

NACELLE - EXHAUST – THRUST REVERSER - LOWER OUTBOARD TRACK BEAM – MODIFICATION OF

### **MODEL APPLICATION**

V2500-D5

### **BULLETIN INDEX LOCATOR**

78-00-00

Compliance Category Code

August 7, 2000

Internal Reference No.

JG 97VN325C

V2500-NAC-78-0175

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1. Planning Information

# V2500 Propulsion System - Nacelle SERVICE BULLETIN

## NACELLE - EXHAUST – THRUST REVERSER - LOWER OUTBOARD TRACK BEAM – MODIFICATION OF

	A.	Effectivity					
		(1)	Aircraft				
			(a) Boeing MD90				
(2) Nacelle							
			(a) V2500-D5 thrust reverser serial numbers prior to 0701001 on which service bulletin V2500-NAC-78-0151 could not be done without first doing this modification.				
	B.	Reason					
		(1)	Condition				
			The latch access door latch striker lands of some lower thrust reverser half outboard track beams can be damaged by the latch striker such that service bulletin V2500-NAC-78-0151 cannot be done.				
		(2)	Background				
			The latch access door latch striker lands of some lower thrust reverser half outboard track beams have been damaged by the latch such that service bulletin V2500-NAC-78-0151 cannot				

be done.

Objective

(3)

(4)

By analysis.

Substantiation

NAC-78-0151 to be done.

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To restore the lower outboard track beam to a condition which allows service bulletin V2500-



#### (5) Effect of Bulletin on:

(a)	Removal/Installation	Affected
(b)	Disassembly/Assembly	Not Affected
(c)	Cleaning	Not Affected
(d)	Inspection/Check	Affected
(e)	Repair	Affected
(f)	Testing	Not Affected

### C. Description

The lower thrust reverser half outboard track beams have been damaged such that service bulletin V2500-NAC-78-0151 cannot be done. This bulletin installs steel fittings so that service bulletin V2500-NAC-78-0151 can be done.

#### D. Approval

Incorporation of this Service Bulletin must be accomplished only in conjunction with Boeing Service Bulletin MD90 78-038 which has received exclusive FAA approval for MD-90 Series aircraft.

### E. Compliance

Category 8

Accomplish based upon experience with the prior configuration.



## **SERVICE BULLETIN**

#### F. Manpower

<u>VENUE</u> <u>ESTIMATED MANHOURS</u>

(1) In Service

(a) To gain access 0.0 M/Hrs.

(b) To rework 4.0 M/Hrs.

(c) To return to service 0.0 M/Hrs.

Total 4.0 M/Hrs.

NOTE: Labor hours are provided for planning purposes only. No labor reimbursement is provided under the terms of this service bulletin offering.

#### G. Material Cost and Availability

The parts to accomplish this service bulletin are available from the supplier as kits V2578175-551 (left thrust reverser) and V2578175-552 (right thrust reverser) at no cost to the operator.

Operators with units listed in Paragraph 1.A. should submit a no-charge purchase order for the applicable quantity of kits. The purchase order must specify this service bulletin number and only the parts listed herein. Operators will have one year from the issue date of the service bulletin to place an order. After one year, kits will no longer be available and operators will have to order parts individually at catalog prices, if they desire to incorporate the change:

Direct Purchase order to: Rohr, Inc. 850 Lagoon Drive Chula Vista, CA 91910-2098 U.S.A.

Attn: Airline Account Manager - MZ 107A

(Ref. Service Bulletin No. V2500-NAC-78-0175)

NOTE: Please do not submit orders for service bulletin kits via Spec 2000 ordering system.

### H. Tooling - Cost and Availability

None required.

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I. Weight and Balance

(1) Weight change(2) Moment arm

None No effect

(3) Datum

Engine Front Mount Centreline (Powerplant Station PPS 100.0)

J. Electrical Load Data

Not affected.

K. References

Manual Chapter/Section

IAE V2500 Standard Practices/Processes Manual (SPP-V2500-1IA)

70-09-00

Overhaul Processes and Consumable Index (PCI-V2500-1IA)

Service Bulletin V2500-NAC-78-0151

L. Other Publications Affected

None.



- **Accomplishment Instructions** 
  - A. Pre-requisite Instructions

None.

Install the fittings on the lower outboard track beam.

NOTE: This procedure is the same for the left and right thrust reverser. Part numbers for the right thrust reverser are shown in parenthesis.

