

CHAPTER

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MAINTENANCE MANUAL

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CHAPTER 25 TAB		206	AUG 15/66	207	JAN 15/68	202	MAR 15/59
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CONTENTS 25 ✓		201	JAN 15/60	25- 1- 29 ✓		201	DEC 15/64
1 JUL 31/99		202	BLANK	401	JUL 31/99	202	JUN 15/60
2 JUL 31/99		25- 1- 13 ✓		402	FEB 15/66	203	JUN 15/60
3 JUL 31/99		201	MAR 15/62	403	FEB 15/66	204	JUN 15/60
4 JUL 31/99		202	MAR 15/62	404	JAN 15/70		
5 JUL 31/99		203	JAN 15/60	25- 1- 31 ✓		25- 2- 41 ✓	
6 JUL 31/99		204	BLANK	201	MAY 15/59	201	MAR 15/59
7 JUL 31/99		25- 1- 27 ✓		202	MAR 15/59	202	JUL 15/59
8 JUL 31/99		201	APR 15/68	25- 1- 35 ✓		25- 2- 61 ✓	
9 JUL 31/99		202	APR 15/68	401	JUL 31/99	201	MAR 15/59
10 JUL 31/99		203	MAY 15/65	402	JUL 15/68	202	MAR 15/59
11 JUL 31/99		204	MAY 15/65	403	JUL 15/69	203	NOV 15/59
12 JUL 31/99		205	MAY 15/65	404	BLANK	204	MAY 15/60
13 JUL 31/99		206	BLANK	25- 1- 35 ✓		25- 2- 71 ✓	
14 JUL 31/99		25- 1- 27 ✓		601	JUL 31/99	401	JUL 15/68
15 JUL 31/99		401	APR 15/68	602	JUL 15/68	402	JUL 15/67
16 JUL 31/99		402	APR 15/68	603	JUL 15/69	25- 3- 0 ✓	
17 JUL 31/99		403	APR 15/68	604	BLANK	1	JUL 15/68
25- 1- 0 ✓		404	APR 15/68	25- 1- 41 ✓		2	JUL 31/99
1 FEB 15/66		405	APR 15/68	201	MAR 15/59	3	JUL 31/99
2 DEC 15/64		406	APR 15/68	202	BLANK	4	JAN 15/69
3 JUL 31/99		25- 1- 27 ✓		25- 1- 51 ✓		5	JAN 15/69
4 JUL 31/99		501	MAY 15/65	201	JUL 15/59	6	JAN 15/69
5 APR 15/69		502	MAY 07/74	202	APR 15/60	7	MAR 01/89
6 JUL 15/68		25- 1- 27 ✓		203	APR 15/60	8	MAR 01/89
7 JUL 15/68		601	MAY 15/65	204	OCT 15/67	25- 3- 12 ✓	
8 JUL 15/68		602	BLANK	205	APR 15/60	401	JUL 31/99
9 JUL 15/68		25- 1- 27 ✓		206	OCT 15/67	402	JUL 15/67
10 JUL 15/68		801	MAY 15/65	25- 2- 0 ✓		25- 3- 21 ✓	
11 JUL 31/99		802	MAY 15/65	1	MAR 15/59	401	OCT 15/71
12 JUL 31/99		803	MAY 15/65	2	MAR 15/59	402	OCT 15/71
13 JUL 15/68		804	BLANK	3	MAR 15/59	25- 3- 41 ✓	
14 JUL 31/99		25- 1- 29 ✓		4	MAR 01/89	201	MAR 15/59
15 JUL 15/68		201	JUL 31/99	5	JUL 15/68	202	MAR 15/59
16 JUL 15/68		202	JAN 15/68	6	JAN 15/69	25- 4- 0 ✓	
25- 1- 1 ✓		203	JAN 15/68	7	JAN 15/69	1	MAY 15/59
201 AUG 15/66		204	JAN 15/68	8	BLANK	2	JUL 15/68
202 JUL 31/99		205	JAN 15/68	25- 2- 1 ✓		3	MAY 15/59
203 JUL 31/99		206	JAN 15/68	201	MAR 15/59	4	BLANK
204 JUL 31/99							
205 JUL 31/99							

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25- 4- 11		25- 10- 11		403	OCT 15/68	25- 10- 48	
201 MAY 15/59		201 DEC 15/59		404	OCT 15/68	401 JUL 31/99	
202 JUL 15/59		202 JUL 15/59		405	OCT 15/68		
		203 JUL 15/59		406	BLANK	25- 10- 51	
25- 4- 41		204 MAR 15/59				201 MAY 15/59	
201 MAR 15/59				25- 10- 42		202 MAY 15/59	
202 MAR 15/59		25- 10- 21		201 FEB 15/65			
		201 JUL 15/67		202 FEB 15/65		25- 10- 61	
25- 5- 0		202 JUL 31/99		203 JAN 15/69		201 FEB 15/65	
1 JUL 15/59		203 DEC 15/59		204 DEC 15/65		202 FEB 15/65	
2 MAR 15/59		204 FEB 15/65		205 FEB 15/66		203 FEB 15/65	
3 JUL 15/59		205 DEC 15/59		206 DEC 15/65		204 MAR 15/63	
4 BLANK		206 MAR 15/59		206A DEC 15/65		205 MAR 15/63	
		207 DEC 15/59		206B FEB 15/66		206 FEB 15/65	
25- 5- 11		208 JUL 15/62		206C JUL 31/99		207 MAR 15/63	
201 JUL 15/59		209 AUG 15/66		206D JUL 31/99		208 APR 15/67	
202 MAY 15/59		210 JUL 15/60		207 DEC 15/65			
				208 JUL 31/99		25- 10- 65	
25- 6- 0		25- 10- 22		209 JUR 15/65		401 OCT 15/69	
1 MAR 15/59		201 FEB 15/65		210 FEB 15/66		402 OCT 15/69	
2 BLANK		202 FEB 15/65		210A FEB 15/66		403 APR 15/70	
		203 JUN 15/65		210B FEB 15/66		404 OCT 15/69	
25- 6- 11		204 FEB 15/65		211 JAN 15/69			
201 MAR 15/59		205 JUL 15/67		212 FEB 15/65		25- 10- 69	
202 MAR 15/59		206 JUL 15/67		213 FEB 15/63		401 JAN 15/70	
				214 MAY 15/63		402 APR 15/70	
25- 10- 0		25- 10- 24		215 JAN 15/64		403 JAN 15/70	
1 JUL 15/68		201 FEB 15/65		216 FEB 15/63		404 APR 15/70	
2 FEB 15/65		202 FEB 15/63		217 MAY 15/63			
3 FEB 15/65		203 JAN 15/64		218 MAY 15/63		25- 10- 71	
4 FEB 15/65		204 BLANK				401 JUL 31/99	
5 JAN 15/68				25- 10- 44		402 JUL 31/99	
6 JUL 15/68		25- 10- 25		401 OCT 15/67		403 NUL 31/99	
7 FEB 15/65		201 JUL 15/68		402 OCT 15/67		404 JUL 31/99	
8 BLANK		202 JAN 15/64		403 OCT 15/67		405 JUL 31/99	
9 JUL 15/68		203 JAN 15/64		404 OCT 15/67		406 JUL 31/99	
10 JUL 15/68		204 JUL 15/68					
11 MAR 15/65				25- 10- 45		25- 10- 81	
12 JUL 15/68		25- 10- 26		401 JUL 15/67		201 JAN 15/68	
13 APR 15/67		201 APR 15/68		402 JUL 15/67		202 MAY 15/66	
14 FEB 15/65		202 JUL 15/68				203 MAY 15/66	
15 FEB 15/65		203 JAN 15/64		25- 10- 46		204 MAY 15/66	
16 FEB 15/65		204 DEC 15/65		401 JUL 31/99		205 MAY 15/66	
17 FEB 15/65		205 APR 15/68		402 JUL 31/99		206 MAY 15/66	
18 JAN 15/64		206 DEC 15/65		403 JUL 31/99		207 MAY 15/66	
19 FEB 15/65				404 JUL 31/99		208 MAY 15/66	
20 APR 15/64		25- 10- 31		405 JUL 31/99		209 MAY 15/66	
21 FEB 15/65		401 OCT 15/68		406 JUL 31/99		210 MAY 15/66	
22 BLANK		402 OCT 15/68		407 JUL 31/99		211 MAY 15/66	

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212	MAY 15/66	25- 11- 11		25- 12- 21		402	JUL 31/99
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214	MAY 15/66	402	OCT 15/67	202	JUL 31/99		
215	MAY 15/66			203	JUL 31/99	25- 13- 23	
216	MAY 15/66	25- 11- 21		204	JUL 31/99	401	JUL 31/99
217	MAY 15/66	401	APR 15/68			402	JUL 31/99
218	MAY 15/66	402	APR 15/68	25- 13- 0		403	JUL 31/99
219	MAY 15/66			1	AUG 15/66		
220	MAY 15/66	25- 11- 51		2	AUG 15/66	25- 13- 42	
221	MAY 15/66	201	MAR 15/59	3	FEB 15/65	201	DEC 15/64
222	MAY 15/66	202	MAR 15/59	4	FEB 15/65	202	DEC 15/64
223	MAY 15/66						
224	MAY 15/66	25- 12- 0		25- 13- 0		25- 13- 46	
225	MAY 15/66	1	FEB 15/65	201	JUL 15/59	201	FEB 15/65
226	MAY 15/66	2	FEB 15/65	202	AUG 15/66	202	FEB 15/65
227	MAY 15/66	3	FEB 15/65	203	AUG 15/66		
228	MAY 15/66	4	BLANK	204	AUG 15/66	25- 13- 47	
229	MAY 15/66			205	AUG 15/66	201	FEB 15/65
230	MAY 15/66	25- 12- 2		206	AUG 15/66	202	NOV 15/63
231	MAY 15/66	201	FEB 15/65			203	NOV 15/63
232	MAY 15/66	202	JAN 15/69	25- 13- 1		204	BLANK
233	MAY 15/66	203	JAN 15/69	201	FEB 15/66		
234	MAY 15/66	204	AUG 15/66	202	AUG 15/66	25- 13- 48 ✓	
235	MAY 15/66	204A	APR 15/69	203	AUG 15/66	401	JUL 31/99
236	MAY 15/66	204B	JAN 15/67	204	BLANK	402	JUL 31/99
237	MAY 15/66	205	JAN 15/67				
238	MAY 15/66	206	FEB 15/63	25- 13- 3		25- 13- 50 ✓	
239	MAY 15/66	207	JAN 15/67	401	JUL 31/99	401	JUL 31/99
240	MAY 15/66	208	FEB 15/63	402	JUL 31/99	402	JUL 31/99
241	MAY 15/66	209	MAY 15/64	403	JUL 31/99	403	JUL 31/99
242	MAY 15/66	210	JUL 15/64	404	JUL 31/99	404	JUL 31/99
243	MAY 15/66	211	AUG 15/63	405	JUL 31/99	405	JUL 31/99
244	MAY 15/66	212	AUG 15/63	406	JUL 31/99	406	JUL 31/99
245	MAY 15/66	213	AUG 15/63				
246	MAY 15/66	214	BLANK	25- 13- 3		25- 13- 52 ✓	
247	MAY 15/66			801	JUL 31/99	401	JUL 31/99
248	BLANK	25- 12- 2		802	JUL 31/99	402	JUL 31/99
		601	DEC 27/75			403	JUL 31/99
25- 11- 0		602	BLANK	25- 13- 13		404	JUL 31/99
1	JAN 15/60			201	JUL 31/99		
2	MAR 15/59	25- 12- 2		202	JUL 31/99	25- 13- 55 ✓	
3	JAN 15/60	701	NOV 07/81			401	JUL 31/99
4	JAN 15/60	702	NOV 07/81	25- 13- 21		402	JUL 31/99
5	JAN 15/60			201	DEC 15/64	403	JUL 31/99
6	BLANK	25- 12- 2		202	DEC 15/64	404	JUL 31/99
		801	MAR 01/89	203	DEC 15/64	405	JUL 31/99
25- 11- 1		802	MAR 01/89	204	BLANK		
201	OCT 15/61	803	MAR 01/89	25- 13- 22		25- 15- 0 ?	
202	BLANK	804	MAR 01/89	401	JUL 31/99	1	OCT 15/67

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4	OCT 15/68	218	OCT 15/68	262	OCT 15/68	10	JUL 31/99
5	OCT 15/68	219	OCT 15/68	263	OCT 15/68	11	JUL 31/99
6	OCT 15/68	220	OCT 15/68	264	OCT 15/68	12	JUL 31/99
7	OCT 15/68	221	OCT 15/68	265	MAR 01/89	13	JUL 31/99
8	OCT 15/68	222	OCT 15/68	266	OCT 15/68	14	JUL 31/99
9	OCT 15/68	223	OCT 15/68	267	OCT 15/68	15	JUL 31/99
10	OCT 15/68	224	OCT 15/68	268	JAN 15/69	16	JUL 31/99
11	OCT 15/68	224A	OCT 15/68	269	OCT 15/68	17	JUL 31/99
12	OCT 15/68	224B	OCT 15/68	270	JAN 15/69	18	JUL 31/99
13	OCT 15/68	224C	OCT 15/68	271	OCT 15/68	19	JUL 31/99
14	OCT 15/68	224D	OCT 15/68	272	MAR 01/89	20	JUL 31/99
15	OCT 15/68	224E	OCT 15/68	273	OCT 15/68	21	JUL 31/99
16	OCT 15/68	224F	OCT 15/68	274	OCT 15/68	22	JUL 31/99
17	OCT 15/68	225	OCT 15/68	275	MAR 01/89	23	JUL 31/99
18	OCT 15/68	226	OCT 15/68	276	OCT 15/68	24	JUL 31/99
19	OCT 15/68	227	OCT 15/68	277	OCT 15/68	25	JUL 31/99
20	BLANK	228	OCT 15/68	278	OCT 15/68	26	JUL 31/99
		229	OCT 15/68	279	OCT 15/68	27	JUL 31/99
25- 15- 0 ?		230	OCT 15/68	280	OCT 15/68	28	JUL 31/99
201	OCT 15/68	231	OCT 15/68	281	JAN 15/69	29	JUL 31/99
202	OCT 15/68	232	OCT 15/68	282	OCT 15/68	30	JUL 31/99
203	OCT 15/68	233	OCT 15/68	283	OCT 15/68	31	JUL 31/99
204	OCT 15/68	234	OCT 15/68	284	MAR 01/89		
205	OCT 15/68	235	OCT 15/68	285	OCT 15/68	25- 15 - 200 ✓	
206	OCT 15/68	236	OCT 15/68	286	OCT 15/68	201	JUL 31/99
207	BLANK	237	OCT 15/68	287	OCT 15/68	202	JUL 31/99
208	JAN 15/69	238	OCT 15/68	288	OCT 15/68	203	JUL 31/99
209	OCT 15/68	239	OCT 15/68	289	MAR 01/89	204	JUL 31/99
210	OCT 15/68	240	OCT 15/68	290	OCT 15/68	205	JUL 31/99
210A	OCT 15/68	241	OCT 15/68	291	JAN 15/69	206	JUL 31/99
210B	JAN 15/69	242	OCT 15/68	292	JAN 15/69	207	JUL 31/99
210C	OCT 15/68	243	MAR 01/89	293	OCT 15/68	208	JUL 31/99
210D	OCT 15/68	244	OCT 15/68	294	OCT 15/68	209	JUL 31/99
210E	OCT 15/68	245	MAR 01/89	295	OCT 15/68	210	JUL 31/99
210F	OCT 15/68	246	JAN 15/69	296	OCT 15/68	211	JUL 31/99
210G	JAN 15/69	247	OCT 15/68			212	JUL 31/99
✓ 210H	SEP 17/02	248	OCT 15/68	25- 15- 100 ?		213	JUL 31/99
210I	OCT 15/68	249	OCT 15/68	1	OCT 15/68	214	JUL 31/99
210J	JAN 15/69	250	OCT 15/68	2	BLANK	215	JUL 31/99
211	BLANK	251	OCT 15/68			216	JUL 31/99
212	OCT 15/68	252	OCT 15/68	25- 15- 200 ✓		216A	JUL 31/99
213	OCT 15/68	253	OCT 15/68	1	JUL 31/99	216B	JUL 31/99
214	OCT 15/68	254	OCT 15/68	2	JUL 31/99	217	JUL 31/99
214A	OCT 15/68	255	MAR 01/89	3	JUL 31/99	218	JUL 31/99
214B	OCT 15/68	256	OCT 15/68	4	JUL 31/99	219	JUL 31/99
214C	OCT 15/68	257	JAN 15/69	5	JUL 31/99	220	JUL 31/99
214D	OCT 15/68	258	OCT 15/68	6	JUL 31/99	221	JUL 31/99
215	OCT 15/68	259	JAN 15/69	7	JUL 31/99	222	JUL 31/99

