



[4910-13-P]

## DEPARTMENT OF TRANSPORTATION

### Federal Aviation Administration

#### 14 CFR Part 39

[Docket No. FAA-2012-0592; Directorate Identifier 2011-NM-253-AD]

RIN 2120-AA64

**Airworthiness Directives; Bombardier, Inc. Airplanes**

**AGENCY:** Federal Aviation Administration (FAA), DOT.

**ACTION:** Notice of proposed rulemaking (NPRM).

**SUMMARY:** We propose to supersede an existing airworthiness directive (AD) that applies to certain Bombardier, Inc. Model CL-600-2B19 (Regional Jet Series 100 & 440) airplanes. The existing AD currently requires a one-time inspection of the shafts of the main landing gear (MLG) side-brace fittings to detect corrosion, and the forward and aft bushings in the left-hand and right-hand MLG side-brace fittings to detect discrepancies. The existing AD also requires corrective and related actions if necessary. Since we issued that AD, we have received reports that the side brace fitting shafts of the MLG continue to fail. This proposed AD would require repetitive detailed inspections for corrosion and damage of the MLG side-brace fitting and replacing the side-brace fitting shaft with the re-designed side-brace fitting shaft of the MLG if necessary. This AD would also require eventual replacement of certain side-brace fitting shafts with the re-designed part. Replacement with a re-designed side-brace fitting shaft of the MLG is terminating action for the repetitive inspections. We are proposing this AD to prevent fractures of the side-brace fitting shafts of the MLG, and possible collapse of the MLG.

**DATES:** We must receive comments on this proposed AD by [INSERT DATE 45 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

**ADDRESSES:** You may send comments by any of the following methods:

- Federal eRulemaking Portal: Go to <http://www.regulations.gov>. Follow the instructions for submitting comments.
- Fax: (202) 493-2251.
- Mail: U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE., Washington, DC 20590.
- Hand Delivery: U.S. Department of Transportation, Docket Operations, M-30, West Building Ground Floor, Room W12-140, 1200 New Jersey Avenue SE., Washington, DC, between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays.

For service information identified in this proposed 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](mailto:thd.crj@aero.bombardier.com); Internet <http://www.bombardier.com>. You may review copies of the referenced 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.

## **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 this proposed AD, 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.

**FOR FURTHER INFORMATION CONTACT:** Jeffrey Zimmer, Aerospace Engineer, Airframe and Mechanical Systems Branch, ANE-171, FAA, New York Aircraft Certification Office, 1600 Stewart Avenue, Suite 410, Westbury, New York 11590; telephone (516) 228-7306; fax (516) 794-5531.

## **SUPPLEMENTARY INFORMATION:**

### **Comments Invited**

We invite you to send any written relevant data, views, or arguments about this proposed AD. Send your comments to an address listed under the ADDRESSES section. Include “Docket No. FAA-2012-0592; Directorate Identifier 2011-NM-253-AD” at the beginning of your comments. We specifically invite comments on the overall regulatory, economic, environmental, and energy aspects of this proposed AD. We will consider all comments received by the closing date and may amend this proposed AD based on those comments.

We will post all comments we receive, without change, to <http://www.regulations.gov>, including any personal information you provide. We will

also post a report summarizing each substantive verbal contact we receive about this proposed AD.

### **Discussion**

On October 20, 2004, we issued AD 2004-22-23, Amendment 39-13851 (69 FR 64856, November 9, 2004). That AD required actions intended to address an unsafe condition on Bombardier, Inc. Model CL-600-2B19 (Regional Jet Series 100 & 440) airplanes.

