



CA18/2/3/7885

SOUTH AFRICAN CIVIL AVIATION AUTHORITY

ACCIDENT REPORT – EXECUTIVE SUMMARY

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|---|---|------------------------------|--------------------------|-----------------------------|-------|
| Aircraft Registration | ZS-JPM | Date of Accident | 26 November 2004 | Time of Accident | 1315Z |
| Type of Aircraft | Beech 58 | | Type of Operation | Charter | |
| Pilot-in-command Licence Type | Commercial | Age | 27 | Licence Valid | Yes |
| Pilot-in-command Flying Experience | Total Flying Hours | 1012.6 | Hours on Type | 364.5 | |
| Last point of departure | Phinda Aerodrome (FADQ) | | | | |
| Next point of intended landing | Johannesburg International Aerodrome (FAJS) | | | | |
| Location of the accident site with reference to easily defined geographical points (GPS readings if possible) | | | | | |
| Johannesburg International Aerodrome (FAJS), Runway 03R | | | | | |
| Meteorological Information | According to the pilot fine weather conditions prevailed at the time of the accident. The wind was 330/8 knots the visibility OK. The temperature was 28°C and there were no cloud. | | | | |
| Number of people on board | 1+3 | No. of people injured | 0 | No. of people killed | 0 |
| Synopsis | | | | | |
| <p>On 26 November 2004, the pilot flew a charter flight from Phinda Aerodrome to Johannesburg International Aerodrome, with 3 passengers on-board.</p> <p>During the final approach phase, the pilot noticed that the green undercarriage down-and-locked lights, failed to illuminate. The pilot immediately commenced a go-around and proceeded with two fly-pasts at the ATC tower in order to confirm that the landing gear was extended. After being assured that the landing gear was extended, the pilot repositioned on final approach for Runway 03R and landed the aircraft without utilising the emergency system and without declaring an emergency. Approximately 5m after touch-down the landing gear collapsed.</p> <p>All occupants escaped unharmed, but the aircraft sustained substantial damage to the lower fuselage, both propellers and to the flap during the accident sequence.</p> <p>The pilot was correctly licenced and type rated onto the aircraft and held a valid medical certificate as a commercial pilot.</p> <p>According to available records the aircraft was correctly maintained. The last MPI was certified on 19 October 2004 at 9023.8 airframe hours and the aircraft had accumulated a further 29.9 Airframe hours since the last MPI was certified. The aircraft type was accepted in South Africa in 1975. According to available information, all Service Bulletins and Airworthiness Directives were complied with at the time that the last MPI was certified. The last CAA Oversight / Surveillance at the AMO (Alton Aero Engineering), AMO#: 71, was conducted in August 2004. No significant observations were noted.</p> <p>The aircraft was examined at an approved maintenance facility to determine the reason for the landing gear failure.</p> <p>It was established that the electric motor, driving the landing gear gearbox, functioned correctly during retraction of the landing gear, but failed when the landing gear was extended.</p> <p>The operator was issued with a Part 135 Operating Certificate (N313D) on 19 July 2004 with an expiry date of 13 July 2005. The last CAA Oversight / Surveillance at the operator was conducted in June 2005. No significant findings were noted.</p> | | | | | |
| Probable Cause | | | | | |
| <p>The pilot failed to lower the landing gear with the emergency system after the electric motor driving the landing gear gearbox failed in the down selected mode. The reason for the failure of the electric motor when selecting the landing gear to extend could not be established. The emergency system was in a serviceable condition, but was not used.</p> | | | | | |