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224	JUL 31/99	272	JUL 31/99	201	JUL 31/99	201	JUL 31/99
225	JUL 31/99	273	JUL 31/99				
226	JUL 31/99	274	JUL 31/99	25- 15- 308		25- 15- 318	
227	JUL 31/99	275	JUL 31/99	201	JUL 31/99	201	JUL 31/99
228	JUL 31/99	276	JUL 31/99				
229	JUL 31/99	277	JUL 31/99	25- 15- 309		25- 15- 319	
230	JUL 31/99	278	JUL 31/99	201	JUL 31/99	201	JUL 31/99
231	JUL 31/99	279	JUL 31/99	202	JUL 31/99	202	JUL 31/99
232	JUL 31/99	280	JUL 31/99	203	JUL 31/99	203	JUL 31/99
233	JUL 31/99	281	JUL 31/99				
234	JUL 31/99	282	JUL 31/99	25- 15- 310		25- 15- 320	
235	JUL 31/99	283	JUL 31/99	201	JUL 31/99	201	JUL 31/99
236	JUL 31/99	284	JUL 31/99	202	JUL 31/99	202	JUL 31/99
237	JUL 31/99	285	JUL 31/99	203	JUL 31/99	203	JUL 31/99
238	JUL 31/99	286	JUL 31/99				
239	JUL 31/99	287	JUL 31/99	25- 15- 311		25- 15- 401	
240	JUL 31/99			201	JUL 31/99	201	JUL 31/99
241	JUL 31/99	25- 15- 301		202	JUL 31/99	202	JUL 31/99
242	JUL 31/99	201	JUL 31/99	203	JUL 31/99		
243	JUL 31/99	202	JUL 31/99	204	JUL 31/99	25- 15- 402	
244	JUL 31/99	203	JUL 31/99	205	JUL 31/99	201	JUL 31/99
245	JUL 31/99	204	JUL 31/99	206	JUL 31/99	202	JUL 31/99
246	JUL 31/99	205	JUL 31/99				
247	JUL 31/99			25- 15- 312		25- 15- 501	
248	JUL 31/99	25- 15- 302		201	JUL 31/99	201	JUL 31/99
249	JUL 31/99	201	JUL 31/99	202	JUL 31/99	202	JUL 31/99
250	JUL 31/99	202	JUL 31/99	203	JUL 31/99	203	JUL 31/99
251	JUL 31/99	203	JUL 31/99	204	JUL 31/99		
252	JUL 31/99	204	JUL 31/99	205	JUL 31/99	25- 15- 502	
253	JUL 31/99	205	JUL 31/99			201	JUL 31/99
253	JUL 31/99	.		25- 15- 313		202	JUL 31/99
254	JUL 31/99	25- 15- 303		201	JUL 31/99		
255	JUL 31/99	201	JUL 31/99	202	JUL 31/99	25- 15- 503	
256	JUL 31/99	202	JUL 31/99	203	JUL 31/99	201	JUL 31/99
257	JUL 31/99	203	JUL 31/99	204	JUL 31/99	202	JUL 31/99
258	JUL 31/99	204	JUL 31/99	205	JUL 31/99	203	JUL 31/99
259	JUL 31/99						
260	JUL 31/99	25- 15- 304		25- 15- 314		25- 15- 504	
261	JUL 31/99	201	JUL 31/99	201	JUL 31/99	201	JUL 31/99
262	JUL 31/99	202	JUL 31/99	202	JUL 31/99	202	JUL 31/99
263	JUL 31/99	203	JUL 31/99	203	JUL 31/99		
264	JUL 31/99	204	JUL 31/99	204	JUL 31/99	25- 15- 505	
265	JUL 31/99					201	JUL 31/99
266	JUL 31/99	25- 15- 305		25- 15- 315		202	JUL 31/99
267	JUL 31/99	201	JUL 31/99	201	JUL 31/99	203	JUL 31/99
268	JUL 31/99						
269	JUL 31/99	25- 15- 306		25- 15- 316		25- 15- 506	
270	JUL 31/99	201	JUL 31/99	201	JUL 31/99	201	JUL 31/99

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201	JUL 31/99	201	JUL 31/99	2	JUL 31/99	7	DEC 15/62
202	JUL 31/99			3	JUL 31/99	8	DEC 15/62
203	JUL 31/99	25- 16- 0		4	JUL 31/99		
		1	JUL 17/86	5	JUL 31/99	25- 31- 0	
25- 15- 508		2	JUL 17/86	6	JUL 31/99	701	SEP 01/90
201	JUL 31/99			25- 18- 0		702	SEP 01/90
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		401	JUL 31/99	602	BLANK	704	BLANK
25- 15- 601		402	JUL 31/99			25- 31- 21	
201	JUL 31/99	403	JUL 31/99	25- 18- 41		401	OCT 15/65
202	JUL 31/99	404	JUL 31/99	201	FEB 15/65	402	OCT 15/65
		405	JUL 31/99	202	JUL 15/59		
25- 15- 602				203	JUL 15/59	25- 31- 21	
201	JUL 31/99	25- 16- 31		204	JUN 15/59	601	SEP 01/90
202	JUL 31/99	501	JUL 31/99	205	MAR 01/89	602	BLANK
		502	JUL 31/99	206	MAR 01/89		
25- 15- 603		503	JUL 31/99			25- 31- 21	
201	JUL 31/99			25- 18- 42		801	SEP 01/90
202	JUL 31/99	25- 16- 31		401	OCT 15/68	802	SEP 01/90
		601	JUL 31/99	402	OCT 15/67	803	SEP 01/90
25- 15- 604		602	JUL 31/99	403	OCT 15/68	804	SEP 01/90
201	JUL 31/99			404	OCT 15/68	805	SEP 01/90
202	JUL 31/99	25- 16- 31		405	OCT 15/67	806	SEP 01/90
		701	JUL 31/99	406	OCT 15/68	807	SEP 01/90
25- 15- 605						808	SEP 01/90
201	JUL 31/99	25- 16- 31		25- 19- 0			
202	JUL 31/99	801	JUL 31/99	201	JAN 15/69	25- 31- 41	
		802	JUL 31/99	202	OCT 15/68	201	MAR 15/59
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25-15-604

Convert Main Cabin

CONVERT ALL-CARGO 11 PALLET WITH CARGO ELEVATOR CONFIGURATION
TO ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

25-15-605

Convert Main Cabin

CONVERT TO ALL-CARGO 11 PALLET WITH CARGO ELEVATOR
CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION
INSTRUCTIONS

25-15-606

Convert Main Cabin

CONVERT ALL-CARGO 11 PALLET WITH CREW REST ACCOMMODATION
CONFIGURATION TO ANY OTHER CONFIGURATION - CONVERSION
INSTRUCTIONS

25-15-607

Convert Main Cabin

CONVERT TO ALL CARGO 11 PALLET WITH CREW REST ACCOMMODATION
CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION
INSTRUCTIONS

25-15-608

Convert Main Cabin

CONVERT LITTER ACCOMMODATION CONFIGURATION TO ANY OTHER
CONFIGURATION - CONVERSION INSTRUCTIONS

25-15-701

Convert Main Cabin

CONVERT TO LITTER ACCOMMODATION CONFIGURATION FROM ANY OTHER
CONFIGURATION - CONVERSION INSTRUCTIONS

25-15-702

Convert Main Cabin

CONVERT TO OR BULK CARGO CONFIGURATION - INSTRUCTIONS

25-15-801

CABIN ATTENDANTS' STATIONS

25-16-0

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EMERGENCY EQUIPMENT - CREW AND PASSENGER CABINS - DESCRIPTION AND OPERATION

1. General

- A. This section does not cover all equipment which could be considered emergency equipment, but only that which is not related to a subject covered in a separate section.
- B. The emergency equipment on the 707-329C airplanes, though similar in details and operation, is in some instances stowed in different positions from those described in the following paragraphs. Conversion between the various passenger and/or cargo configurations on these airplanes also has an effect on emergency equipment location. Refer to 25-15-0, "Cabin Accommodation Conversions."

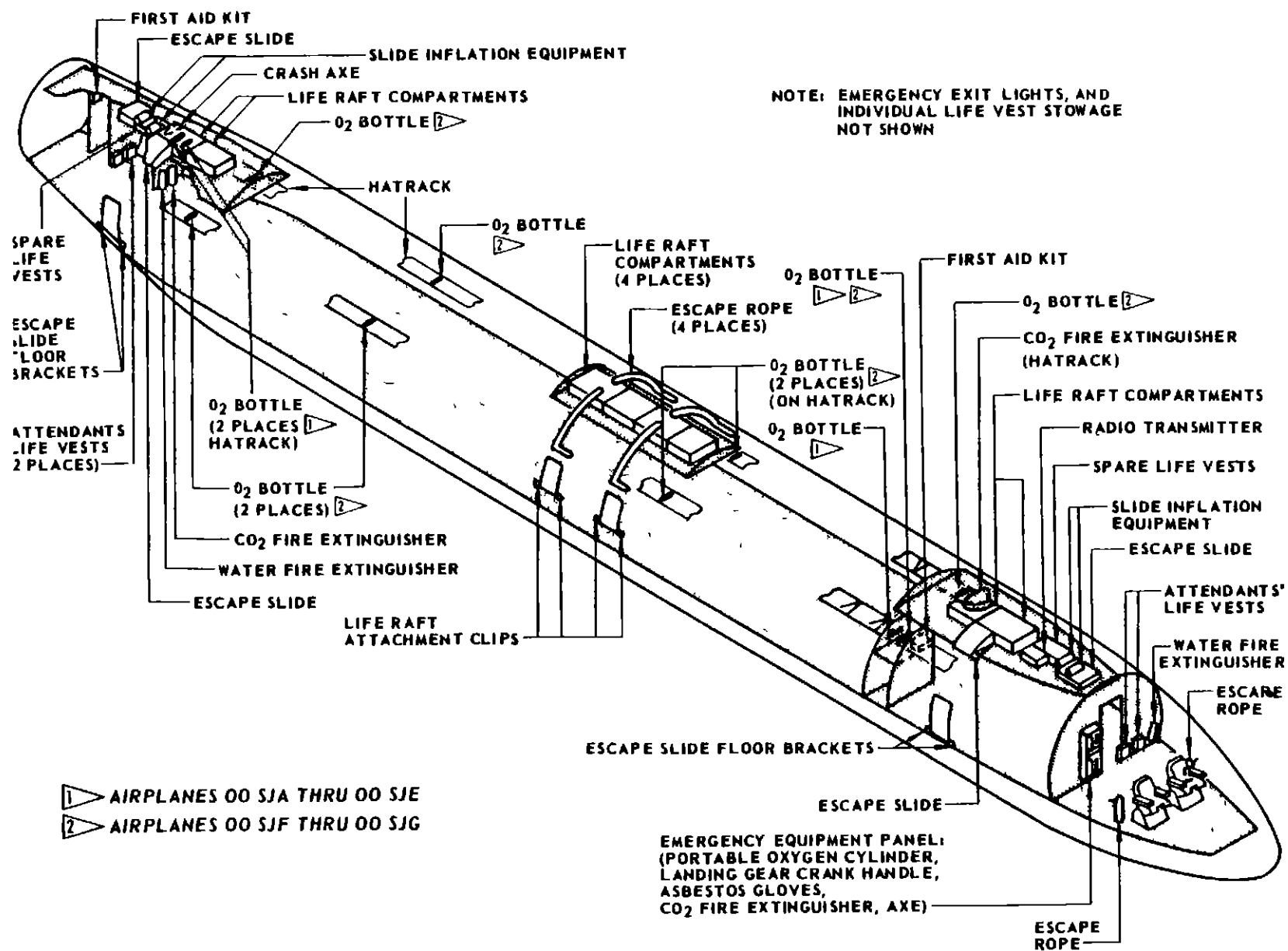
2. Miscellaneous Emergency Equipment

A. Axes

- (1) An axe is stowed in the aft emergency equipment compartment. A second axe is mounted on the emergency equipment panel located on the forward side of the control cabin bulkhead to the right of the control cabin door. It is maintained in position by a spring catch.

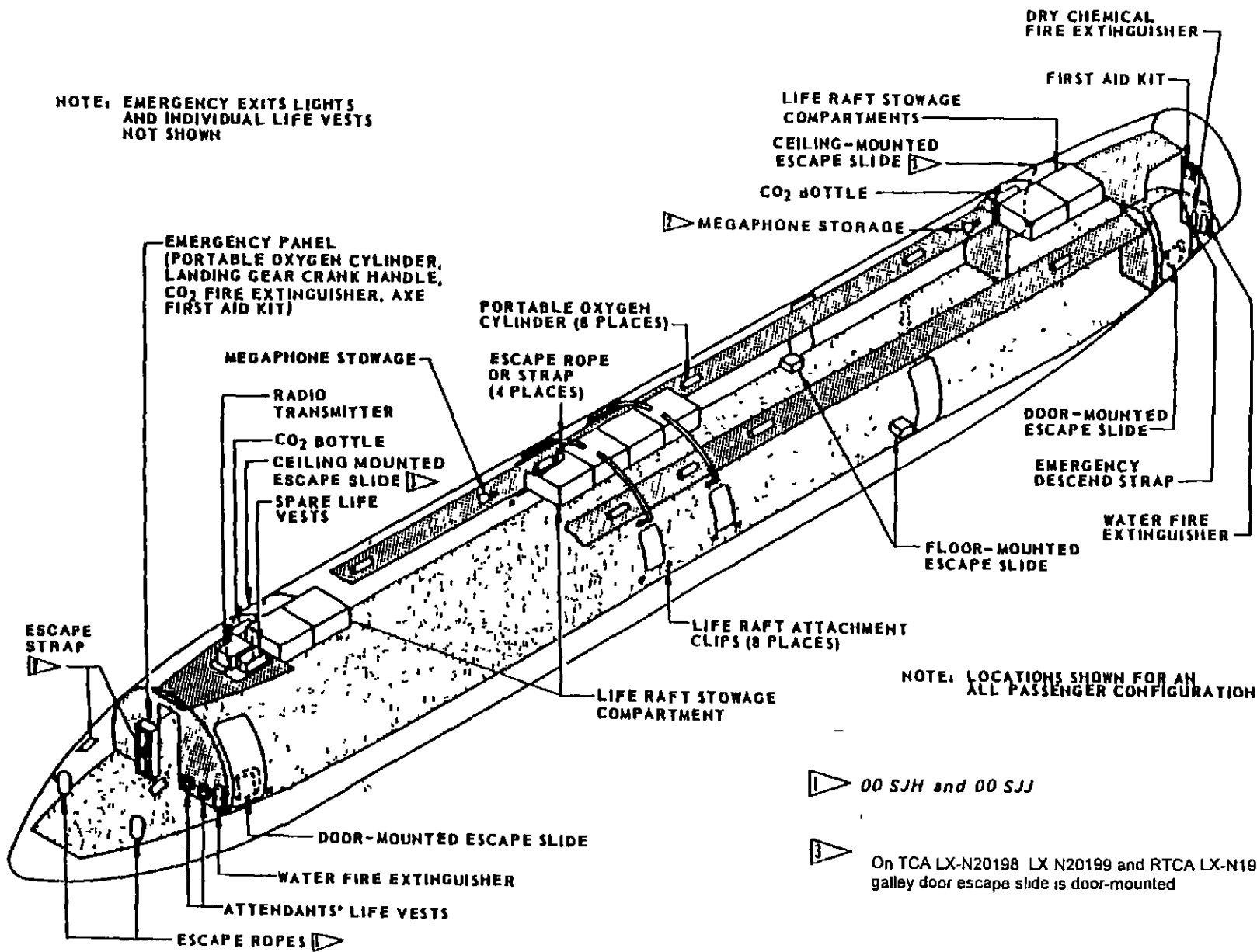
B. Escape Rope Assemblies

- (1) On airplanes OO-SJA through OO-SJH and OO-SJJ, escape rope assemblies are as follows.
 - (a) Six escape ropes made from synthetic fibers (Nylon or Dacron), are attached one above each of the four overwing emergency exits, and one beneath each of two sliding windows in the control cabin.
 - (b) The emergency exit escape ropes are stowed in curved tubular containers which are transversely mounted in the ceiling of the passenger compartment and secured at the lower end to the escape hatch frame. Access to the free ends of the ropes is gained by removal of the emergency hatches.
 - (c) The control cabin escape ropes are stowed in coils behind the pilot's and copilot's seats.
 - (d) A hook assembly is attached to the end of each emergency exit rope, and when installed in the airplane the hook is secured by a strap and snap fasteners.



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NOTE: EMERGENCY EXITS LIGHTS AND INDIVIDUAL LIFE VESTS NOT SHOWN

NOTE: LOCATIONS SHOWN FOR AN ALL-PASSENGER CONFIGURATION

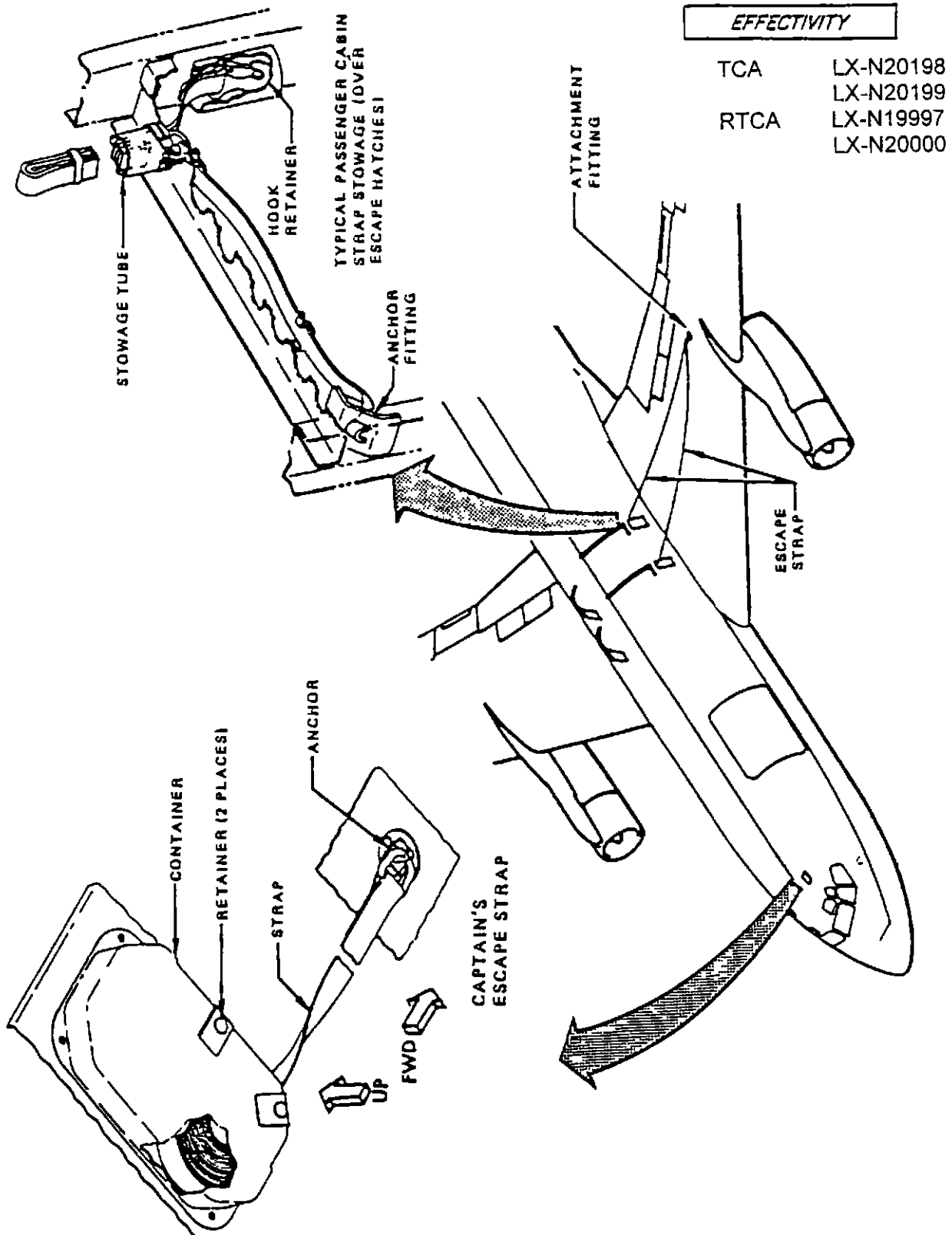
1 00 SJH and 00 SJJ

3 On TCA LX-N20198 LX N20199 and RTCA LX-N19997 LX-N20000 galley door escape slide is door-mounted

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Emergency Equipment Location
Figure 1 (Sheet 2)

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Emergency Equipment Location
 Figure 1 (Sheet 3)



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- (2) On airplanes 00-SJK and on, escape rope assemblies consist of webbing straps as follows:
 - (a) Six escape straps made from webbing assemblies impregnated with neoprene latex solution are attached at the following locations.
 - 1) One above each of the four overwing emergency exits.
 - 2) One above and inboard of each of the No. 5 "eyebrow" windows in the control cabin.
 - (b) The emergency exit escape straps are stowed in curved tubular containers which are transversely mounted in the ceiling of the passenger compartment and secured at the lower end to the emergency exit frame.
 - (c) A hook assembly is attached to the end of each emergency exit strap and when installed in the airplane the hook is secured by a strap and snap fasteners.
 - (d) Access to the free ends of the straps at the overwing exits is gained by removal of the emergency hatches.
 - (e) The control cabin escape straps are stowed aft of the dome light on the pilot's side and on the forward edge of the flight engineer's lightshield on the copilot's side.

