HIGH STAGE VALVE - ADJUSTMENT/TEST

EFFECTIVITY: ALL

1. General

   A. This section gives the procedure to do the functional test of the high-stage valve command.

   B. The high-stage valve is installed inside the pylon compartment.

   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*
36-11-02-700-801-A	HIGH-STAGE VALVE - FUNCTIONAL TEST	ALL

TASK 36-11-02-700-801-A
EFFECTIVITY: ALL

2. HIGH-STAGE VALVE - FUNCTIONAL TEST

A. General

(1) Do this test to make sure that the command to open the high-stage valves is functional in the bleed system.

B. References

REFERENCE	*DESIGNATION*
AMM MPP 71-00-00/200	- MAINTENANCE PRACTICES
AMM TASK 20-40-01-860-801-A/200	ENERGIZATION OF THE AIRCRAFT WITH AN EXTERNAL POWER SOURCE
AMM TASK 49-10-00-910-802-A/200	APU - START
AMM TASK 49-10-00-910-803-A/200	APU - SHUTDOWN
AMM TASK 49-13-00-910-802-A/200	APU - START
AMM TASK 49-13-00-910-803-A/200	APU - SHUTDOWN
AMM TASK 71-00-01-910-801-A/200	ENGINE START PROCEDURE (NORMAL)
AMM TASK 71-00-01-910-804-A/200	ENGINE STOP PROCEDURE

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) Make sure that the aircraft is safe for maintenance.

(2) Energize the aircraft (AMM TASK 20-40-01-860-801-A/200).

(3) Start the APU (AMM TASK 49-10-00-910-802-A/200 for APU T-62T-40C11 or AMM TASK 49-13-00-910-802-A/200 for APU T-62T-40C14).

(4) Do the engine start procedure (AMM TASK 71-00-01-910-801-A/200).

(5) Make sure that the MFD is on and set the ECS page.

(6) Make sure that the LH and RH thrust levers are in the IDLE position.

(7) On the AIR CONDITIONING/PNEUMATIC control panel, push the APU BLEED pushbutton (the light comes on).

(8) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, move the XBLEED rotary switch to the OPEN position.

(9) On the overhead circuit breaker panel, open these circuit breakers and attach DO-NOT-CLOSE tags to them:

- AIR/GND A (Location tip: DC BUS 1 / LDG GEAR / AIR/GND A).
- AIR/GND B (Location tip: ESSENTIAL DC BUS 1 / LDG GEAR / AIR/GND B).
- AIR/GND C (Location tip: DC BUS 2 / LDG GEAR / AIR/GND C).
- AIR/GND D (Location tip: ESSENTIAL DC BUS 2 / LDG GEAR / AIR/GND D).

J. High-stage Valve Command - Functional test (Figure 501)

SUBTASK 720-002-A

WARNING: BE CAREFUL AND OBEY OPERATIONAL LIMITATIONS FOR THE ENGINE GROUND OPERATION DURING THE AIRCRAFT MAINTENANCE (AMM MPP 71-00-00/200).

(1) Do the test for the LH side as follows:

(a) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, push the BLEED 1 pushbutton.

Result:

1 The BLEED 1 pushbutton light goes off.

(b) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, push the PACK 1 pushbutton. (striped-bar light off).

Result:

1 The PACK 1 pushbutton light goes off.

NOTE: Make sure that the PACK 2 VLV CLSD and BLD 2 VLV CLSD remains, on the EICAS.

(c) Wait until the parameters are stable and record the value.

(d) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, pull the HSV 1 circuit breaker (Location Tip: DC BUS 1 / AIR COND/PNEU / HSV 1).

(e) Wait approximately 1 minute and then look at the ITT display, on the EICAS, and record the value.

Result:

1 The ITT must decrease.

(f) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, push the HSV circuit breaker.

Result:

1 The ITT must increase to the original reading.

NOTE:
- If the ITT does not decrease, it means that there is lack of power to the HSV.
- If the bleed system is not operational, refer to the related procedure in the Fault Isolation Manual (FIM).

(g) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, release the PACK 1 pushbutton. (the striped-bar light comes on).

Result:

1 The PACK 1 pushbutton light comes on.

(h) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, release the BLEED 1 pushbutton.

Result:

1 The BLEED 1 pushbutton light comes on.

(2) Do this test for the RH air bleed system, as follows:

(a) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, push the BLEED 2 pushbutton.

Result:

1 The BLEED 2 pushbutton light goes off.

(b) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, push the PACK 2 pushbutton (striped-bar light off).

Result:

1 The PACK 2 pushbutton light goes off.

NOTE: Make sure that the PACK 1 VLV CLSD and BLD 1 VLV CLSD remains, on the EICAS.

(c) Wait until the parameters are stable and record the value.

(d) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, pull the HSV 2 circuit breaker (Location Tip: DC BUS 2 / AIR COND/PNEU / HSV 2).

(e) Wait approximately 1 minute and then look at the ITT display, on the EICAS, and record the value.

Result:

1 The ITT must decrease.

(f) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, push the HSV circuit breaker.

