DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2014-0347; Directorate Identifier 2013-NM-173-AD; Amendment 39-18109; AD 2015-04-07]

RIN 2120-AA64

Airworthiness Directives; The Boeing Company Airplanes

AGENCY: Federal Aviation Administration (FAA), DOT.

ACTION: Final rule.

SUMMARY: We are adopting a new airworthiness directive (AD) for certain The Boeing Company Model 767-200 and -300 series airplanes equipped with Pratt & Whitney Model JT9D or PW4000 engines. This AD was prompted by a report of several cases of low hydraulic pressure or loss of electrical power to the alternating current motor pump (ACMP) on the left engine. This AD requires inspecting for damage of the wiring bundles in the left engine's strut and corrective actions if necessary, and installing new wire support brackets and bundle clamps. We are issuing this AD to detect and correct chafed wire bundles due to rubbing against structure or a hydraulic piping elbow, which could result in electrical arcing in a flammable fluid leakage zone, and provide a possible ignition source for fuel vapors and hydraulic fluids. Ignited fuel vapors or hydraulic fluid in an area without a fire detection or suppression system could result in an uncontained engine strut fire and structural damage to the engine strut.

DATES: This AD is effective April 13, 2015.

The Director of the Federal Register approved the incorporation by reference of certain publications listed in this AD as of April 13, 2015.

ADDRESSES: For service information identified in this AD, contact Boeing Commercial Airplanes, Attention: Data & Services Management, P.O. Box 3707, MC 2H-65, Seattle, WA 98124-2207; telephone 206-544-5000, extension 1; fax 206-766-5680; Internet https://www.myboeingfleet.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-2014-0347.
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-2014-0347; 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 address for the Docket Office (phone: 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: Philip Sheridan, Senior Aerospace Engineer, Systems and Equipment Branch, ANM-130S, FAA, Seattle Aircraft Certification Office, 1601 Lind Avenue SW., Renton, WA 98057-3356; phone: 425-917-6441; fax: 425-917-6590; email: philip.sheridan@faa.gov.

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 The Boeing Company Model 767-200 and -300 series airplanes equipped with Pratt & Whitney Model JT9D or PW4000 engines. The NPRM published in the Federal Register on June 30, 2014 (79 FR 36680). The NPRM was prompted by a report of several cases of low hydraulic pressure or loss of electrical power to the ACMP on the left engine. The NPRM proposed to require inspecting for damage of the wiring bundles in the left engine's strut and corrective actions if necessary, and installing new wire support brackets and bundle clamps. We are issuing this AD to detect and correct chafed wire bundles due to rubbing against structure or a hydraulic piping elbow, which could result in electrical arcing in a flammable fluid leakage zone, and provide a possible ignition source for fuel vapors and hydraulic fluids. Ignited fuel vapors or hydraulic fluid in an area without a fire detection or suppression system could result in an uncontained engine strut fire and structural damage to the engine strut.

Comments

We gave the public the opportunity to participate in developing this AD. The following presents the comments received on the NPRM (79 FR 36680, June 30, 2014) and the FAA's response to each comment.

Request To Include Airplanes Equipped With General Electric Engines

Boeing requested that paragraphs (c), (g), and (h) of the proposed AD (79 FR 36680, June 30, 2014) be revised to include Model 767 airplanes that are equipped with General Electric engines. Boeing stated that the identified unsafe condition for Model 767 airplanes equipped with Pratt & Whitney engines also exists on Model 767 airplanes equipped with General Electric engines. Boeing also noted that it has issued Service Bulletins 767-29A0098 and 767-29A0100 to address the unsafe condition for the airplanes with General Electric Model CF6-80A or CF6-80C2 engines.

We agree that a similar unsafe condition might exist for Model 767 airplanes that are equipped with General Electric engines. We are evaluating the potential for this unsafe condition to exist on those airplanes and might consider further rulemaking for those airplanes. However, while we determine whether further rulemaking is appropriate for those airplanes with General Electric engines, we consider it appropriate to proceed with issuance of this AD for Model 767 airplanes equipped with Pratt & Whitney engines. We have not changed this AD in this regard.
United Airlines stated that it has no issues with the reason for the NPRM (79 FR 36680, June 30, 2014) or the proposed actions. However, United Airlines did have concerns about the clarity of some parts of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013.

- Figure 2 has an illustration that shows four wire bundles, but Step 1 of the figure only specifies three wire bundles to inspect. Another figure, Figure 3, also has the same illustration that shows four wire bundles, but Step 1 of Figure 3 specifies four wire bundles to inspect. It is unclear if the illustration or the Step 1 is incorrect.

- Step 1 in Figure 4 specifies removing two Hi-Loks and a bracket; then the Hi-Loks are re-installed in Step 4, which seems to indicate the bracket should be discarded. However, Figure 4 does not specify what to do with that bracket, which means it is not clear what the new Hi-loks would be retaining or if the other bracket that is apparently attached to the bulkhead web remains.