C. Emergency Transmitter Stowage

- (1) Provision is made for stowage of an emergency transmitter in the overhead emergency transmitter and life vests compartment.

D. First Aid Kits

- (1) Two first aid kits are installed on all airplanes, one is installed on the forward side of the forward partition of the aft left lavatory. On 707-329 airplanes, the second one is installed on the shelf of the forward right coat closet. On 707-329C airplanes, the second one is installed on the forward side of the control cabin bulkhead to the right of the control cabin door.

E. Power Megaphones

- (1) On airplanes 00-SJK and on, provision is made for the stowage of two power megaphones in the passenger cabin, one forward and one aft.
 - (a) Both stowage brackets are located on the right hatrack. One stowage bracket is installed just forward of the midcabin life raft compartment and the other near the aft end of the hatrack.

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F Gloves

- (1) A pair of flexible asbestos gloves are stowed in a compartment of the control cabin emergency equipment panel.

G. Portable Oxygen Cylinders

- (1) Four portable oxygen cylinders are located above the hatracks near stations 506, 512, 1308 and 1314 in the passenger cabin of airplanes 00-SJA thru 00-SJE. Eight are located similarly near stations 505, 665, 1019 and 1225 in airplanes 00-SJF and on. On 707-329C airplanes, eight oxygen cylinders are located above the hatracks near stations 560, 640, 800 and 1120 on the right side and stations 640, 720, 800 and 1200 on the left side. One is in the control cabin emergency equipment panel of all airplanes.

3. Portable Fire Extinguishers

A. Carbon Dioxide (CO₂) Type

- (1) On 707-329 airplanes, two portable carbon dioxide (type 4TB-4) fire extinguishers are installed, one on the lower forward face of the left hand windscreen adjacent to the aft entry door and one in the left hatrack just aft of the forward lounge partition. One is in the control cabin emergency equipment panel of all airplanes.
- (2) The carbon dioxide extinguishers are intended primarily for use in extinguishing electrical fires, and may be readily distinguished by the horn type nozzle.
- (3) A trigger mechanism is used to operate the extinguisher, which until used, is lockwired and sealed.
- (4) The empty weight of the extinguisher is stamped on the neck of the valve beneath the handle.
- (5) A safety disc will allow the extinguisher to discharge should the internal pressure increase due to excessive temperature. This condition is indicated by a forward movement of the trigger exposing REPLACE DISC. (See 25-1-1, figure 201.)
- (6) A record card is attached to the bottle by a metal clip.



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B Water Type

- (1) On 707-329 airplanes, one fire extinguisher (water type) is installed on the lower forward face of the left windscreen adjacent to the aft entry door. On 707-329C airplanes, one fire extinguisher (water type) is installed on the lower forward face of the left aft lavatory forward partition. One extinguisher is installed on the aft side of the control cabin bulkhead adjacent to the forward entry door on all airplanes.
- (2) The water type extinguishers are intended for extinguishing nonelectrical fires, and contain an antifreeze agent to retain serviceability at low temperatures.
- (3) Discharge is effected by pressure from a CO2 cartridge in the extinguisher handle. Twisting the holder in the direction indicated by the arrow causes the carbon dioxide cartridge to be punctured, releasing the charge and pressurizing the cylinder. Depressing the lever, allows the pressure within the cylinder to force the water through the nozzle. The time of discharge is between 30 and 45 seconds at a temperature of 70°F; the minimum range of discharge is 20 feet.

C Dry Chemical Type

- (1) On 707-329C airplanes, one dry chemical fire extinguisher is installed on the lower forward face of the left aft lavatory forward partition. This extinguisher is for use on fires of any type.

4. Escape Slides

A. General

- (1) On 707-329 airplanes, four inflatable escape slides are stowed in ceiling compartments of the main cabin, each adjacent to an entry or galley door. On OO-SJH thru OO-SJK, six inflatable escape slides may be stowed, two in ceiling compartments adjacent to the galley doors, two in compartments mounted on the inside face of the forward and aft entry doors, and one adjacent to each escape hatch at BS 990. On OO-SJL and on, six inflatable escape slides may be stowed, four in compartments mounted on the inside face of the forward and aft entry doors and the forward and aft galley doors, and one adjacent to each escape hatch at BS 990.



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- (2) Each of the escape slides is inflated by an air pressure bottle and induced air. The bottle has a capacity of 300 cubic inches, and is charged with dry air to a pressure of 2700 to 3000 psig at 72°F. On 707-329 airplanes, a pressure reducer valve reduces the pressure to 500 psig before supplying the released air to the slide. Each air bottle is fitted with a pressure gage. The gages have a red area covering pressures which are insufficient to fully inflate the slide.
- (3) The escape slides are constructed from rubber-nylon fabric with neoprene and aluminum top coatings. If the escape slides are to be stored, store in a cool, dry location. When stored in a warm damp climate, check condition of the escape slide as often as good maintenance practices allow. If the slide becomes damp, lay it out and let dry. Dust with talc or powdered soapstone and repack.

CAUTION: EXTREME CARE SHOULD BE EXERCISED WHEN HANDLING THE SLIDES. DO NOT CHAFE, CUT, DROP, OR WALK ON THE SLIDES.

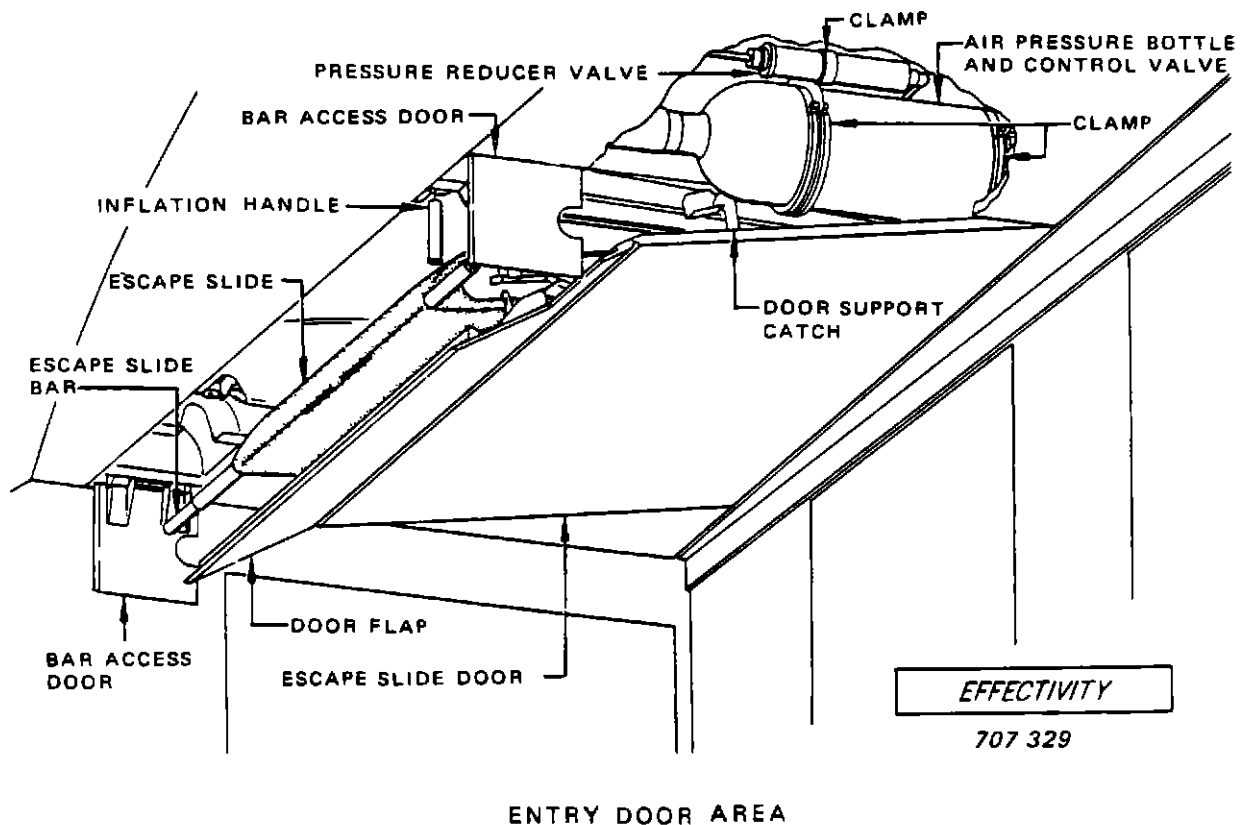
B. Ceiling-Mounted Escape Slides (See figure 2.)

- (1) The ceiling-mounted escape slides are stowed in ceiling compartments (figure 2) of the main cabin, each adjacent to an entry or galley door. A door supports each escape slide. The door, when unlatched, will free-fall sufficiently to enable removal of the escape slide. On 707-329 airplanes, two catches will retain the door in this position. The catches, when tripped, will allow the door to open fully. On OO-SJH, OO-SJJ, and OO-SJK, two shock cords will retain the door in this position. The cords, when unhooked, will allow the door to open fully.
- (2) On OO-SJH, OO-SJJ, and OO-SJK, some cargo carrying configurations will cause either or both of the ceiling-mounted escape slides to become unusable. This is a result of removal of the slide stowage with the lowered ceiling and the slide brackets on the floor.
- (3) On 707-329 airplanes, the escape slides are attached to the escape slide compartment by straps which are connected to anchors in the compartment. The straps and connectors are color coded.

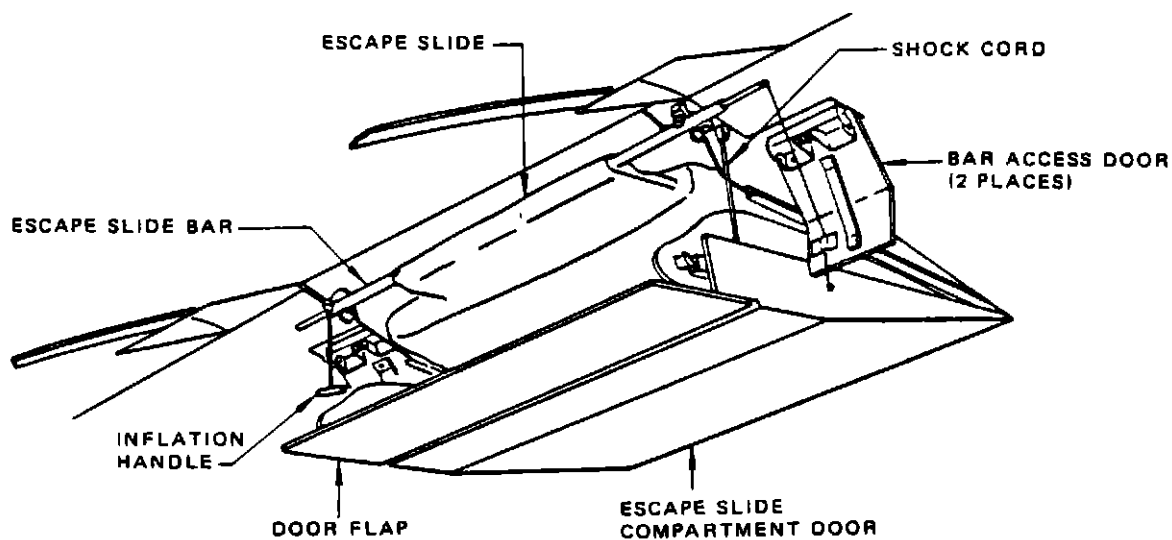
CAUTION: WHEN THE SLIDE IS INSTALLED IN THE AIRPLANE, ALL RED CODED PARTS WILL BE FORWARD AND ALL BLUE CODED PARTS WILL BE AFT.

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- (4) Inflation equipment for each slide (when installed) is located in the passenger cabin ceiling as follows:
- (a) Forward entry door slide - ESCAPE SLIDE compartment
 - (b) Aft entry door slide - ESCAPE SLIDE compartment
 - (c) Forward galley door slide - on 707-329 airplanes in the aft portion of EMERGENCY TRANSMITTER - LIFE VESTS compartment, and on OO-SJH, OO-SJJ, and OO-SJK, adjacent to the escape slide.
 - (d) Aft galley door slide - on 707-329 airplanes in the forward end of LIFE VESTS compartment and on OO-SJH, OO-SJJ, and OO-SJK, adjacent to the escape slide.



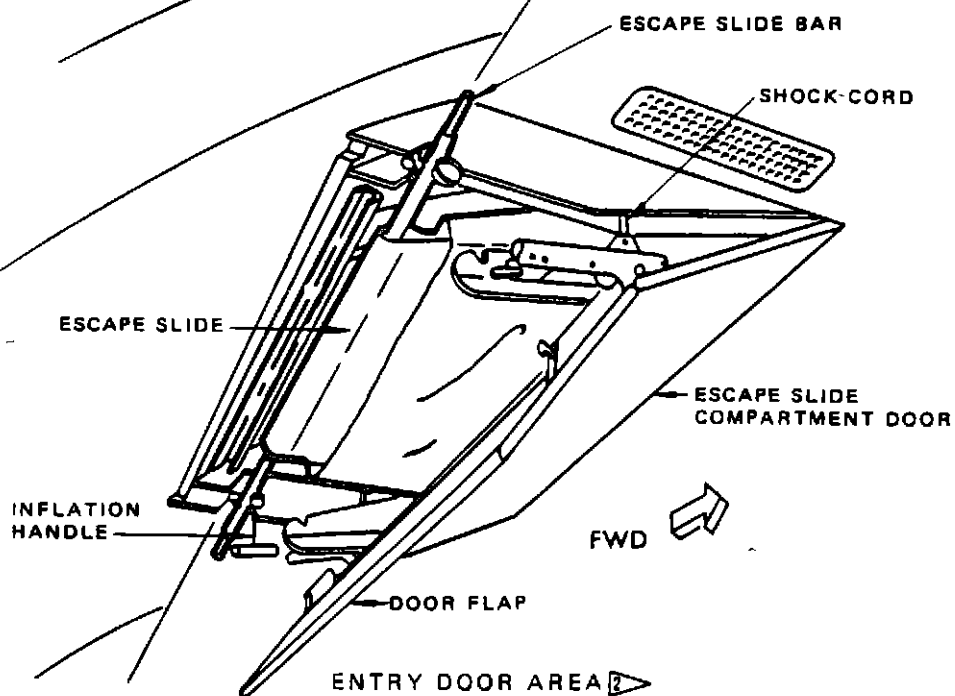
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GALLEY DOOR AREA 1

1 707 329

2 00-SJH 00-SJJ
and 00-SJK



Typical Ceiling Mounted Escape Slide Equipment
Figure 2 (Sheet 2)

