2021-24-22 Pilatus Aircraft Ltd.:

Amendment 39–21843; Docket No. FAA–2021–0786; Project Identifier MCAI–2021–00429–A.

(a) Effective Date

This AD is effective January 25, 2022.

(b) Affected ADs

This AD replaces AD 2012–06–16, Amendment 39–16997 (77 FR 19061, March 30, 2012).

(c) Applicability

This AD applies to Pilatus Aircraft Ltd. Model PC-6, PC-6-H1, PC-6-H2, PC-6/350, PC-6/350-H1, PC-6/350-H2, PC-6/A, PC-6/A-H1, PC-6/A-H2, PC-6/B-H2, PC-6/B1-H2, PC-6/B2-H2, PC-6/B2-H2, PC-6/C1-H2, airplanes, all serial numbers, certificated in any category.

Note 1 to paragraph (c): These airplanes may also be identified as Fairchild Republic Company airplanes, Fairchild Industries airplanes, Fairchild Heli Porter airplanes, or Fairchild-Hiller Corporation airplanes.

(d) Subject

Joint Aircraft System Component (JASC) Codes 2700, Flight Control System; 2710, Aileron Control System; 2720, Rudder Control System; and 2730, Elevator Control System.

(e) Unsafe Condition

This AD was prompted by 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 detachment or partial detachment of the elevator or rudder in flight. The FAA is issuing this AD to prevent failure of the elevator or rudder attachment. The unsafe condition, if not addressed, could result in loss of control of the airplane.

(f) Compliance

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

(g) Definitions

The following definitions apply for purposes of this AD.

(1) Group 1 airplanes: Airplanes that have not been modified in accordance with Pilatus PC-6 Service Bulletin (SB) No. 55-003, dated November 29, 2013 (Pilatus SB 55-003); Pilatus PC-6 SB No. 55-003, Revision 1, dated December 9, 2014 (Pilatus SB 55-003R1); Pilatus PC-6 SB No. 55-003, Revision 2, dated January 19, 2017 (Pilatus 55-003R2); Pilatus PC-6 SB No. 55-003, Revision 3, dated November 6, 2017 (Pilatus 55-003R3); or Pilatus PC-6 SB No. 55-005, dated February 25, 2021 (Pilatus SB 55-005).

(2) *Group 2 airplanes:* Airplanes that have been modified in accordance with Pilatus SB 55–003, SB 55–003R1, SB 55–003R2, Pilatus SB 55–003R3; or Pilatus SB 55–005.

(h) Inspect Elevator, Rudder, and RH Aileron Hinge Bolt Installations

(1) For Group 1 airplanes: Within 14 days after the effective date of this AD, inspect the

elevator, rudder, and RH aileron hinge bolt installations and take any corrective actions before further flight by following the Accomplishment Instructions-Part 1-On Aircraft-Inspection in Pilatus SB 55–005.

(2) For Group 1 airplanes: Within 100 hours time-in-service (TIS) after the inspection required by paragraph (h)(1) of this AD and thereafter at intervals not to exceed 100 hours TIS until the modification required by paragraph (i) of this AD is done, inspect the elevator, rudder, and RH aileron hinge bolt installations and take any corrective actions before further flight by following the Accomplishment Instructions-Part 2-On Aircraft-CONFIG 1-Repeat Inspections in Pilatus SB 55–005.

(i) Modify Group 1 Airplanes

Within 11 months after the effective date of this AD, modify the hinge bolt installations on the elevator, rudder, and RH aileron assemblies by following the Accomplishment Instructions-Part 3-On Aircraft-Modification from CONFIG 1 to CONFIG 2 in Pilatus SB 55–005. Modifying the elevator, rudder, and RH aileron hinge bolt installations terminates the repetitive inspections required by paragraph (h)(2) of this AD.

(j) Installation Prohibition

As of the following applicable compliance time, do not install on any airplane an elevator assembly part number (P/N) $113.50.06.011,\,113.50.06.012,\,6305.0010.52,\,6305.0010.53,\,6305.0010.54,\,or$ $6305.0010.55,\,or$ a rudder assembly P/N $113.40.06.018,\,6302.0010.51,\,or$ 6302.0010.52.

- (1) For Group 1 airplanes: As of the modification required by paragraph (i) of this AD.
- (2) For Group 2 airplanes: As of the effective date of this AD.

