

Sept.4/98

Subject: Transmittal of Revision 1 to Service Bulletin No. V2500-ENG-71-0185

Service Bulletin Revision History:

Event

Date

Basic Issue Revision 1 June 13/97 Sept.4/98

Reason for Issuance of Revision:

Change of Incorporation Points

Effect on Past Compliance:

None

List of Effective Pages:

Bulletin Rev.

Effective

Page No.

No.

Date

1 and 2

1 Basic Issue Sept.4/98

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June 13/97

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1

POWER PLANT - GENERAL SERVICES HARNESS (LOOM D) - INTRODUCTION OF REVISED CLIPPING

MODEL APPLICATION

V2500-D5

BULLETIN INDEX LOCATOR

71-00-00

Compliance Category Code

Internal Reference No.

EC96VR004

7

POWER PLANT - GENERAL SERVICES HARNESS (LOOM D) - INTRODUCTION OF REVISED CLIPPING

1. Planning Information

- A. Effectivity
 - (1) Aircraft:
 - (a) McDonnell Douglas MD-90
 - (2) Nacelle:
 - (a) V2500-D5 Nacelles prior to Serial No.N20119
- B. Concurrent Requirements

None.

C. Reason

R

(1) Condition:

Insufficient clearance can exist between the General Services Harness Loom 'D' and the hydraulic support bracket on the aircraft pylon structure.

(2) Background:

The problem has been reported by the airframe manufacturer.

(3) Objective:

Incorporation of this Service Bulletin is designed to maintain reliability.

(4) Substantiation:

The changes introduced by this Service Bulletin have been the subject of satisfactory engineering analysis and successful trial installation on production left hand and right hand engines.



(5) Effect of Bulletin on Workshop Procedures:

Removal/Installation Affected Disassembly/Assembly Not affected Cleaning Not affected Inspection/Check Not affected Repair Not affected Testing Not affected

Supplemental Information:

None.

D. Description

This Service Bulletin introduces a re-routed General services harness loom 'D' to provide additional clearance with the hydraulic support bracket on the aircraft pylon structure.

The changes introduced by this Service Bulletin are as follows:

- (a) Clip points CP2264, CP2324, CP2470 and CP2471 are deleted.
- (b) Clip points CP2548 and CP2561 are revised.

E. Approval

The part number changes and/or part modification described in Section 2 and 3 of this Service Bulletin has been shown to comply with the applicable Federal Aviation Regulations and are FAA-APPROVED for the Engine Model Listed.

F. Compliance

Category Code 7

Accomplish when supply of superseded parts has been depleted.

Manpower

Estimated man-hours to incorporate the full intent of this Bulletin.

	Venue		Estimated Man-Hours		
(1)	In service	••	••		Not applicable
(2)	At overhaul				15 minutes

- H. Material Price and Availability
 - (1) Modification kit is not required.
 - (2) See "Material Information" section for price and availability of future spares.
- I. Tooling Price and Availability

Special tools are not required.

- J. Weight and Balance
 - (1) Weight change None
 - (2) Moment arm No effect
 - (3) Datum Engine front mount centreline (Power Plant Station PPS 100)
- K. Electrical Load Data

This Service Bulletin has no effect on the aircraft electrical load.

L. References

None.

- M. Other Publications Affected
 - (1) The V2500 Engine Illustrated Parts Catalog (IPC), Chapter/Sections 71-51-56, 71-51-62 and 71-51-63.
 - (2) The McDonnell Douglas MD-90 Aircraft Maintenance Manual (AMM), Chapter/Section 71-51-61, PB401.
 - (3) The V2500 Engine Manual (EM), Chapter/Section 72-00-32, PB401.