Since we issued AD 2004-22-23, Amendment 39-13851 (69 FR 64856, November 9, 2004), we received reports that the side-brace fitting shaft of the MLG continued to fail which meant the existing AD did not adequately address the unsafe condition. Transport Canada Civil Aviation (TCCA), which is the aviation authority for Canada, has issued Canadian Airworthiness Directive CF-2011-39, dated October 25, 2011 (referred to after this as “the MCAI”), to correct an unsafe condition for the specified products. The MCAI states:

Due to the failure of the main landing gear (MLG) side brace fitting shaft, caused by corrosion, [TCCA] Airworthiness Directive (AD) CF-2002-41 was issued to require inspection and if needed, parts replacement. However, the existing MLG side-brace fitting shafts continued to fail. Failure of the MLG side brace fitting shaft could result in the collapse of the main landing gear.

This [TCCA] directive mandates the repetitive detailed visual inspection [for cracking and corrosion] of the MLG side brace fitting and the incorporation of the re-designed MLG side brace fitting shaft part number (P/N) 605R10247-3 as the terminating action.

You may obtain further information by examining the MCAI in the AD docket.

### **Relevant Service Information**

Bombardier has issued Service Bulletin 601R-57-052, dated July 28, 2011. The actions described in this service information are intended to correct the unsafe condition identified in the MCAI.

### **FAA's Determination and Requirements of This Proposed AD**

This product has been approved by the aviation authority of another country, and is approved for operation in the United States. Pursuant to our bilateral agreement with the State of Design Authority, we have been notified of the unsafe condition described in the MCAI and service information referenced above. We are proposing this AD because we evaluated all pertinent information and determined an unsafe condition exists and is likely to exist or develop on other products of the same type design.

### **Costs of Compliance**

Based on the service information, we estimate that this proposed AD would affect about 584 products of U.S. registry. We estimate that it would take about 10 work-hours per product to comply with the new basic requirements of this proposed AD. The average labor rate is \$85 per work-hour. Required parts would cost about \$0 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 the proposed AD on U.S. operators to be \$496,400, or \$850 per product.

In addition, we estimate that any necessary follow-on actions would take about 14 work-hours and require parts costing \$3,860, for a cost of \$5,050 per product. We have no way of determining the number of products that may need these actions.

### **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 proposed AD would not have federalism implications under Executive Order 13132. This proposed AD would 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 proposed regulation:

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.

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

**List of Subjects in 14 CFR Part 39**

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

**The Proposed Amendment**

Accordingly, under the authority delegated to me by the Administrator, the FAA proposes to amend 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 removing airworthiness directive (AD) 2004-22-23, Amendment 39-13851 (69 FR 64856, November 9, 2004), and adding the following new AD:

**Bombardier, Inc.:** Docket No. FAA-2012-0592; Directorate Identifier

2011-NM-253-AD.

**(a) Comments Due Date**

We must receive comments by [INSERT DATE 45 DAYS AFTER DATE OF PUBLICATION IN THE FEDERAL REGISTER].

**(b) Affected ADs**

This AD supersedes AD 2004-22-23, Amendment 39-13851 (69 FR 64856, November 9, 2004).

**(c) Applicability**

This AD applies to Bombardier, Inc. Model CL-600-2B19 (Regional Jet Series 100 & 440) airplanes; certificated in any category; serial numbers 7003 through 7990 inclusive, and 8000 through 8999 inclusive.

**(d) Subject**

Air Transport Association (ATA) of America Code 57: Wings.

**(e) Reason**

This AD was prompted by reports of failure of the side brace fitting shaft of the main landing gear (MLG), due to corrosion. We are issuing this AD to prevent fractures of the side-brace fitting shafts of the MLG, and possible collapse of the MLG.

**(f) Compliance**

You are responsible for having the actions required by this AD performed within the compliance times specified, unless the actions have already been done.

**(g) Inspection of Main Landing Gear Side-Brace Fitting Shaft and Replacement**

(1) At the applicable times specified in paragraphs (g)(1)(i), (g)(1)(ii), (g)(1)(iii), and (g)(1)(iv) of this AD, do a detailed inspection for corrosion and damage of each side-brace fitting shaft of the MLG, in accordance with the Accomplishment Instructions of Bombardier Service Bulletin 601R-57-052, dated July 28, 2011. Repeat the inspections at the applicable times specified in paragraphs (g)(1)(i), (g)(1)(ii), (g)(1)(iii), and (g)(1)(iv) of this AD.

