



# Aviation Investigation Final Report

|                                |                                 |                         |             |
|--------------------------------|---------------------------------|-------------------------|-------------|
| <b>Location:</b>               | Atkins, Arkansas                | <b>Accident Number:</b> | CEN10CA582  |
| <b>Date &amp; Time:</b>        | September 17, 2010, 14:00 Local | <b>Registration:</b>    | N2309F      |
| <b>Aircraft:</b>               | AIR TRACTOR INC AT-301          | <b>Aircraft Damage:</b> | Substantial |
| <b>Defining Event:</b>         | Loss of engine power (partial)  | <b>Injuries:</b>        | 1 None      |
| <b>Flight Conducted Under:</b> | Part 137: Agricultural          |                         |             |

## Analysis

The pilot was conducting an aerial application flight when he observed a puff of smoke from the radial engine. The engine then experienced a partial loss of power and the pilot attempted to land at a nearby airstrip. While maneuvering to land, the airplane's descent rate did not allow for a landing on the airstrip and the pilot subsequently landed in a rice field. During the landing roll, the airplane nosed over and sustained substantial damage to its vertical fin. The reason for the loss of engine power could not be determined.

## Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: A partial loss of engine power during low-altitude flight for undetermined reasons.

## Findings

|                       |                                    |
|-----------------------|------------------------------------|
| <b>Aircraft</b>       | (general) - Failure                |
| <b>Not determined</b> | (general) - Unknown/Not determined |

## Factual Information

### History of Flight

|                                   |   |
|-----------------------------------|---|
| <b>Maneuvering-low-alt flying</b> | Loss of engine power (partial) (Defining event) |
| <b>Emergency descent</b>          | Collision with terr/obj (non-CFIT)              |

### Pilot Information

|                                  |  |  |                   |
|----------------------------------|--|--|-------------------|
| <b>Certificate:</b>              | Commercial; Flight instructor  | <b>Age:</b>                              | 32, Male          |
| <b>Airplane Rating(s):</b>       | Single-engine land; Multi-engine land                                    | <b>Seat Occupied:</b>                    | Single            |
| <b>Other Aircraft Rating(s):</b> | None   | <b>Restraint Used:</b>                   |                   |
| <b>Instrument Rating(s):</b>     | Airplane   | <b>Second Pilot Present:</b>             | No                |
| <b>Instructor Rating(s):</b>     | Airplane multi-engine  | <b>Toxicology Performed:</b>             | No                |
| <b>Medical Certification:</b>    | Class 2 Without waivers/limitations                                      | <b>Last FAA Medical Exam:</b>            | December 28, 2009 |
| <b>Occupational Pilot:</b>       |  | <b>Last Flight Review or Equivalent:</b> |                   |
| <b>Flight Time:</b>              | 2154 hours (Total, all aircraft), 355 hours (Total, this make and model) |  |                   |

### Aircraft and Owner/Operator Information

|                                      |                      |                                       |                 |
|--------------------------------------|----------------------|---------------------------------------|-----------------|
| <b>Aircraft Make:</b>                | AIR TRACTOR INC      | <b>Registration:</b>                  | N2309F          |
| <b>Model/Series:</b>                 | AT-301               | <b>Aircraft Category:</b>             | Airplane        |
| <b>Year of Manufacture:</b>          |                      | <b>Amateur Built:</b>                 |                 |
| <b>Airworthiness Certificate:</b>    | Restricted (Special) | <b>Serial Number:</b>                 | 301-0354        |
| <b>Landing Gear Type:</b>            | Tailwheel            | <b>Seats:</b>                         | 1               |
| <b>Date/Type of Last Inspection:</b> |                      | <b>Certified Max Gross Wt.:</b>       |                 |
| <b>Time Since Last Inspection:</b>   |                      | <b>Engines:</b>                       | 1 Reciprocating |
| <b>Airframe Total Time:</b>          |                      | <b>Engine Manufacturer:</b>           | P&W             |
| <b>ELT:</b>                          |                      | <b>Engine Model/Series:</b>           | R1340 SERIES    |
| <b>Registered Owner:</b>             | CLARK KELLY W JR     | <b>Rated Power:</b>                   | 600 Horsepower  |
| <b>Operator:</b>                     | CLARK KELLY W JR     | <b>Operating Certificate(s) Held:</b> |                 |

## Meteorological Information and Flight Plan

|   |                                  |   |             |
|---|----------------------------------|---|-------------|
| <b>Conditions at Accident Site:</b>     | Visual (VMC)                     | <b>Condition of Light:</b>                  | Day         |
| <b>Observation Facility, Elevation:</b> |                                  | <b>Distance from Accident Site:</b>         |             |
| <b>Observation Time:</b>                | 13:53 Local                      | <b>Direction from Accident Site:</b>        |             |
| <b>Lowest Cloud Condition:</b>          | Clear                            | <b>Visibility</b>                           | 10 miles    |
| <b>Lowest Ceiling:</b>                  | None                             | <b>Visibility (RVR):</b>                    |             |
| <b>Wind Speed/Gusts:</b>                | 4 knots /                        | <b>Turbulence Type Forecast/Actual:</b>     | /           |
| <b>Wind Direction:</b>                  |                                  | <b>Turbulence Severity Forecast/Actual:</b> | /           |
| <b>Altimeter Setting:</b>               | 30.04 inches Hg                  | <b>Temperature/Dew Point:</b>               | 30°C / 21°C |
| <b>Precipitation and Obscuration:</b>   | No Obscuration; No Precipitation |   |             |
| <b>Departure Point:</b>                 | Atkins, AR                       | <b>Type of Flight Plan Filed:</b>           | None        |
| <b>Destination:</b>                     | Atkins, AR                       | <b>Type of Clearance:</b>                   | None        |
| <b>Departure Time:</b>                  |                                  | <b>Type of Airspace:</b>                    |             |

## Wreckage and Impact Information

|                            |        |                             |                           |
|----------------------------|--------|-----------------------------|---------------------------|
| <b>Crew Injuries:</b>      | 1 None | <b>Aircraft Damage:</b>     | Substantial               |
| <b>Passenger Injuries:</b> |        | <b>Aircraft Fire:</b>       | None                      |
| <b>Ground Injuries:</b>    | N/A    | <b>Aircraft Explosion:</b>  | None                      |
| <b>Total Injuries:</b>     | 1 None | <b>Latitude, Longitude:</b> | 35.209999,-92.929443(est) |

## Administrative Information

**Investigator In Charge (IIC):** Aguilera, Jason

**Additional Participating Persons:**

**Original Publish Date:** April 12, 2011

**Last Revision Date:**

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

**Note:** This accident report documents the factual circumstances of this accident as described to the NTSB.

**Investigation Docket:** <https://data.nts.gov/Docket?ProjectID=77491>

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