



AIRCRAFT
MAINTENANCE MANUAL

INTEGRATED STANDBY INSTRUMENT SYSTEM - REMOVAL/INSTALLATION

EFFECTIVITY: ALL

1. General

- A. This section gives the procedure to remove/install the integrated standby instrument system (ISIS).
- B. The ISIS is installed on the main instrument panel.
- C. The procedures in this section are given in the sequence below. The tasks identified with (♦) are part of the Scheduled Maintenance Requirements Document (SMRD).

TASK NUMBER	DESCRIPTION	EFFECTIVITY
34-01-01-000-801-A	ISIS - REMOVAL	ALL
34-01-01-400-801-A	ISIS - INSTALLATION	ALL



EMB145 – EMB135

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TASK 34-01-01-000-801-A

EFFECTIVITY: ALL

2. ISIS - REMOVAL

A. General

- (1) This task gives the procedure to remove the ISIS.

B. References

REFERENCE	DESIGNATION
AMM TASK 20-10-03-000-801-A/400	TUBING - REMOVAL
AMM TASK 34-22-01-000-801-A/400	DISPLAY UNIT - REMOVAL

C. Zones and Accesses

Not Applicable

D. Tools and Equipment

Not Applicable

E. Auxiliary Items

Not Applicable

F. Consumable Materials

Not Applicable

G. Expandable Parts

Not Applicable

H. Persons Recommended

QTY	FUNCTION	PLACE
1	Does the task	Cockpit

I. Preparation

SUBTASK 841-002-A

- (1) Remove the EICAS display and MFD 1 from the main instrument panel to get access to the rear part of the ISIS ([AMM TASK 34-22-01-000-801-A/400](#)).
- (2) On the circuit breaker panel, open the INTEG STBY circuit breaker (Location tip: ESSENTIAL DC BUS 2/INTEG STBY) and attach a DO-NOT-CLOSE tag to it.
- (3) Make sure that there is no pressure applied to PITOT/STATIC 3.

J. Removal ([Figure 401](#)) ([Figure 402](#)) ([Figure 403](#))

SUBTASK 020-002-A

- (1) Loosen the screws (1) to release the ISIS (2).
- (2) (AIRCRAFT WITH A CLAMP ON THE REAR OF ISIS) Loosen the bolt (11) to release the ISIS.