- Steps 2 and 3 of Figure 4 each specify to remove four bolts, but a note for Step 3 states "do not remove valve mounting brackets." It seems the mounting brackets will fall free at that time and, if that is the case, the note should say "retain brackets for reuse."

Figure 4 does not specify "remove and discard" for certain parts that are not re-used, especially those parts that are duplicated in the new parts kit.

We agree that Figure 4 of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013, could be improved for clarity. However, Figure 4 of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013, was referenced by a step in the Accomplishment Instructions that was not labeled "RC" (required for compliance) and may be deviated from as specified in paragraph (j)(4) of this AD. We revised paragraph (j)(4) of this AD to specify that steps that are not marked "RC" may be deviated from using accepted methods in accordance with the operator's maintenance or inspection program without obtaining approval of an alternative method of compliance (AMOC), provided the "RC"-marked steps can still be done and the airplane can be put back in a serviceable condition.

Figure 3 of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013, is correct.

Figure 2 of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013, was identified in a step labeled "RC" in the Accomplishment Instructions as a figure that must be done to comply with this AD. We agree that the illustration for Figure 2 is misleading with regard to the number of wire bundles that must be inspected. However, the title of Figure 2 clearly indicates the correct wire bundle numbers (three) and wire bundle identification (W290, W390, and W398) to inspect, and the number of wire bundles specified in Step 1 of the figure is also correct.

FAA Advisory Circular (AC) 20-176A, "Service Bulletins Related to Airworthiness Directives and Indicating FAA Approval on Service Documents," dated June 16, 2014 (http://rgl.faa.gov/Regulatory_and_Guidance_Library/rgAdvisoryCircular.nsf/0/979dd1d1479e1ec6f86257cfc0052d4e9/$FILE/AC%2020-176A.PDF), states that "To avoid subjective misinterpretation, the text in the accomplishment instructions must be the authoritative information." Therefore, we regard the text in Figure 2 to be more authoritative than the illustration for Figure 2.

To clarify this information, we added a new Note 1 to paragraph (g) of this AD and renumbered a subsequent note accordingly. Note 1 to paragraph (g) of this AD clarifies that the illustration in Figure 2 of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013, shows four wire bundles, but the text in Figure 2 correctly identifies three wire bundles to be inspected. Following the text in Figure 2 will result in accomplishment of the appropriate actions; no approval of an alternative method of compliance (AMOC) is needed to address this issue. We conclude that this will enable operators to successfully incorporate the service information.
Effect of Winglets on Accomplishment of the Proposed Actions

Aviation Partners Boeing stated that the installation of winglets per Supplemental Type Certificate (STC) ST01920SE (http://rgl.faa.gov/Regulatory_and_Guidance_Library/rgstc.nsf/0/59027F43B9A7486E86257B1D006591EE?OpenDocument&Highlight=st01920se) does not affect the accomplishment of the manufacturer's service instructions.

Conclusion

We reviewed the relevant data, considered the comments received, and determined that air safety and the public interest require adopting this AD as proposed except for minor editorial changes. We have determined that these minor changes:

- Are consistent with the intent that was proposed in the NPRM (79 FR 36680, June 30, 2014) for correcting the unsafe condition; and
- Do not add any additional burden upon the public than was already proposed in the NPRM (79 FR 36680, June 30, 2014).

Related Service Information Under 1 CFR Part 51

We reviewed Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013. The service information describes procedures for inspection of wire bundles and replacement of wire support bracket in the left engine strut. This service information is reasonably available; see ADDRESSES for ways to access this service information.

Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013, specifies concurrent or prior accomplishment of Boeing Service Bulletin 767-29-0057, Revision 3, dated June 9, 2011, for modification of certain wire bundles. Boeing Service Bulletin 767-29-0057, Revision 3, dated June 9, 2011, describes procedures for modifying certain wire bundles. This service information is reasonably available; see ADDRESSES for ways to access this service information.

Costs of Compliance

We estimate that this AD affects 126 airplanes of U.S. registry.

We estimate the following costs to comply with this AD:

<table>
<thead>
<tr>
<th>Estimated Costs</th>
<th>Labor cost</th>
<th>Parts cost</th>
<th>Cost per product</th>
<th>Cost on U.S. operators</th>
</tr>
</thead>
<tbody>
<tr>
<td>Inspection and installation</td>
<td>13 work-hours × $85 per hour = $1,105</td>
<td>$349</td>
<td>$1,454</td>
<td>$183,204</td>
</tr>
</tbody>
</table>

We have received no definitive data that would enable us to provide cost estimates for the on-condition actions specified in this AD.

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

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 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):

(a) Effective Date

This AD is effective April 13, 2015.

