EASA

AIRWORTHINESS DIRECTIVE



AD No.: 2012-0204

Date: 01 October 2012

Note: This Airworthiness Directive (AD) is issued by EASA, acting in accordance with Regulation (EC) No 216/2008 on behalf of the European Community, its Member States and of the European third countries that participate in the activities of EASA under Article 66 of that Regulation.

This AD is issued in accordance with EU 748/2012, Part 21.A.3B. In accordance with EC 2042/2003 Annex I, Part M.A.301, the continuing airworthiness of an aircraft shall be ensured by accomplishing any applicable ADs. Consequently, no person may operate an aircraft to which an AD applies, except in accordance with the requirements of that AD, unless otherwise specified by the Agency [EC 2042/2003 Annex I, Part M.A.303] or agreed with the Authority of the State of Registry [EC 216/2008, Article 14(4) exemption].

Design Approval Holder's Name:

Type/Model designation(s):

Rolls-Royce Deutschland Ltd & Co KG

Not applicable

Tay 620-15 and Tay 650-15 series engines

TCDS Number: EASA.E.063

Foreign AD:

Supersedure: None

ATA 72	Engine – Low Pressure Compressor Disc Assembly Life Limitation – Implementation
Manufacturer(s):	Rolls-Royce Deutschland Ltd & Co KG (RRD), formerly Rolls-Royce plc
Applicability:	Tay 620-15, Tay 620-15/20, Tay 650-15 and Tay 650-15/10 engines, all serial numbers
	These engines are known to be installed on, but not limited to, Fokker F28 Mark 0070 and F28 Mark 0100 series aeroplanes .
Reason:	The Tay 650-15 and Tay 650-15/10 engine Time Limits Manual Chapter 05-10- 01 contains maximum approved life limitations, identified as Declared Safe Cyclic Life (DSCL) for Low Pressure Compressor (LPC) rotor disc assemblies Part Number (P/N) JR31198A and P/N JR34563A operated to the Plan D Flight Mission, which has been recalculated to a lower value.
	Decreased DSCL of LPC rotor disc assemblies P/N JR31198A and P/N JR34563A may affect these disc assemblies installed in Tay 650-15 and Tay 650-15/10 engines as well as in Tay 620-15 and Tay 620-15/20 engines.
	Failure to take decreased DSCL of affected LPC rotor disc assemblies into account could lead to affected part failure and consequent release of high energy debris potentially resulting in damage to, and/or reduced control of, the aeroplane.
	To address this potential unsafe condition, RRD issued Alert Non-Modification Service Bulletin (NMSB) Tay-72-A1772 to reduce the DSCL from 20 000 engine flight cycles (EFC) to 18 700 EFC and to correct the consumed life of LPC rotor disc assemblies P/N JR31198A and P/N JR34563A which were previously operated in Tay 650-15 or Tay 650-15/10 engines Plan D Flight Mission and are currently installed in Tay 620-15, Tay 620-15/20, Tay 650-15

	or Tay 650-15/10 engines.
	For the reasons described above, this AD requires the implementation of more restrictive life limits for the affected parts.
Effective Date:	15 October 2012
Required Action(s) and Compliance Time(s):	Required as indicated, unless accomplished previously:
	(1) Within 30 days after the effective date of this AD, identify the P/N of LPC rotor disc assembly installed in the engine.
	(2) If, as a result of the identification as required by paragraph (1) of this AD, it is established that an LPC rotor disc assembly P/N JR31198A or P/N JR34563A is installed in an engine, before next flight, for an assembly which was previously operated in a Tay 650-15 or Tay 650-15/10 engine to the Plan D Flight Mission, correct the consumed life based on new DSCL value of 18 700 EFC in accordance with the Time Limits Manual, Chapter 05-10-01, TASK 05-10-01-800-000.
	(3) After the effective date of this AD, to allow operation of an engine to the Plan D Flight Mission, before exceeding 18 700 EFC by the P/N JR31198A or P/N JR34563A LPC rotor disc assembly, replace the affected LPC rotor disc assembly with a serviceable part.
	(4) Compliance with the requirements of paragraphs (2) and (3) of this AD can be demonstrated by:
	(4.1) Revising as follows the approved Aircraft Maintenance Programme (AMP) on the basis of which the operator or the owner ensures the continuing airworthiness of each operated aeroplane:
	Incorporate the applicable airworthiness limitations as specified in RRD Alert NMSB TAY-72-A1772,
	and
	(4.2) Complying with the approved AMP described in paragraph (4.1) of this AD.
Ref. Publications:	RRD Alert NMSB TAY-72-A1772 initial issue, dated 9 August 2012.
	The use of later approved revisions of this document is acceptable for compliance with the requirements of this AD.
Remarks:	 If requested and appropriately substantiated, EASA can approve Alternative Methods of Compliance for this AD.
	 This AD was posted on 21 August 2012 as PAD 12-111 for consultation until 19 September 2012. The Comment Response Document can be found at <u>http://ad.easa.europa.eu</u>.
	 Enquiries regarding this AD should be referred to the Safety Information Section, Executive Directorate, EASA. E-mail: <u>ADs@easa.europa.eu</u>.
	 For any question concerning the technical content of the requirements in this AD, please contact: Rolls-Royce Deutschland Ltd & Co KG Eschenweg 11 – 15827 Dahlewitz – Germany Phone: +49 (0) 33 7086 1768 ; +49 (0) 33 7086 3356.