

[Federal Register: March 26, 2009 (Volume 74, Number 57)]
[Rules and Regulations]
[Page 13089-13092]
From the Federal Register Online via GPO Access [wais.access.gpo.gov]
[DOCID:fr26mr09-7]

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2008-0888; Directorate Identifier 2008-NM-084-AD; Amendment 39-15840; AD 2009-06-04]

RIN 2120-AA64

Airworthiness Directives; Bombardier Model CL-600-2B19 (Regional Jet Series 100 & 440) Airplanes

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

ACTION: Final rule.

SUMMARY: We are adopting a new airworthiness directive (AD) for the products listed above. This AD results from mandatory continuing airworthiness information (MCAI) originated by an aviation authority of another country to identify and correct an unsafe condition on an aviation product. The MCAI describes the unsafe condition as:

Bombardier Aerospace has completed a system safety review of the CL-600-2B19 aircraft fuel system against new fuel tank safety standards * * *.

This assessment showed that there is insufficient electrical bonding for lightning protection at certain locations inside the fuel tanks. In addition, the assessment also revealed that existing bonding jumpers across self-bonded couplings are not required. Insufficient electrical bonding, if not corrected, could result in arcing and potential ignition source inside the fuel tank during lightning strikes and consequent fuel tank explosion.

We are issuing this AD to require actions to correct the unsafe condition on these products.

DATES: This AD becomes effective April 30, 2009.

The Director of the Federal Register approved the incorporation by reference of a certain publication listed in this AD as of April 30, 2009.

ADDRESSES: You may examine the AD docket on the Internet at <http://www.regulations.gov> or in person at the U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue, SE., Washington, DC.

FOR FURTHER INFORMATION CONTACT: Mazdak Hobbi, Aerospace Engineer, Airframe and Propulsion Branch, ANE-171, FAA, New York Aircraft Certification Office, 1600 Stewart Avenue, Suite 410, Westbury, New York 11590; telephone (516) 228-7330; fax (516) 794-5531.

SUPPLEMENTARY INFORMATION:

Discussion

We issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 to include an AD that would apply to the specified products. That NPRM was published in the Federal Register on August 19, 2008 (73 FR 48312). That NPRM proposed to correct an unsafe condition for the specified products. The MCAI states:

Bombardier Aerospace has completed a system safety review of the CL-600-2B19 aircraft fuel system against new fuel tank safety standards, introduced in Chapter 525 of the Airworthiness Manual through Notice of Proposed Amendment (NPA) 2002-043. The identified non-compliances were assessed using Transport Canada Policy Letter No. 525-001 to determine if mandatory corrective action is required.

This assessment showed that there is insufficient electrical bonding for lightning protection at certain locations inside the fuel tanks. In addition, the assessment also revealed that existing bonding jumpers across self-bonded couplings are not required. Insufficient electrical bonding, if not corrected, could result in arcing and potential ignition source inside the fuel tank during lightning strikes and consequent fuel tank explosion.

To correct the unsafe condition, this directive mandates the modification of certain bonding jumpers inside the fuel tanks.

Corrective actions include, for certain airplanes, a general visual inspection to determine if the modification has been done on both sides of the airplane. You may obtain further information by examining the MCAI in the AD docket.

Revision to Service Bulletin Information

Since the NPRM was issued, we have received Revision F of Bombardier Service Bulletin 601R-28-055, dated May 27, 2008. We referred to Bombardier Service Bulletin 601R-28-055, Revision E, dated March 17, 2008, as the appropriate source of service information for accomplishing the actions proposed in the NPRM. Revision F of Bombardier Service Bulletin 601R-28-055 changes Figure 7 in the Accomplishment Instructions and also includes small editorial changes that do not affect the technical content of the service bulletin. We have revised paragraphs (f)(1) and (f)(2) of this AD to refer to Revision F of Bombardier Service Bulletin 601R-28-055, and we have added paragraph (f)(3) of this AD to give credit for actions done before the effective date of this AD in accordance with Revision E of Bombardier Service Bulletin 601R-28-055.

Comments

We gave the public the opportunity to participate in developing this AD. We considered the comments received.

Request To Revise the Costs of Compliance Section

Air Wisconsin states that the service information does not discuss warranty consideration for parts needed to do the modification proposed in the NPRM, and requests that we amend the Costs of Compliance section of the NPRM to reflect the cost of kits at \$427 per airplane.

We agree to revise the Costs of Compliance section to reflect the parts cost. The cost per product and fleet cost have increased accordingly.

