



[4910-13-P]

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2016-9192; Directorate Identifier 2016-NM-038-AD; Amendment 39-18845; AD 2017-07-07]

RIN 2120-AA64

Airworthiness Directives; Airbus Airplanes

AGENCY: Federal Aviation Administration (FAA), Department of Transportation (DOT).

ACTION: Final rule.

SUMMARY: We are adopting a new airworthiness directive (AD) for certain Airbus Model A330-200, A330-300, A340-200, and A340-300 series airplanes. This AD was prompted by a report of cracking at fastener holes located at a certain frame on the lower shell panel junction. This AD requires repetitive inspections of certain fastener holes, and related investigative and corrective actions if necessary. We are issuing this AD to address the unsafe condition on these products.

DATES: This AD is effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

The Director of the Federal Register approved the incorporation by reference of certain publications listed in this AD as of [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

ADDRESSES: For service information identified in this final rule, contact Airbus SAS, Airworthiness Office – EAL, 1 Rond Point Maurice Bellonte, 31707 Blagnac Cedex, France; telephone +33 5 61 93 36 96; fax +33 5 61 93 45 80; email airworthiness.A330-A340@airbus.com; Internet <http://www.airbus.com>. You may view this referenced service information at the FAA, Transport Airplane Directorate, 1601 Lind Avenue SW., Renton, WA. For information on the availability of this material at the FAA, call 425-227-1221. It is also available on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2016-9192.

Examining the AD Docket

You may examine the AD docket on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2016-9192; or in person at the Docket Management Facility between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this AD, the regulatory evaluation, any comments received, and other information. The street address for the Docket Office (telephone 800-647-5527) is Docket Management Facility, U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE., Washington, DC 20590.

FOR FURTHER INFORMATION CONTACT: Vladimir Ulyanov, Aerospace Engineer, International Branch, ANM-116, Transport Airplane Directorate, FAA, 1601 Lind Avenue SW., Renton, WA 98057-3356; telephone 425-227-1138; fax 425-227-1149.

SUPPLEMENTARY INFORMATION:

Discussion

We issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by adding an AD that would apply to certain Airbus Model A330-200, A330-300, A340-200, and A340-300 series airplanes. The NPRM published in the Federal Register on October 25, 2016 (81 FR 73357) (“the NPRM”). The NPRM was prompted by a report of cracking at fastener holes located at a certain frame on the lower shell panel junction. The NPRM proposed to require repetitive inspections of certain fastener holes, and related investigative and corrective actions if necessary. We are issuing this AD to detect and correct cracking at frame 40 on the lower shell panel junction; such cracking could lead to reduced structural integrity of the fuselage.

The European Aviation Safety Agency (EASA), which is the Technical Agent for the Member States of the European Union, has issued EASA Airworthiness Directive 2014-0136, dated June 13, 2014 (referred to after this as the Mandatory Continuing Airworthiness Information, or “the MCAI”), to correct an unsafe condition for certain Airbus Model A330, A340-200, and A340-300 series airplanes. The MCAI states:

During A330/A340 aeroplanes full scale fatigue test specimen in the FR40-to-fuselage skin panel junction, fatigue damage has been found. Corrective actions consisted of the following actions:

- in-service installation of an internal reinforcing strap on related junction required by DGAC [Direction Générale de l’Aviation Civile (DGAC)] France AD 1999-448-126(B) and [DGAC France] AD 2001-070(B),
- retrofit improvement of internal reinforcing strap fatigue life through recommended Airbus Service Bulletin (SB) A330-53-3145, and

- new design in production through Airbus modification 44360.

The aeroplanes listed in the Applicability section of this [EASA] AD are all aeroplanes post-mod 44360 and pre-mod 55792 (fuselage reinforcement at FR40 in production).

Recently, during embodiment of a FR40 web repair on an A330 aeroplane and during FR40 keel beam fitting replacement on an A340 aeroplane, the internal strap was removed and rototest inspection was performed on several holes.

Cracks were found on both left-hand (LH) and right-hand (RH) sides on internal strap, or butt strap, or keel beam fitting, or forward fitting FR40 flange.

This condition, if not detected and corrected, could lead to crack propagation, possibly resulting in reduced structural integrity of the fuselage.

For the reasons described above, this [EASA] AD requires repetitive rototest inspections of 10 fastener holes located at FR40 lower shell panel junction on both LH and RH sides, and, depending on findings, accomplishment of the applicable corrective actions [which include oversizing, installing fasteners and repair; and accomplishment of applicable related investigative actions, which include a rototest inspection for cracking after oversizing].