(k) Alternative Methods of Compliance (AMOCs)

(1) The Manager, International Validation Branch, 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 certification office, send it to the attention of the person identified in paragraph (1)(1) of this AD and email: 9-AVS-AIR-730-AMOC@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.

(l) Related Information

(1) For more information about this AD, contact Doug Rudolph, Aviation Safety Engineer, FAA, General Aviation & Rotorcraft Section, International Validation Branch, 901 Locust, Room 301, Kansas City, MO 64106; phone: (816) 329–4059; fax: (816) 329–4090; email: doug.rudolph@faa.gov.

(2) Refer to European Union Aviation Safety Agency (EASA) AD 2021–0098, dated April 9, 2021, for more information. You may examine the EASA AD in the AD docket at https://www.regulations.gov by searching for and locating it in Docket No. FAA-2021-0786

(3) You may obtain information related to Pilatus SB 55–003, SB 55–003R1, SB 55–003R2, Pilatus SB 55–003R3; or Pilatus SB 55–005, which are not incorporated by reference, using the contact information found in paragraph (m)(3) of this AD.

(m) Material Incorporated by Reference

- (1) The Director of the Federal Register approved the incorporation by reference 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.
- (i) Pilatus PC-6 Service Bulletin (SB) No. 55-005, dated February 25, 2021.
 - (ii) [Reserved]
- (3) Pilatus Aircraft Ltd., Customer Support General Aviation, CH–6371 Stans, Switzerland; phone: +41 848 247 365; email: techsupport.ch@pilatus-aircraft.com; website: https://www.pilatus-aircraft.com.
- (4) You may view this service information at FAA, Airworthiness Products Section, Operational Safety Branch, 901 Locust, Kansas City, MO 64106. For information on the availability of this material at the FAA, call (816) 329–4148.
- (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, email: fr.inspection@nara.gov, or go to: https://www.archives.gov/federal-register/cfr/ibr-locations.html.

Issued on November 19, 2021.

Lance T. Gant,

Director, Compliance & Airworthiness Division, Aircraft Certification Service.

[FR Doc. 2021-27507 Filed 12-20-21; 8:45 am]

BILLING CODE 4910-13-P

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2020-1077; Project Identifier MCAI-2020-00819-A; Amendment 39-21842; AD 2021-24-21]

RIN 2120-AA64

Airworthiness Directives; Embraer S.A. Airplanes

AGENCY: Federal Aviation Administration (FAA), DOT.

ACTION: Final rule.

SUMMARY: The FAA is adopting a new airworthiness directive (AD) for certain Embraer S.A. Model EMB–500 and EMB–505 airplanes. This AD was prompted by a report that the

operational envelope does not contain airspeed limitations and procedures for operating the airplane at static air temperatures below $-54\,^{\circ}\text{C}$. This AD requires revising the airplane flight manual (AFM) to incorporate new and revised airspeed limitations and procedures. The FAA is issuing this AD to address the unsafe condition on these products.

DATES: This AD is effective January 25, 2022.

The Director of the Federal Register approved the incorporation by reference of certain publications listed in this AD as of January 25, 2022.

ADDRESSES: For service information identified in this final rule, contact Phenom Maintenance Support, Avenida Brigadeiro Faria Lima, 2170, P.O. Box 36/2, São José dos Campos, 12227-901, Brazil; phone: +55 12 3927 1000; email: phenom.reliability@embraer.com.br; website: https://www.embraer.com.br/ en-US/Pages/home.aspx. You may view this service information at the FAA, Airworthiness Products Section, Operational Safety Branch, 901 Locust, Kansas City, MO 64106. For information on the availability of this material at the FAA, call (816) 329-4148. It is also available at https://www.regulations.gov by searching for and locating Docket No. FAA-2020-1077.

Examining the AD Docket

You may examine the AD docket at https://www.regulations.gov by searching for and locating Docket No. FAA-2020-1077; or in person at Docket Operations between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this final rule, the mandatory continuing airworthiness information (MCAI), any comments received, and other information. The address for Docket Operations is 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: Jim Rutherford, Aviation Safety Engineer, FAA, General Aviation & Rotorcraft Section, International Validation Branch, 901 Locust, Room 301, Kansas City, MO 64106; phone: (816) 329–4165; fax: (816) 329–4090; email: jim.rutherford@faa.gov.

