No:10/88

Ref: EW/G88/05/08

Category: 1c

Aircraft Type and Registration:

Piper PA-28R-201 Arrow, G-BGKV

No & Type of Engines:

1 Lycoming IO-360-C1C6 piston engine

Year of Manufacture:

1977

Date and Time (UTC):

20 May 1988 at 1326 hrs

Location:

Fenland Airfield, Spalding, Lincs

Type of Flight:

Private (pleasure)

Persons on Board:

Crew - 1

Passengers - 1

Injuries:

Crew - None

Passengers - None

Nature of Damage:

Damage to propeller, engine and engine mounts. Airframe damage to

flaps, aerials and step

Commander's Licence

Private Pilot's Licence with IMC and Night Ratings

Commander's Age:

58 years

Commander's Total

Flying Experience:

666 hours (of which 222 were on type)

**Information Source:** 

Aircraft Accident Report Form submitted by the Pilot and further

inquiries

The aircraft was making a take-off on runway 36 at Fenland, the all-grass aerodrome at which the aircraft was based. The pilot states that, as usual, he selected the 'Override' position on the landing gear emergency extension lever. The landing gear retracted and the aircraft immediately sank to the ground, sliding off the side of the runway and coming to a halt on the adjacent taxiway. There was no fire and both occupants were able to leave the aircraft unaided.

The emergency extension lever is a part of the automatic landing gear extension system, a 'safety' feature of the PA-28R Arrow type. Movement of the lever to the 'Override' position simply cancels the automatic extension system: it has no effect on the normal operation of the landing gear, which is controlled by the landing gear selector handle and the safety ('squat') switch.

During the recovery of the aircraft the landing gear was cycled and was found to operate normally, indicating that the landing gear selector handle was, inadvertently, in the UP position during the take-off run. In this situation the landing gear would remain locked down until the safety ('squat') switch sensed a displacement of the oleo towards wing-borne flight: the landing gear would then retract. On a bumpy grass runway this oleo displacement would occur considerably before the aircraft achieved