(i) For airplanes that average greater than 900 flight hours per year and have side-brace shafts part number (P/N) 601R10237-1 installed in either the left- or right-hand MLG, or if the side brace shaft part number cannot be identified without removal: Within 1,000 flight hours after the effective date of this AD, do the inspection. Repeat the inspections thereafter at intervals not to exceed 1,000 flight hours until the replacement specified in paragraph (g)(2) or (h) of this AD is done.

(ii) For airplanes that average 900 flight hours or less per year and have side-brace shafts P/N 601R10237-1 installed on either the left- or right-hand MLG, or if the side brace shaft part number cannot be identified without removal: Within 18 months after the effective date of this AD, do the inspection. Repeat the inspections thereafter at intervals not to exceed 18 months until the replacement specified in paragraph (g)(2) or (h) of this AD is done.

(iii) For airplanes that average greater than 900 flight hours per year and have side-brace shafts P/N 601R10237-3 installed on either the left- or right-hand MLG: Within 36 months after the effective date of this AD, do the inspection. Repeat the

inspections thereafter at intervals not to exceed 36 months until the replacement specified in paragraph (g)(2) or (h) of this AD is done.

(iv) For airplanes that average 900 flight hours or less per year and have side brace shafts P/N 601R10237-3 installed on either the left-or right-hand MLG: Within 60 months after the effective date of this AD, do the inspection. Repeat the inspections thereafter at intervals not to exceed 60 months until the replacement specified in paragraph (g)(2) or (h) of this AD is done.

(2) If any corrosion or damage is found during any inspection required by paragraph (g) of this AD: Before further flight, replace the side-brace fitting shaft with a new shaft P/N 601R10247-3, in accordance with the Accomplishment Instructions of Bombardier Service Bulletin 601R-57-052, dated July 28, 2011. Doing this replacement terminates the inspection requirements of paragraph (g) of this AD.

**(h) Replacement**

Do the replacement at the applicable time in paragraph (h)(1) or (h)(2) of this AD.

(1) For any airplanes that have side-brace shafts P/N 601R10237-1 installed or if the side-brace shaft part number cannot be identified without removal: Within 27 months after the effective date of this AD, replace the side-brace fitting shaft of the MLG with a new shaft having P/N 601R10247-3, in accordance with the Accomplishment Instructions of Bombardier Service Bulletin 601R-57-052, dated July 28, 2011. Doing this replacement terminates the inspection requirements of paragraph (g) of this AD.

(2) For airplanes that have side-brace shafts P/N 601R10237-3 installed: Within 117 months after the effective date of this AD, replace the side-brace fitting shaft of the

MLG with a new shaft P/N 601R10247-3, in accordance with the Accomplishment Instructions of Bombardier Service Bulletin 601R-57-052, dated July 28, 2011. Doing this replacement terminates the inspection requirements of paragraph (g) of this AD.

**(i) Other FAA AD Provisions**

The following provisions also apply to this AD:

**(1) Alternative Methods of Compliance (AMOCs):** The Manager, New York Aircraft Certification Office (ACO), ANE-170, 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 ACO, send it to ATTN: Program Manager, Continuing Operational Safety, FAA, New York ACO, 1600 Stewart Avenue, Suite 410, Westbury, New York 11590; telephone 516-228-7300; fax 516-794-5531. 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. The AMOC approval letter must specifically reference this AD.

**(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.

**(j) Related Information**

Refer to MCAI Canadian Airworthiness Directive CF-2011-39, dated October 25, 2011; and Bombardier Service Bulletin 601R-57-052, dated July 28, 2011; for related information.

Issued in Renton, Washington, on May 31, 2012.

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

[FR Doc. 2012-14208 Filed 06/11/2012 at 8:45 am; Publication Date: 06/12/2012]