(b) Affected ADs

None.

(c) Applicability

This AD applies to The Boeing Company Model 767-200 and -300 series airplanes, certificated in any category, equipped with Pratt & Whitney Model JT9D or PW4000 engines, as identified in Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013.

(d) Subject

Air Transport Association (ATA) of America Code 29, Hydraulic Power.

(e) Unsafe Condition

This AD was prompted by a report of several cases of low hydraulic pressure or loss of electrical power to the alternating current motor pump (ACMP) on the left engine. We are issuing this AD to detect and correct chafed wire bundles due to rubbing against structure or a hydraulic piping elbow, which could result in electrical arcing in a flammable fluid leakage zone, and provide a possible ignition source for fuel vapors and hydraulic fluids. Ignited fuel vapors or hydraulic fluid in an area without a fire detection or suppression system could result in an uncontained engine strut fire and structural damage to the engine strut.

(f) Compliance

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

(g) Inspection and Corrective Actions

Within 48 months after the effective date of this AD, do a detailed inspection for damage of the wiring bundles in the left engine's strut, and all applicable corrective actions; and install new wire support brackets and bundle clamps; in accordance with the Accomplishment Instructions of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013. Do all applicable corrective actions before further flight.

Note 1 to paragraph (g) of this AD: The illustration in Figure 2 of Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013, shows four wire bundles, but the text in Figure 2 correctly
identifies three wire bundles to be inspected. Following the text in Figure 2 will result in accomplishment of the appropriate actions; no approval of an alternative method of compliance (AMOC) is needed to address this issue.

(h) Prior or Concurrent Action

For airplanes identified as Group 1 airplanes in Boeing Alert Service Bulletin 767-29A0115, dated May 22, 2013: Prior to or concurrently with doing the actions required by paragraph (g) of this AD, do a modification of the wire bundles, in accordance with the Accomplishment Instructions of Boeing Service Bulletin 767-29-0057, Revision 3, dated June 9, 2011.

Note 2 to paragraph (h) of this AD: For certain airplanes, paragraph (b) of AD 2004-16-12, Amendment 39-13768 (69 FR 51002, August 17, 2004), references Boeing Service Bulletin 767-29-0057, dated December 16, 1993; and Boeing Service Bulletin 767-29-0057, Revision 1, dated August 14, 2003; as concurrent requirements.

(i) Credit for Previous Actions

This paragraph provides credit for the actions specified in paragraph (h) of this AD, if those actions were performed before the effective date of this AD using any of the service information identified in paragraphs (i)(1), (i)(2), and (i)(3) of this AD.


(2) Boeing Service Bulletin 767-29-0057, Revision 1, dated August 14, 2003, which was incorporated by reference in AD 2004-16-12, Amendment 39-13768 (69 FR 51002, August 17, 2004).

(3) Boeing Service Bulletin 767-29-0057, Revision 2, dated September 24, 2009, which is not incorporated by reference in this AD.

(j) Alternative Methods of Compliance (AMOCs)

(1) The Manager, Seattle Aircraft Certification Office (ACO), 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 manager of the ACO, send it to the attention of the person identified in paragraph (k) of this AD. Information may be emailed to: 9-ANM-Seattle-ACO-AMOC-Requests@faa.gov.

(2) 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.

(3) An AMOC that provides an acceptable level of safety may be used for any repair required by this AD if it is approved by the Boeing Commercial Airplanes Organization Designation Authorization (ODA) that has been authorized by the Manager, Seattle ACO, to make those findings. For a repair method to be approved, the repair must meet the certification basis of the airplane, and the approval must specifically refer to this AD.

(4) If the service information contains steps that are labeled as RC (Required for Compliance), those steps must be done to comply with this AD; any steps that are not labeled as RC are recommended. Those steps that are not labeled 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 steps labeled as RC can be done and the airplane can be put back in a serviceable condition. Any substitutions or changes to steps labeled as RC require approval of an AMOC.
(k) Related Information

(1) For more information about this AD, contact Philip Sheridan, Senior Aerospace Engineer, Systems and Equipment Branch, ANM-130S, FAA, Seattle Aircraft Certification Office, 1601 Lind Avenue SW., Renton, WA 98057-3356; phone: 425-917-6441; fax: 425-917-6590; email: philip.sheridan@faa.gov.

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

(l) 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 the AD specifies otherwise.


(3) For service information identified in this AD, contact Boeing Commercial Airplanes, Attention: Data & Services Management, P.O. Box 3707, MC 2H-65, Seattle, WA 98124-2207; telephone 206-544-5000, extension 1; fax 206-766-5680; Internet https://www.myboeingfleet.com.

(4) You may view this service information at 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 February 19, 2015.
Jeffrey E. Duven,
Manager, Transport Airplane Directorate,
Aircraft Certification Service.