- (1) Remove material from the notches on the lower outboard track assembly as shown in Figure 1.
- If necessary, remove material from the heatshield to make space for the 290K0002 fittings. (2)
  - Remove material from the heatshield to make space for the 290K0002 fittings. (a)
  - SOLVENT (COMAT 01-438) IS CLASSIFIED AS A HAZARDOUS WARNING: MATERIAL WHICH MAY CAUSE INJURY OR ILLNESS IF NOT PROPERLY USED. THIS PRODUCT SHOULD BE USED ONLY IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFIC SAFETY AND HEALTH RECOMMENDATIONS. PRIOR TO USE OF THIS PRODUCT, CAREFULLY READ THE APPLICABLE "MATERIAL SAFETY DATA SHEET" AND FOLLOW ALL LISTED SAFETY AND

**HEALTH RECOMMENDATIONS** 

(b) Clean the edges of the modified heatshield areas with a lint free cloth (CoMat 02-099) made moist with solvent (CoMat 01-438). Wipe the surfaces dry before the solvent becomes dry.

WARNING:

PRIMER (COMAT 08-032) IS CLASSIFIED AS A HAZARDOUS MATERIAL WHICH MAY CAUSE INJURY OR ILLNESS IF NOT PROPERLY USED. THIS PRODUCT SHOULD BE USED ONLY IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFIC SAFETY AND HEALTH RECOMMENDATIONS. PRIOR TO USE OF THIS PRODUCT, CAREFULLY READ THE APPLICABLE "MATERIAL SAFETY DATA SHEET" AND FOLLOW ALL LISTED SAFETY AND

**HEALTH RECOMMENDATIONS** 

Apply primer (CoMat 08-032) to the modified areas of the heat shield. Refer to the (c) manufacturer's instructions.

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## SERVICE BULLETIN

WARNING:

SEALANT (COMAT 08-030) IS CLASSIFIED AS A HAZARDOUS MATERIAL WHICH MAY CAUSE INJURY OR ILLNESS IF NOT PROPERLY USED. THIS PRODUCT SHOULD BE USED ONLY IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFIC SAFETY AND HEALTH RECOMMENDATIONS. PRIOR TO USE OF THIS PRODUCT, CAREFULLY READ THE APPLICABLE "MATERIAL SAFETY DATA SHEET" AND FOLLOW ALL LISTED SAFETY AND HEALTH RECOMMENDATIONS

- (d) Mix the sealant (CoMat 08-030). Refer to the manufacturer's instructions.
- (e) Seal the edges of the heat shield with sealant (CoMat 08-030).
- (f) Cure the sealant. Refer to the manufacturer's instructions.
- (3) Clean the track beam and the fittings with a lint free cloth (CoMat 02-099) made moist with solvent (CoMat 01-438). Wipe the surfaces dry before the solvent becomes dry.
- WARNING: CONVERSION COATING (COMAT 07-106) IS CLASSIFIED AS A HAZARDOUS MATERIAL WHICH MAY CAUSE INJURY OR ILLNESS IF NOT PROPERLY USED. THIS PRODUCT SHOULD BE USED ONLY IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFIC SAFETY AND HEALTH RECOMMENDATIONS. PRIOR TO USE OF THIS PRODUCT, CAREFULLY READ THE APPLICABLE "MATERIAL SAFETY DATA SHEET" AND FOLLOW ALL LISTED SAFETY AND HEALTH RECOMMENDATIONS.
- (4) Apply conversion coating (CoMat 07-106) to the bare metal in the modification areas of the track beam. Refer to the manufacturer's instructions.
- WARNING: CATALYST (COMAT 07-139), EPOXY PRIMER (COMAT 07-140), AND THINNER (07-144) ARE CLASSIFIED AS HAZARDOUS MATERIALS WHICH MAY CAUSE INJURY OR ILLNESS IF NOT PROPERLY USED. THESE PRODUCTS SHOULD BE USED ONLY IN ACCORDANCE WITH THE MANUFACTURER'S SPECIFIC SAFETY AND HEALTH RECOMMENDATIONS. PRIOR TO USE OF THESE PRODUCTS, CAREFULLY READ THE APPLICABLE "MATERIAL SAFETY DATA SHEET" AND FOLLOW ALL LISTED SAFETY AND HEALTH RECOMMENDATIONS.
- (5) Mix the catalyst (CoMat 07-139), epoxy primer (CoMat 07-140), and thinner (CoMat 07-0144). Refer to the manufacturer's instructions.
- (6) Apply primer to exposed areas on the track beam and to the mating surfaces of the 290K0002 fittings. Refer to the manufacturer's instructions.
- (7) Cure the primer. Refer to the manufacturer's instructions.

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## **SERVICE BULLETIN**

WARNING: RELEASE AGENT (COMAT 02-158) IS CLASSIFIED AS A HAZARDOUS

MATERIAL WHICH MAY CAUSE INJURY OR ILLNESS IF NOT PROPERLY USED. THIS PRODUCT SHOULD BE USED ONLY IN ACCORDANCE WITH

THE MANUFACTURER'S SPECIFIC SAFETY AND HEALTH

RECOMMENDATIONS. PRIOR TO USE OF THIS PRODUCT, CAREFULLY READ THE APPLICABLE "MATERIAL SAFETY DATA SHEET" AND FOLLOW

ALL LISTED SAFETY AND HEALTH RECOMMENDATIONS.

