

1999

Volume

2 of 3

## **RASIP FINDING**

### **2.08.03**

During the aircraft ramp inspection on Aircraft N-870TV, arrival into Seattle on 02/05/99, the RASIP Team found that only one half of the smoke curtain was installed: The other half of the smoke curtain had been removed and deferred as a Non-MEL item.

FAR 121.153(a); 121.221(f)(4)

### **2.08.03 RRXA RESPONSE**

1. Reference A/C Log Page 7592-15, Item 6, the smoke barrier was found to be damaged. The smoke barrier was removed for repair and placed on Non-MEL Number N7592156-0151.
2. When smoke barrier was removed, the courier positions were entered in the MEL Per 25-14 Cat D, due date 06-05-1999. MEL number D7592161-0152. This was done due to no protection for the courier from hazardous quantities of smoke, flames, or noxious gases. The Flight Crew has the flight station door which protects them from this situation. Please see FAR 121.217 attached.
3. EWA Quality Control Department contacted The Boeing Company, Service Engineering Department, for support in finding a repair to keep from having to remove the smoke barrier for repair. Please see attached letter from the Boeing Company addressing this matter Telex 32-9430 dated 04-02-1999. EWA will add this procedure in our next revision to the EWA Maintenance Manual.
4. EWA considers this to be no finding.

EMERY WORLDWIDE AIRLINES  
Request for Manual/Publication Revision

       ERROR               SUGGESTION FOR CHANGE (check appropriate space) DATE 05/14/99

MANUAL/PUBLICATION TITLE EWA IPM VOL 1

CHAPTER/PAGE REFERENCE CHAP 6-9 PARAGRAPH B009, B011, B013, B011 p1.

DESCRIPTION OF ERROR OR SUGGESTED CHANGE
REF LACIP INSP FINDING 2.08-03. A PROCEDURE FOR REPAIR OF THE SMOKE BARRIER WAS DEVELOPED. I HAVE DER APPROVAL # 8190-3 FOR THIS PROCEDURE HOWEVER, BOEING REQUEST THAT THE REPAIRS ARE <sup>CHECKED</sup> EVERY '3' CHECK. AS THERE WAS NO PREVIOUS INSPECTION I HAVE ADDED IT TO EACH CABIN AREA INSPECTION CARD FOR B-1-4. SEE ATTACHED.

Name SIMON CHANDLER Signature [Signature]

Station Location KDAY - QL Phone [Redacted]

Director Maint. Approval [Signature] Director QC Approval [Signature]

Incorporated into Revision Number                     

- Instructions:
1. Attach drawings, sketches, diagrams, etc.
  2. Forward to Director of Quality Control

EMERY WORLDWIDE AIRLINES  DC-8	REV. DATE 08/30/98	REV. NO. Original	PAGE NO. 1 OF 2	INSPEC. CK B-1	CARD NO. B009
			ACFT. NO.	STATION	DATE
INSTRUCTION				SIGN-OFF MECHANIC ONLY	

### CABIN AREA INSPECTION

#### 1. CABIN AREA INSPECTION

a. Perform cabin area inspection as follows:

- |                  |   |                  |                          |
|------------------|---|------------------|--------------------------|
| 1)               | Inspect forward entry door, door latches, door jambs, handle, seal, and clearview window for damage, corrosion, binding, and signs of leakage.        | 1)               | <input type="checkbox"/> |
| 2)               | Check condition and security of forward service door.   | 2)               | <input type="checkbox"/> |
| 3)               | Check galley equipment for damage, corrosion, condition, and security of installation.  | 3)               | <input type="checkbox"/> |
| 4)               | Check forward lavatories flushing system for proper operation, servicing, evidence of leakage. (Ensure doughnut installed)                            | 4)               | <input type="checkbox"/> |
| 5)               | Check all waste container access and disposal doors for damage, proper latching operation and proper sealing.   | 5)               | <input type="checkbox"/> |
| 6)               | Check condition and security of lavatory doors.   | 6)               | <input type="checkbox"/> |
| 7)               | Check ceiling and side panels for damage (i.e. for holes, tears, defective repairs, etc...), condition, and security of installation.                 | 7)               | <input type="checkbox"/> |
| 8)               | Check condition of all placards and exit signs.   | 8)               | <input type="checkbox"/> |
| 9)               | <i>CHECK CONDITION AND SECURITY OF SMOKE BARRIER. Pay PARTICULAR ATTENTION TO PREVIOUS REPAIRS REF GWA MAINTENANCE MANUAL CHAP 4 FOR LIMITATIONS.</i> |                  | <input type="checkbox"/> |
| 10 <del>9</del>  | Check condition, operation and security of cargo system locks, rollers, ballmats and restraints.  | 10 <del>9</del>  | <input type="checkbox"/> |
| 11 <del>10</del> | Check overwing exit doors (2LH/2RH) for security.   | 11 <del>10</del> | <input type="checkbox"/> |
| 12 <del>11</del> | Check condition and security of AFT service door.   | 12 <del>11</del> | <input type="checkbox"/> |
| 13 <del>12</del> | Check all cargo compartment lights. Replace lights if inoperative.  | 13 <del>12</del> | <input type="checkbox"/> |

EMERY WORLDWIDE AIRLINES  DC-8	REV. DATE 08/30/98	REV. NO. Original	PAGE NO. 1 OF 2	INSP. CK B-2	CARD NO. B011
			ACFT. NO.	STATION	DATE
INSTRUCTION				SIGN-OFF MECHANIC ONLY	

### CABIN AREA INSPECTION

#### 1. CABIN AREA INSPECTION

a. Perform cabin area inspection as follows:

- 1) Inspect forward entry door, door latches, door jambs, handle, seal, and clearview window for damage, corrosion, binding, and signs of leakage. 1)
- 2) Check condition and security of forward service door. 2)
- 3) Check galley equipment for damage, corrosion, condition, and security of installation. 3)
- 4) Check forward lavatories flushing system for proper operation, servicing, evidence of leakage. (Ensure doughnut installed) 4)
- 5) Check all waste container access and disposal doors for damage, proper latching operation and proper sealing. 5)
- 6) Check condition and security of lavatory doors. 6)
- 7) Check ceiling and side panels for damage (i.e. for holes, tears, defective repairs, etc...), condition, and security of installation. 7)
- 8) Check condition of all placards and exit signs. 8)
- 9) *CHECK CONDITIONS AND SECURITY OF SMOKE BARRIER. PAY PARTICULAR ATTENTION TO PREVIOUS REPAIRS. REF EWA MAINTENANCE MANUAL CHAP 4 FOR DETAILED LIMITATIONS.* 9)
- 10) 9) Check condition, operation and security of cargo system locks, rollers, ballmats and restraints. 10) 9)
- 11) 10) Check overwing exit doors (2LH/2RH) for security. 11) 10)
- 12) 11) Check condition and security of AFT service door. 12) 11)
- 13) 12) Check all cargo compartment lights. Replace lights if inoperative. 13) 12)

EMERY WORLDWIDE AIRLINES  DC-8	REV. DATE 08/30/98	REV. NO. Original	PAGE NO. 1 OF 2	INSP. CK B-3	CARD NO. B013
			ACFT. NO.	STATION	DATE
INSTRUCTION				SIGN-OFF MECHANIC ONLY	

**CABIN AREA INSPECTION**

**1. CABIN AREA INSPECTION**

a. Perform cabin area inspection as follows:

- |   |  |         |                          |
|---|--|---------|--------------------------|
| 1)  | Inspect forward entry door, door latches, door jambs, handle, seal, and clearview window for damage, corrosion, binding, and signs of leakage. | 1)      | <input type="checkbox"/> |
| 2)  | Check condition and security of forward service door.  | 2)      | <input type="checkbox"/> |
| 3)  | Check galley equipment for damage, corrosion, condition, and security of installation.   | 3)      | <input type="checkbox"/> |
| 4)  | Check forward lavatories flushing system for proper operation, servicing, evidence of leakage. (Ensure doughnut installed)                     | 4)      | <input type="checkbox"/> |
| 5)  | Check all waste container access and disposal doors for damage, proper latching operation and proper sealing.                                  | 5)      | <input type="checkbox"/> |
| 6)  | .. Check condition and security of lavatory doors.   | 6)      | <input type="checkbox"/> |
| 7)  | Check ceiling and side panels for damage (i.e. for holes, tears, defective repairs, etc...), condition, and security of installation.          | 7)      | <input type="checkbox"/> |
| 8)  | Check condition of all placards and exit signs.  | 8)      | <input type="checkbox"/> |
| <i>9) CHECK CONDITION AND SECURITY OF SMOKE EXHAUST. FOR PARTICULAR ATTENTION TO (2) REPAIRS. Ref EWA MAINTENANCE MANUAL CHAP 4 FOR DAMAGE LIMITATIONS.</i> |  |         |                          |
| 10) 9)  | Check condition, operation and security of cargo system locks, rollers, ballmats and restraints.   | 10) 9)  | <input type="checkbox"/> |
| 11) 10)   | Check overwing exit doors (2LH/2RH) for security.  | 11) 10) | <input type="checkbox"/> |
| 12) 11)   | Check condition and security of AFT service door.  | 12) 11) | <input type="checkbox"/> |
| 13) 12)   | Check all cargo compartment lights. Replace lights if inoperative.   | 13) 12) | <input type="checkbox"/> |

EMERY WORLDWIDE AIRLINES  DC-8	REV. DATE 08/30/98	REV. NO. Original	PAGE NO. 1 OF 1	INSPEC. CK B-4	CARD NO. B011
	AREA 5 FUSELAGE CENTER SECTION		ACFT. NO.	STATION	DATE
INSTRUCTIONS				SIGN-OFF MECHANIC INSPECTOR	

### MAIN CABIN AREA INSPECTION

1. Perform inspection as follows:

- a. Visually inspect cargo interior ceiling and side panels for damage (i.e. for holes, tears, defective repairs, etc...), condition, and security of installation. a.
- b. CHECK CONDITION AND SECURITY OF SMOKE BARRIERS. BEY PARTICULAR ATTENTION TO PREVIOUS REPAIRS. REF ERJ MAINTENANCE MANUAL CHAP 4* b.
- c. b.* Check condition of all placards. FOR DAMAGE LIMITATIONS. c.
- d.c.* Ensure smoke detectors are free of obstruction. d.c.
- e. d.* Check lights for condition, security, and operation. e.d.
- f. e.* Check over wing exit doors for security and condition. f.e.
- g. f.* Check condition and security of aft service doors. g.f.
- h. g.* Check CVR for condition and security. h.g.
- i. h.* Check flight recorder for condition and security. i.h.

2. Cargo Loading System Inspection

- a. Inspect ball mat assemblies for damage, cracks, and broken ball assemblies. a.
- b. Inspect rollers and roller trays for damage, condition, and operation. b.
- c. Inspect side restraints/stops for damage, condition, and operation. c.

**Note:** Pay attention to the side restraints/stops opposite the cargo door.

- d. Inventory and inspect pallet locks for general condition, visible damage, and operation. d.
- e. Inspect sill guards for general condition, visible damage, and operation. e.

DATE: 05/14/1999 17:08:44

FROM: THE BOEING COMPANY  
SERVICE ENGINEERING  
CUSTOMER SUPPORT  
M/C D035-0035  
3855 LAKEWOOD BLVD.  
LONG BEACH, CA 90846  
206-544-0641 (FAX)  
32-9430 (TELEX)  
LKEBO7X (SITA)  
DSE (DIR CODE)

ATTN: MR. SIMON CHANDLER, EMERY WORLDWIDE AIRLINES, QC INSPECTION  
REPRESENTATIVE

EAF-ILN-99-0024RR 14 MAY 99  
ATA 0000-00 MODEL DC-8  
SMOKE BARRIER REPAIR  
REF /A/ EAFL990506 /C/  
/B/ FAX MESSAGE FROM SIMON CHANDLER, DATED 06-MAY-99  
/C/ FAA FORM 8110-3  
/D/ ROD MAH00355

FOLLOWING MESSAGE SENT TO MR. SIMON CHANDLER, EMERY WORLDWIDE  
AIRLINES, QC INSPECTION REPRESENTATIVE WITH A COPY TO C.H.  
GILLIAM (FSR-ILN).

BOEING LBD HAS REVIEWED THE REFERENCE /B/ PROPOSED REPAIR FOR THE  
5891931 SMOKE BARRIER. OUR DISPOSITION IS AS FOLLOWS:

REF /B/, ITEMS 2.C, 2.D AND 2.E, ARE ACCEPTABLE, PROVIDED:

- (1) INDIVIDUAL DAMAGE ITEMS 9AS LISTED IN 2.D) ARE  
SEPARATED FROM EACH OTHER BY A MINIMUM OF 6 INCHES, IN  
ALL DIRECTIONS.
- (2) THE REPAIRED AREAS ARE VISUALLY INSPECTED EVERY "B"  
CHECK TO ASSURE NO DEGRADATION OF REPAIR/S AND TO  
ASSURE INTEGRITY OF THE SMOKE BARRIER.

THIS APPROVAL IS NOT FOR THE ENTIRE PROCEDURE DOCUMENTED IN  
REFERENCE /B/, BUT FOR THE SPECIFIC PORTIONS OF IT, AS LISTED  
ABOVE.

THIS REPAIR SPECIFICATION, PER ROD LOG NO. 99-05-11-003, HAS BEEN  
SHOWN TO COMPLY WITH THE AIRCRAFT TYPE CERTIFICATION BASIS, AND  
IS FAA/DER APPROVED. PLEASE SEE ATTACHED FAA FORM 8110-3.

REGARDS,

M. HANSEN/HACKWORTH  
CHRIS HAUGHEY - AIRLINE SUPPORT MANAGER  
BOEING SERVICE ENGINEERING  
ORGN 6-T024 M/C D0035-0035

14 MAY 99 1706





*ATTN: Ron Moely*

From: dse.boecom@boeing.com

FROM: THE BOEING COMPANY  
SERVICE ENGINEERING  
CUSTOMER SUPPORT  
M/C D035-0035  
3855 LAKEWOOD BLVD.  
LONG BEACH, CA 90846  
206-544-0641 (FAX)  
32-9430 (TELEX)  
LKEBO7X (SITA)  
DSE (DIR CODE)

ATTN: C.H. GILLIAM - FIELD SERVICE REP

EAF-ILN-99-0014RR 02 APR 99  
ATA 2550-00 MODEL DC-8  
REPAIR OF SMOKE CURTAIN P/N 5891931  
REF /A/ EAF-ILN-99-0011TR /C/

YOUR REF /A/ ASKED WHERE SUBJECT REPAIR INFORMATION COULD BE FOUND.

PLEASE ADVISE EAF THAT NO REPAIR DATA FOR DC-8 SMOKE CURTAINS HAS BEEN PUBLISHED. EAF MAY USE THE FOLLOWING TO ACCOMPLISH REPAIR OF TEARS IN THE SUBJECT SMOKE BARRIER PANEL:

APPLY A PATCH MADE FROM DMS 1992, TYPE 2, BUTYL COATED GLASS CLOTH. THE PATCH SHOULD OVERLAP THE CURTAIN BY ONE INCH MINIMUM. BOND THE PATCH TO THE CURTAIN PER DPS 1.07-9, USING ONE OF THE FOLLOWING ADHESIVES:

--TYPE 1A VINYL ADHESIVE (CONTACT CEMENT) DPM 6307, STABOND #N-134, OR

--TYPE 1B TRANSFER TAPE, DPM 5363, 3M TAPE SCOTCH #468

BEST REGARDS, MARK

M. HANSEN/WASHKE  
DAVE WASHKE - (ACTING) AIRLINE SUPPORT MANAGER  
BOEING SERVICE ENGINEERING  
ORGN 6-T024 M/C D0035-0035

02 APR 99 1931

BOECOMII-FSE-ID-6859051-EMAIL-G

- (1) It must have a separate approved smoke or fire detector system to give warning at the pilot or flight engineer station.
- (2) There must be a hand fire extinguisher available for the compartment.
- (3) It must be lined with fire-resistant material, except that additional service lining of flame-resistant material may be used.
- (d) *Class C.* Cargo and baggage compartments are classified in the "C" category if they do not conform with the requirements for the "A", "B", "D", or "E" categories. Each Class C compartment must comply with the following:
- (1) It must have a separate approved smoke or fire detector system to give warning at the pilot or flight engineer station.
- (2) It must have an approved built-in fire-extinguishing system controlled from the pilot or flight engineer station.
- (3) It must be designed to exclude hazardous quantities of smoke, flames, or extinguishing agents from entering into any compartment occupied by the crew or passengers.
- (4) It must have ventilation and draft controlled so that the extinguishing agent provided can control any fire that may start in the compartment.
- (5) It must be lined with fire-resistant material, except that additional service lining of flame-resistant material may be used.
- (e) *Class D.* Cargo and baggage compartments are classified in the "D" category if they are so designed and constructed that a fire occurring therein will be completely confined without endangering the safety of the airplane or the occupants. Each Class D compartment must comply with the following:
- (1) It must have a means to exclude hazardous quantities of smoke, flames, or noxious gases from entering any compartment occupied by the crew or passengers.
- (2) Ventilation and drafts must be controlled within each compartment so that any fire likely to occur in the compartment will not progress beyond safe limits.
- (3) It must be completely lined with flame-resistant material.
- (4) Consideration must be given to the effect of heat within the compartment on adjacent critical parts of the airplane.
- (f) *Class E.* On airplanes used for the carriage of cargo only, the cabin area may be classified as a Class "E" compartment. Each Class E compartment must comply with the following:
- (1) It must be completely lined with fire-resistant material.
- (2) It must have a separate system of an approved type smoke or fire detector to give warning at the pilot or flight engineer station.
- (3) It must have a means to shut off the ventilating air flow to or within the compartment and the controls for that means must be accessible to the flight crew in the crew compartment.
- (4) It must have a means to exclude hazardous quantities of smoke, flames, or noxious gases from entering the flight crew compartment.
- (5) Required crew emergency exits must be accessible under all cargo loading conditions.

#### 121.223 PROOF OF COMPLIANCE WITH §121.221

Compliance with those provisions of §121.221 that refer to compartment accessibility, the entry of hazardous quantities of smoke or extinguishing agent into compartments occupied by the crew or passengers, and the dissipation of the extinguishing agent in Class "C" compartments must be shown by tests in flight. During these tests it must be shown that no inadvertent operation of smoke or fire detectors in other compartments within the airplane would occur as a result of fire contained in any one compartment, either during the time it is being extinguished, or thereafter, unless the extinguishing system floods those compartments simultaneously.

#### 121.225 PROPELLER DEICING FLUID

If combustible fluid is used for propeller deicing, the certificate holder must comply with §121.255.

#### 121.227 PRESSURE CROSS-FEED ARRANGEMENTS

- (a) Pressure cross-feed lines may not pass through parts of the airplane used for carrying persons or cargo unless—
- (1) There is a means to allow crewmembers to shut off the supply of fuel to these lines; or
- (2) The lines are enclosed in a fuel and fume-proof enclosure that is ventilated and drained to the exterior of the airplane.
- However, such an enclosure need not be used if those lines incorporate no fittings on or within the personnel or cargo areas and are suitably routed or protected to prevent accidental damage.
- (b) Lines that can be isolated from the rest of the fuel system by valves at each end must incorporate provisions for relieving excessive pressures that may result from exposure of the isolated line to high temperatures.

COCKPIT  
DOOR

2.08.03

## SUBPART J — SPECIAL AIRWORTHINESS REQUIREMENTS

## 121.211 APPLICABILITY

- (a) This subpart prescribes special airworthiness requirements applicable to certificate holders as stated in paragraphs (b) through (e) of this section.
- (b) Except as provided in paragraph (d) of this section, each airplane type certificated under Aero Bulletin 7A or Part 04 of the Civil Air Regulations in effect before November 1, 1946 must meet the special airworthiness requirements in §§121.215 through 121.283.
- (c) Each certificate holder must comply with the requirements of §§121.285 through 121.291.
- (d) If the Administrator determines that, for a particular model of airplane used in cargo service, literal compliance with any requirement under paragraph (b) of this section would be extremely difficult and that compliance would not contribute materially to the objective sought, he may require compliance only with those requirements that are necessary to accomplish the basic objectives of this part.
- (e) No person may operate under this part a non-transport category airplane type certificated after December 31, 1964, unless the airplane meets the special airworthiness requirements in §121.293.

## 121.213 [Reserved]

## 121.215 CABIN INTERIORS

- (a) Except as provided in §121.312, each compartment used by the crew or passengers must meet the requirements of this section.
- (b) Materials must be at least flash resistant.
- (c) The wall and ceiling linings and the covering of upholstery, floors, and furnishings must be flame resistant.
- (d) Each compartment where smoking is to be allowed must be equipped with self-contained ash trays that are completely removable and other compartments must be placarded against smoking.
- (e) Each receptacle for used towels, papers, and wastes must be of fire resistant material and must have a cover or other means of containing possible fires started in the receptacles.

## 121.217 INTERNAL DOORS

In any case where internal doors are equipped with louvres or other ventilating means, there must be a means convenient to the crew for closing the flow of air through the door when necessary.

## 121.219 VENTILATION

Each passenger or crew compartment must be suitably ventilated. Carbon monoxide concentration may not be more than one part in 20,000 parts of air, and fuel fumes may not be present. In any case where partitions between compartments have louvres or other means allowing air to flow between compartments, there must be a means convenient to the crew for closing the flow of air through the partitions, when necessary.

## 121.221 FIRE PRECAUTIONS

- (a) Each compartment must be designed so that, when used for storing cargo or baggage, it meets the following requirements:
  - (1) No compartment may include controls, wiring, lines, equipment, or accessories that would upon damage or failure, affect the safe operation of the airplane unless the item is adequately shielded, isolated, or otherwise protected so that it cannot be damaged by movement of cargo in the compartment and so that damage to or failure of the item would not create a fire hazard in the compartment.
  - (2) Cargo or baggage may not interfere with the functioning of the fire-protective features of the compartment.
  - (3) Materials used in the construction of the compartments, including tie-down equipment, must be at least flame resistant.
  - (4) Each compartment must include provisions for safeguarding against fires according to the classifications set forth in paragraphs (b) through (f) of this section.
- (b) Class A. Cargo and baggage compartments are classified in the "A" category if—
  - (1) A fire therein would be readily discernible to a member of the crew while at his station; and
  - (2) All parts of the compartment are easily accessible in flight.

There must be a hand fire extinguisher available for each Class A compartment.

- (c) Class B. Cargo and baggage compartments are classified in the "B" category if enough access is provided while in flight to enable a member of the crew to effectively reach all of the compartment and its contents with a hand fire extinguisher and the compartment is so designed that, when the access provisions are being used, no hazardous amount of smoke, flames or extinguishing agent enters any compartment occupied by the crew or passengers. Each Class B compartment must comply with the following:

AFT MAINTENANCE LOG

AIR-C 17) Litho U.S.A.



O.C. 19

2.08.03  
7592-15

ACFT. NO.

ACFT. TYPE

N 8707C

DC-9-32

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	CLB	2-4-99	KOBY	KSLC	1211	1611	4100	1227	1606	3439	915	410	40.0		59121	2296
2	CLB	2-4-99	KSLC	KRNO	1450	1819	1429	1706	1809	1403	0	400	24.7	0	17155	0
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	07	DL1									011	S. Augustine	02459	1	1		
1	1:01	DT3			1	5	3	2			012	D.G. Jensen	26065	1	1		
3											013	D. Babbart	37815				
4											MP	B. Handke	12775				

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	PIM	maint. note: max Power Take-off from KOBY and KSLC	1.	Noted by maint.	2/4/99	KRNO	06359
2.	PIM	F/E seat won't move laterally without excessively amount of force.	2.	Lubed F/E's seat ops OK GOOD.	2/4/99	KRNO	06359
3.	P (M)	Ref: OMI 902011 LAV will not flush	3.	Removed and Replaced LAV Motor ops low normal this clears OMI 902011 PINCARS removed	2/4/99	KRNO	88324
4.	P (M)	#6 MLG w/t on bean from UPS needs to be removed and replaced with EWA w/t Assy	4.	Removed and Replaced #6 MLG w/t Assy IAW DC-8 min Chapter 32	2/4/99	KRNO	24231
5.	P (M)	#3 MLG w/t has a cut in it beyond limits.	5.	Removed and Replaced #3 MLG w/t Assy IAW DC-8 min Chapter 32	2/4/99	KRNO	24231
6.	P (M)	upon Insp. found smoke barrier damaged @ Area used for Access to main cargo compartment.	6.	Removed smoke barrier for repair Transferred item to new MEL list #N 7592156-0151	2/4/99	KRNO	06359

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
3	LAV Motor	143705-1	411-516	143705-1	EB0001	LAV
4	MLG w/t Assy	2601411-2	B-3472	2601411-2	B2402	#6
5	MLG w/t Assy	2601411-2	H-1209	2601411-2	B15553/H1501	#3

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT		
CHECK C/W:	STATION:	PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS	1-DIST.	2-DIST.	3-DIST.	
DATE:	CERT. NO.:	25375	2	25377				
GMT TIME:	AUTH SIG.:	PREV. A/C FLT. HRS.	FLT. HRS. THIS PAGE	TOTAL A/C FLT. HRS.				
		80266.09	4.42	80270.51				
DISC. OR MAINT. ACTION CARRIED FWD TO: 7592-16		BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE: <i>[Signature]</i>				

FT MAINTENANCE LOG

Air F-00. 97) Litho U.S.A.



QC  
10  
RRXA

2.08.03

7592-16

ACFT. NO.

N 870TV

ACFT. TYPE

DC-8-73F

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)	GAL'S	CARGO	MAIL
1																
2																
3																
4																

NO Flight

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CCDE	LDGS	STATION	1	2	3	4	APU								
1	:																
2	:																
3	:																
4	:																

MAX ONLY

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
2.	P/M	REF. NON MEL #193 RH Flap Insp. Due.	2.	Inspected RH Flap For Cracks, No Cracks Found Next Flap Insp Due 2-11-99	9/4/99	KEND	66359
3.	P/M	Comply with work Request # A03316 Cargo Sys. Insp.	3.	Complied with WR #A03316 Inspected Cargo Compartment As Required. No Defects Noted and Logged on Previous Log Page.	9/4/99	KEND	66359
4.	P/M		4.				
5.	P/M		5.				
6.	P/M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE			AIRCRAFT TIME / CYCLES				INS READOUT			
CHECK C/W: Term CK	STATION: KEND	PREVIOUS LANDINGS	25377	LANDINGS THIS PAGE	0	TOTAL LANDINGS	25377	1-DIST.	2-DIST.	3-DIST.
DATE: 2-5-99	CERT. NO.:	PREV. A/C FLT. HRS.	80270.51	FLT. HRS. THIS PAGE	0	TOTAL A/C FLT. HRS.	80270.51			
GMT TIME: 00:15	AUTH SIG: [Signature]									
DISC. OR MAINT. ACTION CARRIED FWD TO:			BOOK CHANGED NEW LOG PAGE NO:			CAPTAIN'S SIGNATURE				

FT MAINTENANCE LOG



O.C. ID  
RSEA

2.08.05

7592-19

ACFT. NO. N 870T-V, DC-8-73F  
CFT. TYPE

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	020	2/5/99	KDAY	KSEA	1230	1713	4+43	1239	1706	4+27	7964	76.0	19.7	0	50000	229/
2																
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #	
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU									
1	20	DL-1			2	5	3	4		0/1	J. Eudy	22882						
2	1:04	DM-2								0/2	R. McFadden	59340	1	1				
3										0/3	F. Silvestri	76499						
4																		

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P (M)	Terminating check due.	1.	CLW term. check per 2-6-99 EWA workcards.	2-6-99	KSEA	24674
2.	P (M)	FAA REPORTED ITEM! SMOKE DETECTORS #1 & #5, LEAD MOUNT PULLED OUT FROM CEILING PNL.	2.	installed missing screws checks good.	2-5-99	KSEA	04503
3.	P (M)	FAA REPORTED ITEM! SIDERAIL FHS (VERT. RET.) POS. #1 RT. HAS SELF-LOCKING NUT, MUST HAVE CASTLEATING NUTS.	3.	Replaced NUTS WITH AN 320-62-5-99 and si. ftyd checks good.	2-5-99	KSEA	04503
4.	P (M)	FAA REPORTED ITEM! SIDERAIL FLIP (VERT. RET.) POS. #13 RT. BINDING.	4.	Cleard and lubed checks good.	2-5-99	KSEA	04503
5.	P (M)	Ref. DMI #902020, hotcup inop.	5.	Cleard & resecurd hotcup plug. OPS checks normal. This clears MEL #902020. placard removed.	2-5-99	KSEA	24674
6.	P (M)	Ref. Planning request, measure A & C pit floors.	6.	Inspected barriers + measure floors as requested. Found solid barriers in A & C pits. Floor length: A' = 366", C' = 333".	2-5-99	KSEA	24674

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE				AIRCRAFT TIME / CYCLES				INS READOUT		
CHECK C/W: Term	STATION: KSEA	PREVIOUS LANDINGS	25379	LANDINGS THIS PAGE	1	TOTAL LANDINGS	25380	1-DIST.	2-DIST.	3-DIST.
DATE: 2-6-99	CERT. NO. [REDACTED]	PREV. A/C FLT. HRS.	8027424	FLT. HRS. THIS PAGE	4.27	TOTAL A/C FLT. HRS.	80278.51			
GMT TIME: 0153Z	AUTH SIG: [REDACTED]									
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE		





**EMERY WORLDWIDE AIRLINES**  
Request for Manual/Publication Revision

No. \_\_\_\_\_

ERROR     SUGGESTION FOR CHANGE (check appropriate space)    DATE 05/03/99

MANUAL/PUBLICATION TITLE EWA Aircraft maintenance manual

CHAPTER/SECTION/PAGE REFERENCE Chap 4. pg 4    PARAGRAPH \_\_\_\_\_

DESCRIPTION OF ERROR OR SUGGESTED CHANGE
<u>See attached for procedures for a permanent repair of the cargo compartment</u>
<u>smoke barrier. This procedure should be inserted beginning on pg 4. After</u>
<u>the cargo bin is done B repair.</u>
<u>See attached letter for Boeing and copy of specification</u>
<u>DPS 1-57-9</u>

Name Simon Chandler    Signature \_\_\_\_\_

Station Location BSA4-QC    Phone \_\_\_\_\_

Supervisor Approval \_\_\_\_\_

Director Maint. Approval \_\_\_\_\_

Director QC Approval \_\_\_\_\_

- Instructions:
1. Attach drawings, sketches, diagrams, etc.
  2. Forward to Director of Quality Control

MRB Approval Required (Check One)     YES     NO    Mgr. Of Reliability \_\_\_\_\_

2. Upper Cargo Compartment Smoke Barrier Maintenance Practices.

A. General

1. The repair procedures for the repair of the smoke barrier are referenced in the Douglas Process Standard (DPS) 1-07-9 and EWA Maintenance Manual, Chapter 4, for use on EWA's fleet.
2. The following procedures outline the use of adhesive or tape, and patch as a permanent repair for damaged smoke barriers as referenced in the repair limitations.

B. Policy FAR 121.221 (f).

FAA regulations require a means to exclude hazardous quantities of smoke, flames, or noxious gases from entering the Flight Crew compartment from the Class E cargo compartment. Following these procedures will ensure compliance with FAA regulations.

C. Upper cargo compartment smoke barrier repair.

1. General

Emery Worldwide Airlines will utilize the following repair methods to the upper cargo compartment smoke barriers, reference DPS 1-07-9.

2. Material Requirements

Type 1A vinyl adhesives (contact cement) DPM 6307, Stabond #N-134 or type 1B transfer tape DPM 5363, 3M tape Scotch #468, DMS 1992 Butyl coated glass cloth. Solvent cleaner DPM 6380-1, DPM 6380-2, DPM 6380-3, 180 grit sand paper.

D. Damage Limitations

1. Cut or tear up to 12" long.
2. "L" shaped cut or tear up to 9" long (9" x 9" maximum).
3. Holes up to 1 ½ inches in diameter.

**NOTE:** The number of repairs may not exceed 25% of the smoke barrier. If any of the limitations are exceeded, the smoke barrier will be replaced.

E. Repair procedures.

1. Surface preparation.

- a. Cut a patch of DMS 1992. The patch should overlap the damaged area by a minimum of 1". Abrade all the faying surfaces with 180 grit sandpaper, to remove grease, dirt and gloss. Remove grit with a clean lint free cloth.
- b. Clean all the faying surfaces by wiping with a lint free cloth dampened (not saturated) with solvent (specified above), continue wiping until there is no sign of contamination to the faying surface or cloth. Wipe immediately with a clean dry cloth.

**NOTE; DO NOT ALLOW SOLVENT TO EVAPORATE DRY ON THE SURFACE.**

2. Repair using type 1A contact cement.

- a. Apply a uniform coat (approximately 5 to 10 mils) of DPM 6307 adhesive to both faying surfaces. Allow the adhesive to air dry until tacky, approximately five (5) minutes.

**NOTE: Proper tack may be determined by lightly touching the adhesive with the knuckle. If the adhesive stick, grabs or tends to adhere to the knuckle, but does not transfer, the proper tack has been reached.**

- b. Join the faying surfaces using firm hand pressure, or roller pressure. Ensure that there are no wrinkles or bubbles in the bond area, and that the edges are firmly bonded.
- c. Document repairs in the Aircraft Log Book, or on a non-routine form.

3. Repair using type 1B adhesive transfer tape.

- a. Apply DPM 5363 adhesive transfer tape to one of the faying surfaces. One hundred percent coverage is not required, however, the periphery of the faying surfaces should be completely covered.
- b. Remove the release liner from the adhesive and join the faying surfaces with firm hand or roller pressure. Ensure that no transfer tape is left exposed.
- c. Document repairs in the Aircraft Log Book or on a non-routine form.

ATTN: Ron Moeley

From: dse.boecom@boeing.com

FROM: THE BOEING COMPANY  
SERVICE ENGINEERING  
CUSTOMER SUPPORT  
M/C D035-0035  
3855 LAKEWOOD BLVD.  
LONG BEACH, CA 90846  
206-544-0641 (FAX)  
32-9430 (TELEX)  
LKEBO7X (SITA)  
DSE (DIR CODE)

ATTN: C.H. GILLIAM - FIELD SERVICE REP

BAF-ILN-99-0014RR 02 APR 99  
ATA 2550-00 MODEL DC-8  
REPAIR OF SMOKE CURTAIN P/N 5891931  
REF /A/ BAF-ILN-99-0011TR /C/

YOUR REF /A/ ASKED WHERE SUBJECT REPAIR INFORMATION COULD BE FOUND.

PLEASE ADVISE BAF THAT NO REPAIR DATA FOR DC-8 SMOKE CURTAINS HAS BEEN PUBLISHED. BAF MAY USE THE FOLLOWING TO ACCOMPLISH REPAIR OF TEARS IN THE SUBJECT SMOKE BARRIER PANEL:

APPLY A PATCH MADE FROM DMS 1992, TYPE 2, BUTYL COATED GLASS CLOTH. THE PATCH SHOULD OVERLAP THE CURTAIN BY ONE INCH MINIMUM. BOND THE PATCH TO THE CURTAIN PER DPS 1.07-9, USING ONE OF THE FOLLOWING ADHESIVES:

--TYPE 1A VINYL ADHESIVE (CONTACT CEMENT) DPM 6307, STABOND #N-134, OR

--TYPE 1B TRANSFER TAPE, DPM 5363, 3M TAPE SCOTCH #468

BEST REGARDS, MARK

M. HANSEN/WASHKE  
DAVE WASHKE - (ACTING) AIRLINE SUPPORT MANAGER  
BOEING SERVICE ENGINEERING  
ORGN 6-T024 M/C D0035-0035

02 APR 99 1931

BOECOMII-FSE-ID-6859051-EMAIL-G

DAC 25-1710 (REV. 5-93)

<b>PROCESS ENGINEERING ORDER</b> DOUGLAS AIRCRAFT COMPANY LONG BEACH, CA			SHEET 1 OF 3		DPS *** 1,07-9	
			DATE	1	COMPLETE REVISION	
TITLE <b>MULTI-DPS AMENDMENT</b>			DATE	2	ADVANCE CHANGE	
			DATE	3	SERIALIZED CHANGE	95-033
HANDLING INSTRUCTIONS (HI): 2. COMPLY AT SPECIFIED EFFECTIVITY. 3. COMPLY WHEN INVOKED BY DRAWING OR OTHER AUTHORITY. 4. COMPLIANCE OPTIONAL; NO ENGRG. REQUIREMENT. 5. NOTED.			DATE	4	NEW	
			DATE	5	REISSUE TO REVISE	
2. COMPLY AT SPECIFIED EFFECTIVITY. 3. COMPLY WHEN INVOKED BY DRAWING OR OTHER AUTHORITY. 4. COMPLIANCE OPTIONAL; NO ENGRG. REQUIREMENT. 5. NOTED.			RELEASE APPROVALS			
			PEO MADE BY: J. Robinson <i>JR</i>			
PARA	MODEL	HL NO.	EFFECTIVITY	CUSTODIAN - M&P	DER - M&P	
All	Coml &	2	On or before December 1, 1995.*	<i>[Signature]</i> 6/30/95	<i>[Signature]</i> 6/30/95	
	Mil					
			VOID December 31, 1999.	TWIN-JET - M&P	TWIN-JET - M&P	
				<i>[Signature]</i> 7/5/95	<i>[Signature]</i> 6/30/95	
				GOVERNMENT - M&P	FUNCTIONAL - M&P	
					<i>[Signature]</i> 7/5/95	
DISTRIBUTION		SPECIALTY MANUAL NUMBERS		PRODUCT CONFIGURATION CONTROL		CONTRACT NO. M&P QCB
<input checked="" type="checkbox"/> STANDARD <input type="checkbox"/> LIMITED				<input type="checkbox"/> CLASS I <input checked="" type="checkbox"/> CLASS II		1208
				CCN	EWO	WRO
				2D95JA01	N/A	N/A
ACTION COPIES						
NAME		DEPT		MC		

This Serial PEO 95-033 is authority to supplement the affected DPS's listed herein. This SPEO will remain in effect until 12-31-99. Subsequent revisions of the listed DPS's will not replace this SPEO unless they are inactivated, superseded, or the requirements of this SPEO are incorporated.

\*Major subcontractors or suppliers performing processing to this DPS shall comply with the requirements defined herein within 90 days after receipt of this document. If compliance cannot be effected within the required time, a request for deviation shall be submitted to DAC.

Summary of Change(s) & Reason(s):

- Specified that DPM 5069 chlorosolv cleaner and DPM 6380 solvent should not be used for cleaning details, subassemblies or assemblies.  
 Reason: DPM 5069 has been deleted by M&PE for compliance to EPA regulations and DPM 6380 was deleted and replaced by alternative cleaners.

DPS \*\*\*1,07-9  
SPEO 95-033  
Page 2 of 3

2. Specified DPM 5069 chlorosolv cleaner and DPM 6380 replacements for cleaning structure.  
Reason: The Technology Labs have identified a solvent replacement for DPM 5069 chlorosolv cleaner and additional solvent alternatives that can replace DPM 5792 1,1,1-trichloroethane, when supplies are exhausted and DPM 6380 solvent.
3. Specified DPM 5792 1,1,1-trichloroethane alternatives.  
Reason: DPM 5792 manufacturers will cease production December 31, 1995, therefore, alternatives have been identified when supplies of DPM 5792 have been exhausted.
4. Specified that DPM 5069 chlorosolv cleaner use shall be discontinued after July 31, 1995.  
Reason: DAC (Industrial Hygiene and Safety Services) has committed to upper management to eliminate DPM 5069 use at all DAC facilities.

AFFECTED DPS's \*\*

1.069	3.029	3.80-15	4.50-157
1.07-3	3.030	3.804	4.50-160
1.07-7	3.070	3.806	4.50-163
1.07-8	3.178	3.808	4.50-165
1.07-9	3.206	3.809	4.50-166
1.07-11	3.22	4.301	4.50-167
1.07-14	3.40-5	4.303	4.50-168
1.07-19	3.40-9	4.35	4.50-169
1.07-21	3.40-18	4.50-3	4.50-174
1.07-30	3.40-21	4.50-4	4.50-178
1.080	3.40-22	4.50-8	4.50-187
1.084		4.50-9	4.50-188
1.085	3.307-1	4.50-33	4.50-189
1.087	3.425	4.50-36	4.50-190
1.092	3.442-26	4.50-50	4.50-191
1.093	3.51	4.50-53	4.50-193
1.094	3.51-3	4.50-62	4.50-194
1.14	3.67-11	4.50-66	4.50-195
1.33-2	3.67-22	4.50-74	4.50-196
1.461	3.67-22.1	4.50-89	
1.468	3.67-22.2	4.50-109	4.518
1.565	3.67-54	4.50-117	8.87
1.565-1	3.67-56	4.50-126	9.18
1.566	3.67-60	4.50-127	9.30
1.567	3.67-74	4.50-131	9.33
1.568	3.67-78	4.50-138	9.34
2.512	3.80-5	4.50-142	9.45
2.535	3.80-10	4.50-143	9.60
2.70-16	3.80-11	4.50-144	9.67
2.709	3.80-12	4.50-150	9.67-2
2.900	3.80-13	4.50-152	9.89
	3.80-14	4.50-153	9.301
		4.45-155	9.312
			9.462

DETAILED DPS SUPPLEMENTS

1. DPM 5069 chlorosolv cleaner and DPM 6380 solvent shall not be used for cleaning detail parts, subassemblies or assemblies when referenced in the DPS's listed above.
2. When solvents listed in paragraph 1 are specified for cleaning detail parts, subassemblies or assemblies DPMs 5792, 6380-1, 6380-2 or 6380-3 shall be used. Areas shall be cleaned in accordance with the instructions provided in the DPS's listed above.
3. When DPM 5792 1,1,1-trichloroethane supplies have been exhausted, use DPM 6380-1, DPM 6380-2 or DPM 6380-3.
4. DPM 5069 chlorosolv cleaner shall not be used for any purpose at any DAC facility after July 31, 1995.

JR  
JR:db

<b>PROCESS ENGINEERING ORDER</b> DOUGLAS AIRCRAFT COMPANY LONG BEACH, CA				SHEET 1 OF 2		DPS 1.07-9		
TITLE <b>CEMENTING INSULATION &amp; INSULATION COVERING</b>				DATE	1	COMPLETE REVISION		
				DATE	02-09-93	2	ADVANCE CHANGE	R
				DATE		3	SERIALIZED CHANGE	
				DATE		4	NEW	
				DATE		5	REISSUE TO REVISE	
HANDLING INSTRUCTIONS (HI): 2. COMPLY AT SPECIFIED EFFECTIVITY. 3. COMPLY WHEN INVOKED BY DRAWING OR OTHER AUTHORITY. 4. COMPLIANCE OPTIONAL; NO ENGRG. REQUIREMENT. 5. NOTED.				RELEASE APPROVALS				
				PEO MADE BY <b>K. Cutler</b>		QP&S-M&P COG ENGR <b>[Signature]</b> 02-09-93		
PARAGRAPH	MODEL	HI. NO.	EFFECTIVITY	QP&S-M&P GL OR DESIGNEE		C-17 M&P		
All	Com & Mil	2	On or before June 1, 1993*	<b>[Signature]</b> 2/6.5/93		<b>[Signature]</b> 2/9/93		
				MD-80 M&P <b>[Signature]</b> 2/9/93		MD-11 M&P <b>[Signature]</b> 2/9/93		
				CCN	RWO	WRO		
				2C93LRA5	N/A	N/A		
DISTRIBUTION: <input checked="" type="checkbox"/> STANDARD <input type="checkbox"/> LIMITED		SPECIALTY MANUAL NUMBERS 20		PRODUCT CONFIGURATION CONTROL <input type="checkbox"/> CLASS 1 <input checked="" type="checkbox"/> CLASS 2		CONTRACT NO.		
ACTION COPIES								
NAME		DEPT.	M/C	NAME		DEPT.	M/C	
B. Pearce		C1-Q6C	74-41	C. Bishop		C1-KD3	800-52	
M. Forrest-Woodward		C1-KD3	18-80					

This Advance PEO "R" is authority to change DPS 1.07-9, Revision "P".

Summary of Changes & Reason:

3. & 5.4.5 Changed to delete DMS 1880 and add DPM 5614-1 and DPM 6368.  
Reason: To comply with South Coast Air Quality Management District Rule 1124.

DETAILED DPS CHANGES  
(See Page 2)

\* Within the South Coast Air Quality Management District, these changes are mandatory at the effectivity date. Facilities outside SCAQMD jurisdiction are not required to comply with these changes until 1 January 1994, unless mandated sooner by local regulatory agencies.



APEO "R"  
Page 2 of 2

DELETE from paragraph 3., Mandatory: DMS 1880.

ADD to paragraph 3., Mandatory:

MATERIALS & SPECIAL EQUIPMENT - MANDATORY			
DPM NUMBER	MATERIAL NAME & MANUFACTURER'S DESIGNATION	MANUFACTURER'S NAME	SPECIFICATION NUMBER
5614-1	Adhesive, Silicone, Sealant (Clear); #Silastic 732 RTV-Clear	Dow Corning Corp. Midland, MI (1)	-
6368	Adhesive, Sealant, Flowable, Silicone Rubber; #3140 RTV Coating	Dow Corning Corp.	-

Change paragraph 5.4.5:

5.4.5 Type 1E - Silicone Adhesive (-65° to 200°F) - DPM 5614-1 and DPM 6368 adhesive/sealants are one part, air cure materials with no initial tack; therefore, parts should be held in place during cure with clamps or fasteners. DPM 5614-1 and DPM 6368 should only be used in areas with a width measuring no greater than one inch.

5.4.5.1 Apply a smooth uniform coat of the silicone adhesive, nominal 5 to 10 mils thick to both faying surfaces.

5.4.5.2 Join the faying surfaces immediately, before skinning over of the adhesive/sealant occurs.

5.4.5.3 Assemble the parts using sufficient pressure to ensure complete contact between the faying surfaces, taking care to avoid excessive squeeze out.

5.4.5.4 Maintain pressure on the bond line a minimum of eight hours.

5.4.5.5 Parts may be handled after removing pressure, but approximately 24 hours are required for a complete cure.

KC:db

<b>PROCESS ENGINEERING ORDER</b>				SHEET 1 OF 1		DPS 1.07-9					
DOUGLAS AIRCRAFT COMPANY				DATE	10-12-92	1	COMPLETE REVISION				
LONG BEACH, CA				DATE		2	ADVANCE CHANGE				
TITLE <b>CEMENTING INSULATION &amp; INSULATION COVERING</b>				DATE		3	SERIALIZED CHANGE				
				DATE		4	NEW				
				DATE		5	REISSUE TO REVISE				
				HANDLING INSTRUCTIONS (HI):				RELEASE APPROVALS			
				2. COMPLY AT SPECIFIED EFFECTIVITY. 3. COMPLY WHEN INVOKED BY DRAWING OR OTHER AUTHORITY. 4. COMPLIANCE OPTIONAL; NO ENGRG. REQUIREMENT. 5. NOTED.				PEO MADE BY		QP&S-M&P COG ENGR	
PARAGRAPH		MODEL	HI. NO.	EFFECTIVITY	K. Cutler <i>K. Cutler 9-28-92</i>		<del>9-28-92</del> 9-28-92				
All	Coml & Mil	2	On or before February 1, 1993	QP&S-M&P GL OR DESIGNEE	C-17 M&P <i>10/10/92</i>						
				<i>9/30/92</i> <del>9/30/92</del>	MD-80 M&P		MD-11 M&P <i>11/15/92</i>				
				<del>11/11/92</del>	CCN		EWO				
					2C92LRA5		N/A				
DISTRIBUTION:		SPECIALTY MANUAL NUMBERS		PRODUCT CONFIGURATION CONTROL		CONTRACT NO.					
<input checked="" type="checkbox"/> STANDARD		20		<input type="checkbox"/> CLASS 1 <input checked="" type="checkbox"/> CLASS 2							
<input type="checkbox"/> LIMITED											
ACTION COPIES											
NAME		DEPT.		M/C		NAME					

This PEO is authority to release DPS 1.07-9, Revision "P". This revision replaces and includes Revision "M". APEO "N" and SPEO 92-031A.

Summary of Changes & Reasons:

Changes are so numerous margin bars are not used. Technical changes are as follows:

- 3., 4.3.2, 4.4.1, 4.4.3, 5.4.2.1, 5.6.1.1, 5.6.1.2, & 5.6.3.2  
 Changed to delete DPM 2254 and add DPM 5626, DPM 6368, and DPM 6365.  
Reason: To comply with South Coast Air Quality Management District Rule 1124 and offer alternate approved compliant materials.
- 4.2  
 Changed to add adhesive handling requirements.  
Reason: To clarify and add more detailed instructions.
- 4.3.2, 4.3.5, 5.3.1, & 5.4.5.1  
 Reworded.  
Reason: To clarify and conform to standard material listing format.
- 4.3.3, 5.6.2.2, 5.8.1, & 6.2.3  
 Changed to delete Type 4 designation.  
Reason: Type 4 has been superseded.

XL.  
KC:db

MCDONNELL DOUGLAS CORPORATION PROPRIETARY RIGHTS ARE INCLUDED IN THE INFORMATION DISCLOSED HEREIN. RECIPIENT BY ACCEPTING THIS DOCUMENT AGREES THAT NEITHER THIS DOCUMENT NOR THE INFORMATION DISCLOSED HEREIN NOR ANY PART THEREOF SHALL BE REPRODUCED OR TRANSFERRED TO OTHER DOCUMENTS OR USED OR DISCLOSED TO OTHERS FOR MANUFACTURING OR ANY OTHER PURPOSE EXCEPT AS SPECIFICALLY AUTHORIZED IN WRITING BY MCDONNELL DOUGLAS CORPORATION.  
 UNPUBLISHED - CREATED ON PREPARATION DATE OF THIS DOCUMENT. ALL RIGHTS RESERVED UNDER THE COPYRIGHT LAWS BY MCDONNELL DOUGLAS CORPORATION.

<b>DOUGLAS PROCESS STANDARD</b>	DPS 1.07-9 REVISION "P"
CEMENTING INSULATION & INSULATION COVERING	ISSUE OF 10-12-92 REPLACES REVISION "M" PAGE 1 OF 14

## 1. SCOPE

1.1 This Process Standard establishes the requirements and provides the procedures to cement and seal insulation and insulation covering to themselves, bare and primed metal, plastics and reinforced plastic laminates. It shall be used when specified by an Engineering drawing or other Engineering authority.

1.2 Applicability - The requirements and procedures of this DPS are applicable (but not limited) to the following Douglas Material Specifications (DMS):

- DMS 1693 - Vinyl-Coated Nylon Cloth, Waterproof Flame Resistant
- DMS 1843 - Cloth, Nylon, Coated, Elastomer Heat Sealable
- DMS 1845 - Cloth, Glass, Elastomeric Coated
- DMS 1928 - Cloth, Plain or Twill Weave, Coated Vinyl
- DMS 1953 - Cloth, Glass, Silicone Rubber-Coated
- DMS 1966 - Insulation, Fibrous Glass, Silicone Binder
- DMS 1967 - Insulation, Fibrous Glass, Phenolic Binder, Water Repellent
- DMS 1992 - Cloth, Glass, Butyl Coated
- DMS 2072 - Film, Plastic, Metallized, Reinforced, Heat Sealable
- DMS 2084 - Cloth, Glass, Coated Elastomer
- DMS 2087 - Insulation, Compressed, Fibrous Glass, Phenolic Binder, Water Repellent
- DMS 2151 - Insulation, Fibrous Glass, Phenolic Binder, Water Repellent, 0.42 Density
- DMS 2312 - Film, Plastic, Metallized, Reinforced, Insulation Covering
- DMS 2315 - Film, Plastic, Metallized, Reinforced, Heat Sealable, Insulation Covering

1.3 Classification - Cementing and sealing of insulation and insulation coverings shall be per the following types. If no type is specified, see Table 1.1 or contact Materials and Process Engineering.

UNPUBLISHED - CREATED ON PREPARATION DATE IN TITLE BLOCK. ALL RIGHTS RESERVED UNDER THE COPYRIGHT LAWS BY McDONNELL DOUGLAS CORPORATION.

McDONNELL DOUGLAS CORPORATION PROPRIETARY RIGHTS ARE INCLUDED IN THE INFORMATION DISCLOSED HEREIN. RECIPIENT BY ACCEPTING THIS DOCUMENT AGREES THAT NEITHER THIS DOCUMENT NOR THE INFORMATION DISCLOSED HEREIN NOR ANY PART THEREOF SHALL BE REPRODUCED OR TRANSFERRED TO OTHER DOCUMENTS OR USED OR DISCLOSED TO OTHERS FOR MANUFACTURING OR FOR ANY OTHER PURPOSE EXCEPT AS SPECIFICALLY AUTHORIZED IN WRITING BY McDONNELL DOUGLAS CORPORATION.

DOUGLAS AIRCRAFT COMPANY

.....CODE IDENT. NO. 88277

1. (Cont'd)

Type	Method	Designation
1	A	Cementing Insulation Covers
	B	Contact Cement
	C	Adhesive Transfer Tape
	D	Insulation Splicing Tape
	E	Silicone Adhesive (-65° to 600°F)
2	A	Silicone Adhesive (-65° to 200°F)
	B	Silicone Adhesive (-65° to 600°F)
3	A	Cementing Insulation Batting
	B	General Purpose (-65° to 200°F)
	C	High Temperature (-65° to 600°F)
4	A	Sealing Sewn Seams
	B	Plastic Films and Coated Fabrics
	C	Plastic Films Using Splicing Tape
4	A	Silicone Coated Fabrics
	B	Cementing Nylon Breathers
	A	Non-Silicone Coated Fabrics
	B	Silicone Coated Fabrics

**TABLE 1.1**  
**SUPERSEDEENCE INFORMATION**

Previous Designation	New Designation
Permanent Adhesion Using Vinyl Adhesive	Type 1A
Removable Low Tack Adhesive	Type 1B
Permanent Adhesion Using Transfer Tape	Type 1B
Joining Seams and Covers with DMS 1984 Tape	Type 1C
Permanent Adhesion Using Silicone (DPM 5110)	Type 1D
Permanent Adhesion Using Silicone (DMS 1880)	Type 1E
Cementing Fibrous Batting (-65° to 200°F)	Type 2A
Cementing Fibrous Batting (-65° to 600°F)	Type 2B
Sealing Sewn Seams with Vinyl Adhesive	Type 3A
Sealing Sewn Seams with DMS 1984 Tape	Type 3B
Sealing Sewn Seams with DPM 5110 Silicone	Type 3C
Cementing Nylon Breathers on Insulation Covers	Type 4A
Cementing Nylon Breathers on Silicone Coated Fabrics	Type 4B

**2. APPLICABLE DOCUMENTS**

DPS 1.152 - Safety Cans &amp; Solvent Dispensers

**3. MATERIALS & SPECIAL EQUIPMENT**

3.1 The materials and special equipment necessary to perform the required operations of this DPS are listed in this section. The process materials and special equipment have been categorized as Mandatory or Substitutable. The category of Substitutable applies to Suppliers (Subcontractors, Vendors, and McDonnell Douglas Components other than Douglas Aircraft Company).

MATERIALS & SPECIAL EQUIPMENT - MANDATORY			
The use of DAC approved manufacturers' products and special equipment listed in this section, and referenced within the DPS, is mandatory.			
When a government or industry specification is shown and a manufacturer's product is listed, that product, (or Douglas approved alternative product) is mandatory. A DPM material having an approved alternative product(s) is so noted with the Footnote (1).			
When a government or industry specification is shown and no manufacturer's product is listed, the required material is one that is listed on the material specification QPL or one that meets the specification requirements, if no QPL exists.			
Requests for substitution of mandatory materials or special equipment shall be submitted to DAC for M&PE approval. The deviation request shall be prepared by the Supplier in the form of a change to the existing DPS using a Serial Process Engineering Order (SPEO), DAC Form 25-1710.			
DPM NUMBER	MATERIAL NAME & MANUFACTURER'S DESIGNATION	MANUFACTURER'S NAME	SPECIFICATION NUMBER
530	Solvent, Isopropyl Alcohol	-	TT-I-735, Grade A (1)(2)
3202	Primer, Silicone; #1200, Red or Clear	Dow Corning Corp. Midland, MI (1)(2)	-
5110	Adhesive, Silicone, Sealant; #RTV-106	G. E. Silicones Brea, CA (1)(2)	-
5363	Tape, Adhesive Transfer; #Scotch 468	Minn. Mining & Mfg. Co. L.A., CA	-
5626	Sealant, Clear; #Scotch-Seal No. 1103	Minn. Mining & Mfg. Co. (2)	-
6307	Adhesive, Neoprene Contact #Stabond N-134	Stabond Corp. Gardena, CA	-

3.1 (Cont'd)

MATERIALS & SPECIAL EQUIPMENT - MANDATORY			
DPM NUMBER	MATERIAL NAME & MANUFACTURER'S DESIGNATION	MANUFACTURER'S NAME	SPECIFICATION NUMBER
6365	Tape, Adhesive Transfer, Plasticizer Resistant; #Scotch F-9465 PC	Minn. Mining & Mfg. Co.	-
6368	Adhesive, Sealant, Flowable, Silicone Rubber; #3140 RTV Coating	Dow Corning Corp. Midland, Michigan (2)	-
-	Adhesive, Air-Drying, Two-Part, Silicone Rubber	-	DMS 1880 (1)
-	Tape, Adhesive, Insulation Cover Splicing	-	DMS 1984

MATERIALS & SPECIAL EQUIPMENT - SUBSTITUTABLE			
<p>Materials and special equipment listed in this section are used at DAC. Suppliers may use these materials and special equipment or substitute materials and special equipment which are functionally equivalent or superior. The substitute material or special equipment shall not degrade the process, part, assembly, or material properties.</p>			
DPM NUMBER	MATERIAL NAME & MANUFACTURER'S DESIGNATION	MANUFACTURER'S NAME	SPECIFICATION NUMBER
919	Paper, Sand; #180 Grit	Minn. Mining & Mfg. Co. (1)(3)	-
5792	Solvent, 1,1,1-Trichloroethane, Stabilized, Vapor Degreasing	-	Mil-T-81533 (2)
-	Wipers, Cleaning	-	DMS 1820, Type 1 Class A Grade 3 (4)

## 3.1 (Cont'd)

MATERIALS & SPECIAL EQUIPMENT - SUBSTITUTABLE			
DPM NUMBER	MATERIAL NAME & MANUFACTURER'S DESIGNATION	MANUFACTURER'S NAME	SPECIFICATION NUMBER
-	Cleaner, Douglas Solvent; #64	-	DMS 2283, Composition B (2)

[The numbers assigned to Douglas Process Materials (DPM's) are for internal company use. DPM's are QPL's for Douglas approved alternative products or sources.]