Request To Allow Credit for Prior Service Bulletin Revision

Air Wisconsin states that Revision D of Bombardier Service Bulletin 601R-28-055, dated July 17, 2006, added a statement to modify both sides of the airplane, and requests that we revise the NPRM to give credit for actions performed according to Revision D of the service bulletin. Air Wisconsin notes that Canadian Airworthiness Directive CF-2007-34 allows compliance with Bombardier Service Bulletin 601R-28-055, Revision D.

We agree with Air Wisconsin to give credit for Revision D of Bombardier Service Bulletin 601R-28-055, and have revised paragraph (f)(3) of this AD accordingly. We have also revised Table 1 of this AD to remove the restriction on Revision D of Bombardier Service Bulletin 601R-28-055. In addition, we have removed Note (1) from the NPRM and therefore Note (2) of the NPRM becomes Note 1 of this AD. Note (2) is also revised to remove the difference for Revision D of Bombardier Service Bulletin 601R-28-055.

Conclusion

We reviewed the available data, including the comments received, and determined that air safety and the public interest require adopting the AD with the changes described previously. We determined that these changes will not increase the economic burden on any operator or increase the scope of the AD.

Differences Between This AD and the MCAI or Service Information

We have reviewed the MCAI and related service information and, in general, agree with their substance. But we might have found it necessary to use different words from those in the MCAI to ensure the AD is clear for U.S. operators and is enforceable. In making these changes, we do not intend to differ substantively from the information provided in the MCAI and related service information.

We might also have required different actions in this AD from those in the MCAI in order to follow our FAA policies. Any such differences are highlighted in a NOTE within the AD.

Costs of Compliance

We estimate that this AD will affect about 686 products of U.S. registry. We also estimate that it will take about 18 work-hours per product to comply with the basic requirements of this AD. The average labor rate is \$80 per work-hour. Required parts will cost about \$427 per product. Where the service information lists required parts costs that are covered under warranty, we have assumed that there will be no charge for these parts. As we do not control warranty coverage for affected parties,

some parties may incur costs higher than estimated here. Based on these figures, we estimate the cost of this AD to the U.S. operators to be \$1,280,762, or \$1,867 per product.

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 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); and
3. 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.

We prepared a regulatory evaluation of the estimated costs to comply with this AD and placed it in the AD docket.

Examining the AD Docket

You may examine the AD docket on the Internet at <http://www.regulations.gov>; or in person at the Docket Operations office between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains the NPRM, the regulatory evaluation, any comments received, and other information. The street address for the Docket Operations office (telephone (800) 647-5527) is in the ADDRESSES section. Comments will be available in the AD docket shortly after receipt.

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 AD:



2009-06-04 Bombardier, Inc. (Formerly Canadair): Amendment 39-15840. Docket No. FAA-2008-0888; Directorate Identifier 2008-NM-084-AD.

Effective Date

- (a) This airworthiness directive (AD) becomes effective April 30, 2009.

Affected ADs

- (b) None.

Applicability

- (c) This AD applies to Bombardier Model CL-600-2B19 (Regional Jet Series 100 & 440) airplanes, serial numbers 7003 through 7067, and 7069 through 7929, certificated in any category.

Subject

- (d) Air Transport Association (ATA) of America Code 28: Fuel.

Reason

- (e) The mandatory continuing airworthiness information (MCAI) states:

Bombardier Aerospace has completed a system safety review of the CL-600-2B19 aircraft fuel system against new fuel tank safety standards, introduced in Chapter 525 of the Airworthiness Manual through Notice of Proposed Amendment (NPA) 2002-043. The identified non-compliances were assessed using Transport Canada Policy Letter No. 525-001 to determine if mandatory corrective action is required.

This assessment showed that there is insufficient electrical bonding for lightning protection at certain locations inside the fuel tanks. In addition, the assessment also revealed that existing bonding jumpers across self-bonded couplings are not required. Insufficient electrical bonding, if not corrected, could result in arcing and potential ignition source inside the fuel tank during lightning strikes and consequent fuel tank explosion.

To correct the unsafe condition, this directive mandates the modification of certain bonding jumpers inside the fuel tanks.

Corrective actions include, for certain airplanes, a general visual inspection to determine if the modification has been done on both sides of the airplane.

Actions and Compliance

(f) Unless already done: Within 5,000 flight hours after the effective date of this AD, do the following actions.

(1) For airplanes on which none of the Bombardier service bulletins identified in Table 1 of this AD have been incorporated as of the effective date of this AD: Modify the fuel tank bonding jumpers inside the wing and center fuel tanks in accordance with Part A of the Accomplishment Instructions of Bombardier Service Bulletin 601R-28-055, Revision F, dated May 27, 2008.

