



EMB145 – EMB135

AIRCRAFT
MAINTENANCE MANUAL

PASSENGER OXYGEN DISTRIBUTION (LP) LINES - ADJUSTMENT/TEST

EFFECTIVITY: AIRCRAFT FOR 16 PASSENGERS

1. General

- A. This section gives the procedure to do a check of the low-pressure oxygen distribution lines.
- B. 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
35-20-16-700-801-A ♦	PASSENGER OXYGEN (LP) DISTRIBUTION LINES - CHECK	AIRCRAFT FOR 16 PASSENGERS



EMB145 - EMB135

AIRCRAFT
MAINTENANCE MANUAL

TASK 35-20-16-700-801-A

EFFECTIVITY: AIRCRAFT FOR 16 PASSENGERS

2. PASSENGER OXYGEN (LP) DISTRIBUTION LINES - CHECK

A. General

(1) Only approved persons must do the maintenance tasks related to the oxygen system.

B. References

REFERENCE	DESIGNATION
AMM MPP 06-41-04/100	-
AMM TASK 20-40-01-860-801-A/200	ENERGIZATION OF THE AIRCRAFT WITH AN EXTERNAL POWER SOURCE
AMM TASK 25-22-04-000-802-A/400	-
AMM TASK 25-22-04-400-802-A/400	-
AMM TASK 35-10-00-910-801-A/200	-
AMM TASK 35-10-00-910-803-A/200	-
AMM TASK 35-10-00-910-805-A/200	-
AMM TASK 35-20-00-700-801-A/500	-

C. Zones and Accesses

ZONE	PANEL/DOOR	LOCATION
232	232AZ	Passenger cabin
233	233ALC	Passenger cabin
263	263ALC	Passenger cabin

D. Tools and Equipment

ITEM	DESCRIPTION	PURPOSE	QTY
Commercially available	Source of nitrogen with pressure regulator and pressure gauge with scale up to 100 psi	To pressurize the oxygen lines	
Commercially available	Cotter pin extractor	To open the valance panel	

E. Auxiliary Items

Not Applicable

F. Consumable Materials

SPECIFICATION (BRAND)	DESCRIPTION	QTY
FED STD-BB-N-411, Type I, Class I, and Grade B	Nitrogen	AR



EMB145 - EMB135

AIRCRAFT
MAINTENANCE MANUAL

G. Expandable Parts

Not Applicable

H. Persons Recommended

QTY	FUNCTION	PLACE
1	Does the task	Passenger cabin

I. Preparation

SUBTASK 841-004-A

- (1) Make sure that the aircraft is safe for maintenance.
- (2) Obey the safety precautions (AMM TASK 35-10-00-910-801-A/200) and general instructions (AMM TASK 35-10-00-910-803-A/200).
- (3) Remove access panel 232AZ to get access to the passenger oxygen cylinder(s) (AMM MPP 06-41-04/100).
- (4) Put the cylinder pressure regulator(s) (1) in the OFF position.
- (5) Open the valance panel with the aid of a cotter pin extractor to get access to the oxygen distribution lines.
- (6) Remove headliner panels 233ALC and 263ALC (AMM MPP 06-41-04/100). Refer to AMM TASK 25-22-04-000-802-A/400.
- (7) Energize the aircraft with the External DC Power Supply ([AMM TASK 20-40-01-860-801-A/200](#)).

J. Check (Leak) Passenger Oxygen Distribution (LP) Lines (Figure 601)

SUBTASK 790-004-A

WARNING: OPEN THE OXYGEN FITTINGS SLOWLY TO PREVENT TOO HIGH TEMPERATURES.

- (1) Disconnect all the oxygen lines from all the oxygen module boxes and install caps on them to prevent leakage during the test.
NOTE: A small quantity of oxygen can flow out when you disconnect the related line.
- (2) Disconnect the bleed venting valves and install caps on them.
- (3) Disconnect the distribution line fitting(s) (2) from the passenger oxygen cylinder(s).
- (4) Install the nitrogen source on the distribution line of one passenger cylinder.
- (5) Install the caps to all the open fittings to prevent leakage during the test.
- (6) On the oxygen control panel, set the switch to the MANUAL mode to keep the pulse/latching valves in the open position (DET. D).
- (7) Install caps in the oxygen sequence regulator bleed vent ports (10-32 UNC Thread).



EMB145 – EMB135

AIRCRAFT
MAINTENANCE MANUAL

- (8) Immediately after you close the nitrogen pressure regulator, open the nitrogen shutoff valve.

CAUTION: WHEN YOU PRESSURIZE THE LINE, ALWAYS DO IT SLOWLY.

- (9) Slowly open the nitrogen pressure regulator up to 80 psi.
- (10) Close the nitrogen shutoff valve to close the nitrogen source.
- (11) Keep the pressure inside the lines for 15 minutes, and do a check to know if the pressure decreases.