2. Accomplishment Instructions

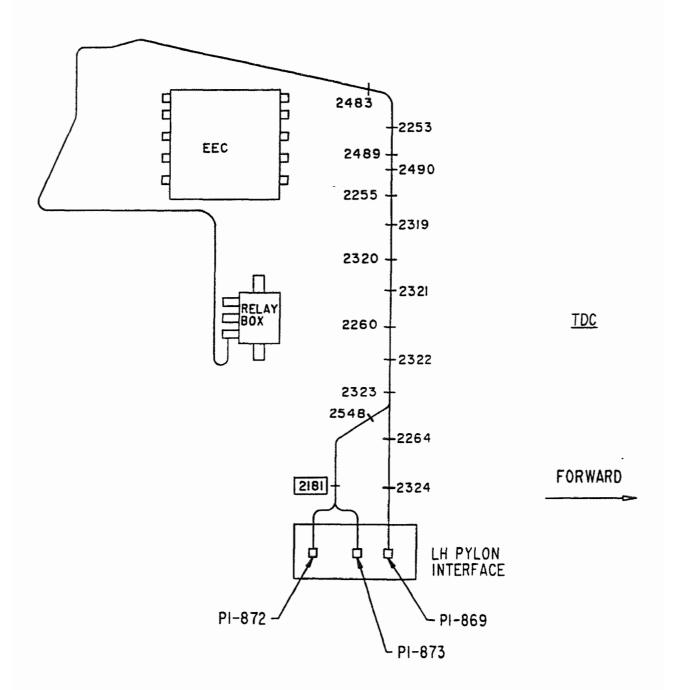
A. Rework Instructions

None

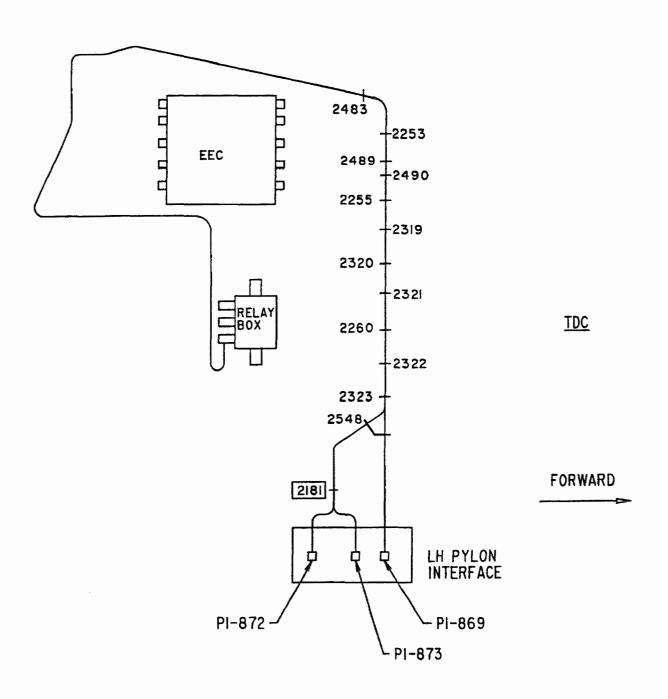
- B. Assembly Instructions
 - (1) Change the routing of Loom D at the pylon interface. (Refer to the MD-90 Aircraft Maintenance Manual (AMM), 71-51-61, PB401).
 - (a) For the left engine:
 - (i) Remove Loom D from CP2264 and CP2324.
 - (ii) Remove and discard CP2324.
 - (iii) Remove the loop clamp of Loom D from CP2264 (Refer to Fig.5).
 - (iv) With the loop clamp removed from CP2264, attach Loom D to CP2548 (Refer to Fig 4).
 - (b) For the right engine:
 - (i) Remove Loom D from CP2470 and CP2471.
 - (ii) Remove and discard CP2471.
 - (iii) Remove the loop clamp of Loom D from CP2470 (Refer to Fig.9).
 - (iv) With the loop clamp removed from CP2470, attach Loom D to CP2561 (Refer to Fig 8).
- C. Recording Instructions

A record of accomplishment is necessary.





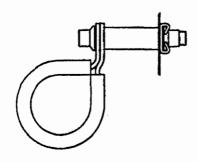
Schematic view of harness loom D left hand installation before change Fig ${\bf 1}$



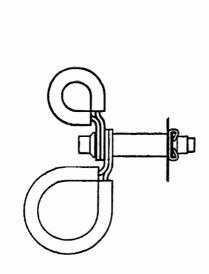
Schematic view of harness loom D left hand installation after change Fig 2



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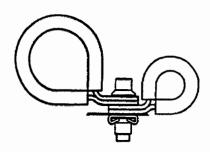


