



Date: Jul.26/00

Subject: Transmittal of Revision 1 To Service Bulletin Number
V25000-ENG-72-0327.

Service Bulletin Revision History:

<u>Event</u>	<u>Date</u>
Basic Issue	Oct.25/98
Revision 1	Jul.26/00

Reason For Issuance Of Revision:

- (1) To add model pages 1, 2, and 5.
- (2) To revise Effectivity page 2.
- (3) To correct nomenclature in Material Information section for part number 2A3426 page 5.
- (4) Revised IPC references page 4.
- (5) Editorial corrections pages 9 to 11.
- (6) Bulletin revised and reformatted to the latest specifications.

Effect on Prior Compliance:

None.

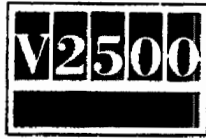
List of Effective Pages:

<u>Bulletin Page No.</u>	<u>Rev. No.</u>	<u>Effective Date</u>
1 and 2	1	Jul.26/00
3	Basic	Oct.25/98
4 to 11	1	Jul.26/00

V2500-ENG-72-0327

Transmittal

Page 1 of 1



International Aero Engines SERVICE BULLETIN

ENGINE - HIGH PRESSURE TURBINE ROTOR AND STATOR ASSEMBLY - INTRODUCE NEW
ROTATING PARTS WITH POTENTIAL FOR INCREASED CYCLIC LIFE

MODEL APPLICATION

V2522-A5
V2524-A5
V2527-A5
V2527E-A5
V2527M-A5
V2530-A5
V2533-A5
V2525-D5
V2528-D5

BULLETIN INDEX LOCATOR

72-45-00

Compliance Category Code

7

Internal Reference No.

98VA013

Oct.25/98

Revision 1 Jul.26/00

V2500-ENG-72-0327

Page 1 of 11



International Aero Engines SERVICE BULLETIN

ENGINE - HIGH PRESSURE TURBINE ROTOR AND STATOR ASSEMBLY - INTRODUCE NEW
ROTATING PARTS WITH POTENTIAL FOR INCREASED CYCLIC LIFE

1. Planning Information

A. Effectivity

(1) Aircraft: Airbus A320, A321

McDonnell Douglas MD-90

(2) Engine:

V2522-A5 Engines before Serial No. V10477

V2524-A5 Engines before Serial No. V10477

V2527-A5 Engines before Serial No. V10477

V2527E-A5 Engines before Serial No. V10477

V2527M-A5 Engines before Serial No. V10477

V2530-A5 Engines before Serial No. V10477

V2533-A5 Engines before Serial No. V10477

V2525-D5 Engines before Serial No. V20249

V2528-D5 Engines before Serial No. V20249

B. Reason

(1) Condition:

Provide new High Pressure Turbine (HPT) Rotating Hardware with the
potential for increased cyclic life.

(2) Background:

Not applicable.

(3) Objective:

To decrease the cost of V2500 ownership.

(4) Substantiation

Engineering analysis has determined that the new parts have the
potential for increased cyclic lives.

(5) Effects of Bulletin on Workshop Procedures:

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

Oct.25/98

Revision 1 Jul.26/00

V2500-ENG-72-0327

Page 2

Printed in Great Britain



International Aero Engines

SERVICE BULLETIN

(6) Supplemental Information

None.

C. Description

- (1) This Service Bulletin introduces a new Stage 1 and 2 HPT Air Seal, a new Stage 1 and 2 Hub and a new Stage 2 Sideplate.
- (2) For effect on declared life, see Reference 3 or 4, Engine Manual, Chapter/Section 5-10-01.

D. Approval

The Part Number Changes and/or part modifications described in Section 2 and 3 of this Service Bulletin have been shown to comply with the applicable Federal Aviation Regulations and are FAA-APPROVED for the Engine Model listed.

The 'compliance' statement and the procedures described in paragraph F of this Service Bulletin have been shown to comply with the applicable Federal Aviation Regulations and are FAA-Approved for the Engine Model listed.

E. Compliance

Category 7

Accomplish when supply of superseded parts has been depleted.

