

No: 1/83

Ref: EW/G82/07/18

Aircraft: Socata Rallye 893A G-GIGI

Year of Manufacture: 1970

Date and time (GMT): 26 July 1982 at 2000 hrs

Location: Private strip at Kirby Bellars, Leicestershire

Type of flight: Private (pleasure)

Persons on board: Crew - 1 Passengers - 3

Injuries: Crew - Nil Passengers - Nil

Nature of damage: Damage to nose gear, propeller, engine firewall, cowlings and floor

Commander's Licence: Private Pilot's Licence with IMC and night ratings

Commander's Age: 50 years

Commander's total flying experience: 224 hours, (including 26 hours on type)

Prior to landing at Kirby Bellars, the aircraft made a refuelling stop at Rhoose, Cardiff. During the landing and subsequent take-off, the pilot noticed that a lot of right rudder was required, which he attributed to the effects of cross wind. Immediately the nose wheel touched on landing at Kirby Bellars, the nose leg became detached, and the aircraft slid to a stop in some 60 yards.. The pilot sought expert metallurgical advice, which concluded that the nose leg became detached as a result of a failure of one of the attachment legs on the firewall. This leg displayed evidence of a pre-existing crack. Furthermore, it was observed that the castoring arm, which provides an anti-shimming function, had considerable rotary play, caused by wear in the hole surface through which the attachment bolt is fitted.

A possible relevant previous occurrence was on 10 July 1982, when the nosewheel axle failed while landing at East Midland Airport. The failure was subsequently identified as fatigue. A replacement axle was eventually obtained and fitted, however, the nose leg attachment lugs were subjected to a visual check only, no crack detection methods being employed.