SCHEMATIC VIEW OF CLIP POINT 2548 LEFT HAND INSTALLATION BEFORE CHANGE



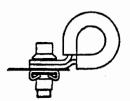


Clip point 2548 - Before and after alteration Fig 3



SCHEMATIC VIEW OF CLIP POINT 2264 LEFT HAND INSTALLATION BEFORE CHANGE

FORWARD

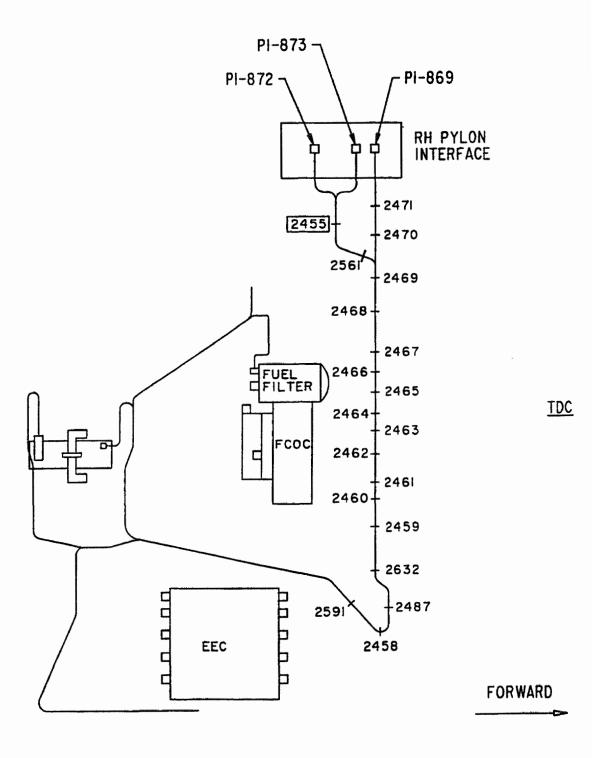


Clip point 2264 - Before and after alteration Fig 4

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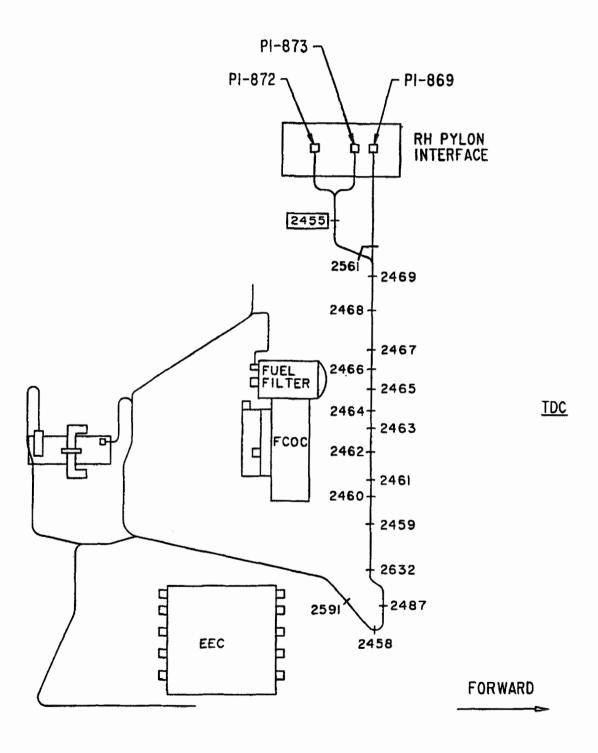




Schematic view of harness loom D right hand installation before change Fig 5

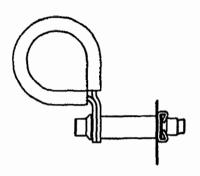


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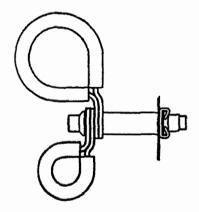


Schematic view of harness loom D right hand installation after change Fig 6





SCHEMATIC VIEW OF CLIP POINT 2561 RIGHT HAND INSTALLATION BEFORE CHANGE LOOKING FORWARDS



Clip point 2561 - Before and after alteration Fig 7

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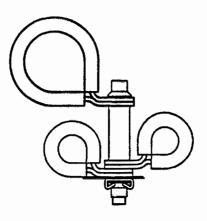
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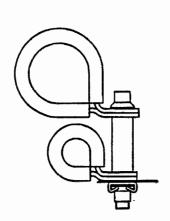
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SCHEMATIC VIEW OF CLIP POINT 2470 RIGHT HAND INSTALLATION BEFORE CHANGE



FORWARD

SCHEMATIC VIEW OF CLIP POINT 2470 RIGHT HAND INSTALLATION AFTER CHANGE

Clip point 2470 - Before and after alteration Fig 8

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3. Material Information

Applicability: For each V2500 Engine to incorporate this Bulletin.