F. Manpower

Estimated Manhours to incorporate the full intent of this Bulletin:

Venue

Estimated Manhours

- | | |
|-----------------|----------------|
| (1) In service | Not applicable |
| (2) At overhaul | Not applicable |

G. Material - Price and Availability

- (1) Modification kit is not required. Parts are supplied as single line items.
- (2) See "Material Information" section for prices and availability of future spares.

H. Tooling - Price and Availability

Special tools are not required to accomplish this Service Bulletin.

I. Weight and Balance

- | | |
|-------------------|--|
| (1) Weight change | None |
| (2) Moment arm | No effect |
| (3) Datum | Engine Front mount Centerline
(Power Plant station (PPS) 100) |

J. Electrical Load Data

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

Oct.25/98

V2500-ENG-72-0327

Page 3



International Aero Engines SERVICE BULLETIN

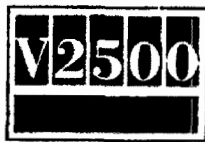
K. References

- (1) The V2500-A5 Engine Illustrated Parts Catalog (S-V2500-2IA, S-V2500-2IB, S-V2500-5IA, S-V2500-5IB, S-V2500-6IA, S-V2500-6IB, S-V2500-7IA, S-V2500-7IB), Chapter/Section 72-45-00, 72-45-11, 72-45-12, 72-45-13, 72-45-31 and 72-45-33
- (2) The V2500-D5 Engine Illustrated Parts Catalog (S-V2500-3IA, S-V2500-3IB) Chapter/Section 72-45-00, 72-45-11, 72-45-12, 72-45-13, 72-45-31 and 72-45-33
- (3) The V2500 Engine Manual (E-V2500-1IA), Chapter/Section 72-45-00, 72-45-10 and 72-45-30, Assembly
- (4) The V2500-D5 Engine Manual (E-V2500-3IA), Chapter/Section 72-45-00, 72-45-10 and 72-45-30, Assembly

L. Other Publications Affected

- (1) The V2500-A5 Engine Illustrated Parts Catalog (S-V2500-2IA, S-V2500-2IB, S-V2500-5IA, S-V2500-5IB, S-V2500-6IA, S-V2500-6IB, S-V2500-7IA, S-V2500-7IB), Chapter/Section 72-45-00, 72-45-11, 72-45-12, 72-45-13, 72-45-31 and 72-45-33
- (2) The V2500-D5 Engine Illustrated Parts Catalog (S-V2500-3IA, S-V2500-3IB) Chapter/Section 72-45-00, 72-45-11, 72-45-12, 72-45-13, 72-45-31 and 72-45-33
- (3) The V2500 Engine Manual (E-V2500-1IA), Chapter/Section 72-45-00, 72-45-10 and 72-45-30, Assembly
- (4) The V2500-D5 Engine Manual (E-V2500-3IA), Chapter/Section 72-45-00, 72-45-10 and 72-45-30, Assembly

Printed in Great Britain



International Aero Engines

SERVICE BULLETIN

2. Material Information

A. Kit 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
------------------------------	-----	----------------------------	---------	------------------------------	-----------------------------

Applicability: For each V2522-A5 V2524-A5 V2527-A5 V2527E-A5 V2527M-A5 V2530-A5 V2533-A5 V2525-D5 V2528-D5 Engine to incorporate this Service Bulletin

2A3425 (72-45-00)	1		.Seal, Air, HPT, Stage 2	2A3179 (01-082)	(S1)(A)(B)
2A9021 (72-45-10)	1		Turbine Rotor Stage 1, Assy.	- (01-010)	(S1)(C)
- (72-45-10)	1		Turbine Rotor Stage 1, Assy.	2A9021 (01-010)	
2A5001 (72-45-11)	1		.Hub, Turbine Stage 1, HPT	2A2801 (01-011)	(S1)(A)(B)
2A3423 (72-45-12)	1		.Seal, Air, HPT, Stage 1	2A1350 (01-040)	(S1)(A)(B)
2A3424 (72-45-13)	1		.Seal, Air, HPT, Stage 1	2A3086 (01-020)	(S1)(A)(B)
2A2622 (72-45-30)	1		Turbine Rotor Stage 2, Assy.	- (01-010)	(S1)(C)
- (72-45-30)	1		Turbine Rotor Stage 2, Assy.	2A2622 (01-010)	
2A4802 (72-45-31)	1		.Hub, Turbine Stage 2, HPT	2A3002 (01-011)	(S1)(A)(B)
2A3426 (72-45-33)	1		.Plate-Rtng, Blade, HPT, 2 Stg	2A2097 (01-020)	(S1)(A)(B)