Result:

1 The ITT must increase to the original reading.

NOTE: • If there is no oscillation of ITT, it means that there is lack of power to the HSV.

• If the bleed system is not operational, refer to the related procedure in the Fault Isolation Manual (FIM).

(g) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, release the PACK 2 pushbutton (the striped bar light comes on).

Result:

1 The PACK 2 pushbutton light comes on.

(h) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, release the BLEED 2 pushbutton.

Result:

1 The BLEED 2 pushbutton light comes on.

K. Follow-on

SUBTASK 842-002-A

(1) On the overhead circuit breaker panel, close these circuit breakers and attach DO-NOT-CLOSE tags to them:

- AIR/GND A (Location tip: DC BUS 1 / LDG GEAR / AIR/GND A).
- AIR/GND B (Location tip: ESSENTIAL DC BUS 1 / LDG GEAR / AIR/GND B).
- AIR/GND C (Location tip: DC BUS 2 / LDG GEAR / AIR/GND C).
- AIR/GND D (Location tip: ESSENTIAL DC BUS 2 / LDG GEAR / AIR/GND D).

(2) On the AIR CONDITIONING/PNEUMATIC control panel, on the overhead panel, move the XBLEED rotary switch to the CLOSED position.

(3) On the AIR CONDITIONING/PNEUMATIC control panel, release the APU BLEED pushbutton (the light goes off).

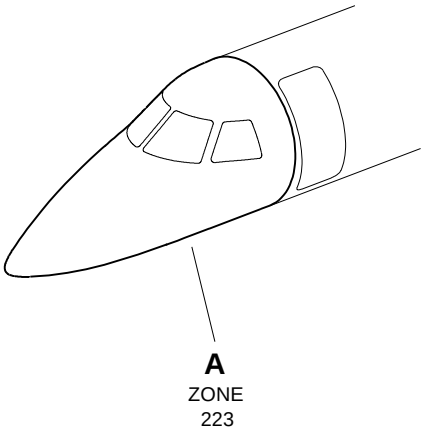
(4) Stop the engine (AMM TASK 71-00-01-910-804-A/200).

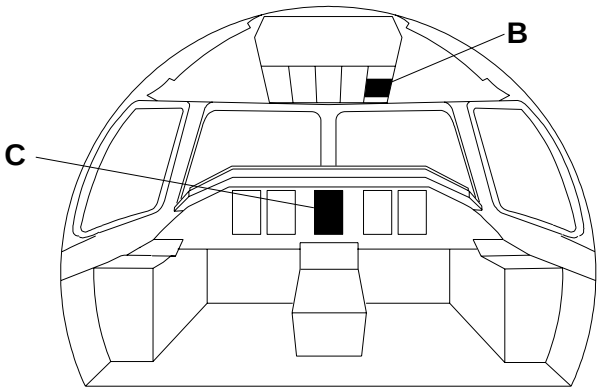
(5) Stop the APU (AMM TASK 49-10-00-910-803-A/200 for APU T-62T-40C11 or AMM TASK 49-13-00-910-803-A/200 for APU T-62T-40C14).

(6) Deenergize the aircraft (AMM TASK 20-40-01-860-801-A/200).

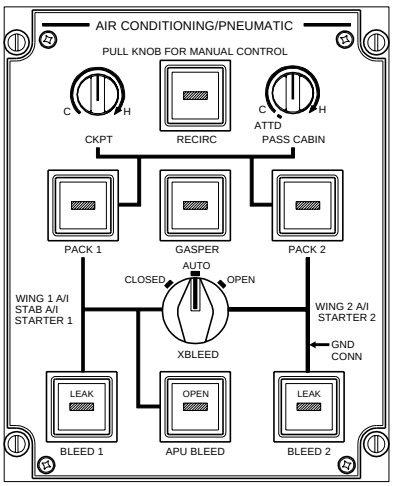
EFFECTIVITY: ALL

High-Stage Valve Command - Functional Check
Figure 501

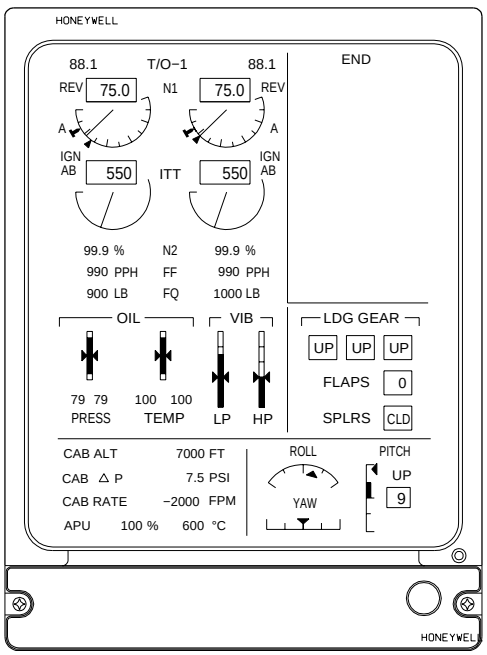




DET. A



DET. B



DET. C

EICAS DISPLAY

EM145AMM360420A.DGN