- FOOTNOTES:**
- (1) Contact Douglas buyer for Douglas approved alternative products or sources that are listed in the Douglas Process Material (DPM) Index for DAC use.
  - (2) Refer to DPS 1.152 for cleanliness, safety, and handling procedures for solvents.
  - (3) Any abrasive paper or cloth shall be used provided it is not treated with stearate or other material which could degrade adhesion or other surface property.
  - (4) Maximum extractable material shall not exceed one percent by weight when tested with cleaning solvent used by the supplier.

4. REQUIREMENTS4.1 Surface Preparation

4.1.1 All faying surfaces shall be cleaned per paragraph 5.3 and shall be completely dry before application of adhesives.

**EXCEPTION:** Fibrous glass insulation surfaces cannot be cleaned. Special care should be used to prevent contamination of these materials. Contaminated material shall be discarded.

4.1.2 The faying surfaces shall be cleaned with the appropriate solvent per Table 5.1.

DPS 1.07-9  
Rev. "P"  
Page 6 of 14

#### 4.1 (Cont'd)

4.1.3 Reinforced plastic laminate surfaces shall be sanded to remove the surface gloss in the area to be cemented, prior to cleaning with solvent.

#### 4.2 Adhesive Handling

4.2.1 All adhesive containers shall be tightly closed when not in use to prevent loss of solvents and contamination of the contents.

4.2.2 The adhesives specified in this DPS shall not be thinned or altered in any manner.

4.2.3 Reclaimed or shop-cleaned glue brushes shall not be used for applying adhesives. A new glue brush shall be used for each application of adhesive.

4.2.4 Use the smallest container possible.

4.2.5 Do not store mixed compounds for periods longer than specified. Discard any unused short pot-life compound immediately after use.

#### 4.3 Cementing

4.3.1 All contact cement and silicone adhesive bonded areas shall be free of lumps, wrinkles and lifted edges. There shall be no adhesive starved or unbonded areas.

4.3.2 Do not remove DPM 5363 or DPM 6365 adhesive transfer tape liner until just prior to use. DPM 5363 or DPM 6365 adhesive transfer tape shall not be left exposed after the faying surfaces have been bonded.

4.3.3 DMS 1984 splicing tape shall follow the contours of the receiving surfaces and shall not bridge gaps or wrinkles. Use type and class as specified on Engineering drawing.

4.3.4 Insulation batting shall be bonded such that the fibrous batting will delaminate if an attempt is made to remove it from the faying surface.

4.3.5 Surfaces bonded with DPM 5110 adhesive/sealant shall be assembled immediately, before skinning over of the adhesive occurs.

4.3.6 Surfaces bonded with DPM 5110 adhesive/sealant shall be fastened in place during cure for a minimum of eight hours.

4.4 Sealing Sewn Seams - When specified on the Engineering drawing, seams shall be sealed with the material specified below to form a water tight seal. When adhesive or sealant is used, only the minimum amount needed to seal the seam shall be used.

4.4.1 Seams in non-silicone coated fabrics shall be sealed with DPM 5626, DPM 6307, or DPM 6368.



#### 4.4 (Cont'd)

4.4.2 Seams in silicone coated fabrics shall be sealed with DPM 5110 adhesive sealant.

4.4.3 Sewn seams in reinforced plastic films (DMS 2072, DMS 2312, DMS 2315) shall be sealed with either DMS 1984 splicing tape or DPM 6307 adhesive.

4.5 Breathers - Cloth breathers shall be bonded to the inside surface of the cover material.

#### 4.6 Repairs

4.6.1 Commercial Programs - Holes, cuts, tears, and abraded areas in the insulation cover shall be repaired with a patch of the same material as the damaged cover. The patch shall extend a minimum of 1/2 inch beyond the damaged area and shall be cemented with an adhesive meeting the requirements of paragraph 4.3.

EXCEPTION: DMS 1984 insulation cover splicing tape may be used for patching DMS 1843, DMS 1928, DMS 1996, and DMS 2072 insulation blanket covers.

4.6.2 Military Programs - For military programs, nonconformances shall be submitted to Quality Assurance for appropriate action.

### 5. INSTRUCTIONS/PROCEDURES

5.1 Supplier Procedures - A supplier is not required to comply with the Instructions section of this DPS if the supplier has written instructions that result in compliance with the Requirements section. However, when there are specific instructions involved within a specific requirements paragraph or table, the supplier is required to comply with the instructions referenced within that paragraph or table. Supplier material substitutions are to be handled per Section 3.

5.2 Safety/Fire - The Douglas Safety Manual outlines the general safety precautions to be observed in connection with the procedures of this DPS. For detailed instructions, consult Occupational Safety or Fire Services.

#### 5.3 Surface Preparation

5.3.1 Abrade reinforced plastic laminate surfaces with DPM 919 sand paper. Remove the loose grit with a clean, dry DMS 1820 Type 1, Class A wiper, and then clean per paragraph 5.3.2.

Rev. "P"  
Page 8 of 14

### 5.3 (Cont'd)

5.3.2 Clean the faying surfaces by wiping with a DMS 1820, Type 1, Class A wiper dampened (not saturated) with the solvent specified in Table 5.1. Continue wiping, using clean wipers until there is no sign of contamination on the faying surface or the wiper. Wipe dry immediately with a clean dry wiper. Do not allow the solvent to evaporate dry on the surface.

**EXCEPTION:** Fibrous glass insulation cannot be cleaned and should be discarded when contaminated.

**TABLE 5.1**  
**SOLVENT SELECTION FOR MATERIALS**

Surface	Solvent	DPM
Titanium	Douglas #64 - DMS 2283	-
Acrylic	Isopropyl Alcohol	530
Polycarbonate	Isopropyl Alcohol	530
Aluminum	1,1,1-Trichloroethane	5792
Stainless Steel	1,1,1-Trichloroethane	5792
Carbon Steel	1,1,1-Trichloroethane	5792
Reinforced Plastic Laminate	1,1,1-Trichloroethane	5792

### 5.4 Type 1 - Cementing Insulation Covers and Blankets

#### 5.4.1 Type IA - Contact Cement

5.4.1.1 Apply a uniform coat approximately 5 to 10 mils of DPM 6307 adhesive to both faying surfaces. Allow the adhesive to air dry until tacky, approximately 5 minutes.

**NOTE:** Proper tack may be determined by lightly touching the adhesive surface with the knuckle. If the adhesive sticks, grabs, or tends to adhere to the knuckle but does not transfer, the proper tack has been reached.

5.4.1.2 Join the faying surfaces using firm hand or roller pressure. Ensure that there are no wrinkles or bubbles in the bond area and that the edges are firmly bonded.

5.4.1.3 Allow to dry a minimum of eight hours before handling.

#### 5.4.2 Type IB - Adhesive Transfer Tape

5.4.2.1 Apply DPM 5363 or DPM 6365 adhesive transfer tape to one of the faying surfaces. DPM 6365 is recommended for use on highly plasticized materials. One hundred percent coverage is not required; however, the periphery of the faying surfaces should be completely covered.

5.4.2.2 Remove the release liner from the adhesive and join the faying surfaces with firm hand or roller pressure. Ensure that no transfer tape is left exposed.

## 5.4 (Cont'd)

### 5.4.3 Type 1C - Insulation Splicing Tape

5.4.3.1 Remove the release liner from the insulation splicing tape.

5.4.3.2 Apply the tape so that it is approximately half on each faying surface. Apply the tape so that it follows the contour of the faying surfaces and does not bridge structural mismatches or blanket wrinkles.

5.4.4 Type 1D - Silicone Adhesive/Sealant (-65° to 600°F) - DPM 5110 adhesive/sealant is a one part, air cure material with no initial tack; therefore, parts should be held in place during cure with clamps or fasteners.

5.4.4.1 Apply a uniform coat of DPM 5110 adhesive/sealant, 5 to 10 mils thick to both faying surfaces.

5.4.4.2 Assemble faying surfaces immediately, before skinning over of the adhesive occurs.

5.4.4.3 Assemble the parts with sufficient pressure to maintain contact throughout the bond line without causing excessive squeeze out.

5.4.4.4 Maintain pressure on the bond line a minimum of eight hours.

5.4.4.5 Parts may be handled after removing pressure, but approximately 24 hours is necessary for complete cure.

5.4.5 Type 1E - Silicone Adhesive (-65° to 200°F) - DMS 1880 is a two part adhesive that has initial tack; therefore, parts may not require clamps or fasteners.

5.4.5.1 Apply a thin uniform coat (approximately 0.0005 inch) of DPM 3202 silicone primer to the surface of the non-rubber part using a clean DMS 1820, Type 1, Class A, Grade 3 wiper (wiper should be dampened - not dripping). Allow the primer to air dry a minimum of 30 minutes. Ensure the primer coating is completely dry to the touch before applying the adhesive compound. The silicone primer is red in color, permitting easy observation of surface coverage. If a pink powdery film forms after drying, use a clean, dry DMS 1820 Type 1, Class A wiper to remove the film before applying the adhesive compound.

### WARNING

The adhesive base (resin), catalyst and primer are furnished in a flammable solvent. Avoid contact with heat, sparks, or open flame. Repeated skin contact and prolonged or repeated breathing of the vapors should be avoided.

### 5.4.5 (Cont'd)

5.4.5.2 Mix the DMS 1880 adhesive system compounds (resin and catalyst) in the ratio specified below:

Vendor Adhesive System	Mixing Ratio (Parts by Weight)
DAPCO 3301 Adhesive System	
Part A, silicone rubber adhesive resin	100
Part B, activator	3.3
Silgrip SR-529 Adhesive System	
Part A, silicone rubber resin	100
Part B, amine-type catalyst	1

**NOTE:** Do not mix more adhesive than can be used within a two hour working period.

5.4.5.3 Mix the components in a clean glass, metal or polyethylene coated container. A narrow thin metal spatula is best used as the mixer. Mix thoroughly until the mass is uniform in viscosity.

5.4.5.4 Apply a smooth uniform coat, 5 to 8 mils thick, of the mixed adhesive to both faying surfaces and allow to dry until tacky, approximately 45 minutes.

5.4.5.5 Join the faying surfaces using firm hand or roller pressure.

### 5.5 Type 2 - Cementing Insulation Batting

#### 5.5.1 Type 2A - General Purpose (-65° to 200°F)

5.5.1.1 Apply a uniform coat of DPM 6307 adhesive to the receiving surface not to the batting. Allow the adhesive to dry until tacky, approximately 5 minutes.

5.5.1.2 Press the batt onto the adhesive with light hand or roller pressure.

#### 5.5.2.2 Type 2B - High Temperature (-65° to 600°F)

5.5.2.1 Apply a uniform coat of DPM 5110 adhesive/sealant, 5 to 10 mils thick to the receiving surface, but not to the batting.

5.5.2.2 Immediately press the batt to the adhesive with light hand or roller pressure. Allow to dry undisturbed for a minimum of two hours.

5. (Cont'd)

5.6 Type 3 - Sealing Sewn Seams

5.6.1 Type 3A - Plastic Films and Coated Fabrics

**NOTE:** Seal silicone coated fabrics such as DMS 1953 per Type 3C.

5.6.1.1 Apply a uniform thin film of DPM 5626, DPM 6307, or DPM 6368 adhesive/sealant with a plews pistol oiler, tube, or polyethylene bottle to the sewn seam. Apply only the minimum amount necessary to assure a liquid tight seal. A satisfactory seal could be as small as 1/16 inch, but should not exceed 1/4 inch.

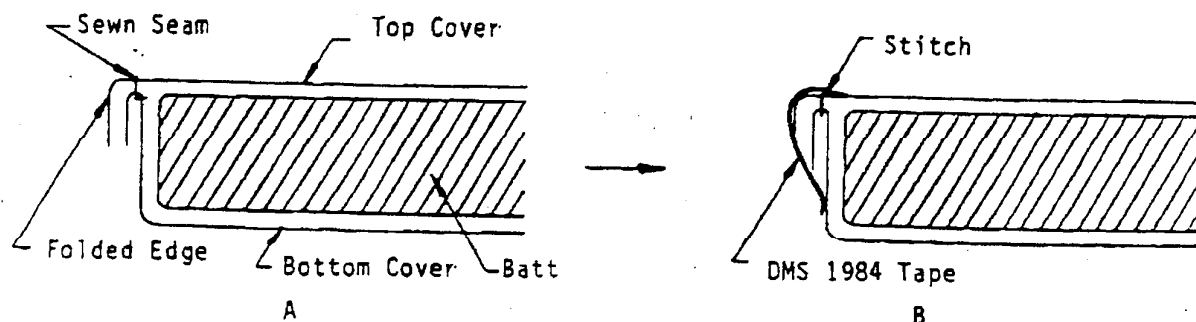
**NOTE:** Where color might be objectionable, use clear DPM 5626 or DPM 6368. DPM 6307 is not recommended for highly plasticized films or coated fabrics.

5.6.1.2 Support the parts to prevent adhesive runs, and allow to dry until tack free. Parts sealed with DPM 5626 may be handled after 15 minutes, but 4 hours are required for a complete cure. Parts sealed with DPM 6307 may be handled after one hour, but 24 hours are required for a complete cure. Parts sealed with DPM 6368 become tack free and may be handled after 2 hours, but 72 hours are required for a complete cure.

## 5.6 (Cont'd)

### 5.6.2 Type 3B - Plastic Films Using Splicing Tape

5.6.2.1 Fold the seam edge areas of the blanket cover so that they lay flat against the blanket as shown in Figure 5.1A.



**FIGURE 5.1**  
**SEALING SEAMS WITH TAPE**

5.6.2.2 Remove the release liner from the DMS 1984 splicing tape. Apply the tape to the folded seam edge, completely covering the sewn seam as shown in Figure 5.1B. Apply the tape so that it follows the contour of the blanket and does not bridge wrinkles or shallow spots.

### 5.6.3 Type 3C - Silicone Coated Fabrics

5.6.3.1 When DMS 1953 silicone coated fabric is sewn to silicone coated fabric, seal the sewn seams with a bead of DPM 5110 adhesive/sealant 1/8 to 3/8 inch wide.

5.6.3.2 When a non-silicone coated fabric is sewn to a silicone coated fabric, apply a coat of DPM 5626 or DPM 6307 adhesive approximately 1/8 inch wide to the non-silicone coated fabric adjacent to the seam and allow to dry until tack free. Seal the seam per paragraph 5.6.3.1.

## 5. (Cont'd)

### 5.7 Type 4 - Cementing Nylon Breathers

#### 5.7.1 Type 4A - Non-Silicone Coated Fabrics

5.7.1.1 Cut a circular patch of the nylon breather cloth according to the applicable Engineering drawing, approximately 1 1/2 inches larger than the diameter of the hole in the cover.

5.7.1.2 Apply a coat of DPM 6307 adhesive approximately 3/4 inch wide around the circumference of the edge of the cut hole on the side which will be the inside surface of the insulation cover.

5.7.1.3 Place the nylon cloth breather over the opening in the insulation cover material and press it onto the applied adhesive.

5.7.1.4 Allow the adhesive to cure ten minutes before handling the cover.

#### 5.7.2 Type 4B - Silicone Coated Fabrics

5.7.2.1 Cut out the nylon breather cloth per paragraph 5.7.1.1.

5.7.2.2 Apply a uniform coat approximately 10 to 15 mils thick of DPM 5110 adhesive/sealant about 3/4 inch wide around the circumference of the edge of the cut hole on the side which will be the inside surface of the insulation cover.

5.7.2.3 Place the nylon cloth breather over the opening in the insulation cover material and press it onto the applied adhesive.

5.7.2.4 Allow the adhesive to cure for two hours before handling the cover. Approximately 24 hours are required for a complete cure.

### 5.8 Repair of Insulation Coverings - Commercial Programs

5.8.1 Cut a patch of the same material as that being repaired, a minimum of 1/2 inch larger than the damaged area. Patches may be cut from DMS 1984 splicing tape for use on DMS 1843, DMS 2072, DMS 2312, or DMS 2315 material.

5.8.2 Clean the faying surfaces per paragraph 5.3.

5.8.3 Cement the patch to the damaged area as specified per the applicable portions of paragraph 5.4.

5.9 Repair of Insulation Coverings - Military Programs - All nonconformances shall be submitted to Quality Assurance for appropriate action.

## 6. QUALITY ASSURANCE PROVISIONS

6.1 Process Control - Provide surveillance as necessary to determine compliance with this DPS and other applicable Engineering requirements, with particular attention to the following:

DPS 1.07-9  
Rev. "P"  
Page 14 of 14

## 6.1 (Cont'd)

6.1.1 Reinforced plastic laminate surfaces are sanded prior to cleaning.

6.1.2 Faying surfaces are cleaned of visible contaminants and completely dried prior to application of adhesives, except fibrous glass insulation which should be discarded if contaminated.

6.1.3 The faying surfaces shall be clean, dry, and unsoiled by grease, oil, or oil-like contaminants which could degrade adhesion or other surface property.

6.1.4 Surfaces bonded with DPM 5110 adhesive/sealant shall be assembled immediately, before skinning over of the adhesive occurs.

6.1.5 Surfaces bonded with DPM 5110 adhesive/sealant shall be fastened in place during cure for a minimum of eight hours.

6.1.6 Adhesives specified in this DPS are not thinned or altered in any manner.

6.1.7 Insulation materials are installed using the appropriate adhesives and methods for each type of material.

6.2 Acceptance Inspection - Inspect as necessary to verify conformance to the Engineering drawings and DPS requirements, with particular attention to the following:

6.2.1 Contact cement and silicone adhesive bonded areas are free of lumps, wrinkles and lifted edges. There are no adhesive starved or unbonded areas.

6.2.2 No adhesive transfer tape is left exposed after the faying surfaces have been bonded.

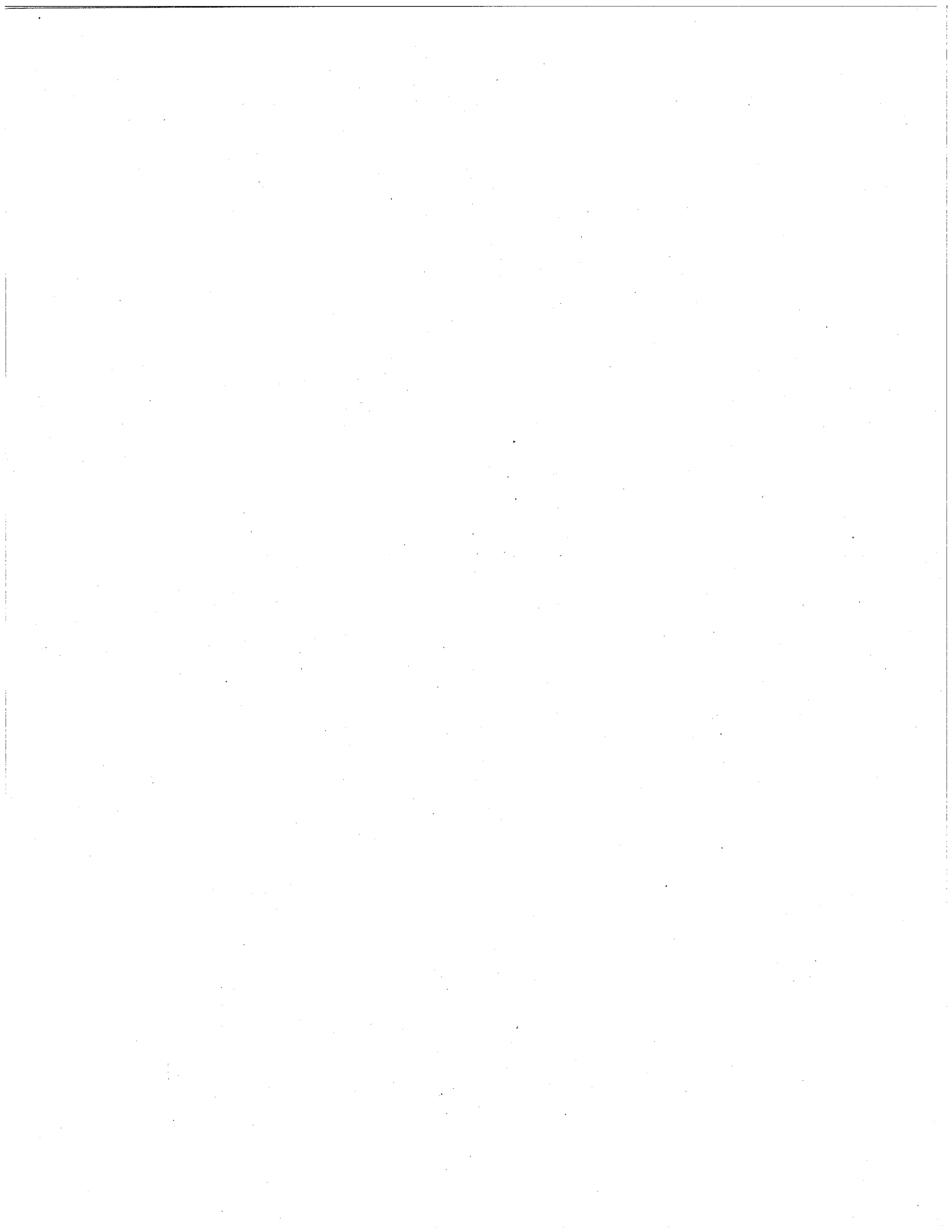
6.2.3 DMS 1984 splicing tape shall follow the contours of the receiving surfaces and shall not bridge gaps or wrinkles.

6.2.4 Insulation batting shall be bonded such that the fibrous batting will delaminate if an attempt is made to remove it from the faying surface.

6.3 Nonconformances - Process nonconformances in accordance with standard practice.

X.C.  
KC:db





## **RASIP FINDING**

### **2.08.04**

RRXA deferred maintenance procedures contained in the Maintenance Policy and Procedures Manual, Chapter 3, Page 18, Temporary Revision 04, dated Oct 22, 1998, does not ensure the aircraft are maintained in accordance with applicable airworthiness requirements. The manual defines Non-MEL items as those that have no airworthiness connotations such as reading lights, window shades, minor corrosion to non-structural parts, galley equipment, etc.

The RASIP Team reviewed the Non-MEL deferral list and found that several items did not fall into this category and did not include a reference a maintenance manual or a basis for continued airworthiness. See Findings 2.08.02.

### **2.08.04 RRXA RESPONSE.**

EWA has reviewed the Non-MEL items in question. The MEL/CDL and Non-MEL provision in Chapter 3 of our Maintenance Policy and Procedures Manual gives examples of the items that can be Non-MEL. This does not spell out all the items that can be entered. All items were based on Maintenance Manual reference as a basis for continued airworthiness, and did not render the aircraft in question unairworthy. EWA considers these findings to be in accordance with our current procedures in the EWA Maintenance Policy and Procedures Manual, Chapter 3. Please find a copy of the portions of the manual in question Revision Number 4. Also please find a copy of the introduction page to our DC-8 MEL listing.

EWA's M.P.P, Chapter 3, requires EWA trained mechanics to perform all maintenance per approved/accepted data.

EWA considers this to be no finding.

**EMERY WORLDWIDE AIRLINES  
MAINTENANCE POLICY & PROCEDURES MANUAL**

5. All entries in the Aircraft Maintenance Log book and all entries related to the deferred maintenance control system are based on Zulu (Z) or Greenwich Mean Time (GMT) only. Local time has no bearing on this system.

Example:

If a discrepancy is entered into the log book on September 20, and is then deferred under MEL category B rules, the 3-day limitation actually becomes effective at 0001Z on September 21 and expires at 2359Z on September 23. An aircraft may continue in-service through September 23 providing that it lands prior to 2359Z, the established time of DMI expiration.

However, if the aircraft is scheduled for flight and will land after 2359Z on September 23, the MEL/DMI must either be corrected prior to the flight or must be authorized and approved for extension of the MEL/DMI prior to the flight.

6. Under normal circumstances, all deferred discrepancies must be corrected on or before the established MEL category maximum deferral interval.
7. In the event that a DMI cannot be corrected within the allocated MEL category maximum deferral interval due to unforeseen circumstances, a MEL/DMI extension may be authorized and approved in accordance with procedures provided later in this section.
8. Maintenance Control must authorize all MEL deferrals and due date entries into the MEL/DMI section of the aircraft log book. Authorization of all MEL/DMI due date entries, including extension due dates, do NOT require any form of hard copy notification that the extension approval has been accepted by the FAA. Verbal authorization by Maintenance Control to the Maintenance Representative, Captain, or Flight Engineer of a due date extension is sufficient for log book entry.
9. All Deferred Maintenance Items will have a complete detailed method to coordinate the maintenance personnel, parts, and aircraft at a specific time and place for repair set forth by the Director of Maintenance and/or Quality Control and/or Maintenance Control, within the set maximum deferral interval.
10. Maintenance Control is responsible for managing the computerized DMI tracking and planning control system to ensure that current status and accurate information is maintained for all deferred items.

## EMERY WORLDWIDE AIRLINES MAINTENANCE POLICY & PROCEDURES MANUAL

11. Maintenance Control is responsible for coordinating with Materials and/or Purchasing in regard to requisition and disposition of parts or materials that are required to correct deferred items.
12. Collective efforts will be made by Materials, Purchasing, and Maintenance Control to ensure that the computer system is continuously updated to provide current information and current status regarding all back-orders of parts, materials, and/or tooling.
13. A summary list which provides specific information pertinent to each open DMI is available to Maintenance Management for review.
14. Aircraft dispatched into service must have all items of equipment installed, whether operative or inoperative EXCEPT those items detailed in the Configuration Deviation List. Under no circumstances or conditions may an aircraft be dispatched contrary to the Minimum Equipment List applicable to the aircraft.

### B. MEL Category Policy

All MEL items have been assigned to a category (A, B, C, or D), which requires those items to be repaired in a specified time period. EWA's MEL lists separately, item per item, the required FAA category.

Maintenance Control will be responsible for ensuring that the correct category is assigned and tracking all MEL items when they become inoperative, when the items are due for repair, and when it was repaired.

#### 1. Category Description

Maximum time between deferred and repair will be as follows:

##### a. Category A

Items in this category shall be repaired within the time interval specified in the remarks column. With regard to flight days repair period, Category "A" items shall be repaired within the specified days, "excluding the day the malfunction was recorded in the Maintenance Record/Log Book during which at least one flight is initiated for the affected aircraft.

##### b. Category B

Category "B" items within 3 consecutive days (72 hours), not counting the day the malfunction occurred. For example, if occurrence was at 10 A.M. Z, January 26<sup>th</sup>, the 3-day interval would begin at midnight Z on the 26<sup>th</sup> of January and expire at midnight Z on the 29<sup>th</sup> of January.

## EMERY WORLDWIDE AIRLINES MAINTENANCE POLICY & PROCEDURES MANUAL

c. Category C

Category "C" items in this category shall be repaired within ten (10) consecutive calendar days (240) hours (Z time), excluding the day the malfunction was recorded in the aircraft maintenance record/log book. For example, if it were recorded at 10 A.M. on January 26<sup>th</sup>, the 10 day interval would begin at midnight the 26<sup>th</sup> of January and end at midnight February 5<sup>th</sup>.

d. Category D

Category "D" items shall be repaired within one hundred and twenty (120) consecutive calendar days (2880 hours), excluding the day the malfunction was recorded in the aircraft maintenance log and/or record. In some cases, items are listed with the number Required being equal to the number Installed. In such instances the Item(s) is/are Required to be operative. When this occurs, the symbol will be listed in the category column in lieu of A, B, C, or D. In unusual circumstances where the repair time limits described here cannot be met, Emery Worldwide Airlines may extend the repair deadline in accordance with the approved deferral program.

**Note:** The DC-8 MEL 25-13 (Passenger Convenience Items) does not have an FAA Repair Interval Category Assignment. Items as listed under this MEL system/sequence number can be documented as a Non-MEL deferral.

**C. Configuration Deviation List Policy**

An aircraft may be dispatched in revenue service with certain parts such as plates and doors removed as specified in the Configuration Deviation List (CDL). Where items are grouped under the same Gross Weight (GW) performance penalty, whenever more than one item from this or the MEL is missing or inoperative, the GW performance penalties are cumulative. The CDL is contained in the same manual as the MEL under the heading MEL/CDL Manual. The deferral procedures for CDL items is similar to the procedure for MEL items, but a category number (A, B, C, or D) is not required.

**D. Non-MEL Item**

1. Policy

As in the MEL/CDL, Non-MEL items that have no airworthiness connotations, such as reading lights, window shades, minor corrosion to non-structural parts, galley equipment, etc. While these items do not fall into the requirements of the MEL/CDL, EWA has developed a means to ensure that these items are corrected in a timely manner.

Since these items are non-airworthy, there is no set time interval to perform corrective action, but by maintaining an accurate list, they can be scheduled with routine inspections of specific areas for the most efficient and most effective correction.

## EMERY WORLDWIDE AIRLINES MAINTENANCE POLICY & PROCEDURES MANUAL

### 2. Deferral Procedures

The deferral procedure for a Non-MEL item is the same as for MEL items, but a category number (A, B, C, or D) and Inoperative Equipment Placard (MEO32) are not required.

### 3. Non-MEL Deferred Items generated as a result of Periodic Check or Inspection

Discrepancies generated and recorded as a result of check/inspection requirements may be carried over (deferred) for correction/repair at a later scheduled time provided the discrepancy falls into one of the following categories:

- a. Equipment items that are non-essential to the continued airworthiness of the aircraft, i.e. crew or courier comfort items (EXCEPT THE TRASH RECEPTACLE INTEGRITY FOR CONTAINING POSSIBLE TRASH FIRES), air conditioning distribution items such as air outlets, etc.
- b. Minor secondary structure defects such as dented skin (provided internal inspection has ascertained no damage has resulted to frames, stringers, attachments, etc.) that are within the limits of the manufacturer's manuals.

**Note:** Before evaluating or repairing any damage to stressed aircraft structure, the airframe manufacturer's Structural Repair Manual should be consulted for the correct evaluation criteria and instructions concerning the use of the correct tools, methods, and equipment. Scratches, dents, dings, scraps, and other apparently minor damage, while sometimes appearing insignificant, modify the load path through the structure creating undesirable stress concentrations.

- c. Interim repairs to secondary structure that are approved by Quality Control.

**Note:** A full and complete description of any discrepancy will be supplied to Quality Control including dimensions and severity of damage. Pictures will be taken and immediately forwarded to Quality Control if obtainable.

- d. Modifications items - that do not affect the airworthiness of the aircraft.
- e. Appearance items such as cleaning, painting, or interior trim conditions (except interior trim that may cause injury if contact is made by an individual or trim conditions that may interfere with the proper operation of seats, exits, or other emergency equipment).

# EMERY WORLDWIDE AIRLINES MAINTENANCE POLICY & PROCEDURES MANUAL

- f. When a Non-MEL item is entered in the Log Book for temporary replacement of a Rigid Hydraulic Tubing with a flexible hose, a material requisition number for the part on order or to be manufactured, must be entered in the Log Book Non-MEL item description block at the time of deferral.

**Note:** The DC-8 MEL 25-13 (Passenger Convenience Items) does not have an FAA Repair Interval Category Assignment. Items as listed under this MEL system/sequence number can be documented as a Non-MEL deferral.

## E. Deferral Procedures

The following is a step-by-step procedure for the recording and controlling of log and form entries pertaining to deferrable items.

1. EWA's Maintenance Control Center must be notified immediately of a discrepancy requiring deferral, whether it be MEL, CDL, or Non-MEL prior to flight.
2. The EWA Maintenance Controller will be responsible for reviewing the applicable MEL/CDL for any restrictions or follow-up action which may be required by the deferral.
3. If it is determined that the discrepancy can and should be deferred, Maintenance Control will enter the discrepancy in the Deferred Maintenance Computer Program file under the applicable aircraft and assign a category letter (A, B, C, or D if applicable) and control number to the deferred item.
4. It shall be the responsibility of the Maintenance Controller to coordinate all form/log entries with the mechanic releasing the aircraft for flight.
5. It shall be the responsibility of the Maintenance Controller to notify Flight Dispatch as soon as possible by hard copy (Sita, Telex, or Telefax) of the conditions of the aircraft including the MEL or CDL chapter number/page, deferral control number, category, and due date/time.

**Note:** The following procedures will be utilized by flight crew when deferring items after the main entry door is closed for block out and prior to takeoff.

1. The Professional Flight Engineer will enter the MEL/CDL system/ sequence number, i.e. 74-5, on the Inoperative Equipment Placard (MEO32) and attach it to the applicable inoperative unit or switch in the cockpit.
2. The Professional Flight Engineer will enter the discrepancy in the "Discrepancy" block in the aircraft maintenance log.

## EMERY WORLDWIDE AIRLINES MAINTENANCE POLICY & PROCEDURES MANUAL

**Note:** 3. The Professional Flight Engineer will enter the words "Deferred by Flight Crew" and the MEL/CDL system/sequence number in the "Corrective Action" block along with the date, station, and employee number in the blocks provided. If the MEL item has a (M) and/or (O) "Action Requirement" the professional Flight Engineer will, if appropriately certified, perform the function of the mechanic for the specific maintenance procedure(s) and enter the item(s) in the above corrective action. These procedures contained in the MEL must be accomplished.

4. Immediately upon arrival at a station, staffed by EWA Maintenance Personnel, it is the Captain's responsibility to notify maintenance of the Flight Crew deferral. Maintenance will then contact Maintenance Control to have a control number and category assigned to the MEL/CDL item listed by the Flight Crew. Maintenance will then transfer the MEL/CDL deferral to the applicable deferral section in the front of the log book and add the control number to the inoperative equipment placard. Maintenance will make every effort to correct the discrepancy and document the sign-off as outlined in this section.

6. If approval for deferral is obtained, the mechanic will:

a. Obtain a DMI control number from Maintenance Control for the deferred item and enter a statement in the Corrective Action block of the aircraft log: Deferred as Control Number \_\_\_\_\_ in accordance with (MEL System/Sequence Number \_\_\_\_\_, Category \_\_\_\_.) or (CDL System/Sequence Number \_\_\_\_\_) or (Non-MEL procedures). The station code, date, and employee number must accompany corrective action taken.

b. The discrepancy then must be entered by the mechanic from the log page on the Deferred Maintenance Form located in front of the aircraft log as follows (reference example MEL/CDL or Non-MEL form at the end of this section):

- (1) Block 1: Category letter and control number
- (2) Block 2: Log page number
- (3) Block 3: Originating date discrepancy was written
- (4) Block 4: Station discrepancy was written
- (5) Block 5: Enter original due date provided by Maintenance Control
- (6) Block 10: Original discrepancy system/ sequence number



# EMERY WORLDWIDE AIRLINES MAINTENANCE POLICY & PROCEDURES MANUAL

**Note:** Reference Flight Restrictions or inspections for information to the Flight Crew.

7. Deferral Placarding

Complete an Inoperative Equipment Placard (MEO32) and attach it to the applicable inoperative unit or switch in the cockpit for MEL deferrals. Complete a CDL Limitation Placard (MEO40) and attach it to the instrument panel in clear view of the pilot. Non-MEL deferrals **DO NOT** require placarding.

8. Deferral Authorization Number System Procedure

- a. Maintenance Control will be responsible for issuing control numbers.
- b. The DMI Control Number assigned by Maintenance Control will be formatted as illustrated in the example below.

Example: C4519223-0001

<u>MEL Category</u>	<u>Log Page Number</u>	<u>Discrepancy Number</u>	<u>Sequence</u>
(C)	(4519-22)	(3)	0001

**Note 1:** The MEL Category is not required for CDL or Non-MEL deferrals.

**Note 2:** CDL items will be coded first digit with the letter "Z".

**F. Clearing a Deferred Discrepancy**

1. To clear a deferred discrepancy, the mechanic will enter the discrepancy from the DMI form in the next open discrepancy block in the aircraft log using the control number.
2. Clear the entry on the DMI form as follows:
  - a. Block 6: Enter the extended date provided by Maintenance Control when applicable.
  - b. Block 7: Enter date when discrepancy was corrected.
  - c. Block 8: Enter station where discrepancy was corrected.
  - d. Block 9: Enter log page number where discrepancy was corrected.
3. Clear the discrepancy in the "Corrective Action" block of the aircraft log with a concise description of action taken. After the correction action entry, enter the statement "DMI control number \_\_\_\_\_ cleared. Placards removed."

INTRODUCTION

2.08.04

GENERAL

This MEL is a copy of the FAA approved Minimum Equipment List for those DC-8 Aircraft operated by Emery Worldwide Airlines. It is prepared and revised jointly by the Operations and Maintenance Departments.

Compliance with the intent of the Preamble and all of the provisions of this MEL is mandatory for all flights operated by Emery Worldwide Airlines when dispatching an aircraft with inoperative equipment. No deviation from these requirements is permitted unless a "Special Ferry Permit" is obtained specifically allowing such Deviation.

Federal Aviation Regulations (Part 121.303 through 121.359) require certain equipment to be operative for a given type of aircraft operation. Paragraph 121.628 provides for Deviations from these requirements under certain conditions. Emery Worldwide Airlines Aircraft will be dispatched under the use of this MEL per the procedures addressed in this Manual.

All Components/Systems on an aircraft fall into one of three basic classifications with regard to airworthiness requirements.

- (1) Units obviously required for aircraft to be airworthy such as Tires, Ailerons, Wings, etc.
- (2) Units obviously not required for aircraft to be airworthy such as Cabin Trim, Galleys, Lavatories, etc.
- (3) Units which do not clearly fall into either of the above classes or for which some Deviations from the normal complement of equipment has been approved.

This MEL contains those items in the Third Classification for which some Deviation from the normal complement of equipment has been approved to be inoperative at dispatch.

CONTENT:

This MEL was designed to include the immediate information that Operations/Maintenance personnel need to dispatch/release an aircraft with items of equipment inoperative or malfunctioning. Each MEL item listing incorporates the immediate information necessary to determine whether an aircraft can be released under the MEL with that item inoperative. Each item listed includes all applicable Remarks/Exceptions, Aircraft Operating Limitations, FAR Interpretations and those Operational Limitations unique to EWA Operations specifications, when required.

In the case of some inoperative items, the FAA Master Minimum Equipment List for the DC-8 requires that each Air Carrier develop Special Procedures in order to dispatch with a particular item inoperative. Where required, this MEL includes such Procedures and any additional notes or information necessary to insure that the aircraft can be dispatched safely. These Maintenance and/or Operational Procedures, where necessary, are further broken down to incorporate different (types or degrees of) malfunctions of a particular item.

**PREAMBLE**

The following is applicable for Authorized Certificate Holders operating under Federal Aviation Regulations (FAR) Parts 121, 125, 129, 135. The FAR require that all equipment installed on an aircraft in compliance with the Airworthiness Standards and the Operating Rules must be operative. However, the Rules also permit the publication of a Minimum Equipment List (MEL) where compliance with certain equipment requirements is not necessary in the interests of safety under all operating conditions. Experience has shown that with the various levels of redundancy designed into aircraft, operation of every system or installed component may not be necessary when the remaining operative equipment can provide an acceptable level of safety. A Master Minimum Equipment List (MMEL) is developed by the FAA, with participation by the aviation industry, to improve aircraft utilization and thereby provide more convenient and economic air transportation for the public. The FAA approved MMEL includes those items of equipment related to airworthiness and operating regulations and other items of equipment which the Administrator finds may be inoperative and yet maintain an acceptable level of safety by appropriate conditions and limitations; it does not contain obviously required items such as wings, flaps, and rudders. The MMEL is the basis for development of individual operator MELs which take into consideration the operator's particular aircraft equipment configuration and operational conditions. Operator MELs, for administrative control, may include items not contained in the MMEL; however, relief for administrative control items must be approved by the Administrator. An operator's MEL may differ in format from the MMEL, but cannot be less restrictive than the MMEL. The individual operator's MEL, when approved and authorized, permits operation of the aircraft with inoperative equipment.

Equipment not required by the operation being conducted and equipment in excess of FAR requirements are included in the MEL with appropriate conditions and limitations. The MEL must not deviate from the Aircraft Flight Manual Limitations, Emergency Procedures or with Airworthiness Directives. It is important to remember that all equipment related to the airworthiness and the operating regulations of the aircraft not listed on the MMEL must be operative.

Suitable conditions and limitations in the form of placards, maintenance procedures, crew operating procedures and other restrictions, as necessary, are specified in the MEL to ensure that an acceptable level of safety is maintained.

The MEL is intended to permit operation with inoperative items of equipment for a period of time, until repairs can be accomplished. It is important that repairs be accomplished at the earliest opportunity. In order to maintain an acceptable level of safety and reliability, the MMEL establishes limitations on the duration of and conditions for operation with inoperative equipment. The MEL provides for release of the aircraft for flight with inoperative equipment. When an item of equipment is discovered to be inoperative, it is reported by making an entry in the Aircraft Maintenance Record/Logbook as prescribed by FAR. The item is then either repaired, or may be deferred, per the MEL or other approved means acceptable to the Administrator prior to further operation. MEL conditions and limitations, do not relieve the operator from determining that the aircraft is in condition for safe operation with items of equipment inoperative.

PREAMBLE (Cont.)

When these requirements are met, an Airworthiness Release, Aircraft Maintenance Record/Logbook entry, or other approved documentation is issued as prescribed by FAR. Such documentation is required prior to operation with any item of equipment inoperative.

Emery Worldwide Airlines is responsible for exercising the necessary operational control to ensure that an acceptable level of safety is maintained. When operating with multiple Inoperative Items, the interrelationships between those items and the effect on aircraft operation and crew workload will be considered.

Emery Worldwide Airlines has established a controlled and sound repair program including the parts, personnel, facilities, procedures and schedules to ensure timely repair.

WHEN USING THE MEL, COMPLIANCE WITH THE STATED INTENT OF THE PREAMBLE, DEFINITIONS AND THE CONDITIONS AND LIMITATIONS SPECIFIED IN THE MEL IS REQUIRED.



## RASIP FINDING

### 2.11.01

EWA is not complying with their approved maintenance program as described in their maintenance manual. The following aircraft were inspected and found with cargo restraint system components installed which fail to conform to Type Certificate Data Sheet and/or Supplemental Type Certificate (STC) requirements:

- A. The side support rail on N-500 MH was found cracked (No 2 position next to the main cargo door). The Emery ULD Director was present during the ramp inspection (inbound) at the Dayton Hub on 02/03/99. He notified maintenance personnel.
- B. A side rail vertical restraint flipper on N-870TV was found inoperative at the Seattle Airport (inbound) on 02/05/99, and not capable of providing vertical restraint (Compartment 13).
- C. Ramp inspection of Aircraft, N-994CF, at the Dayton Hub (Flt No. 107) on 02/02/99, revealed the following discrepancies:
  - Pos 1 Intercaustal were not covered with gill liner material in the Class "E" compartment.
  - Pos 2 Cargo door safety lock was not operational
  - Pos 2 Cargo door safety lock rod was bent The cargo restraint locks located in positions 8; 10;12;13; and 14 were from different manufacturer and design and all had different part numbers.
  - Pos 15 Gill liner was repaired with sheet metal.
  - Pit A Door net was torn and did not have an identification tag.
  - Pit D Aft access panel had missing hardware and was bent at the bottom. Door net was torn and did not have an identification tag.
- D. Ramp inspection of Aircraft, N-832AL, at the Dayton Hub (outbound) on 02/03/99, revealed the following discrepancies:
  - Pos 2 Cargo door up lock latch not engaged. Up lock release rod missing.
  - Pos 1 Intercaustal not covered by gill liner material. Class "E" compartment.
  - Pos 3 Cargo lock not attached to floor track.
  - Pos 6 Cargo lock missing and not installed. Found one lock on cochran loading platform not tagged or identified.  
Left side forward over-wing escape hatch gill liner material ripped and torn.
  - Pos 16 Roller trays installed were short roller trays (four rollers per tray) instead of long roller trays.
  - Pos 17 Roller trays installed were short roller trays (four rollers per tray) instead of long roller trays.
  - Pos 18 Roller trays installed were short roller trays (four rollers per tray) instead of long roller trays.

### 2.11.01 RASIP FINDING (continued)

- E. Ramp inspection of Aircraft, N-8 177U, at the Dayton Hub (inbound) on 02/02/99, revealed that the smoke barrier had a hole. The previously installed tape was peeling away.
  - F. Ramp inspection of Aircraft, N-2674U, at the Dayton Hub (inbound) on 02/04/99, revealed that the smoke barrier had a hole. The previously installed tape was peeling away.
  - G. Ramp inspection of Aircraft, N-606AL, at the Dayton Hub (Flt 027) on 02/02/99, revealed the following discrepancies:
    - Pos 1 Sheet metal repair to gill liner right side of aircraft.
    - Pos 1 9G net attachment fitting area did not have manufactured molded form gill liner. Standard gill liner material was used to replace molded liner and left the underlying structure open to the cargo compartment.
    - Pos 11 Roller in roller tray fifth from the left missing pin retainer.
    - Pos 17 Roller in roller tray fourth from the left missing pin retainer. Several roller trays had repairs to the side channels with doublers and several had rollers that were repositioned so that the OEM roller tray roller spacing was not maintained.
  - H. Ramp inspection of Aircraft, N-957R at the Dayton Hub (Flt 223) on 02/03/99, revealed the following discrepancies:
    - Pos 1 Smoke Barrier was not attached at the top and bottom of the fuselage. Gill liner had sheet metal repairs.\*\*
    - Pos 2 Cargo door hydraulic fittings were leaking. Upper door frame sheet metal was damaged and had missing fasteners
    - Pos 3 Side rail on left side was not attached to the cargo floor
    - Pos 6 Cargo lock roller, roller pin was not secured
    - Pos 8 Cargo lock roller, roller pin was not secured. Roller tray left side was lying on the floor not attached in the seat track
    - Pos 9 Roller tray roller left and right side rails were broken and roller was missing
    - Pos 11 Roller trays are modified to change the roller spacing
- \*\* The RASIP Team was present when the L1 door was opened and noticed the smoke barrier on the left side was not secured.

### 2.11.01 RASIP FINDING (continued)

I Ramp inspection of Aircraft, N-796FT, at the Dayton Hub (Flt 115) on 02/03/99, revealed the following discrepancies:

- Pos 1 Two cargo locks installed in ball mat area.
- Pos 3 Center roller tray assembly was shorten and had approximately two rollers removed.
- Pos 4 Three roller tray assemblies had rollers installed with different spacing than original. Sheet metal was used to effect repairs to gill liner instead of gill liner material.
- Pos 6 Sheet metal was used to effect repairs to gill liner.
- Pos 7 Four roller section on right and left side was not installed in floor track.
- Pos 8 Roller tray assemblies had rollers installed with different roller spacing.
- Pos 9 Roller tray assemblies had rollers installed with different roller spacing.
- Pos 15 Sheet metal repair to gill liner.

J. Ramp inspection of Aircraft, N-950R, at the Dayton Hub (Flt 015) on 02/04/99, revealed the following discrepancies:

Cargo lock, fifth lock from the left, between pallet positions 1 and 2 was not engaged.

Pos 10 roller pin was not secured in the roller tray.

K. Ramp inspection of Aircraft, N-604AL, at the Portland, OR., outstation (inbound) on 02/03/99, revealed the following discrepancies:

1. The over wing window was not covered with fireproof material (gill liner).
2. Main cargo deck overhead light was deferred and covered with gill liner material. The light had the lens broken.

These two items were brought to the attention of EWA maintenance personnel.

L. Ramp inspection of Aircraft, N-603AL, at the Portland, OR., outstation (inbound) on 02/04/99, revealed the following discrepancies:

1. Roller tray assemblies not installed in Compartment 17, position (1) and (7).
2. Lamp covers were missing in Compartment 2. This discrepancy was brought to the attention of EWA maintenance personnel who installed gill liner material.



### 2.11.01 RASIP FINDING (continued)

M. Ramp inspection of Aircraft, N-792FT, at the Los Angeles, CA., outstation (inbound) on 02/02/99, revealed the following discrepancies:

1. Ball mat/side rail attach hardware was torn from floor position two (2) right side. This was brought to the attention of EWA aircraft maintenance personnel and an entry was made in the aircraft logbook.
2. Incorrect cargo restraint locks were installed in positions 41, 42, and 43. Should have been Part No. 3889344-501 instead of Part No. 3889344-1. This was brought to the attention of EWA aircraft maintenance personnel and an entry was made in the aircraft logbook.
3. One ball assembly was missing from ball mat position (2) on the left side. This was brought to the attention of EWA aircraft maintenance personnel and an entry was made in the aircraft logbook.
4. Side restraint flipper rails were found inoperative in positions 1 (left) and 4 (right) sides. These rails provide vertical restraint to the installed Unit Load Device (ULD). This was brought to the attention of EWA aircraft maintenance personnel and an entry was made in the aircraft logbook.
5. Roller tray assemblies (six) were broken and not secured. The rollers were located in positions 4, 6, 8, and 13. This was brought to the attention of EWA aircraft maintenance personnel and an entry was made in the aircraft logbook.
6. A roller tray assembly was found missing in the Class E compartment.

FAR 121.367; 121.369; 121.153(a) and 25.1301

### 2.11.01 RRXA RESPONSE

A. A/C N500MH was out of service undergoing a transit check during the time of this FAA inspection. All items were corrected in accordance with the manufacturers specifications, EWA Aircraft Maintenance Manual, and EWA Maintenance Policy and Procedures Manual, Chapter 3. EWA does not consider this to be a finding.

Corrective Action(s): Removed and replace rail position 2 right hand with serviceable unit.

**2.11.01 REXA RESPONSE (continued)**

- B. A/C N870TV was having a terminating check performed during the time of this FAA inspection, all items were corrected in accordance with the manufacturers specifications, EWA Aircraft Maintenance Manual, and EWA Maintenance Policy and Procedures Manual, Chapter 3. EWA does not consider this to be a finding.

Corrective Action: Cleaned and lubed, checks good.

- C. A/C N994CF all items were corrected before flight. EWA does not consider this to be a finding.

Corrective Action(s):

- Position 1. Sealed areas around smoke barrier as required.
- Position 2. Repositioned Safety Latch as required, Safety latch ops check good.
- Position 2. Placed on NON-MEL number 261, NOTE: this item has no airworthiness connotations.
- Position 15. This Aircraft has sheet metal liner installed in cargo compartment in accordance with STC SA1802SO
- PIT A: Removed and replaced net as required.
- PIT D: Removed and replaced net as required.
- Position 8, 10, 12, 13 and 14: EWA Quality Control previously furnished Mr. Mike Woodward with data to substantiate interchangeability of cargo loading system components. Please see attached letter dated February 10, 1999, and February 15, 1999. At this time, EWA has contracted to Mr. Bill Cotney an FAA approved DER to substantiate a listing of interchangeable parts in the ANCRA, PEMCO, BROWNLINe and DOUGLAS LOADING SYSTEMS. Upon receipt of this interchangeability listing by component and part number, it will be added to our EWA Aircraft Maintenance Manual. Please see attached Requisition Dated 04-02-1999 to Mr. Bill Cotney

**2.11.01 RRXA RESPONSE (continued)**

**D. A/C N832AL**

**Corrective Action(s):**

- Position 2: Cargo door up lock checks good, release rod installed ops check good.
- Position 1: Intercostal covered and taped with gill liner tape. No other defects noted.
- Position 3: Removed and replaced lock assembly per Pemco component MM Ref Log Page 6797-7.
- Position 6: Inspected Number 6 cargo pallet position, found all pallet locks serviceable and in good working condition.
- Position 16: Placed on Non-MEL Number N8622053-1039.
- Position 17: Placed on Non-MEL Number 8622054-1040.
- Position 18: Roller trays in position 18 are long roller trays ops check good.

**E. A/C N8177U**

**Corrective Action:** Placed on Non-MEL Number N6959102-1117, placed courier seat on MEL number D6959103-1116 due to no protection for courier(s) see Log Page 6959-10.

**F. A/C N2674U**

**Corrective Action:** Transferred to Non-MEL Number N6561021-1144, see Log 6561-01, referenced Item Number 6. Courier seats placed on MEL Number D6561016-1143 in accordance with MEL Number 2514 CAT D. and placards installed, see Log Page 6561-02.

**G. A/C N606AL** was out of service undergoing a transit check during the time of this FAA inspection. All items were corrected in accordance with the manufacturers specifications, EWA Aircraft Maintenance Manual, and EWA Maintenance Policy and Procedures Manual, Chapter 3. EWA does not consider this to be a finding.

## 2.11.01 RRXA RESPONSE (continued)

### Corrective Action(s):

Position 1: Removed sheet metal and repaired with gill liner as required.

Position 1: Temporarily repaired 9-G net mount holes with gill liner placed on Non-MEL Number 29, repaired per EWA Aircraft Maintenance Manual, Chapter 4.

The aircraft in question was reported to have formed panels missing from the 9-G barrier net attach fittings. These items were researched in the IPC and could not be located per effectivity. On February 05, 1999, Quality Control faxed Mr. Marcus Brown of Boeing Long Beach Division, Service Engineering, a request for help locating these parts. Please see the attached letter of response from Mr Dave Waske, (acting) Airline Support Manager for the Boeing Company, Service Engineer Customer Support. Quality Control faxed Mr. Mark Hansen/Washke the information he requested to research these drawings for P/N's for the 9-G net close out panels.

While waiting for this information to arrive Quality Control will develop a Fleet Campaign Directive to inspect EWA fleet of aircraft requiring these panels. Quality Control will also develop a method to seal these areas off until the panels arrive for installation.

See FCD 25-19 attached.

Position 11: Reinstall roller pin as required, reference Log Page 7399-24 attached.

Position 17: Reinstall roller pin as required, reference log page 7399-24 attached

- H. A/C N957R was out of service undergoing a transit check during the time of this FAA inspection. All items were corrected in accordance with the manufacturers specifications, EWA Aircraft Maintenance Manual, and EWA Maintenance Policy and Procedures Manual, Chapter 3, except Pos 2 upper door frame sheet metal damaged. This is an open Non-Routine at Tennessee Technical Services. See attached. EWA considers this to be no finding.

## 2.11.01 RRXA RESPONSE (continued)

### Corrective Action(s):

- Position 1: Entered in Non-MEL list Number 317.
  - Position 2: Inspected cargo door actuator no leaks noted.
  - Position 3: Resecured left hand side rail position 3, no defects noted, see Log Page 7516-09 attached.
  - Position 6: Removed and replaced pallet lock assembly position 6-5 ops check normal.
  - Position 8: Removed and replaced roller assembly position 8/9 ops check good, reference Log Page 7516-09.
  - Position 9: Removed and replaced roller assembly position 9 ops check good, reference Log Page 7516-0.
- NOTE:** A DC-8 Flight Engineer's Bulletin was issued 04-05-99, to ensure the 9-G net is attached prior to block out. See bulletin attached.

### I. A/C N796FT

#### Corrective Action(s):

- Position 1: Inspected aircraft, found previously complied with.
- Position 3: Inspected aircraft, found item previously complied with.
- Position 4: Inspected aircraft, found repairs previously complied with, gill liner repaired in accordance with EWA Maintenance Manual, Chapter 4.
- Position 6: Gill liner repaired in accordance with EWA Maintenance Manual chapter 4
- Position 7: Inspected aircraft, found previously complied with.
- Position 8: Inspected aircraft, found previously complied with.
- Position 9: Inspected aircraft found previously complied with.
- Position 15: Repaired gill liner in accordance with EWA Maintenance Manual, Chapter 4.

### J. A/C N950R was out of service undergoing a transit check during the time of this FAA inspection. All items were corrected in accordance with the manufacturers specifications, EWA Aircraft Maintenance Manual, and EWA Maintenance Policy and Procedures Manual, Chapter 3. EWA considers this to be no finding.