WARNING: LIQUID SHIM (COMAT 08-021) IS CLASSIFIED AS A HAZARDOUS

MATERIAL WHICH MAY CAUSE INJURY OR ILLNESS IF NOT PROPERLY USED. THIS PRODUCT SHOULD BE USED ONLY IN ACCORDANCE WITH

THE MANUFACTURER'S SPECIFIC SAFETY AND HEALTH

RECOMMENDATIONS. PRIOR TO USE OF THIS PRODUCT, CAREFULLY

READ THE APPLICABLE "MATERIAL SAFETY DATA SHEET" AND FOLLOW

ALL LISTED SAFETY AND HEALTH RECOMMENDATIONS.

- (8) Put the 290K0002-3 (-4) and 290K0002-5 (-6) fittings into position on the lower track beam. Make sure the fittings are even (flush with the outer surface and edge of the track beam and centered as much as possible in the notches. Use liquid shim (CoMat 08-021) (0.030 inch (0,76 mm) maximum thickness) and the S700S0497-199 shims to fill the spaces between the fittings and the track beam. Use release agent (CoMat 02-158) to keep the liquid shim from sticking to the S700S0497-199 shims and the 290K0002 fittings. Refer to Figure 1.
- (9) Drill the holes for the HL41V-6-4 and HL40V-6-5 pins through the track beam, the 290K0002 fittings, and shims (if any).
- (10) Install the 290K0002 fittings on the track beam with the HL41V-6-4 pins, HL40V-6-5 pins, and HL97V-6 collars. Wet install the fasteners with primer mix.

#### C. Recording Instructions

A record of accomplishment is necessary. Write in the applicable records and metal stamp, vibroetch, or electro etch on the thrust reverser assembly data plate that Service Bulletin V2500-NAC-78-0175 has been done. Refer to IAE V2500 Standard Practices/Processes Manual, Chapter 70-09-00.

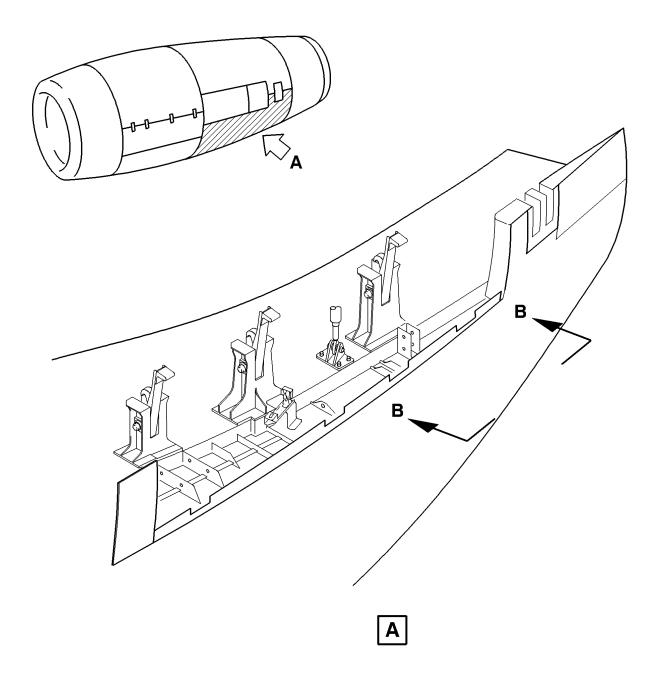
#### D. Post-requisite instructions

(1) Do service bulletin V2500-NAC-78-0151.

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## **SERVICE BULLETIN**



VSB709

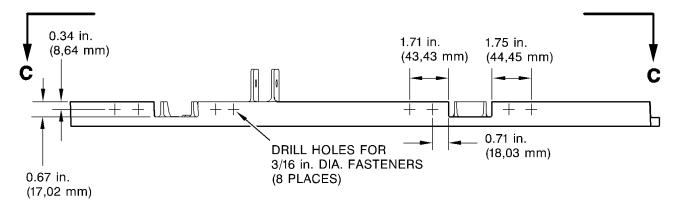
Lower Outboard Track Beam Fittings Installation Figure 1 (sheet 1)

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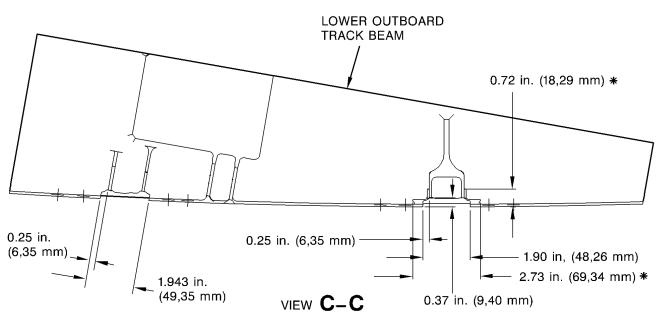
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## **SERVICE BULLETIN**



VIEW **B-B**FASTENER HOLE PATTERN
AND MATERIAL REMOVAL DIMENSIONS



MATERIAL REMOVAL DIMENSIONS

\* REMOVE MINIMUM FILLET MATERIAL AS REQUIRED SO THAT 290K0002 FITTING WILL FIT FLUSH AGAINST TRACK BEAM SURFACE.

