



Airworthiness Directive

AD No.: 2018-0172

Issued: 07 August 2018

Note: This Airworthiness Directive (AD) is issued by EASA, acting in accordance with Regulation (EC) 216/2008 on behalf of the European Union, 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 Regulation (EU) 748/2012, Part 21.A.3B. In accordance with Regulation (EU) 1321/2014 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 [Regulation (EU) 1321/2014 Annex I, Part M.A.303] or agreed with the Authority of the State of Registry [Regulation (EC) 216/2008, Article 14(4) exemption].

Design Approval Holder's Name:

AIRBUS HELICOPTERS

Type/Model designation(s):

AS 332 and EC 225 helicopters

Effective Date: 21 August 2018

TCDS Number(s): EASA.R.002

Foreign AD: None

Supersedure: This AD supersedes EASA AD 2015-0016 dated 30 January 2015.

ATA 62 – Main Rotor Blade Attachment Pin – Inspection

Manufacturer(s):

Airbus Helicopters (AH), formerly Eurocopter, Eurocopter France, Aerospatiale

Applicability:

AS 332 L2 helicopters, all manufacturer serial numbers (MSN), and

EC 225 LP helicopters, all MSN.

Definitions:

For the purpose of this AD, the following definitions apply:

Affected part: Main Rotor Blade (MRB) Attachment Pin assembly having Part Number (P/N) 332A31-2123-00 (on AS 332 L2) or MRB Attachment Pin P/N 332A31-2115-20 (on AS 332 L2), or MRB Attachment Pin P/N 332A31-3204-20 (on EC225 LP), as applicable.

Serviceable part: An affected part that is new (never installed).

The applicable ASB: AH Alert Service Bulletin (ASB) EC225-05A040 Revision 2 dated 26 June 2018 and ASB AS332-05.00.99 Revision 2 dated 26 June 2018, as applicable.

Groups: Group 1 helicopters are those that have an affected part installed. Group 2 helicopters are those that do not have an affected part installed.



Reason:

Three cases of cracked affected parts were reported. All three pins were installed on the same AS 332 L2 helicopter MRB. Subsequent investigation revealed that the cracking was the result of a combination of factors, among them prevailing the corrosion initiated in the inner diameter area of the pin chamfer.

This condition, if not detected and corrected, could lead to failure of the affected part, resulting in loss of control of the helicopter.

To address this potential unsafe condition, Airbus Helicopters issued ASB AS332-05.00.99 and ASB EC225-05A040 to provide inspection instructions and EASA issued AD 2015-0016 to require accomplishment of those inspections.

After that AD was issued, additional investigation determined the need to introduce measurement of the pin chamfer thickness after removal of the corrosion from an affected part. It was also determined that it is no longer necessary to replace affected parts which were subject to more than four corrosion removals, as previously required by EASA AD 2015-0016. AH re-published the applicable ASB to introduce these changes.

For the reasons described above, this AD partially retains the requirements of EASA AD 2015-0016, which is superseded, introduces conditional measurement of the thickness of the chamfer of the affected part and, depending on findings, accomplishment of applicable corrective action(s).

Required Action(s) and Compliance Time(s):

Required as indicated, unless accomplished previously:

Inspection(s):

- (1) For Group 1 helicopters: Within the compliance time as defined in Table 1 of this AD, as applicable, and, thereafter, at intervals not to exceed the values as specified in Table 1 of this AD, as applicable, inspect each affected part, in accordance with the instructions of paragraph 3.B of the applicable ASB.

Table 1 – Compliance Time and Intervals (see Note 1)

Model	Compliance Time (after 13 February 2015, the effective date of EASA AD 2015-0016)	Intervals (FH or calendar time, whichever occurs first)
AS 332 L2	410 flight hours (FH)	825 FH or 26 months
EC 225 LP	660 FH	1 320 FH or 26 months

Note 1: The FH specified in Table 1 of this AD are those accumulated by an affected part.

Measurement(s):

- (2) Within 150 FH after the latest removal of corrosion from an affected part before the effective date of this AD, as previously required by EASA AD 2015-0016, or within 12 months after the effective date of this AD, whichever occurs later, and, thereafter, within 150 FH after each removal of corrosion in accordance with the instructions of 3.B of the applicable ASB, measure



the thickness of the chamfer of the affected part in accordance with the instructions of paragraph 3.B of the applicable ASB.

Corrective Action(s):

- (3) If, during any inspection, as required by paragraph (1) of this AD, any corrosion is detected, before next flight, remove the corrosion from the affected part in accordance with the instructions of paragraph 3.B of the applicable ASB.
- (4) If, during any inspection as required by paragraph (1) of this AD, any crack is detected, before next flight, replace the affected part with a serviceable part in accordance with instructions of paragraph 3.B of the applicable ASB.
- (5) If, during any measurement as required by paragraph (2) of this AD, reduction of the chamfer thickness is detected that exceeds the limits as defined in the applicable ASB, before next flight, replace the affected part with a serviceable part in accordance with the instructions of 3.B of the applicable ASB.

Credit:

- (6) Inspection(s), and corrective action(s) on a helicopter, accomplished before the effective date of this AD in accordance with the instructions of AH ASB EC225-05A040 at original issue or Revision 1, or ASB AS332-05.00.99 at original issue or Revision 1, as applicable, are acceptable to comply with the initial requirements of paragraphs (1), (2), (3), (4) and (5) of this AD for that helicopter.

Terminating Action:

- (7) None.

Parts Installation:

- (8) For Group 1 and Group 2 helicopters: From the effective date of this AD, installation on a helicopter of an affected part, as applicable to helicopter model, is allowed, provided that the part is a serviceable part and that, following installation, the part is inspected as required by this AD.

Ref. Publications:

Airbus Helicopters ASB EC225-05A040 original issue dated 22 December 2014, or Revision 1 dated 26 April 2018, or Revision 2 dated 26 June 2018.

Airbus Helicopters ASB AS332-05.00.99 dated 22 December 2014, or Revision 1 dated 26 April 2018, or Revision 2 dated 26 June 2018.

The use of later approved revisions of above-mentioned documents is acceptable for compliance with the requirements of this AD.

Remarks:

1. If requested and appropriately substantiated, EASA can approve Alternative Methods of Compliance for this AD.



2. This AD was posted on 29 June 2018 as PAD 18-089 for consultation until 27 July 2018. The Comment Response Document can be found in the [EASA Safety Publications Tool](#), in the compressed (zipped) file attached to the record for this AD.
3. Enquiries regarding this AD should be referred to the EASA Safety Information Section, Certification Directorate. E-mail: ADs@easa.europa.eu.
4. Information about any failures, malfunctions, defects or other occurrences, which may be similar to the unsafe condition addressed by this AD, and which may occur, or have occurred on a product, part or appliance not affected by this AD, can be reported to the [EU aviation safety reporting system](#).
5. For any question concerning the technical content of the requirements in this AD, please contact: Airbus Helicopters (EBSESB) – Aéroport de Marseille Provence 13725 Marignane Cedex, France, Telephone +33 (4) 42 85 97 97; Fax +33 (4) 42 85 99 66; E-mail: Directive.technical-support@airbus.com.

