



AGÊNCIA NACIONAL DE AVIAÇÃO CIVIL - BRAZIL

BRAZILIAN AIRWORTHINESS DIRECTIVE

AD No.: 2021-08-01

Effective Date: 31 Aug. 2021

The following Brazilian Airworthiness Directive (AD), 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.

AD No. 2021-08-01 - YABORÃ / 39-1481.

APPLICABILITY:

This Airworthiness Directive (AD) applies to Yaborã Indústria Aeronáutica S.A. airplanes model ERJ 190-100 ECJ, serial numbers 19000109 through 19000732.

CANCELLATION / REVISION:

Not applicable.

REASON:

Some structural parts, including life limited items, used in the Main Landing Gear of the commercial versions of the airplanes Embraer ERJ 190-100 and ERJ 190-200 are common to the ones used in the model Embraer ERJ 190-100 ECJ (Lineage 1000). Although the end-items are not interchangeable, that may be the case for some components, which can be replaced during repair or overhaul. As the operational loads are different for both airplane models mentioned, the adequate life limit may not be properly controlled in this scenario, which may impact the structural integrity of these airplanes.

Since this condition potentially affects safety, it is necessary an action that prevents the incorrect installation of these components and sufficient reason exists to mandate compliance with this AD within the indicated time limit.

REQUIRED ACTION:

This AD requires the revision of the approved maintenance program, verification of the applicable maintenance records and reidentification of some parts of the Main Landing Gear Assembly of the affected fleet.

COMPLIANCE:

Required as indicated below, unless already accomplished.

(a) Revision of the Maintenance Program

Within 90 days after the effective date of this AD, revise the approved maintenance program to ensure that the tasks revised in the Temporary Revision 9-2 of the *Maintenance Planning Guide (MPG) 2928 APPENDIX A - PART 4 - LIFE-LIMITED ITEMS (LLI)* dated September 21st 2020, or later revisions of the *MPG 2928 APPENDIX A* approved by ANAC, are incorporated in that maintenance program.

(b) Verification of the maintenance records

Within 90 days after the effective date of this AD, accomplish the documental inspection of the maintenance records according to instructions of Part I of Service Bulletin Embraer 190LIN-32-0039, original revision, dated September 21st 2020, or later approved revisions by ANAC, and send the inspection results as instructions contained in the same service bulletin or to the email reliability.executive@embraer.com.br.

(c) Reidentification of parts

Before or during the next Overhaul (Restoration) of the Main Landing Gear, or when one of the parts with part numbers (P/N) listed on Table 1 below is removed from any aircraft of the fleet affected by this AD, whichever occurs first after the effective date of this AD, reidentify the removed P/N and all the part numbers listed on Table 1 of this AD installed in the aircraft according to instructions of Part II of Service Bulletin Embraer 190LIN-32-0039, original revision, dated September 21st 2020, or further revisions approved by ANAC.

Table 1

| <i>Component</i> | P/N |
|---------------------------|----------------------|
| <i>Pintle Pin</i> | 2821-0025 |
| <i>Sliding Tube</i> | 2821-0221 |
| | 2821-0222 |
| <i>Torque Link, Upper</i> | 2821-0310 |
| <i>Torque Link, Lower</i> | 2821-0410 |
| <i>Upper Side Stay</i> | 190-70154-003 |
| | 190-70154-005 |

(d) Prohibition of new installations

After the effective date of this AD the parts with P/N identified according to the Table 1 above shall no longer be installed in airplanes model ERJ 190-100 ECJ.

(e) Alternative Methods of Compliance (AMOC)

A different method or a different compliance time with the requirements of this AD may be used if approved by the Manager of ANAC's Continuing Airworthiness Technical Branch (Gerência Técnica de Aeronavegabilidade Continuada – GTAC). The AMOC approval letter must specifically reference this AD.

(f) Material incorporated by reference

To accomplish the actions required by this AD, use the following documents:

(1) Service Bulletin Embraer 190LIN-32-0039, original revision, dated September 21st 2020, or later revisions approved by ANAC.

Record compliance with this AD in the applicable maintenance log book.

CONTACT:

For additional technical information, contact:

National Civil Aviation Agency (ANAC)
Continuing Airworthiness Technical Branch (GTAC)
Rua Doutor Orlando Feirabend Filho, nº 230
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Parque Residencial Aquáriu
CEP 12246-190 – São José dos Campos - SP, BRAZIL.
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APPROVAL:

ROBERTO JOSÉ SILVEIRA HONORATO
Head of Department
Department of Airworthiness (SAR)
ANAC

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).

Referência: Processo nº 00066.005456/2021-34

SEI nº 5957707