

National Transportation Safety Board  
Washington, DC 20594

Printed on : 03/22/2015 06:53:41 PM

Brief of Accident

Adopted 01/12/2015

CEN14LA331  
File No. 33472                      06/27/2014                      Arlington ,TX                      Aircraft Reg No. N8157V                      Time (Local): 16:45 CDT

Make/Model: Cessna/A188  
Engine Make/Model: Continental Motors Inc / IO-520-D  
Aircraft Damage: Substantial  
Number of Engines: 1  
Operating Certificate(s): None  
Type of Flight Operation: Banner Tow  
Reg. Flight Conducted Under: Part 91: General Aviation

	Fatal	Serious	Minor/None
Crew	0	0	1
Pass	0	0	0

Last Depart. Point: DALLAS, TX  
Destination: Local Flight, TX  
Airport Proximity: Off Airport/Airstrip

Condition of Light: Day  
Weather Info Src: Weather Observation Facility  
Basic Weather: Visual Conditions  
Lowest Ceiling:  
Visibility: 10.00 SM  
Wind Dir/Speed: 150 / 016 kts  
Temperature (°C): 32  
Precip/Obscuration:

Pilot-in-Command                      Age: 67

Flight Time (Hours)

Certificate(s)/Rating(s)  
Airline Transport; Multi-engine Land; Single-engine Land

Total All Aircraft: 26564  
Last 90 Days: 66  
Total Make/Model: 681  
Total Instrument Time: UnK/Nr

Instrument Ratings  
None

\*\*\* Note: NTSB investigators may not have traveled in support of this investigation and used data provided by various sources to prepare this aircraft accident report. \*\*\*

The pilot reported that he was maneuvering the airplane with a banner attached when he noticed a loss of oil pressure. He notified an air traffic controller of the emergency and indicated that he could not reach an airport. The engine then experienced a total loss of power, and the pilot made an emergency landing to a grassy area near a highway interchange. During the landing, the airplane collided with a vehicle, and then another vehicle struck the airplane.

A postaccident examination of the engine revealed that the oil filter adapter was loose, and no oil was observed inside the engine. The threads on the adapter were worn and damaged. The lock nut on the adapter was not properly torqued, and oil residue was observed on the engine near the adapter and on the underside of the airframe. A large amount of metallic debris was found throughout the entire oil filter element, which is consistent with engine oil starvation. Maintenance personnel replaced the oil and oil filter 4 days before the accident; however, they did not comply with Federal Aviation Administration Airworthiness Directive 96-12-22, which required, in part, inspecting the oil filter and adapter assembly for oil leakage and proper installation of the adapter retaining nut and replacing any oil filter adapter assembly with security problems to prevent loss of engine oil caused by loose or separated oil filter adapters because the loss of oil could result in engine stoppage while in flight and loss of airplane control.

Brief of Accident (Continued)

CEN14LA331  
File No. 33472

06/27/2014

Arlington ,TX

Aircraft Reg No. N8157V

Time (Local): 16:45 CDT

---

Updated at Jan 12 2015 8:58AM

Brief of Accident (Continued)

CEN14LA331  
File No. 33472                      06/27/2014                      Arlington ,TX                      Aircraft Reg No. N8157V                      Time (Local): 16:45 CDT

---

OCCURRENCES

Maneuvering-low-alt flying - Loss of engine power (total)  
Maneuvering-low-alt flying - Off-field or emergency landing

FINDINGS

Aircraft-Fluids/misc hardware-Fluids-Oil-Fluid level - C  
Aircraft-Aircraft power plant-Engine (reciprocating)-Recip eng oil sys-Not serviced/maintained - C  
Personnel issues-Task performance-Maintenance-Replacement-Maintenance personnel - F  
Aircraft-Aircraft handling/service-Maintenance/inspections-Return to service-Not serviced/maintained  
Aircraft-Aircraft handling/service-Maintenance/inspections-Scheduled maint checks-Not serviced/maintained - F  
Aircraft-Aircraft handling/service-Maintenance/inspections-Scheduled maint checks-Inadequate inspection - F

Findings Legend: (C) = Cause, (F) = Factor

---

The National Transportation Safety Board determines the probable cause(s) of this accident as follows:  
The total loss of engine power due to a loose oil filter adapter, which resulted in oil starvation. Contributing to the accident was maintenance personnel's failure to comply with a Federal Aviation Administration airworthiness directive.