C. Consumable Materials

D. Instructions/Disposition Code Statements:

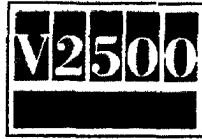
(S1)Old and New Parts are freely and fully interchangeable

(A) The new part is currently available.

(B) The old part will no longer be supplied.

(C) The new part will be supplied on a lead time quotation basis only.

NOTE: The estimated 1998 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.



International Aero Engines SERVICE BULLETIN

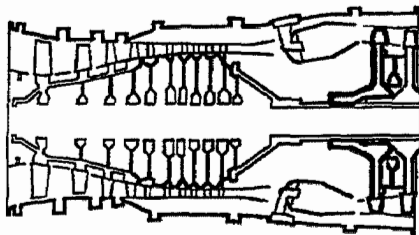
3. Accomplishment Instructions

- A. Install a new Stage 1 High Pressure Turbine Hub and new Stage 1 High Pressure Turbine Air Seals when you assemble the 2A9021 Stage 1 Turbine Rotor Assembly by Figure 1 and as follows:
- (1) Install the 2A5001 Stage 1 High Pressure Turbine Hub by the procedure given in Reference 4 or 5, Engine Manual, Chapter/Section 72-45-10, Assembly.
 - (2) Install the 2A3423 Stage 1 High Pressure Turbine Air Seal by the procedure given in Reference 4 or 5, Engine Manual, Chapter/Section 72-45-10, Assembly.
 - (3) Install the 2A3424 Stage 1 High Pressure Turbine Air Seal by the procedure given in Reference 4 or 5, Engine Manual, Chapter/Section 72-45-10, Assembly.
- B. Install a new Stage 2 High Pressure Turbine Hub and a new Stage 2 High Pressure Turbine Blade Retaining Plate when you assemble the 2A2622 Stage 2 Turbine Rotor Assembly by Figure 2 and as follows:
- (1) Install the 2A4802 Stage 2 High Pressure Turbine Hub by the procedure given in Reference 4 or 5, Engine Manual, Chapter/Section 72-45-30, Assembly.
 - (2) Install the 2A3426 Stage 2 High Pressure Turbine Blade Retaining Plate by the procedure given in Reference 4 or 5, Engine Manual, Chapter/Section 72-45-30, Assembly.
- C. Install the 2A3425 Stage 2 High Pressure Turbine Air Seal when you assemble the High Pressure Turbine Rotor And Stator Assembly by the procedure given in Reference 4 or 5, Engine Manual, Chapter/Section 72-45-00, Assembly.