Table 1 – Service Bulletins

Bombardier Service Bulletin –	Revision –	Dated –
601R-28-055	Original	May 4, 2004
601R-28-055	A	February 14, 2005
601R-28-055	B	September 14, 2005
601R-28-055	C	January 9, 2006

(2) For airplanes on which any Bombardier service bulletin identified in Table 1 of this AD has been incorporated as of the effective date of this AD: Do a general visual inspection of the inside of the wing and center fuel tanks to determine if the actions in Part A of the Accomplishment Instructions of Bombardier Service Bulletin 601R-28-055, Revision F, dated May 27, 2008, have been done on both sides of the airplane. If Part A of Bombardier Service Bulletin 601R-28-055, Revision F, dated May 27, 2008, has not been done on either side of the airplane, before further flight, do the actions specified in Part A of the Accomplishment Instructions of Bombardier Service Bulletin 601R-28-055, Revision F, dated May 27, 2008; for the side of the airplane on which Part A of Bombardier Service Bulletin 601R-28-055, Revision F, dated May 27, 2008, has not been done.

(3) Actions done before the effective date of this AD in accordance with Bombardier Service Bulletin 601R-28-055, Revision D, dated July 17, 2006; or Bombardier Service Bulletin 601R-28-055, Revision E, dated March 17, 2008; is acceptable for compliance with the corresponding requirements of this AD.

FAA AD Differences

Note 1: This AD differs from the MCAI and/or service information as follows:

The MCAI specifies that the modification must be done on all airplanes in accordance with Bombardier Service Bulletin 601R-28-055, Revision D, dated July 17, 2006, and that accomplishing Bombardier Service Bulletin 601R-28-055, dated May 4, 2004; Bombardier Service Bulletin 601R-28-055, Revision A, dated February 14, 2005; or Bombardier Service Bulletin 601R-28-055, Revision B, dated September 14, 2005; does not satisfy the requirements of the MCAI. This AD requires doing the modification on airplanes on which any Bombardier service bulletin identified in Table 1 of this AD, has not been done. For airplanes on which any Bombardier service bulletin identified in Table 1 of this AD has been done, this AD requires inspecting to determine if the modification is done on both sides of the airplane and modifying the airplane if the modification was not done on both sides.

Other FAA AD Provisions

(g) The following provisions also apply to this AD:

(1) Alternative Methods of Compliance (AMOCs): The Manager, New York Aircraft Certification Office, FAA, has the authority to approve AMOCs for this AD, if requested using the

procedures found in 14 CFR 39.19. Send information to ATTN: Mazdak Hobbi, Aerospace Engineer, Airframe and Propulsion Branch, ANE-171, FAA, New York Aircraft Certification Office, 1600 Stewart Avenue, Suite 410, Westbury, New York 11590; telephone (516) 228-7330; fax (516) 794-5531. Before using any approved AMOC on any airplane to which the AMOC applies, notify your appropriate principal inspector (PI) in the FAA Flight Standards District Office (FSDO), or lacking a PI, your local FSDO.

(2) Airworthy Product: For any requirement in this AD to obtain corrective actions from a manufacturer or other source, use these actions if they are FAA-approved. Corrective actions are considered FAA-approved if they are approved by the State of Design Authority (or their delegated agent). You are required to assure the product is airworthy before it is returned to service.

(3) Reporting Requirements: For any reporting requirement in this AD, under the provisions of the Paperwork Reduction Act, the Office of Management and Budget (OMB) has approved the information collection requirements and has assigned OMB Control Number 2120-0056.

Related Information

(h) Refer to MCAI Canadian Airworthiness Directive CF-2007-34, dated December 21, 2007; and Bombardier Service Bulletin 601R-28-055, Revision F, dated May 27, 2008; for related information.

Material Incorporated by Reference

(i) You must use Bombardier Service Bulletin 601R-28-055, Revision F, dated May 27, 2008, to do the actions required by this AD, unless the AD specifies otherwise.

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

(2) For service information identified in this AD, contact Bombardier, Inc., 400 Côte-Vertu Road West, Dorval, Québec H4S 1Y9, Canada; telephone 514-855-5000; fax 514-855-7401; e-mail thd.crj@aero.bombardier.com; Internet <http://www.bombardier.com>.

(3) You may review copies of the service information at the FAA, Transport Airplane Directorate, 1601 Lind Avenue, SW., Renton, Washington. For information on the availability of this material at the FAA, call 425-227-1221 or 425-227-1152.

(4) You may also review copies of the 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/code_of_federal_regulations/ibr_locations.html.

Issued in Renton, Washington, on February 27, 2009.

Ali Bahrami,
Manager, Transport Airplane Directorate,
Aircraft Certification Service.