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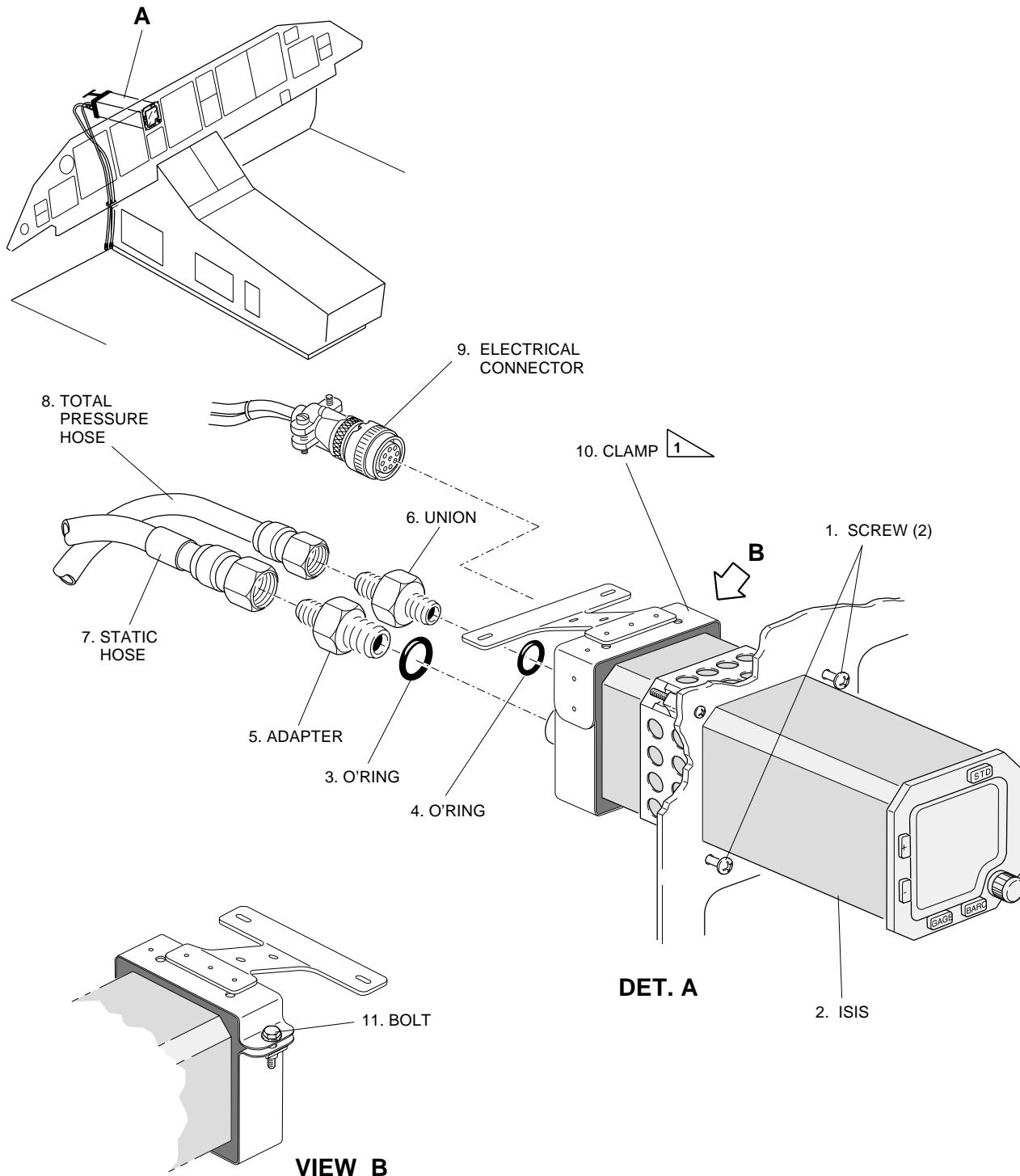
CAUTION: DO NOT MOVE THE ISIS BY PULLING/PUSHING THE BUTTON.

- (3) Pull the ISIS (2) to get access to the electrical connector (9) and the static and total pressure hoses.
- (4) Disconnect the static hose (7) from the adapter (5) ([AMM TASK 20-10-03-000-801-A/400](#)).
- (5) Disconnect the total pressure hose (8) from the union (6) ([AMM TASK 20-10-03-000-801-A/400](#)).
- (6) Disconnect the electrical connector (9) from the ISIS (2).

CAUTION: DO NOT MOVE THE ISIS BY PULLING/PUSHING THE BUTTON.

- (7) Remove the ISIS (2).
- (8) NOTE: Steps 8 and 9 are not applicable if the cleaning procedure of the Pitot/Static 3 lines will be done.
Disconnect the adapter (5) from the ISIS static port. Remove and discard the O-ring (3).
- (9) Disconnect the union (6) from the ISIS total-pressure port. Remove and discard the O-ring (4).

EFFECTIVITY: AIRCRAFT WITH ISIS - THALES AND PRE-MOD. SB 145-34-0038
ISIS - Removal/Installation
Figure 401



