PŘÍKAZ K ZACHOVÁNÍ LETOVÉ ZPŮSOBILOSTI

CAA-AD-042/2000

Datum vydání: 02. května 2000

LETADLO - DVEŘE PŘEDNÍHO NÁKLADOVÉHO PROSTORU - KONTROLA

Týká se: letadel Boeing 737-100, -200, -200C, -300, -400 a -500, certifikovaných v kterékoliv kategorii.

Datum účinnosti: 15. června 2000

Provést v termínech: Jak je popsáno v FAA AD 2000-07-06 (příloha tohoto PZZ).

Postup provedení prací: Dle FAA AD 2000-07-06.

Poznámky: Provedení tohoto PZZ musí být zapsáno do letadlové knihy. Případné dotazy týkající se tohoto PZZ adresujte na ÚCL technický inspektorát - Ing. Toman. Pokud to vyžaduje povaha tohoto PZZ, musí být zapracován do příslušné části dokumentace pro obsluhu, údržbu a opravy letadla. Tento PZZ byl vypracován na základě FAA AD 2000-07-06.

Ing. Pavel MATOUŠEK
Ředitel technického inspektorátu
Úřad pro civilní letectví

2000-07-06 BOEING: Amendment 39-11660. Docket 99-NM-81-AD.

Applicability: All Model 737-100, -200, -200C, -300, -400, and -500 series airplanes; certificated in any category.

NOTE 1: This AD applies to each airplane identified in the preceding applicability provision, regardless of whether it has been modified, altered, or repaired in the area subject to the requirements of this AD. For airplanes that have been modified, altered, or repaired so that the performance of the requirements of this AD is affected, the owner/operator must request approval for an alternative method of compliance in accordance with paragraph (e) of this AD. The request should include an assessment of the effect of the modification, alteration, or repair on the unsafe condition addressed by this AD; and, if the unsafe condition has not been eliminated, the request should include specific proposed actions to address it.

Compliance: Required as indicated, unless accomplished previously.

To prevent fatigue cracking of the lower corners of the door frame and cross beam of the forward cargo door, which could result in rapid depressurization of the airplane, accomplish the following:

High Frequency Eddy Current Initial/Repetitive Inspections

(a) Within 1 year or 4,500 flight cycles after the effective date of this AD, whichever occurs later, perform a high frequency eddy current (HFEC) inspection to detect cracking of the lower corners (forward and aft) of the door frame of the forward cargo door in accordance with Boeing 737 Nondestructive Test Manual, Part 6, Section 51-00-00, Figure 4 or Figure 23.

(1) If no cracking is detected, repeat the HFEC inspection thereafter at intervals not to exceed 4,500 flight cycles, until the requirements of paragraph (c) of this

AD have been accomplished.

(2) If any cracking is detected during any inspection required by paragraph (a) of this AD, prior to further flight, accomplish the requirements of paragraphs (a)(2)(i) AND (a)(2)(ii) of this AD, which constitute terminating action for the repetitive inspections required by paragraph (a)(1) of this AD.

(i) Accomplish the requirements of paragraph (a)(2)(i)(A) OR (a)(2)(i)(B) of this AD, and install a cross beam repair and reinforcement modification of the cross beam in accordance with Boeing Service Bulletin 737-52-1100, Revision 2, dated March 31, 1994.

(A) Repair the door frame of the forward cargo door in accordance with a method approved by the Manager, Seattle Aircraft Certification Office (ACO), FAA, Transport Airplane Directorate; or in accordance with data meeting the type certification basis of the airplane approved by a Boeing Company Designated Engineering Representative (DER) who has been authorized by the Manager, Seattle ACO, to make such findings. For a repair or modification method to be approved by the Manager, Seattle ACO, as required by this paragraph; and paragraphs (a)(2)(ii), (b)(2), (b)(3)(ii), and (c)(2) of this AD; the Manager's approval letter must specifically reference this AD.

(B) Replace the door frame of the forward cargo door with a new door frame in accordance with Boeing Service Bulletin 737-52-1100, Revision 2, dated March 31, 1994.

(ii) Modify the repaired or replaced door frame of the forward cargo door in accordance with a method approved by the Manager, Seattle ACO, or in accordance with data meeting the type certification basis of the airplane approved by a Boeing Company DER who has been authorized by the Manager, Seattle ACO, to make such findings.

Detailed Visual Initial/Repetitive Inspections

(b) Within 1 year or 4,500 flight cycles after the effective date of this AD, whichever occurs later, perform a detailed visual inspection to detect cracking of the cross beam (i.e., upper and lower chord and web sections) of the forward cargo door in accordance with Boeing Service Bulletin 737-52-1100, Revision 2, dated March 31, 1994.

NOTE 2: For the purposes of this AD, a detailed inspection is defined as: "An intensive visual examination of a specific structural area, system, installation or assembly to detect damage, failure or irregularity. Available lighting is normally supplemented with a direct source of good lighting at intensity deemed appropriate by the inspector. Inspection aids such as mirror, magnifying lenses, etc. may be used. Surface cleaning and elaborate access procedures may be required."

(1) If no cracking is detected, repeat the inspection thereafter at intervals not to exceed 4,500 flight cycles until the requirements of paragraph (c) of this AD have been accomplished.

(2) If any cracking is detected on the lower chord section of the cross beam during any inspection required by paragraph (b) of this AD, prior to further flight, repair in accordance with a method approved by the Manager, Seattle ACO, or in accordance with data meeting the type certification basis of the airplane approved by a Boeing Company DER who has been authorized by the Manager, Seattle ACO, to make such findings.

