



# National Transportation Safety Board Aviation Accident Final Report

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<b>Location:</b>	Augusta, GA	<b>Accident Number:</b>	ATL06CA116
<b>Date &amp; Time:</b>	08/03/2006, 0830 EDT	<b>Registration:</b>	N20965
<b>Aircraft:</b>	Cessna 172M	<b>Aircraft Damage:</b>	Substantial
<b>Defining Event:</b>		<b>Injuries:</b>	1 None

**Flight Conducted Under:** Part 91: General Aviation - Instructional

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## Analysis

The student pilot was observed to start his landing flare at 50 feet above the runway. The airplane made a hard landing. The student pilot stopped the airplane and completed an engine shutdown. The airplane was towed to the parking ramp. Examination of the airplane revealed the engine firewall and cockpit floor was buckled.

## Probable Cause and Findings

The National Transportation Safety Board determines the probable cause(s) of this accident to be: The pilot's improper flare on landing with excessive altitude resulting in a hard landing.

## Findings

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Occurrence #1: HARD LANDING  
Phase of Operation: LANDING - FLARE/TOUCHDOWN

### Findings

1. ALTITUDE - EXCESSIVE - PILOT IN COMMAND
2. (C) FLARE - IMPROPER - PILOT IN COMMAND

## Factual Information

### Student Pilot Information

<b>Certificate:</b>	Student	<b>Age:</b>	25, Male
<b>Airplane Rating(s):</b>	None	<b>Seat Occupied:</b>	Left
<b>Other Aircraft Rating(s):</b>	None	<b>Restraint Used:</b>	Seatbelt, Shoulder harness
<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 Without Waivers/Limitations	<b>Last FAA Medical Exam:</b>	10/01/2005
<b>Occupational Pilot:</b>		<b>Last Flight Review or Equivalent:</b>	
<b>Flight Time:</b>	20 hours (Total, all aircraft), 28 hours (Total, this make and model), 1 hours (Pilot In Command, all aircraft), 20 hours (Last 90 days, all aircraft), 5 hours (Last 30 days, all aircraft)		

### Aircraft and Owner/Operator Information

<b>Aircraft Make:</b>	Cessna	<b>Registration:</b>	N20965
<b>Model/Series:</b>	172M	<b>Aircraft Category:</b>	Airplane
<b>Year of Manufacture:</b>		<b>Amateur Built:</b>	No
<b>Airworthiness Certificate:</b>	Normal	<b>Serial Number:</b>	17263883
<b>Landing Gear Type:</b>	Tricycle	<b>Seats:</b>	4
<b>Date/Type of Last Inspection:</b>	04/01/2006, 100 Hour	<b>Certified Max Gross Wt.:</b>	2300 lbs
<b>Time Since Last Inspection:</b>	62 Hours	<b>Engines:</b>	1 Reciprocating
<b>Airframe Total Time:</b>	8800 Hours at time of accident	<b>Engine Manufacturer:</b>	Lycoming
<b>ELT:</b>	Installed, not activated	<b>Engine Model/Series:</b>	O-320-D2G
<b>Registered Owner:</b>	James P. McMakin	<b>Rated Power:</b>	160 hp
<b>Operator:</b>	Mc Air Aviation Services Inc.	<b>Operating Certificate(s) Held:</b>	None

## Meteorological Information and Flight Plan

Conditions at Accident Site:	Visual Conditions	Condition of Light:	Day
Observation Facility, Elevation:	KAGS, 144 ft msl	Distance from Accident Site:	
Observation Time:	0753 EDT	Direction from Accident Site:	
Lowest Cloud Condition:	Clear	Visibility	3 Miles
Lowest Ceiling:	None	Visibility (RVR):	
Wind Speed/Gusts:	Calm /	Turbulence Type Forecast/Actual:	/
Wind Direction:		Turbulence Severity Forecast/Actual:	/
Altimeter Setting:	30 inches Hg	Temperature/Dew Point:	26 °C / 22 °C
Precipitation and Obscuration:			
Departure Point:	Augusta, GA (KAGS)	Type of Flight Plan Filed:	None
Destination:	(KAGS)	Type of Clearance:	None
Departure Time:	EDT	Type of Airspace:	

## Airport Information

Airport:	Augusta Regional-Bush Field (KAGS)	Runway Surface Type:	Asphalt
Airport Elevation:	144 ft	Runway Surface Condition:	Dry
Runway Used:	17	IFR Approach:	None
Runway Length/Width:	8001 ft / 150 ft	VFR Approach/Landing:	Traffic Pattern

## Wreckage and Impact Information

Crew Injuries:	1 None	Aircraft Damage:	Substantial
Passenger Injuries:	N/A	Aircraft Fire:	None
Ground Injuries:	N/A	Aircraft Explosion:	None
Total Injuries:	1 None	Latitude, Longitude:	33.369722, -81.964444

## Administrative Information

Investigator In Charge (IIC):	Carrol A Smith	Report Date:	12/28/2006
Additional Participating Persons:	Daniel Egy; College Park FSDO-11		
Publish Date:			
Note:	This accident report documents the factual circumstances of this accident as described to the NTSB.		
Investigation Docket:	NTSB accident and incident dockets serve as permanent archival information for the NTSB's investigations. Dockets released prior to June 1, 2009 are publicly available from the NTSB's Record Management Division at <a href="mailto:pubinquiry@ntsb.gov">pubinquiry@ntsb.gov</a> , or at 800-877-6799. Dockets released after this date are available at <a href="http://dms.nts.gov/pubdms/">http://dms.nts.gov/pubdms/</a> .		

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The Independent Safety Board Act, as codified at 49 U.S.C. Section 1154(b), precludes the admission into evidence or use of any part of an NTSB report related to an incident or accident in a civil action for damages resulting from a matter mentioned in the report. A factual report that may be admissible under 49 U.S.C. § 1154(b) is available [here](#).