VSB710

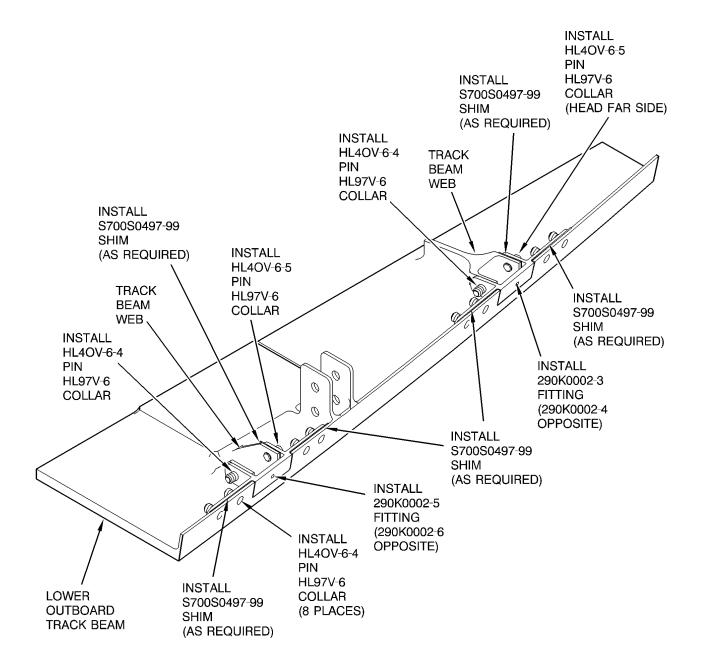
Lower Outboard Track Beam Fittings Installation Figure 1(sheet 2)

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## **SERVICE BULLETIN**



VSB711

Lower Outboard Track Beam Fittings Installation Figure 1 (sheet 3)

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## 3. Material Information

Applicability: For each V2500-D5 thrust reverser to incorporate this Bulletin.

## A. Kits Associated with this Bulletin:

NEW PART NO. (ATA NO.)	<u>QTY</u>	EST'D UNIT <u>PRICE</u>	<u>KEYWORD</u>	OLD PART NO. (IPC NO.)	INSTR/ DISPOS
V2578175-551 Consisting of:	1	\$1597.00	Kit, LH Nacelle		A
290K0002-3 290K0002-5 HL40V-6-4 HL40V-6-5 HL41V-6-4 HL41-6-4 HL97V-6 S700S0497-199	1 1 2 2 8 8 8		Fitting Fitting Pin Pin Pin Pin (alternate for HL41V-6-4) Collar Shim		
NEW PART NO. (ATA NO.)	<u>QTY</u>	EST'D UNIT <u>PRICE</u>	<u>KEYWORD</u>	OLD PART NO. (IPC NO.)	INSTR/ DISPOS
V2578175-552 Consisting of:	1	\$1597.00	Kit, RH Nacelle		A
290K0002-4 290K0002-6 HL90V-6-4 HL40V-6-5 HL41V-6-4 HL41-6-4	1 1 2 2 8 8 8		Fitting Fitting Pin Pin Pin Pin (alternate for HL41V-6-4) Collar Shim		

B. Parts affected by this Bulletin:

None.

- C. Instruction/Disposition Code Statements
  - (A) Kits are available.

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<u>NOTE</u>: The estimated 2000 unit prices shown are provided for planning purposes only and do not

constitute a firm quotation. Consult the Rohr Price Catalog or contact Rohr's Customer

Support Department for information concerning firm prices.

## D. Materials Required to Incorporate this Service Bulletin:

CoMat 01-438	Solvent
CoMat 02-099	Lint free cloth
CoMat 02-158	Release agent
CoMat 07-106	Chromate conversion coating for aluminum
CoMat 07-139	Catalyst
CoMat 07-140	Epoxy primer
CoMat 07-144	Thinner
CoMat 08-021	Adhesive (liquid shim)
CoMat 08-030	Sealant
CoMat 08-032	Primer

<u>NOTE</u>: To identify the consumable materials, refer to the Overhaul Processes and Consumable

Index PCI-V2500-1IA.