#### Corrective Action(s):

- Position 1 5th lock from left: Reference EWA Aircraft Maintenance Manual, Chapter 3, Page 1, Paragraph C, Item 1A allows one lock per position may be broken or missing, without any load limitations to that position. EWA considers this no finding.
- Position 10: Secured roller at position 10 checks normal, see Log Page 7524-18 attached.

**2.11.01 RRXA RESPONSE (continued)**

K. A/C N604AL

**Corrective Action(s):**

Item 1: Installed gill liner per EWA Aircraft Maintenance Manual, Chapter 4, Page 3, see non-routine Log Page 6900-22 Non-Routine Number 3.

Item 2: Found light assembly covered by gill liner. Removed patch found lens cover missing. Transferred to dmi per MEL 33-3 CAT D Control Number D 6960093-1042, due date 07-27-99 placard installed. Reference Log Page 6960-09

**NOTE:** see Log Page 6960-11, MEL Number D690093-1042 was cleared.

L. A/C N603AL, the items in question were fixed prior to flight and EWA considers this to be no finding.

**Corrective Action(s):**

Item 1: Installed roller trays, see Non-Routine 5399-02, Item 1.

Item 2: Found deactivated installed panel and secured. See Non-Routine 5399-02 Item Number 2.

M. A/C N792FT the items in question were fixed prior to flight and EWA considers this to be no finding.

**Corrective Action(s):**

Item 1: Installed new hardware and resecured, reference Non-Routine 6719-21 Item 1 attached.

Item 2: Replaced 4 bear traps as required, reference Non-Routine 6719-21, Page 3 of 3, Item 10.

Item 3: Transferred to Non-MEL Number 180 reference Log Page 6719-22.

Item 4: Lubed all 3 side restraints, all checks good. Reference Non-Routine, Page 2 of 3, Item Number 6.

Item 5: Resecured and installed 5 small roller trays. See Non-Routine 6719-22, Page 1 of 3, Items 2 and 3.

Item 6: Found no roller tray missing as per Non-Routine, reference Log Page 7836-04, Item 5.

IFT MAINTENANCE LOG

All Figures (10/0/7) Litho U.S.A.



Q.C.  
10  
RRXA

2.11.01 A

7610-17

ACFT. NO.  
N 500MH

ICFT. TYPE  
100-8-71F

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	007	02/02/99	TJSS	KDAY	0600	0637	4+37	0224	0631	4+07	7879	78.0	25.6	0	63854	3534
2			TJSS													
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1											01	D Russell	72676			DH Rosenberg	EWAMR
2											02	J Baratis	05693	1	1		
3											T3	E. Sobel	78556				
4											X4	K Tallon	81550				

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
2.	P / M		2.				
3.	P / M		3.				
4.	P / M		4.				
5.	P / M		5.				
6.	P / M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
1	SIDE RAIL	50881-509	NFN	50881-509	NFN	2, RH.

AIRWORTHINESS RELEASE				AIRCRAFT TIME / CYCLES				INS READOUT		
CHECK C/W: TRANSIT	STATION: KDAY	PREVIOUS LANDINGS	31414	LANDINGS THIS PAGE	1	TOTAL LANDINGS	31415	1-DIST.	2-DIST.	3-DIST.
DATE: 2-3-99	CERT. NO. [REDACTED]	PREV. A/C FLT. HRS.	79082.39	FLT. HRS. THIS PAGE	4.07	TOTAL A/C FLT. HRS.	79086.46			
GMT TIME: 0700Z	AUTH. SIG. [REDACTED]		79495.37							
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE		

2552

FT MAINTENANCE LOG



O.C.  
10  
1999

2.11.01 B

7592-19

ACFT NO. N 870T-V-128-73F  
J.T. TYPE

3092 (10/97) Lulu U.S.A

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	020	2/5/99	KOMY	KSEA	1230	1713	4+43	1239	1706	4+27	7964	76.0	19.7	0	50000	229/
2																
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	20	DL-1			2	5	3	4		0/1	J. Eudy	22882					
2	1:04	DM-2								0/2	R. McFadden	59340	1	1			
3										0/3	F. Silvestri	76499					
4																	

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P (M)	Terminating check due.	1.	C/W term. check per 2-6-99 EWA workcards.	2-6-99	KSEA	24674
2.	P (M)	FAA REPORTED ITEM! SMOKE DETECTORS #1 & #5, LEAK MOUNT FOLDED OUT FROM CIELING PNL.	2.	installed missing screws checks good.	2-5-99	KSEA	04503
3.	P (M)	FAA REPORTED ITEM! SIDERAIL FLIP (VERT. RET.) POS. #1 RT. HAS SELF-LOCKING NUT, MUST HAVE CASTLEATING NUTS.	3.	Replaced NUTS WITH AN 320-62-5-99 and S.F.T.d checks good.	2-5-99	KSEA	04503
4.	P (M)	FAA REPORTED ITEM! SIDERAIL FLIP (VERT. RET.) POS. #3 RT. BINDING.	4.	Cleaned and lubed checks good.	2-5-99	KSEA	04503
5.	P (M)	Ref. DMI # 092020, hotcup inop.	5.	Cleaned & resecured hotcup plug. OPS checks normal. This clears MEL # 9 B2020. placard removed.	2-5-99	KSEA	24674
6.	P (M)	Ref. Planning request, measure A & C pit floors.	6.	Inspected barriers & measure floors as requested. Found solid barriers in A & C pits. Floor length: A = 366", C = 333".	2-5-99	KSEA	24674

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE				AIRCRAFT TIME / CYCLES				INS READOUT		
CHECK C/W: Term.	STATION: KSEA	PREVIOUS LANDINGS	25379	LANDINGS THIS PAGE	1	TOTAL LANDINGS	25380	1-DIST.	2-DIST.	3-DIST.
DATE: 2-6-99	CERT. NO. [REDACTED]	REV. A/C FLT. HRS.	8027424	FLT. HRS. THIS PAGE	4.27	TOTAL A/C FLT. HRS.	80278.51			
GMT TIME: 0153Z	AUTH SIG: [REDACTED]									
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE		



FT MAINTENANCE LOG



2-11-01C - Pos 1

All (002) (10/07) Litho U.S.A

7601-06

ACFT. NO. N 99414

ACFT. TYPE DC-8-62

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)	GAL'S	CARGO	MAIL
1																
2																
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #	
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU									
1	:				0	0	0	0	0									
2	:																	
3	:																	
4	:																	

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P (M)	ON FAA WALK AROUND Found DRIP FWD NET TURN	1.	REPID Net AS Required	2/2/99	KDAY	25956
2.	P (M)	ON FAA WALK AROUND Found Access PANEL IN DRIP to OutFlow VLV area bent & missing fasteners	2.	Installed Camlock fasteners AS Required, Straightened Panel AS Required	2/2/99	KDAY	25956
3.	P (M)	ON FAA WALK AROUND Found Several INNER COSTS leading to smoke barrier not sealed	3.	Sealed Areas around smoke barrier <del>entirely</del> AS Required	2/2/99	KDAY	25956
4.	P (M)	ON FAA INSP, Inspector Noted elongated hole AT end of GAUGE BAR Actuator where Actuator ATTACH	4.	Placed ON NON MEL 1/4" W ENWA AMM CHAP 3 PG 85 NON MEL # 262	2/2/99	KDAY	25956
5.	P (M)	ON FAA INSP Inspector Noted main CARGO Door GAUGE BAR Pulled in from overtorquing of bolts AT LOCK PIN Pivot POINTS	5.	Placed ON NON MEL 1/4" W ENWA AMM CHAP 3 PG 85 NON MEL 263	2/2/99	KDAY	25956
6.	P (M)	main CARGO Door GAUGE BAR lock PINS disconnected 1/4" W ENWA Aircraft M/M CHAP 3 PG 85	6.	Installed 12 EA Bolts in Place of lock PINS to secure main CARGO Door 1/4" W ENWA AMM CH 3 PG 85 RII P-33 25956	2/2/99	KDAY	139529

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
1	CARGO NET	825033	NSN (M)	EWA-252103-00	NSN (M)	DFWD

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W: <i>NSN</i>	STATION: <i>KDAY</i>	PREVIOUS LANDINGS	22047	LANDINGS THIS PAGE	0	TOTAL LANDINGS	<i>Be</i> 22047	1-DIST.	2-DIST.	3-DIST.
DATE: <i>2/2/99</i>	CERT. NO.: [REDACTED]	PREV. AC FLT. HRS.	<i>65664:31</i>	FLT. HRS. THIS PAGE	<i>0:17</i>	TOTAL AC FLT. HRS.	<i>Be</i> <i>65664:31</i>			
GMT TIME: <i>1300</i>	AUTLSIG: [REDACTED]	DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE		

5233  
12.01.01C  
5233  
9A 2.11.01C  
532  
5274  
5234  
5234

AFT MAINTENANCE LOG

AIR-OSS-1 (10/97) Litho U.S.A.



2.11.01 C Pos 2

7601-05

ACFT. NO. N 9944

ACFT. TYPE 208-62

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	CUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	107	2/2/99	KBSM	KSHV	0245	0346	1701	0257	0340	743	2014	40.5	29.0	X	17317	1421
2	107	2/2/99	KSHV	KDAY	0439	0620	1741	0443	0614	1731	2989	48.0	29.6	X	23178	1435
3																
4																

2:42

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	:	:								01	R. DAVIS	18257	11	11	F1	R. NABOULSI	59893
2	:	:			0	0	0	0	-	02	T. HINDE	35771					
3	:	:								03	D. WEEKS	87480					
4	:	:															

2552

2552

7830

2552

2552

2552

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	(P) M	POSITION #2 SIDELOCKS REQUIRE ADJUSTMENT TO SECURE COOKIE SHEET CONTAINER PROPERLY	1.	Sidelocks function normal with straight cookie sheet No Adjustment needed	2/2/99	KDAY	25956
2.	(P) M	PALLET LOCK #2 POSITION BROKEN	2.	No broken locks found - During inspection found 1 lock not properly secured - secured as required No other defects noted	2/2/99	KDAY	25956
3.	(P) M	#4 REVERSER REMAINS IN TRANSIT	3.	OPSLK of #4TR No Defects noted	2/2/99	KDAY	25956
4.	(P) M	ON FAA WALKAROUND MAIN CARGO DOOR LATCH SAFETY FOUND MISS POSITIONED	4.	RePositioned SAFETY latch as required SAFETY Latch cks ground	2/2/99	KDAY	25956
5.	(P) M	ON FAA WALKAROUND Found main CARGO Door SAFETY Lock Engagement ROD bent	5.	Placed on New MEL # 261	2/2/99	KDAY	25956
6.	(P) M	ON FAA WALKAROUND FOUND A P# FWD Net torn	6.	REPID Net as required	2/2/99	KDAY	25956

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
6	CALL20 net	7/2-1	8250333	NSN	EWA 252103-20	NSN
						AP# FWD

AIRWORTHINESS RELEASE				AIRCRAFT TIME / CYCLES				INS READOUT		
CHECK C/W: TRANS ✓	STATION: KDAY	PREVIOUS LANDINGS	22045	LANDINGS THIS PAGE	2	TOTAL LANDINGS	Be 22047	1-DIST.	2-DIST.	3-DIST.
DATE: 2/2/99	CERT. NO.: [REDACTED]	PREV. A/C FLT. HRS.	65662:17	FLT. HRS. THIS PAGE	2:14	TOTAL A/C FLT. HRS.	Be 65664:31			
GMT TIME: 1130	AUTH. SIG.: [REDACTED]	DISC. OR MAINT. ACTION CARRIED FWD TO: 7601-06				BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE [REDACTED]		

2.11.01 C

**PURCHASE ORDER REQUEST**

HDY-0416 (3/97) Litho in U.S.A.



(Please Print or Type)

Requested by: Ronald E. Moody  
(Name and Department)

Date: 4.2.99

Deliver to: Quality Control  
(Name and Department)

SIC: 669

For Purchasing Dept. Use  
P.O. #: 34349

**VENDOR**

Company: Cotaey Engineering

Contact: Bill Cotaey

Vendor's Phone #: (205) 620-4990

Fax #: (205) 620-4973

**DESCRIPTION**

Quantity	Model No.	Description	Unit Price	Total Price
	DC-8	Establish interchangeability of components by P/N in Cargo loading systems Ancra, Pemco, Brawline and Douglas	60 <sup>00</sup> per hr to 10 hours	6000.00

**JUSTIFICATION** (Give complete reasons for purchase. Attach additional sheet if necessary.)

To Satisfy findings of FAA RASIP Inspection by adding interchangeability list by P/N to EWA maintenance manual

**APPROVALS**

Supervisor: \_\_\_\_\_

Date: \_\_\_\_\_

Manager: \_\_\_\_\_

Date: \_\_\_\_\_

Director: Ronald E. Moody

Date: 4-2-99

Vice President: \_\_\_\_\_

Date: 4-2-99

4.2.99  
R.E.M.

WHITE - PURCHASING

YELLOW - ACCOUNTING

PINK - REQUESTOR

2.11.01 C

Ru



February 10, 1999

Mr. Mike Woodward  
FAA  
Western Pacific Regional Office  
AWP-230  
15000 Aviation Blvd.  
Hawthorne, CA 90261

Dear Mr. Woodward:

As requested Emery Worldwide Airlines is forwarding to your office the following documents:

The Pemco and Ancra Maintenance and IPC Manuals.

Excerpts from the DAC Maintenance Practices and Overhaul Manuals.

Note: The above Manuals will contain any Damage limits , Repair procedures, and Part Numbers.

Additionally please find enclosed cargo loading system installation documents for the STC aircraft and associated STC information.

Please note that the Rosenbalm STC itself has not been included as the loading system installed by the STC is an option, EWA's current aircraft configuration is either STC SA794SO or SA1377SO as applicable.

EWA will forward to your office no later than Friday, February 12, the interchangeability information and applicable installation drawings per your request. These items were sent out to be copied.

Sincerely,

A handwritten signature in black ink that reads "Thomas M. Wood".

Thomas M. Wood  
Director Quality Control

TMW/re

Attachments



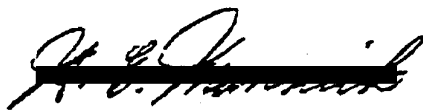
PAGE: B-1  
MODEL: DC-8  
REPORT: PEM-12

PRODUCTION APPROVAL LISTING - SUPPLEMENT NO. 1

FEDERAL AVIATION ADMINISTRATION - PARTS MANUFACTURER APPROVAL

Pemco Engineers, Inc.

<u>Part Name and Number</u>	<u>Design Data and Approval Means</u>	<u>Eligible for Installation on</u>
		Limited to McDonnell Douglas DC8 cargo restraint system for which the correspond- ing McDonnell Douglas DC-8 parts have been approved
Fitting Assembly - End Restraint Pemco P/N 50044	FAA sealed Pemco Drawing 50044	Douglas P/N 3889344
Fitting Assembly - Pallet Restraint Pemco P/N 50604	FAA sealed Pemco Drawing 50604	Douglas P/N 5754604
Rail Assembly - Side Pemco P/N 50781	FAA sealed Pemco Drawing 50781	Douglas P/N 5895751
Cross Track - Screw Lock Pemco P/N 50362	FAA sealed Pemco Drawing 50362	Douglas P/N 5889362



E. E. MANNICK  
Chief, Manufacturing Inspection Branch

September 12, 1975

2.11.01C pos 2



February 15, 1999

Mr. Mike Woodward  
FAA  
Western Pacific Regional Office  
AWP-230  
15000 Aviation Blvd.  
Hawthorne, CA 90261

Dear Mr. Woodward:

This letter is a follow-up to my February 10, 1999 letter to which I sent you documents per your request.

This data book contains the remaining documents you requested.

Sincerely,

A handwritten signature in black ink, which appears to be "Thomas M. Wood", is written over a thick black horizontal redaction bar.

Thomas M. Wood  
Director Quality Control

TMW/re

Attachments

## TABLE OF CONTENTS

### SECTION 1

- (A) Correspondence from Boeing Aircraft Engineers in reference to questions asked during FAA RASIP Inspection concerning structural integrity of Cargo Loading System and Load Placement on floors.
- (B) Correspondence from Boeing Aircraft in reference to 9-G Net Attach Fitting Covers.

### SECTION 2

DC-8 STC SA1327NM

- (A) Copy of PMA
- (B) Copy of STC
- (C) Copy of Index List PDC-8
- (D) Copy of Master Drawing List Rev. P

### SECTION 3

Pemco Engineers PMA Approval List

### SECTION 4

DC-8 Cargo Loading System Component Cross Reference List

### SECTION 5

Aeronautical Engineers, Inc. Drawing Number AE464B IPC

### SECTION 6

Supplemental Type Certificate Approval and Approved Drawing List for STC SA1377SO (Aeronautical Engineers, Inc.)

### SECTION 7

Aeronautical Engineers, Inc. Report No. R-404-61 Drawing List, Cargo Configuration DC-8 - 60 and 70 Series



## **SECTION 8**

Aeronautical Engineers, Inc. Drawing AE464B Report No. 667 IPC List Ballmat & Side Restraint with Rollers for DC-8 60 Series Aircraft

## **SECTION 9**

Aeronautical Engineers, Inc. DC-8 Cargo Conversion Maintenance Manual for STC SA1377SO

## **SECTION 10**

### Drawings

- (A) 87303 1 of 4 thru 4 of 4 Guide Rail Assy & Instl -Cargo Conversion
- (B) K-25-5004 1 of 2 thru 2 of 2 Monarch Drawing for DC-8 Roller System Installation
- (C) 50045 9 of 11 DC-8 73 Cargo System Rev. Dates 1-6-96 & 2-6-97
- (D) 50045 10 of 11 DC-8 73 Cargo System Rev. Dates 9-18-96, 11-1-96, 1-6-97 & 1-22-97
- (E) 50045 6 of 7 Heavy Duty Universal Cargo System Installation, DC-8 Rev. Date 7-18-90
- (F) 50045 6 of 6 Heavy Duty Universal Cargo System Installation, DC-8 Rev. Date 7-18-90
- (G) 50045 8 of 8 DC-8 Cargo System Rev. Date 4-24-95 & 7-26-95

CRAF AINTENANCE LOG

AIR-0092 (10/97) LHM U.S.A.



44  
10  
IRXA

2.11.01 D Pas 3

6797-07

ACFT. NO. N832AL

ACI E DC-8-73

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	11	02/05/99	KSAN	KTUS	0148	0310	1+22	0208	0304	+56	5300	535	40.4	0	3420	1210
2	11	02/08/99	KTUS	KDAY	0402	0728	3+26	0413	0721	3+08	2744	58.2	20.0	0	6867	1080
3																
4																

LEG	DEPT. DELAY		TRAIN. FLT.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	:									0/1	R. SATRO	73292	1	1			
2	:	7	DLI							0/2	J. ESCALANTE	23215	1	1			
3	:									0/3	M. RESULIM	64292					
4	:																

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P/M	#1 & #2 RADAR COME ON, AFTER 30 MINTS OF USE. RADAR SHUTDOWN WITH ANEWA FAILURE WORKING.	1.	Removed and Replaced Weather Radar Antenna Systems Op checks good MM	2-3-99	KDAY	PHILIPPER
2.	P/M	PALLET LOCK POS. 3 LOOSE MISSING FOOT (FAA RAMP INSP ITEM)	2.	REMOVED AND REPLACED LOCK ASSY. PER PEMCO COMPONENT M/M	2-3-99	KDAY	14788
3.	P/M	PALLET LOCK MISSING, POS. 4. (FAA RAMP INSP ITEM)	3.	Installed LOCK ASSY. PER PEMCO COMPONENT M/M.	2-3-99	KDAY	14788
4.	P/M	POSITION 3, LH AFT SIDE GUIDE LOOSE. (FAA RAMP INSP ITEM)	4.	REPLACED FBEY TENSION STUDS ON LEFT AFT BALL MAT. GUIDE POST SECURED PER PEMCO COMPONENT M/M.	2-3-99	KDAY	14788
5.	P/M	LEFT OVERTHING EXT-GILL LINER Bent/Loose. (FAA RAMP INSP ITEM)	5.	Secured LEFT OVR WING FORWARD DEER GILL LINER IAD - FWA CHAPTER 4 M/M.	2-3-99	KDAY	46958
6.	P/M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
1	Radar Antenna	MP585164-1	1100	MP585164-1	1266	ONLY
2	PALLET LOCK	50012-501	NPN	50014-523	NPN	30
3	PALLET LOCK	NPN	NPN	50014-523	19R 3780	4R

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT		
CHECK C/W:	STATION:	PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS	1-DIST.	2-DIST.	3-DIST.	
TCN	KDAY	22910	2	22912				
DATE: 2-3-99	CERT. NO.:	PREV. NO. FLT. HRS.	FLT. HRS THIS PAGE	TOTAL NO. FLT. HRS.				
1053 Z		7974:31	4:04	7978				
DISC. OF MAINT. ACTION CARRIED FWD TO:		BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE				

Pas 3

AIR T MAINTENANCE LOG

02202-4, 1 of 1 Page U.S.A.

**EMERGENCY WORLDWIDE**  
A GIP COMPANY

2.11.01 8622-05

ALPH. NO. N 832AL DC-8-73F

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USD)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1																
2																
3																
4																
MX ONLY																
LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD			A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #	
	DELAY	CODE	LOGS	STATION	2	3	APU									
1																
2																
3																
4																
NO FLT E. SWAEE 8125																
NO.	SOURCE	DISCREPANCY			NO.	CORRECTIVE ACTION			DATE	STA	MECH					
1.	P (M)	FAA Reported Per Q.C. Cargo Door up lock Catch not engaged AND Up lock Release Rod Missing			1.	Cargo Door Up Lock Ops Checks Good, Release Rod Installed Ops Checks Good.			3/22/99	KOM	85758					
2.	P (M)	Intercastols covered with Class "E" Compartment			2.	Intercastols covered and Taped with gill liner tape, no other defects noted			3/22/99	KOM	85758					
3.	P (M)	FAA Reported Per Q.C. Roller Trays Installed at Pos. 16 are short Roller tray (one roller tray) instead of long Roller trays			3.	Placed on Non-MEL Item # N 862203-1039			3/22/99	KOM	85758					
4.	P (M)	FAA Reported Per Q.C. Roller Trays Installed at Pos. 17 are short Roller trays (one roller tray) instead of long Roller trays			4.	Placed on Non-MEL Item # N 862204-1040			3/22/99	KOM	85758					
5.	P (M)	FAA Reported Per Q.C. Roller Trays Installed at Pos. 18 are short Roller trays (one roller tray) instead of long Roller trays			5.	Roller Trays Installed in Pos. 18 3/22/99 KPM 85758 are long Roller-Trays ops Check Good.			3/22/99	KPM	85758					
6.	P (M)	Roller Trays in Pos 15 are short Trays instead of long Roller Trays.			6.	Placed on Non-MEL Item # N 862205-1041			3/22/99	KPM	85758					
NO.	PART NOMENCLATURE			PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.								
AIRWORTHINESS RELEASE							AIRCRAFT TIME / CYCLES			IHS READOUT						
CHECK C/W: N/A	STATION:			PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS		1-DIST.	2-DIST.	3-DIST.						
DATE:	CERT. NO.:			PREV. A/C FLT. HRS.	FLY. HRS. THIS PAGE	TOTAL A/C FLT. HRS.										
GMT TIME:	AUTH SIG.:															
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE								

NO.

Pos 2

Pos 1

Pos. 16

Pos. 17

Pos. 18

ENGINEERING

**ENGINE FLIGHT MONITORING DATA**

PNEUMATIC PRESS. VALVE	CLOSED		OPEN		MAX POWER USED THIS LOG	GROSS WGT	SAT	RAT / TAT	ALT	IAS	MACH	GMT	RECORD TO NEAREST		
													FUEL FLOW	OIL TEMP	OIL PRESS.
													1	2	3
													1	2	3
													1	2	3
													1	2	3
													1	2	3
													1	2	3
													1	2	3
													1	2	3
													1	2	3

AVIATION MAINTENANCE LOG



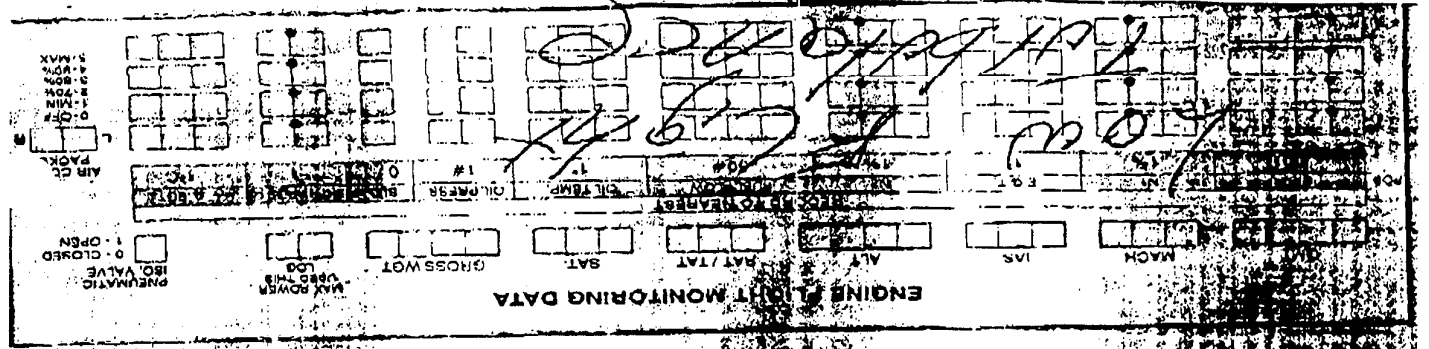
2.11.01 D  
 8622-25  
 DC-8-43

DATE	TIME	BY	DESCRIPTION	STATUS
313	4699	WDS	WDR 1400	1610
310	1716	WDS	484	444
2509				
2509				
2509				
02	1105	WDS	453	11
03	1830	WDS	062	30

NO	SOURCE	DISCREPANCY	NO	CORRECTIVE ACTION	DATE	STA	MECH
1	EMER only	MAX FUEL USED	1	NOTED BY MX	4-6-78	KOY	WDS
2	Q11	Cargo Door warning Light illuminated, CA pepped	2	Reset Door warning Light (Serial No. 4615) by 03102			
3	Q11	#1 VHF scratchy Intercom	3	Removed and repaired #1 VHF (Flight 001) LS 109 (Compt. P.I. #1) Corren. of Check (normal, NO defects noted)			
4	Q11	PER Reset Inspection 2399	4	Inspected #6 cargo pallet bearing in keyway & found loose			

NO	PARTICULARS	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS
3	VHF (com) #1	622-1181-001	9639	622-1181-001	6955	ONE

WORK CENTER: 101  
 DATE: 2.11.01  
 TIME: 19:55  
 BY: WDS  
 APPROVED: [Signature]  
 DISCREPANCY CONTROL NO: 748



A IAWT MAINTENANCE LOG

AIR-002(10/97) Litho U.S.A.



2.11.01E

6959-10

ACFT. NO. N8177U

ACFT. TYPE DC-8-7

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE		CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)	GAL'S	CARGO	MA	
1	321	4/02/99	KDFW	KDAY	1520	1745	2:05	1551	1737	1:46	3055	44.0	22.0	CP	15165	39"	
2							2:25										
3																	
4																	

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	43	DL-1								NA	0/1	C. SWARTZBAUGH	81084				
2	:										0/2	A. HOCKINS	35959	1	1		
3	:										0/3	J. FOY	25581				
4	:																

34-45

2.11.01E  
25-52

2.11.01E  
25-20

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P (M)	REF DMI # A6959062-1107 GPWS ON AT 200' OFF AT 50'	1.	R&R GPWS COMPUTER OF CHKS GOOD TAW DC-8 A.M. THIS CLEARS DMI A6959062-1107 PLACED REMOVED	4/2/99	KDAY	2365
2.	P (M)	R&R L&R RACIP MSP 2-11-01 item E, Smoke Barrier Add A Hole, and Previously installed tape Peeling away	2.	Place on Non-mel list. Non-mel	4/2/99	KDAY	3246
3.	P (M)	Aft Carrier seat Inop DO so smoke Barrier on Non-mel	3.	Placed on Dmg List m.el # 25-14 cat D controls	4/2/99	KDAY	3246
4.	P / M		4.				
5.	P / M		5.				
6.	P / M		6.				

NO.	PART Nomenclature	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
1	GPWS COMPUTER	622-7615-011	176	622-7615-212	688	ONLY

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W: X/ONS/	STATION: KDAY	PREVIOUS LANDINGS	41562	LANDINGS THIS PAGE	1	TOTAL LANDINGS	41563	1-DIST.	2-DIST.	3-DIST.
DATE: 04-02-99	CERT. NO. [REDACTED]	PREV. A/C FLT. HRS.	65814 20	FLT. HRS. THIS PAGE	1.46	TOTAL A/C FLT. HRS.	65816			
GMT TIME: 14:00	AUTH SIG.: [REDACTED]	DISC. OR MAINT. ACTION CARRIED FWD TO: [REDACTED]				BOOK CHANGED NEW LOG PAGE NO: [REDACTED]		CAPTAIN'S SIGNATURE: [REDACTED]		

**EMILY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM**

LOG PAGE NO.

2.11.01

2.11.01E

AIRCRAFT NO.	DATE	STATION	TYPE CHECK	PAGE
N817U	04/01/99	EDM	PACIP FAA	1 OF 1

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
1	REF FAA PACIP INSP	SMALL BRACKET NON-REL	32465	
2.11.01	ITEM E SHOULDER BOLTS HARD A	N 6957103- <del>1117</del> -1117	INSP	
	HOLD BOLTS INSTALLED TO BE REMOVED AWAY	CORRECTED BY [unclear] 11/11/98		
		N 6957103- <del>1117</del> -1116		
		LP-6957-10		
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
			INSP	
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
			INSP	
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
			INSP	
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

2011.01 E

ATTN: Ron Moeely

From: dse.boecom@boeing.com

FROM: THE BOEING COMPANY  
SERVICE ENGINEERING  
CUSTOMER SUPPORT  
M/C D035-0035  
3855 LAKEWOOD BLVD.  
LONG BEACH, CA 90846  
206-544-0641 (FAX)  
32-9430 (TELEX)  
LKEBO7X (SITA)  
DSE (DIR CODE)

ATTN: C.H. GILLIAM - FIELD SERVICE REP

EAFF-ILN-99-0014RR 02 APR 99  
ATA 2550-00 MODEL DC-8  
REPAIR OF SMOKE CURTAIN P/N 5891931  
REF /A/ EAF-ILN-99-0011TR /C/

YOUR REF /A/ ASKED WHERE SUBJECT REPAIR INFORMATION COULD BE FOUND.

PLEASE ADVISE EAF THAT NO REPAIR DATA FOR DC-8 SMOKE CURTAINS HAS BEEN PUBLISHED. EAF MAY USE THE FOLLOWING TO ACCOMPLISH REPAIR OF TEARS IN THE SUBJECT SMOKE BARRIER PANEL:

APPLY A PATCH MADE FROM DMS 1992, TYPE 2, BUTYL COATED GLASS CLOTH. THE PATCH SHOULD OVERLAP THE CURTAIN BY ONE INCH MINIMUM. BOND THE PATCH TO THE CURTAIN PER DPS 1.07-9, USING ONE OF THE FOLLOWING ADHESIVES:

--TYPE 1A VINYL ADHESIVE (CONTACT CEMENT) DPM 6307, STABOND #N-134,OR

--TYPE 1B TRANSFER TAPE, DPM 5363, 3M TAPE SCOTCH #468

BEST REGARDS, MARK

M. HANSEN/WASHKE  
DAVE WASHKE - (ACTING) AIRLINE SUPPORT MANAGER  
BOEING SERVICE ENGINEERING  
ORGN 6-T024 M/C D0035-0035

02 APR 99 1931

BOECOMII-FSE-ID-6859051-EMAIL-G

AI FT MAINTENANCE LOG

**EMERY**  
**WORLDWIDE**

11.01F

6561-01

ACFT NO. **N26740** ACFT TYPE **DC8-73F**

FLT	DATE	STATION		GMT		BLOCK HOURS		GMT		FLT HOURS	FUEL DATA			CARGO DATA		
		FROM	TO	OUT	IN	HOURS	OFF	ON	OFF		ON	DE-ICE GALS	DEPART (LBS)	ARRIVAL (LBS)	CARGO	MAX
1	1982-11-09	PHX	KLAX	1342	1935	5:53	1441	1917	5:16	0305	84.0	19.0	0	65067	0	

DEPT. DELAY	TRAIN CLTS	ON ADD				A/P	CREW	EMP #	T.O. LOG	A/P	CREW	EMP #	
		DELT	CODE	LOGS	STATION								
1	121	003				ML	01	L. CASARE	13105	1	ML	JANSEN J	LA
2							02	B. KILMER	43977		MR	HADEN R	EAT
3							03	R. SHERMAN	80872		MR	BIRD G	EAT

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1	0	DR. PRO-ILLUM. FORWARD LEFT NOSE WHEEL LIGHT BROKEN.	1	R & P. LIBERT - OPS CKS GOOD	11/9/82	KLAX	P.S. ROBE
2	0	HYD SERVICE	2	SERVICED AS REQUIRED.	11/9/82	KLAX	78624
3	0	O2 SERVICE	3	SERVICED AS REQUIRED	11/9/82	KLAX	78624
4	0	LVN SERVICE	4	SERVICED AS REQUIRED	11/9/82	KLAX	78624
5	0	RIGHT WING RETRACT LIGHT	5	RETRD BIR LAMPING LT. CKS GOOD.	11/9/82	KLAX	78624
6	0	Gill Lateral Liner Installed over HAVE IN SMOKE BARRIER.	6	REFER TO NON-MEL CASE # 689/KLAX/12065 N0561021-1144	11/9/82	KLAX	12065

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES			INS READOUT		
CHECKED BY: <b>TRANSIT</b>	STATION: <b>KLAX</b>	PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS	1-DIST	2-DIST	3-DIST
DATE: <b>11/09/82</b>	CERT NO: [REDACTED]	PREV. A/C FLT. HRS.	FLT. HRS. THIS PAGE	TOTAL A/C FLT. HRS.			
GMT TIME: <b>2222</b>	AUTH. SIG: [Signature]						

DISC. OR MAINT. ACTION CARRIED FWD TO. BOOK CHANGED NEW LOG PAGE NO. [REDACTED]

**ENGINE FLIGHT MONITORING DATA**

NO.	IN	1%	2%	3%	4%	5%	6%	7%	8%	9%	10%	11%	12%	13%	14%	15%	16%	17%	18%	19%	20%	21%	22%	23%	24%	25%	26%	27%	28%	29%	30%	
1	07.4	07.3	06.5	07.0	07.4	07.3	06.3	06.1	07.4	07.3	06.3	06.1	07.4	07.3	06.3	06.1	07.4	07.3	06.3	06.1	07.4	07.3	06.3	06.1	07.4	07.3	06.3	06.1	07.4	07.3	06.3	06.1

33-41  
 12-31  
 12-64  
 12-51  
 33-41  
 2.11.01F  
 2515



RAFT MAINTENANCE LOG

40110571000 JSA



2.11.01 P  
6561-02

ACFT NO N 26740 ACFT TYPE De-9-73

FLY	DATE	STATION FROM	STATION TO	GMT OUT	GMT IN	BLACK HOURS	OFF	ON	FLY HOURS	FUEL DATA	DEICE	CARGO DATA
										WPT (LBS)	GALS	CARGO
										WPT (LBS)	GALS	MAIL

DEPT. DELAY	TRAIN. FTS	ON BOARD	A/P	CREW	T.O. LOG	A/P	CREW	EMP#	DATE	STA	MECH

NO. SOURCE DISCREPANCY NO. CORRECTIVE ACTION DATE STA MECH

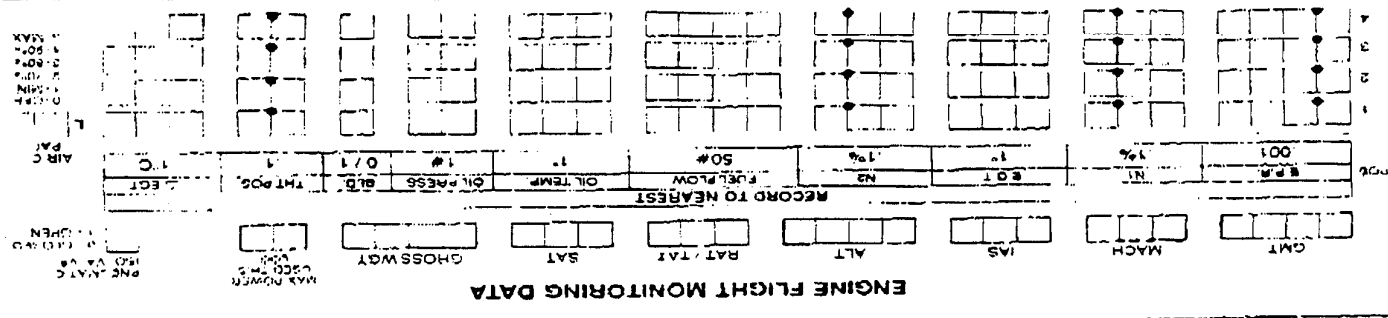
1. 2.11.01 1515 0101 RAFT ITEM 6 PREVIOUS LOG 1. A-FER TO DM1 # D65 046-4 STATION 1 0085  
DUE TO WICE (S) SWAGE BRASS (NEW) MISC 1143 IAW MEC # 25-14 CAT D RECORDS  
WBS 0021-1144) COURSE SEATS INSP INSTALLED.

COMPLETED

P. 02

310 649 5703

ADT-06-99 22:14 KLAX LINE MAINT



PAR - 7-99 WED 1:44

NO. 1

AIR MAINTENANCE LOG

AIR-00... (0/97) Litho U.S.A.



2.11.01G  
2.11.01F 7472-07

ACFT. NO. N 26744 ACFT. TYPE DC 8731

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAH
1	316	3-18-99	KDAY	KOHL	1920	2040	1.20	1925	2031	1.06	2703	38.0	24.0			
2																
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	:				1	1	1	1		MA	J Edadwick	12700	1	1	NR	P. GYAN	2929
2	:									OL	K CASALA	12375					
3	:									OL	J Lehner	11374					
4	:																

ENTR 0

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
2.	P / M		2.				
3.	P / M		3.				
4.	P / M		4.				
5.	P / M		5.				
6.	P / M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W: Term OK	STATION: KPHL	PREVIOUS LANDINGS	26726	LANDINGS THIS PAGE	1	TOTAL LANDINGS	26727	1-DIST.	2-DIST.	3-DIST.
DATE: 3-30-99	CERT. NO.: [REDACTED]	PREV. AC FLT. HRS.	799831	FLT. HRS. THIS PAGE	1.06	TOTAL AC FLT. HRS.	79909.37			
GMT TIME: 0010	ALTH SIG.: [REDACTED]									
DISC. OR MAINT. ACTION CARRIED FWD TO:		BOOK CHANGED NEW LOG PAGE NO:			CAPTAIN'S SIGNATURE [REDACTED]					

2.11.01F

ATTN: Ron Moeley

From: dse.boecom@boeing.com

FROM: THE BOEING COMPANY  
SERVICE ENGINEERING  
CUSTOMER SUPPORT  
M/C D035-0035  
3855 LAKEWOOD BLVD.  
LONG BEACH, CA 90846  
206-544-0641 (FAX)  
32-9430 (TELEX)  
LKEBO7X (SITA)  
DSE (DIR CODE)

ATTN: C.H. GILLIAM - FIELD SERVICE REP

EAF-ILN-99-0014RR 02 APR 99  
ATA 2550-00 MODEL DC-8  
REPAIR OF SMOKE CURTAIN P/N 5891931  
REF /A/ EAF-ILN-99-0011TR /C/

YOUR REF /A/ ASKED WHERE SUBJECT REPAIR INFORMATION COULD BE FOUND.

PLEASE ADVISE EAF THAT NO REPAIR DATA FOR DC-8 SMOKE CURTAINS HAS BEEN PUBLISHED. EAF MAY USE THE FOLLOWING TO ACCOMPLISH REPAIR OF TEARS IN THE SUBJECT SMOKE BARRIER PANEL:

APPLY A PATCH MADE FROM DMS 1992, TYPE 2, BUTYL COATED GLASS CLOTH. THE PATCH SHOULD OVERLAP THE CURTAIN BY ONE INCH MINIMUM. BOND THE PATCH TO THE CURTAIN PER DPS 1.07-9, USING ONE OF THE FOLLOWING ADHESIVES:

- TYPE 1A VINYL ADHESIVE (CONTACT CEMENT) DPM 6307, STABOND #N-134, OR
- TYPE 1B TRANSFER TAPE, DPM 5363, 3M TAPE SCOTCH #468

BEST REGARDS, MARK

M. HANSEN/WASHKE  
DAVE WASHKE - (ACTING) AIRLINE SUPPORT MANAGER  
BOEING SERVICE ENGINEERING  
ORGN 6-T024 M/C D0035-0035

02 APR 99 1931

BOECOMII-FSE-ID-6859051-EMAIL-G

FT MAINTENANCE LOG

AIR-009z (10/97) Litho U.S.A.



42.11.016

Q.C.  
5  
BRXA

7399-24

ACFT. NO.

N 606AL

ACFT. TYPE

DC-8-73

LEG	FLT	DATE	STATION			GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE		CARGO DATA	
			FROM	TO	OUT	IN	OFF		ON	UPLIFT (USG)		DEPART (LBS)	ARRIVAL (LBS)	GAL'S	CARGO	MAIL		
1	027	02-02-99	KRDU	KDAY	0552	0724	1732	0607	0716	1709	3593	48.5	32.0	0	63761	451		
2																		
3																		
4																		

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	1:29	AW3			0	0	0	0		0/1	D. BALL	03673		1			
2	:									0/2	D. LOVAS	50022		1			
3	:									0/3	V. BRANTEN	08050					
4	:																

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P/M	# 2 Flight director GS Auto Mode cannot be selected	1.	PERFORMED NUMEROUS OPS CHECKS. OPS CHECKS GOOD 1AN DC-8 n/a 34	2-2-99	KDAY	50837
2.	P/M	ON POST FLIGHT FOUND L/HAND NOSE TAXI LIGHT FLAP	2.	RELOADED NOSE TAXI LIGHT OPS CHECKS NORMAL	2-2-99	KDAY	30282
3.	P/M	CARGO ROLLER PIN STICKING OUT, POS. 11 ROLLER TRAY. (FAA ITEM)	3.	REINSTALLED ROLLER PIN AS REQUIRED.	2-2-99	KDAY	14788
4.	P/M	CARGO ROLLER PIN STICKING OUT, POS. 17 ROLLER TRAY. (FAA ITEM)	4.	REINSTALLED ROLLER PIN AS REQUIRED.	2-2-99	KDAY	14788
5.	P/M	G-NET MOUNT HOLES IN (GIL LINER) NOT SEALED. (FAA ITEM)	5.	TEMP. REPAIRED G-NET MOUNT HOLES IN (GIL LINER), PLACED ON NON METAL. REPAIR PER MM4-1	2-2-99	KDAY	14788
6.	P/M		6.				

3424  
3341  
1511 2550  
3172550  
351 2550

NO.	PART NOMENCLATURE	PARTNO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE				AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W	STATION	PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS	1-DIST	2-DIST	3-DIST	DATE	CERT. NO.	PREV. A/C FLT. HRS.	FLT. HRS. THIS PAGE	TOTAL A/C FLT. HRS.
2-2-99	KDAY	21572	1	26573				0810Z		84010:33	1.09	84011:42
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE				

**A' TAFT MAINTENANCE LOG**

Alt. (10/87) Litho U.S.A.



6408-03

ACFT. NO. N606ML

ACFT. TYPE DL 875

LEG	FLT	DATE	STATION			GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN	OFF		ON	UP. IFT (USG)		DEPART (LBS)	ARRIVAL (LBS)	CARGO		MA	
1	379	4/3/99	KDAY	KDAY	1142	1555	4+13	1155	1550	3+55	6431	72.5	290	0	21070	2812	
2																	
3																	
4																	

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	:				0	0	0	0		01	D McClure	53741	1	1			
2	:									02	G Benhart	5121					
3	:									03	M. SHAW	75670					
4	:																

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	(P) M	MAX power used for takeoff	1.	mx noted	040399	KDAY	8249
2.	(P) M	O <sub>2</sub> Leaked Down from 1850 to 1100psi from KAY to Dayton	2.	Repaired O <sub>2</sub> Leath on B not on the back of Fe O <sub>2</sub> Reg Sys checks good At this time	040399	KDAY	32495
3.	(P) M	CAPT'S DME in the FMS mode is Intermittent VHF NAV MODE DME OK	3.	Reseated Connector ON Distance 4:3:99 KDAY 89236 Converter. Operational Check of Both FMS Gen'd			
4.	P (M)	REE RAIL INSP 2-11-01 ITEM G. FAA REPORTED SHEET METAL REPAIR TO GILL LINER. R/H SIDE OF ACFT POS. 1	4.	REMOVED SHEET METAL & REPLACED WITH GILL LINER AS REQUIRED.			
5.	P / M		5.				
6.	P / M		6.				

35-11  
34-52  
Pos. 1  
53-01

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE				AIRCRAFT TIME / CYCLES				INS READOUT		
CHECK C/W: <i>Transv</i>	STATION: <i>Ar-Day</i>	PREVIOUS LANDINGS	<i>26738</i>	LANDINGS THIS PAGE	<i>1</i>	TOTAL LANDINGS	<i>26739</i>	1-DIST.	2-DIST.	3-DIST.
DATE: <i>04-03-99</i>	CERT. NO. <i>[Redacted]</i>	PREV. A/C FLT. HRS.	<i>27819</i>	FLT. HRS. THIS PAGE	<i>3 55</i>	TOTAL A/C FLT. HRS.	<i>84400 02</i>			
GMT TIME: <i>18:00</i>	AUTH. SIG. <i>[Redacted]</i>		<i>84396 42</i>				<i>79270 37</i>			
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE <i>[Redacted]</i>		

LOG PAGE NO.

2.11.01

IRCRAFT NO. N606AL	DATE 04/01/99	STATION KDM NY/CONT	TYPE CHECK FAA PACIP INSP	PAGE 1 OF 1
-----------------------	------------------	------------------------	---------------------------------	----------------

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
1	REF PACIP INSP 2-11-01 ITEM	REMOVED SHEET METAL		81148
	Q. FAA REPORTED SHEET METAL REPAIR	3 REPLACED WITH GILL		
	TO GILL LINER Q/R SIDE OF ACFT PAS 1	WORK AS REQUIRED.		INSP
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
				INSP
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
				INSP
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
				INSP
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

V2 1/18/95

04/01/99 17:13 NO.

2.11.01 G



March 29, 1999

The Boeing Company  
M. Hansen/Washke  
3855 Lakewood Blvd.  
Long Beach, CA 90846

Dear M. Hansen/Washke,

2.11.01  
Pos. 1

In response to your letter dated February 11, 1999, please find enclosed the information required to proceed with your research on the plastic panels that close out the pockets around the 9G net attach fittings.

TYPE	TAIL NO.	S/N	FUS
62F	N996CF	46162	555
62F	N997CF	46154	554
62F	N998CF	46139	537
63F	N865F	46088	464
63F	N921R	46145	548
63F	N959R	46143	547
71F	N500MH	45812	277
71F	N801GP	46039	448
71F	N8076U	45941	317
71F	N8079U	45947	341
71F	N8084U	45974	368
71F	N8085U	45975	369
71F	N8087U	45977	373
71F	N8091U	45995	388
71F	N8177U	45983	350
73F	N2674U	46062	486
73F	N602AL	45991	380
73F	N603AL	46003	401
73F	N604AL	46047	447

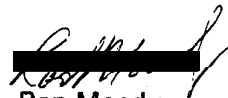
2.11.01

Pos. 1

TYPE	TAIL NO.	S/N	FUS
73F	N605AL	46106	490
73F	N606AL	46044	432
73F	N791FT	46045	441
73F	N792FT	46046	444
73F	N795FT	46103	483
73F	N796FT	46104	488
73F	N870TV	46086	478
73F	N961R	46133	534

Thank you for your help in this matter.

Sincerely,



Ron Moody  
EWA Quality Control Inspection  
Representative

ajb



2-11-01G  
Pos. 1  
FAX 937-264-9278

Ron Moody

From: dse.boecom@boeing.com

FROM: THE BOEING COMPANY  
SERVICE ENGINEERING  
CUSTOMER SUPPORT  
M/C D035-0035  
3855 LAKEWOOD BLVD.  
LONG BEACH, CA 90846  
206-544-0641 (FAX)  
32-9430 (TELEX)  
LKEBO7X (SITA)  
DSE (DIR CODE)

CC: C.H. GILLIAM - FIELD SERVICE REP

M-7200-99-01260 11 FEB 99  
ATA 0000-00 MODEL NONE  
IPC REFERENCE FOR ATTACH FITTINGS FOR 9G BULKHEAD  
REF /A/ EAFL990205 /C/  
/B/ YOUR FAX LETTER DATED 05-FEB-99  
/C/ DC-8 IPC 25-21-0, FIGURE 2 ITEMS 34 AND 83

FOLLOWING MESSAGE SENT TO MR. RON MOODY, INSPECTION REPRESENTATIVE, EMERY WORLDWIDE AIRLINES WITH A COPY TO C.H. GILLIAM (FSR-ILN), A. ORNIK (FSR-IND-AAT).

YOUR REF /B/ LETTER ASKED FOR PART NUMBERS OF THE PLASTIC PANELS THAT CLOSE OUT THE POCKETS AROUND THE 9G BULKHEAD ATTACH FITTINGS ON THE DC-8 CABIN SIDEWALL. SINCE DOUGLAS NEVER DELIVERED A DC-8 WITH A 9G BULKHEAD, WE ASSUME YOU ARE REFERRING TO THE 9G NET FITTINGS.

THIS REQUEST WILL REQUIRE US TO ORDER THE APPROPRIATE DRAWINGS. AS YOU HAVE PROBABLY DISCOVERED, THE IPC ILLUSTRATIONS DO NOT SHOW THE PANELS CLEARLY IN MOST CASES, SO WE WILL NEED TO REFER TO THE DRAWINGS. ONE IPC SECTION THAT DOES SHOW THE PANELS IS REF /C/, ALTHOUGH THIS FIGURE MAY NOT APPLY TO ANY AIRPLANES IN EMERY'S FLEET.

OUR RESEARCH THUS FAR INDICATES THAT A NUMBER OF DIFFERENT DRAWINGS DEFINE THE NOTED PANELS. THEREFORE, WE WILL NEED EMERY TO PROVIDE A LIST OF AIRPLANE FUSELAGE NUMBERS OR FACTORY SERIAL NUMBERS FOR WHICH THE REQUESTED DATA IS NEEDED. WE CAN THEN PROCEED TO OBTAIN THE NEEDED DRAWINGS AND FIND THE PART NUMBERS THAT ARE APPLICABLE TO EMERY'S AIRPLANES. WE WILL NEED APPROXIMATELY 5 WORKING DAYS TO RESPOND AFTER YOUR REQUEST IS RECEIVED.

PLEASE ADVISE.

M. HANSEN/WASHKE  
DAVE WASHKE - (ACTING) AIRLINE SUPPORT MANAGER

---

FCD A25-19 has been developed to ascertain which aircraft in the EWA fleet are missing close out panels at the 9G-Net attach points. The Boeing Company is researching the part numbers associated with this finding, and as of this time, have not completed their research. When the data is received from Boeing, the close out panels will be installed. If Boeing cannot furnish these panels, we will request the drawing and fabricate the panels ourselves.

**EMERY WORLDWIDE AIRLINES  
FLEET CAMPAIGN DIRECTIVE**

No. A25-19

Issue  
Date: 4/27/99

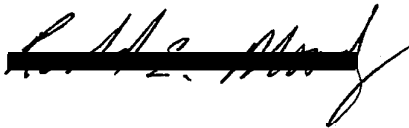
Rev. Original

Task Code: 825520

Title: DC-8 9G-Net Close Out Panel  
Inspection and Temporary Replacement

Reference: EWA Maintenance Manual  
Chapter 4

Compliance  
Requested: Next Service Check

Approved by: 

Manpower: 5 hrs

Equipment Affected: All DC-8 with DAC  
Cargo Doors

Priority: Mandatory

Publications Affected: None

Weight Change: N/A

**General:**

The purpose of this FCD is to ascertain which acft in the EWA fleet are missing close out panels at the 9G-Net attach points.

**EMERY WORLDWIDE AIRLINES  
FLEET CAMPAIGN DIRECTIVE**

Page 2 of 3  
No. A25-19  
Rev. Original

**ACCOMPLISHMENT INSTRUCTIONS:**

1. Check 9-G net attach points for presence of close out panels. M

All panels installed? Y  Go to Step 4  
N  Go to Step 2

2. If any panels are missing, make a temporary replacement. M

- a. Using 80 grit sandpaper, scuff surrounding area and remove grease, dirt and gloss.
- b. Use a lint free cloth and remove all dust.
- c. Cut a patch from gillfab large enough to maintain a 2 inch overlap, cut a hole for fitting, minimizing the gap between gillfab and fitting.
- d. Radius all corners at a minimum of ¼ inch.
- e. Place patch over area and use Shurtape P/N PC-21F or 3M 376FR cargo liner tape to secure patch to liner.
  - 1) Tape will cover 1½ inch over patch edge and 1½ inch over liner.
  - 2) A second layer of tape 1½ inch over edge to create a 3 inch attachment.
  - 3) Seal area around 9-G net, attach fittings with tape.
- f. Apply tape evenly and slowly, press firmly and work out air pockets.

**Note:** Do not stretch tape when applying

3. List all missing panels. Include part number from Page 3. M

L/H P/N	R/H P/N
_____	_____
_____	_____
_____	_____
_____	_____

4. Complete this section and make a log book entry indicating compliance of this FCD. M

Acft. \_\_\_\_\_ Date: \_\_\_\_\_ Sta.: \_\_\_\_\_  
Emp. # \_\_\_\_\_ Log Page # \_\_\_\_\_

**FAX THIS FCD TO QUALITY CONTROL AT 937-264-9278**

**EMERY WORLDWIDE AIRLINES  
FLEET CAMPAIGN DIRECTIVE**

Page 3 of 3  
No. A25-19  
Rev. Original

UPPER CLOSE OUT PANELS

PANEL P/N					
<u>IPC EFF CODE</u>	<u>FUS NO.</u>	<u>FSN</u>	<u>LEFT</u>	<u>RIGHT</u>	<u>IPC FIGURE</u>
FT081	380	45991	5890003-9	5888417-19	25-21-0 FIGS 7B/13A
FT083	401	46003	5890003-9	5888417-19	25-21-0 FIGS 7B/13A
FT090	432	46044	5890003-9	5888417-19	25-21-0 FIGS 7B/13A
FT091	441	46045	5890003-9	5888417-19	25-21-0 FIGS 7F/13A
FT092	444	46046	5890003-9	5888417-19	25-21-0 FIGS 7F/13A
FT093	447	46047	5890003-9	5888417-19	25-21-0 FIGS 7F/13A
FT094	478	46086	5890003-9	5888417-19	25-21-0 FIGS 7F/13A
FT095	483	46103	5890003-9	5888417-19	25-21-0 FIGS 7F/13A
FT096	488	46104	5890003-9	5888417-19	25-21-0 FIGS 7F/13A
JL044	537	46139	5893508-1	588417-19	25-21-0 FIGS 11B/13A
JL055	554	46154	5893508-1	588417-19	25-21-0 FIGS 11B/13A
JL056	555	46162	5893508-1	588417-19	25-21-0 FIGS 11B/13A
ONO055	464	46088	5890003-9	588417-19	25-21-0 FIGS 7F/13A
RD004	486	46062		588417-19	25-21-0 FIGS 13A
RD006	534	46133		588417-19	25-21-0 FIGS 13A
SBO15	490	46106	5890003-9	588417-19	25-21-0 FIGS 7F/13A
YW002	547	46143	5890003-9	588417-19	25-21-0 FIGS 7F/13A

LOWER CLOSE OUT PANELS

PANEL P/N					
<u>IPC EFF CODE</u>	<u>FUS NO.</u>	<u>FSN</u>	<u>LEFT</u>	<u>RIGHT</u>	<u>IPC FIGURE</u>
FT081	380	45991	5891294-1	5773650-333	25-21-0 FIG 22C
FT083	401	46003	5891294-15	5773650-333	25-21-0 FIG 22E
FT090	432	46044	5891294-1	5773650-333	25-21-0 FIG 22E
FT091	441	46045	5891294-1	5773650-333	25-21-0 FIG 22C
FT092	444	46046	5891294-1	5773650-333	25-21-0 FIG 22C
FT093	447	46047	5891294-1	5773650-333	25-21-0 FIG 22C
FT094	478	46086	5891294-1	5773650-333	25-21-0 FIG 22C
FT095	483	46103	5891294-1	5773650-333	25-21-0 FIG 22C
FT096	488	46104	5891294-1	5773650-333	25-21-0 FIG 22C
JL044	537	46139	5891294-15	5773650-333	25-21-0 FIG 22F
JL055	554	46154	5891294-15	5773650-333	25-21-0 FIG 22F
JL056	555	46162	5891294-15	57730650-333	25-21-0 FIG 22F
ONO055	464	46088	5891294-1	5773650-333	25-21-0 FIG 22C
RD004	486	46062	5891294-1	5773650-333	25-21-0 FIG 22C
RD006	534	46133	5891294-1	5773650-333	25-21-0 FIG 22C
YW002	547	46143	5891294-1	5773650-333	25-21-0 FIG 22C
YW003	548	46145	5891294-1	5773650-333	25-21-0 FIG 22C

<p><b>NOTE:</b> IF PANEL P/N IS NOT INCLUDED ON THIS PAGE INDICATE MISSING PANEL LOCATION ON ITEM 3, AND MAKE A TEMPORARY REPLACEMENT PANEL PER STEP 2 OF THIS FCD.</p>
---

2.11.01 G

Pos. 1

# EMERY WORLDWIDE AIRLINES

## DEPARTMENT OF QUALITY CONTROL

303 Corporate Center Dr.

Vandalia, OH 45377

Fax No. (937) 264-9278

Edward B Jones, Jr., Manager of Quality Control

Simon Chandler, Inspection Representative

Dennis Jebens, Inspection Representative

Ron Moody, Inspection Representative

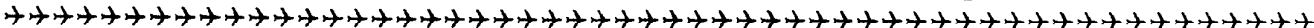
Rich Morano, Inspection Representative

Andrew Porter, Inspection Representative

Lyle Richardson, Inspection Representative



### FACSIMILE TRANSMISSION COVER SHEET



Date 02 /05 /99

Send to Fax # (206) 544-0641

**Deliver Immediately To:**

Name: Marcus Brown

Company/Department: Boeing Long Beach Div. Svce Eng. Payload

Telephone Number: \_\_\_\_\_

This is page 1 of 1 pages sent in transmission regarding the following principle subject(s):

As per our conversation today we are unable to locate an IPC Reference for the covers over the attach fittings for the 9G Bulkhead. It would be helpful if you could supply us with the part numbers or where in the IPC we can locate these parts. Any help you can give us on this matter is greatly appreciated.