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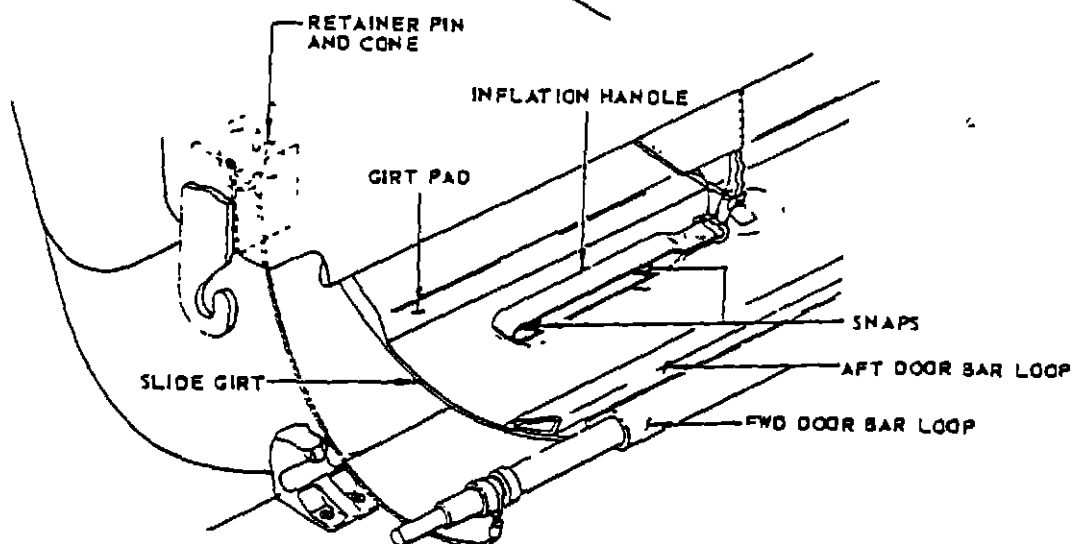
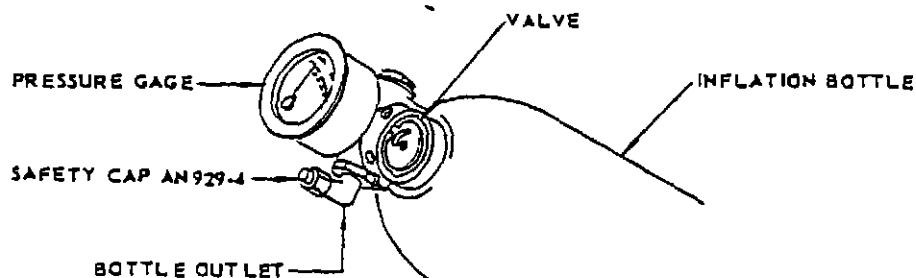
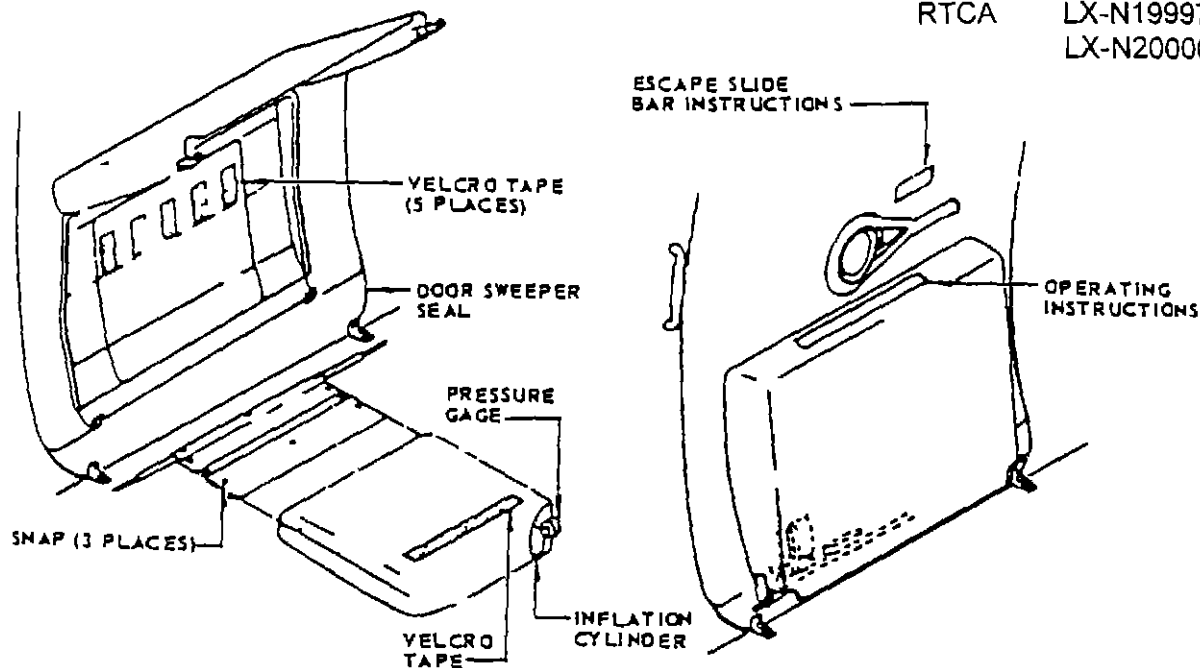
C. Door-Mounted Escape Slides

- (1) In the fore and aft entry door areas, escape slides are mounted on the inside face of the entry door together with the inflation equipment, which are packaged together in a single container. (See figure 3.)
- (2) The escape slide retainer bar is stowed on the coverbox retainer hooks. To ready the slide for use, the retainer bar is removed from the coverbox and is placed in the floor brackets. The slide will then automatically fall out when the entry door is opened. The inflation handle, snapped to the slide girth, is pulled to inflate the slide.
- (3) The floor brackets for the aft door slide are removed and the aft doormat lifted when the cabin is being converted to the 13 pallet all-cargo configuration. In all other configurations, the aft door slide remains usable and the forward door slide is usable in all configurations.

D Door-Mounted Escape Slides

- (1) An escape slide together with its necessary inflation equipment is stowed in a compartment mounted on the inside face of the forward and aft entry doors and the forward and aft galley doors. (See figure 3.)
 - (a) To prepare the escape slide for use, the anchor or girth strap is unsnapped from its stowed position on the compartment cover and hooked to the anchor fitting handle on the floor approximately midway in the door opening near the outboard seat track.
 - (b) When the door is opened, the escape slide is automatically pulled from its stowage compartment.
 - (c) To inflate the slide, the inflation handle snapped to the slide girth must be manually pulled.

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	LX-N20199
RTCA	LX-N19997
	LX-N20000



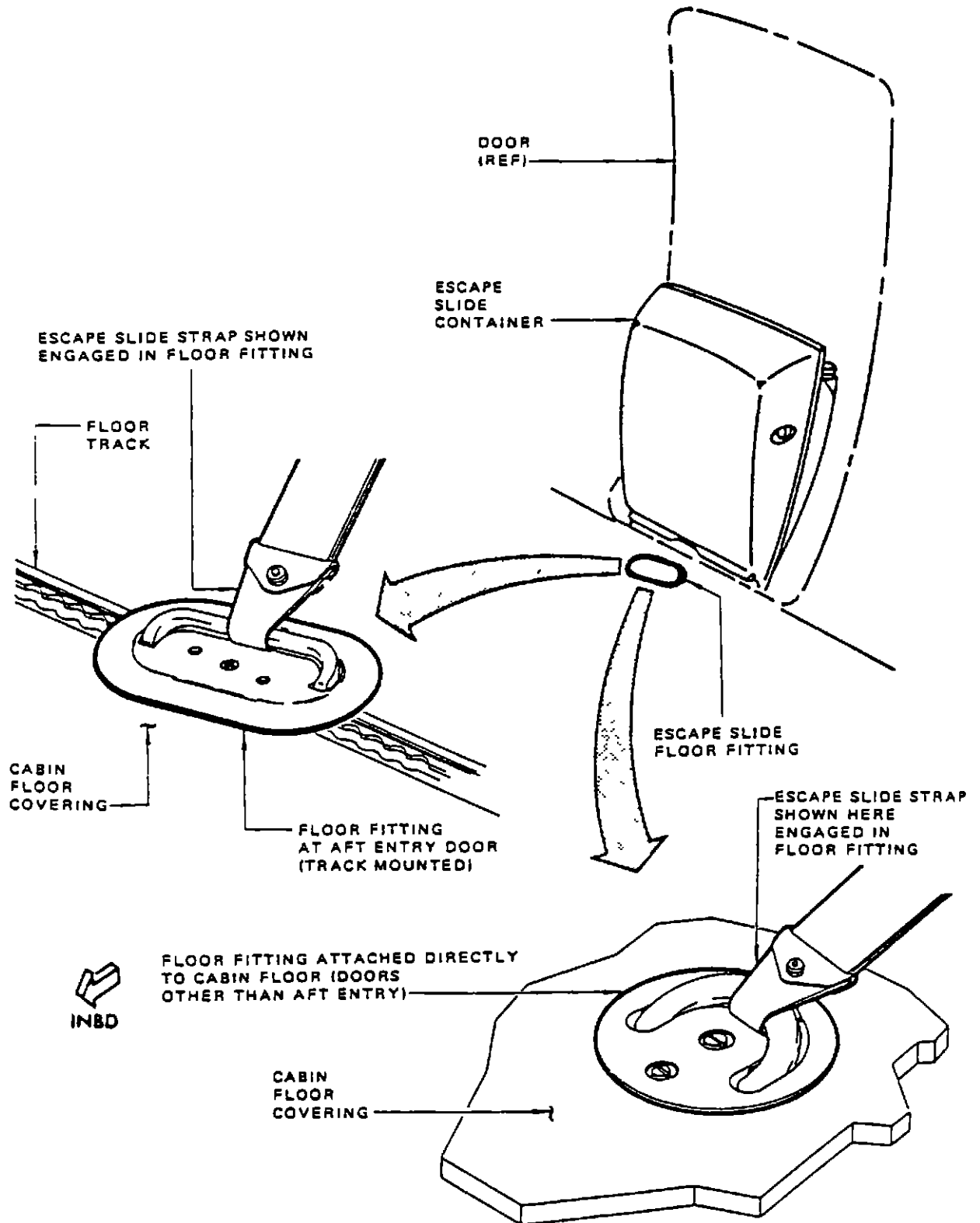
Typical Door-Mounted Escape Slide Equipment
Figure 3 (Sheet 1)

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00 SJL and on



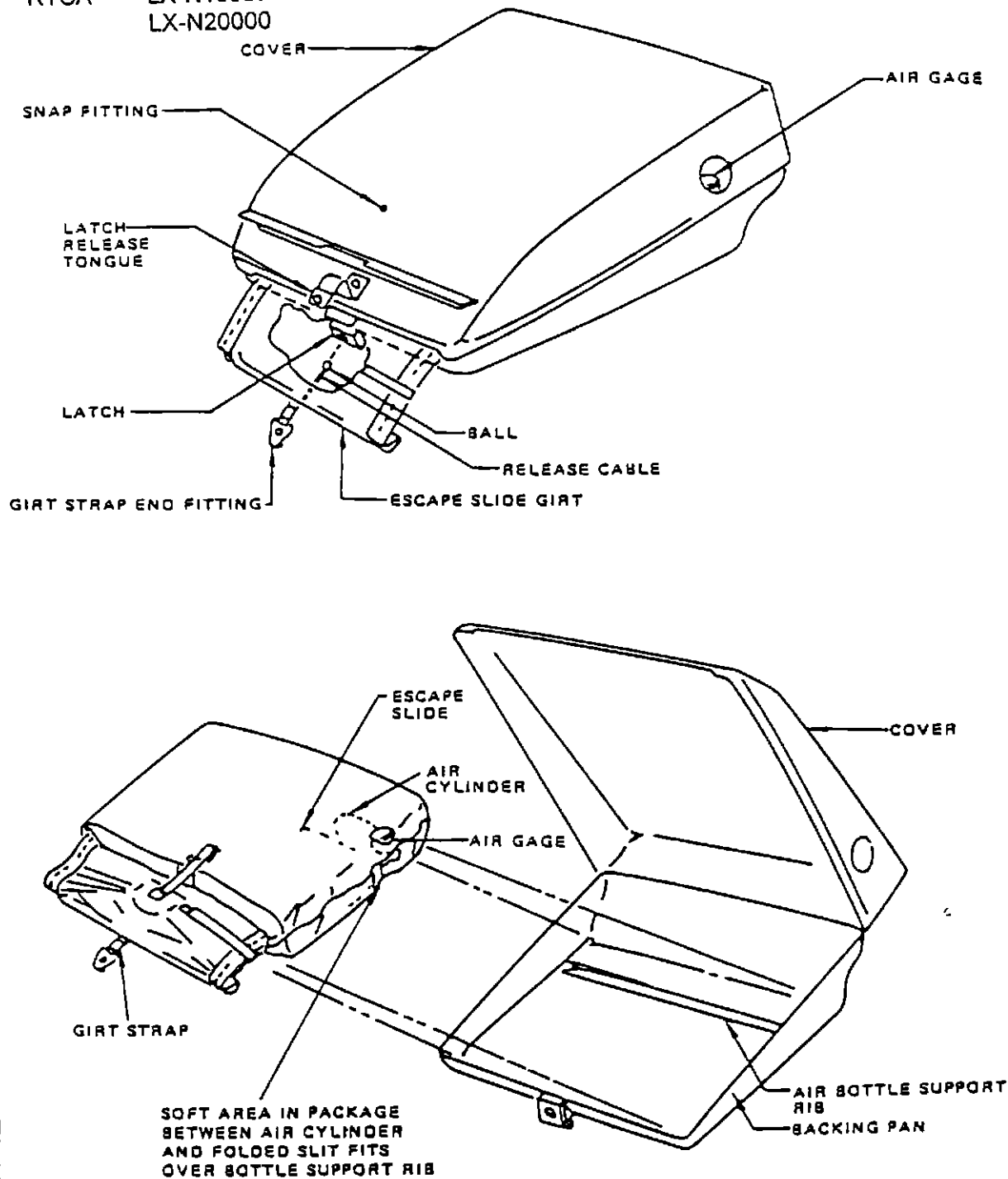
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LX-N20199
RTCA LX-N19997
LX-N20000

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Typical Door-Mounted Escape-Slide Equipment
Figure 3 (Sheet 3)



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E. Floor-Mounted Escape Slides (707-329C)

- (1) A special escape slide stowage is provided at both BS 990 escape hatches whenever these hatches are activated. (See figure 4.) Each of these escape slide stowages is attached to the two most outboard floor tracks adjacent to the hatch. The slide is readied for use by unbuckling the strap around the pack, opening the cover and sliding the escape slide on the retainer bar into position in front of the escape hatch. The slide is then pushed through the hatch, and the inflation handle, snapped to the slide girt, is pulled to inflate the slide.

5. Life Rafts

- A. Provisions are made for the stowage of eight 25-man inflatable life rafts in ceiling compartments. Two may be stored in the forward lowered ceiling, four in the center lowered ceiling, and two in the aft lowered ceiling.
- B. Each of the life rafts is of the double flotation tube type, and is inflated by two compressed air bottles and induced air. Each raft is equipped with accessories and survival equipment, giving a total stowage weight of approximately 130 pounds.
- C. Individual life raft stowage doors support each life raft, and are prevented from falling when unlatched, by spring balance and brake mechanisms.
- D. Two balance mechanisms are fitted for each door, and limit movement to 45 degrees. When a life raft is removed from a door, the balance assemblies will close the door with a controlled movement, but the door may be retained in the open position by inserting locking pins in the balance mechanisms.
- E. A transparent panel for the purpose of showing the life raft overhaul date, is revealed by partial opening of the door handle. (See 25-1-31, figure 201.)

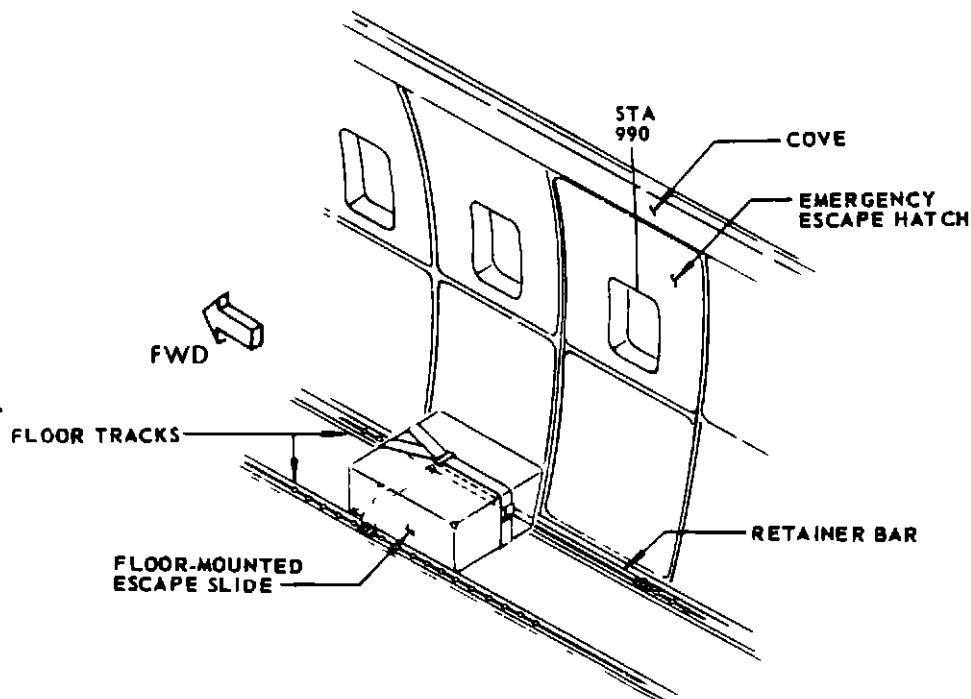
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6. Life Vests

- A. An adult type life vest is installed under each seat. In addition, life vest stowage is provided in the EMERGENCY TRANSMITTER - LIFE VESTS compartment in the forward part of the passenger cabin ceiling and adjacent to the forward attendants' seats. On 707-329 airplanes, life vest stowage is also provided in the LIFE VESTS compartment in the ceiling at the rear of the passenger cabin.
- B. A life vest is provided for each crewmember and is stowed in a compartment of each individual crewmember's seat.
- C. Life vests are inflated by two CO2 cartridges. A tube is also provided for oral inflation.
- D. Each individual life vest is packaged for protection in a polyethylene container.

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Typical Floor-Mounted Escape Slide
Figure 4



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MISCELLANEOUS EMERGENCY EQUIPMENT - MAINTENANCE PRACTICE

1 General

- A. In the instructions which follow, the term "rope" is used to refer to both the escape ropes installed on early airplanes and the escape straps installed on later airplanes, except as noted.

2. Removal/Installation Emergency Exit Escape Rope Assemblies

A. Equipment and Materials

- (1) Tape - 0.25 inch aluminum tape, No. 7452 Mystic Adhesive Products Inc., Chicago, Ill., or equivalent.

B. Remove Emergency Exit Escape Rope Assemblies (See figure 201)

- (1) Remove emergency hatch. Refer to Chapter 52, Emergency Exit Hatches.
- (2) Remove hook from retainer and withdraw rope from tube.

NOTE Grasp center loop and pull all four lengths of rope from stowage tube.

- (3) Disconnect anchor, remove spacer and rope assemblies.

C Install Emergency Exit Escape Rope Assemblies (See figure 201.)

- (1) Locate spacer and bolt anchor in place.
- (2) Fold rope into four lengths, make two to four wraps of aluminum tape around rope as shown in detail A, insert rope into tube.
- (3) Fasten hook in retainer.
- (4) Replace emergency exit hatch.

