Aviation Safety Investigation Report 199703792

Cessna Aircraft Company C150

**17 November 1997** 

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NOTE: All air safety occurrences reported to the ATSB are categorised and recorded. For a detailed explanation on Category definitions please refer to the ATSB website at www.atsb.gov.au.

Occurrence Number:	199703792	Occurrence Type: Accident			
Location:	125km ENE Geraldton, Aerodrome				
State:	WA	Inv Category:	4		
Date:	Monday 17 November 1997				
Time:	1030 hours	Time Zone	WST		
Highest Injury Level: None					
Aircraft Manufacturer: Cessna Aircraft Company					
Aircraft Model:	150M		-0 <b>-</b> 0020		
Aircraft Registration:		Serial Number: 1:	5078830		
Type of Operation:	Commercial Aerial Mustering				
Damage to Aircraft:	Substantial				
<b>Departure Point:</b>	Tallering Station WA				
<b>Departure Time:</b>	0530 WST				
Destination:	Tallering Station WA				

**Crew Details:** 

	Hours on		
Role	<b>Class of Licence</b>	Type Hou	rs Total
Pilot-In-Command	Commercial	100.0	800

Approved for Release: Friday, February 13, 1998

The aircraft was being used to muster cattle at Tallering Station. The pilot reported that the aircraft's fuel tanks had been filled the night before the accident. On the morning of the accident, the pilot again checked that the fuel tanks were full.

Having been airborne for approximately 4.75 hours, the pilot flew the aircraft towards the station homestead to refuel. The pilot estimated that there was sufficient fuel to remain airborne for at least a further 45 minutes. However, almost immediately, the aircraft's engine began surging and misfiring. The pilot reported that he completed the appropriate checks and when he pumped the throttle, the engine gave some response for approximately 5 to 10 seconds before it finally stopped.

The pilot reported that he attempted to find a suitable forced landing area but the aircraft impacted trees at approximately 40 kts late on final approach. The pilot was uninjured. Later, approximately 22 L of fuel was drained from the aircraft's left fuel tank but none was found in the right tank.

The aircraft's left and right fuel tanks were vented through a vent line connected to the left fuel tank. The vent line is fitted with a vent valve. However, the right fuel tank also had a vented cap. The subsequent engineering inspection found that the vent line valve had deteriorated and was sticking closed. It is likely that the vent valve had stuck closed at some point during the flight. The right tank probably fed quicker than the left tank due to it venting correctly through the vented cap. When the right tank contents had been exhausted, the low air pressure in the left tank probably created an insufficient head of fuel to feed the engine.

A defect report has been submitted to CASA by the operator's engineering organisation, recommending that both fuel tanks be fitted with vented fuel caps.