The compliance time ranges between 20,000 flight cycles or 65,400 flight hours and 20,800 flight cycles or 68,300 flight hours, depending on airplane utilization and configuration. The repetitive inspection interval ranges between 14,000 flight cycles or 95,200 flight hours and 24,600 flight cycles or 98,700 flight hours, depending on airplane configuration. You may examine the MCAI in the AD docket on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2016-9192.

Comments

We gave the public the opportunity to participate in developing this AD. The following presents the comment received on the NPRM from a single commenter, and the FAA's response to that comment.

Request to Refer to Revised Service Information

Delta Airlines (DAL) requested that we revise paragraphs (g), (g)(1), and (g)(2) of the proposed AD to refer to Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016. DAL also asked that credit be given in paragraph (h)(1) of the proposed AD for previously accomplished actions using Airbus Service Bulletin A330-53-3215, Revision 01, dated April 17, 2014. DAL stated that if the Accomplishment Instructions of Airbus Service Bulletin A330-53-3215, Revision 01, dated April 17, 2014, are used, operators may incorrectly reference kit part numbers in their instructions and would then need to submit a request for approval of an alternative method of compliance for the replaced part.

We agree with the commenter's request to refer to Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016. Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016, has also been issued. No additional work is required by Airbus Service Bulletins A330-53-3215, Revision 02; and A340-53-4215, Revision 02, both dated November 23, 2016; the revised service information merely corrects typographical errors and contains minor editorial changes.

We have revised the Related Service Information under 1 CFR part 51 section of this final rule and paragraphs (g), (g)(1), and (g)(2) of this AD to refer to Airbus Service

Bulletin A330-53-3215, Revision 02, dated November 23, 2016; and Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016. We have also revised paragraph (h)(1) of this AD to provide credit for actions accomplished prior to the effective date of this AD using Airbus Service Bulletin A330-53-3215, Revision 01, dated April 17, 2014; and Airbus Service Bulletin A340-53-4215, Revision 01, dated April 17, 2014.

Conclusion

We reviewed the relevant data, considered the comment received, and determined that air safety and the public interest require adopting this AD with the changes described previously and minor editorial changes. We have determined that these minor changes:

- Are consistent with the intent that was proposed in the NPRM for correcting the unsafe condition; and
- Do not add any additional burden upon the public than was already proposed in the NPRM.

We also determined that these changes will not increase the economic burden on any operator or increase the scope of this AD.

Related Service Information under 1 CFR part 51

We reviewed Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016; and Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016. The service information describes procedures for repetitive rototest inspections of certain fastener holes, and related investigative and corrective actions if necessary. These documents are distinct since they apply to different airplane models.

This service information is reasonably available because the interested parties have access to it through their normal course of business or by the means identified in the ADDRESSES section.

Costs of Compliance

We estimate that this AD affects 41 airplanes of U.S. registry.

We estimate the following costs to comply with this AD:

Estimated costs

| Action | Labor cost | Parts cost | Cost per product | Cost on U.S. operators |
|---------------|---|-------------------|-------------------------|-----------------------------------|
| Inspection | 41 work-hours X \$85 per hour = \$3,485 per inspection cycle | \$0 | \$3,485 | \$142,885 per inspection cycle |

We estimate the following costs to do any necessary repairs that are required based on the results of the required inspection. We have no way of determining the number of aircraft that might need these repairs:

On-condition costs

| Action | Labor cost | Parts cost | Cost per product |
|---------------|---|-------------------|-------------------------|
| Repair | 46 work-hours X \$85 per hour = \$3,910 | \$4,186 | \$8,096 |

Authority for this Rulemaking

Title 49 of the United States Code specifies the FAA’s authority to issue rules on aviation safety. Subtitle I, section 106, describes the authority of the FAA Administrator. “Subtitle VII: Aviation Programs,” describes in more detail the scope of the Agency’s authority.

We are issuing this rulemaking under the authority described in “Subtitle VII, Part A, Subpart III, Section 44701: General requirements.” Under that section, Congress charges the FAA with promoting safe flight of civil aircraft in air commerce by prescribing regulations for practices, methods, and procedures the Administrator finds necessary for safety in air commerce. This regulation is within the scope of that authority because it addresses an unsafe condition that is likely to exist or develop on products identified in this rulemaking action.

Regulatory Findings

We determined that this AD will not have federalism implications under Executive Order 13132. This AD will not have a substantial direct effect on the States, on the relationship between the national government and the States, or on the distribution of power and responsibilities among the various levels of government.

