PŘÍKAZ K ZACHOVÁNÍ LETOVÉ ZPŮSOBILOSTI

CAA-AD-055/2002

Datum vydání: 13. května 2002

LETOUN - ZMĚNA LETOVÉ PŘÍRUČKY (AFM)

Týká se: letadel Boeing Model 737-600, -700, -700C a -800, certifikovaných v kterékoliv kategorii.

Datum účinnosti: 13. května 2002

Provést v termínech: Jak je popsáno v FAA AD 2002-08-20, od data účinnosti tohoto PZZ.

Postup provedení prací: Dle FAA AD 2002-08-20 (příloha tohoto PZZ).

Poznámky: Provedení tohoto PZZ musí být zapsáno do letadlové knihy. Případné dotazy týkající se tohoto PZZ adresujte na ÚCL sekce technická - 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 2002-08-20.

Ing. Pavel MATOUŠEK Ředitel sekce technické Úřad pro civilní letectví

2002-08-20 Boeing: Amendment 39-12732. Docket 2002-NM-76-AD.

Applicability: All Model 737-600, -700, -700C, and -800 series airplanes; certificated in any category.

Note 1: The applicability of this AD includes ALL Model 737-700 series airplanes, including Model 737-700 BBJ airplanes.

Note 2: 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 (i) 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 the accumulation of fluid or residue in the elevator balance bays, and foreign substances on the external surfaces of the elevator tab, which can lead to limit cycle oscillation, flutter, and loss of controllability of the airplane, accomplish the following:

Revision of the Airplane Flight Manual (AFM)--Airspeed Limitations

(a) Within 10 days after the effective date of this AD, revise the Limitations section of the FAA-approved AFM to include the following procedures (this may be accomplished by inserting a copy of this AD into the AFM):

"After any ground deicing/anti-icing of the horizontal stabilizer, airspeed must be limited to 270 KIAS until the crew has been informed that applicable maintenance procedures have been accomplished that would allow exceedance of 270 KIAS. Once the applicable maintenance procedures have been accomplished, exceeding 270 KIAS is permissible only until the next deicing/anti-icing."

Optional Post-Deicing/Anti-Icing Cleaning

- (b) Accomplishment of the applicable cleaning procedures specified by paragraphs (b)(1) and (b)(2) of this AD allows the temporary operation of the airplane at airspeeds exceeding 270 KIAS--until the next deicing/anti-icing of the horizontal stabilizer.
- (1) For all airplanes: Clean the external aerodynamic surfaces of the elevator tab to remove accumulated deicing/antiicing fluid, residue, or other foreign substances, in accordance with the procedures for Airplane Cleaning in Section 12-40-00 (G) of Boeing 737-600/700/800/900 Maintenance Manual Document D633A101.
- (2) For airplanes having line numbers 1 through 1091 inclusive: Until the actions required by paragraph (f) of this AD have been accomplished, clean the elevator balance bays in accordance with a method approved by the Manager, Seattle Aircraft Certification Office (ACO), FAA. For a cleaning method to be approved by the Manager, Seattle ACO, as required by this paragraph, the Manager's approval letter must specifically reference this AD.

AFM Revision--Non-Normal Procedures

(c) Within 10 days after the effective date of this AD, revise the Non-Normal Procedures section of the FAA-approved AFM (Boeing Document D631A001) to include the following procedures (this may be accomplished by inserting a copy of this AD into the AFM):

Elevator Tab Limit Cycle Oscillation

An Elevator Tab Limit Cycle Oscillation (LCO) will be characterized by a high frequency, possibly severe vibration, originating in the tail of the airplane, and emanating forward through the airframe structure. LCO events have previously occurred at airspeeds greater than 275 KIAS, and in an altitude range between 10,000 and 25,000 feet following ground deicing/anti-icing of the horizontal stabilizer. This vibration may, or may not, be felt in the control column. Cabin crew may be able to confirm the source of any airframe vibrations. If LCO is suspected in flight, immediately reduce airspeed (WITHOUT use of speed brakes, or changing aircraft configuration) to 270 KIAS, or until the vibration ceases, whichever indicated airspeed is lower.

DO NOT USE SPEED BRAKES FOR THE REMAINDER OF THE FLIGHT.

Use of the speed brakes in other emergencies is at the discretion of the flight crew. Remain at or below the indicated airspeed at which the vibration ceased for the remainder of the flight, but do not exceed 270 KIAS. Evaluate the need to land at the nearest practicable airport. Landing airport selection should be based upon consideration of all pertinent factors such as: weather, distance to destination, range available at the reduced airspeed, maximum landing weight, and possible airframe damage. Use of ground spoilers during landing rollout is permitted."

Elevator Tab Cleaning

(d) Within 250 flight cycles or 90 days after the effective date of this AD, whichever occurs first: Clean the external aerodynamic surfaces of the elevator tab to detect accumulated deicing/anti-icing fluid, residue, or other foreign substances, in accordance with the procedures for Airplane Cleaning in Section 12-40-00 (G) of Boeing 737-600/700/800/900 Maintenance Manual Document D633A101. Thereafter, repeat the tab cleaning procedure at least every 250 flight cycles or 90 days, whichever occurs first.

Balance Bay Cleaning

(e) For airplanes having line numbers 1 through 1091 inclusive: Prior to or concurrently with the accomplishment of the seal trim required by paragraph (f) of this AD, clean the elevator balance bays in accordance with Boeing Service Letter 737-SL-12-017, dated April 10, 2002. If the balance bays have been cleaned at least one time in accordance with paragraph (b)(2) of this AD, and if the seal trim has been accomplished in accordance with paragraph (f) of this AD, it is not necessary to repeat this procedure.

Seal Trim

(f) For airplanes having line numbers 1 through 1091 inclusive: Within 90 days after the effective date of this AD, trim the elevator balance bay seals in accordance with Boeing Alert Service Bulletin 737-55A1084, dated March 7, 2002. Following accomplishment of the seal trim required by this paragraph and the balance bay cleaning required by paragraph (e) of this AD, the optional repetitive cleaning procedures specified by paragraph (b)(2) of this AD are no longer necessary.

Post-LCO Inspection

(g) Before the next revenue flight following any suspected limit cycle oscillation (LCO) of the elevator tab: Inspect the airplane in accordance with a method approved by the Manager, Seattle ACO, FAA. For an inspection method to be approved by the Manager, Seattle ACO, as required by this paragraph, the Manager's approval letter must specifically refer to this AD.

Spare Parts

(h) As of the effective date of this AD, no person may install on any airplane an elevator balance panel bay seal having part number 183A9140-1, -5, or -9.

Alternative Methods of Compliance

(i) 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, FAA. 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 3: 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

(j) 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, provided the maximum operating airspeed is 270 knots indicated airspeed (KIAS) during the ferry flight.

Incorporation by Reference

(k) The modification required by paragraph (f) of this AD must be done in accordance with Boeing Alert Service Bulletin 737-55A1084, dated March 7, 2002; and Boeing Service Letter 737-SL-12-017, dated April 10, 2002. 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 98124-2207. 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.

Effective Date

(1) This amendment becomes effective on May 13, 2002.