No: 2/91 **Ref: EW/G90/10/13** **Category: 1c**

Aircraft Type and Registration:	Piper PA-32R-301, G-BIYM
No & Type of Engines:	1 Lycoming IO-540-K1G8D piston engine
Year of Manufacture:	1981
Date and Time (UTC):	26 October 1990 at 1545 hrs
Location:	Doncaster Airfield, South Yorkshire
Type of Flight:	Private
Persons on Board:	Crew - 1 Passengers - 1
Injuries:	Crew - None Passengers - None
Nature of Damage:	Slight damage to wing flap and under-surfaces of fuselage
Commander's Licence:	Private Pilot's Licence with IMC rating
Commander's Age:	47 years
Commander's Total Flying Experience:	540 hours fixed wing (of which 62 were on type)
Information Source:	Aircraft Accident Report Form submitted by the pilot

Approximately 15 minutes from Doncaster, inbound from Liverpool, the pilot heard an exceptionally loud noise which appeared to come over the aircraft speaker, although the noise did not come through on the headset which he was wearing. Shortly before this, the autopilot had started to trip out, but with no associated noise. The pilot then became aware that the aircraft had suffered a total electrical failure, with no charge showing on the ammeter, no warning lights, no radio or navigation equipment functioning and an inoperative electrical trim. All fuses/circuit breakers appeared normal.

The engine was operating normally and the pilot elected to proceed to Doncaster. The landing gear was lowered but no green indication was obtained and the pilot therefore carried out the landing gear emergency lowering procedure. He felt the landing gear lock down and continued his approach to runway 04. However, during the final stages of the landing roll the left landing gear leg slowly collapsed, resulting in slight damage to the left wing, flap, and rear undersurface of the fuselage.

To date, no report on the cause of this electrical failure has been received. When this information becomes available, it will be published. In the light of this incident, the pilot has obtained a portable ICOM Transceiver to permit contact with air traffic control to confirm gear position status by a tower controller, should doubt exist about gear extension during any future landing emergency. The pilot also recommends that, if possible, time should be spent in ensuring that the emergency lowering procedure is carried out completely and correctly, possibly with limited application of 'g' to assist locking, if appropriate.