

Boeing 737 Series Aeroplanes

**AIRWORTHINESS DIRECTIVE**

For the reasons set out in the background section, the CASA delegate whose signature appears below issues the following Airworthiness Directive (AD) under subregulation 39.1 (1) of CAR 1998. The AD requires that the action set out in the requirement section (being action that the delegate considers necessary to correct the unsafe condition) be taken in relation to the aircraft or aeronautical product mentioned in the applicability section: (a) in the circumstances mentioned in the requirement section; and (b) in accordance with the instructions set out in the requirement section; and (c) at the time mentioned in the compliance section.

**AD/B737/168**

**Main Wheel Well Junction Box  
Electrical Wire Chafing**

**12/2001**

**Applicability:** All Model 737-100, -200, -300, -400, and -500 series aeroplanes; and Model 737-600, -700, -800, and -900 series aeroplanes, line numbers 1 through 706 inclusive.

**Requirement:**

1. Perform a detailed visual inspection of the wire bundles in the four junction boxes formed by electrical disconnect brackets on the left and right sides of the main wheel wells to detect damage or chafing, as specified in Boeing Service Letter (SL) 737-SL-24-111-B, dated 16 January 2001.

*Note 1: For the purposes of this Directive, a detailed visual 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."*

2. If chafing is not detected during the Requirement 1 inspection, protect the wire bundles from chafing against the cover plate of the junction box in accordance with SL 737-SL-24-111-B.
3. If any chafing is detected during the Requirement 1 inspection, repair the wiring and protect the wire bundles from chafing against the cover plate of the junction box in accordance with SL 737-SL-24-111-B.

*Note 2: Boeing SL 737-SL-24-111-B refers to Boeing Standard Wiring Practices Manual D6-54446, Subject 20-10-13, as the appropriate source of repair instructions if any damaged wiring is found.*

*Note 3: FAA AD 2001-20-10 Amdt 39-12458 refers.*

**Compliance:** For Requirement 1 - Within 18 months after the effective date of this Directive.

For Requirement 2 - Before further flight.

For Requirement 3 - Before further flight.

This Airworthiness Directive becomes effective on 29 November 2001.

Background: This Directive requires inspection of wire bundles in main wheel well junction boxes to detect chafing or damage, the installation of protection for the wires bundles and, if necessary, repair of any damage to the wiring. These actions are intended to prevent wire damage, which could result in arcing and consequent fire in the main wheel well or passenger cabin, or inability to stop the flow of fuel to an engine or to the auxiliary power unit in the event of a fire.



Eugene Paul Holzapfel  
Delegate of the Civil Aviation Safety Authority

17 October 2001