# AIRWORTHINESS DIRECTIVE

For the reasons set out in the background section, the CASA delegate whose signature appears below issues the following Airworthiness Directive (AD) under subregulation 39.001(1) of CASR 1998. The AD requires that the action set out in the requirement section (being action that the delegate considers necessary to correct the unsafe condition) be taken in relation to the aircraft or aeronautical product mentioned in the applicability section: (a) in the circumstances mentioned in the requirement section; and (b) in accordance with the instructions set out in the requirement section; and (c) at the time mentioned in the compliance section.

## General Electric Turbine Engines - CF34 Series

## AD/CF34/10 Stage 5 and 6 Low Pressure Turbine Disks 5/2006

Applicability: General Electric Company (GE) CF34-3A1 and -3B1 series turbofan engines with stage 5 low pressure turbine (LPT) disks, part number (P/N) 6078T92P01 or stage 6 LPT disks P/N 6078T89P01, or both, with serial numbers (SNs) listed in Figure 3 or Figure 4 of GE Alert Service Bulletin (ASB) No. CF34-AL S/B 72-A0173, Revision 05, dated 24 May 2005; and

GE CF34-1A, -3A, -3A1, -3A2, and -3B series turbofan engines with stage 5 LPT disks P/N 4922T16P01, 5024T53P01, 5024T53P02, or 6078T92P01 or stage 6 LPT disks P/Ns 4922T17P01, 5023T45P03, 5023T45P04, or 6078T89P01, or both, with SNs listed in Figure 3 or Figure 4 of GE ASB No. CF34-BJ S/B 72-A0148, Revision 02, dated 24 May 2005.

*Note 1: These engines are installed on Bombardier Canadair Models CL-600-2B19 Regional Jet (RJ) aeroplanes, and CL-600-2A12 (CL-601), CL-600-2B16 (CL-601-3A), (CL-601-3R), and (CL- 604) Business Jet (BJ) aeroplanes.*

Requirement: Carry out initial and repetitive inspections and replacement of the Stage 5 and Stage 6 LPT disks as detailed in paragraphs (f) through (s) of FAA AD 2006-04-12.

*Note 2: FAA AD 2006-04-12 provides actions with regard to optional terminating action and definitions with regard to piece part, replacement engine or replacement LPT module.*

*Note 3: FAA AD 2006-04-12 Amdt 39-14494 refers.*

Compliance: As detailed in FAA AD 2006-04-12 with a revised effective date of 11 May 2006.

This Airworthiness Directive becomes effective on 11 May 2006.

## General Electric Turbine Engines - CF34 Series

AD/CF34/10 (continued)

Background: This AD results from the discovery of a population of suspect stage 5 LPT disks and stage 6 LPT disks that could fail due to low-cycle fatigue cracking that may start at the site of an electrical arc-out on the disk. We are issuing this AD to prevent low-cycle-fatigue (LCF) failure of stage 5 LPT disks and stage 6 LPT disks, which could lead to uncontained engine failure.

James Coyne
Delegate of the Civil Aviation Safety Authority

29 March 2006