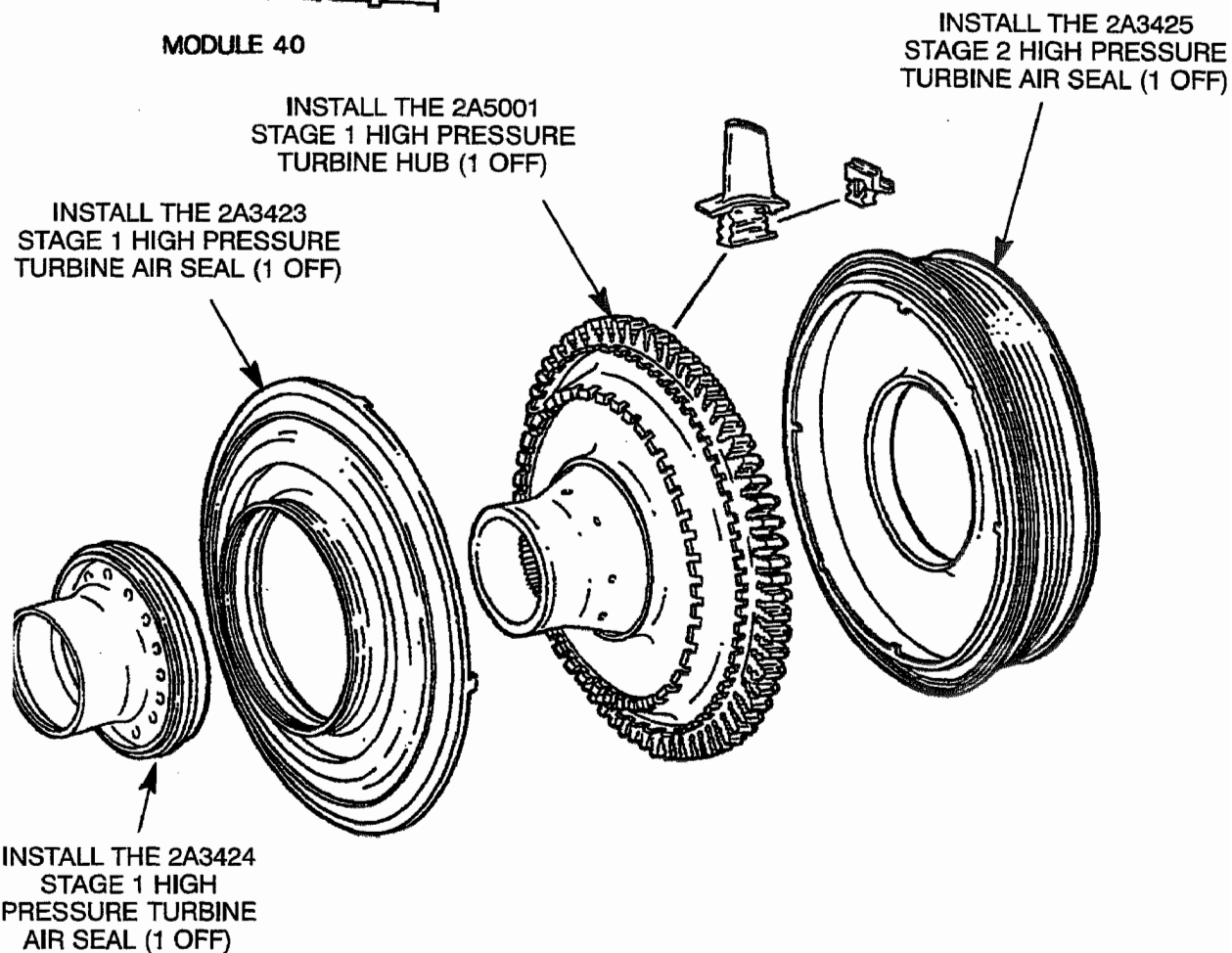
Printed in Great Britain



International Aero Engines SERVICE BULLETIN



MODULE 40



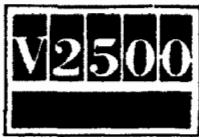
E8026

Location Of The Stage 1 High Pressure Turbine Hub and The Stage 1 And 2 High Pressure Turbine Air Seals
Figure 1