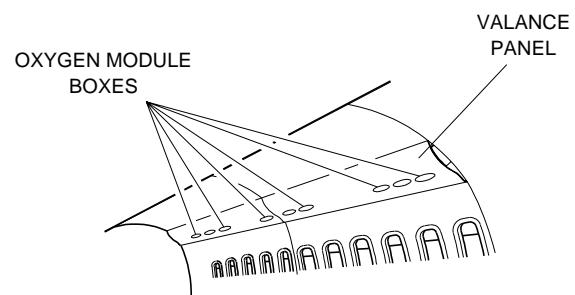
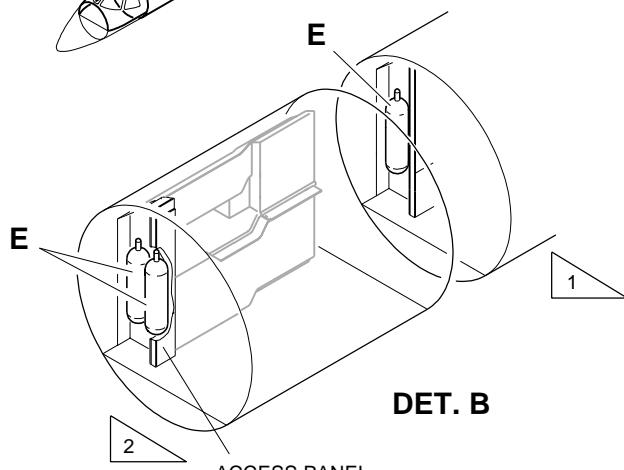
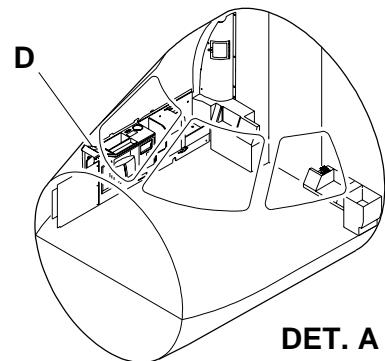
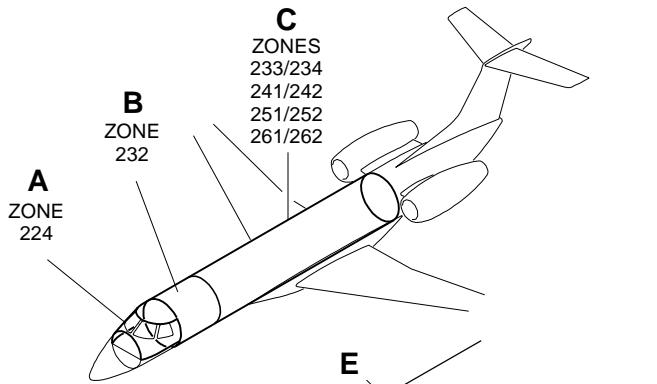
NOTE: The maximum permitted leakage is a pressure drop of 1 psi.

K. Follow-on

SUBTASK 842-004-A

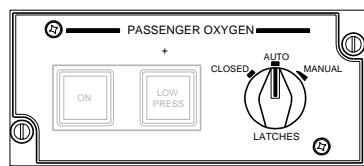
- (1) Carefully remove the nitrogen source.
- (2) Remove the caps of the oxygen sequence regulator bleed vent ports (10-32 UNC Thread).
- (3) Remove the caps and correctly connect all the fittings back.
NOTE: Refer to Table 201 of AMM TASK 35-10-00-910-805-A/200 for the torque ranges.
- (4) Close the valance panel.
- (5) Install headliner panels 233ALC and 263ALC (AMM MPP 06-41-04/100). Refer to AMM TASK 25-22-04-400-802-A/400.
- (6) Put the cylinder pressure regulator(s) (1) in the ON position.
- (7) Do the operational check of the passenger oxygen subsystem (AMM TASK 35-20-00-700-801-A/500).
- (8) Deenergize the aircraft ([AMM TASK 20-40-01-860-801-A/200](#)).
- (9) Install access panel 232AZ (AMM MPP 06-41-04/100).

EFFECTIVITY: AIRCRAFT FOR 16 PASSENGERS
 Test for Leak in Passenger Oxygen (LP) Distribution Lines
 Figure 501 - Sheet 1



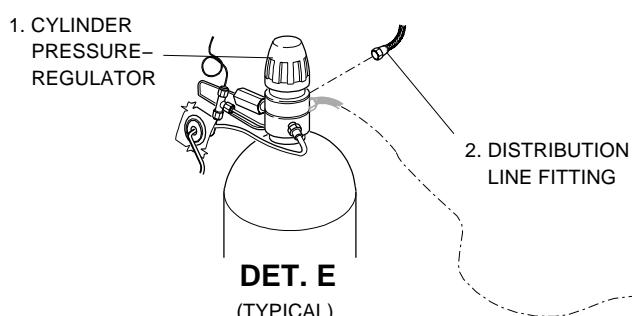
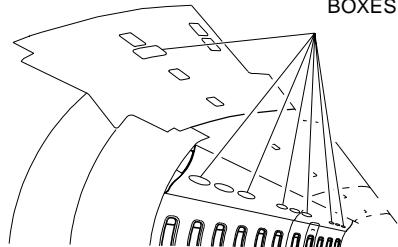
DET. B

