



AGÊNCIA NACIONAL DE AVIAÇÃO CIVIL - BRAZIL

BRAZILIAN EMERGENCY AIRWORTHINESS DIRECTIVE

EAD No: E2024-05-09

Effective Date: 21 May 2024

The following Brazilian Emergency Airworthiness Directive (EAD), issued by the Agência Nacional de Aviação Civil (ANAC) in accordance with provisions of Chapter IV, Title III of Código Brasileiro de Aeronáutica - Law No. 7,565 dated 19 December 1986 - and Regulamento Brasileiro da Aviação Civil (RBAC) 39, applies to all aircraft registered in the Registro Aeronáutico Brasileiro. No person may operate an aircraft to which this AD applies, unless it has previously complied with the requirements established herein.

EAD No. E2024-05-09 - (EMBRAER) / 39-1561.

APPLICABILITY:

This Emergency Airworthiness Directive (EAD) applies to Embraer S.A. airplanes models ERJ170-100 and ERJ170-200, as identified in Embraer Alert Service Bulletin SB170-32-A094, original revision, dated May 18th, 2024.

CANCELLATION / REVISION:

Not applicable.

REASON:

The EAD was prompted by a landing gear not locked indication during the final approach, leading the flight crew to declare an emergency. Although the event did not result in serious consequences, it was found that a failure could occur in the main landing gear (MLG) locking-stay bracket assembly, due to the installation of a particular self-locking nut, during the MLG locking-stay bracket assembly replacement. Loss of this self-locking nut may lead to disconnection of the MLG Locking Stay bracket, which can result in uncommanded retraction of the landing gear and consequent loss of directional control.

Since this condition may occur in other airplanes and affects flight safety, preventive action is required. Thus, sufficient reason exists to mandate compliance with this AD in the indicated time limit.

REQUIRED ACTION:

Inspection of the MLG locking-stay bracket assembly (Right hand - RH and Left hand- LH); MLG locking-stay bracket assembly nut replacement and MLG locking-stay bracket assembly replacement, as applicable.

COMPLIANCE:

Required as indicated below, unless already accomplished.

(b) Inspection of the LH and RH MLG locking-stay bracket assembly.

Within the next 50 Flight Cycles (FC) after the effective date of this EAD, perform a General Visual Inspection (GVI) to verify that the screw with P/N NAS6605D10, washers with P/N NAS1149C0532R, nuts with P/N MS17826-5 or P/N MS14145-5, and cotter pins with P/N MS24665-153 are adequately installed on the bracket P/N 1840A0700-03 or 1840A0700-04, according to Embraer Alert Service Bulletin SB170-32-A094, original revision, dated May 18, 2024, or further revisions

approved by ANAC.

(1) If there is no anomaly on the installation of screws P/N NAS6605D10, washers P/N NAS1149C0532R, nuts P/N MS17826-5 or P/N MS14145-5 and cotter pins P/N MS24665-153 on the bracket P/N 1840A0700-03 or 1840A0700-04, check if the nut P/N MS17826-5 is installed.

(i) If there is no nut with P/N MS17826-5 installed, no further action is required by this EAD.

(ii) If nuts with P/N MS17826-5 are installed, replace them with nuts P/N MS14145-5, according to the instructions provided in Embraer Alert Service Bulletin SB170-32-A094, original revision, dated May 18, 2024, or further revisions approved by ANAC, before the next flight.

(2) If any anomaly is detected on the installation of the screws with P/N NAS6605D10, washers with P/N NAS1149C0532R, nuts with P/N MS17826-5 or P/N MS14145-5, and cotter pins with P/N MS24665-153 on the bracket P/N 1840A0700-03 or 1840A0700-04, comply with paragraph **(c)** of this EAD, before the next flight.

NOTE: For the purposes of this AD, a General Visual Inspection (GVI) is defined as follows.

General Visual Inspection (GVI): A visual examination of an interior or exterior area, installation, or assembly to detect obvious damage, failure, or irregularity. This level of inspection is made from within touching distance unless otherwise specified. A mirror may be necessary to enhance visual access to all exposed surfaces in the inspection area. This level of inspection is made under normally available lighting conditions such as daylight, hangar lighting, flashlight, or drop-light and may require removal or opening of access panels or doors. Stands, ladders, or platforms may be required to gain proximity to the area being checked.

(c) LH and RH MLG locking-stay bracket assembly replacement.

If there is any anomaly on the installation of the screw with P/N NAS6605D10, washers with P/N NAS1149C0532R, nuts with P/N MS17826-5 or P/N MS14145-5, and cotter pins with P/N MS24665-153 on the bracket P/N 1840A0700-03 or 1840A0700-04, replace the bracket assembly PN 1840A0700-03 or -04, according to the instructions provided in Embraer Alert Service Bulletin SB170-32-A094, original revision, dated May 18, 2024 or further revisions approved by ANAC.

(d) Alternative method of compliance.

A different compliance method or a different compliance time for the requirements of this EAD may be used if approved by the Manager of the Continuing Airworthiness Technical Branch (GTAC).

(e) Material incorporated by reference.

You must use Embraer Alert Service Bulletin SB170-32-A094, original revision, dated May 18, 2024, or further revisions approved by ANAC; to do the actions required by this AD, unless this AD specifies otherwise

CONTACT:

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NOTE: Original in Portuguese language signed and available in the files of the Continuing Airworthiness Technical Branch (GTAC) of the National Civil Aviation Agency (ANAC).

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