A. Kits associated with this Bulletin:

None

B. Parts affected by this Bulletin:

New Part No. (ATA No.)	Qty	Est'd Unit Price (\$)	Keyword	Old Part No. (IPC No.)	Instructions Disposition
AS20909 (71-51-55)	1	3.66	Bolt, bihex hd (0.190 dia x 0.562) (CP2264)	- (05-525)	(C)(1D)
AS21426 (71-51-56)	1	7.94	Bolt, bihex hd (0.190 dia x 1.625) (CP2470)	- (05-541)	(C)(2D)
UP10482 (71-51-56)	1	13.40	Spacer (25 mm)(CP2470)	- (05 - 546)	(C)(3D)
- (71-51-62)	1		Bolt, bihex hd (0.190 dia x 0.438) (CP2324)	AS20907 (01-125)	(A)(B)
- (71-51-62)	1		Clamp, loop, style, cushion (0.312 dia) (CP2324)	AS62505 (01-128)	(A)(B)
- (71-51-62)	1		Nut, A/O self locking (0.190 dia)(CP2324)	4W0043 (01-132)	(A)(B)
- (71-51-62)	1		Bolt, bihex hd (0.190 dia x 0.562) (CP2264)	AS20909 (01-133)	(4D)
- (71–51–62)	1		Clamp, loop, style, cushion (0.132 dia) (CP2264)	AS62505 (01-136)	(A)(B)
4W0117 (71-51-62)	1	10.00	Bolt, machine double hex (0.190 dia x 1.375) (CP2548)	4W0116 (01-237)	(B)(E)(S1)
AS62505 (71-52-62)	1	9.06	Clamp, loop, style, cushion (0.312 dia) (CP2548)	- (01-239)	(C)(E)



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New Part No. (ATA No.)	Qty	Est'd Unit Price (\$)	Keyword	Old Part No. (IPC No.)	Instructions Disposition
- (71-51-63)	1		Bolt, bihex hd (0.190 dia x 0.438) (CP2471)	AS20907 (01-125)	(A)(B)
- (71-51-63)	1		Clamp, loop, style, cushion (0.312 dia) (CP2471)	AS62505 (01-128)	(A) (B)
- (71 - 51-63)	1		Nut, A/O self locking (0.190 dia)(CP2471)	4W0043 (01-132)	(A)(B)
- (71-51-63)	1		Bolt, bihex hd (0.190 dia x 1.625) (CP2470)	AS21426 (01-133)	(5D)
- (71-51-63)	1		Clamp, loop, style, cushion (0.312 dia) (CP2470)	AS62505 (01-136)	(A)(B)
- (71~51 - 63)	1		Spacer (25 mm)(CP2470)	UP10482 (01-138)	(6D)
4W0117 (71-51-63)	1		Bolt, machine double hex (0.190 dia x 1.375) (CP2561)	4W0116 (01-269)	(B)(E)(S1)
AS62505 (71-51-63)	1		Clamp, loop, style, cushion (0.312 dia) (CP2561)	- (01-271)	(C)(E)

Instructions Disposition Codes:

- (A) Redundant part.
- Old part may be used up on other applications.
- (C) Additional part.
- (E) New part is currently available.
- (S1) Old and new parts are not interchangeable.
- (1D) Transferred from ATA 71-51-62 UIN 01-133.
- (2D) Transferred from ATA 71-51-63 UIN 01-133.
- (3D) Transferred from ATA 71-51-63 UIN 01-138.
- (4D) Transferred to ATA 71-51-55 UIN 05-525. (5D) Transferred to ATA 71-51-56 UIN 05-541.
- (6D) Transferred to ATA 71-51-56 UIN 05-546.

NOTE: The estimated 1997 unit prices shown are provided for planning purposes only and do not constitute a firm quotation. Consult the IAE Price Catalog or contact IAE's Spare Parts Sales Department for information concerning firm prices.