For the reasons discussed above, I certify that this AD:

1. Is not a “significant regulatory action” under Executive Order 12866;
2. Is not a “significant rule” under the DOT Regulatory Policies and Procedures (44 FR 11034, February 26, 1979);
3. Will not affect intrastate aviation in Alaska; and
4. Will not have a significant economic impact, positive or negative, on a substantial number of small entities under the criteria of the Regulatory Flexibility Act.

List of Subjects in 14 CFR Part 39

Air transportation, Aircraft, Aviation safety, Incorporation by reference, Safety.

Adoption of the Amendment

Accordingly, under the authority delegated to me by the Administrator, the FAA amends 14 CFR part 39 as follows:

PART 39 - AIRWORTHINESS DIRECTIVES

1. The authority citation for part 39 continues to read as follows:

Authority: 49 U.S.C. 106(g), 40113, 44701.

§ 39.13 [Amended]

2. The FAA amends § 39.13 by adding the following new airworthiness directive (AD):

2017-07-07 Airbus: Amendment 39-18845; Docket No. FAA-2016-9192; Directorate Identifier 2016-NM-038-AD.

(a) Effective Date

This AD is effective [INSERT DATE 35 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

(b) Affected ADs

None.

(c) Applicability

This AD applies to the airplanes, certificated in any category, identified in paragraphs (c)(1) and (c)(2) of this AD, having serial numbers 0176 through 0915 inclusive.

(1) Airbus Model A330-201, -202, -203, -223, -243, -301, -302, -303, -321, -322, -323, -341, -342, and -343 airplanes.

(2) Airbus Model A340-211, -212, -213, -311, -312, and -313 airplanes.

(d) Subject

Air Transport Association (ATA) of America Code 53, Fuselage.

(e) Reason

This AD was prompted by a report of cracking at fastener holes located at frame (FR) 40 on the lower shell panel junction. We are issuing this AD to detect and correct cracking at FR40 on the lower shell panel junction; such cracking could lead to reduced structural integrity of the fuselage.

(f) Compliance

Comply with this AD within the compliance times specified, unless already done.

(g) Repetitive Inspections and Related Investigative and Corrective Actions

Within the compliance times defined in table 1 to the introductory text of paragraph (g) of this AD, and, thereafter, at intervals not to exceed the compliance times defined in Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016; or Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016; as applicable, depending on airplane utilization and configuration: Accomplish a special detailed inspection of fastener holes located at FR40 lower shell panel junction on both left-hand (LH) and right-side (RH) sides, in accordance with the Accomplishment Instructions of Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016; or Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016; as applicable.

Table 1 to the Introductory Text of Paragraph (g) of this AD – Compliance

Time for Initial Inspection

| | Compliance time (whichever occurs later, A or B) |
|----------|--|
| A | Before exceeding the compliance time “threshold” defined in table 1 of Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016; or Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016; as applicable, depending on airplane utilization and configuration and to be counted from airplane first flight. |
| B | For Model A330 airplanes: Within 2,400 flight cycles or 24 months, whichever occurs first after the effective date of this AD. For Model A340 airplanes: Within 1,300 flight cycles or 24 months, whichever occurs first after the effective date of this AD. |

(1) If, during any inspection required by the introductory text of paragraph (g) of this AD, any crack is detected, before further flight, accomplish all applicable related investigative and corrective actions, in accordance with the Accomplishment Instructions of Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016; or Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016; as applicable, except where Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016; or Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016, specifies to contact Airbus for repair instructions, and specifies that action as “RC” (Required for Compliance), this AD requires repair before further flight using a method approved by the Manager, International Branch, ANM-116, Transport Airplane Directorate, FAA; or the European Aviation Safety Agency (EASA); or Airbus’s EASA Design Organization Approval (DOA).

(2) If, during any inspection required by the introductory text of paragraph (g) of this AD, the hole diameter is not within tolerance of the transition fit as nominal, or first

oversize, or second oversize, or next nominal, as applicable, and Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016; or Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016, specifies to contact Airbus for repair instructions, and specifies that action as “RC” (Required for Compliance), before further flight, repair using a method approved by the Manager, International Branch, ANM-116, Transport Airplane Directorate, FAA; or EASA; or Airbus’s EASA DOA.

(3) Accomplishment of corrective actions, as required by paragraph (g)(1) of this AD, does not constitute terminating action for the repetitive inspections required by the introductory text of paragraph (g) of this AD.

(4) Accomplishment of a repair on an airplane, as required by paragraph (g)(2) of this AD, does not constitute terminating action for the repetitive inspections required by the introductory text of paragraph (g) of this AD for that airplane, unless the method approved by the Manager, International Branch, ANM-116, Transport Airplane Directorate, FAA; or EASA; or Airbus’s EASA DOA indicates otherwise.