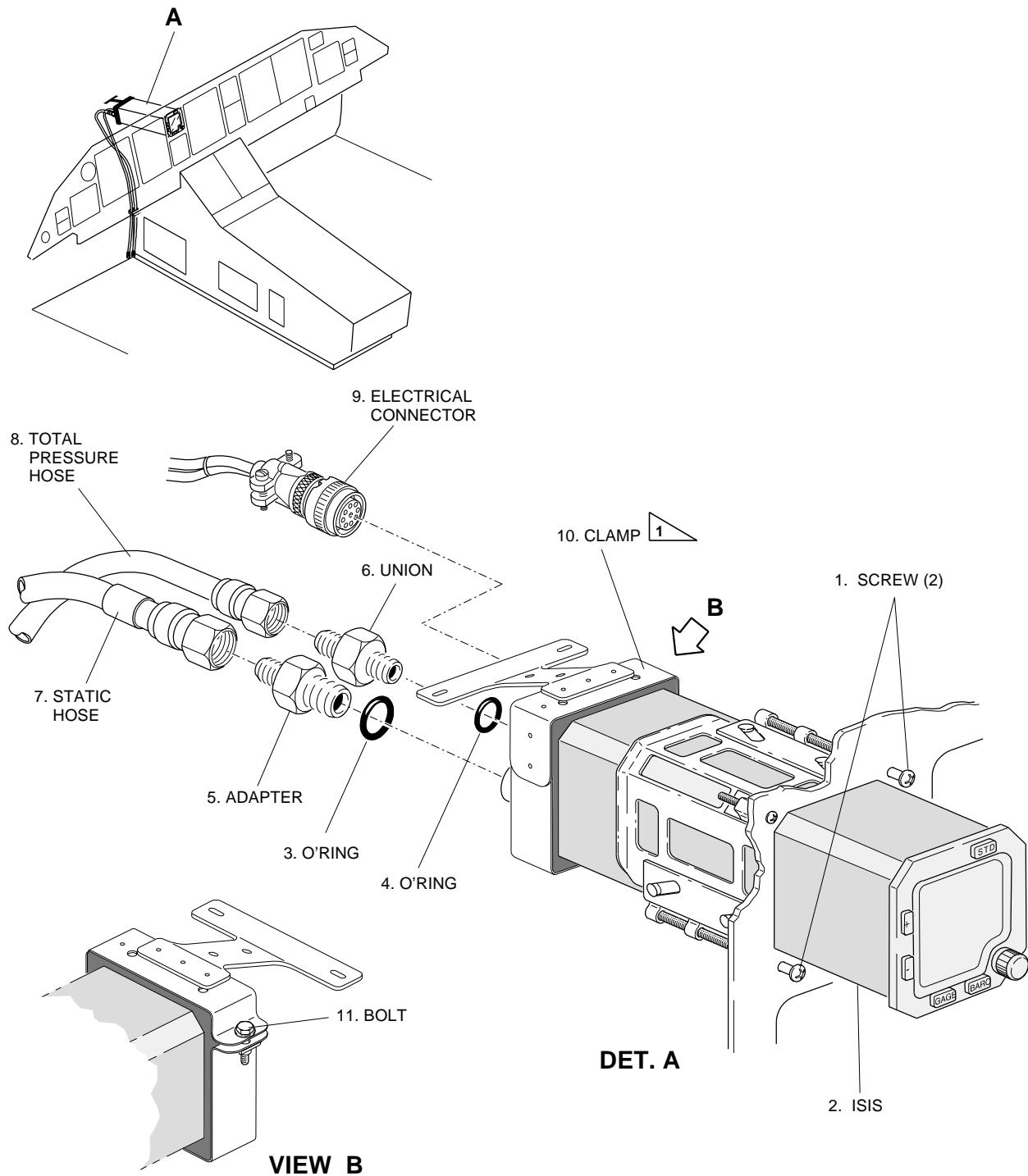
1 AIRCRAFT WITH A CLAMP ON THE REAR OF ISIS.