(3) If any cracking is detected on any area excluding the lower chord section of the cross beam (i.e., upper chord and web section) during any inspection required by paragraph (b) of this AD, prior to further flight, accomplish the requirements of paragraph (b)(3)(i) or (b)(3)(ii), as applicable, of this AD, which constitute terminating action for the repetitive inspections required by paragraph (b)(1) of this AD.

(i) For airplanes with line numbers 1 through 1231: Install a cross beam repair and preventative modification of the outboard radius of the lower corners (forward and aft) of the door frame in accordance with Boeing Service Bulletin 737-52-1100, Revision 2, dated March 31, 1994.

NOTE 3: Due to implications and consequences associated with cracking, this AD does not allow the option of replacing the door frame as an alternative method of compliance to installing the preventative modification.

(ii) For airplanes with line numbers 1232 and subsequent: Install a cross beam repair and preventative modification of the outboard radius of the lower corners (forward and aft) of the door frame in accordance with a method approved by the Manager, Seattle ACO or in accordance with data meeting the type certification basis of the airplane approved by a Boeing Company DER who has been authorized by the Manager, Seattle ACO, to make such findings.

Terminating Action

(c) Within 4 years or 12,000 flight cycles after the effective date of this AD, whichever occurs later: Install the preventative modification of the outboard radius of the lower corners (forward and aft) of the door frame and the reinforcement modification of the cross beam of the forward cargo door in accordance with paragraph (c)(1) or (c)(2) of this AD, as applicable. Accomplishment of paragraph (c)(1) or (c)(2) of this AD, as applicable, constitutes terminating action for the repetitive inspections required by paragraphs (a)(1) and (b)(1) of this AD.

(1) For airplanes with line numbers 1 through 1231: Accomplish the preventative modification and the reinforcement modification in accordance with Boeing Service Bulletin 737-52-1100, Revision 2, dated March 31, 1994.

(2) For airplanes with line numbers 1232 and subsequent: Accomplish the preventative modification and the reinforcement modification in accordance with a method approved by the Manager, Seattle ACO or in accordance with data meeting the type certification basis of the airplane approved by a Boeing Company DER who has been authorized by the Manager, Seattle ACO, to make such findings.

Modifications Previously Accomplished

(d) For all airplanes on which modifications of the forward lower corner of the door frame and the cross beam of the forward cargo door were accomplished in accordance with Boeing Service Bulletin 737-52-1100, dated August 25, 1988, or Revision 1, dated July 20, 1989, or in accordance with the requirements of AD 90-06-02, amendment 39-6489: Within 4 years or 12,000 flight cycles after the effective date of this AD, whichever occurs later, install the reinforcement modification of the aft corner of the door frame of the forward cargo door in accordance with Boeing Service Bulletin 737-52-1100, Revision 2, dated March 31, 1994. Accomplishment of such modification constitutes terminating action for the repetitive inspections required by this AD.

NOTE 4: Accomplishment of Boeing Service Bulletin 737-52-1100, Revision 2, dated March 31, 1994, does not supersede the requirements of AD 90-06-02, amendment 39-6489.

Alternative Methods of Compliance

(e) An alternative method of compliance or adjustment of the compliance time that provides an acceptable level of safety may be used if approved by the Manager, Seattle ACO. Operators shall submit their requests through an appropriate FAA Principal Maintenance Inspector, who may add comments and then send it to the Manager, Seattle ACO.

NOTE 5: Information concerning the existence of approved alternative methods of compliance with this AD, if any, may be obtained from the Seattle ACO.

Special Flight Permits

(f) Special flight permits may be issued in accordance with sections 21.197 and 21.199 of the Federal Aviation Regulations (14 CFR 21.197 and 21.199) to operate the airplane to a location where the requirements of this AD can be accomplished.

Incorporation by Reference

(g) Except as provided by paragraphs (a)(2)(i)(A), (a)(2)(ii), (b)(2), (b)(3)(ii), and (c)(2) of this AD; the actions shall be done in accordance with Boeing Service Bulletin 737-52-

1100, Revision 2, dated March 31, 1994; and Boeing 737 Nondestructive Test (NDT) Manual, D6-37239, Part 6, Section 51-00-00, Figure 4 or Figure 23, dated August 5, 1997; as applicable. Boeing 737 NDT Manual contains the following list of effective pages:

Page Number	Revision Level Shown on Page	Date Shown on Page
Title Page	Not Shown	Not Shown
List of Effective Pages Pages 1, 2	Not Shown	August 5, 1997
List of Effective Pages Page 2A	Not Shown	February 5, 1997

This incorporation by reference was approved by the Director of the Federal Register in accordance with 5 U.S.C. 552(a) and 1 CFR part 51. Copies may be obtained from Boeing Commercial Airplane Group, P.O. Box 3707, Seattle, Washington 98134-2207. Copies may be inspected at the FAA, Transport Airplane Directorate, 1601 Lind Avenue, SW., Renton, Washington; or at the Office of the Federal Register, 800 North Capitol Street, NW., suite 700, Washington, DC.

(h) This amendment becomes effective on May 16, 2000.

FOR FURTHER INFORMATION CONTACT:
Nenita Odesa, Aerospace Engineer, Airframe Branch, ANM-120S, FAA, Transport Airplane Directorate, Seattle Aircraft Certification Office, 1601 Lind Avenue, SW., Renton, Washington 98055-4056; telephone (425) 227-2557; fax (425) 227-1181.

Issued in Renton, Washington, on March 31, 2000.
Donald L. Riggin, Acting Manager, Transport Airplane Directorate, Aircraft Certification Service.