SUPPLEMENTARY INFORMATION:

Background

The FAA issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by adding an AD that would apply to all Embraer S.A. Model EMB-500 and EMB-505 airplanes with certain engines installed. The NPRM published in the Federal Register on August 2, 2021 (86 FR 41410). The NPRM was prompted by MCAI originated by the Agência Nacional de Aviação Civil (ANAC), which is the aviation authority for Brazil. ANAC issued AD 2020-05-03, effective June 1, 2020 (ANAC AD 2020-05-03) (also referred to after this as "the MCAI"), to correct an unsafe condition on Embraer S.A. Model EMB-500 and EMB-505 airplanes with certain engines installed. Although the affected airplanes were designed for operation at temperatures below -54 °C, the operational envelope in the AFM does not contain the necessary limitations and procedures to operate safely in these colder temperatures. The MCAI states that operation of the affected airplanes at static air temperatures below -54 °C without these limitations could cause several systems and components to operate inadequately, resulting in multiple systems failures.

Accordingly, the MCAI requires updating the AFM to incorporate a modified operational envelope that establishes restrictions and minimum airspeed required for each static temperature range. In the NPRM, the FAA proposed to require revising the AFM to incorporate the new and revised airspeed limitations and procedures specified in the manufacturer's service information. The FAA is issuing this AD to prevent inadequate operation below the allowable temperature, which could result in multiple systems failures and compromise safe flight of the airplane.

You may examine the MCAI in the AD docket at https://www.regulations.gov by searching for and locating Docket No. FAA-2020-1077.

Discussion of Final Airworthiness Directive

Comments

The FAA received a comment on the NPRM from Embraer. The following presents the comment received and the FAA's response to the comment.

Embraer requested that the FAA change the final rule to allow operators

to revise the AFM using EMB–500 AFM 2656, Revision 24, dated March 17, 2020, and EMB–505 AFM–2665, Revision 21, dated March 13, 2020, as well as future FAA-approved AFM revisions. Embraer stated that the information in the service information proposed for incorporation by reference has been included in the March 2020 AFM revisions for each model type.

The FAA agrees and has revised the AD to allow use of a different document provided the language is identical to the language in the service information incorporated by reference.

Conclusion

This product has been approved by the aviation authority of another country and is approved for operation in the United States. Pursuant to the FAA's bilateral agreement with this State of Design Authority, it has notified the FAA of the unsafe condition described in the MCAI referenced above. The FAA reviewed the relevant data, considered the comment received, and determined that air safety requires adopting this AD as proposed. Accordingly, the FAA is issuing this AD to address the unsafe condition on these products. Except for the changes described previously, this AD is adopted as proposed in the NPRM. None of the changes will increase the economic burden on any operator.

Related Service Information Under 1 CFR Part 51

The FAA reviewed Embraer Phenom Operational Bulletin No. 500-001/20, dated March 9, 2020; and Operational Bulletin No. 505-005/13, Revision 1, dated March 9, 2020. This service information specifies revising the AFM to incorporate limitations and procedures for the minimum airspeed in the affected region of the operational envelope. 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

The FAA estimates that this AD affects 590 airplanes of U.S. registry.

ESTIMATED COSTS FOR REVISING THE AFM

Labor cost	Parts cost	Cost per product	Cost on U.S. operators
.5 work-hour × \$85 per hour = \$42.50	\$0	\$42.50	\$25,075

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.

The FAA is 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) Will not affect intrastate aviation in Alaska, 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.

List of Subjects in 14 CFR Part 39

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

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:

2021–24–21 Embraer S.A.: Amendment 39–21842; Docket No. FAA–2020–1077; Project Identifier MCAI–2020–00819–A.

(a) Effective Date

This airworthiness directive (AD) is effective January 25, 2022.

(b) Affected ADs

None.

(c) Applicability

This AD applies to Embraer S.A. Model EMB–500 and EMB–505 airplanes, all serial numbers, certificated in any category, with Model PW617F–E or PW617F1–E engines (for Model EMB–500 airplanes) or Model PW535E engines (for Model EMB–505 airplanes) installed.

(d) Subject

Joint Aircraft System Component (JASC) Code 0200, Operations.

(e) Unsafe Condition

This AD was prompted by a report that the operational envelope does not contain airspeed limitations and procedures for operating the airplane at static air temperatures below $-54\,^{\circ}\text{C}.$ The FAA is issuing this AD to prevent inadequate operation below the allowable temperature. The unsafe condition, if not addressed, could result in multiple systems failures and compromise safe flight of the airplane.

