

Follow-up Action on Occurrence Report

**ACCIDENT TO CESSNA 208B CARAVAN, G-BZAH, AT NETHERAVON AIRFIELD ON 4 NOVEMBER 2004
(REAR SUPPORT OF THE NOSE LANDING GEAR SPRING FAILED DURING TAXY)**

CAA FACTOR NUMBER : F4/2006
FACTOR PUBLICATION DATE : 10 February 2006
OPERATOR : Private
CAA OCCURRENCE NUMBER : 2004/08146
AAIB REPORT : Bulletin 1/2006

SYNOPSIS

(From AAIB Report)

The aircraft was returned to dispersal after its pilot heard two loud bangs from the area of the nose landing gear whilst taxiing to depart. The rear support of the nose landing gear spring had come away from its fuselage mounting point because one attachment bolt had failed due to bending fatigue and the other three had pulled from their self locking anchor nuts. Long-term fretting between the bolts and the rear support casting was evident and elongation of the bolt holes in the fuselage structure had occurred in a forwards direction, indicating that the nose gear spring had moved forward, possibly whilst the aircraft was being towed over a surface irregularity. Four safety recommendations were made which addressed nose gear maintenance inspections and the control of towing loads.

FOLLOW UP ACTION

The four Safety Recommendations, made by the AAIB following their investigation, are reproduced below, together with the CAA's responses.

Recommendation 2005-102

It is recommended that the Federal Aviation Administration of the USA requires the Cessna Aircraft Company to augment the current routine maintenance procedure for the nose landing gear forward and aft drag link spring supports of the Cessna 208 Caravan aircraft models with a requirement to torque check the attachment bolts.

CAA Response

This Recommendation is not addressed to the CAA.

CAA Status - Closed

Recommendation 2005-103

It is recommended that the Federal Aviation Administration of the USA requires the Cessna Aircraft Company to advise maintainers of Cessna 208 Caravan aircraft to replace the nose landing gear rear spring support attachment bolts if these bolts are found to be loose when torque checked during routine inspection.

CAA Response

This Recommendation is not addressed to the CAA.

CAA Status - Closed

Recommendation 2005-104

It is recommended that the Federal Aviation Administration of the USA requires the Cessna Aircraft Company to establish the maximum towing loads that can be applied to the nose landing gear wheels of Cessna 208 aircraft and to publish suitable towing load limits in the Aircraft Operating and Maintenance Manuals.

CAA Response

This Recommendation is not addressed to the CAA.

CAA Status - Closed

Recommendation 2005-105

It is recommended that the UK Civil Aviation Authority should ensure that all UK aircraft and airport operators utilising powered aircraft towing equipment define and implement towing procedures that ensure the aircraft manufacturer's published towing load limits are not exceeded.

CAA Response

The CAA accepts the recommendation insofar as it concerns advice to the interested parties. The CAA will provide advice to aircraft operators of the need for caution when using any form of towing equipment, including powered aircraft towing equipment and to make sure its usage does not conflict with the aircraft manufacturers published tow instructions and limitations. This advice will be published as an Appendix to Airworthiness Notice No 12, "Experience from incidents" in March 2006, and an article in the General Aviation Safety Information Leaflet (GASIL) in the March 2006 edition. The CAA will also advise Aerodrome Licensees in the February edition of Reference Point. However, the CAA cannot ensure that airport operators, other than those licensed by the CAA, will receive the advice or adopt the appropriate procedures.

CAA Status - Open