\_\_\_\_\_  
Sincerely,  
\_\_\_\_\_  
Ron Moody  
\_\_\_\_\_  
Andrew Porter  
\_\_\_\_\_  
\_\_\_\_\_  
\_\_\_\_\_

QC  
10  
RRX

2.11.01H

7516-09

ACFT. NO. N957A AC PE 0-63F

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE		CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)	GAL'S	CARGO	MAIL	
1	223	2/3/99	Cymx	KDAY	0434	0714	2+40	0527	0709	1442	3131	46.0	19.6	Yes	42084	Ø	
2																	
3																	
4																	

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	:34	DL-1			Ø	Ø	Ø	Ø		01	WHITZHOARD, W.	88179			04	JORD, J.	83086
2	:									02	DRSMULROSS, W.	19645	1	1			
3	:									03	DARCOMB, B.	23898					
4	:									04	CORBETT, B.	15733					

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
2.	PIM	FAA Reported: Roller tray out of track pos. 8	2.	Resecured Roller tray as required. NO defects noted. Ref DC-8 MM Chp. 25	02-03-99	KDAY	89942
3.	PIM	FAA Reported: POS 3 left hand side rail out of floor	3.	Resecured left hand side rail position 3 LH. no defects noted Ref. DC-8 MM Chp. 25	02-03-99	KDAY	89942
4.	PIM	FAA Reported: Pos. 7 R/H pin coming out of bear trap.	4.	Resecured pin as required Pos 7-3. ops cks normal. Ref DC-8 MM Chp 25	02-03-99	KDAY	89942
5.	PIM	FAA Reported: Roller tray assy pos 8/9 fwd end broken with no roller	5.	Repld roller tray assy pos 8/9 op checker good. Ref DC-8 MM Chp 25	02-03-99	KDAY	11578
6.	PIM	FAA Reported: possible hyd leak by cargo door actuator	6.	Injected cargo door actuator, no leaks noted	02-03-99	KDAY	11578

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
1	pallet lock Assy	50573-509	2864	50573-509	NSN	6-5
5	Roller tray assy	20042-507	NSN	20042-507	NSN	8/9

AIRWORTHINESS RELEASE			AIRCRAFT TIME / CYCLES				INS READOUT			
CHECK C/W: <i>[Signature]</i>	STATION: KDAY	PREVIOUS LANDINGS	22157	LANDINGS THIS PAGE	1	TOTAL LANDINGS	22158	1-DIST.	2-DIST.	3-DIST.
DATE:	CERT. NO.:	PREV. A/C FLT. HRS.	64721.54	FLT. HRS. THIS PAGE	1.42	TOTAL A/C FLT. HRS.	64723.36			
GMT TIME:	AUTH SIG.:									
DISC. OR MAINT. ACTION CARRIED FWD TO: 7516-10			BOOK CHANGED NEW LOG PAGE NO:			CAPTAIN'S SIGNATURE <i>[Signature]</i>				

2.11.01 H

7516-10

ACFT. NO.  
N957R

TYPE  
DC8-63F

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1																
2																
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD				A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LOGS	STATION	1	2	3	4								
1	:															
2	:															
3	:															
4	:															

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
50	P/M	Smoke Barrier not attached several areas	317	Entered on NON MEL List #	2-3-99	KD47	11578
51	P/M	Broken roller tray per 11/12 RH (short tray)	318	Entered on NON MEL List #	2-3-99	KD47	11578
52	P/M	Gill liner loose torn out above cargo door	319	Secured loose gill liner above cargo door	2-3-99	KD47	11578
4.	P/M		4.				
5.	P/M		5.				
6.	P/M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W: TRANS	STATION: KD47	PREVIOUS LANDINGS	22158	LANDINGS THIS PAGE	0	TOTAL LANDINGS	22158	1-DIST.	2-DIST.	3-DIST.
DATE: 2-3-99	CERT. NO.:	PREV. A/C FLT. HRS.	64723:36	FLT. HRS. THIS PAGE	0	TOTAL A/C FLT. HRS.	64723:36			
GMT TIME: 1640 Z	AUTH. STB:	DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE		



T MAINTENANCE LOG



12.11.01 H

(10/97) Litho U.S.A.

U.C. 10

7516-19

ACFT. NO. N 957R

ACFT. TYPE DC-8-63F

3.01

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE		CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)	GAL'S	CARGO	MA'	
1	042	2-6-99	KDAY	KPIA	11:11	12:24	1:13	11:25	12:22	0:57	4460	59400	42600	-0-	56591	360	
2	042	2-6-99	KPIA	KMSY	13:07	14:55	1:48	13:13	14:50	1:37	1768	54000	28200	0	37750	-	
3																	
4																	

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	0:42	D21								0/1	G hapig	76935	1	1			
2	0:46	PRR			1	0	0	1	0	0/2	R Woods	90646	1	1			
3	:									0/3	G Pease	63721					
4																	

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA
1.	PIM	door over Ground Pneumatic air connected has broken latch	1.	TRANSFERED TO SBL I/A/W 2-6-99 KMSY 52-96, Cont # 7516-19-0255, PLACARD INSTALLED	2-6-99	KMSY
2.	PIM	Pallet Lock at position 13 Loose	2.	RE-INSTALLED PALLET LOCK 2-6-99 KMSY IN POSITION 13 I/A/W CHP 20-00 mm's.	2-6-99	KMSY
3.	PIM	REFERENCE DMT 902-021, #2 EPR Gauge Sticks #8	3.	REMOVED CSD UNDER SPEED SWITCH 2-6-99 KMSY INSTALLED SERVICEABLE SWITCH I/A/W CHP 24-10 mm's	2-6-99	KMSY
4.	PIM	REFERENCE DMT 902-021 #2 EPR Gauge Sticks	4.	REMOVED #2 EPR Indicator, Installed SERVICEABLE IND I/A/W CHP 77-10 mm's	2-6-99	KMSY
5.	PIM	REFERENCE CDL # 316 FAA Reported broken roller Tray at Pos. 11/12 Rt. (Shout Tray)	5.	REPLACED BROKE ROLLER TRAY WITH SERVICEABLE ROLLER TRAY AT POS 11/12 RIGHT SIDE THIS CLEARS CDL # 316	2-6-99	KMSY
6.	PIM	REFERENCE DMT 7516-0168 #2 FUEL Quantity Ind In op.	6.	SUMPED FUEL TANK, CLEARED FUEL SELECT CONNECTOR, OPS CRS GOOD THIS CLEARS DMT 7516-0168 I/A/W CHP 28-40 mm's PLACARD REMOVED	2-6-99	KMSY

Pos 11/12

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
3	PRESS UNDER SPEED SWITCH	700448D	097	700448D	2907	4
4	EPR INDICATOR	JG 29842	B-141	JG 29842	B-131	2

AIRWORTHINESS RELEASE			AIRCRAFT TIME / CYCLES				INS READOUT			
CHECK C/W: TERMCR	STATION: KMSY	PREVIOUS LANDINGS	22164	LANDINGS THIS PAGE	2	TOTAL LANDINGS	22164	1-DIST.	2-DIST.	3-DIST.
DATE: 2-9-99	CERT. NO.:	PREV. A/C FLT. HRS.	64732.43	FLT. HRS. THIS PAGE	2.34	TOTAL A/C FLT. HRS.	64735			
GMT TIME: 0030	AUTH SIG.:	DISC	MAINT. ACTION CARRIED PWD TO:	BOOK CHANGED N	7G PAGE NO:	CAPTAIN'S SIGNATURE				

19372649278 P.02

TO

07-13-2092 02:55PM FROM

<b>NON-ROUTINE WORK CARD TENNESSEE TECHNICAL SERVICES, LLC</b>						TASK NO.	
FORM NO. 26						4601	
CRS T64R1640						W/C NO.	
ITEM LOCATION (CIRCLE ONE)		TAIL		ENG.		AC TYPE: MODEL	AC TAIL NO.
FUSE STRUCT	<input checked="" type="radio"/> CABIN	LG & W/W	DOORS/HATCHES	<input checked="" type="radio"/> MECH	ELEC	RADIO	<input checked="" type="radio"/> SIM
LT WING	RT WING			NOT	INSP	PAINT	CABIN SHOP
ITEM DESCRIPTION						CUSTOMER REQUEST (YES NO (CIRCLE ONE))	
CRACK AND MISSING FASTNER AFT UPPER FUSELAGE DOOR FR.							
ALSO CRACK ON FUSE DOOR FR. APPROX 3 FT FROM TOP (7-5) (7-6)							
CONST. REQUEST.						WRITTEN BY:	
						EMP. NO.	DAY MO YR
						9250	14 4 99
EVALUATION (CIRCLE ACTIONS TO BE TAKEN)							
CLEAN	CHECK	LUBE	SERVICE	TREAT	PAINT	REMOVE	REPAIR
TIGHTEN	SECURE	STOW	REPLACE	RESET	TEST	ADJUST	
REFERENCE DOCUMENT (M.M./S.R.M./DRAWING/SERVICE BULLETIN/D.E.F. INSTRUCTION ETC) _____ A.T.A. _____							
SPECIAL INSTRUCTIONS _____							
EVALUATION BY		EMP. NO.	O.T. AUTH (CIRCLE)	PARTS AUTH (CIRCLE)	REQD INSPN ITEM	CUSTOMER APPROVAL	
			YES NO	YES NO	YES NO (CIRCLE)		
CORRECTIVE ACTION							
PART NUMBER 'OFF'		SER #	PART NUMBER 'ON'	SER #	PART NUMBER 'OFF'	SER #	PART NUMBER 'ON'
ACCOMPLISHED BY		EMP. NO.	SUPERVISOR/LEAD RECHECK		EMP. NO.	CHECKED BY:	
						DAY MO YR	

5/2  
2.11.01 H Pos. 2

2.11.01 H Pos. 2

19372649278 P.03

TO

FROM

07-13-2092 02:56PM

<b>NON-ROUTINE WORK CARD</b>						<b>TENNESSEE TECHNICAL SERVICES, LLC</b>																	
FORM NO. 28						CRS T84R1640																	
ITEM LOCATION (CIRCLE ONE) FUSE STRUCT LT WING				TAIL LG & WW		ENG. DOORS/HATCHES		FUNCTION: (CIRCLE ONE) <input checked="" type="checkbox"/> MECH ELEC RADIO SIM CLEAN <input type="checkbox"/> NDT INSP PAINT CABIN SHOP															
CABIN RT WING								W/C NO. 1385		TASK NO. 4602													
AC TYPE: MODEL 208-63				A/C TAIL NO. 11957		CUSTOMER REQUEST? <input checked="" type="checkbox"/> YES <input type="checkbox"/> NO (CIRCLE ONE)																	
ITEM DESCRIPTION FWD FUSE MAIN CARGO DOOR UPPER CORNER MISSING FASTENER FOR GILL LINER. AND STRIKER PLATE																							
WRITTEN BY: <i>[Signature]</i>						EMP. NO. 9250		DAY 14		MO 8													
YR 99		EVALUATION (CIRCLE ACTIONS TO BE TAKEN)																					
CLEAN    CHECK    LUBE    SERVICE    TREAT    PAINT    REMOVE    REPAIR    TIGHTEN    SECURE    STOW    REPLACE    RESET    TEST    ADJUST																							
REFERENCE DOCUMENT (M.M/S.R.M./DRAWING/SERVICE BULLETIN/E.R. INSTRUCTION ETC)										A.T.A.													
SPECIAL INSTRUCTIONS																							
EVALUATION BY				EMP. NO.		O.T. AUTH (CIRCLE) YES NO		PARTS AUTH (CIRCLE) YES NO		REQD INSPN ITEM YES NO (CIRCLE)													
CUSTOMER APPROVAL																							
CORRECTIVE ACTION																							
PART NUMBER "OFF"			SER #			PART NUMBER "ON"			SER #			PART NUMBER "OFF"			SER #			PART NUMBER "ON"			SER #		
ACCOMPLISHED BY				EMP. NO.		SUPERVISOR/LEAD RECHECK				EMP. NO.		CHECKED BY:				DAY		MO		YR			

3/3

2.11.01 H. Pos 2

TOTAL P.03

2.11.01 H Pos 2



## DC-8 FLIGHT ENGINEER BULLETIN

DRAFT# 1

ISSUED BY: Pat Tancredi/Rob Barrow, Chief Engineer's Office

DATE: 04/05/99

SUBJECT: Operations Procedures

NUMBER: 99-005

TO: ALL FLIGHT ENGINEERS/SECOND OFFICERS

We are starting to get more feedback from crewmembers concerning procedures that need to be readdressed. We really appreciate it when you take the time to bring your suggestions to us. Sometimes, it may seem like your ideas go unanswered, but the truth is, with the expansion we've seen over the last two years, it takes a while to answer them all.

- 1) **9-G Nets:** Before you block out, all of the attach fittings on the 9-G net must be installed. ALL of the fittings must work prior to flight. If the FAA finds any fittings not attached, and the circumstances are right, you and the company will be issued a violation.
- 2) **QRH:** The final draft is being tested in the Simulator for the 60 series aircraft. So far, all of the updated procedures work very well. They flow better. Many thanks to Steve MacDougal and the Training Department for their hard work.
- 3) **Windows:** The window issue is not dead. We are petitioning Boeing/Douglas to either add a Section 56 specifically for windows, or refer to the proper Maintenance Manual under Section 30-6 of the MEL (Minimum Equipment List), concerning cracked windows.
- 4) **Fuel Worksheets:** It has come to our attention that there is some confusion about the procedure for completing the Fuel Consumption Worksheet. A while back, we issued a handout with examples for completing the worksheet. In the near future, we will be going through Volume 1 of the AOM page by page, and we will incorporate the Fuel Consumption Worksheet procedures in the new Revision. In the interim, if anyone needs a copy of the example, contact our office, and we'll get you one.
- 5) **Rosenbalm Doors:** The safety latch MUST BE INSTALLED any time the Rosenbalm Cargo Door is open. We know this is a two person procedure, and are working with Safety, Maintenance and the people in charge of Cargo Loading to coordinate the latch installation during normal operations. We have had two recent incidents where a door line failed, causing the door to fall closed. The results could have been disastrous. This is a very important issue, and we all need to cooperate until all parties comply with the new procedure.
- 6) **Post-Flight Inspection:** Some Crewmember(s) are telling the F/E, S/O that this inspection is no longer required. Not true! This inspection is not to be neglected. It only takes approximately two minutes or so to complete. The bottom line is this: After the Parking/Secure Checklist is complete, a Post Flight Inspection will be accomplished to check tires, brakes (hot or cold), engines, bird strike damage, tail strikes, leaks, etc.

CRAFT MAINTENANCE LOG

Airt-01 7) Litho U.S.A.

WORLDWIDE

2.11.01 I

7522-09

ACFT. NO. N796FF

CFT. TYPE DC 8-73F

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA		DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	115	2/3/99	KPAL	KDAY	0808	0546	0138	022	0510	0118	36.0	17.0	2	66763	1098
2															
3															
4															

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #	
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU									
1	00:22	DL1				2	2	2	2	1A	01	M. CHANTON	28504	1	1			
2											02	E. LYNCH	51073					
3											03	H. SCARLETT	15043					
4																		

400  
311  
315  
261

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
2.	(P) M	INTERNAL PANEL LIGHTING INOP, VICINITY OF GEAR HANDLE.	2.	Removed Panel cleaned connection Reinstalled panel OPS CHECKS normal	2-3-99	KDAY	30287
3.	(P) M	REF Dmi 902024, FIE BACK GROUND LIGHTS, Fuse blown.	3.	PROVISIONAL NOTE NO ACTION TAKEN Dms #902024 STILL IN EFFECT.	2/3/99	KDAY	60796
4.	(P) M	UPPER PORTION OF GEAR GREEN INDICATION LIGHTS INOP.	4.	Relamped upper portion of gear indication green lights OPS CHECKS normal	2-3-99	KDAY	30287
5.	P / M		5.				
6.	P / M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.
1	WCU	1192-00-11101	426	1192-00-11101	174	1
1	WCU	1192-00-11101	174	1192-00-11101	426	2

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W: TRAVEL	STATION: KDAY	PREVIOUS LANDINGS	26853	LANDINGS THIS PAGE	1	TOTAL LANDINGS	Be 26854	1-DIST.	2-DIST.	3-DIST.
DATE: 2-3-99	CERT. NO.: [REDACTED]	PREV. A/C FLT. HRS.	81396 :12	FLT. HRS. THIS PAGE	1 :18	TOTAL A/C FLT. HRS.	Be 81396 :30			
GMT TIME: 0730 Z	AUTH SIG: [REDACTED]	BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE [REDACTED]				

2,11,01 I

**EMERY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM**

**LOG PAGE NO.**  
4560-20

AIRCRAFT NO.	DATE	STATION	TYPE CHECK	PAGE
N796FT	3/30/99	KSAN	TRM1.	1 OF 2

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
1	FAA REPORTED ITEM: I- POS#1 TWO CARGO LOCKS INSTALLED IN BALLMAT AREA	PREVIOUSLY COMPLIED WITH PRIOR TO ACFT ARRIVAL AT KSAN. INSPECTED NO DEFECTS NOTED	14059 INSP		
	P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
2	FAA REPORTED ITEM: I- POS#3 CENTER ROLLER TRAY ASSEMBLY WAS SHORTEN AND HAD APPROXIMATELY TWO ROLLERS REMOVED.	PREVIOUSLY COMPLIED WITH PRIOR TO ACFT ARRIVAL AT KSAN. INSPECTED NO DEFECTS NOTED	14059 INSP		
	P/N OFF	S/N OFF	P/N ON	S/N ON.	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
3	FAA REPORTED ITEM: I- POS#4 THREE ROLLER TRAY ASSEM- BLES HAD ROLLERS INSTALLED WITH DIFFERENT SPACING THAN ORIGINAL SHEET METAL WAS USED TO EFFECT REPAIRS TO GILL LINER PIN OFF INSTEAD OF LINER MATERIAL.	THREE ROLLER TRAY ASSEMBLES INSTALLATION REPAIRS WERE PERFORMED E/W PRIOR TO ACFT ARRIVAL AT KSAN. GILL LINER REPAIRED I AW EWA M/M CHAPT. 4.	14059 INSP INSPECTED DEFECTS NOT TAC		
	P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
4	FAA REPORTED ITEM: I- POS#6 SHEET METAL WAS USED TO EFFECT REPAIRS TO GILL LINER.	RE- GILL LINER REPAIRED I AW EWA M/M CHAPT. 4	14059 INSP		
	P/N OFF	S/N OFF	P/N ON	S/N ON	POS

2.11.01 I

**EMERY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM**

**LOG PAGE NO.**  
4560-20

<b>AIRCRAFT NO.</b> N796FT	<b>DATE</b> 3/30/99	<b>STATION</b> KSAN	<b>TYPE CHECK</b> TRM1	<b>PAGE</b> 2 OF 2
-------------------------------	------------------------	------------------------	---------------------------	-----------------------


ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
5	FAA REPORTED ITEM: I- POS <sup>9</sup> FARE ROLLER SECTION ON RIGHT & LEFT SIDE WAS NOT INSTALLED IN FLOOR TRACK.	PREVIOUSLY COMPLIED WITH PRIOR TO ACFT ARRIVAL - AT KSAN. INSPECTED NO DEFECTS NOTED		14059 INSP
	PIN OFF	S/N OFF	PIN ON	S/N ON
				POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
6	FAA REPORTED ITEM: I- POS <sup>9</sup> R ROLLER TRAY ASSEMBLIES HAD ROLLERS INSTALLED WITH DIFFERENT ROLLER SPACING.	PREVIOUSLY COMPLIED WITH PRIOR TO ACFT ARRIVAL AT KSAN. INSPECTED NO DEFECTS NOTED.		14059 INSP
	PIN OFF	S/N OFF	PIN ON	S/N ON
				POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
7	FAA REPORTED ITEM: R ROLLER I- POS <sup>9</sup> ROLLER TRAY ASSEMBLIES HAD ROLLERS INSTALLED WITH DIFFERENT ROLLER SPACING.	PREVIOUSLY COMPLIED WITH PRIOR TO ACFT ARRIVAL AT KSAN. INSPECTED NO DEFECTS NOTED		14059 INSP
	PIN OFF	S/N OFF	PIN ON	S/N ON
				POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
8	FAA REPORTED ITEM: I- POS <sup>15</sup> SHEET METAL REPAIR TO GILL LINER.	REPAIRED GILL LINER FALL EWA M/M CHAPT. 4.		14059 INSP
	PIN OFF	S/N OFF	PIN ON	S/N ON
				POS

END



**AIRCRAFT MAINTENANCE LOG**

17-0000 (11/2) Lino U.S.A.



4560-20

ACFT. NO. **N 796FT** ACFT. TYPE **DC-8-7**

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE		CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)	GAL'S	CARGO	MA	
1	824	3/29/99	LLAX	KSAN	1520	1605	1:45	1530	1555	1:25	-A	28,000	20,000	8		1784	6
2																	
3																	
4																	

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					AIP	CREW	EMP #	T.O.	LDG	AIP	CREW	EMP #
	DELAY	CODE	LOGS	STATION	1	2	3	4	APU								
1	:				0	0	0	0	-	01	FOOTE B	25076					
2	:									02	WEMPA P	87907	1	1			
3	:									03	HERB E	34656					
4	:																

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P (M)	PER MAINTENANCE CONTROL REQUEST TO VERIFY AND OR REPAIR THE FOLLOWING FAA REPORTED AND REPORTED INSPECTION ITEMS DATED 08/05/99 AT KDAY. REF RASIP FINDING Pg 25 & 26 ITEM I, POS 1, 3, 7, 8, & 9 & FIRST PART OF POS 4	1.	ITEMS I POS 1, 3, 7, 8 & 9 PREVIOUSLY COMPLIED WITH PRIOR TO ACFT ARRIVAL AT KSAN. ALSO FIRST PART POS 4 ALSO PREVIOUSLY COMPLIED WITH	3/29/99	KSAN	1405
3.	P (W)	REF RASIP FINDINGS Pg 25 & 26 ITEM I POS 4, 6, & 15 TO BE COMPLIED WITH.	3.	COMPLIED WITH & REPAIRS MADE PER EWR M/M CHAPTER 4 ON ITEMS I POS 4, 6, & 15 ALL ITEMS NOW COMPLIED WITH.	3/29/99	KSAN	1405
4.	P / M		4.				
5.	P / M		5.				
6.	P / M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POB.

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT		
CHECKED BY: <b>TRM1</b>	STATION: <b>KSAN</b>	PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS	1-DIST.	2-DIST.	3-DIST.	
DATE: <b>03-30-99</b>	CERT. NO. [REDACTED]	PREV. A/C FLT. HRS.	FLT. HRS. THIS PAGE	TOTAL A/C FLT. HRS.	[Signature]			
GMT TIME: <b>00:20</b>	AUTH SIG: [Signature]							

SC. OF MAINT. ACTION CARRIED FWD TO: \_\_\_\_\_ BOOK CHANGED NEW LOG PAGE NO: \_\_\_\_\_ CAPTAIN'S SIGNATURE: \_\_\_\_\_

LOG PAGE DIST. 1. ORIGINAL WHITE - MAINTENANCE 2. COPY - OPS (SEND WITH TOUR ENVELOPE) 3. COPY - [REDACTED]

04/01/1999 16:28 619-688-9445 EWA KSAN 04/01 '99 10:49 NO. 905 02/02 PAGE 06



FT MAINTENANCE LOG

AMEC (10/97) Ltd U.S.A.



2.11.01 ✓

7524-18

ACFT. NO. N950R

ACFT. TYPE DC-8-63

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAIL
1	015	2-04-99	KPAX	KSTL	0320	0610	2450	0333	0604	2131	8622	75.1	37.0	Φ	566.56	Φ
2	015	2-04-99	KSTL	KDAY	0645	0750	1105	0655	0746	151	Φ	37.0	22.9	Φ	658.46	Φ
3																
4																

355

LEG	DEPT. DELAY		TRAIN. FLT.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1										01	ROSENBERG F.	72178	01	01	NR	CONNACHTON	TCA
2										02	LOVAS D	50022	01	01			
3										03	PORTER D.	46176					
4										04	FARRELL M.	23643					

7611  
3300  
0516  
2552  
7611

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P/M	#4 THROTTLE MOVED GOOD IN PHX IN MID-RANGE. BUT, STILL BINDS IN RANGE TRAVEL.	1.	W/PT on ends & pivot points of #4. Another check of throttle moment CES good to bring note.	2/4/99	KDAY	61525
2.	P/M	REFERENCE NON-MEL N752473-008 COCKPIT SPARE BULB RACK MISSING 307 LAMPS	2.	INSTALLED 307 LAMPS IN SPARE BULB RACK. THIS CLEARS NON-MEL N752473-008	2/4/99	KDAY	40470
3.	P/M	ON FAA COMP. OK; found roller at #10 pos. not sure	3.	SERVED roller at pos. #10, OK normal	2/4/99	KDAY	61525
4.	P/M	ON FAA COMP. OK; reported throttle pos. placards won't not sure	4.	INSTALLED SERVED readable throttle pos. placards	2/4/99	KDAY	61525
5.	P/M		5.				
6.	P/M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W: TCA	STATION: KDAY	PREVIOUS LANDINGS	25107	LANDINGS THIS PAGE	2	TOTAL LANDINGS	25109	1-DIST.	2-DIST.	3-DIST.
DATE: 2/4/99	CERT. NO.:	PREV. A/C FLT. HRS.	63231:16	FLT. HRS. THIS PAGE	3.22	TOTAL A/C FLT. HRS.	63234:38			
GMT TIME: 0930Z	AUTH. SIG.:	DISC. OR MAINT. ACTION CARRIED FWD TO:		BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE				

2.11.01 J

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## CARGO LOAD RESTRAINT SYSTEM MAINTENANCE AND TRANSPORTATION PROCEDURE

### I. CARGO LOAD RESTRAINT SYSTEM MAINTENANCE

#### A. Introduction

1. This section will contain cargo load restraint requirements for all aircraft utilizing rollerized cargo handling systems.
2. Cargo Restraint involves the prevention of movement in five principal directions: Forward, Aft, Upward (vertical), Left (side), and Right (side). These movements are the result of forces exert upon the cargo due to acceleration or deceleration of the airplane in take-offs and landings as well as forces to air turbulence in flight. Such forces are commonly expressed in terms of gravitational units (G's). Correct restraint provides the proper relationship between the weight of the cargo and restraint required in G's. Restraint is required for flight and taxi loads and for crash loads.

#### B. Maintenance

The Cargo System Maintenance Program is to include:

1. Inspection during scheduled checks.

#### C. Pallet Lock Limitations and Procedures

1. It is permissible for some pallet locks to be missing or inoperative along each lateral edge (fwd. & aft edges) provided:
  - a. One lock per position may be broken or missing without any load limitations to that position. \*
  - b. **AT NO TIME WILL IT BE PERMISSIBLE TO HAVE MORE THAN ONE LOCK PER POSITION MISSING OR BROKEN.**
2. Side restraint rails or rail assemblies are required to be installed, if a rail or rail assembly is unserviceable the position is to be blocked and NOT loaded. The affected rail/position is to be placed on the NON-MEL list and Maintenance Control notified. Maintenance Control is to notify Operations of the blocked position.
3. A good pallet lock may be shifted to a position where more than one lock is broken or missing in order to carry maximum loads in all positions.

Make an entry in the Log Book giving location of broken or missing lock and place item on Non-MEL deferred list by calling Maintenance Control and following applicable procedures in MPP Manual Chapter 3.



CHAFF MAINTENANCE LOG  
92 (882) LHM U.S.A.

EMERGENCY WORLDWIDE



33-30 2.11.01K  
ITEM # 2  
3338-11

ACE NO. N604 AC  
ACFI DCX 73F

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT HOURS	FUEL DATA		PERCE GALS	CARGO DATA		
			FROM	TO	OUT	IN		OFF	ON		DEPART (LBS)	ARRIVAL (LBS)		CARGO	HAIR	
1	898	4-2-99	LAF	EBBR	1810	2045	2795	1825	2039	2719	3747	480	27.6	0	10440	0
3																
4																

LEG	DEPT. DELAY		TRAIN FLTS		OR ADD				A/P	C/P	EMP #	STA	LOG	A/P	C/P	EMP #
	DELAY	CODE	LOGS	STATION	1	2	3	4								
1				EBBR	1	1	1	1	01	R. CADY	11056					
2									02	A. BROWN	09050	1	1			
3									03	S. JACOBS	39623					
4																

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	RECD
1.	P (M)	REF. TO DMI C 570 6213-0376 BOTH FMS DATA BASE EXPIRED.	1.	RELOADED I.A.W. UMS 1-D UPDATE PROCEDURES. NEW DATE 22 APRIL 99. THIS CLEARS DMI C 570 6213-0376	22 APRIL 99		252701
2.	P (M)	FOUND CARGO DOOR PIG TAIL HARNAS DAMAGED.	2.	R.R CARGO DOOR PIG TAIL HARNAS; TEST O.K.			2525375
3.	P (M)	OXYGEN CLOSED AT MAINS	3.	OPENED OXY AT MAIN BOTTLE.	24 APR 1999		252701
4.	P (M)	GEAR PINS INSTALLED	4.	GEAR PIN'S REMOVE AND STOWED	24 APR 1999		252701
5.	P (M)	FAA reported during RASIP INSP. 2/3/99, main deck over head light. DMI and covered with gill liner. The light had a broken lens	5.	Found light in cargo comp. #3 covered by gill liner. DMI light Assy. JAW Emery DC-B MEL ch. 83-3, cat 'D' control # D3338115-1128 due 8-3-99	14 APR 1999		75226
6.	P (M)	Found light lens in cargo comp #2 covered with pit tape. NOTE: Lens cracked	6.	removed lens and tape and bulb covered with gill liner entered placw control # D3338116-1129 due 8-3-99			

NO.	PART NO	ENCLATURE	PART NO	OFF	SER. NO.	OFF	PART NO	ON	SER. NO.	OFF	POS.

CHECK/INW: NR		STATION: EBBR	PREVIOUS LANDINGS			LANDINGS THIS PAGE			TOTAL LANDINGS			GAS HEADOUT		
DATE: 04-05-99	GMT TIME: 17:00 Z	CERT. NO.:	PREV. AC	PREV. FLT. HRS.	PREV. AC	PREV. FLT. HRS.	TOTAL AC	TOTAL FLT. HRS.	1-DIST.	2-DIST.	3-DIST.	1-DIST.	2-DIST.	3-DIST.

DISC OR MAINT. ACTION CARRIED FWD TO: 3338-12 BOOK CHANGED NEW LOG PAGE NO: CAPTAIN'S SIGNATURE

P. 1/2

NO. 885

BELGIVIA MEUNHUIS

19.14

D. H. K. 1999

2.11.01K  
ITEM # 2

FLIGHT INFORMATION SYSTEM

1 IAWT MAINTENANCE LOG  
A. (997) Libo U.S.A.



3338-12

ACFT. NO. N604AL ACFT. T. DC-3F

NO. 883 P. 2/2

L E F T	FLT	DATE	STATION		GMT		BLDCK HOURS	EMT		FLT HOURS	FUEL DATA			WEZE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UNLFT (USQ)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	MAN
1																
2																
3																
4																

USE ONLY

L E F T	DEPT. DELAY		TRAIL FLTS		CLASS				CREW	EMP'S	TAXI	LOG	A/E	DREW	EMPT
	DELAY	CODE	LDSS	STATION	1	2	3	4							
1															
2															
3															
4															

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P/M	Found light lens in cargo compt. #1 made of plastic and melting.	1.	Removed lens + bulb covered as required EMT. IAW mel ch. 33-3 cat. 0' Control #D3378121-1130 due 8-3-99.	15-99	EBBR	75226
2.	P/M		2.				
3.	P/M		3.				
4.	P/M		4.				
5.	P/M		5.				
6.	P/M		6.				

AIRWORTHINESS RELEASE		AIRCRAFT TIRE CYCLES			INS HEADONT		
CHECK/WH: SERVICE	STATION: EBBR	PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS	1-DIST.	2-DIST.	3-DIST.
DATE: 04-05-99	CERT. NO.:	EMT AC FLT. HRS	FLT. HRS. THIS PAGE	TOTAL AC FLT. HRS			
GMT TIME: 17:00 Z	AUTH SIG: [Signature]						
DISC. OR MAINT. ACTION CARRIED FWD TO:		BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE			

BELGAVIA MECHANICS

5. APR. 1999 19:14

ENGINE ELECTRICAL MONITORING DATA

2.11.01 ITEM L2

AIRC. T MAINTENANCE LOG  
AIR-0092 (10/97) Litho U.S.A.



6960-09

ACFT NO. N-603AL TYPE DC-8/73F

LEG	DATE	STATION FROM	STATION TO	FLIGHT NO.	BLOCK	GRT	FLT	FUEL DATA		DE-ICE	CARGO DATA				
								DEPART (LBS)	ARRIVAL (LBS)		GAL'S	CARGO	MAL		
1	0328-99	KWAI	KORD	2255	0110	2+15	2306	0100	1+54	1,854	40.0	19.4	0	0	0
2															
3															
4															

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD				A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1-2	3	4	APU								
1	:				0	0	0	0	0-1	LINKWIC, J.	49374			DH	WINSLOW, R.	EWALM
2	:								0-2	HILL, T.	35495	1	1			
3	:								0-3	WILLIAMS, R.	89038					
4	:								DK	GRAHAM, C.	EWAMX					

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	(P) M	#2 FMS SHOWS - STEERING FAIL NO HEADING + AUXILLARY BOARD FAIL	1.	TRANSFERRED TO DMI PER MEL 31-373-29-99 RORD CAT "D" CONTROL # D6960091-1043 DUE DATE 7-27-99 PLACARD INSTALLED	7-27-99		45060
2.	(P) M	FOAM RUBBER DEAD IN CAPTS + PID SEAT BACKS + BOTTOMS.	2.	PREVIOUSLY ENTERED UNDER NON MEL CONTROL # N5992141-0742 AND # N5992142-0743	8-29-99	KORD	45060
3.	P (M)	PER MXCTL REQUEST CHECK #2 POS LIGHT ASSY MAIN CARGO FOR BEING COVERED OVER BY GILL LINER (FAA FIND)	3.	FOUND LIGHT ASSY COVERED BY GILL LINER REMOVED PATCH FOUND LENS COVER MISSING. TRANSFERRED TO DMI PER MEL 33-3 CAT "D" CONTROL # D6960093-1042 DUE DATE 7-27-99 PLACARD INSTALLED.	3-29-99	KORD	45060
4.	P / M						
5.	P / M						
6.	P / M						

34-43  
25-15  
33-30

NO.	PART NOMENCLATURE	PART NO / OFF	SER. NO / OFF	PART NO / ON	SER. NO / ON	POS.

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES		INS READOUT			
CHECK C/W SERVICE	STATION: KORD	PREVIOUS LANDINGS	LANDINGS THIS PAGE	TOTAL LANDINGS	1-DIST.	2-DIST.	3-DIST.
DATE: 3-30-99	CERT. NO. [REDACTED]	86118	1	37440			
GMT TIME: 0130Z	AUTH SIGN: [Signature]	86118	1.54	86120			
DISC. OR MAINT. ACTION CARRIED FWD TO:		BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE: [Signature]			

AIF VFT MAINTENANCE LOG

AIR-002 (1097) Litho U.S.A.



2.11.01  
12

6960-11

ACFT. NO. N603AL

OFT. TYPE DC-8-73

459

LINE	DATE	FROM STATION	TO STATION	GMT	LOCAL TIME	DEPART	ARRIVAL	FUEL	DE-ICE	CARGO DATA
1	012 3-30-99	KDAY	KTUS	1024	1404	3:40	1035 1400	3:25	6522	70.4 25.2
2	012 3-30-99	KTUS	KSAN	1437	1556	1:19	1452 1548	1:56	2682	44.6 30.4
3										
4										

LINE	DEPT. DELAY	TRAIN. FLTS.	OL ADD	AVR	CREW	EMP#	T.O.	LDG	AVP	CREW	EMP#
1	:17 DL-1				011 G. MOSS	59015	1	1	NIR	CONNORHAM	INSTONE
2					012 S. ARNER	08399	1	1			
3					013 R. RASHOK	68555					
4					NIR K. BERNEY	INSTONE					

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P/M	Ref DMI D7527211-0958 #1 ADF Inop.	1.	Cleaned Antenna connection #1 ADF. Ops checks good. This clears DMI #7527211-0958. Placard removed.	3/30/99	KSAN	62362
2.	P/M	Ref DMI D6960093-1042 Per MxTCL request check #2 Pas lightassy main cargo for being covered over by gill liners	2.	Installed new lens cover. Ops checks good. This clears DMI #D 6960093-1042. Placard removed.	3/30/99	KSAN	62362
3.	P/M		3.				
4.	P/M		4.				
5.	P/M		5.				
6.	P/M		6.				

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	POS.

CHECK C/W: TRM1		STATION: KSAN		PREVIOUS LANDINGS: 27442		AIRCRAFT TIME / CYCLES: 2		INS READOUT			
DATE: 03-31-99		CERT. NO. [REDACTED]		PREVIOUS TIME: 86121:07		LANDINGS THIS PAGE: 421		1-DIST. 2-DIST. 3-DIST.			
GMT TIME: 00:15		AUTH SIG: [REDACTED]		PREVIOUS TIME: 86125:28		TOTAL LANDINGS: 27444					
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:				CAPTAIN'S SIGNATURE: [REDACTED]			

EMERY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM

LCC PAGE NO.  
5399-02

AIRCRAFT NO.	DATE	STATION	TYPE CHECK	PAGE
6034C	2-4-99	KPOX	B3	1 OF 2

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
1	FAA Item pos 17 2EA Roller trays missing LT & RT OB	Installed Roller Trays OK OK	69108 INSP		
	P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
2	Lt 2 Cover missing pos 2 MAIN Cargo Deck RH FAA Item	Found Deactivated Installed Panel & Secured	69108 INSP		
	P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
3	pos 15 smoke det mounts missing FAA item	Installed Mounts OP OK good	69108 INSP		
	P/N OFF	S/N OFF	P/N ON	S/N ON	POS

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH		
4	pos 3 smoke det 1EA fastener missing FAA item	Installed New Fastener OK OK	69108 INSP		
	P/N OFF	S/N OFF	P/N ON	S/N ON	POS

QC  
10  
RRX



2.11.01 M

577-8270-

EMERY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM

LOG PAGE NO.  
6719-21

AIRCRAFT NO. 792FT	DATE 2/2/99	STATION KLAX	TYPE CHECK TS	PAGE 1 OF #3
-----------------------	----------------	-----------------	------------------	-----------------

2.11.01  
M-1

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
1 FAA	POS 2 R/H FWD	INSTALLED NEW	59164	
	ROLL MAT LOOSE -	HARDWARE 9		
	FAA REPORTED ITEM	RESECURED	INSP	
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

X

2.11.01  
M-5

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
2 FAA	POS 13 R/H	RESECURED	59164	
	SMALL ROLLER TRAY			
	ROLLER LOOSE -		INSP	
	FAA REPORTED ITEM			
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

X

2.11.01  
M-5

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
3 FAA	5 SMALL ROLLER	INSTALLED 5	03147	
	TRAYS DAMAGED + REMOVED	SMALL ROLLER		
	POS 04/5 (26) (23) BW	TRAYS	INSP	
	FAA REPORTED ITEM			
P/N OFF	S/N OFF	P/N ON	S/N ON	POS
20042-511	NSN'S	20042-511	NSN'S	1) POS 4/5-23 23 6 8

Y

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
4 FAA	L/H INBOARD FLAP ACT.	X-FIR TO LOG	PDC	
	FAIRING COVER CRACKED -	6719-22 ITEM 1	INSP	
	FAA REPORTED ITEM			
P/N OFF	S/N OFF	P/N ON	S/N ON	POS

Y

Q.C.  
10  
RRX

2.11.01M

EMERY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM

LOG PAGE NO.  
6719-21

AIRCRAFT NO. 792 FT	DATE 2-2-99	STATION KLAX	TYPE CHECK TRIM. CK.	PAGE 3 OF 3
------------------------	----------------	-----------------	-------------------------	----------------

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
9	L2 Door inside rubber strips coming loose.	SECURED RUBBER STRIP		02704
	FAA REPORTED ITEM			INSP
PIN OFF	S/N OFF	PIN ON	S/N ON	POS

X

2.11.01  
M-2

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
10	Between pos. 9 & 10, 4 Bear Traps are installed without rollers.	REPLACED 4 POS BEAR TRAPS AS REQUIRED		02704
	(This type can only be used in Bellhat area) - FAA REPORTED ITEM			INSP
PIN OFF 50044-501 50044-501 50754-505	S/N OFF 33001 HSR 3303	PIN ON <del>33001</del> 50044-523 50044-1 50044-1	S/N ON NSN NSN NSN	POS 10

814  
02704  
(29C)

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
11	Electrical Terminal Block above Cargo Door is unprotected.	RE-SECURED		02704
	FAA REPORTED ITEM			INSP
PIN OFF	S/N OFF	PIN ON	S/N ON	POS

X

ITEM #	DISCREPANCY	CORRECTIVE ACTION		MECH
12	Capt's Sliding Window outside Emergency opener is not placarded.	INSTALLED NEW EMERGENCY PLACARD ON CAPT'S SIDE.		00400
	FAA REPORTED ITEM			INSP
PIN OFF	S/N OFF	PIN ON	S/N ON NSN	POS CAPT'S

Q.C.  
10  
RRXA

2.11.01 M

EMERY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM

LOG PAGE NO.  
6719-21

AIRCRAFT NO. 792 FT	DATE 2-2-99	STATION KLAX	TYPE CHECK TERMCK	PAGE 2 OF 3
------------------------	----------------	-----------------	----------------------	----------------

2.11.02

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
5	9 G Nut, Position 16 Badly worn. (Frayed)	Replaced 9 G Nut Assy. as required.	88106	
	FAA REPORTED ITEM		INSP	
PIN OFF 5773270-71	SIN OFF NSN	PIN ON 5773270-71	SIN ON NSN	POS ONLY

ON ORDER

2.11.01  
M-4

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
6	Side restraint <sup>stuck</sup> broken position 2 ea. at position 4 1 ea. at position 1.	Lubed all 3 side restraints, all check good.	88106	
	FAA REPORTED ITEM		INSP	
PIN OFF	SIN OFF	PIN ON	SIN ON	POS

X

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
7	LH pos. 15 Broken side roller tray.	Repaired Roller Tray as required.	8806	
	FAA REPORTED ITEM		INSP	
PIN OFF	SIN OFF	PIN ON	SIN ON	POS 15

ON ORDER  
??

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH	
8	One ball missing in Ball Matt. (Adjacent to cargo door)	X-FER To Log 6719-22 Item 2	120C 12005	
	FAA REPORTED ITEM		INSP	
PIN OFF	SIN OFF	PIN ON	SIN ON	POS

X

QC  
10  
RRXA

**RAFT MAINTENANCE LOG**

Alt 0082 (10/97) Litho U.S.A.



2.11.01W

QC 10 WXP

6719-22

ACFT. NO. N792-JT

ACFT. TYPE DC8

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE GAL'S	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		CARGO	
1																
2																
3																
4																

LEG	DEPT. DELAY		TRAIN. FLTS.		OIL ADD					A/P	CREW	EMP.#	T.O.	LDG	A/P	CREW	EMI
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1																	
2																	
3																	
4																	

MX ONLY - NO FLIGHT

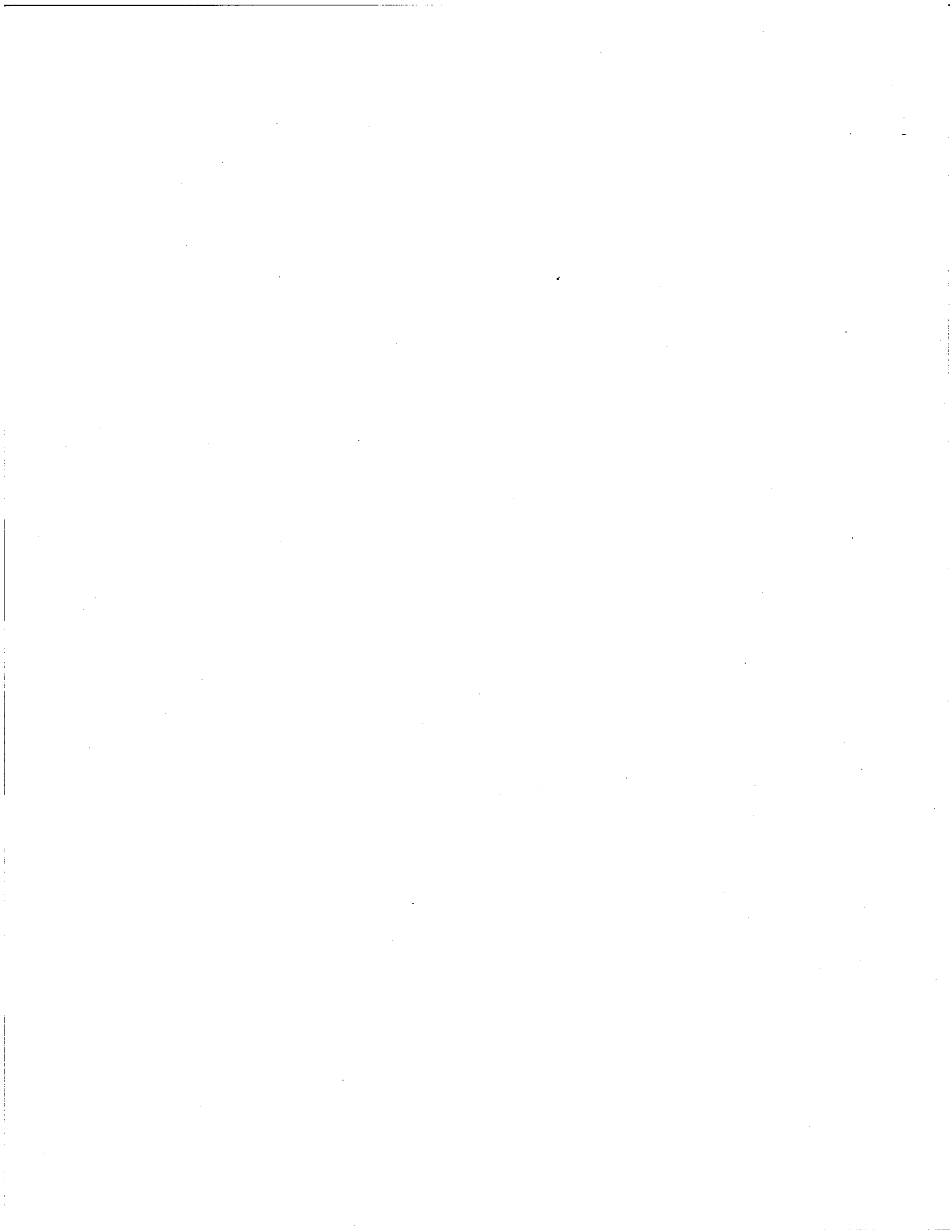
NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MEC
1.	P (M)	FAA REPORTED ITEM - L/H INBD. FLAP ACTUATOR FAIRING COVER IS CRACKED.	1.	X-FEIZ TO MEL/CDL DM #902026 TAW MEY/CDL	2-3-99	KLA	1206
2.	P (M)	FAA REPORTED ITEM - 1 BALL MISSING IN BALL MATT	2.	X-FEIZ TO NON-MEL #180.	2-3-99	KLA	1206
3.	P (M)	REF DM1 # 901409 # 2 ENGT "B" IGN INOP.	3.	INSTALLED NEW IGNITOR ON "B" SYS # 2 ENGT OPS CHECK GOOD THIS CLEARS DM1 - PLACARD REMOVED.	2-4-99	KLA	1206
4.	P / M		4.				
5.	P / M		5.				
6.	P / M		6.				

2.11.01 M-3

NO.	PART NOMENCLATURE	PART NO. OFF	SER. NO. OFF	PART NO. ON	SER. NO. ON	PC
3	IGNITOR, SPARK TLI	9044035-1	NSJ	9044035-1	5370 F	

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W:	STATION:	PREVIOUS LANDINGS	26619	LANDINGS THIS PAGE	0	TOTAL LANDINGS	26619	1-DIST.	2-DIST.	3
DATE:	CERT. NO.:	PREV. A/C FLT. HRS.	80796.58	FLT. HRS. THIS PAGE	0:0	TOTAL A/C FLT. HRS.	80796.58			
GMT TIME:	AUTH SIG.:									
DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE				







April 2, 1999

Mr. Nicholas Pearson  
Principal Avionics Inspector  
San Jose International Airport  
1250 Aviation Avenue, Suite 295  
San Jose, CA 95110-1130

Dear Mr. Pearson:

This letter constitutes Emery Worldwide Airlines, Inc. (EWA's) initial formal response to your letters of investigation (99WP150038, 99WP150037 and 99WP150008) addressed to EWA's President and Chief Operating Officer, dated March 18, 1999.

As per our previous discussion March 24, 1999, at your office, EWA will respond to these letters with the formal RASIP response.

Thank you for the descriptive letters. We have been working on the RASIP findings since receipt, and are nearing completion.

Please call if you have any questions.

Sincerely,

A handwritten signature in black ink, which appears to be "Thomas M. Wood". The signature is written over a solid black rectangular redaction box.

Thomas M. Wood  
Director Quality Control

TMW/csh

Attachments

cc: Kent Scott  
Rene' Visscher



U.S. Department  
of Transportation  
**Federal Aviation  
Administration**

San Jose Flight Standards District Office

San Jose International Airport  
1250 Aviation Avenue, Suite 295  
San Jose, CA 95110-1130  
Phone: (408) 291-7681  
FAX: (408) 279-5448

March 18, 1999

**CERTIFIED-RETURN RECEIPT**

Mr. Kent T. Scott  
President and Chief Operating Officer  
Emery Worldwide Airlines  
One Emery Plaza  
Vandalia, OH 45377

Dear Mr. Scott:

File No. 99WP150038

This letter is in response to my action item of our meeting in Los Angeles on March 15, 1999 and to the request from Mr. Tom Wood, dated March 11, 1999. This letter is to further identify the items that pertain to the FAA Letter of Investigation, dated March 4, 1999 sent to you.

This EIR was initiated due to the results of the Western Pacific Regional Aviation Safety Inspection Program (RASIP) conducted February 1 through 5, 1999. During that time frame several aircraft ramp inspections were performed by FAA Inspectors at various locations with unsatisfactory results. It is alleged that EWA operated aircraft under their operational control in an unairworthy condition. Specifically, all aircraft identified in RASIP findings 2.11.01 and 2.11.02, for not conforming to their Type Certification and/or Supplemental Type Certification basis. This may be contrary to the Federal Aviation Regulations.

This letter is to inform you that this matter is under investigation by the Federal Aviation Administration (FAA). We would appreciate receiving any evidence or statements you might care to make regarding this matter within 10 days of receipt of this letter. Any discussion or written statements furnished by you will be given consideration in our investigation and any subsequently prescribed sanction or corrective action. If we do not hear from you within the specified time, our report will be processed without the benefit of your statement.

Sincerely,

Nicholas E. Pearson  
Principal Avionics Inspector

cc: Mr. Thomas Wood  
Mr. Rene Visscher





## **RASIP FINDING**

### **2.11.02**

The RASIP Team inspected DC-8 aircraft (N-792FT) on arrival to the Los Angeles outstation on 02/02/99. The 9-G barrier net was not secured at (4) four locations at the left side of the aircraft. The 9-G barrier net was photographed immediately after the forward service door was opened for crew egress and prior to the opening of the main cargo door.

Additionally, the 9-G barrier net was severely frayed at fuselage attach fitting right side. This was brought to the attention of Emery aircraft maintenance personnel and an entry was made in the aircraft logbook.

FAR 121.153(a); 25.1301( c)

### **2.11.02 RRXA RESPONSE**

- (A) A Flight Engineers Bulletin was issued on 04-05-1999 Number 99-005. This will ensure that net 9-G is attached prior to flight. See attached Bulletin mentioned above.
- (B) Discrepancy: 9-G net position 16 badly worn (frayed)  
Corrective Action: Replaced 9-G net as required, Reference Attached Non-Routine, Item Number 5.

The inspection findings were performed on the aircraft at the time it was out of service undergoing scheduled inspections, and corrected in accordance with the Maintenance Manual Procedures. EWA does not consider this to be a finding.

2.11.02A



## DC-8 FLIGHT ENGINEER BULLETIN

DRAFT# 1

ISSUED BY: Pat Tancreti/Rob Barrow, Chief Engineer's Office

DATE: 04/05/99

SUBJECT: Operations Procedures

NUMBER: 99-005

TO: ALL FLIGHT ENGINEERS/SECOND OFFICERS

We are starting to get more feedback from crewmembers concerning procedures that need to be readdressed. We really appreciate it when you take the time to bring your suggestions to us. Sometimes, it may seem like your ideas go unanswered, but the truth is, with the expansion we've seen over the last two years, it takes a while to answer them all.

- 1) 9-G Nets: Before you block out, all of the attach fittings on the 9-G net must be installed. ALL of the fittings must work prior to flight. If the FAA finds any fittings not attached, and the circumstances are right, you and the company will be issued a violation.
- 2) QRH: The final draft is being tested in the Simulator for the 60 series aircraft. So far, all of the updated procedures work very well. They flow better. Many thanks to Steve MacDougal and the Training Department for their hard work.
- 3) Windows: The window issue is not dead. We are petitioning Boeing/Douglas to either add a Section 56 specifically for windows, or refer to the proper Maintenance Manual under Section 30-6 of the MEL (Minimum Equipment List), concerning cracked windows.
- 4) Fuel Worksheets: It has come to our attention that there is some confusion about the procedure for completing the Fuel Consumption Worksheet. A while back, we issued a handout with examples for completing the worksheet. In the near future, we will be going through Volume 1 of the AOM page by page, and we will incorporate the Fuel Consumption Worksheet procedures in the new Revision. In the interim, if anyone needs a copy of the example, contact our office, and we'll get you one.
- 5) Rosenbalm Doors: The safety latch MUST BE INSTALLED any time the Rosenbalm Cargo Door is open. We know this is a two person procedure, and are working with Safety, Maintenance and the people in charge of Cargo Loading to coordinate the latch installation during normal operations. We have had two recent incidents where a door line failed, causing the door to fall closed. The results could have been disastrous. This is a very important issue, and we all need to cooperate until all parties comply with the new procedure.
- 6) Post-Flight Inspection: Some Crewmember(s) are telling the F/E, S/O that this inspection is no longer required. Not true! This inspection is not to be neglected. It only takes approximately two minutes or so to complete. The bottom line is this: After the Parking/Secure Checklist is complete, a Post Flight Inspection will be accomplished to check tires, brakes (hot or cold), engines, bird strike damage, tail strikes, leaks, etc.