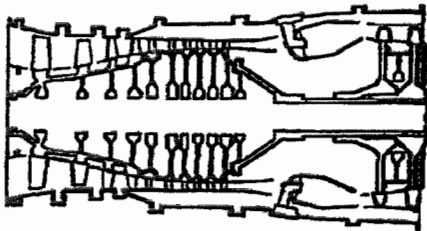
Oct.25/98
Revision 1 Jul.26/00

V2500-ENG-72-0327

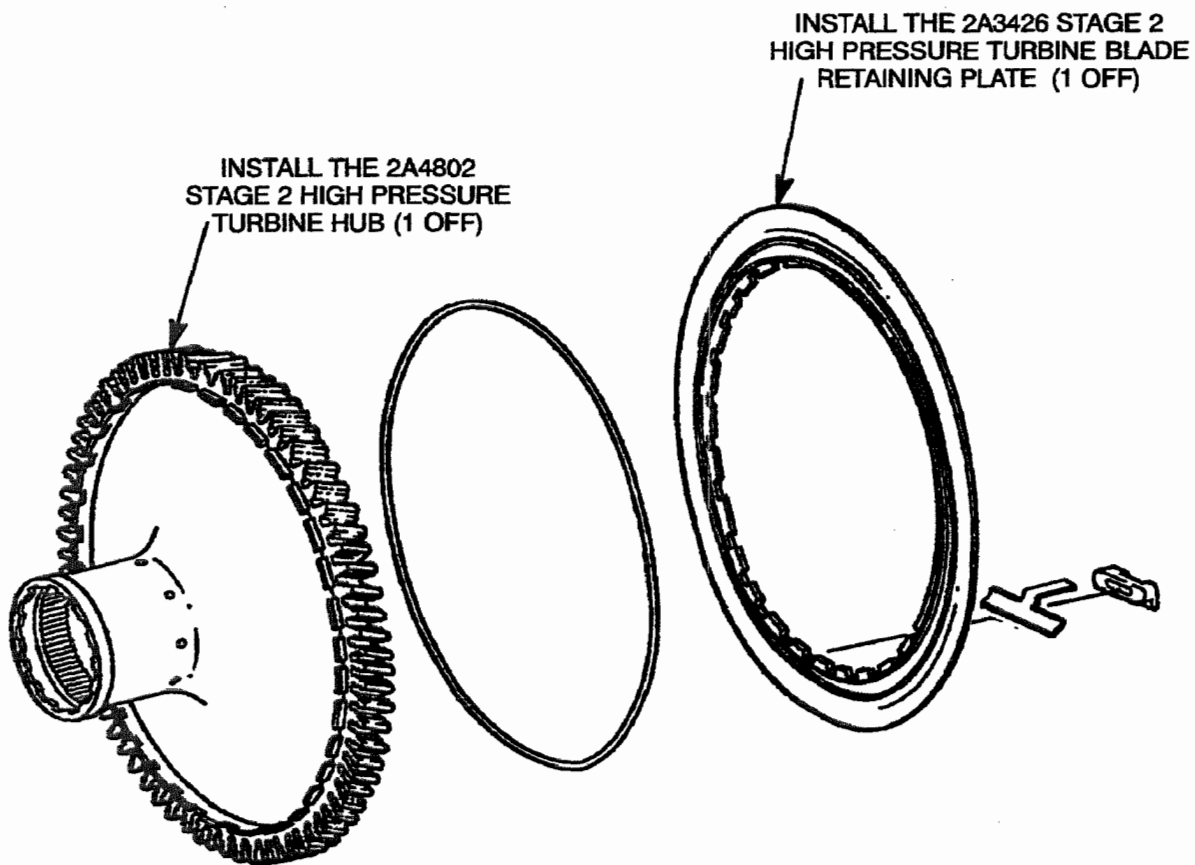
Page 7



International Aero Engines
SERVICE BULLETIN



MODULE 40



E8027

Location Of The Stage 2 High Pressure Turbine Hub and Blade Retaining Plate
Figure 2



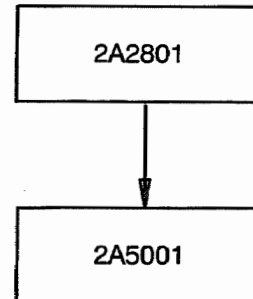
International Aero Engines SERVICE BULLETIN

MODIFICATIONS

BASE LINE

V2500-ENG-72-0327 ENGINE - HIGH
PRESSURE TURBINE ROTOR AND STATOR
ASSEMBLY - INTRODUCE NEW ROTATING
PARTS WITH POTENTIAL FOR INCREASED
CYCLIC LIFE

PART NUMBER CHANGE



E8028A

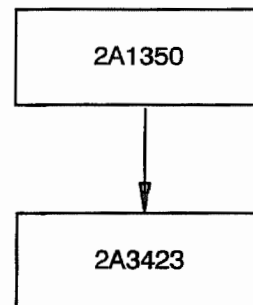
Family Tree - Stage 1 High Pressure Turbine Hub
Ref. Catalog Sequence No. 72-45-11. Fig. 01 Item 011
Figure 3