3. Removal/Installation Control Cabin Escape Rope Assemblies

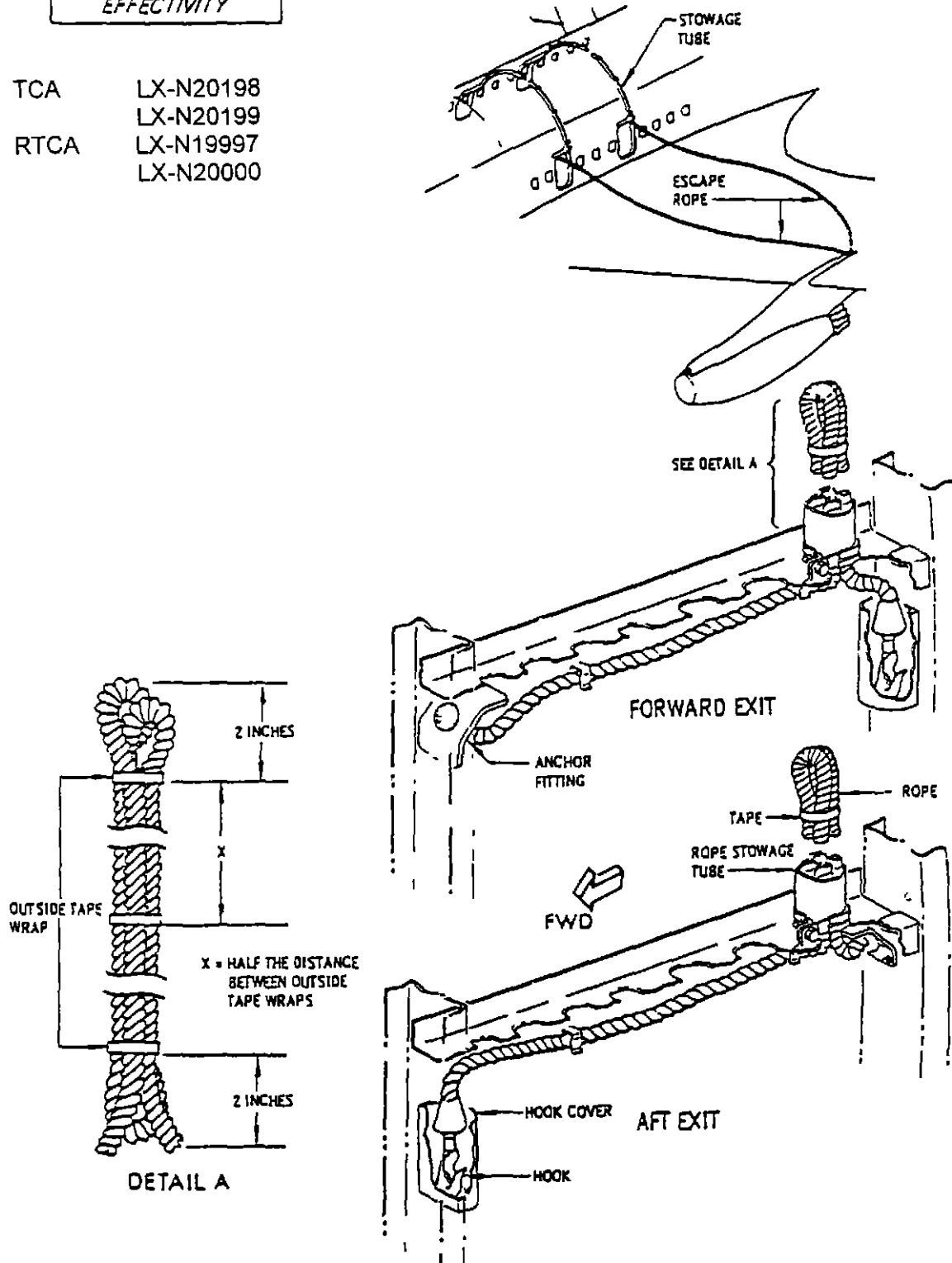
A. Remove Control Cabin Escape Rope Assemblies

- (1) Lift track anchor lock against spring, and slide anchor stud from anchor plate. (See figure 202.)
- (2) On airplanes equipped with ropes, unsnap strap and remove rope assembly.
- (3) On airplanes equipped with straps, unsnap retainers from container and remove strap assembly.

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	LX-N20199
RTCA	LX-N19997
	LX-N20000

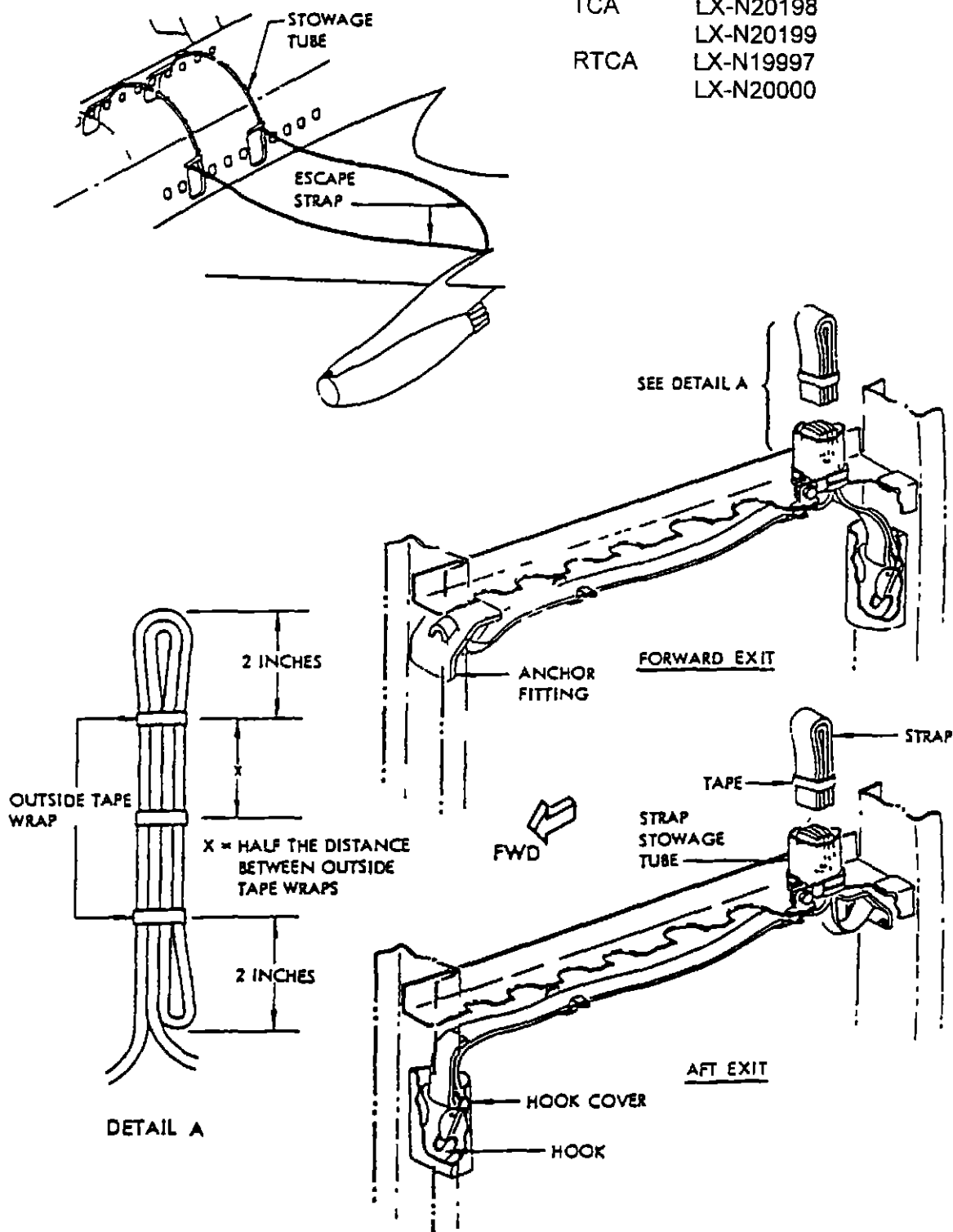


Passenger Cabin Escape Ropes Installation
Figure 201 (Sheet 1)

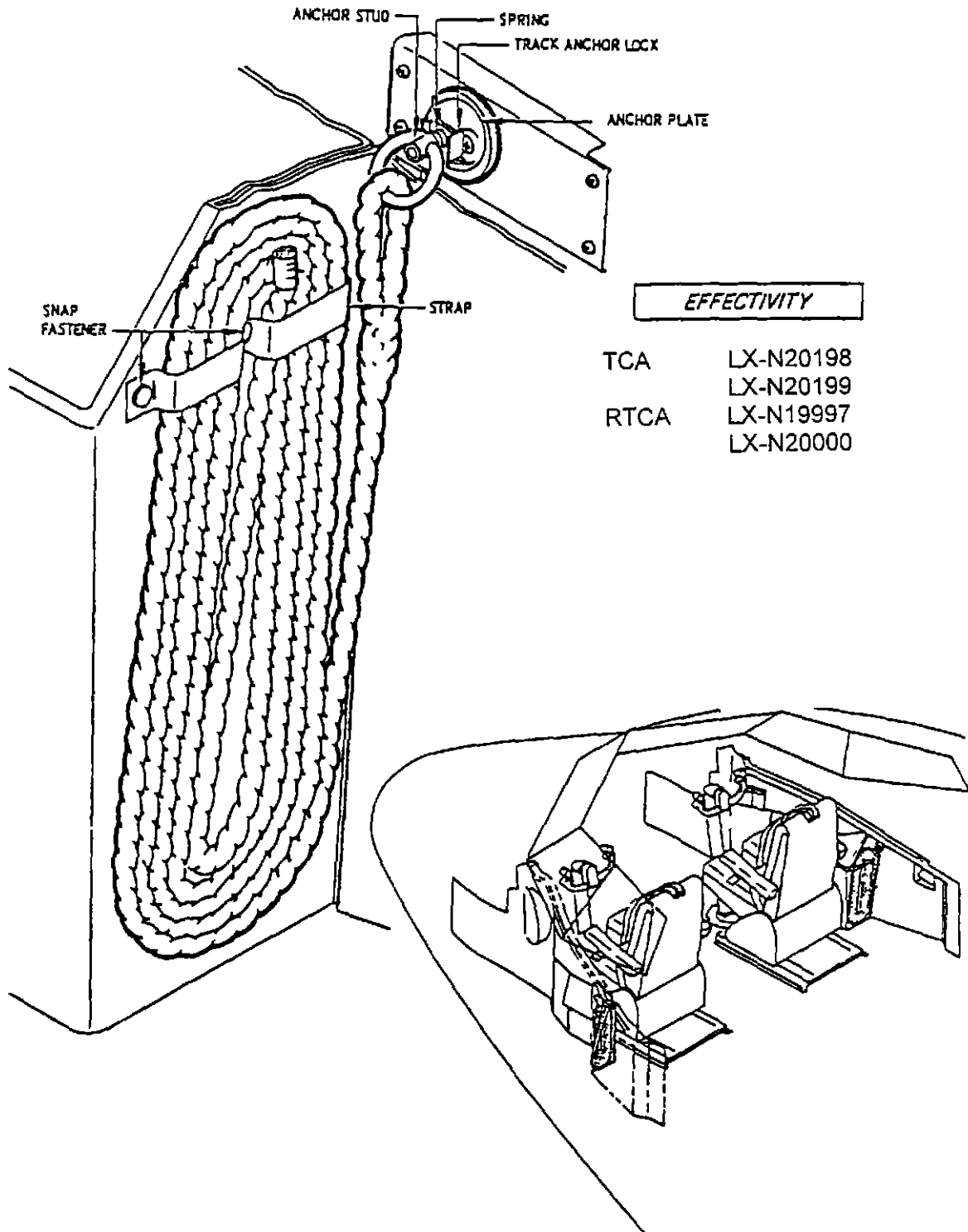
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EFFECTIVITY

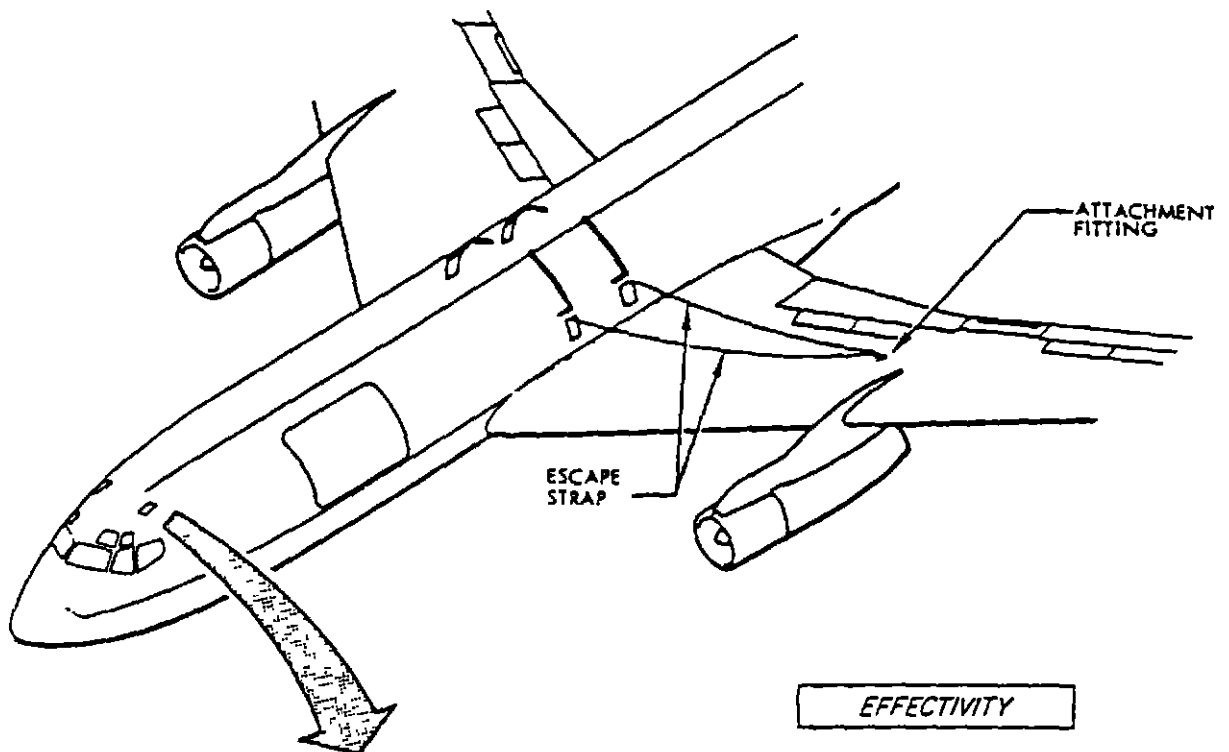
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	LX-N20199
RTCA	LX-N19997
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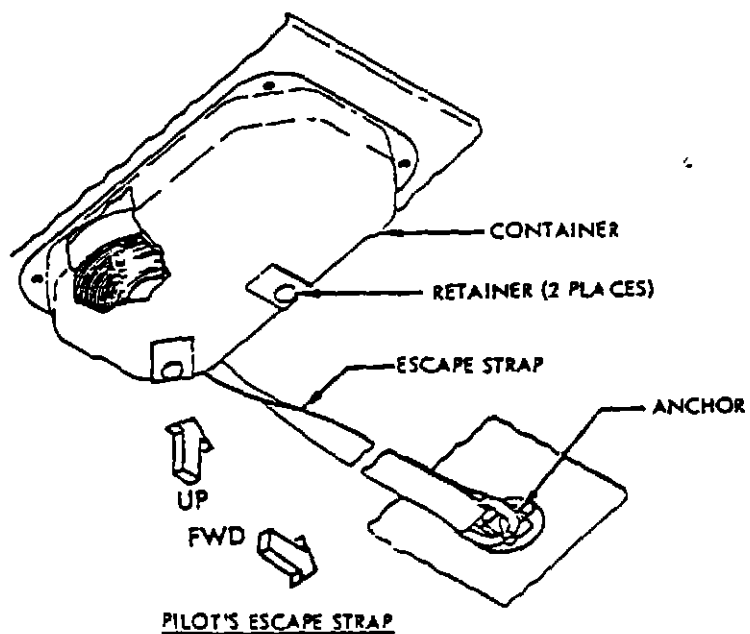


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EFFECTIVITY

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	LX-N20199
RTCA	LX-N19997
	LX-N20000





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3. Install Control Cabin Escape Ropes

- (1) Slide track anchor stud into slot in anchor plate. Ensure anchor lock is fully engaged. (See figure 202.)
- (2) On airplanes equipped with ropes; coil rope and secure with strap.
- (3) On airplanes equipped with straps, coil strap, place in container and secure by snapping retainers into place.

4. Inspection/Check Escape Rope Assemblies

A Check Escape Rope Assemblies

- (1) Check rope for fraying, wear, moisture and mildew.
- (2) Check security of anchor.

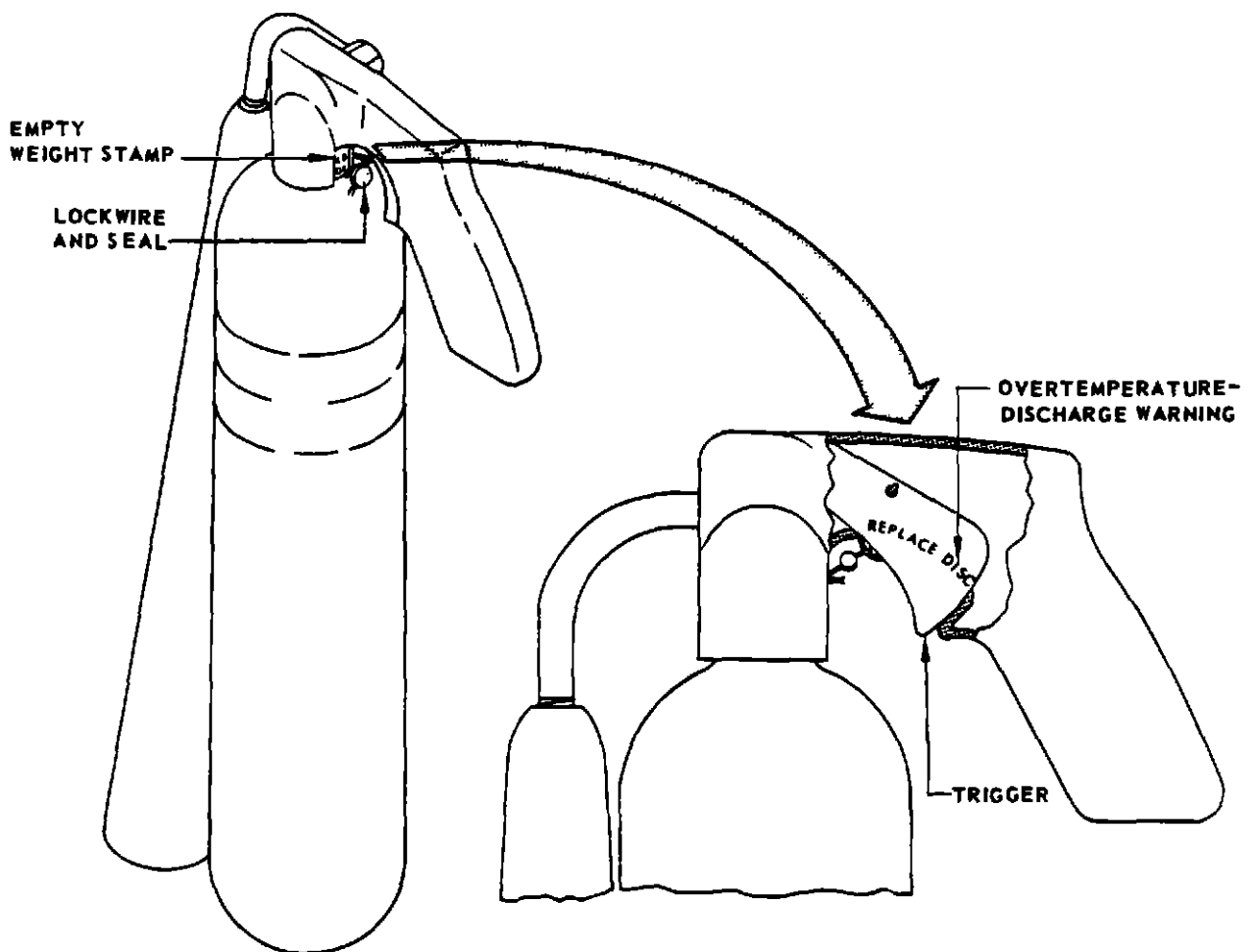
CARBON DIOXIDE TYPE FIRE EXTINGUISHERS - MAINTENANCE PRACTICES

1. Inspection/Check Carbon Dioxide Type Fire Extinguishers

A. Check Carbon Dioxide (CO₂) Type Fire Extinguishers (See figure 201.)

- (1) Examine record card.
- (2) Check lockwire and seal intact
- (3) Examine outlet pipe and nozzle for cracks or bending.
- (4) Check "REPLACE DISC" does not appear on trigger
- (5) Check weight of extinguisher. Total weight should be between 3 pounds 4 ounces and 3 pounds 10 ounces plus empty weight of extinguisher.