DET. A



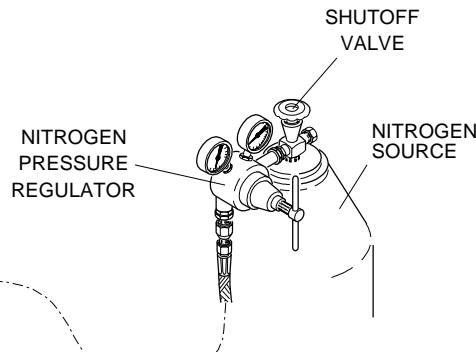
DET. D

**OXYGEN MODULE
BOXES**



1 AIRCRAFT WITH ONE PASSENGER OXYGEN CYLINDER

2 AIRCRAFT WITH TWO PASSENGER OXYGEN CYLINDERS

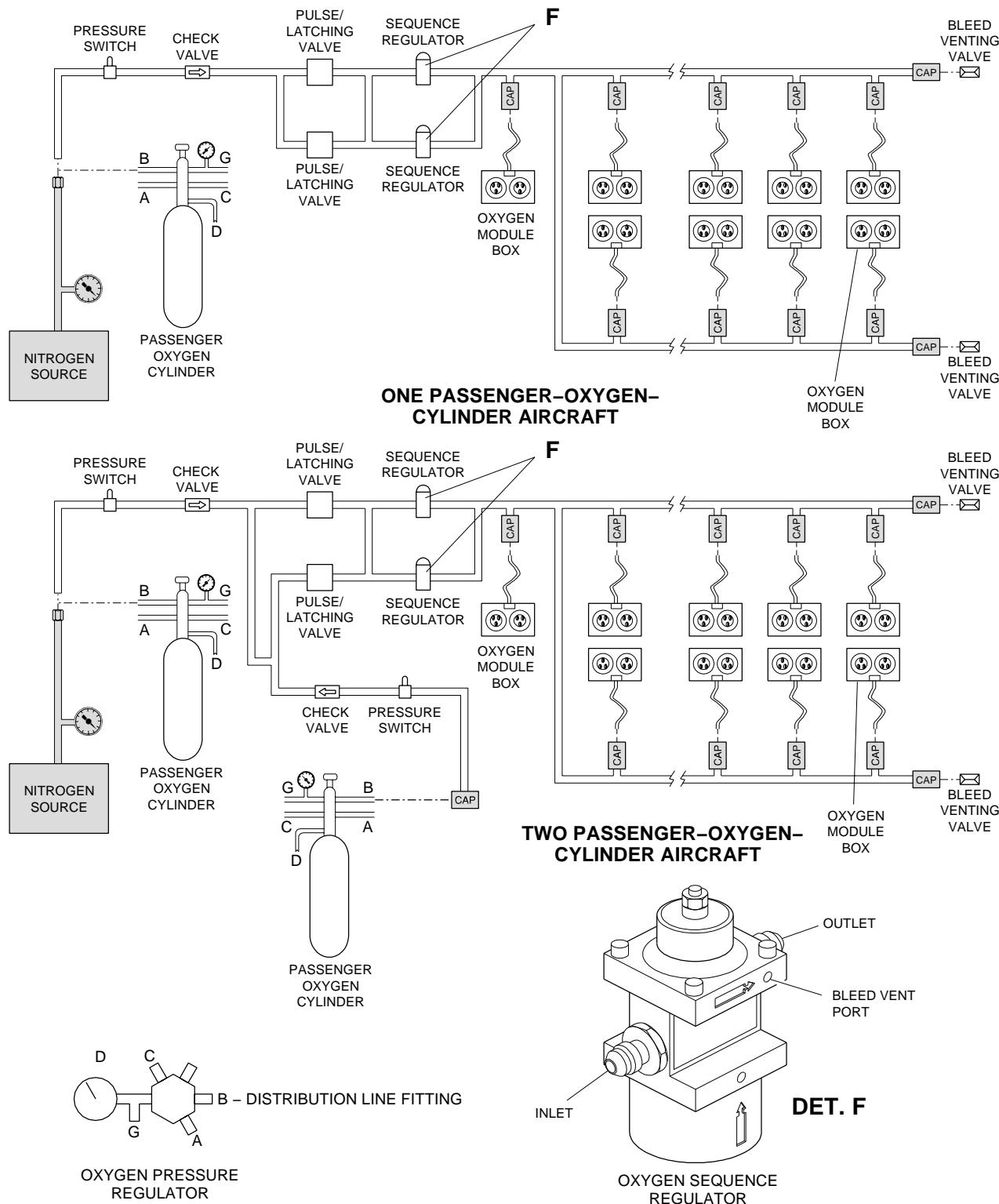


EM145AMM350427A.DGN

EFFECTIVITY: AIRCRAFT FOR 16 PASSENGERS

Test for Leak in Passenger Oxygen (LP) Distribution Lines

Figure 501 - Sheet 2



EM145AMM350233A.DGN