MODIFICATIONS

BASE LINE

V2500-ENG-72-0327 ENGINE - HIGH
PRESSURE TURBINE ROTOR AND STATOR
ASSEMBLY - INTRODUCE NEW ROTATING
PARTS WITH POTENTIAL FOR INCREASED
CYCLIC LIFE

PART NUMBER CHANGE



E8029A

Family Tree - Stage 1 High Pressure Turbine Air Seal
Ref. Catalog Sequence No. 72-45-12. Fig. 01 Item 040
Figure 4

Oct.25/98
Revision 1 Jul.26/00

V2500-ENG-72-0327

Page 9



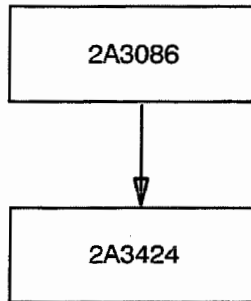
International Aero Engines SERVICE BULLETIN

MODIFICATIONS

BASE LINE

V2500-ENG-72-0327 ENGINE - HIGH
PRESSURE TURBINE ROTOR AND STATOR
ASSEMBLY - INTRODUCE NEW ROTATING
PARTS WITH POTENTIAL FOR INCREASED
CYCLIC LIFE

PART NUMBER CHANGE



E8030A

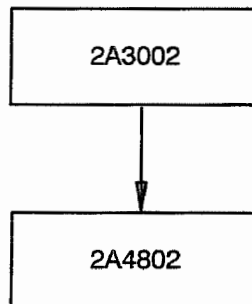
Family Tree - Stage 1 High Pressure Turbine Air Seal
Ref. Catalog Sequence No. 72-45-13. Fig. 01 Item 020
Figure 5

MODIFICATIONS

BASE LINE

V2500-ENG-72-0327 ENGINE - HIGH
PRESSURE TURBINE ROTOR AND STATOR
ASSEMBLY - INTRODUCE NEW ROTATING
PARTS WITH POTENTIAL FOR INCREASED
CYCLIC LIFE

PART NUMBER CHANGE



E8031A

Family Tree - Stage 2 High Pressure Turbine Hub
Ref. Catalog Sequence No. 72-45-31. Fig. 01 Item 011
Figure 6

Oct.25/98
Revision 1 Jul.26/00

V2500-ENG-72-0327

Page 10

Printed in Great Britain



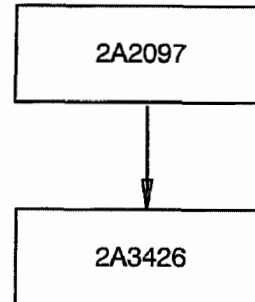
International Aero Engines SERVICE BULLETIN

MODIFICATIONS

BASE LINE

V2500-ENG-72-0327 ENGINE - HIGH
PRESSURE TURBINE ROTOR AND STATOR
ASSEMBLY - INTRODUCE NEW ROTATING
PARTS WITH POTENTIAL FOR INCREASED
CYCLIC LIFE

PART NUMBER CHANGE



E8032A

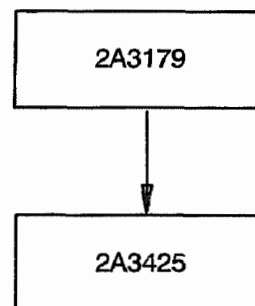
Family Tree - Stage 2 High Pressure Turbine Blade Retaining Plate
Ref. Catalog Sequence No. 72-45-33. Fig. 01 Item 020
Figure 7

MODIFICATIONS

BASE LINE

V2500-ENG-72-0327 ENGINE - HIGH
PRESSURE TURBINE ROTOR AND STATOR
ASSEMBLY - INTRODUCE NEW ROTATING
PARTS WITH POTENTIAL FOR INCREASED
CYCLIC LIFE

PART NUMBER CHANGE



E8033A

Family Tree - Stage 2 High Pressure Turbine Air Seal
Ref. Catalog Sequence No. 72-45-00. Fig. 01 Item 082
Figure 8