NOTE Empty weight of extinguisher is stamped on extinguisher neck opposite trigger.



WATER TYPE FIRE EXTINGUISHER - MAINTENANCE PRACTICES

1. Unit Servicing Water Type Fire Extinguisher

A Equipment and Materials

- (1) Anti-freeze agent, 800341, Walter Kidde and Company, Inc
Belleville 9, New Jersey.
- (2) CO₂ cartridge, 201386, Walter Kidde and Company, Inc.
Belleville 9, New Jersey.
- (3) Graduated container of 1-3/8 quarts capacity.
- (4) Compressed air supply.
- (5) Fine mesh cloth to be used as filter.
- (6) Cleaning solvent, P-S-661 or equivalent
- (7) Grease, MIL-L-4343

B Prepare Extinguisher for Charging

- (1) Disassemble cylinder assembly from valve assembly as follows.
 - (a) Remove seal and seal wire.

WARNING - MAKE CERTAIN THAT THE EXTINGUISHER IS
COMPLETELY DISCHARGE BEFORE ATTEMPTING FURTHER
DISASSEMBLY.

- (b) If the unit is the tamper proof type, remove the three set
screws and the lock ring.
- (c) Unscrew the holder from the valve.
- (d) Remove the spring from inside the holder and the used
cartridge from the valve.
- (e) Discard used cartridge.
- (f) Unscrew the cylinder assembly from the valve. The
instruction decal and the nameplate decal need not be
removed unless damaged.

- (2) Clean components of extinguisher
 - (a) Wash all metallic parts in dry cleaning solvent, P-S-661 or equivalent, dry with clean, dry compressed air
 - (b) Use clean, dry, compressed air to dislodge any particles of foreign matter from the strainer portion of the syphon tube and strainer assembly.
 - (c) Depress the liner and flush the valve and syphon tube with water.

C. Charge Extinguisher

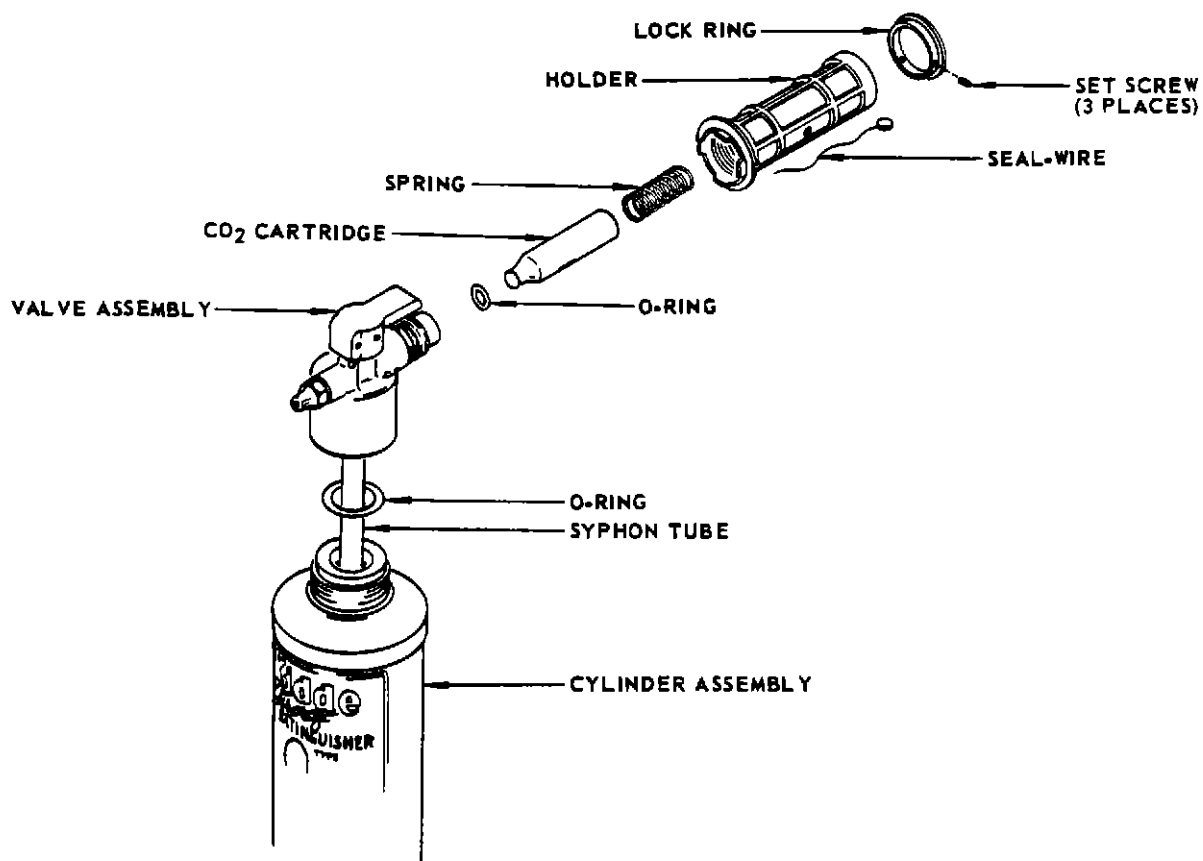
- (1) Thoroughly dissolve contents of anti-freeze package in 1 quart of clean water. Add enough additional water to bring the solution to 1-3/8 quarts Stir the solution thoroughly.
- (2) Allow solution to attain room temperature and then pour solution through screening cloth, into extinguisher.

CAUTION. DO NOT ALLOW ANY UNDISSOLVED AGENT OR OTHER FOREIGN MATTER TO BE POURED INTO THE EXTINGUISHER.

- (3) Prepare valve assembly for installation.

NOTE Before assembly apply light coat of MIL-L-4343 grease to neck of cartridge, to external threads of valve body, and to internal threads of holder.

- (a) Insert the spring into the holder
 - (b) Insert a new cartridge into the valve body.
 - (c) Place the holder over the cartridge and turn the holder until the red lines on the holder and the valve body match
- (4) Assemble the valve assembly to the cylinder assembly, by hand
 - (5) If the extinguisher is of the tamper proof variety slip the lock ring over the holder Position the lock ring with its outside surface flush with the outside surface of the liner Lock the lock ring in place using the three set screws.
 - (6) Attach a new seal wire and a new seal
 - (7) If the instruction decal or the nameplate decal have been removed from the cylinder, apply new decals to the cylinder assembly



Water Type Fire Extinguisher Assembly
Figure 201

END



MAINTENANCE MANUAL

FLOOR-MOUNTED ESCAPE SLIDES - MAINTENANCE PRACTICES

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1. General

- A. The maintenance practices included in this section (201-299 page block) are general maintenance instructions that do not definitely fall within a specific category. Other maintenance instructions such as Servicing, Removal/Installation, Adjustment/Test, etc. are provided in the applicable page blocks.
- B. The packing instructions contained in this section apply only to escape slides of the 17D22319 type, by Air Cruisers Inc., which were originally supplied for use exclusively at these floor-mounted locations, and which do not require the use of an adapter (65-4595-5) in conjunction with the tie-down assembly, or stowage.

NOTE: Escape Slides of the Air Cruisers 19D22454 and 20D22483 types, which are normally supplied for door-mounted locations, may be packed in a special manner so that, in conjunction with the adapter (65-45975-5), they may be stowed in these floor-mounted tie-downs. The interchangeability provided by this adapter is a feature of escape slide equipment kits provided by Boeing Master Change 1853-1, and -1-R, and of original equipment (for applicable customers) reworked by Boeing Service Bulletin 2530.

2. Equipment and Materials

- A. Breakable Cord, Federal Specification V-T-276, Type IV, 12-ply
- B. Nylon Thread, Federal Specification V-T-295, Type I, Size E

3. Pack Floor-Mounted Escape Slide

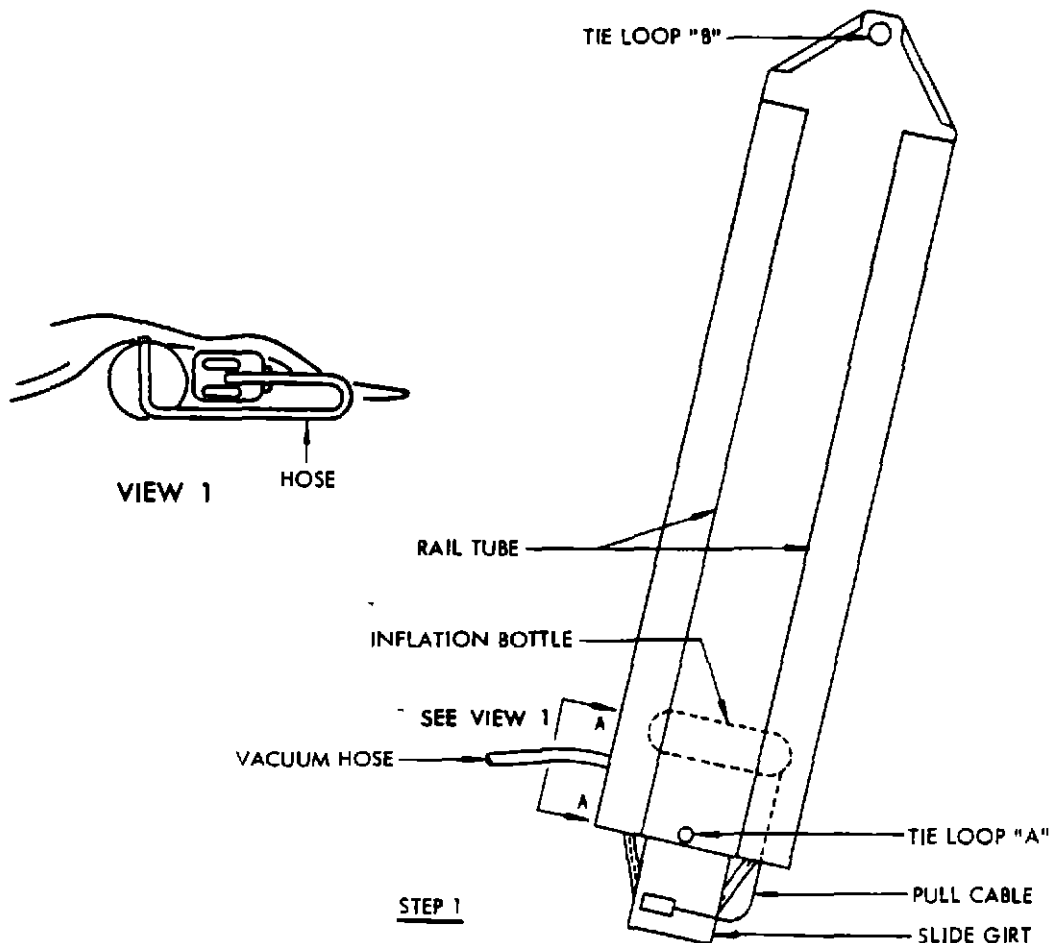
CAUTION: SLIDE ASSEMBLY SHOULD BE HANDLED ONLY ON A CLEAN FLOOR COVERED WITH A TARPAULIN, CARPET OR OTHER SMOOTH SURFACE. DO NOT WALK ON SLIDE. USE EXTREME CARE WHEN HANDLING SLIDE TO PREVENT PUNCTURE OR ACCIDENTAL INFLATION.

- A. Lay out deflated slide for repacking and tuck in all four corners. (See figure 201, step 1.)
- B. Smooth out large wrinkles and flatten side tubes.
- C. Tighten all valves and fittings.



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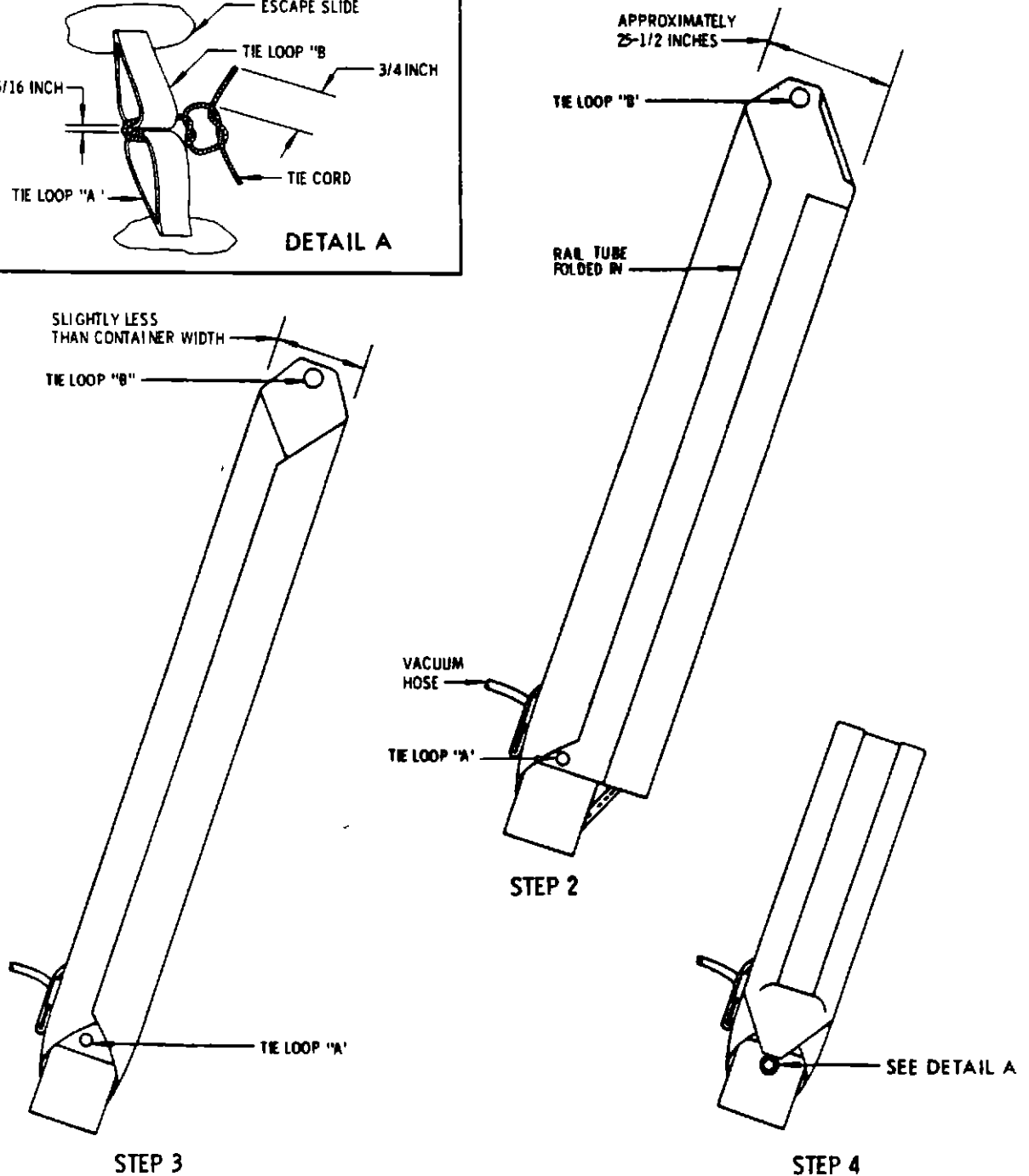
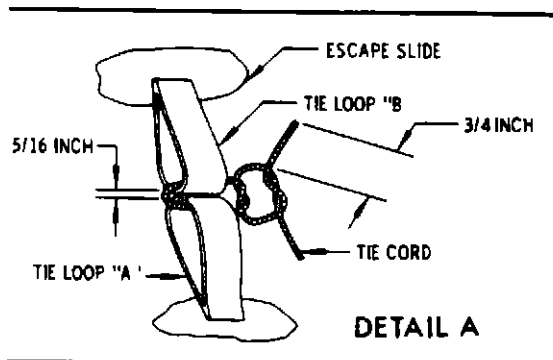
- D. Rotate jet pump to position shown in figure 201, step 7.
- E. Turn air cylinder to ensure clear view of gage and direct alignment of pull cable exit from valve towards girt.
- F. Insert household type vacuum cleaner in jet pump to exhaust air while packing slide. Use clean cloth packing around jet pump opening to reduce leakage.
- G. Dust escape slide with talc or powered soapstone.
- H. Fold left side rail in toward center to a slide width of approximately 25-1/2 inches. Fold right side rail in toward center to a slide width slightly less than container width. (See figure 201 steps 2 and 3.)