**EMERY WORLDWIDE AIRLINES  
NON-ROUTINE MAINTENANCE FORM**

12.11.02 B

**LOG PAGE NO.**  
6719-21

<b>AIRCRAFT NO.</b> 792 FT	<b>DATE</b> 2-2-99	<b>STATION</b> KLAX	<b>TYPE CHECK</b> TERM CK	<b>PAGE</b> 2 OF 3
-------------------------------	-----------------------	------------------------	------------------------------	-----------------------

2.11.02  
B

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
5	9 B Net, Position	Replaced 9 B Net Assy.	88106
	16 Badly worn. (Frayed) —	as required.	
	FAA REPORTED ITEM		INSP
<b>P/N OFF</b> 5773270-71	<b>S/N OFF</b> NSN	<b>P/N ON</b> 5773270-71	<b>S/N ON</b> NSN
			<b>POS ONLY</b>

ON ORDER

2.11.01  
M-4

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
6	Side restraint <sup>stuck</sup> broken	Lubed all 3 side	88106
	position 2 ea. at position 4	restraints, all check	
	1 ea. at position 1. —	good.	INSP
	FAA REPORTED ITEM		
<b>P/N OFF</b>	<b>S/N OFF</b>	<b>P/N ON</b>	<b>S/N ON</b>
			<b>POS</b>

X

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
7	L.H. pos. 15 Broken	Repaired roller	8806
	side roller tray. —	Tray as required.	
	FAA REPORTED ITEM		INSP
<b>P/N OFF</b>	<b>S/N OFF</b>	<b>P/N ON</b>	<b>S/N ON</b>
			<b>POS</b> 15

ON ORDER  
??

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
8	One ball missing	X-FER TO LOG	PDC
	in Ball Matt. (Adjacent to	6715-22 Item 2	1206
	cargo door)		INSP
	FAA REPORTED ITEM		
<b>P/N OFF</b>	<b>S/N OFF</b>	<b>P/N ON</b>	<b>S/N ON</b>
			<b>POS</b>

X

Q.C.  
10  
RRXA



U.S. Department  
of Transportation  
**Federal Aviation  
Administration**

San Jose Flight Standards District Office

San Jose International Airport  
1250 Aviation Avenue, Suite 295  
San Jose, CA 95110-1130  
Phone: (408) 291-7681  
FAX: (408) 279-5448

March 18, 1999

**CERTIFIED-RETURN RECEIPT**

Mr. Kent T. Scott  
President and Chief Operating Officer  
Emery Worldwide Airlines  
One Emery Plaza  
Vandalia, OH 45377

Dear Mr. Scott:

File No. 99WP150038

This letter is in response to my action item of our meeting in Los Angeles on March 15, 1999 and to the request from Mr. Tom Wood, dated March 11, 1999. This letter is to further identify the items that pertain to the FAA Letter of Investigation, dated March 4, 1999 sent to you.

This EIR was initiated due to the results of the Western Pacific Regional Aviation Safety Inspection Program (RASIP) conducted February 1 through 5, 1999. During that time frame several aircraft ramp inspections were performed by FAA Inspectors at various locations with unsatisfactory results. It is alleged that EWA operated aircraft under their operational control in an unairworthy condition. Specifically, all aircraft identified in RASIP findings 2.11.01 and 2.11.02, for not conforming to their Type Certification and/or Supplemental Type Certification basis. This may be contrary to the Federal Aviation Regulations.

This letter is to inform you that this matter is under investigation by the Federal Aviation Administration (FAA). We would appreciate receiving any evidence or statements you might care to make regarding this matter within 10 days of receipt of this letter. Any discussion or written statements furnished by you will be given consideration in our investigation and any subsequently prescribed sanction or corrective action. If we do not hear from you within the specified time, our report will be processed without the benefit of your statement.

Sincerely,

Nicholas E. Pearson  
Principal Avionics Inspector

cc: Mr. Thomas Wood  
Mr. Rene Visscher



April 2, 1999

Mr. Nicholas Pearson  
Principal Avionics Inspector  
San Jose International Airport  
1250 Aviation Avenue, Suite 295  
San Jose, CA 95110-1130

Dear Mr. Pearson:

This letter constitutes Emery Worldwide Airlines, Inc. (EWA's) initial formal response to your letters of investigation (99WP150038, 99WP150037 and 99WP150008) addressed to EWA's President and Chief Operating Officer, dated March 18, 1999.

As per our previous discussion March 24, 1999, at your office, EWA will respond to these letters with the formal RASIP response.

Thank you for the descriptive letters. We have been working on the RASIP findings since receipt, and are nearing completion.

Please call if you have any questions.

Sincerely,

A handwritten signature in black ink, which appears to read "Thomas M. Wood". The signature is written over a thick black horizontal line that has been drawn through the text.

Thomas M. Wood  
Director Quality Control

TMW/csh

Attachments

cc: Kent Scott  
Rene' Visscher



## **RASIP FINDING**

### **2.11.03**

The RASIP Team conducted inspections on several of the DC-8 aircraft interiors and found installed cargo restraint system components modified that did not have substantiation or FAA approved data. The following examples:

- A. Cargo locks (bear traps) for aircraft produced as freighters by Douglas Aircraft Company not in accordance with Douglas Aircraft Company illustrated parts catalog and EWA Maintenance Manual. Cargo locks (bear traps) for aircraft converted to freighter configuration by various Supplemental Type Certificates (STC).
- B. Roller tray assemblies with modifications/repairs that are not in accordance with manufacturers maintenance manual data or instructions for continued airworthiness. To include rollers that were repositioned and shortened.
- C. Side restraint rail assemblies on which modifications/repairs have been made that are not in accordance with manufacturers maintenance manual data or the referencing of manufacturers data.
- D. Ball mat assemblies on which data plates bearing the name of a 14 CFR 145 repair station appear. These ball mat assemblies were originally produced under Parts Manufacturing Approval (PMA). The PMA holder's data plate has been removed.
- E. End restraint fittings produced by various manufacturers, and of various designs which are not in accordance with manufacturer's data or instructions for continued airworthiness.

FAR 25.1301 (a), (c) and (d); 43.13 (a); 43.16; 121.153(a); and 45.15 (a),

### **2.11.03 RRXA RESPONSE**

- (A) EWA operates 39 DC-8 aircraft which have several different configurations of loading systems. Quality Control previously furnished the FAA with data on all of the loading systems, many of which are interchangeable. The drawings and manuals were sent to Mr. Mike Woodward on 02-10-1999, to the Western Pacific Regional Office. Please see attachment of letters for content.
- (B) To Prevent these modifications from reoccurring EWA will be extracting information from the OEM manual for specific loading system allowable repairs and interchangeability.
- (C) Without specific aircraft tail numbers we cannot furnish this data. EWA does operate some aircraft which have had modifications on the side restraint assemblies. These modifications were done with FAA DER approval on which an 8110-3 was issued.



**2.11.03 RRXA RESPONSE (continued)**

- (D) Please find attached an EWA M.A. with data to fabricate ball mat assemblies. With this approved data, EWA is authorized as FAR 121 operators to contract this work to be done without PMA authority. EWA considers this to be a no finding.
  
- (E) EWA Quality Control previously furnished data to Mr. Mike Woodward of the Western Pacific Regional Office, with interchangeability of parts. To substantiate an understandable interchangeable listing of parts, we have contracted to Mr. Bill Cotney, an FAA approved DER, and attached is a requisition for this task. This listing will be added to the EWA Aircraft Maintenance Manual.

2.11.03D

**EMERY WORLDWIDE AIRLINES  
MAINTENANCE AUTHORIZATION**

Number: AC-2526-01:03 Priority: D Author: Richard F. Morano

Title: Ballmat Manufacture

Subject: Manufacturing of a Standardized Set of Ballmats for the EWA  
Fleet, Major Modification

Equipment/Aircraft Affected: DC-8-62 & 63 fleet.

Drawing #'s Attached: Drawing #EAS2277-2550-100

Manuals Affected: N/A

Est. Man Hours: 200 hrs/Aircraft Set

**WEIGHT AND BALANCE CHANGES**

	Station	Arm	Pounds
Add	N/A	N/A	N/A
Remove	N/A	N/A	N/A
Net Gain/Loss	N/A	N/A	N/A

<p><u>Special Notes:</u></p>  <p>Reference: Manufactured/fabricated in accordance with FAR 43-13 Standard Practices. Reference FAA Form 8110-3, attached.</p>	<p style="text-align: center;"><u>Work Accomplished</u></p> <p>Aircraft: <u>N/A</u></p> <p>Date: _____</p> <p>Station: _____</p> <p>Accomp. by: _____</p>
---	---

Approved By: ~~Richard F. Morano~~

Date: 11-28-94

Approved By: ~~Richard F. Morano~~

Date: 11-28-94

FAA Acceptance: N/A

Date: N/A

**EMERY WORLDWIDE AIRLINES  
MAINTENANCE AUTHORIZATION**

Page 2 of 3  
No. AC-2526-01:03

**Kit List/Spares**

Aluminum	2024T-3	.040	4 sheets
Aluminum	2024T-3	.050	4 sheets
Aluminum channel	6061T-6	.063	200 feet
Stainless steel ramp material	304-28075/ 1 5/8 X 48"	.063	1 sheet
Rivets	MS20470A05-4		5 pounds
Rivets	MS20470A05-6		5 pounds
Cup, ballmat	46028		567 each
Ball, transfer	46859-101 (or equiv.)		528 each
Spring, heavy duty	18325C432		528 each
Retainers	44530-101		528 each
Set screws	MS18065-25		528 each
Anti skid tape	4T629		3 rolls
Side lock assy.	50568-507		3 each

Strip List

Disposition

N/A

---



---



---



---

N/A

**EMERY WORLDWIDE AIRLINES  
MAINTENANCE AUTHORIZATION**

Page 3 of 3  
No. AC-2526-01:03

**GENERAL:**

The EWA DC-8-62 & 63 fleet currently utilizes three (3) different ballmat systems, this M.A. manufactures a standardized system that will allow interchangeability between aircraft.

**Accomplishment Instructions:**

- |   |   |   |
|---|---|---|
| 1. Manufacture ballmat system per drawing # <u>EAS2277-2550-100</u> | <table border="1" style="width: 100px; height: 20px;"><tr><td style="text-align: center;">M</td></tr></table> | M |
| M   |   |   |
| 2. Inspect ballmat system for drawing conformity.                   | <table border="1" style="width: 100px; height: 20px;"><tr><td style="text-align: center;">I</td></tr></table> | I |
| I   |   |   |
| 3. Complete Work Accomplished section on page 1 of this M.A.        | <table border="1" style="width: 100px; height: 20px;"><tr><td style="text-align: center;">I</td></tr></table> | I |
| I   |   |   |

DEPARTMENT OF TRANSPORTATION  
 FEDERAL AVIATION ADMINISTRATION  
 STATEMENT OF COMPLIANCE WITH THE FEDERAL AVIATION REGULATIONS

DATE  
 12-12-92

AIRCRAFT OR AIRCRAFT COMPONENT IDENTIFICATION

MAKE DOUGLAS	MODEL NO. DC-8-60F	TYPE (Airplane, Rado, Helicopter, etc.) AIRPLANE	NAME OF APPLICANT Zantop Airlines Inc. Macon, Ga. 31297
-----------------	-----------------------	---	---

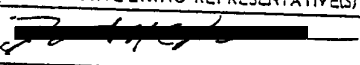
LIST OF DATA

IDENTIFICATION	TITLE
Sketch Drawing No. SK-92169 Dated 12-12-92 Sheet 1 of 1 Rev. I.R.	"EMERY WORLDWIDE DC-8 DOCUMENT HOLDER INSTALLATION VIEW" EFFECTIVE FOR DC-8 CARGO/AIRCRAFT ONLY
*****END*****	

PURPOSE OF DATA TO PROVIDE A RECORD FOR COMPLIANCE TO FAR'S

APPLICABLE REQUIREMENTS (List specific sections)  
 25.601 25.603 25.605 (a) 25.607 (b) 25.853 (a)

CERTIFICATION - Under authority vested by direction of the Administrator and in accordance with conditions and limitations of appointment under Part 183 of the Federal Aviation Regulations, data listed above and on attached sheets numbered as above have been examined in accordance with established procedures and found to comply with applicable requirements of the Federal Aviation Regulations.  
 I ~~(do)~~ Therefore  Recommend approval of these data  
 Approve these data

SIGNATURE(S) OF DESIGNATED ENGINEERING REPRESENTATIVE(S)	DESIGNATION NUMBER(S)	CLASSIFICATION(S)
David M. Chadwick 	SO-671	Structures/electrical Avionics

DEPARTMENT OF TRANSPORTATION  
 FEDERAL AVIATION ADMINISTRATION  
 STATEMENT OF COMPLIANCE WITH THE FEDERAL AVIATION REGULATIONS

DATE  
 August 6, 1993

MAKE MCDONNELL DOUGLAS	MODEL NO. DC-8-62, -63	TYPE (Airplane, Radio, Helicopter, etc.) AIRPLANE	AIRCRAFT OR AIRCRAFT COMPONENT IDENTIFICATION	NAME OF APPLICANT EMERY WORLDWIDE
------------------------------	---------------------------	--	---	--------------------------------------

IDENTIFICATION	LIST OF DATA	TITLE
MAINTENANCE AUTHORIZATION A-2526-01:02 Dated 8-5-93	BALLMAT MANUFACTURE	


(DETAIL DESIGN AND STRUCTURAL APPROVAL ONLY)

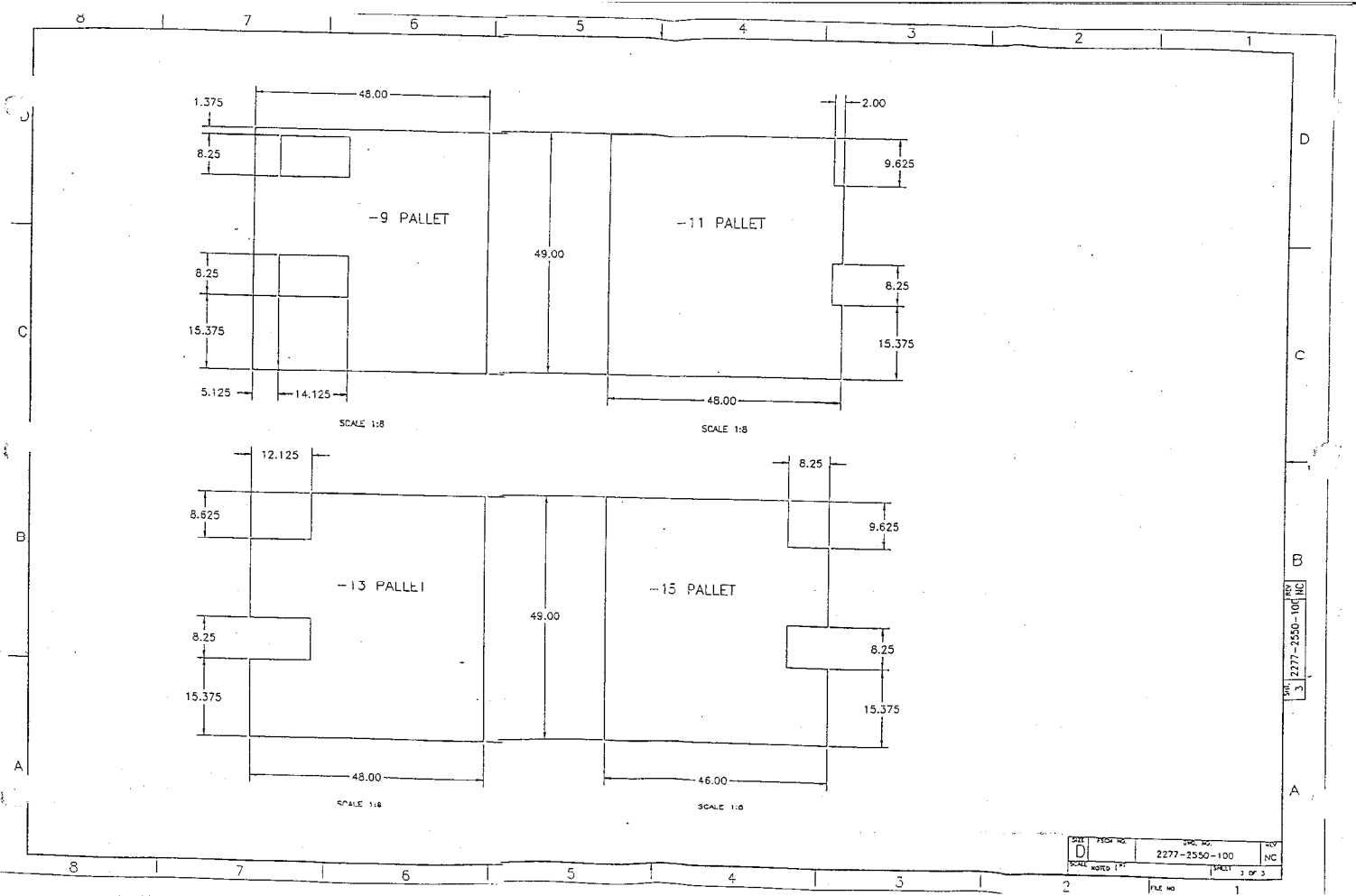
PURPOSE OF DATA  
 AIRCRAFT SUBSTANTIATE INSTALLATION OF BALLMAT IN THE DC-8-62, -63

APPLICABLE REQUIREMENTS (List specific sections)  
 CAR 4b.201, 4b.202, 4b.301, 4b.302, 4b.303, 4b.304, 4b.306

CERTIFICATION - Under authority vested by direction of the Administrator and in accordance with conditions and limitations of appointment under Part 183 of the Federal Aviation Regulations, data listed above and on attached sheets numbered \_\_\_\_\_ have been examined in accordance with established procedures and found to comply with applicable requirements of the Federal Aviation Regulations.

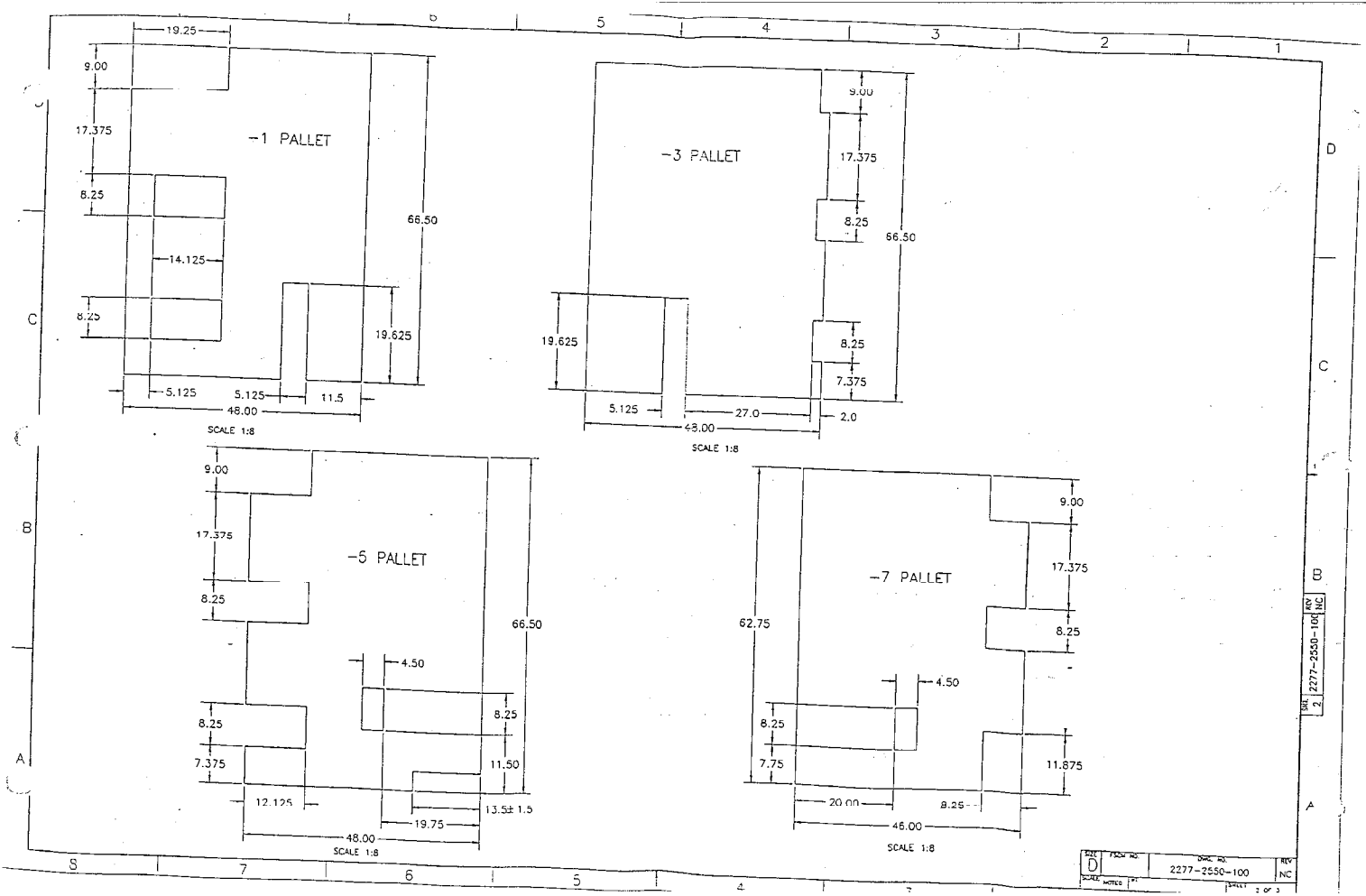
I (XX) Therefore  Recommend approval of these data  
 Approve these data

SIGNATURE(S) OF DESIGNATED ENGINEERING REPRESENTATIVE(S)	DESIGNATION NUMBERS(S)	CLASSIFICATION(S)
 Howard L. Patterson	NM-492	STRUCTURES



2277-2550-101 NC  
 3

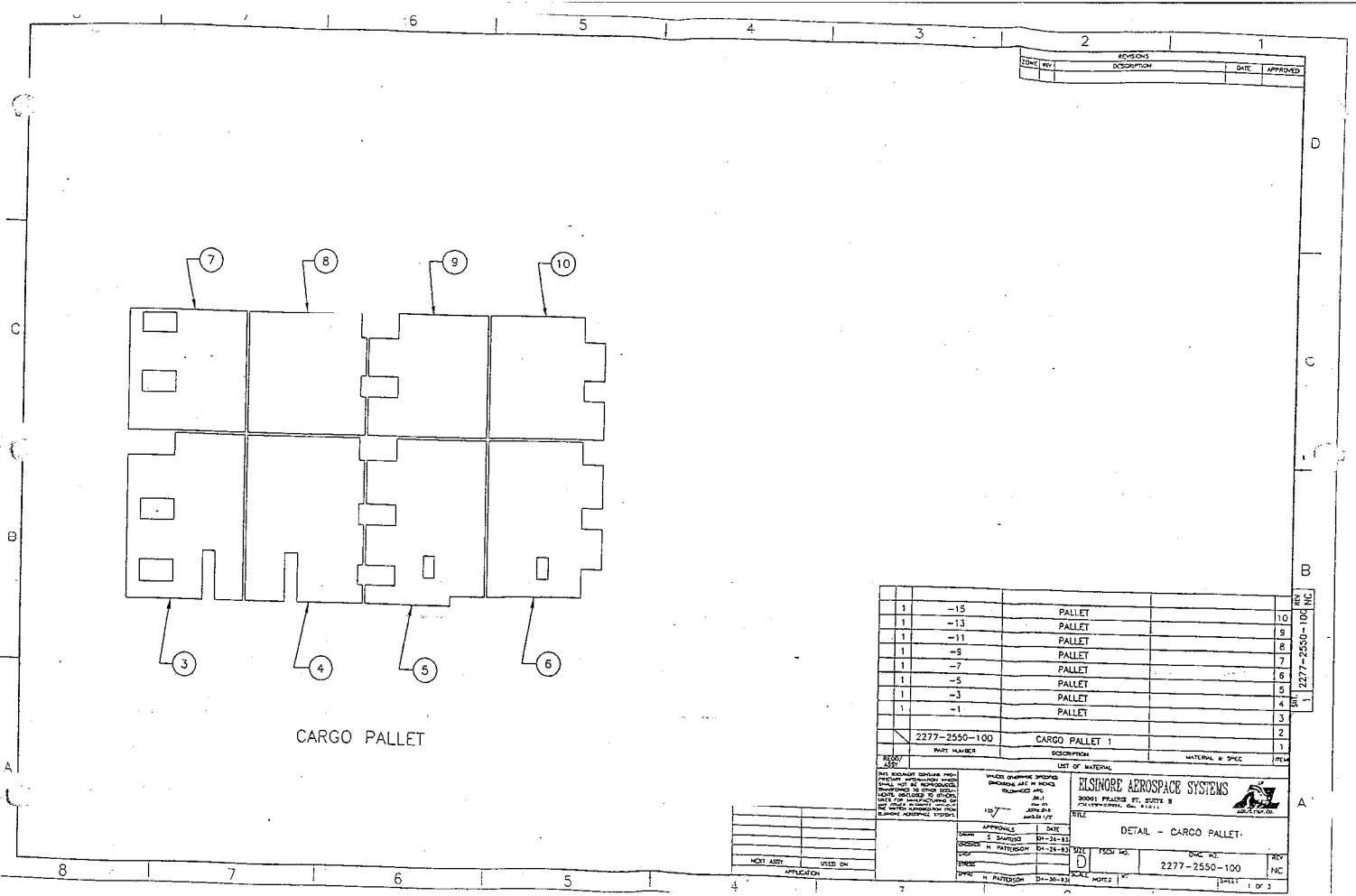
D	PROJ. NO.	2277-2550-100	REV.	NC
	SHEET NO.	1	TOTAL	3 OF 3



REV	DATE	BY	CHK
D			
PROJECT NO.	2277-2550-100	REV	NC
SCALE		DATE	2 OF 3

2277-2550-100  
 2





CARGO PALLET

REV	DESCRIPTION	DATE	APPROVED

REV	DESCRIPTION	DATE	APPROVED
1	-15		
1	-13		
1	-11		
1	-9		
1	-7		
1	-5		
1	-3		
1	-1		

2277-2550-100	CARGO PALLET 1		
REV	DESCRIPTION	MATERIAL & SPEC	REV
1			1
2			2
3			3
4			4
5			5
6			6
7			7
8			8
9			9
10			10

THIS DOCUMENT IS UNCLASSIFIED EXCEPT WHERE SHOWN OTHERWISE AND SHALL NOT BE REPRODUCED, STORED, TRANSMITTED, OR DISSEMINATED IN ANY FORM OR BY ANY MEANS, ELECTRONIC OR MECHANICAL, INCLUDING PHOTOCOPYING, RECORDING, OR BY ANY INFORMATION STORAGE AND RETRIEVAL SYSTEM, WITHOUT PERMISSION IN WRITING FROM THE DIRECTOR, AIR FORCE MATERIEL COMMAND, WRIGHT PATERSON AIR FORCE MATERIAL CENTER, WRIGHT PATERSON, OH 45433-3399.

UNCLASSIFIED  
 DATE 08-24-13 BY SP4 BTM/STP

APPROVALS: [Signature] DATE 08-24-13  
 [Signature] DATE 08-24-13  
 [Signature] DATE 08-24-13

NOT USED ON APPLICATION

**ELSNORE AEROSPACE SYSTEMS**  
 30003 PALLACE ST, SUITE B  
 FORT WORTH, TX 76116  
 TEL: 817-441-1111  
 FAX: 817-441-1112  
 WWW.ELSNORE.COM

DETAIL - CARGO PALLET  
 DRAWING NO. 2277-2550-100  
 SHEET 1 OF 3



## **RASIP FINDING**

### **2.11.04**

RRXA could not provide the RASIP Team copies of their continuous maintenance program for the cargo restraint systems installed on their DC-8 aircraft under Supplemental Type Certificates (STCs). The following information was requested of the Quality Control Department verbally and in writing:

#### **A. Parts interchange for cargo restraint system on:**

- Rosenbalm STC'ed aircraft
- Monarch STC'ed aircraft
- Douglas Factory aircraft

#### **B. Instructions for continued airworthiness for STC'ed aircraft:**

- Monarch aircraft
- Rosenbalm aircraft

#### **C. Engineering data for the modification of:**

- Roller Trays
- 9G net attach points gill liner molded parts for the class E compartment.
- Belly pit nets
- Data to show that EWA participated in the manufacture of these nets.
- Data on Gill Liner installation in the main cargo deck.
- Douglas Aircraft
- Monarch STC
- Rosenbalm STC

FAR 119.59(e); 43.16; 121.367

### **2.11.4 RRXA RESPONSE**

#### **A. PARTS INTERCHANGEABILITY FOR CARGO LOADING SYSTEM**

Quality Control previously furnished data to Mr. Mike Woodward of FAA Western Pacific Regional office. See attached letters and content.

## **2.11.04 RRXA RESPONSE (continued)**

### **B. STC'D AIRCRAFT CONTINUOUS AIRWORTHINESS**

This information is furnished in the EWA Aircraft Maintenance Manual, Chapter 3, Section IV through Section XIV. Quality Control will be adding interchangeable parts listings and more maintenance practices to the EWA Aircraft Maintenance Manual. This will also allow repairs extracted from the OEM's Manuals. The inspection for the cargo loading system is covered in EWA's C and D Maintenance checks.

Attached is the section of the EWA Aircraft Maintenance Manual for limited maintenance practices and repairs. EWA has also obtained Maintenance Manuals and IPC's from ANCRA, PEMCO, BROWNLIN. EWA will be issuing these manuals to Maintenance Stations until repair information is added to EWA Aircraft Maintenance Manual.

### **C. ROLLER TRAYS**

This data is furnished in the OEM Maintenance Manual and IPC furnished to Mr. Mike Woodward.

### **9-G NET ATTACH POINTS**

EWA is currently working on this project. Until the project is completed, Quality Control will be developing a Fleet Campaign Directive to temporarily repair the necessary items on each aircraft until we receive data from Boeing Engineering Department. See attached correspondence with the Boeing Company.

### **BELLY PIT NETS**

See Maintenance Authorization AC-2521-02.02 attached.

### **GILL LINER INSTALLATION**

- A. The liner installation was done during the original Douglas Cargo Configuration. Quality Control will request this drawing.
- B. Quality Control is trying to obtain the Monarch drawing for liner installation, STC SA 1832SO, at this time.
- C. Please see attached drawing for liner installation of Rosenbalm Cargo Door STC SA1802SO Drawing Number 22100 with ADCN's attached. Please return drawings upon completion of review.

**Wood, Thomas M**

---

**From:** Wood, Thomas M  
**Sent:** Wednesday, February 10, 1999 6:42 AM  
**To:** 'Michael K Woodward'  
**Cc:** Jones, Edward B  
**Subject:** RE: Data Request

Mr. Woodward: I am sorry to inform you of the delay of sending this requested data. Mr. Edward Jones, Manager of Quality Control is preparing it to be sent today, overnight Emery to your office. As you will see from the size of the data package requested upon receipt, it takes time to copy all this information. Please call if you have any questions. [REDACTED]  
Thomas Wood

**From:** Michael K Woodward [REDACTED]  
**Sent:** Tuesday, February 09, 1999 11:58 AM  
**To:** wood.thomas [REDACTED] Mike.Stone [REDACTED]  
**Subject:** Data Request

Mr. Wood:

If the data was sent please provide a tracking number so that we can trace it from our end.

Thanks, Mike Woodward

**Wood, Thomas M**

---

**From:** Michael K Woodward [REDACTED]  
**Sent:** Tuesday, February 09, 1999 11:39 AM  
**To:** wood.thomas [REDACTED]  
**Cc:** Mike.Stone [REDACTED]; Mike.Stone [REDACTED]  
**Subject:** Re[3]: Emery Data Request

Mr. Wood:

As of today 1430 pst, we have not received the data requested.

Please advise if the data has been sent.

Sincerely, Mike Woodward

---

Reply Separator

**Subject:** Re[2]: Emery Data Request  
**Author:** Michael K Woodward at AWP200  
**Date:** 2/4/99 2:45 PM

Mr. Wood: Please send overnight mail to:

FAA  
Western Pacific Regional Office  
AWP-230  
15000 Aviation Blvd.  
Hawthorne, CA 90261

ATTN: Mike Woodward

---

Reply Separator

**Subject:** RE: Emery Data Request  
**Author:** "Wood, Thomas M" [REDACTED]  
**Date:** 2/4/99 7:56 PM

Mr. Woodward: Thank you for assistance in this matter. Please advise me where you would like this data to be sent to.  
Thomas Wood

> -----  
> **From:** Michael K Woodward [REDACTED]  
> **Sent:** Thursday, February 04, 1999 6:15 AM  
> **To:** wood.thomas [REDACTED]

> Cc: Dave.Gilliom [redacted]; Chuck.Hicks [redacted]; Larry.G.Kephart [redacted]  
> Mike.Stone [redacted]; Dave.Gilliom [redacted]; Chuck.Hicks [redacted]  
> Larry.G.Kephart [redacted]; Mike.Stone [redacted]  
> Subject: Emery Data Request

> Mr. Thomas M. Wood  
> Director, Quality Control  
> Emery Worldwide Airlines

> Dear Mr. Wood:

> Thank you for your feedback this morning regarding your frustration  
> with the teams request for maintenance data. As I mentioned during  
> this telephone conversation, we understand that due to the perceived  
> complexity of the data request and the short amount of time that we  
> have to interface with you, that we would be glad to put the request  
> in writing to you via E-mail.

> Please provide the following Data to me by Monday February 8th, 1999:

- > 1. Damage Limits and repair procedures on Rollers and Trays for:
  - > A. Douglas Freighter Aircraft (Out of Douglas Manuals).
  - > B. Rosenbalm STC'd Aircraft (From the applicable maintenance  
> manuals).
  - > C. Monarch STC'd Aircraft (From the applicable maintenance  
> manuals).
- > 2. Main Cargo Deck Configuration and part numbers for:
  - > A. Douglas Freighters (Douglas IPC)
  - > B. Rosenbalm STC'd aircraft (Rosenbalm IPC)
  - > C. Monarch STC'd aircraft (Monarch IPC)
- > 3. An interchange listing (from the IPC's requested above) Cargo  
> locks (Bear Traps) for:
  - > A. Douglas Freighters
  - > B. Rosenbalm STC'd Acft.
  - > C. Monarch STC'd Acft.

> I would like to again thank you and your management team for your  
> support during this very brief focused RASIP inspection.

> Best regards, Mike Woodward  
> AWP-230  
> Western Pacific Region

**Wood, Thomas M**

---

**From:** Wood, Thomas M  
**Sent:** Thursday, February 04, 1999 11:56 AM  
**To:** 'Michael K Woodward'  
**Subject:** RE: Emery Data Request

Mr. Woodward: Thank you for assistance in this matter. Please advise me where you would like this data to be sent to.  
Thomas Wood

**From:** Michael K Woodward [REDACTED]  
**Sent:** Thursday, February 04, 1999 6:15 AM  
**To:** wood.thomas [REDACTED]  
**Cc:** Dave.Gilliom [REDACTED]; Chuck.Hicks [REDACTED]; Larry.G.Kephart [REDACTED];  
Chuck.Hicks [REDACTED]; Larry.G.Kephart [REDACTED]; Mike.Stone [REDACTED]  
**Subject:** Emery Data Request

Mr. Thomas M. Wood  
Director, Quality Control  
Emery Worldwide Airlines

Dear Mr. Wood:

Thank you for your feedback this morning regarding your frustration with the teams request for maintenance data. As I mentioned during this telephone conversation, we understand that due to the perceived complexity of the data request and the short amount of time that we have to interface with you, that we would be glad to put the request in writing to you via E-mail.

Please provide the following Data to me by Monday February 8th, 1999:

1. Damage Limits and repair procedures on Rollers and Trays for:
  - A. Douglas Freighter Aircraft (Out of Douglas Manuals).
  - B. Rosenbalm STC'd Aircraft (From the applicable maintenance manuals).
  - C. Monarch STC'd Aircraft (From the applicable maintenance manuals).
2. Main Cargo Deck Configuration and part numbers for:
  - A. Douglas Freighters (Douglas IPC)
  - B. Rosenbalm STC'd aircraft (Rosenbalm IPC)
  - C. Monarch STC'd aircraft (Monarch IPC)
3. An interchange listing (from the IPC's requested above) Cargo



locks (Bear Traps) for:  
A. Douglas Freighters  
B. Rosenbalm STC'd Act.  
C. Monarch STC'd Act.

I would like to again thank you and your management team for your support during this very brief focused RASIP inspection.

Best regards, Mike Woodward  
AWP-230  
Western Pacific Region



A

10/5

February 10, 1999

Mr. Mike Woodward  
FAA  
Western Pacific Regional Office  
AWP-230  
15000 Aviation Blvd.  
Hawthorne, CA 90261

Dear Mr. Woodward:

As requested Emery Worldwide Airlines is forwarding to your office the following documents:

The Pemco and Ancra Maintenance and IPC Manuals.

Excerpts from the DAC Maintenance Practices and Overhaul Manuals.

Note: The above Manuals will contain any Damage limits , Repair procedures, and Part Numbers,

Additionally please find enclosed cargo loading system installation documents for the STC aircraft and associated STC information.

Please note that the Rosenbalm STC itself has not been included as the loading system installed by the STC is an option, EWA's current aircraft configuration is either STC SA794SO or SA1377SO as applicable.

EWA will forward to your office no later than Friday, February 12, the interchangeability information and applicable installation drawings per your request. These items were sent out to be copied.

Sincerely,

Thomas M. Wood  
Director Quality Control

TMW/re

Attachments

CONTENTS SENT

- I. 1/2" Black Binder:      Cargo Loading Installation  
Support Documentation  
Rosenbalm N105WP  
Rosenbalm N796AL  
Rosenbalm N797AL  
Rosenbalm N811AL  
Monarch N950R  
Monarch N951R  
Monarch N964R  
Rosenbalm N990CF  
Rosenbalm N993CF  
Rosenbalm N994CF  
Rosenbalm N995CF
- II. 1" Black Binder:      STC SA1088SO  
STC SA79480  
STC SA1377SO
- III. 3" Black Binder:      Ancra P/N 80080-11  
Douglas Installation  
Pemco P/N 50045-523  
Pemco P/N 50045-505-1  
Pemco P/N 50045-505-3

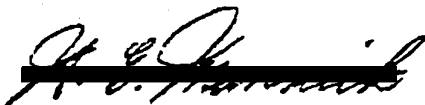
PAGE: B-1  
MODEL: DC-8  
REPORT: PEM-12

PRODUCTION APPROVAL LISTING - SUPPLEMENT NO. 1

FEDERAL AVIATION ADMINISTRATION - PARTS MANUFACTURER APPROVAL

Pemco Engineers, Inc.

<u>Part Name and Number</u>	<u>Design Data and Approval Means</u>	<u>Eligible for Installation on</u>
		Limited to McDonnell Douglas DC8 cargo restraint system for which the correspond- ing McDonnell Douglas DC-8 parts have been approved
Fitting Assembly - End Restraint Pemco P/N 50044	FAA sealed Pemco Drawing 50044	Douglas P/N 3889344
Fitting Assembly - Pallet Restraint Pemco P/N 50604	FAA sealed Pemco Drawing 50604	Douglas P/N 5754604
Rail Assembly - Side Pemco P/N 50781	FAA sealed Pemco Drawing 50781	Douglas P/N 5895751
Cross Track - Screw Lock Pemco P/N 50362	FAA sealed Pemco Drawing 50362	Douglas P/N 5889362



H. E. MANNICK  
Chief, Manufacturing Inspection Branch

September 12, 1975

## **2.11.04 RRXA RESPONSE (continued)**

### **B. STC'D AIRCRAFT CONTINUOUS AIRWORTHINESS**

This information is furnished in the EWA Aircraft Maintenance Manual, Chapter 3, Section IV through Section XIV. Quality Control will be adding interchangeable parts listings and more maintenance practices to the EWA Aircraft Maintenance Manual. This will also allow repairs extracted from the OEM's Manuals. The inspection for the cargo loading system is covered in EWA's C and D Maintenance checks.

Attached is the section of the EWA Aircraft Maintenance Manual for limited maintenance practices and repairs. EWA has also obtained Maintenance Manuals and IPC's from ANCRA, PEMCO, BROWNLIN. EWA will be issuing these manuals to Maintenance Stations until repair information is added to EWA Aircraft Maintenance Manual.

### **C. ROLLER TRAYS**

This data is furnished in the OEM Maintenance Manual and IPC furnished to Mr. Mike Woodward.

#### **9-G NET ATTACH POINTS**

EWA is currently working on this project. Until the project is completed, Quality Control will be developing a Fleet Campaign Directive to temporarily repair the necessary items on each aircraft until we receive data from Boeing Engineering Department. See attached correspondence with the Boeing Company.

#### **BELLY PIT NETS**

See Maintenance Authorization AC-2521-02.02 attached.

#### **GILL LINER INSTALLATION**

- A. The liner installation was done during the original Douglas Cargo Configuration. Quality Control will request this drawing.
- B. Quality Control is trying to obtain the Monarch drawing for liner installation, STC SA 1832SO, at this time.
- C. Please see attached drawing for liner installation of Rosenbalm Cargo Door STC SA1802SO Drawing Number 22100 with ADCN's attached. Please return drawings upon completion of review.



A

100

February 10, 1999

Mr. Mike Woodward  
FAA  
Western Pacific Regional Office  
AWP-230  
15000 Aviation Blvd.  
Hawthorne, CA 90261

Dear Mr. Woodward:

As requested Emery Worldwide Airlines is forwarding to your office the following documents:

The Pemco and Ancra Maintenance and IPC Manuals.

Excerpts from the DAC Maintenance Practices and Overhaul Manuals.

Note: The above Manuals will contain any Damage limits , Repair procedures, and Part Numbers.

Additionally please find enclosed cargo loading system installation documents for the STC aircraft and associated STC information.

Please note that the Rosenbalm STC itself has not been included as the loading system installed by the STC is an option, EWA's current aircraft configuration is either STC SA794SO or SA1377SO as applicable.

EWA will forward to your office no later than Friday, February 12, the interchangeability information and applicable installation drawings per your request. These items were sent out to be copied.

Sincerely,

A handwritten signature in black ink, which appears to be "Thomas M. Wood". The signature is written over a horizontal line.

Thomas M. Wood  
Director Quality Control

TMW/re

Attachments

CONTENTS SENT

I. 1/2" Black Binder:

Cargo Loading Installation  
Support Documentation  
Rosenbalm N105WP  
Rosenbalm N796AL  
Rosenbalm N797AL  
Rosenbalm N811AL  
Monarch N950R  
Monarch N951R  
Monarch N964R  
Rosenbalm N990CF  
Rosenbalm N993CF  
Rosenbalm N994CF  
Rosenbalm N995CF

II. 1" Black Binder:

STC SA1088SO  
STC SA79480  
STC SA1377SO

III. 3" Black Binder:

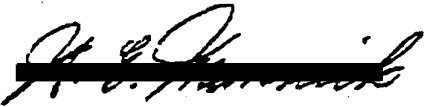
Ancra P/N 80080-11  
Douglas Installation  
Pemco P/N 50045-523  
Pemco P/N 50045-505-1  
Pemco P/N 50045-505-3

PAGE: B-1  
MODEL: DC-8  
REPORT: PEM-12

PRODUCTION APPROVAL LISTING - SUPPLEMENT NO. 1  
FEDERAL AVIATION ADMINISTRATION - PARTS MANUFACTURER APPROVAL

Pemco Engineers, Inc.

<u>Part Name and Number</u>	<u>Design Data and Approval Means</u>	<u>Eligible for Installation on</u>
Fitting Assembly - End Restraint Pemco P/N 50044	FAA sealed Pemco Drawing 50044	Limited to McDonnell Douglas DC8 cargo restraint system for which the correspond- ing McDonnell Douglas DC-8 parts have been approved  Douglas P/N 3889344
Fitting Assembly - Pallet Restraint Pemco P/N 50604	FAA sealed Pemco Drawing 50604	Douglas P/N 5754604
Rail Assembly - Side Pemco P/N 50781	FAA sealed Pemco Drawing 50781	Douglas P/N 5895751
Gross Track - Screw Lock Pemco P/N 50362	FAA sealed Pemco Drawing 50362	Douglas P/N 5889362



H. E. MANNICK  
Chief, Manufacturing Inspection Branch

September 12, 1975





A

February 15, 1999

Mr. Mike Woodward  
FAA  
Western Pacific Regional Office  
AWP-230  
15000 Aviation Blvd.  
Hawthorne, CA 90261

Dear Mr. Woodward:

This letter is a follow-up to my February 10, 1999 letter to which I sent you documents per your request.

This data book contains the remaining documents you requested.

Sincerely,

A handwritten signature in cursive script that reads "Thomas M. Wood". A thick black horizontal line is drawn across the signature.

Thomas M. Wood  
Director Quality Control

TMW/re

Attachments

## TABLE OF CONTENTS

### SECTION 1

- (A) Correspondence from Boeing Aircraft Engineers in reference to questions asked during FAA RASIP Inspection concerning structural integrity of Cargo Loading System and Load Placement on floors.
- (B) Correspondence from Boeing Aircraft in reference to 9-G Net Attach Fitting Covers.

### SECTION 2

DC-8 STC SA1327NM

- (A) Copy of PMA
- (B) Copy of STC
- (C) Copy of Index List PDC-8
- (D) Copy of Master Drawing List Rev. P

### SECTION 3

Pemco Engineers PMA Approval List

### SECTION 4

DC-8 Cargo Loading System Component Cross Reference List

### SECTION 5

Aeronautical Engineers, Inc. Drawing Number AE464B IPC

### SECTION 6

Supplemental Type Certificate Approval and Approved Drawing List for STC SA1377SO (Aeronautical Engineers, Inc.)

### SECTION 7

Aeronautical Engineers, Inc. Report No. R-404-61 Drawing List, Cargo Configuration DC-8 - 60 and 70 Series

## **SECTION 8**

Aeronautical Engineers, Inc. Drawing AE464B Report No. 667 IPC List Ballmat & Side Restraint with Rollers for DC-8 60 Series Aircraft

## **SECTION 9**

Aeronautical Engineers, Inc. DC-8 Cargo Conversion Maintenance Manual for  
STC SA1377SO

## **SECTION 10**

### Drawings

- (A) 87303 1 of 4 thru 4 of 4 Guide Rail Assy & Instl -Cargo Conversion
- (B) K-25-5004 1 of 2 thru 2 of 2 Monarch Drawing for DC-8 Roller System Installation
- (C) 50045 9 of 11 DC-8 73 Cargo System Rev. Dates 1-6-96 & 2-6-97
- (D) 50045 10 of 11 DC-8 73 Cargo System Rev. Dates 9-18-96, 11-1-96, 1-6-97 & 1-22-97
- (E) 50045 6 of 7 Heavy Duty Universal Cargo System Installation, DC-8 Rev. Date 7-18-90
- (F) 50045 6 of 6 Heavy Duty Universal Cargo System Installation, DC-8 Rev. Date 7-18-90
- (G) 50045 8 of 8 DC-8 Cargo System Rev. Date 4-24-95 & 7-26-95

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

**TABLE OF CONTENTS**

**CHAPTER 3 -- CARGO LOAD RESTRAINT SYSTEM MAINTENANCE AND  
TRANSPORTATION PROCEDURE**

<u>Section</u>	<u>Subject</u>	<u>Page</u>
I.	<b>CARGO LOAD RESTRAINT SYSTEM MAINTENANCE .....</b>	<b>1</b>
	A. Introduction .....	1
	B. Maintenance .....	1
	C. Pallet Lock Limitations and Procedures .....	1
II.	<b>CARRIAGE OF PERSONS .....</b>	<b>7</b>
	A. General .....	7
	B. Authorized Persons .....	7
	C. Exempted Requirements .....	8
	D. Captains Responsibilities .....	10
III.	<b>LIVESTOCK TRANSPORTATION PROCEDURES .....</b>	<b>11</b>
	A. Introduction .....	11
	B. Cleaning Aircraft .....	12
	C. Disinfecting Aircraft .....	12
	D. Horse Charters .....	12
	E. Compliance .....	12
IV.	<b>DC-8 MONARCH CARGO DOOR .....</b>	<b>13</b>
	A. Introduction .....	13
	B. Hydraulic System General .....	13
	C. Hydraulic System Operation .....	14
	D. Electrical System General .....	15
	E. Operation .....	16
	F. Manual Operation .....	16
	G. Emergency Opening Due Hydraulic Line Rupture .....	18
	H. Cargo Door Troubleshooting .....	19
	I. Cargo Door Adjustment .....	21
	J. Latch Position Indicator Micro switch .....	22
	K. Door Down & Closed Micro switch .....	22
	L. Up Limit Micro Switch .....	23
	M. Latch Pin Micro Switch .....	23
	N. Latch .....	24
	O. Latch Actuating Shafts Rigging Procedures .....	24
	P. Cargo Door Rigging Procedures .....	25

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## TABLE OF CONTENTS - Continued

<u>Section</u>	<u>Subject</u>	<u>Page</u>
XII.	DC-8 ROSENBALM CARGO DOOR HYDRAULIC SCHEMATICS .....	82
XIII.	DC-8 ROSENBALM CARGO DOOR WIRING DIAGRAM .....	84
XIV.	DC-8 ROSENBALM CARGO DOOR INTERIM REPAIR.....	85
	A. General .....	85
	B. Policy .....	85
	C. Procedure .....	85
XV.	B-727 AERONAUTICAL ENGINEERS INC. CARGO DOOR.....	87
	A. Introduction .....	87
	B. Hydraulic System General.....	87
	C. Hydraulic System Operation.....	88
	D. Electrical System General.....	89
	E. Operation .....	90
	F. Manual Operation .....	91
	G. Emergency Opening of the Cargo Door .....	91
	H. Adjustments and Testing Procedures.....	92
XVI.	B-727 AERONAUTICAL ENGINEERS INC. CARGO DOOR COMPONENT REMOVAL AND INSTALLATION .....	100
	A. Main Cargo Door.....	100
	B. Main Cargo Door Actuator .....	101
	C. Main Cargo Door Link Assemblies .....	102
	D. Main Cargo Door, Door Up Micro Switch .....	103
	E. Main Cargo Door Vent Door.....	104
	F. Main Cargo Door Vent Door Interlock System.....	106
	G. Main Cargo Door, Door Closed Micro Switch .....	106
	H. Main Cargo Door Torque Tube .....	107
	I. Main Cargo Door Latch Actuator.....	109
	J. Main Cargo Door "Gang Bar" Actuator.....	109
	K. Main Cargo Door "Gang Bar" .....	110
	L. Main Cargo Door Lock Pin .....	111
	M. Main Cargo Door Latch Assemblies .....	112
	N. Main Cargo Door Latch Position Micro Switch .....	112
	O. Main Cargo Door Latch Pin Micro Switch.....	113
XVII.	B-727 AERONAUTICAL ENGINEERS INC. CARGO DOOR WIRING DIAGRAMS .....	114
	Cargo Door Wiring Diagram.....	114
	Wiring Diagram For Cargo Door Flood Light.....	115
	Wire Routing For The Cargo Door .....	116
XVIII.	B-727 AERONAUTICAL ENGINEERS INC. CARGO DOOR ILLUSTRATED PARTS CATALOG .....	117
	Cargo Door Hinge Assembly.....	117
	Main Actuator Door Links.....	118
	Main Cylinder Assembly .....	119

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## CARGO LOAD RESTRAINT SYSTEM MAINTENANCE AND TRANSPORTATION PROCEDURE

### I. CARGO LOAD RESTRAINT SYSTEM MAINTENANCE

#### A. Introduction

1. This section will contain cargo load restraint requirements for all aircraft utilizing rollerized cargo handling systems.
2. Cargo Restraint involves the prevention of movement in five principal directions: Forward, Aft, Upward (vertical), Left (side), and Right (side). These movements are the result of forces exerted upon the cargo due to acceleration or deceleration of the airplane in take-offs and landings as well as forces due to air turbulence in flight. Such forces are commonly expressed in terms of gravitational units (G's). Correct restraint provides the proper relationship between the weight of the cargo and restraint required in G's. Restraint is required for flight and taxi loads and for crash loads.

#### B. Maintenance

The Cargo System Maintenance Program is to include:

1. Inspection during scheduled checks.

#### C. Pallet Lock Limitations and Procedures

1. It is permissible for some pallet locks to be missing or inoperative along each lateral edge (fwd. & aft edges) provided:
  - a. One lock per position may be broken or missing without any load limitations to that position.
  - b. **AT NO TIME WILL IT BE PERMISSIBLE TO HAVE MORE THAN ONE LOCK PER POSITION MISSING OR BROKEN.**
2. Side restraint rails or rail assemblies are required to be installed, if a rail or rail assembly is unserviceable the position is to be blocked and NOT loaded. The affected rail/position is to be placed on the NON-MEL list and Maintenance Control notified. Maintenance Control is to notify Operations of the blocked position.
3. A good pallet lock may be shifted to a position where more than one lock is broken or missing in order to carry maximum loads in all positions.

Make an entry in the Log Book giving location of broken or missing lock and place item on Non-MEL deferred list by calling Maintenance Control and following applicable procedures in MPP Manual Chapter 3.

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## DC-8F-54 BROKEN OR MISSING PALLET LOCK LOCATIONS

**Note:**

- a. Only one lock per position may be broken or missing
- b. All side restraint rails or rail assemblies are required.

3759566-503  
End Restraint Fitting  
(Rigid)  
A1 thru A5

38893344-501  
End Restraint Fitting

B6 thru B10  
C11 thru C15

3889344-1  
End Restraint Fitting

D16 thru D20  
E21 thru E25  
F26 thru F30  
G31 thru G35  
H36 thru H40  
I41 thru I45  
J46 thru J50  
K51 thru K55  
L56 thru L60  
M61 thru M65

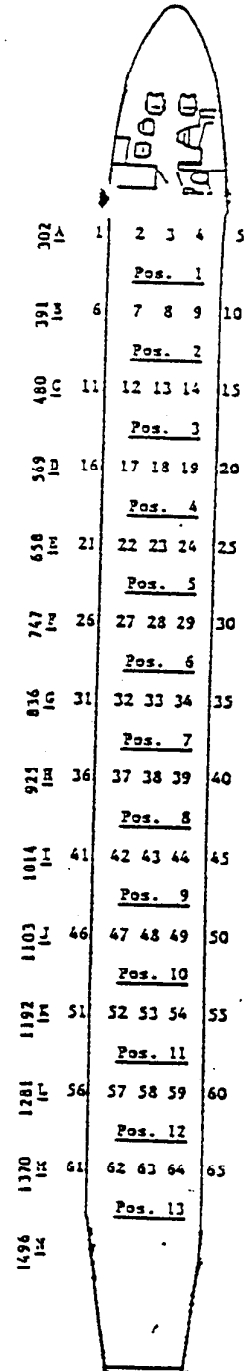


Figure 1

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## DC-8-63/71/73 BROKEN OR MISSING PALLET LOCK LOCATIONS

**Note:**

- a. Only one lock per position may be broken or missing
- b. All side restraint rails or rail assemblies are required

3759566-503  
End Restraint Fitting  
(Rigid)

A1 thru A5

38893344-501  
End Restraint Fitting

B6 thru B10  
C11 thru C15

3889344-1  
End Restraint Fitting

D16 thru D20  
E21 thru E25  
F26 thru F30  
G31 thru G35  
H36 thru H40  
I41 thru I45  
J46 thru J50  
K51 thru K55  
L56 thru L60  
M61 thru M65  
N66 thru N70  
O71 thru O75  
P76 thru P80  
Q81 thru Q85  
R86 thru R90

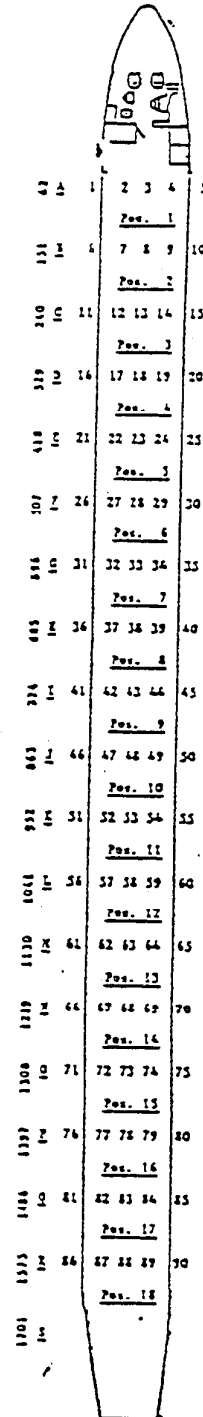


Figure 3



# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## II. CARRIAGE OF PERSONS

### A. General

Carriage of persons on Emery Worldwide Airlines aircraft without compliance with certain passenger carrying requirements of FAR 121, as authorized by FAR 121.583, is permissible as outlined herein.

**Note:** No special flight permit is required for flights under this Section.

### B. Authorized Persons

When authorized by the Captain of a flight, the following persons, but no others, may be carried aboard in airplane without complying with the passenger carrying airplane requirements listed in FAR 121.309F, 121.310, 121.571 and 121.587; the passenger carrying operation requirements in 121.291; and the requirements pertaining to passengers in 121.285, 121.313(f), 121.317, 121.547 and 121.573.

