

**Aviation Safety Investigation Report
199502031**

**Piper Aircraft Corp
Lance**

02 July 1995

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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.

The Bureau did not conduct an on scene investigation of this occurrence. The information presented below was obtained from information supplied to the Bureau.

Occurrence Number: 199502031 **Occurrence Type:** Accident
Location: Alice Springs, Aerodrome
State: NT **Inv Category:** 4
Date: Sunday 02 July 1995
Time: 1608 hours **Time Zone** CST
Highest Injury Level: None

Aircraft Manufacturer: Piper Aircraft Corp
Aircraft Model: PA-32R-301
Aircraft Registration: VH-SRG **Serial Number:** 32R-8013100
Type of Operation: Non-commercial Pleasure/Travel
Damage to Aircraft: Substantial
Departure Point: Ayers Rock NT
Departure Time: 1316 CST
Destination: Alice Springs NT

Crew Details:

Role	Class of Licence	Hours on Type	Hours Total
Pilot-In-Command	Private	139.0	600

Approved for Release: Thursday, February 22, 1996

Following selection of the landing gear in preparation for a landing at Alice Springs the gear lights indicated that the main gear was locked down but the nose gear was unsafe. A visual inspection confirmed that the nose gear was not fully extended. The pilot attempted, without success, to retract the gear using the normal system and to extend it using the emergency extension system. He was provided with assistance from the airport control tower by an experienced pilot during this process. The pilot eventually landed the aircraft on runway 06 with the nose gear still partly retracted.

During the post-accident inspection the landing gear worked correctly when the normal and emergency systems were tested. Whilst no specific fault was found, landing gear operating times, when using the normal system, were longer than expected indicating a possible defect in the landing gear motor.

The emergency extension system is designed to allow the gear to free-fall into the down position. The nose gear is fitted with springs to help overcome the slipstream effect. The aircraft's manufacturer recommends that the airspeed be reduced to below 92 kts when the emergency extension is to be used to reduce this effect. Information provided by witnesses indicated that the pilot appeared unsure of the landing gear emergency extension procedures and that he attempted to operate it at a speed well in excess of 92 kts. It is possible that the higher airspeed prevented the nose leg from locking into the down position.