



Aviation Investigation Final Report

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|--------------------------------|---|-------------------------|-------------|
| Location: | Patterson, Louisiana | Accident Number: | CEN21LA456 |
| Date & Time: | September 25, 2021, 06:55 Local | Registration: | N662RL |
| Aircraft: | Bell 407 | Aircraft Damage: | Substantial |
| Defining Event: | Ground collision | Injuries: | 3 None |
| Flight Conducted Under: | Part 135: Air taxi & commuter - Non-scheduled | | |

Analysis

While hovering from the helicopter pad to reposition for takeoff, the pilot backed up the helicopter. During a pedal turn, the tail rotor contacted another helicopter’s main rotor blades, which was parked and located behind on another pad. The pilot reported she felt a strong jolt to the left, and the helicopter began to spin. The pilot lowered the collective, reduced throttle, and the helicopter came to rest upright adjacent to the helicopter pad.

The helicopter sustained substantial damage to the tail boom. The operator reported that there were no preaccident mechanical malfunctions or failures with the helicopter that would have precluded normal operation.

Probable Cause and Findings

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

The pilot’s failure to maintain adequate clearance from a parked helicopter while hovering to reposition for takeoff.

Findings

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| Personnel issues | Monitoring environment - Pilot |
| Environmental issues | Aircraft - Awareness of condition |

Factual Information

History of Flight

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| Taxi-into takeoff position | Ground collision (Defining event) |
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Pilot Information

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|----------------------------------|---|--|-----------------|
| Certificate: | Commercial; Flight instructor | Age: | 25,Female |
| Airplane Rating(s): | None | Seat Occupied: | Right |
| Other Aircraft Rating(s): | Helicopter | Restraint Used: | 4-point |
| Instrument Rating(s): | Helicopter | Second Pilot Present: | No |
| Instructor Rating(s): | Helicopter | Toxicology Performed: | |
| Medical Certification: | Class 1 Without waivers/limitations | Last FAA Medical Exam: | October 8, 2020 |
| Occupational Pilot: | Yes | Last Flight Review or Equivalent: | May 1, 2021 |
| Flight Time: | 1479 hours (Total, all aircraft), 255 hours (Total, this make and model), 1479 hours (Pilot In Command, all aircraft), 142 hours (Last 90 days, all aircraft), 36 hours (Last 30 days, all aircraft), 5 hours (Last 24 hours, all aircraft) | | |

Aircraft and Owner/Operator Information

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|--------------------------------------|---------------------------------|---------------------------------------|----------------------------|
| Aircraft Make: | Bell | Registration: | N662RL |
| Model/Series: | 407 | Aircraft Category: | Helicopter |
| Year of Manufacture: | 1997 | Amateur Built: | |
| Airworthiness Certificate: | Normal | Serial Number: | 53203 |
| Landing Gear Type: | None; Skid | Seats: | 7 |
| Date/Type of Last Inspection: | September 24, 2021 AAIP | Certified Max Gross Wt.: | 5250 lbs |
| Time Since Last Inspection: | | Engines: | 1 Turbo shaft |
| Airframe Total Time: | 25222 Hrs as of last inspection | Engine Manufacturer: | Rolls Royce |
| ELT: | C126 installed, not activated | Engine Model/Series: | 250-C30 |
| Registered Owner: | Rotorcraft Leasing Company, LLC | Rated Power: | 650 Horsepower |
| Operator: | Rotorcraft Leasing Company, LLC | Operating Certificate(s) Held: | Commuter air carrier (135) |
| Operator Does Business As: | RLC, LLC | Operator Designator Code: | YTRA |

Meteorological Information and Flight Plan

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|---|------------------------|---|------------------|
| Conditions at Accident Site: | Visual (VMC) | Condition of Light: | Day |
| Observation Facility, Elevation: | KPTN, 9 ft msl | Distance from Accident Site: | 1 Nautical Miles |
| Observation Time: | 07:01 Local | Direction from Accident Site: | 18° |
| Lowest Cloud Condition: | Few / 200 ft AGL | Visibility | 0.25 miles |
| Lowest Ceiling: | | Visibility (RVR): | |
| Wind Speed/Gusts: | / | Turbulence Type Forecast/Actual: | None / None |
| Wind Direction: | | Turbulence Severity Forecast/Actual: | N/A / N/A |
| Altimeter Setting: | 30.11 inches Hg | Temperature/Dew Point: | 14°C / 14°C |
| Precipitation and Obscuration: | Moderate - None - Mist | | |
| Departure Point: | Patterson, LA | Type of Flight Plan Filed: | Company VFR |
| Destination: | | Type of Clearance: | VFR |
| Departure Time: | | Type of Airspace: | Class G |

Airport Information

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|-----------------------------|---------------------------|----------------------------------|------|
| Airport: | HARRY P WILLIAMS MEML PTN | Runway Surface Type: | |
| Airport Elevation: | 8 ft msl | Runway Surface Condition: | Dry |
| Runway Used: | | IFR Approach: | None |
| Runway Length/Width: | | VFR Approach/Landing: | None |

Wreckage and Impact Information

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|----------------------------|--------|-----------------------------|---------------------------|
| Crew Injuries: | 1 None | Aircraft Damage: | Substantial |
| Passenger Injuries: | 2 None | Aircraft Fire: | None |
| Ground Injuries: | | Aircraft Explosion: | None |
| Total Injuries: | 3 None | Latitude, Longitude: | 29.709043,-91.335891(est) |

Administrative Information

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| Investigator In Charge (IIC): | Sauer, Aaron |
| Additional Participating Persons: | Michael Wilson; FAA; Baton Rouge, LA |
| Original Publish Date: | November 16, 2021 |
| Last Revision Date: | |
| Investigation Class: | Class 4 |
| Note: | The NTSB did not travel to the scene of this accident. |
| Investigation Docket: | https://data.ntsb.gov/Docket?ProjectID=103974 |

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](#).