Escape Slide Packing Procedure
Figure 201 (Sheet 1)

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- I Fold slide in half lengthwise so that tie loops match. (See figure 201, step 4)
- K Using breakable cord Federal Specification V-T-276, Type IV, make one loop through tie loops "A" and "B." Leave a 5/16 inch space between tie loops. Tie cord with a square knot and trim ends 3/4 inch from knot

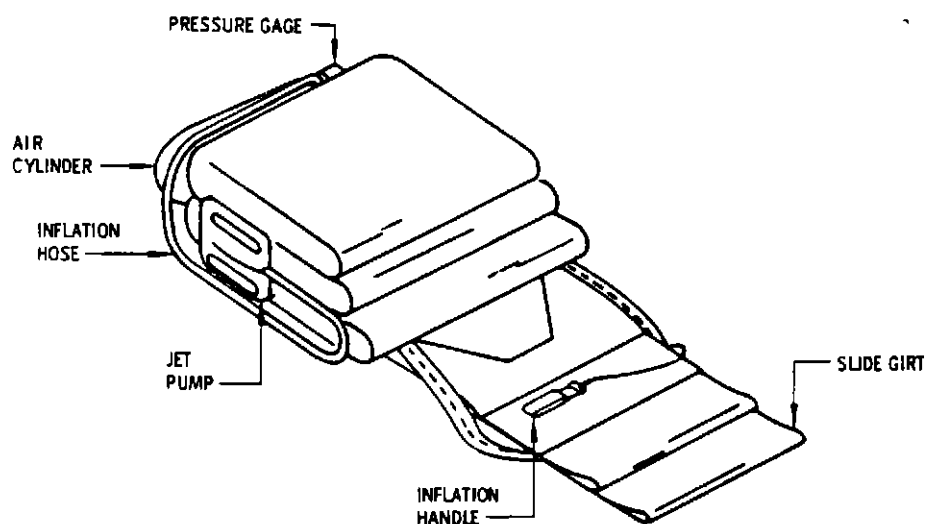


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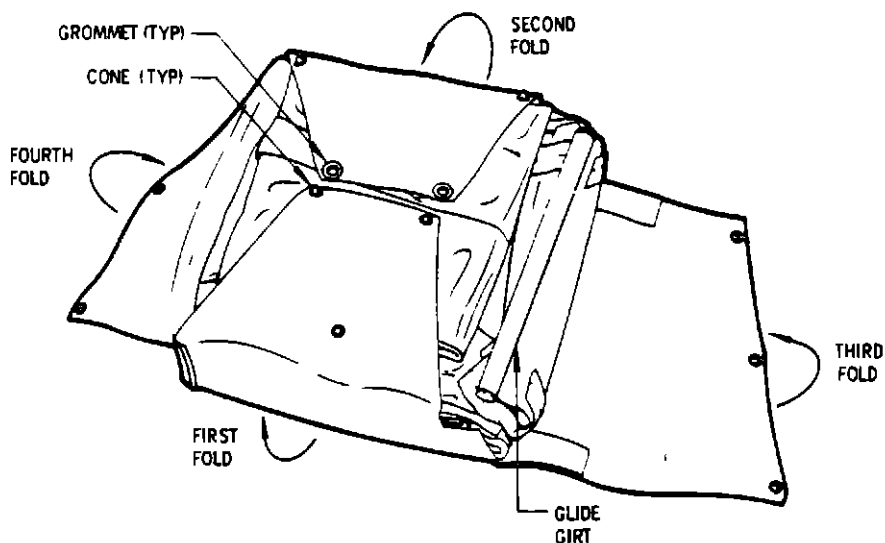
- L. Accordion fold slide to fit container. End folds at tie patch and below air cylinder. (See figure 201, step 5.)

CAUTION DO NOT FOLD SLIDE ON TOP OF AIR CYLINDER.

- M. Remove vacuum hose and cloth packing from jet pump.
- N. Place folded slide on opened container.
- O. Snap inflation handle to girt and accordion fold girt onto container. Fold container flaps over slide. (See figure 201, step 6.)



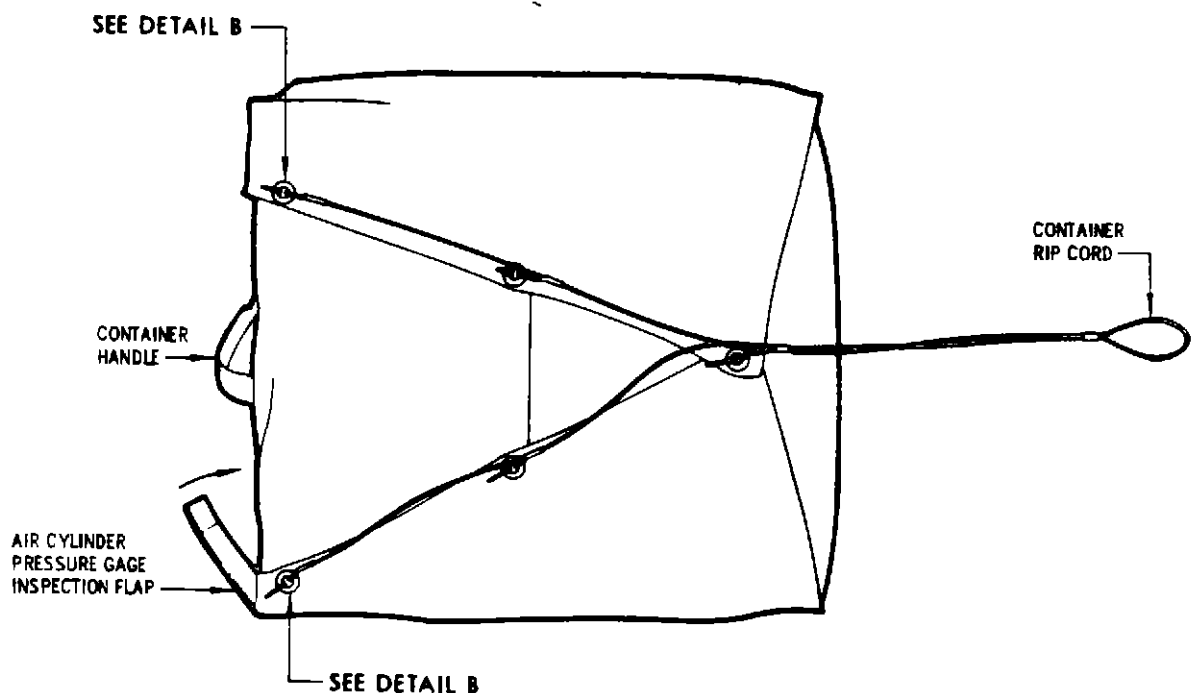
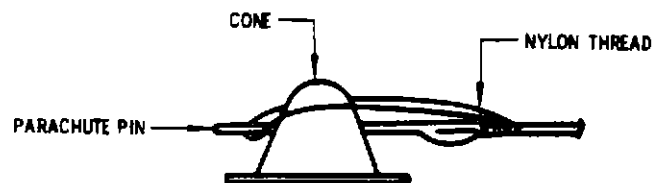
STEP 5



STEP 6

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- P On container flaps place grommets over parachute cones and insert container rip cord parachute pins through cones. Safety tie last parachute pin on each side of slide with a single strand of nylon thread, Federal Specification V-T-295, size E (See figure 201, step 7)
- Q Slide is now ready for storage or installation on aircraft.





MAINTENANCE MANUAL

FLOOR-MOUNTED ESCAPE SLIDES - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1. General

- A. A floor-mounted escape slide, together with its stowage assembly, is installed to each side of the cabin floor at the B.S. 990 emergency escape hatch whenever these hatches are activated.
- B. An adapter (Boeing Part No. 65-45975-5) may or may not be included in the tie-down assembly, or stowage. Its use is determined as follows:
 - (1) Without the adapter, the stowage accommodates escape slides of the 17D2319 type, by Air Cruisers Inc., which were originally supplied for use exclusively at these floor-mounted locations.
 - (2) With the adapter assembled to its retainer bar, the stowage can accommodate escape slides of Air Cruisers 19D22454 and 20D22483 types, which are normally supplied for door-mounted locations, provided that these slides are packed in a special manner.
 - (3) The interchangeability provided by this adapter is a feature of escape slide equipment kits provided by Boeing Master Change 1853-1, and -1-R, and of original equipment (for applicable customers) reworked by Boeing Service Bulletin 2530.
- C. The procedures which follow describe the removal and installation of an escape slide and its stowage as a complete assembly, as this is what would normally be done when converting the cabin to or from any affected configuration. The slide may be assembled to, or disassembled from, its stowage as separate operations which are also described here.
- D. Depending upon the disposition of the passenger seats, it may be necessary to remove the adjacent seat before removing or installing the escape slide.

2. Removal/Installation of Escape Slide and Stowage (Complete Assembly)

A. Remove Escape Slide and Stowage from Floor.

- (1) Release strap buckle and move escape slide aft a few inches (taking care not to pull ripcord) until forward attachments of stowage are easily accessible. (See figure 401.)



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- (2) Remove floor panel screw securing forward inboard corner of stowage to floor.
- (3) Release both ends of retainer bar from floor track and remove whole assembly from floor.

NOTE: If the assembly is to be stored in readiness for reinstallation, it is advisable to retighten the strap to keep escape slide snug against its tie-down angle. If it is left too slack there is a risk that the ripcord may inadvertently be pulled.

- (4) Reinstall attachment screw to floor panel.

B. Install Escape Slide and Stowage to Floor

NOTE: Markings are provided at appropriate positions on the floor, and the floor rugs are provided with slits at the corresponding positions.

- (1) Place assembly approximately in position and slacken off tie-down strap buckle to allow escape slide to move aft a few inches. (This is to obtain access to forward attachments. Do not move slide far enough aft to risk pulling ripcord.)
- (2) Engage forward and aft attachment fittings of retainer bar in floor track at appropriate marks.

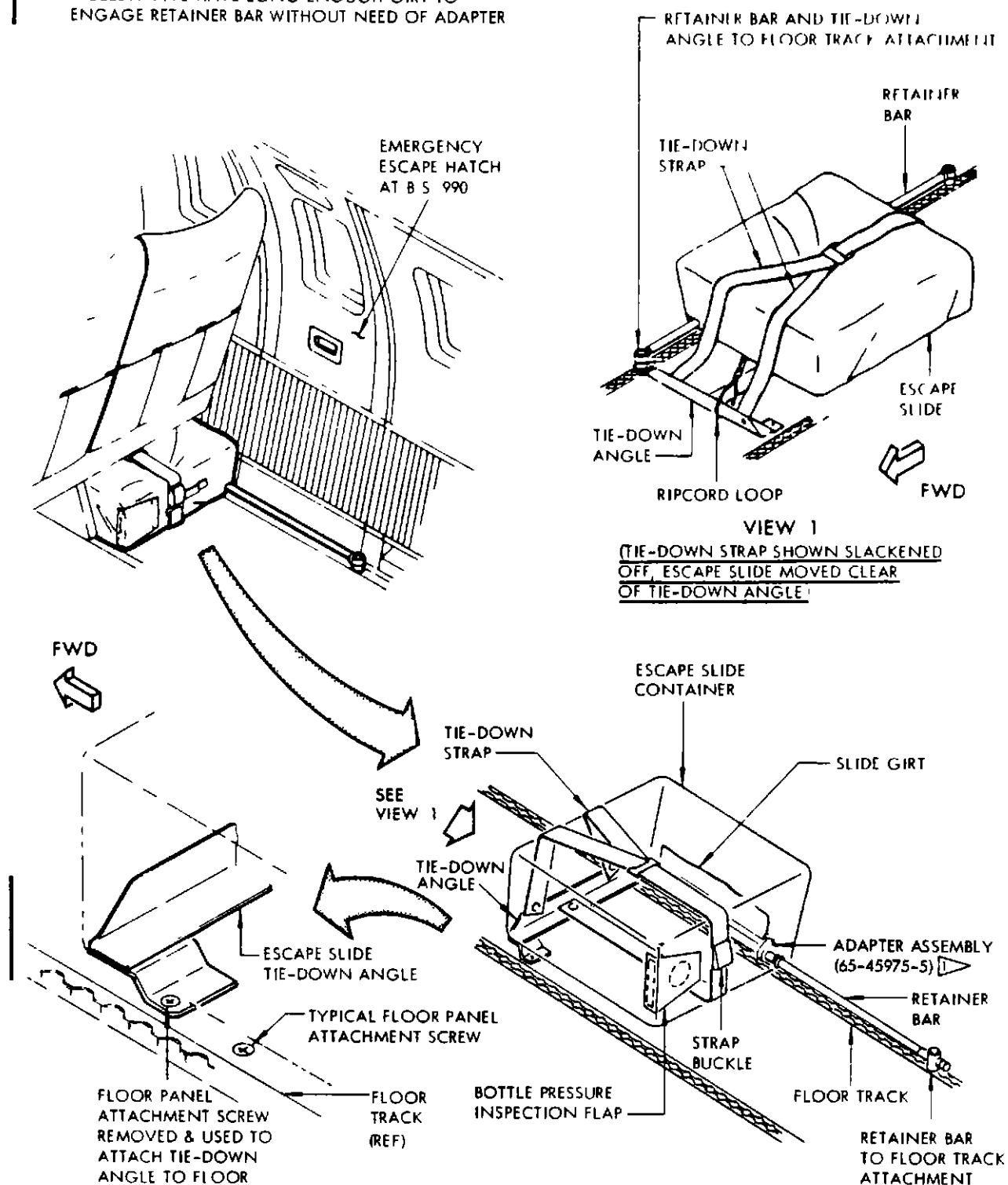
NOTE: There are two types of stowage assembly. (See sheet 2 of figure 401.) On one the outboard end of the tie-down is held to the floor track by the forward attachment fitting of the retainer bar. (These fittings are removed from the retainer bar ends by pushing out a spring pin and withdrawing the fittings.)

On the other type the outboard end of the tie-down angle is attached to the retainer bar by the track attachment fitting at the forward end. (These fittings are locked to the ends of the retainer bar by snap rings.)

- (3) Attach inboard end of tie-down angle to floor by removing marked floor panel attachment screw and reinstalling it so that it secures angle to floor.
- (4) Push escape slide forward to rest snug against tie-down angle and tighten tie-down strap.

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1 USED ONLY TO ACCOMMODATE ESCAPE SLIDES OF 19D22454 AND 20D22483 TYPE. SLIDES OF 17D22319 TYPE HAVE LONG ENOUGH GIRT TO ENGAGE RETAINER BAR WITHOUT NEED OF ADAPTER

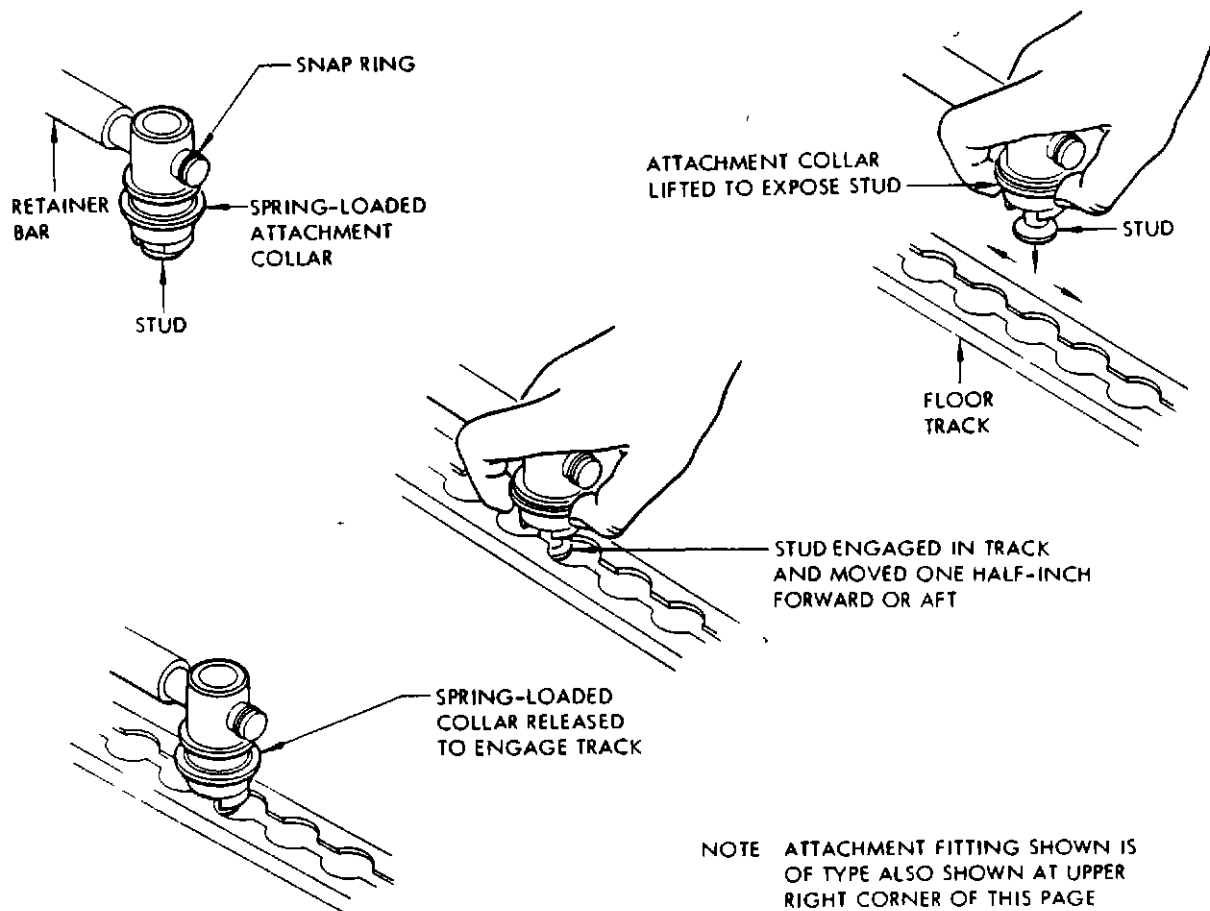
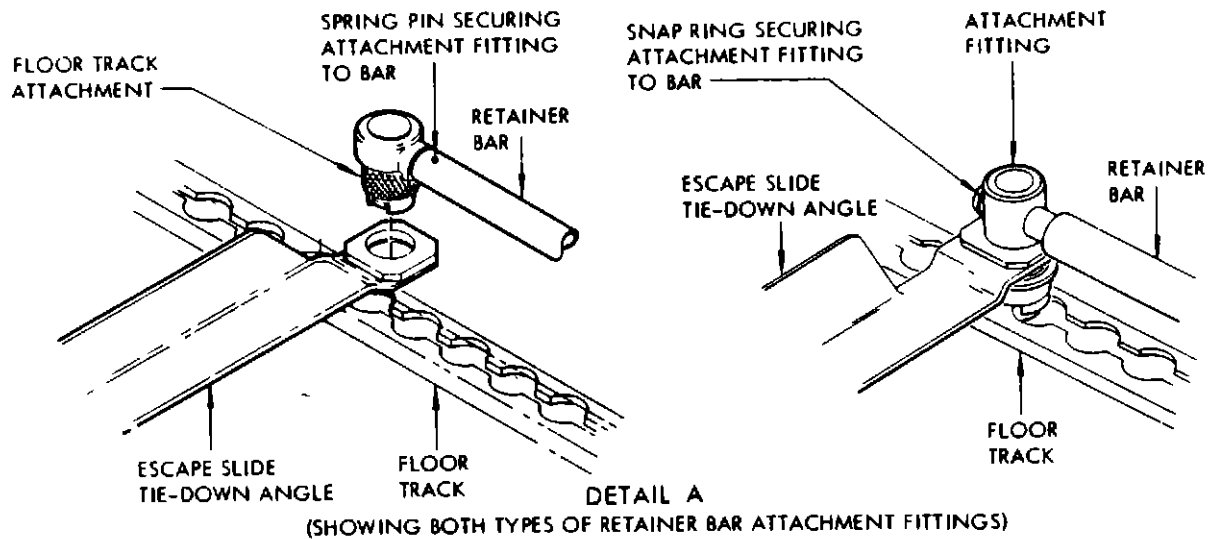