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EFFECTIVITY: AIRCRAFT WITH ISIS - THALES AND POST-MOD. SB 145-34-0038

ISIS - Removal/Installation

Figure 402



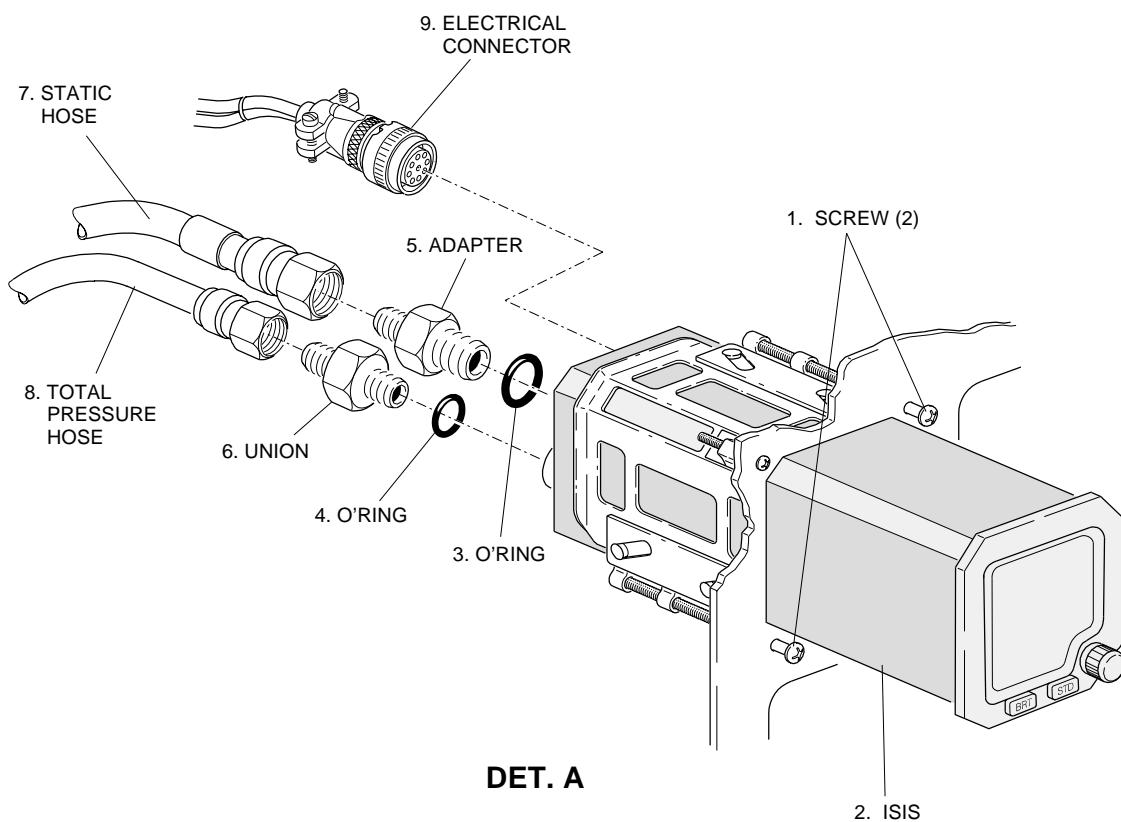
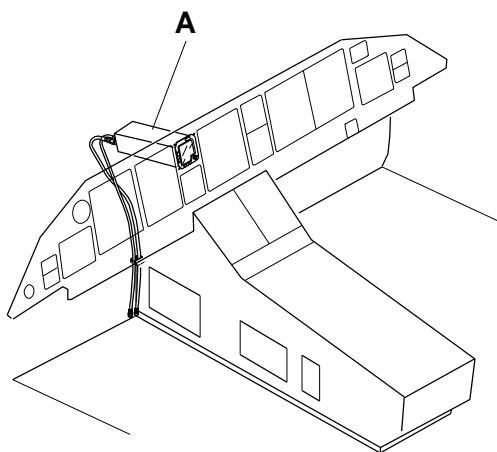
AIRCRAFT WITH A CLAMP ON THE REAR ISIS.

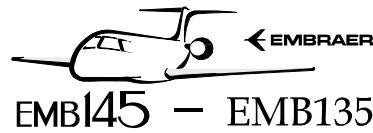
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EFFECTIVITY: AIRCRAFT WITH ISIS - SMITHS

ISIS - Removal/Installation

Figure 403





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AIRCRAFT
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TASK 34-01-01-400-801-A

EFFECTIVITY: ALL

3. ISIS - INSTALLATION

A. General

(1) This task gives the procedure to install the ISIS.