1. A crew member.
2. A company employee.
3. An FAA air carrier inspector, or an authorized representative of the NTSB, who is performing official duties.
4. A person necessary for:
  - a. The safety of the flight;
  - b. The safe handling of animals;
  - c. The safe handling of radioactive materials (within the meaning of Part 175 of this chapter);
  - d. The security of valuable or confidential cargo;
  - e. The preservation of fragile or perishable cargo;
  - f. Experiments on, or testing of cargo containers or cargo handling devices;
  - g. The operation of special equipment for loading or unloading cargo;
  - h. The loading or unloading of out-sized cargo.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- c. 121.391.  
Flight attendants.
  - d. 121.571.  
Briefing of passengers before takeoff.  
  
Oral notification of smoking, location of emergency equipment, use of seat belts, in-flight notifications.
  - e. 121.587.  
Ability to close and lock the flight crew compartment door.
2. Passenger-carrying operation requirements not required.
- 121.291.  
  
Demonstration of emergency evacuation procedures. (Evacuation demonstration that is done to certify aircraft for a certain number of passengers.)
3. Requirements pertaining to passengers not required to be adhered to.
- a. 121.285.
    - (1) Carriage of cargo in passenger compartments.
    - (2) Cargo may be carried in passenger compartments.
  - b. 121.313(f).  
  
A door between the passenger and pilot compartments, with a locking means to prevent passengers from opening it without the pilots' permission.
  - c. 121.317.  
  
Passenger information.  
  
Passenger cabin notification signs; smoking and seat belt information.
  - d. 121.547.  
  
Admission to flight deck rules do not apply when operating under 121.583, but do apply at all other times.

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## III. LIVESTOCK TRANSPORTATION PROCEDURES

### A. Introduction

The transportation of livestock by air has increased by large proportions in recent years and with this increase, created special problems that must be coped with.

1. The carriage of baby chicks, small animals, etc. creates no special problems other than efforts to control odors and disinfection of aircraft as required. Since the shipping containers are usually small and made with solid or semi-solid bottoms, contamination of the aircraft seldom, if ever, occurs.
2. The carriage of large animals, horses, cattle and other livestock, is a different matter. Every effort must be made to assure that all pens, crates and containers used be constructed so that plastic sheet, waterproof paper and loose absorbent material may be used that will retain all liquids and refuse without allowing this material to contaminate the aircraft. Since most large animal shipments will be charter work, the Flight Crew and in some cases, cargo handling personnel, will primarily be responsible to see that proper materials are used and that after animals are unloaded that this material is removed promptly and completely.
3. Since there is always the possibility that the absorptive materials used will not completely retain all liquids and refuse, EMERY WORLDWIDE AIRLINES must be prepared to clean the aircraft thoroughly and treat all contaminated areas promptly to prevent corrosion problems and disinfect the aircraft to kill odors and prevent spread of germs and disease.
4. The Maintenance Department will be responsible for checking the aircraft if unloaded at a Station where Maintenance Personnel are stationed or checking the aircraft when it returns to such Station from a charter flight to ensure that:
  - a. The aircraft was cleaned thoroughly.
  - b. The aircraft was treated properly if contaminated.
  - c. The aircraft was disinfected properly.

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## IV. DC-8 MONARCH CARGO DOOR

### A. Introduction

1. A main compartment door is installed in the left side of the fuselage with the forward edge of the door located at approximately fuselage station 170 on DC-8-63 aircraft. The fuselage station will vary on different series DC-8 type aircraft. The door is operated hydraulically and electrically by a system of valves, needle valves, check valves, restrictors, switches, relays, micro switches, and circuit breakers.
2. The hydraulic system for the cargo door is a separate system from the airplane main hydraulic system. The door hydraulic system uses MIL-H-5606 hydraulic fluid only and has an operating pressure of approximately 2,900 psi.
3. This Maintenance Manual includes the Illustrated Parts Catalog and Wiring Diagrams for the Monarch Aviation, Inc. Forward Cargo Door, Supplemental Type Certificate Number SA 1832S0.

### B. Hydraulic System General

1. The hydraulic system for the main cargo door is an independent hydraulic system using MIL-H-5606 hydraulic fluid. A hydraulic tank, an electrically operated hydraulic pump, selector valve, hand operated hydraulic pump and two hydraulic filters are mounted on a hydraulic panel located on the forward side of main cargo bulkhead.
2. A lock valve and three sequence valves direct hydraulic fluid to various hydraulic actuators. These are located on the cargo door.
3. Stainless steel tubing is used to route the hydraulic fluid to the various components on the hydraulic panel. These lines are routed overhead to the various components on the door.
4. A sight gage is mounted on the hydraulic tank to indicate fluid level.
5. The electrically operated selector valve may be positioned manually when using the hand pump.
6. The hydraulic system is protected from over pressure by a relief valve located on the hydraulic panel. It is adjusted to relieve at 3200 PSI  $\pm$  50 PSI.
7. There are two check valves located on the hydraulic panel. They protect the electric pump and the manual pump from back pressure.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

- d. The sequence valve opens and supplies pressure to the close side of the latch cylinder. The latch cylinder rotates the torque tube and closes the latches.
- e. A cam rotates with the torque tube. This frees the arm so the springs push the slide bar aft which engages the latch pins in the latches.
- f. A cam actuates a micro switch which cuts the electrical pump off as the springs move the slide bar aft.
- g. As the door closes a cam on the lower door jam actuates a micro switch which extinguishes the door warning light on the electrical control panel.
- h. When the slide bar moves aft, the arm actuates a micro switch which extinguishes the latch light on the electrical control panel.
- i. When the latch pins engage the latches, the center latch pin actuates a micro switch which extinguishes the lock pin light.
- j. The door is now down and locked. A visual indicator is located on the forward lower edge of the door. The indicator is visible from the outside of the aircraft.

### D. Electrical System General

- 1. The cargo door relay box and the cargo door control panel are mounted on the forward side of the forward bulkhead to the left of the hydraulic panel.
- 2. The electrically operated hydraulic pump operates on 115 VAC, 3 phase, 400 cycles. The control relay for the hydraulic pump is controlled by 115 VAC taken from phase C of the AC power at the control relay.
- 3. All other relays and indicator lights in the door system are operated by 28 VDC.
- 4. The landing gear safety switch provides a ground for the ground safety relay in the relay box while the aircraft is on the ground. The ground safety relay is energized for main cargo door operation when electrical power is available. In flight the landing gear safety switch is open and the ground safety relay remains de-energized.
- 5. The pressurization relay in the control box prevents pressurization of the aircraft when the door is not properly locked and the door switch, latch switch or latch lock pin switch is not actuated.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

### 2. Door Open Instructions:

**CAUTION: DO NOT OPEN DOOR IF ACTUAL OR ANTICIPATED WIND WILL EXCEED 45 KNOTS. CLEAR THE DOOR AREA PRIOR TO DOOR OPENING.**

- a. Remove the cover from the hydraulic control panel.
- b. Insert the handle into the hydraulic hand pump and turn handle. This locks the handle into the pump.
- c. Move the selector valve to the open position.
- d. Operate the hand pump until the door is raised to the desired opening. Do not raise the door to high. The door up limit located on the forward door actuating cylinder could be damaged.
- e. With electrical power off the door warning light, the latch light and the lock pin light will not be illuminated.
- f. The hydraulic pressure will be zero and the door will be held in the desired position by a lock valve in the hydraulic system.
- g. Restore the hydraulic pump handle in the clips located in the hydraulic control panel.
- h. Reinstall the cover removed in Step a.

### 3. Door Close Instructions:

**CAUTION: CLEAR THE DOOR AREA PRIOR TO DOOR CLOSING. REMOVE THE SILL PROTECTOR IF INSTALLED.**

- a. Remove the cover from the hydraulic control panel.
- b. Insert the handle into the hydraulic hand pump and turn handle. This locks the handle into the pump.
- c. Move the selector valve to the close position.
- d. Operate the hand pump until the door is down and locked. A visual indicator is located on the forward lower edge of the door. The indicator is visible from the outside of the aircraft.
- e. Visually check to see that the door is in closed position. Inspect from inside the cargo door for pin engagement or through the visual indicator on the outside of door to verify indicator indicates locked.

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## H. Cargo Door Troubleshooting

**Note:** The four restraints positioned by the door are equipped with protruding latches to hold pallets in locked position. If the restraints are not positioned correctly, these protruding latches will interfere with the door latching. Before changing any adjustment to door locking or warning mechanism, check the pallet restraint system for proper positioning.

**1. With electrical power on the airplane, all applicable circuit breakers closed, the cargo door pins do not disengage.**

<u>Possible Cause</u>	<u>Isolation Procedure</u>	<u>Correction</u>
a. Low Hydraulic Pressure	Check fluid level in reservoir	Fill if required
	Check pump output	Replace if defective
	Check relief valve Check needle valve	Replace if defective Adjust
b. Obstruction	Insure all pins and gang bar are free damaged pins	Remove obstruction or replace
c. Leaking Latch pin cylinder	Check for internal leakage	Replace if defective

**2. With electrical power on the airplane, all applicable circuit breakers closed, pins disengaged, the latches do not operate.**

<u>Possible Cause</u>	<u>Isolation Procedure</u>	<u>Correction</u>
a. Obstruction	Check for full retraction of pins	Remove obstruction or replace damaged pin(s)
b. Leaking Latch cylinder	Check for internal leakage	Replace if defective

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## I. Cargo Door Adjustment

**CAUTION: ALL CARGO DOOR ADJUSTMENTS MUST BE MADE WITH THE HAND PUMP ONLY**

1. Open Mode
  - a. For pressure control, refer to pressure Gauge, installed on Hydraulic panel.
  - b. Release pressure Pilot Adjustment on lock pin holding valve.
  - c. Select door open at Selector Valve.
  - d. Using HAND PUMP start, open cycle, adjust lock pin and holding valve to 250 +25 PSI.
  - e. Check Latch Actuator for movement, if any, adjust or replace Latch Actuator Relief Valve.
  - f. Adjust Latch Actuator Relief Valve to 1400 PSI.
  - g. Check for door up movement if any, adjust or replace door relief Valve.
  - h. With Latches open, door should start up approximately 1800 PSI, if not adjust door up relief valve to 1800 PSI.
  - i. Bring door approximately full up position, door up limit micro switch should make contact.
  - j. Select door down position on selector valve.
  - k. Door should stay in position, if not bring door to full down position and replace door holding valve, repeat steps b, c, d.
2. Close Mode
  - a. Install pressure gauge at hydraulic control panel by capping Tee fitting at selector valve "P" port.
  - b. Release pressure pilot adjustment on cargo door holding valve.
  - c. Select door close at selector valve.
  - d. Pump door down. Adjust door holding valve to where it takes 50 PSI to bring door down.



## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

2. Test
  - a. Remove electrical power from circuit. Disconnect wiring from the micro switch and check for continuity with an ohmmeter.
  - b. Bring door down to a full closed position until micro switch is actuated by the block installed on lower jamb.

**Note 1** Inspect block for wear, if necessary shim as required.

**Note 2** Red light in Flight Engineer Panel & Cargo Door Control Box will remain "ON" until full operation is completed.

### L. Up Limit Micro Switch

1. Adjustment
  - a. Open Cargo Door to desired height.
  - b. Install and set micro switch to this position so that there is a 1/32" measurement from the ring at the base of the plunger and the shoulder of the plunger when the lifting cylinder touch the micro switch.
2. Test
  - a. Remove electrical power from circuit. Disconnect wiring from the micro switch and check for continuity with an ohmmeter.
  - b. Open Cargo Door—Hydraulic Motor should shut off when door lifting cylinder reach the micro switch.

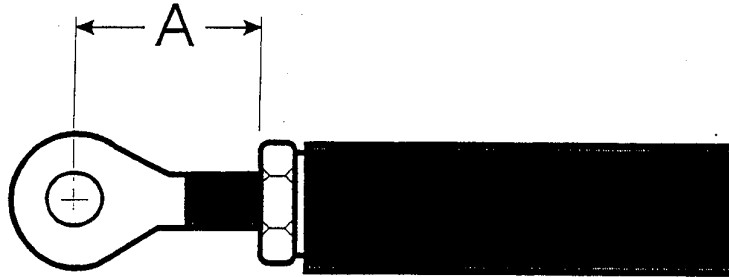
**Note:** Red light in Flight Engineer Panel & Cargo Door Control box will remain "ON" in open position.

### M. Latch Pin Micro Switch

1. Adjustment
  - a. To assure a positive actuation of the micro switch, adjust the switch so there is a 1/32" measurement from the ring at the base of the plunger and the shoulder of the plunger when the latch lock pin is inserted into the latch by the actuator.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

5. Remove shaft from upper end (Connected to Torque Tube).
6. Remove Latch from the respective broken Shaft.
7. Disconnect Shaft from Latch (Lower End).
8. Measure distance A, or count number of threads, which have to be the same in both sides.



**MEASURE AT BOTH ENDS OF SHAFT**

9. Remove complete Shaft.
10. Reverse process to install. Connect upper end of Shaft to Torque Tube. Connect lower end to Latch. Install Latch.
11. Move torque tube clockwise to close latch.
12. With latch completely closed, turn shaft to open position until latch begins opening. Turn shaft toward close position until feel pressure, then make a ¼ turn just to secure the shaft and eliminate slack.
13. Secure shaft by tightening both shaft ends with the lock nuts.
14. Connect Cylinder.
15. Actuate selector valve handle to number 1 position (OPEN).
16. Open door by using hand pump, check mechanism.
17. If mechanism is correct, then operate door by automatic system.

**P. Cargo Door Rigging Procedures**

**CAUTION: NO OBSTRUCTION OF ANY KIND BETWEEN CARGO DOOR  
AND ITS JAMBS IS PERMITTED.**

1. Cargo Door must be in down position.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

**V. DC-8 MONARCH CARGO DOOR COMPONENT REMOVAL AND INSTALLATION**

**A. Cargo Door Hydraulic Pump & Motor Assy.**

1. Removal

- a. Close door and depressurize hydraulic system.

**Note:** Deactivate System to assure safety.

- b. Remove cannon plug connecting to hydraulic motor.
- c. Remove bolts connecting hydraulic pump to hydraulic pump motor.
- d. Remove hydraulic pump motor mount bolts.
- e. Remove hydraulic motor.

2. Installation

- a. Align hydraulic pump and motor assy to bracket and install bolts.
- b. Connect hydraulic pump to hydraulic motor.
- c. Connect cannon plug.
- d. Operate cargo door.

**CAUTION:** MAINTAIN A CLEAR AREA AROUND DOOR PATH DURING DOOR OPERATION.

**B. Cargo Door Pivot Block**

1. Removal

- a. Close door and depressurize hydraulic system.

**Note:** Deactivate system to assure.

- b. Remove cotter key and castle nut.
- c. Remove rod ends from pivot block.
- d. Remove bolt from pivot block.
- e. Remove pivot.

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## D. Main Cargo Door Latch Assy

1. Removal
  - a. Open cargo door to appropriate height.
  - b. Deactivate system.

**Note:** Although cargo door is equipped with holding valve so that door will not fall, supports, should be installed to assure safety.

- c. Disconnect rod that connects to latch assy and torque tube.
  - d. Remove bolts that hold latch assy to door. Remove latch.
2. Installation
  - a. Align latch assy to cargo door.
  - b. Install bolts from latch assy to cargo door.
  - c. Connect rod from torque tube to latch assy lever.
  - d. Operate cargo door.

**CAUTION:** MAINTAIN A CLEAR AREA AROUND DOOR PATH DURING DOOR OPERATION.

## E. Hydraulic Tank

1. Removal
  - a. Close door and depressurize hydraulic system.

**Note:** Deactivate system to assure safety.

- b. Remove drain plug and drain hydraulic fluid from tank.
  - c. Disconnect lines attached to hydraulic tank.
  - d. Remove bolts from hydraulic tank mounting plate.

**Note:** Plug lines to prevent spillage and contamination of hydraulic lines.

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## G. Cargo Door Hydraulic System Filters

### 1. Removal

- a. Close door and depressurize hydraulic system.

**Note:** Deactivate system to assure safety.

- b. Break safety wire at hydraulic filter cover.
- c. Remove hydraulic filter cover and remove filter element.

### 2. Installation

- a. Install new filter element.
- b. Slide filter cover to filter assembly.
- c. Tighten filter cover and safety with .032 safety wire.
- d. Service hydraulic system to full with MIL-H-5606.
- e. Operate cargo door and check for leaks.

**CAUTION:** MAINTAIN A CLEAR AREA AROUND DOOR PATH DURING DOOR OPERATION.

## H. Cargo Door Cylinder

### 1. Removal

- a. Close door and depressurize hydraulic system.

**Note:** Deactivate system to assure safety.

- b. Disconnect hydraulic lines at actuator.
- c. Break safety wire and remove bolts from pivot block.
- d. Remove bolt from pivot mount assembly and remove hydraulic cylinder.

**Note:** Plug lines to prevent spillage and contamination of hydraulic lines.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

### J. Latch Pin Micro Switch

#### 1. Removal

- a. Put circuit breaker in the "OFF" position and "RED" tag.

**Note:** Circuit breaker located on panel of air conditioning system.

- b. Remove latch cover protector.
- c. Disconnect electrical wires and insulate all electrical wire ends to prevent a short circuit.
- d. Remove micro switch from mounting base.

#### 2. Installation

- a. Install micro switch.
- b. Connect all electrical wires.
- c. Restore electrical power and adjust micro switch in accordance with Adjusting & Testing Procedures.
- d. Install latch cover protector.

### K. Down & Closed Micro Switch

#### 1. Removal

- a. Put circuit breaker in the "OFF" position and "RED" tag.

**Note:** Circuit breaker located on panel of air conditioning system.

- b. Remove latch cover protector.
- c. Disconnect electrical wires and insulate all electrical wire ends to prevent a short circuit.
- d. Remove micro switch from mounting base.

#### 2. Installation

- a. Install micro switch.
- b. Connect all electrical wires.

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## 2. Installation

- a. Install micro switch.
- b. Connect all electrical wires.
- c. Restore electrical power and adjust micro switch in accordance with Adjusting & Testing Procedures.
- d. Install latch cover protector.

## N. Hydraulic Panel Check Valves

### 1. Removal

- a. Close door and depressurize hydraulic system

**Note:** Deactivate system to assure safety.

- b. Disconnect hydraulic lines at check valve.

**Note:** Plug lines to prevent spillage and contamination of hydraulic lines.

### 2. Installation

- a. Align check valves to hydraulic lines.
- b. Tighten B-nuts.
- c. Service hydraulic system to full with MIL-H-5606.

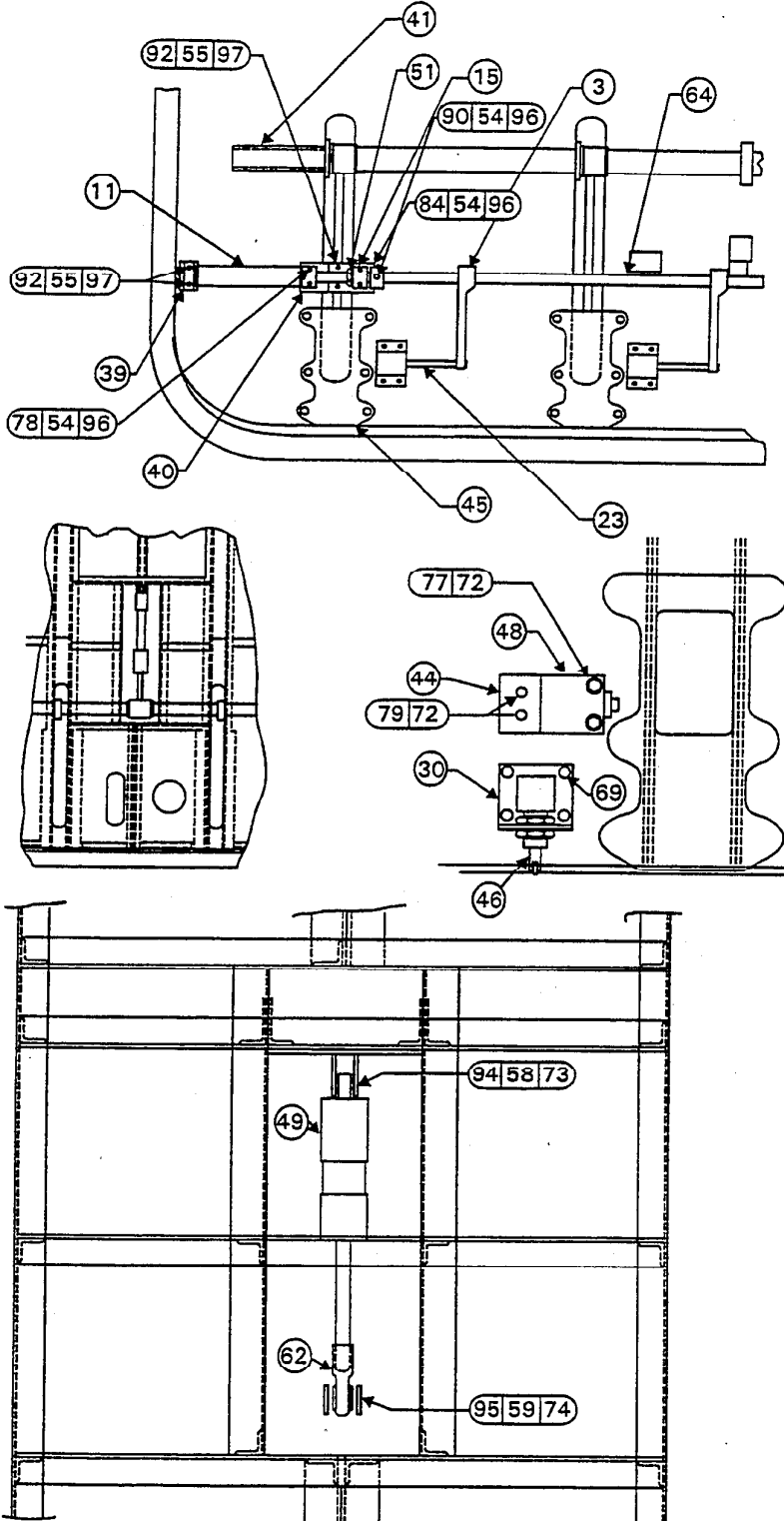
**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

ITEM	SPEC	MATERIAL	PART NO.	DESCRIPTION	QTY
51		1/2-20 UNF-3B	AN316-8	NUT	1
52		1/4-28 UNF-3A	AN4-20	BOLT	9
53		10-32 UNF-3A	AN525-10R-8	SCREW	59
54		10	AN960-10L	WASHER	71
55		1/4	AN960-416L	WASHER	32
56		5/16	AN960-516	WASHER	28
57		3/8	AN960-616	WASHER	42
58		1/2	AN960-816L	WASHER	3
59		5/8	AN960-1016	WASHER	3
60		3/4	AN960-C1216L	WASHER	4
61		1/4	AN970-4	WASHER	9
62	NMB CORP.		ART-10	ROD END BEARING	1
63	ANDREWS		EW1-1/2	THRUST BEARING	1
64		8-32 NC-3A	MS18065-24	SETSCREW	5
65		3/8	MS20002C6	WASHER	42
66		3/8-24 UNF-3A	MS20006-7	BOLT	28
67		3/32" DIA	MS20426AD3-3	RIVET	23
68		1/8" DIA	MS20426AD4-6	RIVET	106
69		3/16" DIA	MS20426AD6-8	RIVET	8
70		3/8-24 UNJF-3B	MS21042-6	NUT	42
71			RM52LHTA521-02	NUT PLATE	2
72		10-32 UNJF-3B	MS21047-L3	NUT PLATE	14
73		1/2-20 UNJF-3B	MS21083-N8	NUT	1
74		5/8-18 UNJF-3B	MS21083-N10	NUT	1
75		5/16-24 UNJF-3A	NAS1205-8	BOLT	28
76		10-32 UNRF-3A	NAS1351-3-16	BOLT	4
77		10-32 UNRF-3A	NAS1351-3-20	BOLT	2
78		10-32 UNJF-3A	NAS330CPA-4	SCREW	4
79		10-32 UNJF-3A	NAS330PA-6	SCREW	2
80		8-32 UNJC-3A	NAS517-2-2	SCREW	48
81		3/8-24 UNJF-3A	NAS517-6-10	SCREW	14
82		10-32 UNF-3A	NAS6203-3	BOLT	4
83		10-32 UNF-3A	NAS6203-5	BOLT	14
84		10-32 UNF-3A	NAS6203-6	BOLT	4
85		10-32 UNF-3A	NAS6203-7	BOLT	18
86		10-32 UNF-3A	NAS6203-8	BOLT	2
87		10-32 UNF-3A	NAS6203-10	BOLT	6
88		10-32 UNF-3A	NAS6203-11	BOLT	8
89		10-32 UNF-3A	NAS6203-12	BOLT	8
90		10-32 UNF-3A	NAS6203-18	BOLT	1
91		10-32 UNF-3A	NAS6203-29	BOLT	2
92		1/4-28 UNF-3A	NAS6204-7	BOLT	4
93		1/4-28 UNF-3A	NAS6204-32	BOLT	14
94		1/2-20 UNF-3A	NAS6208-20	BOLT	1
95		5/8-18 UNF-3A	NAS6210-16	BOLT	1
96		10-32 UNJF-3B	NAS679-A3	NUT	71
97		1/4-28 UNJF-3B	NAS679-A4	NUT	34
98		5/16-24 UNJF-3B	NAS679-A5	NUT	28
99	THOMSON		SPB-12ADJ	BUSHING BLOCK	3

**LATCHING MECHANISM & LINKAGE INSTALLATION  
DRWG. NO. K-52-5002 (2 OF 9)**

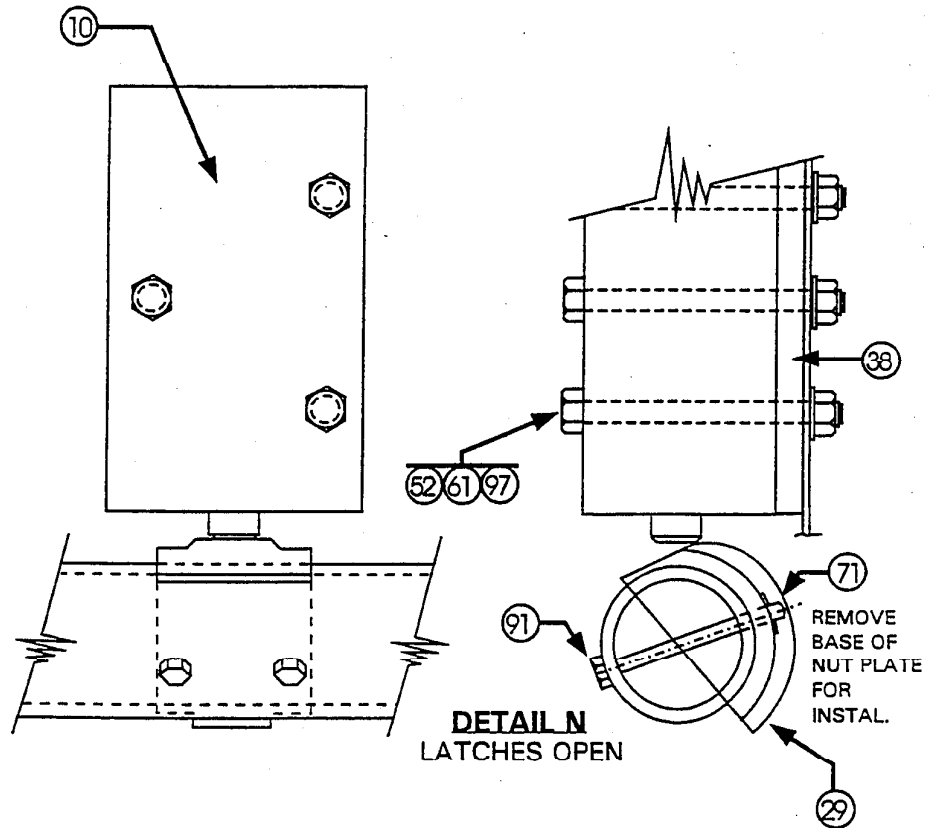
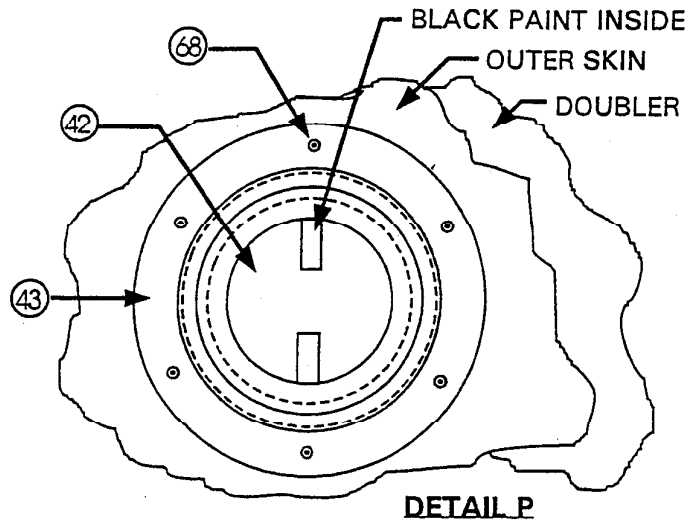


**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**



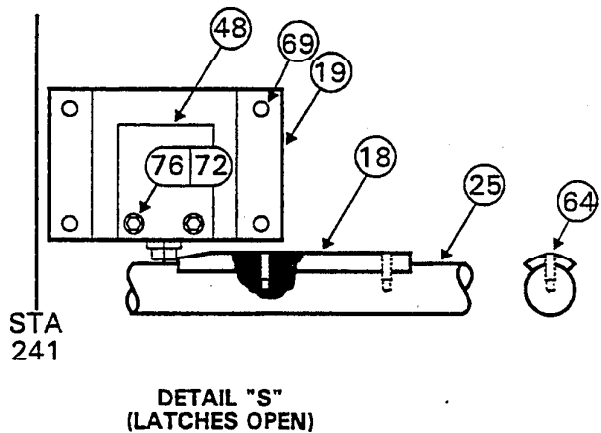
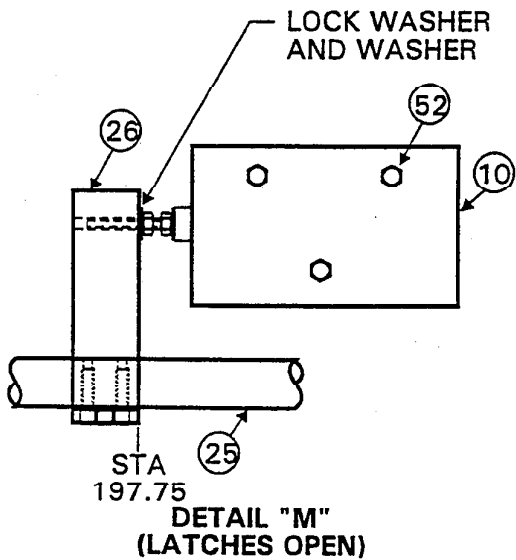
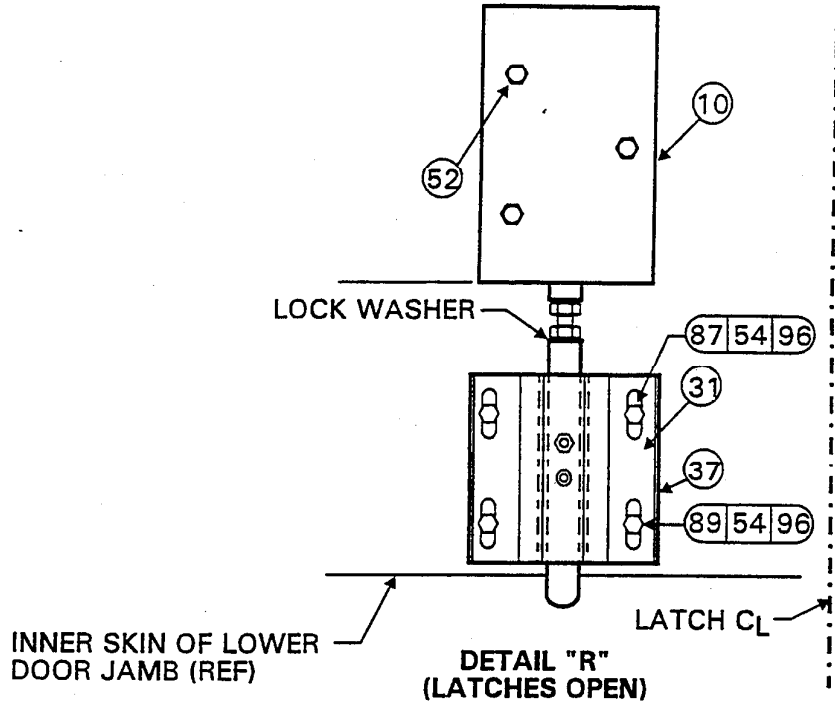
**LATCHING MECHANISM & LINKAGE INSTALLATION  
DRWG. NO. K-52-5002 (4 OF 9)**

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**



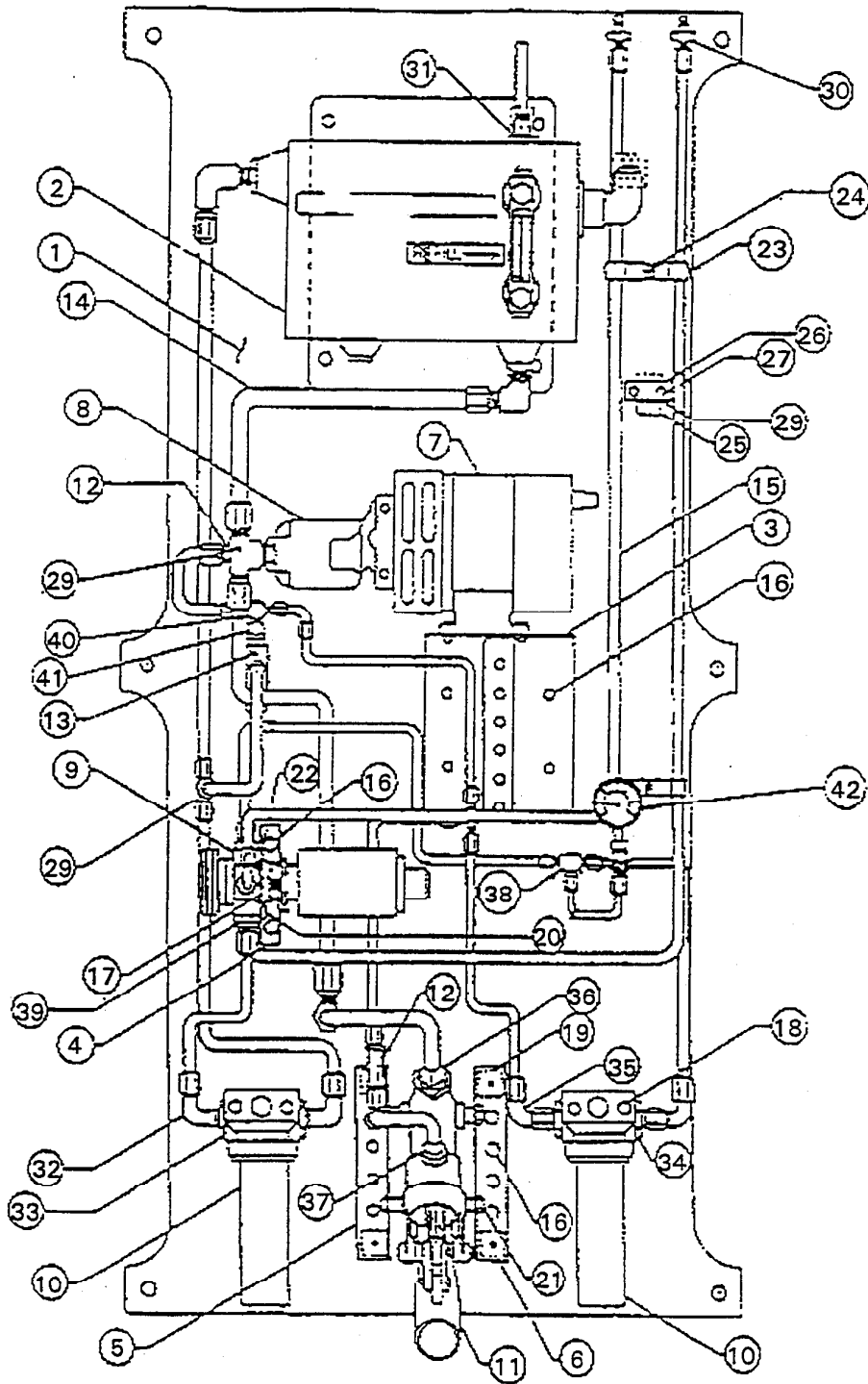
**LATCHING MECHANISM & LINKAGE INSTALLATION  
DRWG. NO. K-52-5002 (6 OF 9)**

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**



**LATCHING MECHANISM & LINKAGE INSTALLATION  
DRWG. NO. K-52-5002 (8 OF 9)**

EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL



HYDRAULIC CONTROL PANEL (SHEET 1 OF 4)

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

**HYDRAULIC PANEL**

ITEM	PART NUMBER	QTY	NOMENCLATURE
	NAS 43DD4	4	SPACER
19	AE 4350-11	4	SPACER
	N 426 AD-3	4	RIVET
20	AE 4323-12	1	PLACARD
21	AN 4-33A	2	BOLT
	AN 960-416	2	WASHER
	AN 365-428A	2	NUT
22	AE 4323-13	1	PLACARD
23	AE 4352-100	2	CLAMP ASSY.
24	AN 366F1032A	2	NUT PLATE
	AN 426 AD3	4	RIVET
	NAS 43DD3	2	SPACER
	AN 525-10R	2	SCREW
25	MS 24264R14	1	PLUG
26	AE 4351-11	1	PLUG HOLDER
27	AN 470 AD5	2	RIVET
28	AN 508-8-6	4	SCREW
	AN 960-8	4	WASHER
	AN 365.832A	4	NUT
29	AN 824-6D	2	TEE
30	AN 815-4	2	UNION
	AN 818-4	2	NUT
	AN 819-4	2	SLEEVE
31	AN 815-4D	1	UNION
	AN 818-4D	1	NUT
	AN 819-4D	1	SLEEVE
32	AN 833-6D	2	90° ELBOW
33	AN 924-6D	2	REDUCER
34	AN 919-4-6D	2	REDUCER
35	C 5506-4	2	SWIVEL NUT 90° ELBOW
36	AN 919-12-8-6SS	1	UNION
37	ANA 815-4	1	UNION

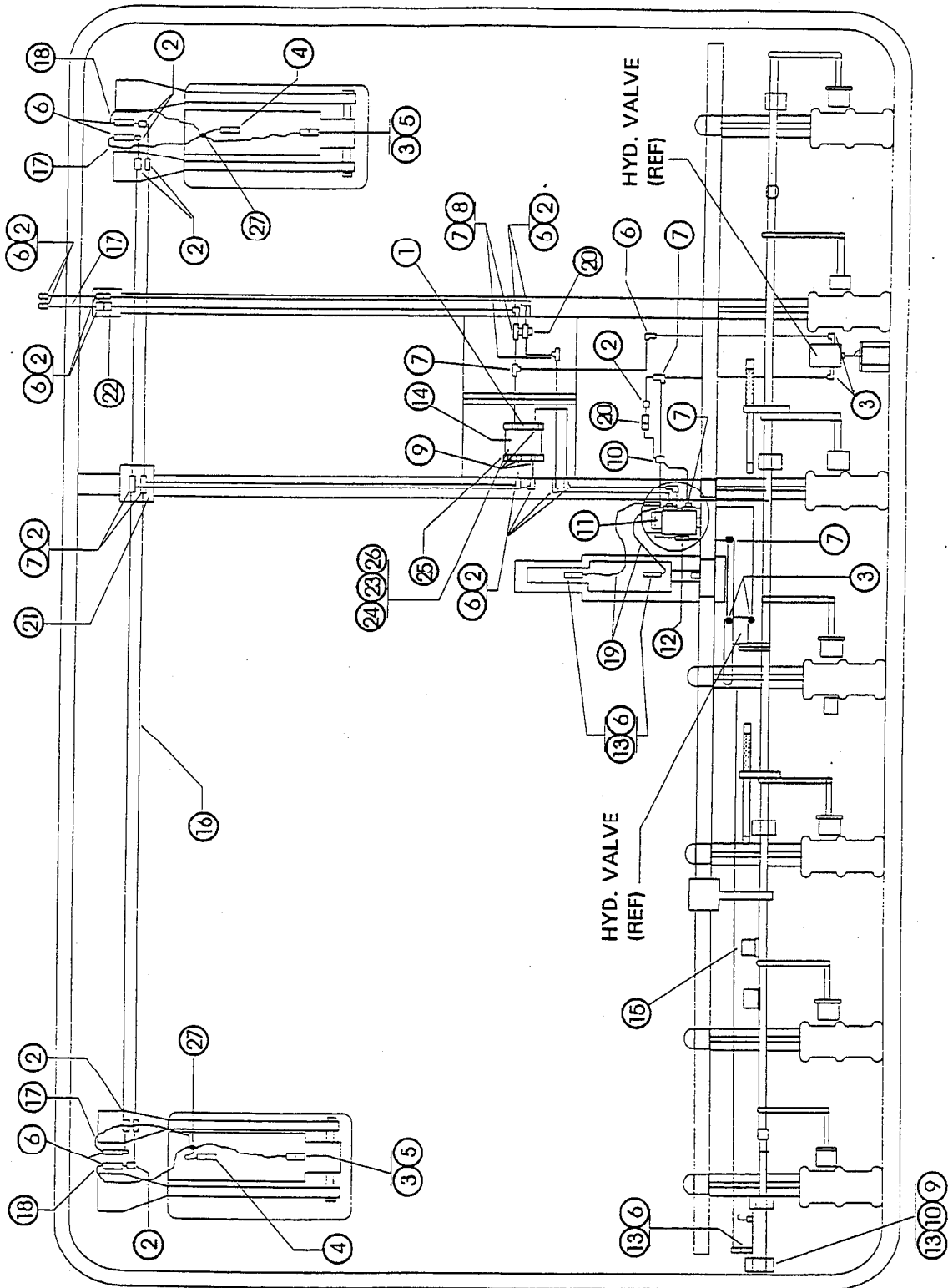
**HYDRAULIC CONTROL PANEL (Sheet 3 of 4)**

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

ITEM	SPEC.	MATERIAL	PART NO.	DESCRIPTION	DASH NO.	QTY
1			K-52-5003-1	HYDR. PIPING INSTL.		-1
2	SWAGELOK		Z-52-3080-1	MOUNTING BRACKET		1
3	SWAGELOK		SS-400-61	BULKHEAD UNION		21
4	SWAGELOK		SS-400-2-4ST	MALE ELBOW		6
5			SS-400-5-4ST	ELBOW		2
6			2-52-3093-1	RESTR. CHECK VALVE		2
7	SWAGELOK		SS-400-9	ELBOW		16
8	SWAGELOK		SS-400-3	UNION TEE		7
9	SWAGELOK		SS-400-P	PLUG		2
10	SWAGELOK		SS-400-1-4	FITTING		5
11	SWAGELOK		SS-400-6	UNION		3
12	SWAGELOK		SS-400-1-451	CONNECTOR		1
13	SWAGELOK		SS-400-3775	UNION TEE		1
14	SWAGELOK		SS-400-A-4ANP	ADAPTOR		4
15	WATERMAN HYD.		271-2	LOCK VALVE		1
16	UMPCO	TYPE 304	MS21919-DG4	CLAMP		A/R
17	MIL-T-8504/6		1/4 OD x .028W	PIPE		A/R
18	CAJON		SS-4BHT-24	HOSE		4
19	CAJON		SS-4BHT-18	HOSE		2
20	CAJON		SS-4BHT-12	HOSE		2
21	WHITEY	.071/2024-T3	SS-1VS4	VALVE		2
22	4.5x4.375	.071/2024-T3	K-52-5003-3	PLATE	-3	1
23	4.375x2		K-52-5003-5	PLATE	-5	1
24			AN960-416	WASHER		3
25			AN3-20A	BOLT		A/R
26			MS20426AD3-4	RIVET		A/R
27	UMPCO		RM52LHTA521-048	ANCHOR NUT		A/R
			MS21919-066	CLAMP		

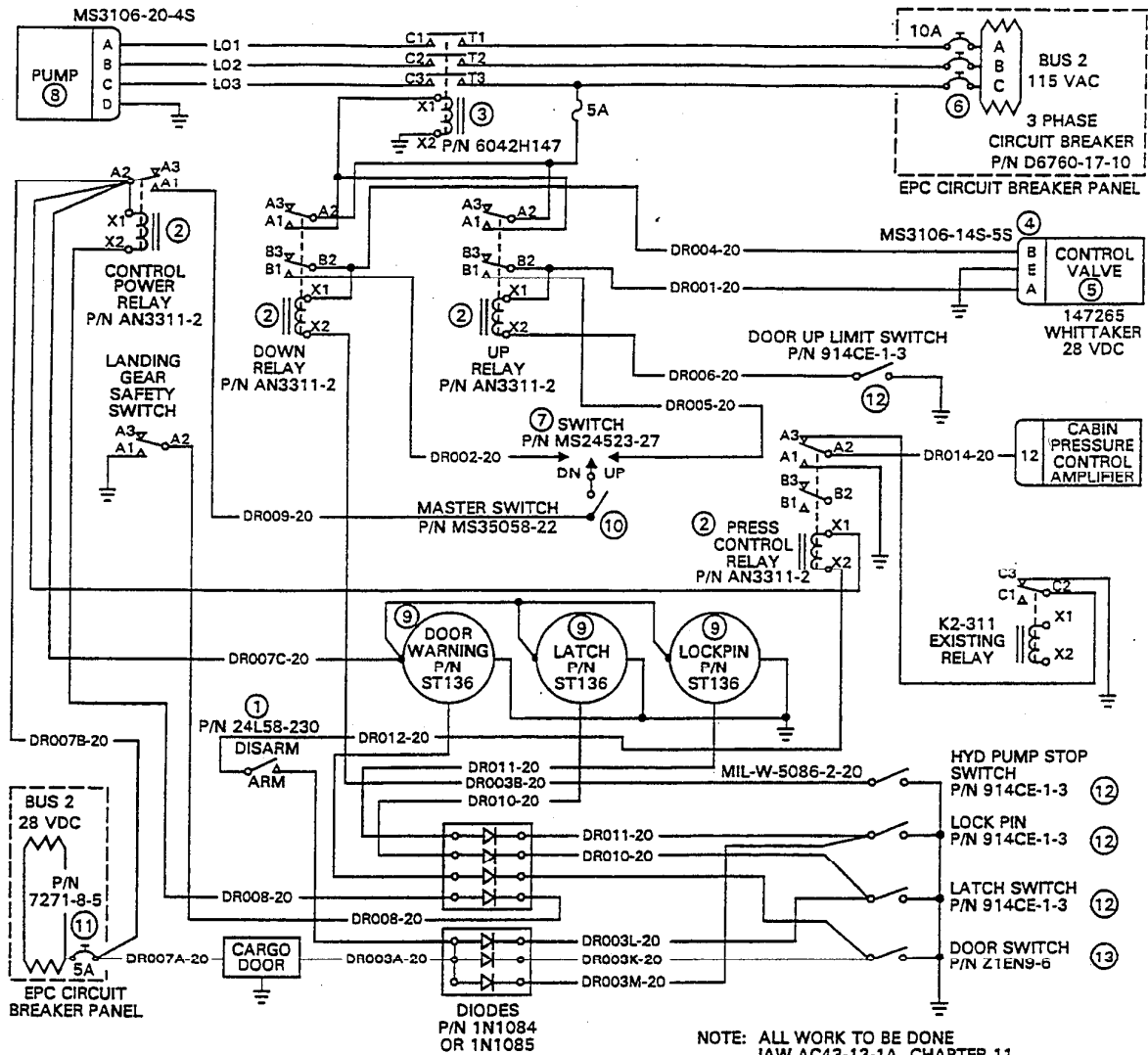
**HYDRAULIC PIPING INSTALLATION  
DRWG. NO. K-52-5003 (SHEET 1 of 3)**

EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL



HYDRAULIC PIPING INSTALLATION DRWG. NO. K-52-5003 (3 of 3)

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL



ITEM	SPEC	MATERIAL	PART NO.	DESCRIPTION	DASH NO.	QTY
1			24L58-230	SWITCH		1
2			AN3311-2	RELAY		4
3			6042H147	RELAY		1
4			MS3106-14S-5S	CONNECTOR		1
5	WHITTAKER		147265	CONTROL VALVE		1
6			D6760-17-10	CIRCUIT BREAKER		1
7			MS24523-27	SWITCH		1
8			MS3106-20-4S	PUMP		1
9			ST136	WARNING LIGHTS		3
10			MS35058-22	MASTER SWITCH		1
11			7271-8-5	CIRCUIT BREAKER		1
12			914CE-1-3	SWITCH		4
13			Z1EN9-6	SWITCH		1

## K-52-5010 DOOR CONTROL AND WARNING



EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL

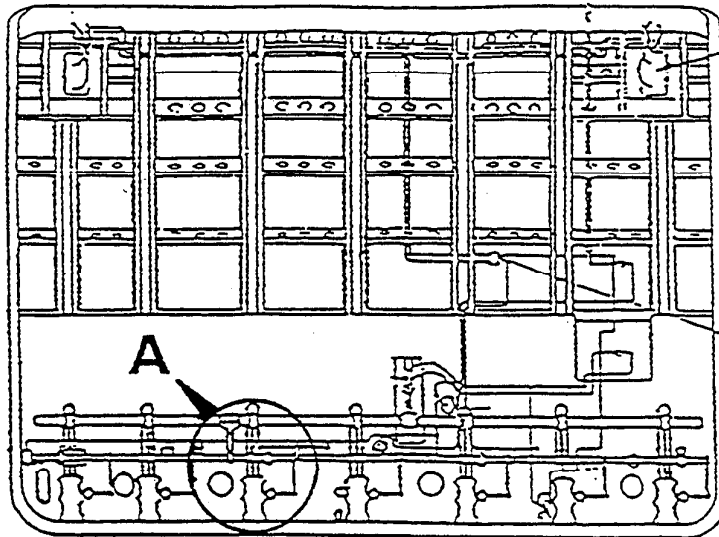
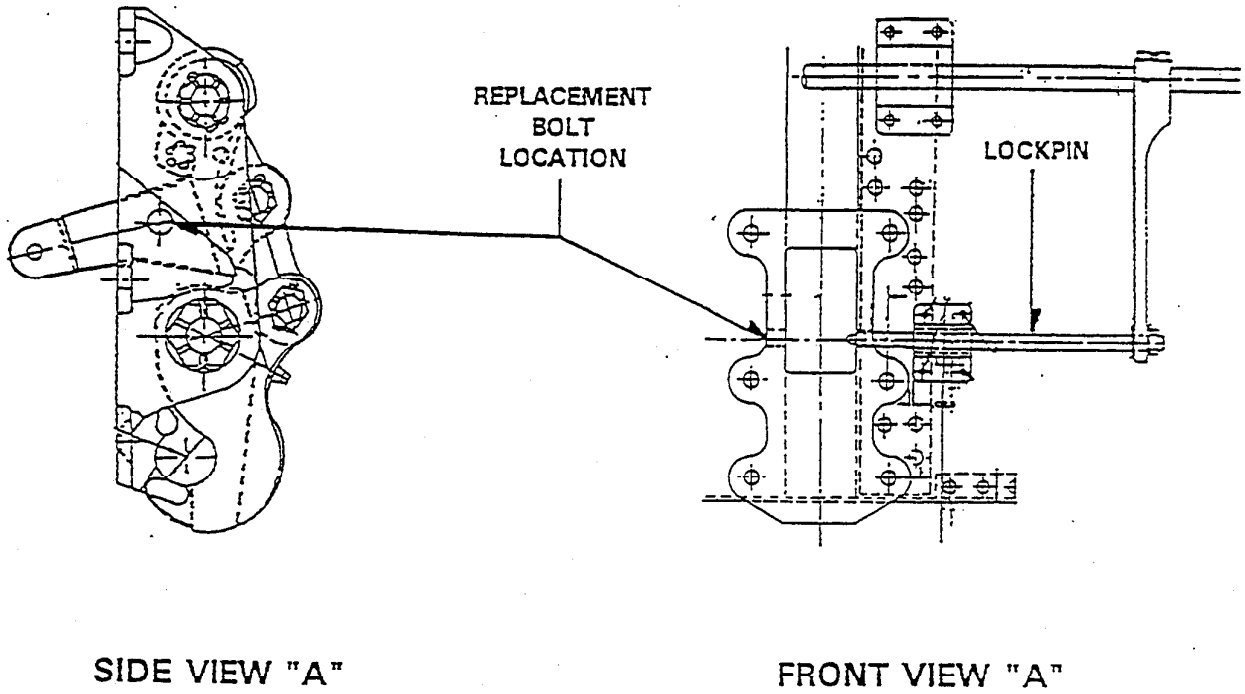


Figure 1. Monarch Main Cargo Door

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

- (3) Relief Valve
  - (a) The relief valve is located in the left hand forward belly compartment. If the fluid pressure in the system becomes excessive (over 2900 PSI) the relief valve bleeds pressure off and returns the fluid to the reservoir.
- (4) Needle Valve
  - (a) The needle valve is located in the left hand forward belly compartment. The needle valve is manually adjustable to the desired flow of hydraulic fluid to the door system.
- (5) Safety Valve
  - (a) The safety valve is located in the left hand side of the 9G bulkhead at STA 63. The safety valve functions as a check valve and is manually operated. The valve MUST be operational to allow fluid to the rest of the system.
- (6) Pin Valve
  - (a) The pin valve is located on the lower cargo door at STA 161. The valve is a three position, closed center, electrically operated valve. The electrical power is 28 VDC from Bus #3. When the valve is energized, it supplies hydraulic fluid to the pin cylinder.
- (7) Pin Cylinder
  - (a) The pin cylinder is located on the lower forward corner of the cargo door and activates the safety pins.
- (8) Latch Valve
  - (a) The latch valve is located on the lower cargo door at STA 187. The valve is a three position, closed center electrically operated valve.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

the function of the restrictors is to further slow down the flow of hydraulic fluid to and from the cylinder.

(14) Cargo Door Cylinder

- (a) The cargo door cylinder is located on the upper forward corner of the cargo door and activates the cargo door.
- b. Some aircraft are equipped with a aux hydraulic hand pump which allows the door to be manually opened and closed. The components listed below make up the hand pump installation.

(1) Reservoir

- (a) The system receives its supply of hydraulic fluid from a tank located overhead in forward courier compartment. The reservoir has a capacity of approximately one gallon.

(2) Hand Pump

- (a) The Hand Hydraulic Pump is located on the forward left hand side of the 9G bulkhead.

(3) Shut Off Valve

- (a) The shut off valve is located just below the reservoir. Close shut off valve to open door. Slowly open valve to close door.

**CAUTION: IF DOOR IS OPENED MANUALLY, IT MUST BE CLOSED MANUALLY.**

### C. Electrical System

1. General

- a. The electrical system for the cargo door consists of two (2) types of electrical power;

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

- (4) Fourth pole
  - (a) The fourth pole of the switch is not used.
- c. The 28 VDC electrical power for the cargo door warning system, on some models, is supplied from BUS #3 and is protected with a one amp, single pole circuit breaker located on the EPC panel in the upper right corner. The power is directed to two places from the circuit breaker.
  - (1) The power is directed to the warning light located on the upper right engineers-panel, for the press to test function..
  - (2) The power is directed to microswitch (M5) located in the lower aft corner of the cargo door at STA 263.
    - (a) The power is on the normally closed side of the microswitch, and when the microswitch is in the open position power is directed to the cargo door warning light.
- d. The cargo door warning system on some models is tied into the airplanes master warning system. The electrical power is furnished from 28 VDC BUS #4 and is directed to microswitch (M5) located in the lower aft corner of the cargo door through the master warning light.
  - (1) The power is son the normally closed side of the microswitch and when the microswitch is in the open position the circuit is completed to ground which in turn energizes the master warning light.
- e. 115 VAC 400 Cycle 3-Phase Electrical Power
  - (1) The electrical power supplied from BUS #4 is protected by one (1) twenty amp, 3 pole, circuit breaker located on the left side of the forward wall of the crash bulkhead. The electrical power is then directed to the relay.
  - (2) The relay is located in the left side of the forward belly compartment and is energized by two different procedures.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

- (5) Release the toggle switch and hydraulic safety lever.
- (6) Pull all cargo door circuit breakers.
- (7) Visually check to see that the door is in the closed position. Inspect from inside or through the cargo door inspection window for pin engagement.

### 2. Hand Pump Operation

#### a. Open

- (1) The door manual open wrench is located on the left side of the cargo compartment at fuselage Sta. 120. It is at waist level and is painted red.
- (2) Disconnect the pin cylinder from the U-bar (door locking pin gang bar). Reinsert pin cylinder bolt in U-bar. Take the manual open wrench and insert the hook end to the pin cylinder bolt and pull the U-bar forward to unlock the pins.
- (3) Close the manual system valve located above the hand pump inside the bulkhead.
- (4) Pump the hand pump while holding the door control switch in the up position until door is open and safety latch is engaged.