(f) Compliance

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

(g) Revision of the Airplane Flight Manual (AFM)

Within 30 days after the effective date of this AD: $\,$

(1) For Model EMB-500 airplanes: Revise Section 2 Limitations and Section 5 Performance of the existing AFM for your airplane by incorporating the information in "V—OPERATING INFORMATION," of Embraer Phenom Operational Bulletin No. 500-001/20, dated March 9, 2020. You may use a different document provided the language is identical to the language in "V—OPERATING INFORMATION," of Embraer

Phenom Operational Bulletin No. 500–001/20, dated March 9, 2020.

(2) For Model EMB–505 airplanes: Revise Section 2 Limitations, Section 5 Performance, and Supplement 2 of the existing AFM for your airplane by incorporating the information in "V—OPERATING INFORMATION," of Embraer Phenom Operational Bulletin No. 505–005/13, Revision 1, dated March 9, 2020. You may use a different document provided the language is identical to the language in V—OPERATING INFORMATION," of Embraer Phenom Operational Bulletin No. 505–005/13, Revision 1, dated March 9, 2020.

(h) Alternative Methods of Compliance (AMOCs)

- (1) The Manager, International Validation Branch, FAA, has the authority to approve AMOCs for this AD, if requested using the procedures found in 14 CFR 39.19. Send your request to the person identified in paragraph (i)(1) of this AD and email: 9-AVS-AIR-730-AMOC@faa.gov.
- (2) Before using any approved AMOC, notify your appropriate principal inspector, or lacking a principal inspection, the manager of the local Flight Standards District Office

(i) Related Information

(1) For more information about this AD, contact Jim Rutherford, Aviation Safety Engineer, FAA, General Aviation & Rotorcraft Section, International Validation Branch, 901 Locust, Room 301, Kansas City, MO 64106; phone: (816) 329–4165; fax: (816) 329–4090; email: jim.rutherford@faa.gov.

(2) Refer to Mandatory Continuing Airworthiness Information (MCAI) Agência Nacional de Aviação Civil AD 2020–05–03, effective June 1, 2020, for related information. This MCAI may be found in the AD docket at https://www.regulations.gov by searching for and locating Docket No. FAA–2020–1077.

(j) Material Incorporated by Reference

- (1) The Director of the Federal Register approved the incorporation by reference 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.
- (i) Embraer Phenom Operational Bulletin No. 500–001/20, dated March 9, 2020.
- (ii) Embraer Phenom Operational Bulletin No. 505–005/13, Revision 1, dated March 9, 2020.
- (3) For service information identified in this AD, contact Phenom Maintenance Support, Avenida Brigadeiro Faria Lima, 2170, P.O. Box 36/2, São José dos Campos, 12227–901, Brazil; phone: +55 12 3927 1000; email: phenom.reliability@embraer.com.br;

website: https://www.embraer.com.br/en-US/ Pages/home.aspx.

- (4) You may view this service information at FAA, Airworthiness Products Section, Operational Safety Branch, 901 Locust, Kansas City, MO 64106. For information on the availability of this material at the FAA, call (816) 329–4148.
- (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, email: fr.inspection@nara.gov, or go to: https://www.archives.gov/federal-register/cfr/ibr-locations.html.

Issued on November 19, 2021.

Lance T. Gant.

Director, Compliance & Airworthiness Division, Aircraft Certification Service.

[FR Doc. 2021-27511 Filed 12-20-21; 8:45 am]

BILLING CODE 4910-13-P

DEPARTMENT OF TRANSPORTATION

Federal Aviation Administration

14 CFR Part 39

[Docket No. FAA-2020-1006; Project Identifier 2019-CE-047-AD; Amendment 39-21855; AD 2021-25-11]

RIN 2120-AA64

Airworthiness Directives; Piper Aircraft, Inc. Airplanes

AGENCY: Federal Aviation Administration (FAA), DOT.

ACTION: Final rule.