B. References

REFERENCE	DESIGNATION
AMM TASK 20-10-03-400-801-A/400	TUBING - INSTALLATION
AMM TASK 34-01-01-700-801-A/500	ISIS (THALES) - FUNCTIONAL TEST
AMM TASK 34-13-00-790-804-A/500	STANDBY SYSTEM - LEAKAGE TEST
AMM TASK 34-22-01-400-801-A/400	DISPLAY UNIT - INSTALLATION
IPC 34-01-01	INTEGRATED STANDBY INSTRUMENT SYSTEM
S.B.145-34-0062	-

C. Zones and Accesses

Not Applicable

D. Tools and Equipment

Not Applicable

E. Auxiliary Items

Not Applicable

F. Consumable Materials

Not Applicable

G. Expendable Parts

ITEM	IPC REFERENCE (VENDOR REFERENCE)	QTY
O-ring (3)	IPC 34-01-01	1
O-ring (4)	IPC 34-01-01	1

H. Persons Recommended

QTY	FUNCTION	PLACE
1	Does the task	Cockpit

I. Installation (Figure 401) (Figure 402) (Figure 403)

SUBTASK 420-002-A

(1) NOTE: To clean the PITOT/STATIC 3 lines, go to step 3.

Install a new O-ring (4) (IPC 34-01-01). Connect the union (6) to the ISIS total-pressure port.

- (2) Install a new O-ring (3) (IPC 34-01-01). Connect the adapter (5) to the ISIS static port.

CAUTION: DO NOT MOVE THE ISIS BY PULLING/PUSHING THE BUTTON.

- (3) Put the ISIS (2) in position on the main instrument panel.

NOTE: (AIRCRAFT WITH A CLAMP ON THE REAR OF ISIS) Fit the ISIS (2) into the clamp (10).

- (4) Connect the electrical connector (9) to the ISIS (2).

CAUTION: MAKE SURE THAT THE FLEXIBLE TUBE IS NOT TWISTED BEFORE AND AFTER TORQUE APPLICATION.

- (5) Connect the total pressure hose (8) to the union (6) ([AMM TASK 20-10-03-400-801-A/400](#)).

CAUTION: MAKE SURE THAT THE FLEXIBLE TUBE IS NOT TWISTED BEFORE AND AFTER TORQUE APPLICATION.

- (6) Connect the static hose (7) to the adapter (5) ([AMM TASK 20-10-03-400-801-A/400](#)).

CAUTION: DO NOT APPLY EXCESSIVE TORQUE TO THE BOLT. JUST PROVIDE SUFFICIENT TORQUE TO FIT THE RUBBER CUSHION.

- (7) (AIRCRAFT WITH A CLAMP ON THE REAR OF ISIS) Tighten the bolt (11).

- (8) Tighten the screws (1).

J. Follow-on

SUBTASK 842-002-A

- (1) **NOTE:** Before you turn on the ISIS, make sure that there is no dynamic pressure applied to PITOT/STATIC 3 equivalent to an airspeed equal to or greater than 60 knots.

On the circuit breaker panel, close the INTEG STBY circuit breaker (Location tip: ESSENTIAL DC BUS 2/INTEG STBY) and remove the DO-NOT-CLOSE tag from it.

- (2) (PRE-MOD [S.B.145-34-0062](#)) Make sure that the ISIS shows a pitch and roll in a range of ± 0.5 degrees as related to the PFD 1 indications. If not, loosen the screws (1) and adjust the ISIS position again.

- (3) Do the leakage test of the standby instrument system ([AMM TASK 34-13-00-790-804-A/500](#)).

- (4) Do the ISIS functional test ([AMM TASK 34-01-01-700-801-A/500](#)).

- (5) Install the EICAS display and MFD 1 on the main instrument panel ([AMM TASK 34-22-01-400-801-A/400](#)).