this make and model), 21 hours (Last 90 days, all aircraft), 12 hours (Last 30 days, all aircraft), 9 hours (Last 24 hours, all aircraft) |                                   |               |

#### Aircraft and Owner/Operator Information

| Aircraft Make:                   | Howard Aircraft Corp.    | Registration:                     | N67433          |
|----------------------------------|--------------------------|-----------------------------------|-----------------|
| Model/Series:                    | DGA-15P DGA-15P          | Aircraft Category:                | Airplane        |
| Year of Manufacture:             |                          | Amateur Built:                    |                 |
| Airworthiness Certificate:       | Normal                   | Serial Number:                    | 563             |
| Landing Gear Type:               | Tailwheel                | Seats:                            | 5               |
| Date/Type of Last<br>Inspection: | October 1, 1992 Annual   | Certified Max Gross Wt.:          | 4425 lbs        |
| Time Since Last Inspection:      | 8 Hrs                    | Engines:                          | 1 Reciprocating |
| Airframe Total Time:             |                          | Engine Manufacturer:              | P&W             |
| ELT:                             | Installed, not activated | Engine Model/Series:              | R-985           |
| Registered Owner:                | CLAYTON GRAVES           | Rated Power:                      | 450 Horsepower  |
| Operator:                        | CLAYTON GRAVES           | Operating Certificate(s)<br>Held: | None            |
| 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: | ICT ,1332 ft msl                 | Distance from Accident Site:            | 10 Nautical Miles |
| Observation Time:                | 14:50 Local                      | Direction from Accident Site:           | 260°              |
| Lowest Cloud Condition:          | Unknown / 4300 ft AGL            | Visibility                              | 10 miles          |
| Lowest Ceiling:                  | Overcast / 4300 ft AGL           | Visibility (RVR):                       |                   |
| Wind Speed/Gusts:                | 23 knots / 39 knots              | Turbulence Type<br>Forecast/Actual:     | /                 |
| Wind Direction:                  | 300°                             | Turbulence Severity<br>Forecast/Actual: | /                 |
| Altimeter Setting:               | 29 inches Hg                     | Temperature/Dew Point:                  | 10°C / 2°C        |
| Precipitation and Obscuration:   | No Obscuration; No Precipitation |                                         |                   |
| Departure Point:                 | MONTE' VISTA , CO (MVI )         | Type of Flight Plan Filed:              | None              |
| Destination:                     | WICHITA , KS (BEC )              | Type of Clearance:                      | None              |
| Departure Time:                  | 11:00 Local                      | Type of Airspace:                       | Class E           |

# **Airport Information**

| Airport:             | BEECH FACTORY AIRPORT BEC | Runway Surface Type:             | Asphalt   |
|----------------------|---------------------------|----------------------------------|-----------|
| Airport Elevation:   | 1387 ft msl               | <b>Runway Surface Condition:</b> | Dry       |
| Runway Used:         | 36                        | IFR Approach:                    | None      |
| Runway Length/Width: | 5000 ft / 100 ft          | VFR Approach/Landing:            | Full stop |

#### Wreckage and Impact Information

| Crew Injuries:         | 1 None | Aircraft Damage:        | Substantial |
|------------------------|--------|-------------------------|-------------|
| Passenger<br>Injuries: | 1 None | Aircraft Fire:          | None        |
| Ground Injuries:       | N/A    | Aircraft Explosion:     | None        |
| Total Injuries:        | 2 None | Latitude,<br>Longitude: |             |

#### **Administrative Information**

| Investigator In Charge (IIC):        | Gattolin, Frank                              |  |
|--------------------------------------|----------------------------------------------|--|
| Additional Participating<br>Persons: | EARLINE BILES; WICHITA , KS                  |  |
| Original Publish Date:               | May 26, 1993                                 |  |
| Last Revision Date:                  |                                              |  |
| Investigation Class:                 | <u>Class</u>                                 |  |
| Note:                                |                                              |  |
| Investigation Docket:                | https://data.ntsb.gov/Docket?ProjectID=15604 |  |

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