**Note:** If electrical power is not available the cargo door control valve slide will need to be manually centered by pushing the Red Tabs to prevent a hydraulic lock of the door actuating cylinder.

**CAUTION:** IF DOOR IS OPENED MANUALLY, IT MUST BE CLOSED MANUALLY.

#### b. Close

- (1) Slowly open manual valve above hand pump until door is closed.
- (2) Insert manual opening wrench into "U" shape channel and push channel aft until lock pins are in the locked position.
- (3) Check lock pins for security by looking through window on lower aft outside of door.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

2. Closing sequence.
  - a. Power is supplied to the cargo door safety valve (V4) and the cargo door valve (V3).
    - (1) Ports in the cargo door safety valve and the cargo door valve open.
      - (a) Hydraulic fluid is allowed to return from the cargo door cylinder.
      - (b) Cargo door cylinder extends.
      - (c) Cargo door activates micro switch (M3).
      - (d) Hydraulic pump pressurizes the system.
  - b. Power is directed to the latch valve (V2) through micro switch (M4).
    - (1) Port in the latch valve opens.
      - (a) Hydraulic fluid is directed to the latch cylinder.
      - (b) Latch cylinder extends.
    - (2) Micro switch (M4) is activated.
  - c. Power is directed to the pin valve (V1) through micro switch (M5).
    - (1) Port in pin valve opens.
      - (a) Hydraulic fluid is directed to the pin cylinder.
      - (b) Pin cylinder extends.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- C. With electrical power on the airplane, all applicable circuit breakers closed, pins disengaged, latches open, the cargo door will not open.

Possible Cause	Isolation Procedure	Correction
1. Obstruction	Insure door area outside aircraft is clear	Remove obstruction
2. Microswitch (M2) not engaged	Check for engagement	Adjust
3. Defective cargo door valve (V3)	Check for power on fwd terminal  Manually operate valve (See note following)	See wiring diagram  Replace if defective

**Note:** Manual operation of the cargo door valve (V3) is to depress and hold the red button on the forward side of the valve. If the cargo door operates normally, then the valve most likely has a defective solenoid.

4. Defective cargo door safety valve (V4)	Check for power  Manually operate valve (See note following)	See wiring diagram  Replace if defective
---	--	--

**Note:** Manual operation of the cargo door safety valve (V4) is to depress and hold the red button on top of the valve. If the cargo door operates normally, then most likely the valve has a defective solenoid.

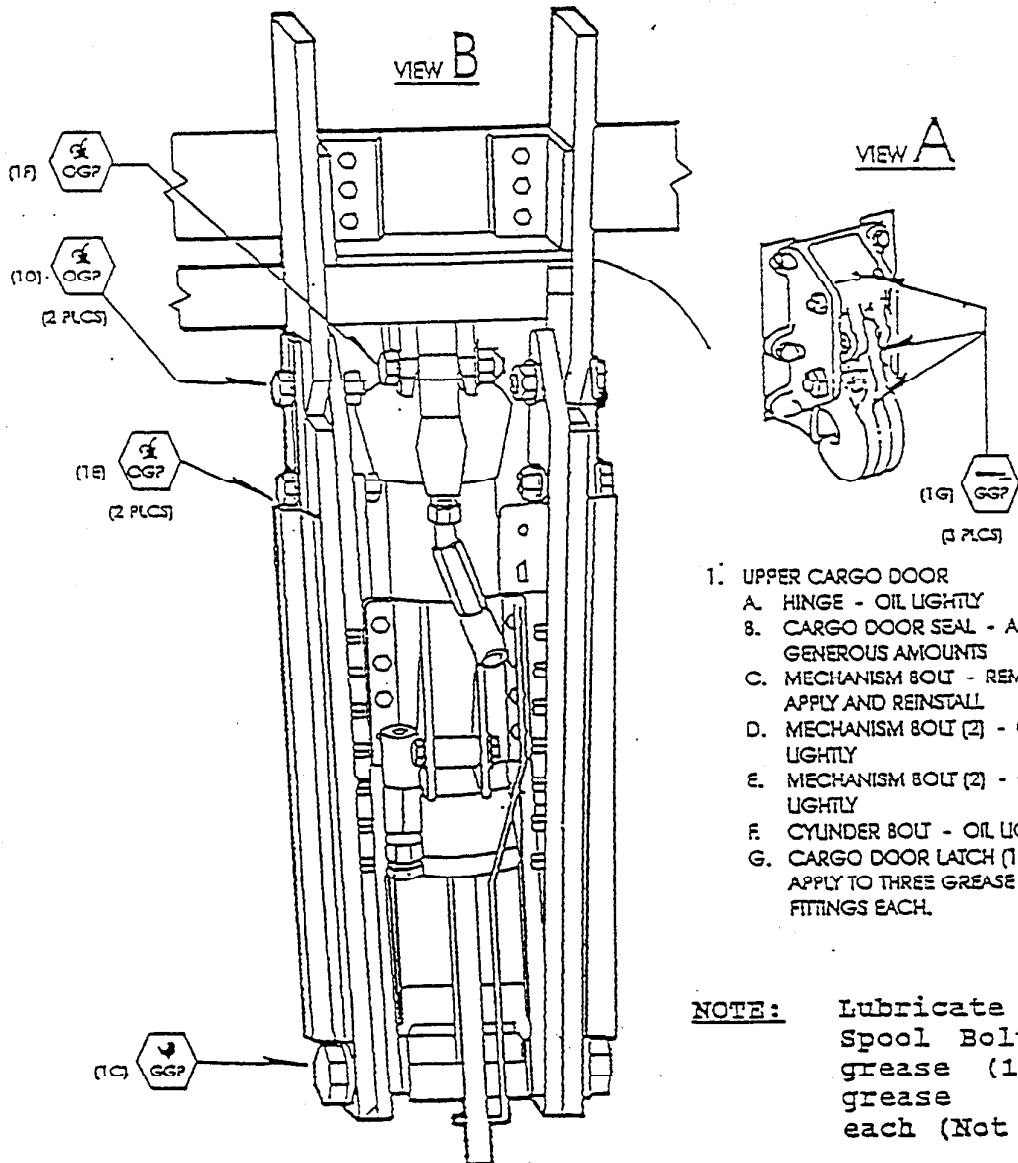
5. Clogged restrictor	Check for obstructions (Located at each port of the cargo door cylinder)	Remove obstruction
6. Defective needle valve (N1)	Check needle valve	Adjust or replace





**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

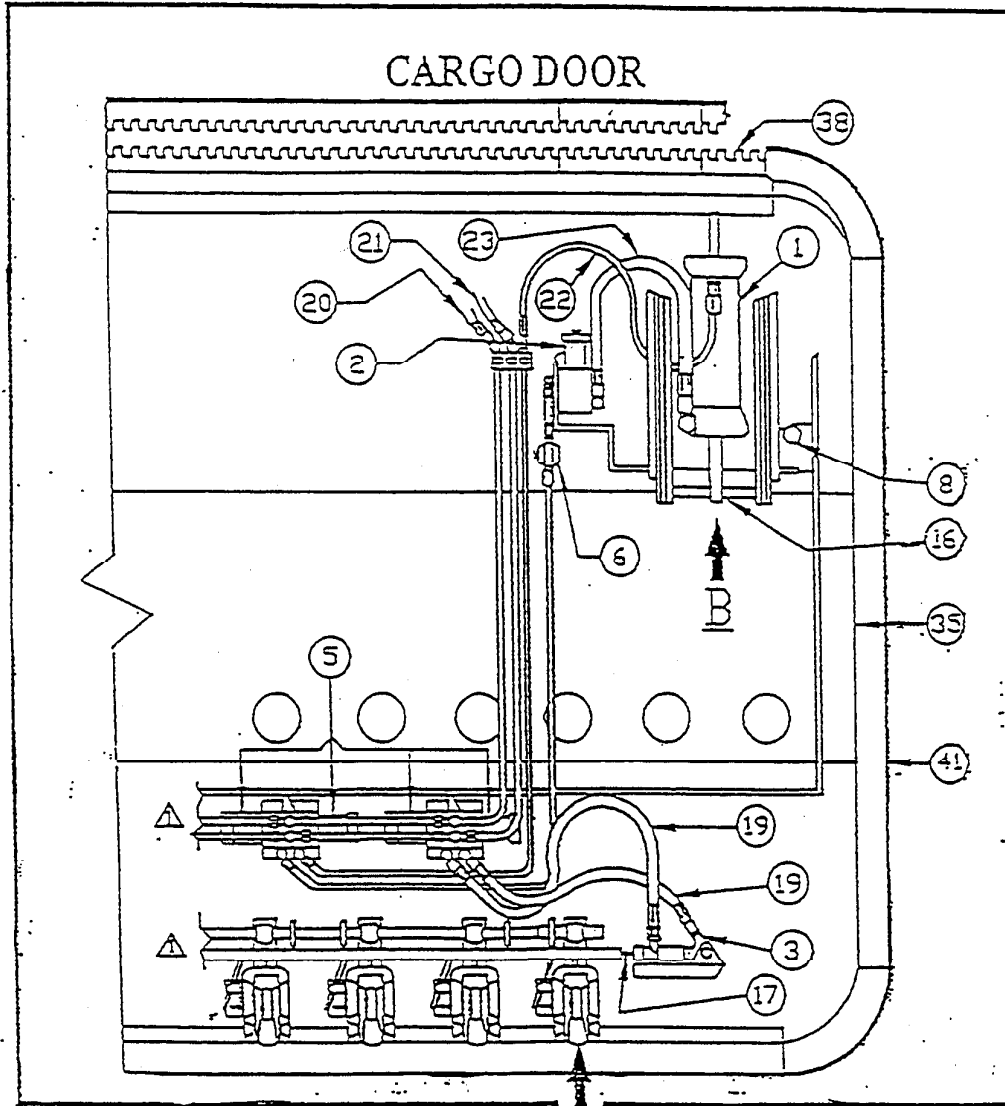
**CARGO DOOR - LUBRICATION**



1. UPPER CARGO DOOR
  - A. HINGE - OIL LIGHTLY
  - B. CARGO DOOR SEAL - APPLY  
    GENEROUS AMOUNTS
  - C. MECHANISM BOLT - REMOVE,  
    APPLY AND REINSTALL
  - D. MECHANISM BOLT (2) - OIL  
    LIGHTLY
  - E. MECHANISM BOLT (2) - OIL  
    LIGHTLY
  - F. CYLINDER BOLT - OIL LIGHTLY
  - G. CARGO DOOR LATCH (12) -  
    APPLY TO THREE GREASE  
    FITTINGS EACH.

**NOTE:** Lubricate Latch  
Spool Bolts with  
grease (12) - 1  
grease fitting  
each (Not Shown)

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**



(X) - SEE LIST OF MATERIALS  
ON DWG. NO. 38101D SHT. 3 OF 3  
FOR PART NO. & QTYS.

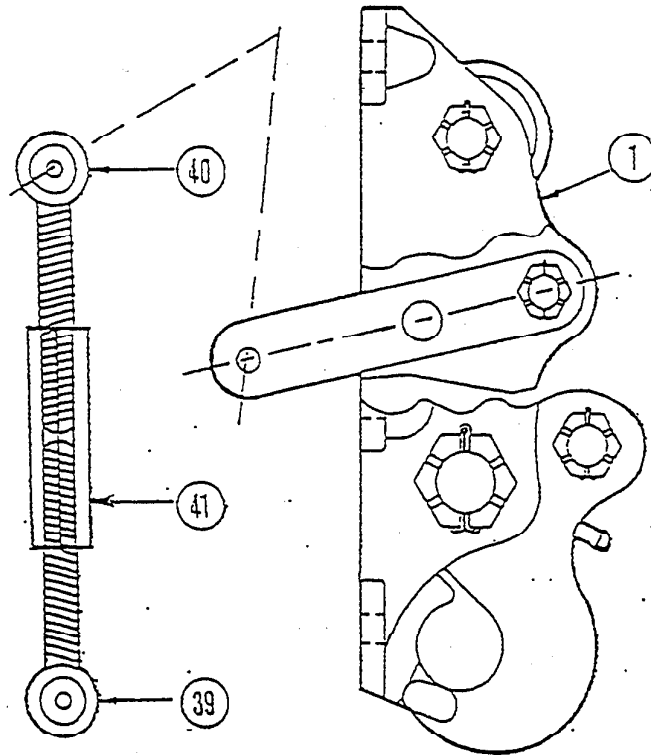
(A) - FOR CONT SEE DWG. NO.  
38101D SHT. 1 OF 3

DRAWING NO.  
**38101D**  
SHEET 2 OF 3

EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL

DOOR LOCK ASSEMBLY VIEW "A"

ASSEMBLED



DRAWING NO. 38101A

SHEET 1 OF 3

⊗ SEE LIST OF MATERIALS  
ON DVG. NO. 38101A SHT. 3 OF 3  
FOR PART NO. & QTY'S.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

**DOOR LOCK ASSEMBLY VIEW "A"**

ITEM	PART NO.	QTY.	NAME
1	38820	12	LOCK ASSEMBLY, DOOR, DAC 3361150
2	3772794-1	1	BASE, LOCK ASSEMBLY
3	3773874-3	1	HOOK, LOCK ASSEMBLY
4	MS15001-2	1	FITTING, GREASE
5	NAS77414-62	2	BUSHING
6	3773454-5	2	SPACER
7	AN320-7	2	NUT
8	4775938-1	1	SPACER
9	NAS464-7-20	2	BOLT
10	2361130	1	LINK ASSEMBLY
11	2361130-4	1	LINK
12	MS15001-4	1	FITTING, GREASE
13	NAS77410-23	2	BUSHING
14	4773453-1	1	PLATE, LOCK
15	NAS1204-10	1	BOLT
16	NAS1205-10	1	BOLT
17	NAS1205-12	1	BOLT
18	4773462-1	1	LEVER ASSEMBLY
19	4773462-3	1	LEVER
20	MS15001-1	1	FITTING, GREASE
21	1365255	2	BUSHING
22	2363572	1	CAM
23	AN960-416L	1	WASHER
24	NAS67944	1	NUT
25	NAS67945	1	NUT
26	AN916-516L	1	WASHER
27	2483076	1	WASHER
28	AN320-8	1	NUT
29	AN960-816	1	WASHER
30	AN320-4	1	NUT
31	AN381-2-8	1	PIN
32	AN960-416L	1	WASHER
33	NAS1104-60	1	BOLT
34	FN22-1018	1	NUT
35	NAS464-8-50	1	BOLT
36	LBW22-10-46	1	BOLT
37	WC22-10	1	WASHER
38	WP22-10	1	WASHER
39	8RE4205	1	ROD END L.H. THREAD
40	8RE4090L	1	ROD END R.H. THREAD
41	2363022	1	LINK ASSEMBLY



DRAWING NO.  
**38101A**

SHEET 3 OF 3

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

**CARGO DOOR VIEW "B"**

ITEM	PART NO.	QTY.	NAME
1	38101	1	ACTUATOR, CARGO DOOR DAC # 527411-6-502 (SEE VIEW "C")
1A	38812	1 PR.	EXTENSION ARMS
2	35554	1	CLIP
3	37601-19	1	PLACARD
4	AN12-26	1	BOLT, CYLINDER TO DOOR
5	AN960-1216	2	WASHER, CYLINDER TO DOOR
6	AN310-12	1	NUT, CYLINDER TO DOOR
7	8K5130	2	BOLT, CYLINDER ROD END TO EXTENSION ARM
8	3K5234	4	WASHER, CYLINDER ROD END TO EXTENSION ARM
9	2J3502	1	NUT, CYLINDER ROD END TO EXTENSION ARM
10	AN380-4-7	1	COTTER PIN, CYLINDER ROD END TO EXTENSION ARM
11	38813	1	H-BRACKET (ARM)
12	AN10-21	2	BOLT, H-ARM TO DOOR ATTACH
13	AN960-1016	4	WASHER, H-ARM TO DOOR ATTACH
14	AN310-10	2	NUT, H-ARM TO DOOR ATTACH
15	AN10-24	2	BOLT, EXTENSION ARM TO AIRFRAME ATTACH
16	AN10-24	4	WASHER, EXTENSION ARM TO AIRFRAME ATTACH
17	AN310-10	2	NUT, EXTENSION ARM TO AIRFRAME ATTACH
18	AN380-4-5	2	COTTER PIN, EXTENSION ARM TO AIRFRAME ATTACH
19	38814	1	SAFETY LATCH ASSEMBLY
20	38815	1	SLEEVE, HOOK CATCH
21	LCL MFG.	1	ROD, SAFETY LATCH STOW (MFD. PER SAMPLE)
22	32603-2	1	HOSE ASSEMBLY, DOOR ACT. DOWN LINE
23	32603-1	1	HOSE ASSEMBLY, DOOR ACT. UP LINE
24	35258	1	BUSHING, SAFETY LATCH
25	AN-8-23	1	BOLT, SAFETY LATCH
26	AN960-816	2	WASHER, SAFETY LATCH
27	AN365-820	1	NUT, SAFETY LATCH

**EMERY  
WORLDWIDE  
AIRLINES**

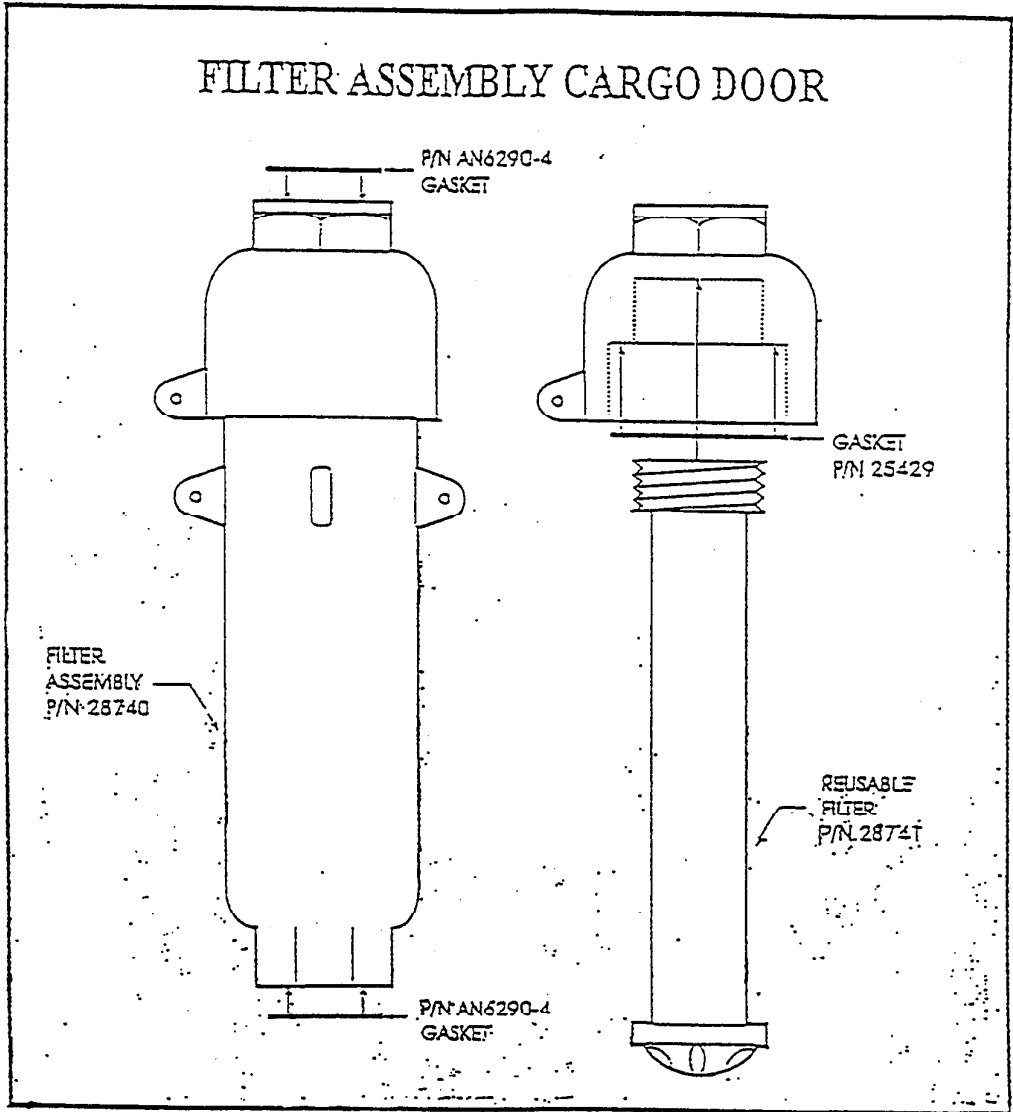


DRAWING NO.

**38101B**

SHEET 2 OF 2

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**



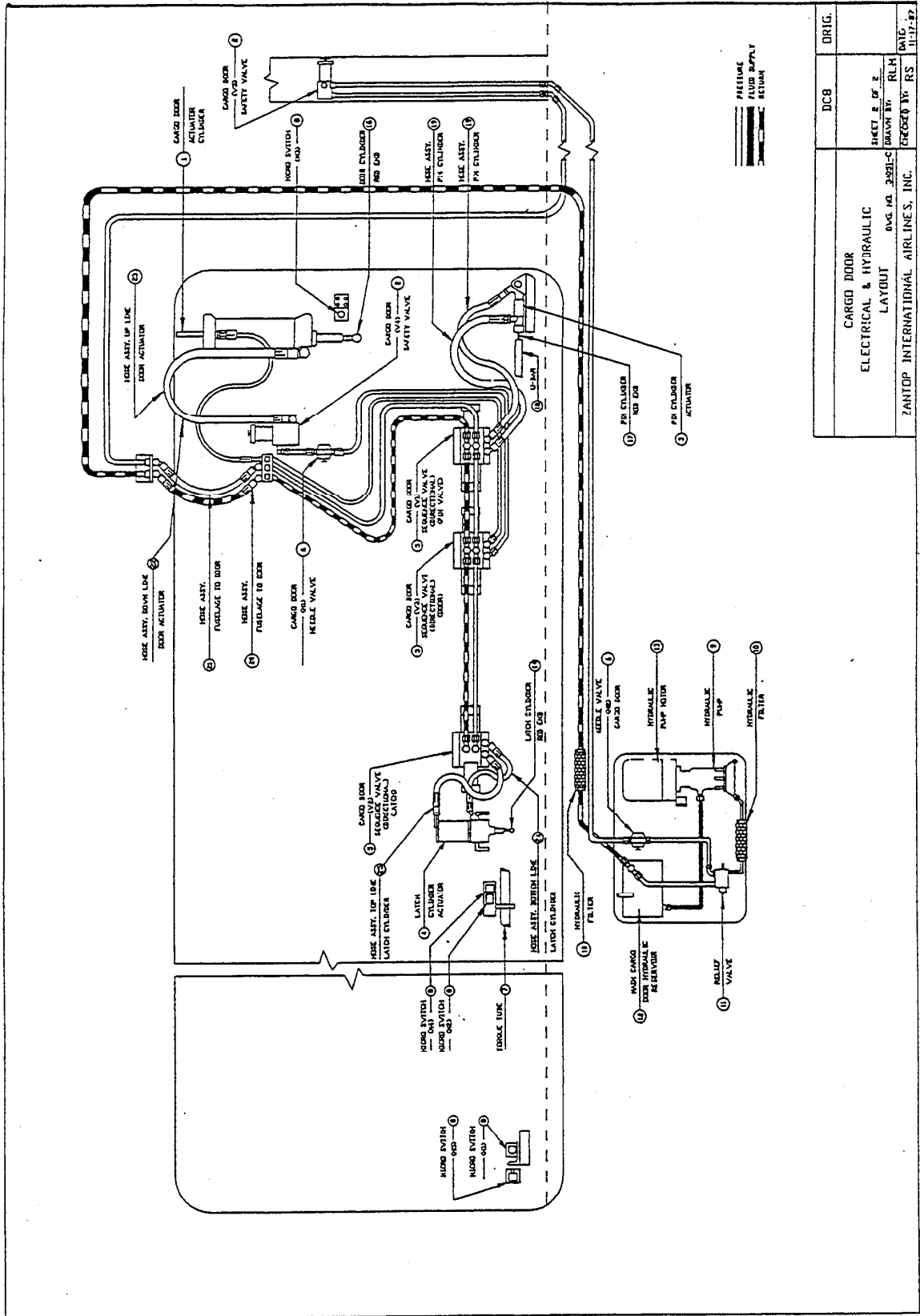
4	25429	2	GASKET
3	28741	2	REUSABLE FILTER
2	AN6290-4	4	GASKET
1	28740	2	FILTER ASSY. CARGO DOOR
ITEM	PART NO.	QTY.	NAME
REVISION 4 FILTER ASSEMBLY CARGO DOOR (3/12/91) (2/10/94)			

**EMERY  
WORLDWIDE  
AIRLINES**



DRAWING NO.  
**28740Z**

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL



# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## XIV. DC-8 ROSENBALM CARGO DOOR INTERIM REPAIR

### A. General

The following procedure outlines the use of certified NAS bolts as an interim installation in place of lockpins to facilitate aircraft departure when spares are not available. In all cases where NAS bolts are installed in place of lockpins, Maintenance Control is to be advised so that permanent repairs can be scheduled at the next qualified maintenance station where parts are available and mechanics on duty. The Rosenbalm Doors have twelve (12) lockpins. (See Figure 1)

### B. Policy

Only aircraft certified NAS hardware will be used for this interim installation. A log book entry will be required on the outgoing log page every time bolts/lockpins are removed/reinstalled and the flight crew is verbally notified.

### C. Procedure

1. Remove damaged/bent lockpin(s) per applicable maintenance manual.
2. Inspect main cargo door locking and latching mechanism to ensure serviceability of all components.

**Note:** Aircraft load may require adjustment to facilitate bolt installation. All efforts should be coordinated with operations.

3. Close and lock main cargo door, ensure remaining lockpins are properly set.
4. Install one of the following bolts to replace damaged pin, NAS 1106-46, NAS 1126-46, NAS 6206-46, NAS 6706-46 or with NAS 1021-N6 nut.
5. Make a log book entry indicating compliance with this procedure and position of bolt installation, notify flight crew and Maintenance Control.

**Note:** When removing bolts and installing lockpins follow applicable maintenance manual procedures and comply with Step 5.



# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

## XV. B-727 AERONAUTICAL ENGINEERS INC. CARGO DOOR

### A. Introduction

1. The main cargo door is an alclad structure with outer and inner skins, internal webs, and internal stiffeners. The door is of the "Plug" type and is attached to the upper left hand side of the fuselage by a hinge linkage installed on the upper part of the door. The clear opening in the side of the aircraft is 137" wide and 87" high. In the closed position the door is secured by 7 hydraulically activated latches. Around the perimeter of the door is a continuous sealing strip which prevents loss of cabin pressure through the door edges when the aircraft is in flight.
2. The door is operated by an independent hydraulic/electric system, which is electrically controlled from a "Control and Relay Box" located on the barrier bulkhead (@ Sta. 346.5). The door can also be operated manually by means of a hydraulic hand pump in the event that electric power is unavailable.

### B. Hydraulic System General

1. The hydraulic system for the main cargo door is an independent electronically powered system using MIL-H-5606 type hydraulic fluid. The system consists of an electric motor driven pump, an electric positioned selector valve, a hand pump for manual operation, a hydraulic reservoir with a fluid level sight gauge, filters and a relief valve. All of which are mounted on a panel located on the cargo barrier bulkhead.
2. Hydraulic pressure is directed to the door operated mechanisms, located inside the cargo door, through the overhead plumbing and flexible hydraulic hoses located at the top of the door. Sequencing of the various actuators is controlled by the holding valves, relief valves and the manifolds. During the opening cycle of the door the closing hydraulic lines are used as return lines, when closing the door the opposite is true.
3. The system is serviced at the panel. Manual operation is also performed at the panel by positioning the Selector Valve manually. The system relief valve, set at 3,000 PSI (+0-100) and 2 check valves protect the system from overpressure or backpressure.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- b. Hydraulic pressure will flow directly to the door actuators and to the holding valve. This closes port "P" on the holding valve and allows fluid to escape back to the tank through the opening lines. Then the door moves to the close position turning off the "Door Closed" light on the control panel.
- c. When the door has reached its full down position, pressure will build to 1,000 PSI. This opens the Torque Tube relief valve (1,000) and moves the latch hooks down onto the spools. This will extinguish both the "Hooks Closed" and "Latches Closed" lights on the control panel.
- d. Pressure then builds to 1,600 PSI opening the relief valve to the "Gang Bar" (1,600). This pushes the lock pins into place in the latches simultaneously. This will turn off the "Latch Lock Pin" light on the control panel.
- e. Pressure then builds to 2,000 PSI opening the last relief valve, in the closing sequence, (2,000). This allows the Vent Door to close. All of the lights should be out.

**D. Electrical System General**

- 1. 115 VAC-3 Phase 400CPS is used to operate a Westinghouse motor driving a hydraulic pump. This is provided by an AC bus, and the circuit is protected by a 30 Amp circuit breaker.
- 2. 28 VDC is used throughout the remaining system to provide power for control relays and indicator lights. This is provided by a DC bus, and is protected by a 5 Amp circuit breaker.
- 3. There is a power control safety switch in this electrical system. It is connected to the Left Main Landing Gear Safety Switch at Wing Station 240. This only allows power to the hydraulic panel when the aircraft is in a safe position for cargo door operations. The panel will only receive power when the switch is engaged.
- 4. All micro switches located in the cargo door are connected to the control panel and should all be illuminated when the cargo door is open, and out when the door is closed. When any one micro switch fails to be opened the lights on the panel will light along with the light in the cockpit.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- b. 28 VDC will energize the down relay and the motor pump power relay. The hydraulic control valve will position the ports for closing.
- c. The pump will run and the door will close, when the door reaches full down position the "Door Closed" light will be extinguished on the control panel.
- d. The torque tube will rotate locking the latches onto the spools extinguishing the "Latches Closed" and the "Hooks Closed" lights on the panel.
- e. The lock pins will then slide into place making the "Latch Lock Pin" light go out.
- f. Finally, the vent door will close extinguishing the last light on the control panel.
- g. With all of the switches activated, all lights should be out.

**F. Manual Operation**

- 1. With the master switch "Off", position the selector valve manually to the desired function.
- 2. Operate the hand pump (handle is provided) until the door has reached the desired position.

**G. Emergency Opening of the Cargo Door:**

To open the cargo door from the outside, as in the case of a hydraulic or electrical malfunction, or a leak, and the hand pump is unable to function, the following steps should be followed.

**WARNING: THE HYDRAULIC SYSTEM USES MIL-H-5606.**

- 1. Be sure, if possible, that there is no hydraulic pressure in the lines. Turn the control valve on the hydraulic panel to "Manual".
- 2. Remove the access panel next to the vent door on the outside of the aircraft. Using a socket on the end of the tube, open the vent door. **THIS MUST BE DONE FIRST!**
- 3. Then take off the access panels at the bottom of the door and manually slide the "Gang Bar" and pins out of the latches. Extra force may be needed due to the spring on the bar.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

- (5) With all latches adjusted evenly, operate the door using the hand pump. Open the door several times manually before using the motor pump.
4. Check Valves
    - a. Procedures
      - (1) There is no adjustment of the check valves.
      - (2) To test the check valve, apply full system pressure in both directions.
        - (a) In the direction of the indicated arrow, there should be full flow.
        - (b) In the direction opposite to the arrow, there should be no flow.
      - (3) If it is a restrictor check valve:
        - (a) There should be full flow in the direction indicated by the large arrowhead.
        - (b) There should be restricted flow in the direction indicated by the small arrow.
  5. Latch Pins
    - a. Procedures
      - (1) Adjust the lock pins by either adjusting the union to adjust all of the pins at once, or by moving the individual lock pin in the bracket.
      - (2) Testing of the lock pins consists of checking the pins straightness, smoothness of operation and if it travels through the latch to engage the switches (Latches #1 & #7). Also if the pins withdraw completely from the latches. The actuator must also have smooth, full travel.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- (b) To adjust the micro switch the screws must be loosened and the micro switch must be repositioned so that there is 1/32 inch between the shoulder of the plunger and the ring at the plunger base ring. Tighten the nuts.

**Note:** The hooks micro switches are adjusted in a similar fashion to the previous section.

- (c) Test the micro switch with the power off using an Ohm meter:
- With the plunger depressed, the circuit is open, there should be no continuity in the circuit.
  - With the plunger released, the circuit is closed, there should be continuity in the circuit.

8. Latch Pin Micro Switch

a. Procedures

- (1) To adjust the micro switch, loosen the attaching screws and position the switch so that the latch pin is fully extended, and pushes the arm of the switch nearly its full travel. Then attach the switch in this position.
- (2) Test the micro switch with the power off using an Ohm meter:
- (a) With the arm depressed, the circuit is closed, there should be no continuity in the circuit.
- (b) With the arm released, the circuit is closed, there should be no resistance in the circuit.
- (c) With the power on, and the pins out of the latches, the "Latch Lock Pin" light should be on, on the control panel.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- (c) With the power on, operate the cargo door through several cycles. The motor pump should shut off automatically when the actuator depresses the plunger on the switch at or near the full up position. If the pump does not shut off and the door has reached its full up position, adjust the switch by bringing it closer to the actuator until it does shut off the motor pump.

11. Main Cargo Door

a. Procedures

(1) General

- (a) The main cargo door should be adjusted and tested using the hydraulic hand pump. After the door has been adjusted and tested in its closed and latched position and its full open position: it should be operated through several cycles using the electric pump.

(2) Adjusting

(a) Adjust all mechanical linkages (links and shafts):

- Adjust the door actuating links in accordance with Section 6.
- Install the links with the door actuating cylinders in the fully extended position.
- With the door closed, rotate the torque tube using a socket at the forward end. Also, adjust all of the latch shafts so that all of the latches have an even grip and lock simultaneously and allow the latch pins to slide through freely.
- Adjust the "Latches Closed" micro switch, the "Hooks Closed" micro switches, the "Door Closed" micro switch and with the latch pins inserted adjust the 2 pin micro switches.

- (b) Deactivate the Hydraulic Motor Pump by pulling its circuit breaker in the main panel.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

c. Adjust Close Mode

- (1) Use the same procedures as in the previous section except the series of events will happen in the reverse. The hand pump must be used also. The pressures that the various functions will take place will differ than the opening process.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- e. Attach the door "Up micro switch.
- f. Reconnect all of the hydraulic hoses to the door and actuators.

**B. Main Cargo Door Actuator**

**1. Removal**

- a. Close and latch the main cargo door.
- b. Depressurize and deactivate the hydraulic system. Pull the appropriate circuit breakers and tag.
- c. Disconnect the hydraulic lines at the actuator and tag.
- d. If the forward actuator is being removed:  
Remove the micro switch and secure it out of the way, in a safe position.
- e. Remove the roll pins, the shafts, and the links from the pivot block.
- f. Remove nut, washer, and bolt from the inboard side of the support plate.
- g. Remove cotter pins and washers and slide shaft out of the supports. Remove the actuator.
- h. Remove the safety wire from the bolt and remove the bolt to remove the pivot block from the actuator.
- i. Remove the bolts to remove the pivot mount assembly.

**2. Installation**

- a. Install the pivot mount assembly to the cylinder using bolts.
- b. Install the pivot block using a bolt and safety wire 0.040".
- c. Position the actuator into the support plate and slide the shaft into place. Center the shaft into the supports and install the washers and the cotter pins (1).



**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- c. The links should be preadjusted in pairs.
  - (1) Install Fuselage Links
    - (a) Install the links in the upper supports with bolts, washers, nuts and cotter pins.
    - (b) Tighten the nuts finger tight and tighten with a wrench to the nearest cotter pin alignment.
  - (2) Install Door Links:
    - (a) Insert the shaft through the drilled port in the outside door beam and start the shaft through the door support.
    - (b) Position each link in turn and pass the shaft through the rod end bearing.
    - (c) Center the shaft and install the retainer and the cotter pin.

3. Install Link Assemblies to Pivot Block

- a. Extend the actuator to its full travel and install the links into the pivot block. Attach with the shafts and the roll pins.

**D. Main Cargo Door, Door Up Micro Switch**

1. Removal

- a. Deactivate the cargo door electrical system by pulling the appropriate circuit breakers out of the main panel.
- b. Remove the micro switch wire and insulate to prevent shorting, also label them for easy installation.
- c. Remove the screws, washers and nuts, and then remove the switch.

2. Installation

- a. Open the main cargo door to its full open position using the hand pump.
- b. Install the micro switch using screws, washers and nuts.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- b. Disconnect the connections to the vent door actuator and label for reinstallation.
- c. Remove the bolt, washer and nut from the crank and slide the actuator arm out of the crank.
- d. Remove the bolt, washer and nut from the base pivot bracket on the actuator. Remove the cylinder.
- e. To remove the cylinder base from the cylinder, remove the bolts and the nuts, and remove the plate.

**3. Installation**

- a. Depressurize the cargo door hydraulic system and deactivate it by pulling the appropriate circuit breakers in the main panels.
- b. Install the top of the interlock actuator along with the lever into the vent door bracket. Then use the fasteners to secure the bracket.
- c. Reconnect the vent door hinge with the appropriate fasteners (MS20470 Rivets).
- d. Install the bell crank assembly so that the 2 adjoining levers fit in the appropriate slots. Use the pin, washer and the cotter pin to connect the levers to the crank.
- e. Align the center of the bell crank with the holes in the braces and the slide pin into place. Test the assembly by hand to insure proper operation.
- f. Then remove the pin enough to install the washers and then push the pin all the way in and add the cotter pin.

**4. Installation, Vent Door Actuator**

- a. Add the cylinder base to the cylinder assembly, with the bolts and nuts.
- b. Slide the top of the base into the base pivot bracket and connect with bolt, washer, and nut.
- c. Connect activator arm to crank with bolt, washer and nut.
- d. Hand test the vent door to insure proper operation.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

- a. Deactivate the cargo door electrical system by pulling the appropriate circuit breakers in the main panels.
- b. Remove the wires to the micro switch and insulate to prevent shorting, also label them for easy reinstallation.
- c. Remove the jam nuts and then the micro switch.

### 2. Installation

- a. With the cargo door closed and latched install the micro switch and the jam nut.
- b. Adjust the micro switch so that there is 1/32 inch between the plunger base ring and the plunger shoulder. Verify that the micro switch circuit is "Open" with an Ohm Meter.
- c. Install the wires and reset the pulled circuit breakers.
- d. Operate the cargo door several times using electrical power to insure that the switch is operating correctly and it is properly adjusted.

## H. Main Cargo Door Torque Tube

### 1. Removal, Torque Tube Only

- a. Clean any paint or other substances, such as dirt or grease, from the torque tube and remove any nicks or scratches using the crocus cloth or sandpaper. The torque tube must be clean and smooth in order to pass through the various assemblies.

**Note:** If the torque tube is bent or damaged, it may be necessary to remove the complete assembly (all sub-assemblies - 1.A.)

- b. Unlatch the door and prop it open approximately 18 inches.
- c. Remove the bolts, washers and nuts from the cranks and the bushings.
- d. Remove the Torque Tube Indicator Assembly from the torque tube.
- e. Remove the bolts, washers and nuts from the torque tube brackets.

## EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL

- c. Attach the actuating shaft using bolt, nut and washers.

**Note:** The removal/installation of the Vent Door Torque Tube is similar to that described above.

### I. Main Cargo Door Latch Actuator

#### 1. Removal

- a. The door should be in the down position, however it can be just hanging free.
- b. Depressurize the main cargo door hydraulic system, and deactivate the electrical system by pulling the appropriate circuit breakers located in the main panels.
- c. Remove the hydraulic hoses from the actuator and install the hoses or caps on the actuator. Label the hoses removed from the actuator for easy reinstallation.
- d. Remove the bolt, washer and nut from the arm.
- e. Remove the bolt, washer and nut from the bracket.

#### 2. Installation

- a. Install the actuator onto the door mounted bracket using the bolt, washer and nut.
- b. Attach the actuator arm to the torque tube bracket, using the bolt, washer and nut.
- c. Install the hydraulic hoses to the cylinder and bleed air from the system, using the manual pump.

### J. Main Cargo Door "Gang Bar" Actuator

#### 1. Removal

- a. The cargo door can be in any position to remove the "Gang Bar" actuator.
- b. Depressurize the cargo door hydraulic system, and deactivate the main cargo door electrical system by pulling the appropriate circuit breakers from the main panel.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

- d. Remove the bolts, washers and nuts and then the bracket cap to free the gang bar.
- e. Remove the bolts, washers and nuts and then the bracket cap to free the gang bar.
- f. If removing the gang bar is still difficult, remove fasteners to take off the lock pin brackets.

2. Installation

- a. Be sure that the bar is facing the correct direction and place it in the bracket and be sure that the bushings are in position.
- b. Be sure to have the bar clean of any debris of nicks and scratches.
- c. Place the bracket caps on the bracket and install with bolts, washers and nuts.
- d. Align the lock pin bracket on the bar to the appropriate lock pin assemblies. Then install using bolts, washer and nut.
- e. Install the bolt, washer and nut and adjust the connection appropriately to assure the proper operation of the system.
- f. Operate the door a few times to assure correct operation.

**L. Main Cargo Door Lock Pin**

1. Removal

- a. The lock pins can be removed in any configuration of the door.
- b. Be sure that the electrical system is deactivated by pulling the appropriate circuit breakers.
- c. Remove the pin and the wire from the bolt. Then remove the bolt, washer and nut.
- d. Remove the lock pin through it's supports and assembly.

2. Installation

- a. Slide the lock pin through the supports and the assembly.
- b. Install the bolt, washer and nut, wire these fasteners shut.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

c. Remove the screws, washers and nuts.

2. Installation

a. Install the micro switch using screws, nuts and washers.

b. Remove the insulation and labels from the wires and connect to the micro switch.

c. Reset the pulled circuit breakers in the main panel.

d. Adjust the micro switch to give a proper reading when the door is activated.

**O. Main Cargo Door Latch Pin Micro Switch**

1. Removal

a. Deactivate the electrical system for the cargo door by pulling the appropriate circuit breakers on the main panels.

b. Disconnect the wires to the switch and insulate to protect from shorting.

c. Remove the screws, washers and the nuts.

2. Installation

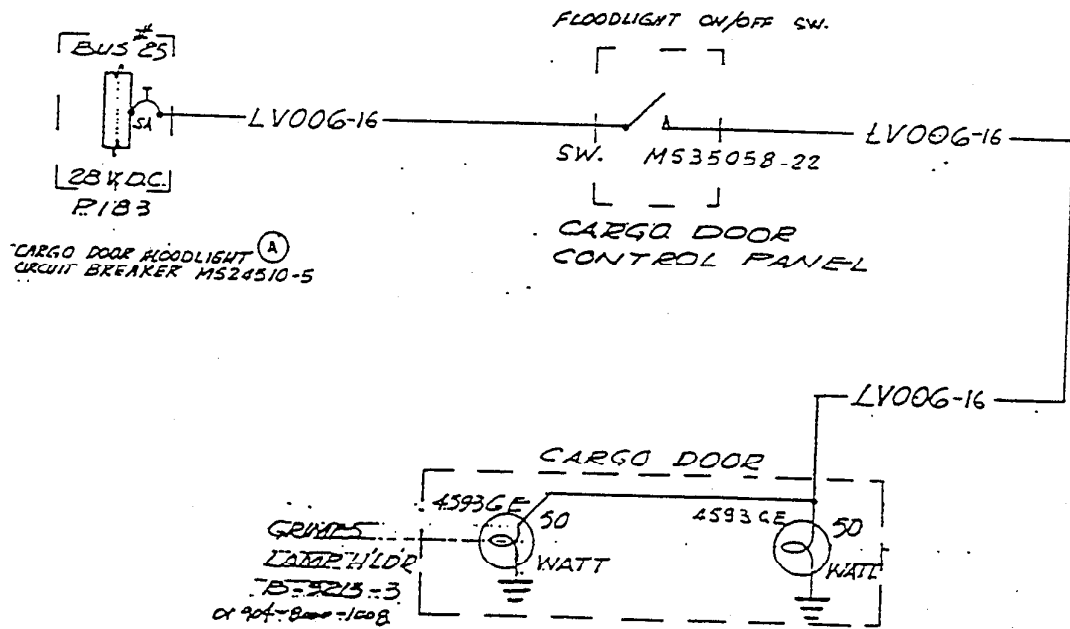
a. Position the micro switch with the latch pin engaged and fully extended.

b. Install the screws, nuts and washers. Adjust the switch with an Ohm meter. The switch should be open when the pin is fully extended.

c. Reset the circuit breaker on the main panel to reactivate the electrical system for the cargo door.

d. Operate the system through several cycles to determine if the switch is operational. No further testing is required.

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**



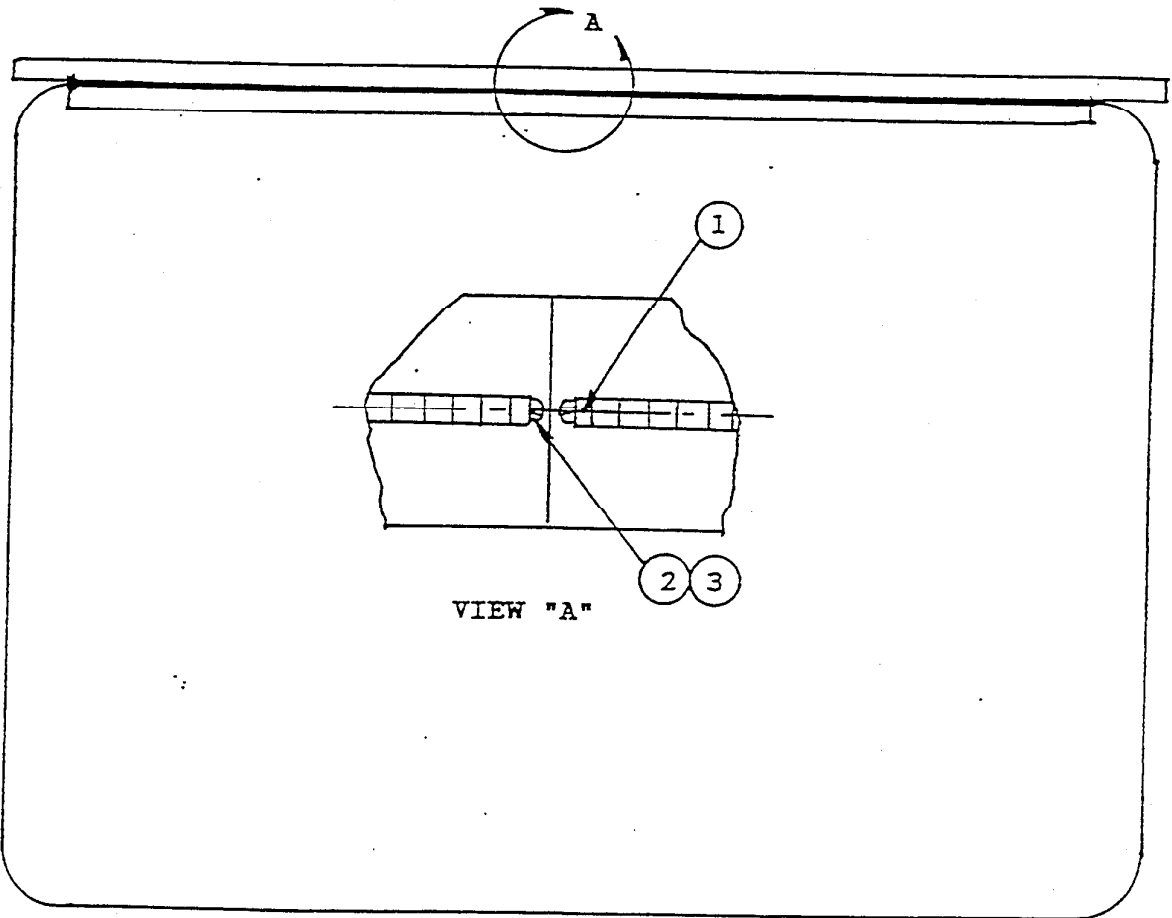
WIRING DIAGRAM FOR CARGO DOOR FLOOD LIGHT

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

**XVIII. B-727 AERONAUTICAL ENGINEERS INC. CARGO DOOR ILLUSTRATED PARTS  
CATALOG**

CARGO DOOR HINGE ASSEMBLY

ITEM	DESCRIPTION	PART NO.	QTY.
1	Hinge Pin	MS20253	3
2	Washer	AN960-10L	6
3	Nut	MS20365-1032A	6





**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

MAIN CYLINDER ASSEMBLY

ITEM	DESCRIPTION	PART NO.	QTY.
1	Cylinder Assembly (Ref.)	AE2428-100	2
2	Cylinder	C3x7-2-3 4JL	2
3	Pivot Block	AE4664-11	2
4	Pivot Mount Assembly	AE2427-100	2
5	Elbow Universal 90°	AN776-4	4
6	Bolt Universal	AN775-4	2
7	Bolt Restrictor	AE4301-100	2
8	O-Ring	NAS1612-4	8
9	Bolt	NAS1312-25H	2
10	Bolt	AN8-11A	8
11	.050 Safety Wire	-----	2

(Parts list is for 2 cylinder assemblies)

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

MAIN ACTUATOR SUPPORT ASSEMBLY

ITEM	DESCRIPTION	PART NO.	QTY.
1	Cotter Pin	AN380-3-4	3
2	Washer	AN960-1016	2
3	Bolt	NAS6203-20	2
4	Nut	MS21044-1018A	2
5	Washer	AN960-1016	2
6	Shaft	AE3522-11	1
7	Support	AE3521-100/-200	1/1
8	Shaft	AE3522-12	1
9	Retainer	AE3522-14	1
10	Bolt	NAS1108-11	12
11	Bolt	NAS6203-20	12
12	Nut	MS20364-820	12
13	Washer	AN960-816L	12

(The parts list is for one support assembly only.)

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

CYLINDER AND LINKAGE FOR CARGO DOOR

ITEM	DESCRIPTION	PART NO.	QTY.
1	Nut	AN310-12	4
2	Cotter Pin	AN381-4-26	4
3	Washer	AN960-1016	4
4	Clevis Bolt	AN32-50	4
5	Link Assembly	AE4703-100	4
6	Shaft	AE4664-12	4
7	Shaft	AE3522-12	2
8	Link Assembly	AE4703-200	4
9	Cylinder Assembly	AE2428-100	2
10	Cotter Pin	AN380-3-4	6
11	Washer	AN960-1016	4
12	Shaft	AE3522-11	2
13	Retainer	AE3522-14	2
14	Roll Pin	3/16 x 2	4

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

CYLINDER LIMIT SWITCH

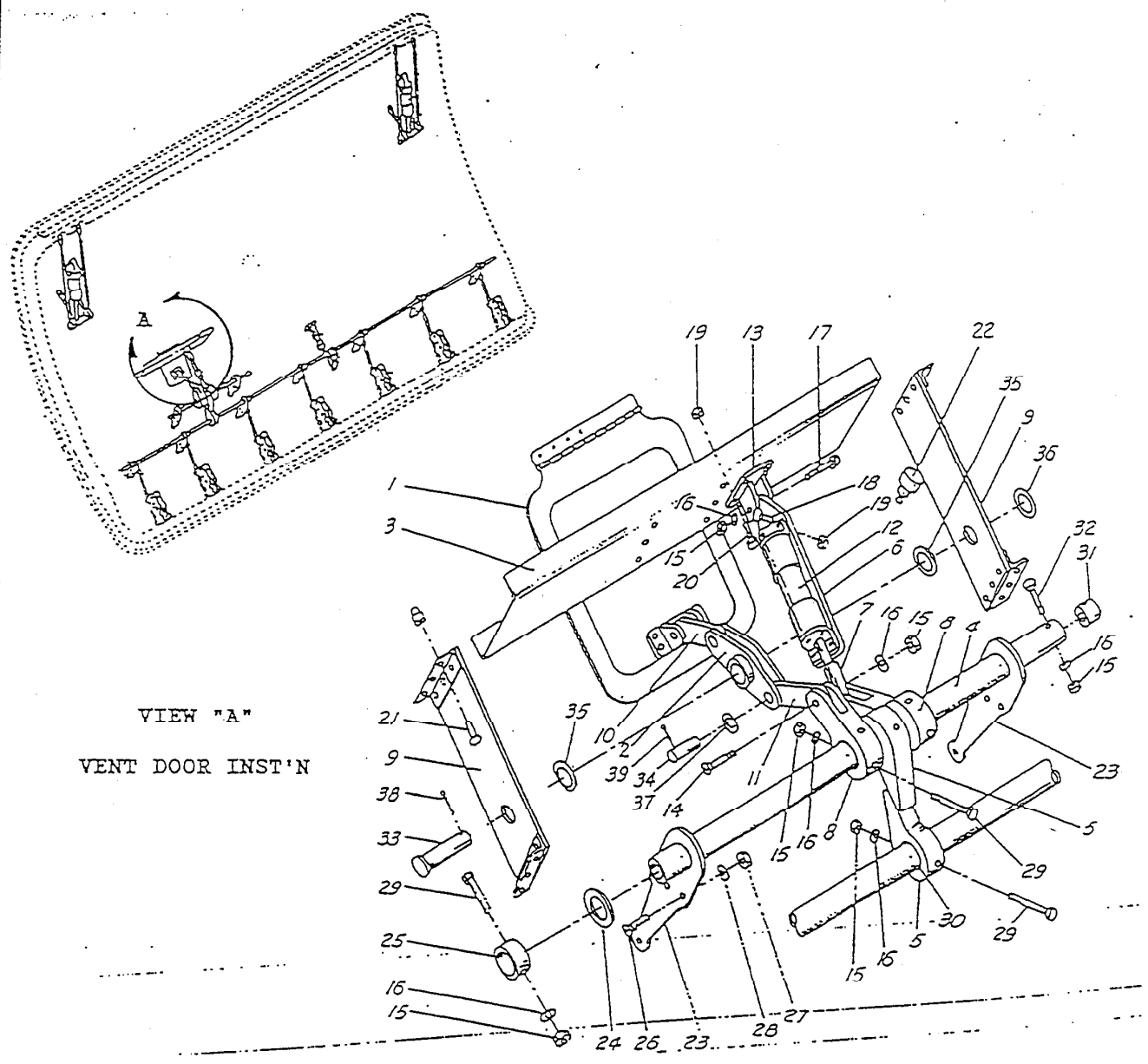
ITEM	DESCRIPTION	PART NO.	QTY.
1	Upper Beam	-----	--
2	Inner Skin	-----	--
3	Support Bracket	AE4702-100	4
4	Cylinder Assembly	AE2428-100	2
5	Nut	MS20365-1032A	2
6	Washer	AN960-10	2
7	Plate	AE737-3-020-11	1
8	Rivet	MS20470AD6	2
9	Miniature Enclosed Switch	914 CEI-3	1
10	Screw	AN526-1032R	2

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

VENT DOOR INSTALLATION

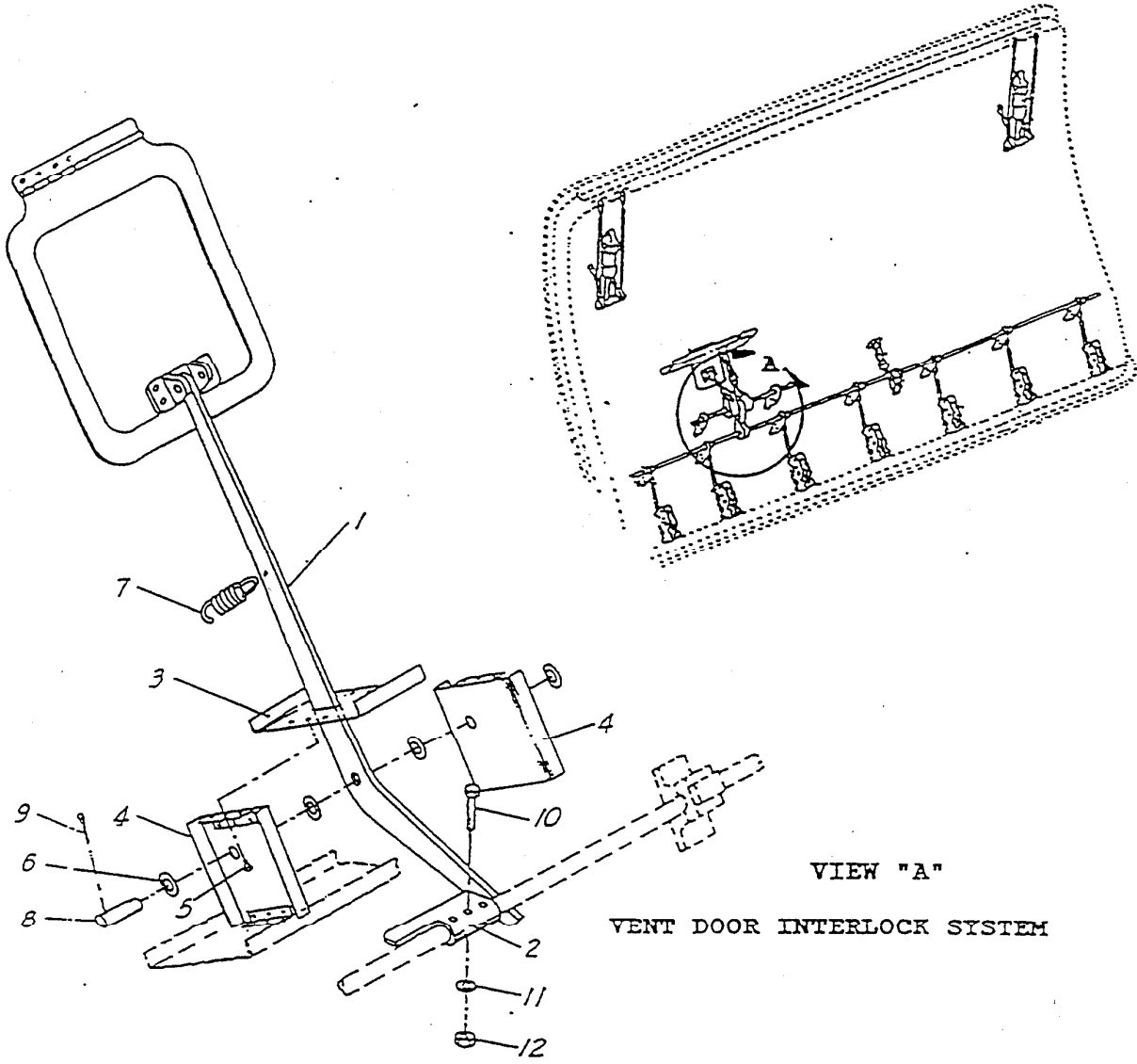
ITEM	DESCRIPTION	PART NO.	QTY.
1	Vent Door Assembly	AE48855-100	1
2	Bell Crank Assembly	AE4856-100	1
3	Cylinder Mount	AE4856-11	1
4	Tube	AE4856-12	1
5	Stop	AE4856-13	2
6	Cylinder Base	AE4856-13	2
7	Rod Clevis	AE4856-15	1
8	Crank	AE4911-11	2
9	Brace	AE4856-16	3
10	Lever	AE4856-17	1
11	Lever	AE4856-18	1
12	Cylinder Assembly	AE4871	1
13	Base Pivot Bracket	704260, Oildyne	1
14	Bolt	NAS1204-16	3
15	Nut	MS20365-426A	12
16	Washer	AN960-416	12
17	Bolt	NAS1204-20	1
18	Bolt	NAS1103-7	4
19	Nut	NAS1021	8
20	Bolt	NAS1103-9	4
21	Hi-Lock Fastener	HL11V70-6	66
22	Micro Switch	21EN9-6	1

EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL



VIEW "A"  
VENT DOOR INST'N

EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL



**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

CARGO DOOR LATCHING AND OPENING

ITEM	DESCRIPTION	PART NO.	QTY.
1	Nut	MS20365-428A	4
2	Washer	AN960-416	4
3	Bolt	NAS1204-16	1
4	Shaft Assembly	AE2930-100	1
5	Bolt	NAS1104-32	3
6	Bushing	AE2391-14	1
7	Spacer	AE2391-13	2
8	Support Assembly	AE4912-100	1
9	Crank	AE4911-11	1
10	Bolt	NAS1205-10	1
11	Washer	AN960-516	1
12	Nut	NAS679 A5	1
13	Torque Tube	AE2391-11	1

(The parts list above is only for one latch assembly)



**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

TORQUE TUBE CYLINDER

ITEM	DESCRIPTION	PART NO.	QTY.
1	Nut	AN365-1032A/NAS679	12
2	Washer	AN960-10	12
3	Bracket Assembly	AE2932-100	1
4	Washer	AN960-816L	1
5	Nut	AN364-820	1
6	Bolt	NAS1103-6	12
7	Bolt	NAS1108-20	1
8	Cylinder, Oildyne	AA 1½ x5-2-1 4ML	1
9	Washer	AN960-1016	1
10	Nut	MS20365-1018A	1
11	Washer	AN960-416	9
12	Nut	MS20365-428A	9
13	Rod End Bearing	ART 10NMB Corp.	1
14	Bracket Assembly	AE2938-100	1
15	Bolt	NAS1104-3	6
16	Bolt	NAS1110-16	1
17	Bolt	NAS1104-26	3

<b>EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL</b>
---

CARGO DOOR "GANG BAR" ACTUATOR

ITEM	DESCRIPTION	PART NO.	QTY.
1	Screw	NAS517-3	4
2	Washer	AN960	4
3	Nut	AN315-3	4
4	Bolt	AN3	2
5	Nut, Self-Locking	MS20365	2
6	Washer	AM960	2
7	Bolt	AN3-6A	6
8	Nut	MS20365-1032	6
9	Washer	AN960-10	6
10	Bracket	AE4823-12	1
11	Plate	AE4822-11	1
12	Bracket	AE4823-11	1
13	Bolt	AN6	1
14	Washer	AN960	1
15	Nut	AN316	1
16	Union	AE4832	1
17	Cylinder Assembly	AE4705-100	1

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

SLIDE TUBE BEARING and BUSHING ASSEMBLY

ITEM	DESCRIPTION	PART NO.	QTY.
1	Slide Tube Bracket	AE4826-11	1
2	Slide Tube Bushing	AE4826-13	1
3	Bracket Cap	AE4826-12	1
4	Screw	NAS517-3	4
5	Screw	MS24694-C13	6
6	Washer	AN960-10	6
7	Nut	MS21042-08	6
8	Nut	AN315-3	4
9	Washer	AN960	4

(Parts list above is for only 1 bracket, not all of them)

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

LOCK PIN INSTALLATION

ITEM	DESCRIPTION	PART NO.	QTY.
1	Bolt	AN3	2
2	Washer	AN960	2
3	Nut, Self-Locking	MS20365	2
4	Bolt	AN179	2
5	Washer	AN960-10	2
6	Nut	MS20365-1032	2
7	Attach Plate	AE4820-11	1
8	Lock Pin Plate	AE4821-11	1
9	Pin Bearing & Bushing	AE4825-11/-12	2
10	Pin	MS16562	1
11	Bolt	AN3H-C10	1
12	Washer	AN960-C4	1
13	Nut	AN310-C3	1
14	Lock Pin	AE4828-11	1
15	Screw	NAS517-1032	4
16	Washer	AN960	4
17	Nut	AN315-3	4

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

SHAFT ASSEMBLY FOR CARGO DOOR LATCHING

ITEM	DESCRIPTION	PART NO.	QTY.
1	Torque Tube	AE2391-11	1
2	Crank	AE4911-11	1
3	Nut	MS20365-428A	4
4	Washer	AN960-416	4
5	Bolt	NAS1104-32	2
6	Bolt	NAS1204-16	1
7	Support Assembly	AE4912-100	1
8	Shaft Assembly	AE2930-100	1
9	Bolt	NAS1104-16	1
10	Latch	3361150 DACO	1

(This parts list is for only one latch, not all seven.)