(h) Credit for Previous Actions

(1) This paragraph provides credit for inspections required by the introductory text of paragraph (g) of this AD and the related investigative and corrective actions required by paragraph (g)(1) of this AD, if those actions were performed before the effective date of this AD using Airbus Service Bulletin A330-53-3215, dated June 21, 2013; or Revision 01, dated April 17, 2014; or Airbus Service Bulletin A340-53-4215, dated June 21, 2013; or Revision 01, dated April 17, 2014; as applicable.

(2) This paragraph provides credit for the inspections and corrective actions required by paragraph (g) of this AD, if those actions were performed before the effective date of this AD using Airbus Technical Disposition (TD) Reference LR57D11023360, Issue B, dated July 12, 2011.

(i) Other FAA AD Provisions

The following provisions also apply to this AD:

(1) Alternative Methods of Compliance (AMOCs): The Manager, International Branch, ANM-116, Transport Airplane Directorate, FAA, has the authority to approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. In accordance with 14 CFR 39.19, send your request to your principal inspector or local Flight Standards District Office, as appropriate. If sending information directly to the International Branch, send it to ATTN: Vladimir Ulyanov, Aerospace Engineer, International Branch, ANM-116, Transport Airplane Directorate, FAA, 1601 Lind Avenue SW., Renton, WA 98057-3356; telephone 425-227-1138; fax 425-227-1149. Information may be emailed to: 9-ANM-116-AMOC-REQUESTS@faa.gov. Before using any approved AMOC, notify your appropriate principal inspector, or lacking a principal inspector, the manager of the local flight standards district office/certificate holding district office.

(2) Contacting the Manufacturer: For any requirement in this AD to obtain corrective actions from a manufacturer, the action must be accomplished using a method approved by the Manager, International Branch, ANM-116, Transport Airplane

Directorate, FAA; or the EASA; or Airbus's EASA DOA. If approved by the DOA, the approval must include the DOA-authorized signature.

(3) Required for Compliance (RC): Except as required by paragraphs (g)(1) and (g)(2) of this AD: If any service information contains procedures or tests that are identified as RC, those procedures and tests must be done to comply with this AD; any procedures or tests that are not identified as RC are recommended. Those procedures and tests that are not identified as RC may be deviated from using accepted methods in accordance with the operator's maintenance or inspection program without obtaining approval of an AMOC, provided the procedures and tests identified as RC can be done and the airplane can be put back in an airworthy condition. Any substitutions or changes to procedures or tests identified as RC require approval of an AMOC.

(j) Related Information

(1) Refer to Mandatory Continuing Airworthiness Information (MCAI) EASA Airworthiness Directive 2014-0136, dated June 13, 2014, for related information. This MCAI may be found in the AD docket on the Internet at <http://www.regulations.gov> by searching for and locating Docket No. FAA-2016-9192.

(2) Service information identified in this AD that is not incorporated by reference is available at the addresses specified in paragraphs (k)(3) and (k)(4) of this AD.

(k) Material Incorporated by Reference

(1) The Director of the Federal Register approved the incorporation by reference (IBR) of the service information listed in this paragraph under 5 U.S.C. 552(a) and 1 CFR part 51.

(2) You must use this service information as applicable to do the actions required by this AD, unless this AD specifies otherwise.

(i) Airbus Service Bulletin A330-53-3215, Revision 02, dated November 23, 2016.

(ii) Airbus Service Bulletin A340-53-4215, Revision 02, dated November 23, 2016.

(3) For service information identified in this AD, contact Airbus SAS, Airworthiness Office – EAL, 1 Rond Point Maurice Bellonte, 31707 Blagnac Cedex, France; telephone +33 5 61 93 36 96; fax +33 5 61 93 45 80; email airworthiness.A330-A340@airbus.com; Internet <http://www.airbus.com>.

(4) You may view this service information at the FAA, Transport Airplane Directorate, 1601 Lind Avenue SW., Renton, WA. For information on the availability of this material at the FAA, call 425-227-1221.

(5) You may view this service information that is incorporated by reference at the National Archives and Records Administration (NARA). For information on the availability of this material at NARA, call 202-741-6030, or go to:
<http://www.archives.gov/federal-register/cfr/ibr-locations.html>.

Issued in Renton, Washington, on March 28, 2017.

Michael Kaszycki,
Acting Manager,
Transport Airplane Directorate,
Aircraft Certification Service.

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