

Aviation Safety Investigation Report
198602300

Mooney M20-E

07 January 1986

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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: 198602300
Location: Camden NSW
Date: 07 January 1986
Highest Injury Level: Nil
Injuries:

Occurrence Type: Accident

Time: 1200

	Fatal	Serious	Minor	None
Crew	0	0	1	1
Ground	0	0	0	-
Passenger	0	0	0	3
Total	0	0	0	4

Aircraft Details: Mooney M20-E
Registration: VH-IJN
Serial Number:
Operation Type: Private (Pleasure)
Damage Level: Substantial
Departure Point: Camden NSW
Departure Time: 1200
Destination: Camden NSW

Approved for Release: August 15th 1986

Circumstances:

Approaching the circuit area the pilot selected the landing gear down, but the appropriate gear position light did not illuminate. The pilot then noticed that all electrical systems were inoperative. He subsequently advised that he checked the mechanically operated position indicator, and was satisfied that the gear was down. Witnesses observed the aircraft making a normal approach but then saw the gear collapse shortly after touchdown. Initial investigation revealed that the aircraft battery was fully discharged. The aircraft alternator had failed some time previously, and the battery had been steadily depleted. However, this situation would not have been evident to the pilot, as the ammeter was defective and showed a steady charge at all times. The last part of the gear extension cycle results in a very small movement of the position indicator, and it is considered difficult to assess the precise position of the gear by reference to the indicator. The aircraft handbook warns that a discharged battery may prevent the gear from fully extending by electrical power. The pilot was aware of this warning, but had not employed the emergency lowering procedure to ensure that the gear was locked down.