<b>EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL</b>
---

CARGO DOOR LATCH ASSEMBLY

ITEM	DESCRIPTION	PART NO.	QTY.
1	Lever	4402808-3	1
2	Bushing	1365225	2
3	Fitting	AN933-101	1
4	Washer	2483076	1
5	Bolt	2329528-50	1
	Washer	AN960-816	1
	Nut	AN320-8	1
6	Cam	2363572	1
7	Bolt	AN4-6	1
	Washer	AN960-416L	1
	Nut	AN320-4	1
8	Link Assembly	2361130-4	1
9	Fitting	NAS2-103	1
10	Bushing	NAS77A10-23	4
11	Bolt	NAS464-7-24 Mod.	2
12	Spacer	3361150-4	2
	Nut	AN320-7	2
	Hook Assembly	4402777	1
13	Hook	4402777-3	1
14	Fitting	AN944-103	1
15	Bushing	NAS77A14-62	2
16	Bolt	2329530-52	1
17	Spacer	3361150-2	1
	Washer	AN960-1016	1
	Nut	AN320-10	1
18	Base	3402706	1

<b>EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL</b>
---

CARGO DOOR LATCH ASSEMBLY (ALTERNATE)

ITEM	DESCRIPTION	PART NO.	QTY.
1	Base Plate	AE5001-11	1
2	Hook	AE5002-11	1
3	Lever	AE5003-11	1
4	Link	AE5004-11	1
5	Cam	AE5005-11	1
6	Spacer	AE5006-11	1
7	Spacer	AE5006-12	2
8	Special Washer	AE5007-11	1
9	Bushing	AE5008-11	2
10	Bushing	NAS77A14-62	2
11	Bushing	NAS77A10-23	4
12	Fitting (Grease)	MS15001-4	1
13	Fitting (Grease)	MS15001-2	1
14	Fitting (Grease)	MS15001-1	1
15	Bolt	NAS6210-44	1
16	Bolt	NAS6208-44	1
17	Bolt	NAS6207-17	2
18	Bolt	AN4-6	1
19	Nut	AN320-10	1
20	Nut	AN320-8	1
21	Nut	AN320-7	2
22	Nut	AN320-4	1

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

CARGO DOOR POSITION INDICATOR

ITEM	DESCRIPTION	PART NO.	QTY.
1	Glass	AE4181-11	1
2	Retainer	AE4182-11	1
3	Inner Skin	-----	--
4	Miniature Enclosed Switch	914 CEI-3 Switch	1
5	Nut	MS20365-1032A	5
6	Washer	AN960-10	3
7	Screw	AN526-1032R	3
8	Position Indicator Assembly	AE2933	1
9	Bolt	NAS1103-8	1



**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

MICRO SWITCH MOUNTING ON LATCHES #1 & #7

ITEM	DESCRIPTION	PART NO.	QTY.
1	Mounting Plate	AE5046-11	1
2	Mounting Plate	AE727-2-014-11	1
3	Micro Switch Assembly	AE4888-100	1
4	Screw	MS24694C13	3
5	Nut	MS21042-08	3
6	Washer	AN960-10	5
7	Screw	MS51958-10	2
8	Nut	MS21042-3	2

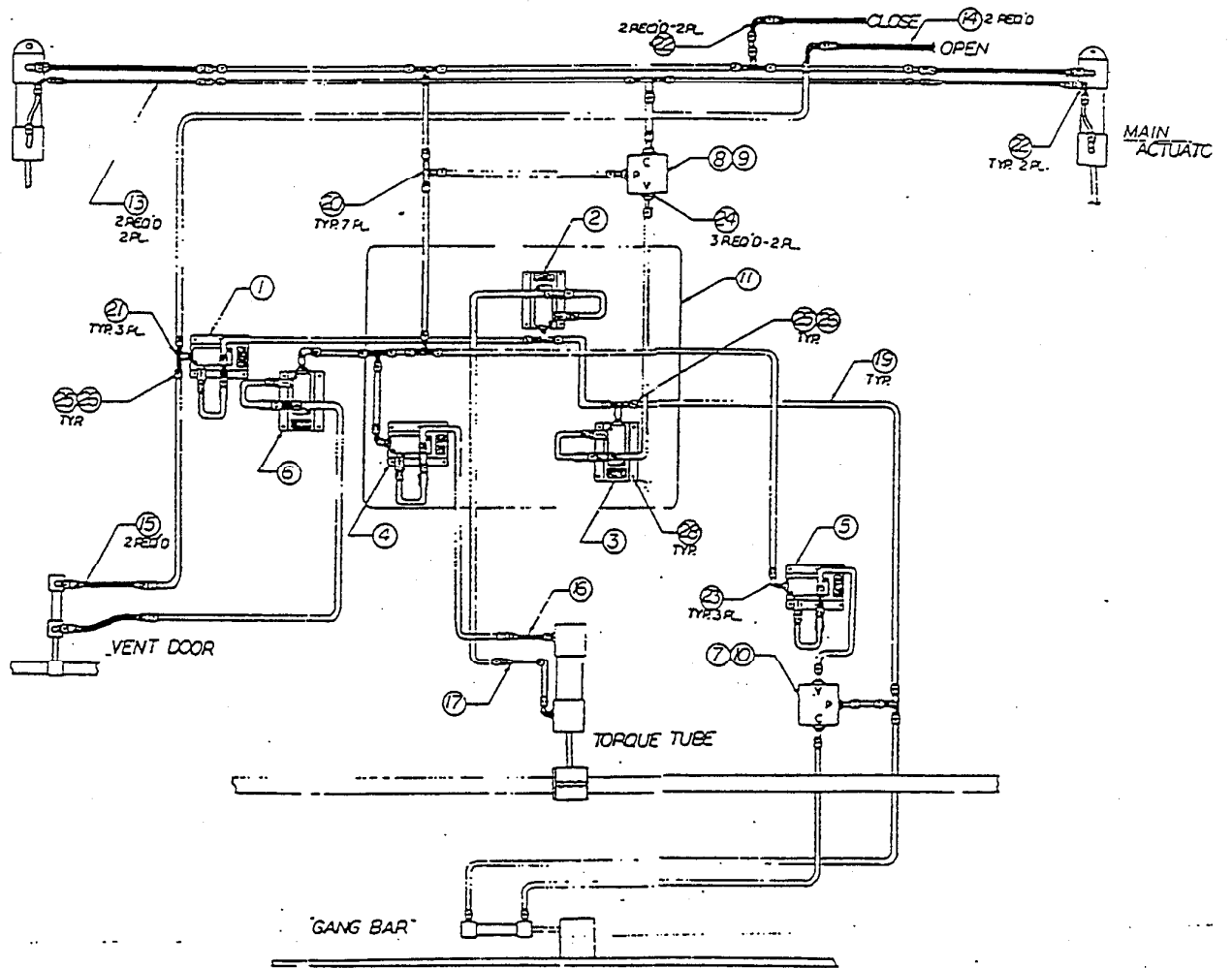
(This parts list is for one Micro Switch installation.)

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

**CARGO DOOR HYDRAULIC SYSTEM INSTALLATION WITH COLL. LOCKING INSTALLED**

ITEM	DESCRIPTION	PART NO.	QTY.
1	Manifold Assembly	AE4895-100	1
2	Manifold Assembly	AE4895-200	1
3	Manifold Assembly	AE4895-300	1
4	Manifold Assembly	AE4895-400	1
5	Manifold Assembly	AE4895-500	1
6	Manifold Assembly	AE4895-600	1
7	Holding Valve	AE4431-100	1
8	Holding Valve	AE4531-100	1
9	Holding Valve Support	AE5036-12	1
10	Holding Valve Support	AE5036-13	1
11	Valve Mounting Plate	AE4743-11	1
12	Clip	AE4868-11	40
13	Hose Assembly (Aeroquip)	AE2460000E-0150	4
14	Hose Assembly (Aeroquip)	AE2460000E-0300	2
15	Hose Assembly (Aeroquip)	Ae2460000E-0110	2
16	Hose Assembly (Aeroquip)	AE4036E0100-000	1
17	Hose Assembly (Aeroquip)	AE4036E0160-000	1
18	Hydraulic Fluid	MIL-H-5606	3 Gal.
19	Tubing, ¼" Dia., Type 304A, MIL-T-8504/6, 5052-0		A/R
20	Tee	AN824-4	7
21	Tee	MS20825-4	3
22	Elbow (90°)	AN821-4	6

# EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL



**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

HYDRAULIC PANEL

ITEM	DESCRIPTION	PART NO.	QTY.
1	Panel	AE4264-11	1
2	Hydraulic Tank	AE4194-100	1
3	Motor Pad	AE4919-11	2
4	Selector Valve Support	AE4259-11	1
5	Hand Pump Holder	AE4260-11	1
6	Hand Pump Holder	AE4260-12	1
7	Motor AC Aircraft, Westinghouse (Alternate EEMCO D1102-2)	906D807-5	1
8	Hydraulic Pump, 3000 PSI (For Skydrol Stratopower - 65W01008)	AE4890-100	1
9	Filter (BAC10-60595-1 for Skydrol)	MS28720-6	2
10	Panel for Hand Pump	AE4869-11	1
11	Clamp Assembly	AE4352-100	2
12	Placard	AE4323-12	1
13	Placard	AE4323-13	1
14	Placard	AE4323-15	1
15	Placard	AE4323-48	1
	Skydrol --	AE4323-59	
16	Selector Valve	AE4874-100	1
17	Hand Pump, Teledyne, Republic (Skydrol)	915-8D27 915-8D57	1
18	Check Valve	AN6249-4	1
19	Relief Valve, 3000 PSI	AE4374-1600	1

**EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL**

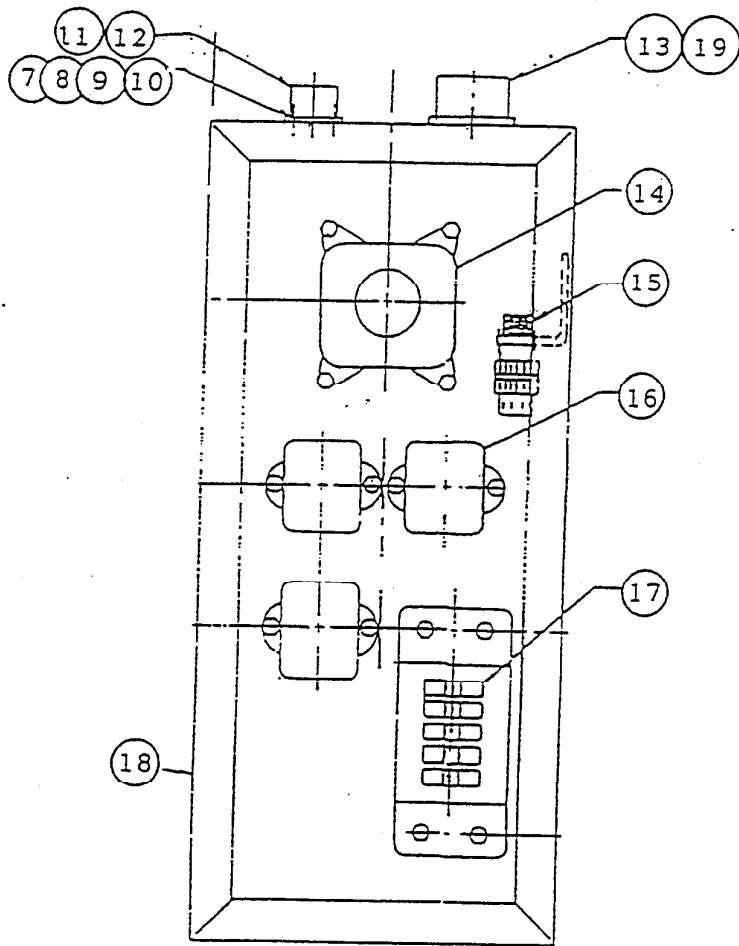
ITEM	DESCRIPTION	PART NO.	QTY.
42	Nut	MS20365-428A	10
43	Spacer	NAS43DD4 or Equiv.	4
44	Spacer	NAS43DD3 or Equiv.	2
45	Rivet	MS20470AD6	8
46	Rivet	MS20426AD3	16

<b>EMERY WORLDWIDE AIRLINES AIRCRAFT MAINTENANCE MANUAL</b>
---

CONTROL & RELAY BOX ASSEMBLY

ITEM	DESCRIPTION	PART NO.	QTY.
1	Cargo Door Warning Light, Korry	MVI-3	1
2	Up-Down Toggle	MS24523-27	1
3	Master Power Switch	MA27752-1	1
4	Placard	AE4879-14	1
5	Cover	AE4879-12	1
6	Warning Lights, Leecraft	Leecraft	5
7	Nut	AN365-4	12
8	Screw	AC515-AR6	12
9	Washer	AN935-4	A/R
10	Washer	AN960-4	12
11	Plug (F)	MS24264R16B-24SN	1
12	Plug (M)	MS24266R16824PN	1
13	Plug (M)	MS24266R18B14SN	1
14	Relay, Hartman Elect.	BR-138DE	1
15	Plug	MS24266R12012SN	1
16	Relay	AN3311-2	3
17	Diode, Int'l Rectifier	IN1084/5	5
18	Box	AE4879-11	1
19	Plug (F)	MS3106B24-105	1

EMERY WORLDWIDE AIRLINES  
AIRCRAFT MAINTENANCE MANUAL



CONTROL & RELAY BOX ASSEMBLY

C-3

**EMERY WORLDWIDE AIRLINES  
MAINTENANCE AUTHORIZATION**

Task Code N/A

Number AC-2521-02:02 Priority D Author Richard F. Morano

Title Lower Cargo Compt. Net Fabrication Specification

Subject Standardization of cargo restraint netting for A, B, C, and D lower cargo  
compartments.

Equipment/Aircraft Affected None

Drawing #'s Attached EW-A252101-00, EW-A252102-00, A252103-00

Manuals Affected IPC

Est. Man Hours 10 hrs/net

**WEIGHT AND BALANCE CHANGES**

	Station	Arm	Pounds
Add	N/A	N/A	N/A
Remove	N/A	N/A	N/A
Net Gain/Loss	N/A	N/A	N/A

<p><u>Special Notes:</u> Effect on Aircraft weight and balance is negligible.</p> <p><u>Reference:</u> FAA Form 8110-3 approval attached.</p>	<p><u>Work Accomplished</u></p> <p>Aircraft: _____</p> <p>Date: _____</p> <p>Station: _____</p> <p>Accomp. by: _____</p>
---	--

Approved by [Signature]

Date 12-13-96

Approved by [Signature]

Date 12-13-96

FAA Acceptance N/A

Date \_\_\_\_\_





**RASIP FINDING****2.18.01**

**A. P1P15790** Net had only two fittings attached on the 88" side.

Finding does not state if fittings were missing or broken. Could have come loose during offload.

Conclusion: No finding.

AAA30198DB Cracks and holes in frame.

Conclusion: Finding.

AAA30830 Cracked corner.  
Per OEM specifications, cracked corners are classified as minor damage and the container can be used at 75% of rated weight capacity or 9,975 lbs. (Copy of OEM attached.) Cargo in the containers weighed 3,745 lbs.

Conclusion: No finding.

**I.**

<b>N2674U ULD NO.</b>	<b>Flt 3 Inbound Feb 4, 1999 KDAY</b>	<b>DC-8 ALM Ref.</b>
AAA3778EB	Tear fiberglass skin (two places) and cracked edge rail.	Page 9, 9-10 Par. 3(e), 5(c)
AAA4686	Holes and punctures shell.	Page 9-9 Par. 3 (e)
AAA1365	Cracked and separated edge rail.	Page 9-10 Par. 5 (c&e)
AAA1478	Cracked and separated edge rail.	Page 9-10 Par. 5 (c&e)
PAG17870	Unsecured cargo protruding the net assembly.	25.1301
AAA31504	Cracked edge rail. Cracked corner.	Page 9-10 Par. 5 (c)
<b>J. N997CF</b>	<b>Flt Inbound Feb 4, 1999 EWR</b>	<b>DC-8 ALM Ref.</b>
P1P6171EB	Two corners cracked.	Page 9-11 Par. 3(c)
<b>K. N994CF</b>	<b>Flt EB 107 Feb 2, 1999 KDAY</b>	<b>DC-8-62</b>

Sill Guards	Sill guards were stowed on right side of pallet in Position 1.	25.1301
PAG17954JG	Loose net.	Page 9-12 Par. 4 (a)
PAG0002JG	Only four restraints attached on 125" side.	Page 9-12 Par. 4 (a)
AAA3630EB	Curtain net only four vertical straps were attached.	Page 9-9 Par. 4
AAA2593EB	Curtain net only four vertical straps were attached, and cargo was falling out.	Page 9-9 Par. 4
AAA30459EB	Curtain net was not attached to side stud.	Page 9-18
PAG15658JG	Net had unapproved repair with a "D" ring. Net was loose with unrestrained cargo. Pallet had a cracked corner.	Page 9-11 Par. 3 (c)
<b>L. N606AL</b>	<b>Flt EB 027 Feb 2, 1999</b>	<b>DC-8-73F</b>
Sill guards	Sill guards were stowed for flight on the right side of pallet position 1 unrestrained.	25.1301
PAG15333JG	Bent pallet and net did not have a TSO Tag	Page 9-12 Par. 4(a)
AAA1085EB	Curtain net only had four vertical restraint straps attached.	Page 9-9 Par. 4
AAA3034EB	Large rip in lexan panel.	Page 9-19 Major
AAA4397EB	Curtain net vertical and horizontal straps were torn or missing. Right aft base sheet corner was missing.	Page 9-9 Par. 4
AAA30283EB	Aft extrusion to base fitting cracked. Lexan was torn and attachment rivets were missing.	Page 9-17
AAA3994EB	Curtain net vertical and horizontal straps were torn or missing.	Page 9-9 Par. 4
AAA4714EB	Curtain net tied with rope, and right front corner extrusion was broken.	Page 9-9 Par. 4
AAA1637EB	Curtain net vertical and horizontal straps were torn or missing.	Page 9-9 Par. 4
AAA1065EB	Forward left corner weld cracked at base sheet.	Page 9-10 Par. 5(c)

AAA1084EB	Cargo falling out of ULD.	25.1301
AAA4346	Aft side extrusion at base has a cracked weld.	Page 9-10 Par. 5 (c&e)
P1P014652JG	Cargo over hanging pallet, and unrestrained. On 88" side only one net attached fitting was attached. Net frayed and had unapproved repairs. No TSO tag.	Page 9-12 Par. 4 (a)

<b>M. N796FT</b>	<b>Flt EB 115 Feb 3, 1999 KDAY</b>	<b>DC-8-63F</b>
Sill guard	Sill guard was lying loose between pallet position 1 and 2.	25.1301
PAG15646JG	Net was frayed.	Page 9-12 Par. 4 (a)
AAA1504EB	Corner extrusion was broken and fiberglass around extrusion was broken. Curtain net vertical and horizontal straps were broken.	Page 9-10 Par. 5 (c)
AAA4184EB	Base sheet was warped more than 1 ½"	Page 9-10 Par. 5 (b)
AAA30181EB	Rear lexan panel cracked and approximately twenty rivets attaching lexan to extrusion were missing. Extrusion was broken.	Page 9-19 Major
AAA2305EB	Curtain net horizontal straps not attached.	Page 9-9 Par. 4
AAA30461EB	Left side extrusion damaged and detached from base sheet. Fasteners missing and crack in lexan in side panel near damaged extrusion.	Page 9-17
AAA4258EB	Curtain net had four vertical straps attached to base rail, and one horizontal strap damaged.	Page 9-9 Par. 4
AAA2326EB	All four corners of the base sheet were cracked. Curtain net had vertical and horizontal straps missing.	Page 9-10 Par. 5 (c)
AAA4909EB	Right front corner was broken.	Page 9-10 Par. 5 (c)

**RRXA RESPONSE**

**A. P1P15790** Net only had two fittings attached on the 88" side.

Finding does not state if fittings were missing or broken. Could have come loose during off load.

Conclusion: No finding.

**AAA30198DB** Cracks and holes in frame.

Conclusion Finding

AAA30830      Cracked corner

Per OEM specifications cracked corners are classified as minor damage and the container can be used at 75% of rated weight capacity or 9,975lbs. (Copy of OEM attached). Cargo in the containers weighed 3,745lbs.

Conclusion: No finding.

AAA30088EB      Two cracked corners

Per OEM specifications cracked corners are classified as minor damage and the container can be used at 75% of rated weight capacity or 9,975lbs. Cargo in the container weighed 3,820lbs.

Conclusion: No finding.

AAA3028EB      Crack edge rail

Finding does not state size of crack. Three one inch cracks are allowed per rail.

Conclusion: No finding.

**B. AAA31872EB**      Puncture Polycarbonate skin

Finding does not state the size of the puncture.

Conclusion: No finding.

AAA31791EE      Puncture fiberglass shell.

Finding does not mention the size of the puncture.

Conclusion: No finding.

**C. AAA3716EB**      Puncture in fiberglass shell.

Finding does not mention size of puncture.

Conclusion: No finding

AAA3835EB      Two cracks edge rail

Finding does not mention the size of the cracks.

Conclusion: No finding.

**D. N8177U** February 2, 1999

None of the containers listed below were on this flight. All will be shown as no finding.

AAA4808 Crack edge rail and puncture in fiberglass shell.

Finding does not mention size of crack or puncture.

Conclusion: No finding.

AAA30789 Cracked corner

OEM classifies cracked corners as minor damage and the container can be used at 75% of rated weight capacity or 9,975lbs.

Conclusion: No finding.

AAA31870 Cracked corner

OEM classifies cracked corners as minor damage and the container can be used at 75% of rated weight capacity.

Conclusion: No finding.

PAJ11705 No TSO tag. Net had four attach fittings attached on the 125" side.

Conclusion: No finding

**E. PAG15199JG** Net had only four attach fittings attached on the 125" side.

Finding does not state that the fitting was missing. It could have come loose during off load.

Conclusion: No finding.

AAA30072EB Missing fastener at gusset attachment.

Conclusion: Finding

AAA3956 Crack edge rail

Finding does not state size of crack. Three (3) one inch cracks per rail are allowed.

Conclusion: No finding.

AAA32140EB Torn Polycarbonate skin and torn gusset.

Conclusion: Finding

PAG13880AZ Net had only four attach fittings attached on the 125" side.

Finding does not state that the fitting was missing. Could have come loose during off load.

Conclusion: No finding.

AAA30500 Puncture Polycarbonate skin

Finding does not state size of puncture. 12" allowed.

Conclusion: No finding.

AAA30759 Cracked corner

Cracked corners are classified as minor damage and the container can be used at 75% of weight capacity or 9,975lbs. Cargo in the container weighed 3,100lbs.

Conclusion: No finding.

AAA4178 Deflection of floor pan.

Finding does not state the amount of deflection.

Conclusion: No finding.

**F. AAA31647EB** Tear Polycarbonate skin.

Finding does not state the size of the tear.

Conclusion: No finding.

AAA30250 Crack edge rail

Conclusion: Finding

AAA30250 Two cracked corners

OEM classifies cracked corners as minor damage. The container can be used at 75% of rated weight capacity or 9,975lbs. Cargo weighed 4,200lbs.

Conclusion: No finding.



AAA1332EB Cracked (broken) edge rail

Conclusion: Finding

AAA30411 Punctures and tears Polycarbonate skin

Conclusion: Finding

PAG30891 Net only had two attach fittings attached on the 88" side.

Finding does not state that the fittings were missing. They could have come loose during the off load.

Conclusion: No finding.

AAA31912 Cracked corner

OEM classifies cracked corners as minor damage. The container can be used at 75% of rated weight capacity or 9,975lbs. Cargo weighed 3,170lbs.

Conclusion: No finding.

AAA30894 Cracked corners

OEM classifies cracked corners as minor damage. The container can be used at 75% of rated weight capacity or 9,975lbs. Cargo weighed 2,175lbs.

Conclusion: No finding.

AAA30928 Cracked corners

OEM classifies cracked corners as minor damage. The container can be used at 75% of the rated weight capacity or 9,975lbs. Cargo weighed 2,390lbs..

Conclusion: No finding

PAJ01343UA Net had only two attach fittings attached on the 88" side.

Finding does not state that the fittings were missing. They could have pulled loose during the off load.

Conclusion: No finding.

**G. P1P69761** Cracked corner

No manufacturer is mentioned in the finding and this is not an Emery pallet.

Conclusion: Finding

AAA2593 Cracked corner

OEM classifies cracked corners as minor damage and the container can be used at 75% of the rated weight capacity or 9,975lbs. Cargo weighed 1,140lbs.

Conclusion: No finding.

PAG15463JGEB Frayed net several places.

Manufacturer specifications states that a severely frayed net is not airworthy. The finding states frayed.

Conclusion: No finding.

H. AAA4349EB Unapproved components tie down fittings. Manila rope and ring. While the finding is correct the FAR references do not apply.

Conclusion: Finding

AAA4349EB This is the same container as mentioned above. How can there be two findings for the same container on the same flight?

Conclusion: No finding.

AAA4205EB Three of four corners damaged.

Conclusion: Finding

AAA30743EBCracked corner

OEM classifies cracked corners as minor damage. The container can be used at 75% of rated weight capacity or 9,975lbs. Cargo weighed 4,770lbs.

Conclusion: No finding

PAG15106AG Frayed net and only three attach fittings attached on the 88" side.

Manufacturer specifications state that a severely frayed net is not airworthy. The finding says frayed. The finding does not state that the fitting was missing. It could have pulled loose during the off load.

Conclusion: No finding.

AAA3778EB Tear fiberglass skin (two places) and Crack edge rail.

Size of tears and crack not mentioned. Both have damage limits.

Conclusion: No finding.

AAA4686 Hole and punctures shell.

Finding does not mention sizes. 100' sq inches allowable.

Conclusion: No finding.

AAA1365 Crack and separated edge rail

Conclusion: Finding

AAA1478 Crack and separated edge rail

Conclusion: Finding

PAG17870 Unsecured cargo protruding the net assembly.

Conclusion: Finding

AAA31504 Cracked edge rail. Cracked corner.

Cracks are allowed in the edge rail. Cracked corners are not mentioned as an airworthiness concern.

Conclusion: No finding.

J. P1P6171EB Two corners cracked

OEM (copy attached) does not classify cracked corners as an airworthiness concern. The ACLM discourages use of pallets with damaged corners due to delays that can be caused by damaged equipment.

Conclusion: No finding.

K. Sill Guards

Position 1 FAR 25.1301 does not apply to sill guards. Stowage of sill guards in

is not in violation of the EWA Aircraft Loading Manual, Chapter 8, Page 8-1, Section F. (Attached)

Conclusion: No finding.

PAG17954JG Loose net

Reference used does not address loose net.

Conclusion: No finding.

PAG0002JG      Only four restraints attached on 125" side.

Finding does not state that the fitting was missing. Could have pulled loose during off load.

Conclusion: No finding.

AAA3630EB      Curtain net only four vertical straps were attached.

Finding does not state if the strap was missing. Could have pulled loose during off load.

Conclusion: No finding.

AAA2593EB      Curtain net only four vertical straps were attached and cargo was falling out.

Finding does not state that the strap was missing. Could have pulled loose during off load.

Conclusion: No finding.

AAA30459EB      Curtain net was not attached to side stud.

Could have pulled loose during off load.

Conclusion: No finding.

PAG15658JG Net had unapproved repair with "D" ring. Net was loose with unrestrained cargo. Pallet had a cracked corner.

Cargo loaders and supervisors are not repairmen and do not have access to manufacturer repair manuals. The criteria for nets is that there be eighteen attach fittings and in this case there were.

Net loose with unrestrained cargo. The finding does not state if the cargo was just loose on the pallet or falling off the pallet. The net could have pulled loose during the off load.

No manufacturer given for the pallet so we can not comment on the cracked corner.

Conclusion: No finding.

L. Sill Guards Sill guards were stowed on right side of pallet in Position 1. FAR 25.1301 does not apply to sill guards. Stowage of sill guards in Position 1 is not in violation of the EWA Aircraft Loading Manual, Chapter 8,

Page 8-1, Section F. (Attached)

Conclusion: No finding.

PAG15333JG Bent pallet and net did not have TSO tag.

Conclusion: Finding

AAA1085EB Curtain net had only four vertical straps attached.

Finding does not state that the strap was missing. Could have pulled loose during the off load.

Conclusion: No finding.

AAA30340EB Large rip in lexan panel.

Finding does not define large.

Conclusion: No finding.

AAA4397EB Curtain net vertical and horizontal straps were torn or missing. Right aft base sheet corner was missing.

Reference to ACLM 9-9 Par. 4 is for the net. Missing base corners are not an airworthiness concern.

Conclusion: Finding

AAA30283EB Aft extrusion to base fitting cracked. Lexan was torn and attachment rivets were missing.

Conclusion: Finding

AAA3994EB Curtain net vertical and horizontal straps were torn or missing.

Conclusion: Finding

AAA4714EB Curtain net tied with rope and right front extrusion was broken.

ACLM reference applies only to the net.

Conclusion: Finding

AAA1637EB Curtain net vertical and horizontal straps were torn or missing.

Conclusion: Finding

AAA1065EB Forward left corner weld cracked at base sheet.

The ACLM reference does not apply to base corners.

Conclusion: No finding.

AAA1084EB Cargo falling out of ULD.

Finding does not state a reason for the cargo falling out of the ULD.  
Apparently no ULD damage.

Conclusion: No finding.

AAA4346EB Aft side extrusion at base has cracked weld.

This is a reinforcement weld and not part of the OEM specification. Not an airworthiness issue.

Conclusion: No finding

P1P014652JG Cargo overhanging pallet and unrestrained. On 88" side only one net attachment fitting attached. Net frayed and had unapproved repairs. No TSO tag.

Conclusion: Finding

M. Sill Guard Sill guards were stowed on right side of pallet in Position 1. FAR 25.1301 does not apply to sill guards. Stowage of sill guards in Position 1 is not in violation of the EWA Aircraft Loading Manual, Chapter 8, Page 8-1, Section F. (Attached)

Conclusion: No finding.

PAG15646JG Net was frayed  
ACLM reference applies to missing hardware no frays. OEM states severely frayed nets are not airworthy.

Conclusion: No finding.

AAA1504EB Corner extrusion was broken and fiberglass around extrusion was broken. Curtain net vertical and horizontal straps broken.

Conclusion: Finding

AAA4184EB Base sheet was warped more than 1 1/2".

Conclusion: Finding

AAA30181EB Rear lexan panel cracked and approximately twenty rivets missing. Extrusion broken.

Conclusion: Finding

AAA2305EB Curtain net horizontal straps not attached.  
Could have been pulled loose during off load.

Conclusion: No finding

AAA30461EB Left side extrusion damaged and detached from base sheet. Fasteners missing and crack in lexan in side panel near damaged extrusion.

Conclusion: Finding

AAA4258EB Curtain net had four vertical straps attached to base rail and one horizontal strap damaged.

Conclusion: Finding

AAA2326EB All four corners of the base sheet were cracked. Curtain net had vertical and horizontal straps missing.

ACLM reference does not apply to base corners or net. Cracked corners are not an airworthiness concern. Straps cannot be missing.

Conclusion: Finding

AAA4909EB Right front corner weld was broken.

ACLM reference does not apply to cracked corners. Cracked corners are not an airworthiness concern.

Conclusion: No finding.

AAA4397EB Right front corner was broken. Left front corner extrusion was broken. Left aft corner was missing. Curtain net vertical and horizontal straps were missing and not attached.

Conclusion: Finding

P1P7142JG Pallet edge rail to base sheet had four missing rivets. Net was loose and torn. Cargo was unrestrained by net. Net only had three net to pallet fittings attached on 88" side.

Conclusion: Finding

N. PAG2439JG Net was frayed and had broken rope.

Conclusion: Finding

AAA1558EB Right aft corner was broken. Weld on extrusion to base was cracked.

ACLM reference does not apply to base corners. Base corners are not an airworthiness concern. The weld on extrusion to base is a reinforcement weld and not part of OEM specifications and not an airworthiness issue.

Conclusion: No finding



AAA32031EB Lexan panel left side cracked.

Finding does not specify the size of the crack.

Conclusion: No finding.

AAA32222EB Right side lexan panel had a large crack.

Finding does not specify the size of the crack.

Conclusion: No finding.

P1P6395EB Pallet edge rail attachment had several missing rivets.

Finding does not state how many rivets were missing and if they were continuous or not.

Conclusion: No finding.

O. P1P7383JG Rivets missing from edge rail to base attachment.

Finding does not mention the number of missing rivets.

Conclusion: No finding.

AAA30695 Curtain net vertical and horizontal straps missing.

Conclusion: Finding

PAG30528JG Edge rail and pallet bent.

Finding does not state the extent that the pallet and rail was bent.

Conclusion: No finding

AAA2321EB Curtain net missing vertical strap and replaced with rope.

Conclusion: Finding

AAA1014EB      Curtain net only had four vertical straps attached to base rail.

Finding does not state that the vertical strap was missing. Could have pulled loose during off load.

Conclusion: No finding.

AAA30958EB      Corner weld cracked and bent.

OEM does allow cracked corners. (Copy attached)

Conclusion: No finding.

AAA1437EB      Curtain net only four vertical straps attached to base rail.

Finding does not state that strap was missing. Could have pulled loose during off load.

Conclusion: No finding.

AAA4155EB      Curtain net had vertical and horizontal straps missing. Left front corner was broken and extrusion cracked.

Conclusion: Finding

AAA3915EB      Right front corner broken and weld was cracked at extrusion to base.

Base corners are not an airworthiness concern. The cracked weld is a reinforcement weld and not part of OEM specifications and not an airworthiness issue.

Conclusion: No finding.

AAA1725EB      Curtain net vertical and horizontal straps were not attached. Right front corner was broken loose from base.

ACLM reference Page 9-9 Par. 3e pertains to damaged pallet nets and not containers. The finding does not state that the container net was damaged. The fittings could have been pulled loose during off load. Base corners are not an airworthiness concern.

Conclusion: No finding

AAA1656EB Crack in fiberglass shell greater than 12" in left aft corner. Forklift puncture hole in extrusion to base fitting.

Conclusion: Finding

P1P7543JG Net was frayed and only two net fittings were attached to pallet on 88" side.

Conclusion: Finding

P. AAA30495EB Left forward corner was cracked and edge rail was separating from pallet.

Cracked corners are not an issue as these are allowable minor damage per OEM specifications. Obviously the separation of the edge rail was disputed by the Captain of the flight, and the container was found to be airworthy.

Conclusion: No finding.

30410EB Edge vertical flange at back of ULD cracked approximately (8) eight inches.

Conclusion: Finding

3808EB Forward corner broken at fiberglass to edge rail vertical flange attach.

Conclusion: Finding

AAA3264EB Forward corner broken at fiberglass to edge rail vertical flange attach.

Conclusion: Finding

AAA3052EB Automotive/truck differential protruding from forward curtain/net. Curtain/net unable to restrain cargo.

Conclusion: Finding

UNKNOWN Unauthorized repair. A strap was tied to attach fitting instead of sewn.

Without ULD information we are unable to respond to finding.

Conclusion: No finding

Sill Guard Tom Wood

R. AAA9332EB Uncontained cargo. A tie rod assembly weighing approximately fifteen (15) pounds could be lifted from the ULD through the curtain net.

Conclusion: Finding

P1P2177JW Cargo loaded on pallet that was not secured by a net.

Conclusion: Finding

P1P0297NX Plastic sheet was the only restraint on the pallet.

Conclusion: Finding

PAG16128JG Insufficient net to pallet attachments on the 88 inch side.

Conclusion: Finding

S. AAA3385EB Vertical flange edge rail cracked 3 inches.

Conclusion: Finding

AAA3042 The curtain was not secured.

A curtain is just a weather protection and not for securing the cargo. The door net is what secures the cargo.

Conclusion: No finding

AAA4225EB Corner missing.

Missing base corners are not an airworthiness concern. The referenced ACLM reference does not apply to base corners.

Conclusion: No finding

T. Sill Guards Sill guards were stowed on right side of pallet in Position 1.

Position 1  
FAR 25.1301 does not apply to sill guards. Stowage of sill guards in  
is not in violation of the EWA Aircraft Loading Manual, Chapter 8, Page 8-1,  
Section F. (Attached)

AAA4959EB Crack in excess of 12 inches which was repaired with duct tape.

Conclusion: Finding

AAA3046EB Vertical flange securing fiberglass shell to edge rail broken along entire backside of container.

Conclusion: Finding

AAA3046EB Why two violations on the same container on the same flight?

Conclusion: No finding

PAG8832IB Net not serviceable.

Unable to respond since no specific defects were noted.

Conclusion: No finding

AAA2238JG Repair accomplished which were not contained in the repair manual.

This is not an Emery container and as such we are not responsible for the repairs. Also the nature of the repairs are not noted in the finding.

Conclusion: No finding

AAA4959EB This is the second finding for the same container on the same flight. Why?

Conclusion: No Finding

AAA2238EB Forward restraint net is damaged.

This is the second finding for the same container on the same flight. Why?

Conclusion: No finding



U.S. Department  
of Transportation  
**Federal Aviation  
Administration**

San Jose Flight Standards District Office

San Jose International Airport  
1250 Aviation Avenue, Suite 295  
San Jose, CA 95110-1130  
Phone: (408) 291-7681  
FAX: (408) 278-8448

March 18, 1999

**CERTIFIED-RETURN RECEIPT**

Mr. Kent T. Scott  
President and Chief Operating Officer  
Emery Worldwide Airlines  
One Emery Plaza  
Vandalia, OH 45377

Dear Mr. Scott:

File No. 99WP150037

This letter is in response to my action item of our meeting in Los Angeles on March 15, 1999 and to the request received from Mr. Tom Wood, dated March 11, 1999. This letter is further identify the items that pertain to the FAA Letter of Investigation, dated March 4, 1999 sent to you.

This EIR was initiated due to the results of the Western Pacific Regional Aviation Safety Inspection Program (RASIP) conducted February 1 through 5, 1999. During that time frame several aircraft ramp inspections were performed by FAA Inspectors at various locations with unsatisfactory results. It is alleged that EWA operated aircraft under their operational control in an unairworthy condition. Specifically, all the aircraft identified in RASIP finding 2.18.01 were observed to be operated with Unit Load Devices (ULD) not meeting their certification requirements or that of EWA's Aircraft Loading Manual. This may be contrary to the Federal Aviation Regulations.

This letter is to inform you that this matter is under investigation by the Federal Aviation Administration (FAA). We would appreciate receiving any evidence or statements you might care to make regarding this matter within 10 days of receipt of this letter. Any discussion or written statements furnished by you will be given consideration in our investigation and any subsequently prescribed sanction or corrective action. If we do not hear from you within the specified time, our report will be processed without the benefit of your statement.

Sincerely,

A handwritten signature in black ink, appearing to read "N. Pearson", written over a solid black rectangular redaction box.

Nicholas E. Pearson  
Principal Avionics Inspector

cc: Mr. Thomas Wood  
Mr. Rene Visscher



## **RASIP FINDING**

### **2.18.02**

The RASIP team conducted a ramp inspection on DC-8, N-792FT, at the Los Angeles Int'l Airport on 02/02/99. The following items were found and provided to RRXA maintenance personnel for appropriate action.

- A. A terminal strip located in the main cargo compartment at main cargo door opening was not covered, and did not appear to be an approved part. Maintenance personnel made an entry in the aircraft logbook.
- B. Lavatory fluid was leaking. Evidence found on the main cargo deck floor.
- C. Pilots sliding window external operating mechanism decal was missing.

### **2.18.02 RRXA RESPONSE.**

Aircraft N792FT was out of service undergoing a maintenance check at the time of the FAA inspection. EWA considers this to be a no finding.

- A. Resecured cover. See Non-Routine Number 6719-21, Page 3 of 3, Item 11 attached.
- B. Cleaned leak and streak from side of Aircraft. Found Lav donut not properly installed. Removed and replaced Lav donut and serviced as required, no leaks noted. Reference Log Page 6719-20, Item 2 and 3.
- C. Installed a new emergency placard on Captain's side. Reference Non-Routine 6719-21, Page 3 of 3, Item 12.



# EMERY WORLDWIDE AIRLINES NON-ROUTINE MAINTENANCE FORM

LOG PAGE NO.  
**6719-21**

AIRCRAFT NO.	DATE	STATION	TYPE CHECK	PAGE
<b>792 FT</b>	<b>2-2-99</b>	<b>KLAX</b>	<b>TERM. CK.</b>	<b>3 OF 3</b>

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
<b>9</b>	<b>L2 Door inside rubber strips coming loose.</b>	<b>SECURED RUBBER STRIPS</b>	<b>02704</b>
	<b>FAA REPORTED ITEM</b>		<b>INSP</b>
	<b>P/N OFF</b>	<b>S/N OFF</b>	<b>P/N ON</b>
			<b>S/N ON</b>
			<b>POS</b>

X

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
<b>10</b>	<b>Between pos 9 &amp; 10, 4 Bear Traps are installed without rollers (This type can only be used in Bellport area) -</b>	<b>REPLACED 4 PCS BEAR TRAPS AS REQUIRED</b>	<b>02704</b>
	<b>FAA REPORTED ITEM</b>		<b>INSP</b>
	<b>P/N OFF</b>	<b>S/N OFF</b>	<b>P/N ON</b>
	<b>50044-301</b>	<b>NSN 330001</b>	<b>50044-223</b>
	<b>50044-301</b>	<b>HSR3303</b>	<b>50044-1</b>
	<b>50954-305</b>		<b>NSN NSN NSN</b>
			<b>POS 10</b>

sw  
02704  
(29c)

RACIP 2 INSP ~ 18.02 ITEMS  
AAL

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
<b>11</b>	<b>Electrical Terminal block above Cargo Door is unprotected.</b>	<b>RE-SECURED</b>	<b>02704</b>
	<b>FAA REPORTED ITEM</b>		<b>INSP</b>
	<b>P/N OFF</b>	<b>S/N OFF</b>	<b>P/N ON</b>
			<b>S/N ON</b>
			<b>POS</b>

X

2:18.02C

ITEM #	DISCREPANCY	CORRECTIVE ACTION	MECH
<b>12</b>	<b>Capt's Sliding Window outside Emergency opener is not placarded.</b>	<b>INSTALLED NEW EMERGENCY PLACARDS ON CAPT'S SIDE.</b>	<b>00400</b>
	<b>FAA REPORTED ITEM</b>		<b>INSP</b>
	<b>P/N OFF</b>	<b>S/N OFF</b>	<b>P/N ON</b>
			<b>S/N ON NSN</b>
			<b>POS CAPT'S</b>

Q.C.  
10  
RRXA

AIRCR MAINTENANCE LOG

AIR-0082 (10/77) IAW U.S.A.



2.18.02 D

Q.C. 5 RRYA

6719-20

ACFT. NO. N 79285

DC-8-73F

NO.	FLIGHT	DATE	FROM	TO	REG.	TIME	STATUS	REMARKS
1	43	2-2-99	VIA KDAY	0325	0737	4:12	0352	0731 3:39 4433 68.5 21.2 62650 6
2								
3								
4								

NO.	DEPT. DELAY	CODE	LDGS	TRAVEL STATION	AVG	CREW	EMP	T.O.	LDG	CREW	EMP
1	0:16	DM2			2 2 3 2 -	01 KRANTZ	US204	( )			
2	:					02 DANKHA	17770				
3	:					03 MISKOLCZY	57188				
4	:										

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P (M)	Hydraulics need servicing.	1.	Serviced hydraulics as required.	02/03/99	KDAY	75066
2.	P (M)	On FAA ramp check found blue water leaking and streaking from Lav. service port.	2.	Cleaned leak and streak from side of aircraft. Found Lav. donut not properly installed - R/R Lav. donut and serviced as required no leaks noted.	02/03/99	KDAY	75066
3.	P (M)	Notified by HAZ-MAT of non-corrosive oil leak in B pit center of floor.	3.	LIFTED LOWER FLOOR PANELS FOUND BIG RTB/DIE FROM SPILL CLEANED UP BY HAZ-MAT INSTALLED PANELS & SECURED AS REQUIRED	02/03/99	KDAY	11989
4.	P / M		4.				
5.	P / M		5.				
6.	P / M		6.				

PART NOMENCLATURE	PART NUMBER	QTY	REMARKS	DATE	BY	POS.

CHECK C/W TRANSIT CK	STATION: KDAY	26617	1	26618	1-DIST.	2-DIST.	3-DIST.
DATE: 02/02/99	CERT. NO.:	80789.03	339	80792.42			
GMT TIME: 1005Z	AUTH. SIG.:						
DISC. OR MAINT. ACTION CARRIED FWD TO:		BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE:			

31  
51  
500  
VAX 2.18.02 ITEM B



---

## **2.19.00 – MAINTENANCE SPOT INSPECTION**

### **DESCRIPTION:**

This area was not evaluated during the Focused Inspection. The findings in this area were a result of the emphasis placed on the aircraft loading and unloading operations.

### **INSPECTION DATA:**

RRXA maintains a main maintenance base at the James M. Cox Dayton Int'l Airport, Vandalia, OH. The company employs a total of 1,209 personnel including; approximately 380 mechanics. RRXA does not have a hangar facility and performs all line maintenance on the Dayton ramp and the company's 43 line stations. The heavy maintenance and checks are contracted to large repair stations and various maintenance organizations.

## **RASIP FINDING**

### **2.19.01**

During the RASIP inspection RRXA maintenance personnel were observed removing and replacing radar antenna on DC-8 aircraft (N832AL) on Dayton ramp on 02/03/99 without the appropriate maintenance manual procedures available.

FAR 121.367; 121.369;

### **2.19.01 RRXA RESPONSE**

EWA maintenance personnel have the appropriate Maintenance Manual Procedures available to them at all times. This data is located in the maintenance office and on the maintenance vehicles. All maintenance supervisors will brief their mechanics to keep their required technical data readily available when performing maintenance on the aircraft and components. Please see attached letter.

Response to finding from Manager of EWA Avionics Shop/mechanic.

The lead on 02/03/1999 reported to me that he and crew were replacing the WX radar antenna on N832AL. When asked by the FAA Rep if he had paperwork for replacement with him, he stated "No, that Mr. McNulty had told him before that the paperwork need not be with him but available to him." Prior to starting replacement they had reviewed maintenance manual procedures. Rich Morano, who was with the FAA Rep, said to pull back up the Maintenance Manual procedure. WE did so and showed to the FAA Rep. This seemed to satisfy him and he left the area and we finished out the task.

Bruce Wright  
EWA Avionics Manager

EWA considers this to be a no finding.



## MEMORANDUM

**TO:** All Maintenance Managers and Supervisors  
**FROM:** Thomas M. Wood, Director of Quality Control *TW*  
**SUBJECT:** FAA RASIP Inspection 2-2-99  
**DATE:** 04/07/99

---

During the FAA RASIP Inspection performed 2-2-99 FAA Inspectors observed maintenance being performed on aircraft without supporting technical data being readily available at the aircraft.

Please ensure that all mechanics performing maintenance on aircraft or components have supporting data with them.

ajb

CRA MAINTENANCE LOG

Form 0092 (10/97) Litho U.S.A.



2.14.01  
10  
RRXA

6797-07

ACFT. NO. N832AL

PE DC-8-73

48

LEG	FLT	DATE	STATION		GMT		BLOCK HOURS	GMT		FLT. HOURS	FUEL DATA			DE-ICE	CARGO DATA	
			FROM	TO	OUT	IN		OFF	ON		UPLIFT (USG)	DEPART (LBS)	ARRIVAL (LBS)		GALS	CARGO
1	11	02/03/99	KSAN	KTUS	0148	0310	1+22	0208	0304	+56	5300	535	40.4	Ø	34320	1210
2	11	02/03/99	KTUS	KDAY	0402	0728	3+26	0413	0721	3+08	2744	58.2	20.0	Ø	68667	1080
3																
4																

LEG	DEPT. DELAY		TRAIN FLTS.		OIL ADD					A/P	CREW	EMP #	T.O.	LDG	A/P	CREW	EMP #
	DELAY	CODE	LDGS	STATION	1	2	3	4	APU								
1	:				Ø	Ø	Ø	Ø		0/1	R. SATTRO	73292	1	1			
2	:	7	DLI							0/2	J. ESCALANTE	23215	1	1			
3	:									0/3	M. RESULIMA	64292					
4	:																

19.0  
41  
50  
30  
0  
0

NO.	SOURCE	DISCREPANCY	NO.	CORRECTIVE ACTION	DATE	STA	MECH
1.	P/M	#1 & #2 RADAR COME ON, AFTER 30 MINS OF USE, RADAR SHUT DOWN WITH ANTENNA FAILURE WARNING.	1.	Removed and Replaced Weather Radar Antenna Systems Op checks good IAW DC-8 MM.	2-3-99	KDAY	40958
2.	P/M	PALETT LOCK POS. 3 LOOSE MISSING FOOT (FAA RAMP INSP. ITEM)	2.	REMOVED AND REPLACED LOCK ASSY. PER PEMCO COMPONENT M/M	2-3-99	KDAY	14788
3.	P/M	PALETT LOCK MISSING, POS. 4. (FAA RAMP INSP. ITEM)	3.	Installed LOCK ASSY., PER PEMCO COMPONENT M/M.	2-3-99	KDAY	14788
4.	P/M	POSITION 3, LH AFT SIDE GUIDE LOOSE. (FAA RAMP INSP. ITEM)	4.	REPLACED FEET TENSION STUPE) ON LEFT AFT BALL MAT. GUIDE POST SECURED, PER PEMCO COMPONENT M/M.	2-3-99	KDAY	14788
5.	P/M	LEFT OVERWING EXIT-GILL LINER Bent/Loose. (FAA RAMP INSP. ITEM)	5.	Secured LEFT OVER WING FORWARD GILL LINER IAW - EJA CHAPTER 4 M/M.	2-3-99	KDAY	40958
6.	P/M		6.				

AIRWORTHINESS RELEASE		AIRCRAFT TIME / CYCLES				INS READOUT				
CHECK C/W: TCR	STATION: KDAY	PREVIOUS LANDINGS	22910	LANDINGS THIS PAGE	2	TOTAL LANDINGS	22912	1-DIST.	2-DIST.	3-DIST.
DATE: 2-3-99	CERT. NO. [REDACTED]	PREV. A/C FLT. HRS.	79774:31	FLT. HRS. THIS PAGE	4.04	TOTAL A/C FLT. HRS.	79778:35			
GMT TIME: 1053Z	AUTH SIG: [REDACTED]	DISC. OR MAINT. ACTION CARRIED FWD TO:				BOOK CHANGED NEW LOG PAGE NO:		CAPTAIN'S SIGNATURE: [REDACTED]		