SUMMARY: The FAA is superseding Airworthiness Directive (AD) 78-02-03, which applied to all Piper Aircraft, Inc. (Piper) Model PA-23-250 airplanes. AD 78-02-03 required repetitively inspecting the stabilator tip tube and weight assemblies for cracks, inspecting for missing rivets and screws, replacing the forward rib/horn assemblies, and reinforcing the mounting. Since AD 78-02-03 was issued, Piper developed a newly-designed stabilator, which is not subject to the unsafe condition, and revised its service information. This AD retains the actions of AD 78-02-03, but reduces the applicability and requires the actions in the revised service information. The FAA is issuing this AD to address the unsafe condition on these products.

DATES: This AD is effective January 25, 2022.

The Director of the Federal Register approved the incorporation by reference of certain publications listed in this AD as of January 25, 2022.

ADDRESSES: For service information identified in this final rule, contact

Piper Aircraft, Inc., 2926 Piper Drive, Vero Beach, FL 32960; phone: (772) 299–2141; website: https://www.piper.com/. You may view this service information at the FAA, Airworthiness Products Section, Operational Safety Branch, 901 Locust, Kansas City, MO 64106. For information on the availability of this material at the FAA, call (817) 222–5110. It is also available at https://www.regulations.gov by searching for and locating Docket No. FAA–2020–1006.

Examining the AD Docket

You may examine the AD docket at https://www.regulations.gov by searching for and locating Docket No. FAA-2020-1006; or in person at Docket Operations between 9 a.m. and 5 p.m., Monday through Friday, except Federal holidays. The AD docket contains this final rule, any comments received, and other information. The street address for Docket Operations is listed above.

FOR FURTHER INFORMATION CONTACT: John Marshall, Aviation Safety Engineer, Atlanta ACO Branch, FAA, 1701 Columbia Avenue, College Park, GA 30337; phone: (404) 474–5524; fax: (404) 474–5605; email: john.r.marshall@faa.gov.

SUPPLEMENTARY INFORMATION:

Background

The FAA issued a notice of proposed rulemaking (NPRM) to amend 14 CFR part 39 by superseding AD 78-02-03 Reg. Docket No. 77-EA-81, Amendment 39-3128] (43 FR 3079, January 23, 1978) (AD 78-02-03). AD 78–02–03 applied to all Piper Model PA-23-250 airplanes and required repetitively inspecting both the stabilator tip tube and weight assemblies for cracks. For different groups of serial-numbered airplanes, AD 78–02–03 required a one-time inspection of the stabilator tip ribs for missing rivets and screws, replacement of the forward rib/horn assemblies, and reinforcement of the mounting. The repetitive inspections in AD 78-02-03 for all serial-numbered airplanes had no terminating action and were required regardless of any corrective actions performed.

The NPRM published in the **Federal Register** on September 16, 2021 (86 FR 51636). The NPRM was prompted by Piper developing a newly-designed stabilator, which is not subject to the unsafe condition, and revising its service information. The FAA determined the applicability of AD 78–02–03 should be revised to exclude airplanes beginning with serial number 27–7954122, which were manufactured

with the stabilator design change. In the NPRM, the FAA proposed to retain all of the requirements of AD 78–02–03 but reduce the applicability and update some of the service information that would be required for compliance. The FAA is issuing this AD to address the unsafe condition on these products.

Discussion of Final Airworthiness Directive

Comments

The FAA received no comments on the NPRM or on the determination of the costs.

Conclusion

The FAA reviewed the relevant data and determined that air safety requires adopting this AD as proposed. Accordingly, the FAA is issuing this AD to address the unsafe condition on these products. This AD is adopted as proposed in the NPRM.

Related Service Information Under 1 CFR Part 51

The FAA reviewed the following service documents required for compliance with this AD:

- Piper Service Bulletin (SB) No. 547, dated March 1, 1977, which contains instructions for inspecting the stabilator tip rib;
- Piper SB No. 569, dated August 24, 1977, which contains information for replacing the stabilator tab horn;
- Piper Service Letter No. 807A, dated September 8, 1977, which contains information for installing the stabilator outboard nose rib; and
- Piper SB No. 540B, February 9, 2021, which contains instructions for inspecting the stabilator tip tube and weight assembly and addressing any cracks found.

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.

Other Related Service Information

The FAA reviewed the following documents for information related to this AD:

- Piper SB 540, which contains instructions for inspecting and reinforcing the stabilator tip tube and weight assembly; and
- Piper Aztec Service Manual, Part Number 753–564, dated January 1, 2009. Paragraphs 4–65 through 4–67 of this manual contain procedures for checking control surface balance.