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Floor-Mounted Escape Slide Installation
Figure 401 (Sheet 1)

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Page 403

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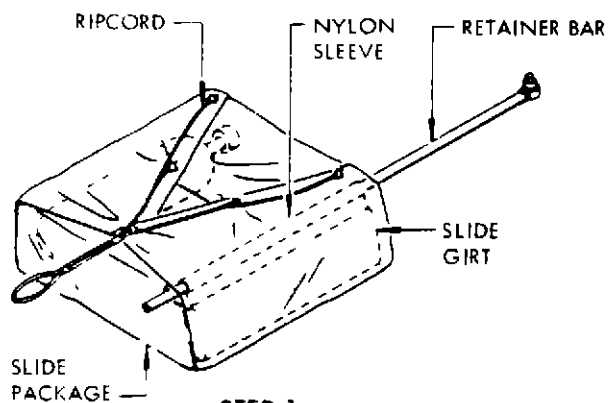


Floor-Mounted Escape Slide Installation
Figure 401 (Sheet 2)

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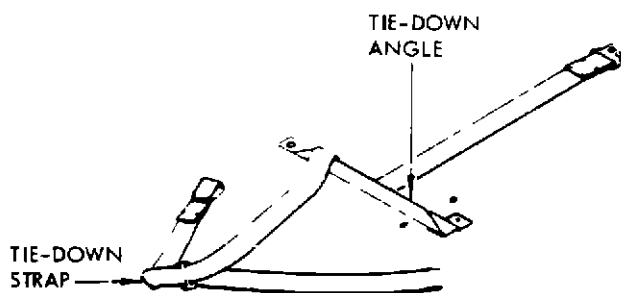
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▷ ESCAPE SLIDE SHOWN IS OF 17D22319 TYPE
GIRT OF WHICH ENGAGES RETAINER BAR
WITHOUT USE OF ADAPTER



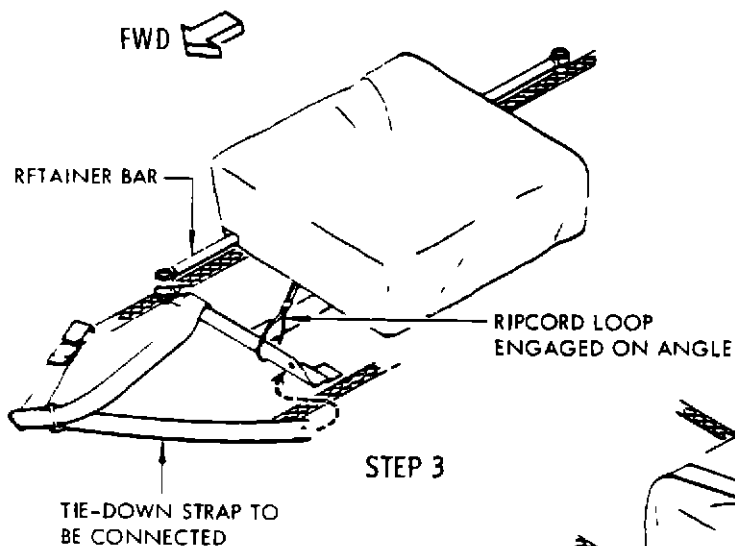
STEP 1

ESCAPE SLIDE INVERTED
TO SHOW ENGAGEMENT
OF RETAINER BAR IN SLEEVE OF
SLIDE GIRT ▷

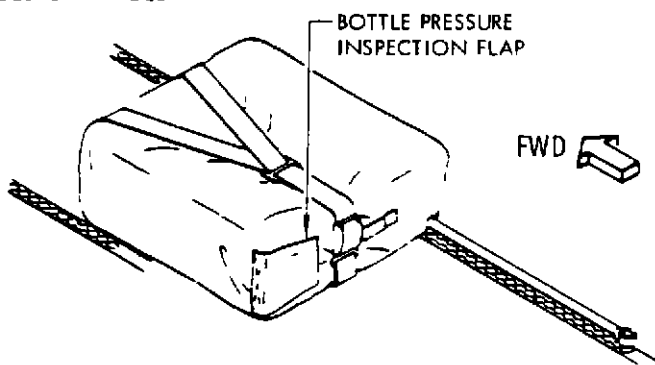


STEP 2

TIE-DOWN STRAP DISCONNECTED
TO PERMIT ENGAGEMENT OF
RIPCORDER LOOP ON TIE-DOWN ANGLE



STEP 3



STEP 4

TIE-DOWN STRAP CONNECTED
BUCKLED AND TIGHTENED

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Floor-Mounted Escape Slide Installation
Figure 401 (Sheet 3)

25-1-27
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3 Removal/Installation of Escape Slide from/to its Stowage

A. Remove Escape Slide from its Stowage

- (1) Disconnect tie-down strap at its inboard attachment to tie-down angle.
- (2) Disengage ripcord loop from tie-down angle.
- (3) Remove floor track attachment fitting from either end of retainer bar.
- (4) On installations without adapter, withdraw retainer bar from sleeve in escape slide girt. Reassemble strap to tie-down angle, and attachment fitting to retainer bar, to avoid loss of small parts.
- (5) On installations with adapter, withdraw retainer bar from adapter assembly link, remove nut from one end of adapter assembly tie rod and remove adapter link from tie rod. Withdraw adapter assembly tie rod from sleeve in escape slide girt. Reassemble strap to tie-down angle, attachment fitting to retainer bar, and link and nut to adapter assembly, to avoid loss of small parts.

B. Install Escape Slide to its Stowage

- (1) On installations without adapter, remove track attachment fitting from either end of retainer bar and insert retainer bar through sleeve in escape slide girt. Reinstall attachment fitting to end of retainer bar. (See step 1, on sheet 3 of figure 401.)
- (2) On installations with adapter, remove adapter assembly link from one end of tie rod and insert tie rod through sleeve in escape slide girt. Install adapter assembly link on end of tie rod and secure with nut. Remove track attachment fitting on either end of retainer bar and insert retainer bar through adapter assembly link. Reinstall attachment fitting to end of retainer bar.
- (3) On all installations, disconnect inboard attachment of tie-down strap to tie-down angle. Move slide forward along bar until its ripcord loop can be slipped around tie-down angle. (See steps 2 and 3.)

NOTE: Care should be taken not to pull ripcord while handling escape slide.

- (4) Reconnect tie-down strap to tie-down angle, push slide firmly forward into angle, engage tie-down strap buckle and tighten strap. (Step 4.)

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FLOOR MOUNTED ESCAPE SLIDES - ADJUSTMENT/TEST

EFFECTIVITY

CARGO AIRPLANES

1. Test Floor Mounted Escape Slide

A. Pressure Test Escape Slide

- (1) Remove escape slide from airplane. (Refer to "Removal/Installation Escape Slide.")
- (2) Remove cover and lay out escape slide

NOTE: Area must be clean and covered with a tarpaulin or other smooth surface Do not walk on slide

- (3) Using the mattress valve provided and not the jet pumps, inflate the slide to 2 psi pressure.

NOTE: Measure pressure with mercury manometer or gauge calibrated in increments not greater than 1/10 of a pound

- (4) The permissible pressure drop over 4 hours is 1 psi. If the pressure drops below 1 psi, bring up to 2 psi and use soapy water to locate leak.

NOTE: Wash soap from slide with clear water.

- (5) Mark leaking area with chalk.
- (6) Deflate escape slide by pressing flap valves of jet pump and make repairs. (See Approved Repairs.)
- (7) Repeat pressure test after repairing the escape slide.

B. Operation Test of Inflation Equipment and Escape Slide

- (1) Remove escape slide pack and inflation equipment from airplane. (Refer to "Removal/Installation Escape Slide.")
- (2) Place slide pack in clear area.
- (3) Remove cover and lay out escape slide.

NOTE. Area must be clean and covered with tarpaulin or other smooth surface. Do not walk on slide.



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- (4) Check that pressure in bottle is 2900 to 3000 psi at 70°F.

NOTE: Refer to figure 501 for acceptable pressure gage reading if ambient temperature is other than 70°F.

- (5) Ensure that area is clear and free from dirt.

NOTE: Jet air pump must be protected from dust, dirt or moisture in order to prevent possible future damage to slide interior.

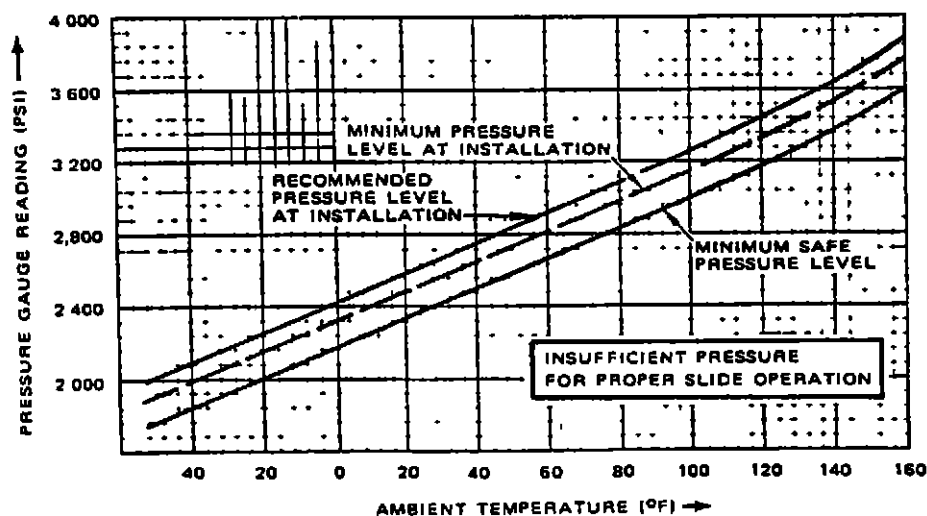
- (6) Inflate slide.

NOTE: Slide should inflate rigid (usable) in a period not exceeding 15 seconds.

- (7) Check that slide remains fully inflated for at least 30 minutes.

- (8) Deflate slide by pressing flap valves of jet air-pump.

CAUTION: FABRIC WILL BE DAMAGED IF HARD OBJECTS ARE DROPPED ON DEFLATED SLIDE.



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Escape Slide Air Bottle Safe Operating Range
Figure 501

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FLOOR MOUNTED ESCAPE SLIDES - INSPECTION/CHECK

EFFECTIVITY

CARGO AIRPLANES

1 General

- A The examination is to determine serviceability at periodic intervals.
- B The check determines if such examination is due and if equipment is in satisfactory flight condition

2 Examine Escape Slide

- A. Remove escape slide from airplane (Refer to "Escape Slide - Removal/Installation.")
- B Remove cover and lay out escape slide.

NOTE Area must be clean and covered with a tarpaulin or other smooth surface. Do not walk on slide.
- C Examine slide for cuts and tears, chafed and worn areas, loose seams, mildewy fabric, oil and grease stains.
- D Check inflation release handle is secure and free from mildew
- E. Examine metal fittings for corrosion.
- F. Examine jet air pump and pressure relief valves for corrosion and distortion.
- G. Examine hose connections for corrosion.
- H. Disconnect flexible hose quick-release connector and examine for corrosion.
- I Examine flexible hose for wear, chafing, cuts and fraying

3 Check Escape Slide

- A. Check date of last overhaul
- B Visually check equipment for moisture and correct installation

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FLOOR MOUNTED ESCAPE SLIDES - APPROVED REPAIRS

EFFECTIVITY

CARGO AIRPLANES

1 Repair Escape Slide

A Equipment and Material

- (1) Scissors, 5-inch blunt nose
- (2) Emery cloth or sandpaper
- (3) Castor wheel or other roller device
- (4) Two clean cloths, for washing
- (5) Brush for applying cement
- (6) Clear can for mixing cement
- (7) Neoprene Cement - Air Cruisers Air Drying No. 1125, Parts A & B
- (8) Patching Fabric - Same as that of which the escape slide is made
- (9) Solvent - Salvazol or Solvescon Carbon Tetrachloride

B. Repair Holes

- (1) Use round patches only on the outer surfaces
- (2) Cut patch to allow 2 inch overlap beyond hole edges.
- (3) Thoroughly wash off all of the aluminum coating around the hole with recommended solvent.
- (4) Lightly buff rubber coating around the hole. Do not damage the wover fabric.
- (5) Wash buffed area with solvent.

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- (6) Apply three coats of cement around the hole, covering an area equal to the size of the patch. These coats of cement should be applied in thin, even coats, allowing each coat to set before applying the next coat. Test for proper setting of cement by lightly pressing knuckle against the cemented surface. If knuckle, when pulled away, makes a snap, the surface is ready for another coat. This snap is a measure of tack.
- (7) Repeat steps (4), (5) and (6) on one side of patch.
- (8) Bring up tack of both cemented surfaces by wiping cemented surfaces with a clean cloth, dampened with solvent.
- (9) Join cemented surface of the patch to the cemented surface of the tube
- (10) Squeeze out all air bubbles between joined surfaces.
- (11) Roll the joined surfaces with pressure.

C. Repair Tears

- (1) Trim off loose threads with scissors.
- (2) Patch tear inside of tube wall.
 - (a) Cut patch large enough to allow 2 inch overlap beyond tear edges.
 - (b) Prepare fabric surface of the inside wall and the patch (See paragraph 1.B. above.)
 - (c) Pass the patch through the tear and lay it, cemented side up, on the tube wall directly opposite the tear.
 - (d) Press the torn section down on the patch.
 - (e) Squeeze all air bubbles out from between the cemented surfaces and roll with pressure to bond the patch to the inside tube wall.
- (3) Patch tear outside of tube wall.
 - (a) Cut patch large enough to allow 6" overlap beyond tear edge
 - (b) Use standard patching procedure. (See paragraph 1.B.)

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D. Repair Seams

- (1) Roll back loosened seams for a reasonable distance so they may be cemented properly.
- (2) Wash tube and tape with solvent, thoroughly removing all of the aluminum coating.
- (3) Apply two coats of cement on surfaces to be joined (Allow each coat to dry thoroughly.)
- (4) Bring up the tack by wiping with a solvent dampened cloth
- (5) Lay seam and tape in place and roll with pressure being applied to form a good bond.

NOTE Follow same procedure for friction strips.

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DOOR-MOUNTED INFLATABLE ESCAPE SLIDES - MAINTENANCE PRACTICES

EFFECTIVITY

TCA	LX-N20198
	LX-N20199
RTCA	LX-N19997
	LX-N20000

1. General

- A. This section covers the packing instructions for the door-mounted escape slides, part No. 20D22483-6 and 20D22483-2, made by Air Cruisers division of the Garrett Corporation. Removal and installation of these escape slides and their compartments are described in the 401-499 page block of 25-1-29.

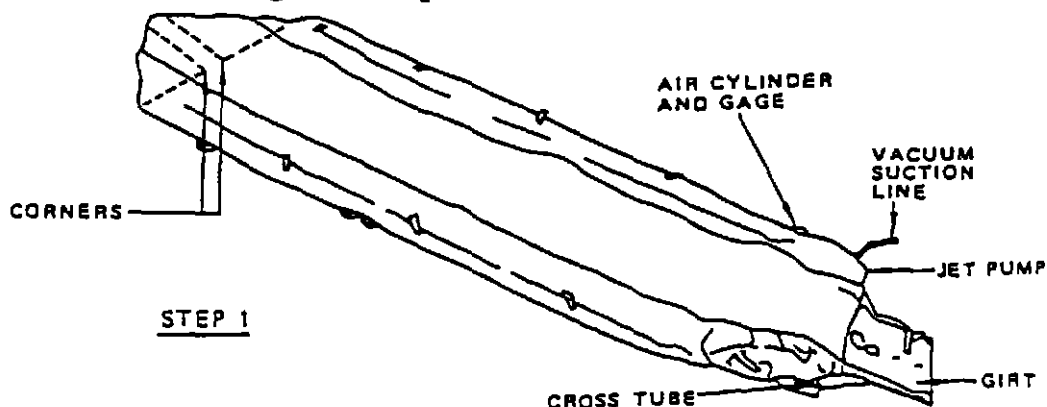
2. Packing the Escape Slide

A. Step 1

- (1) Carefully lay out deflated slide on a clean surface and flatten side tubes.

CAUTION. ALL POSSIBLE WRINKLES MUST BE REMOVED FROM SIDE TUBES.

- (2) Tuck in corners. (See figure 201, step 1.)
- (3) Insert vacuum suction line into jet pump and seal jet pumps with tape or cheesecloth to reduce leakage.
- (4) Tighten all valves and fittings.
- (5) Tuck in cross tube.
- (6) Check air cylinder for servicing. (See Boeing Service Manual.)
- (7) Place air cylinder as shown to ensure a clear view of gauge and direct alignment of pull cable from valve toward girt.



B. Step 2

NOTE: Steps 2, 3, and 4 apply to RH air tubes only.

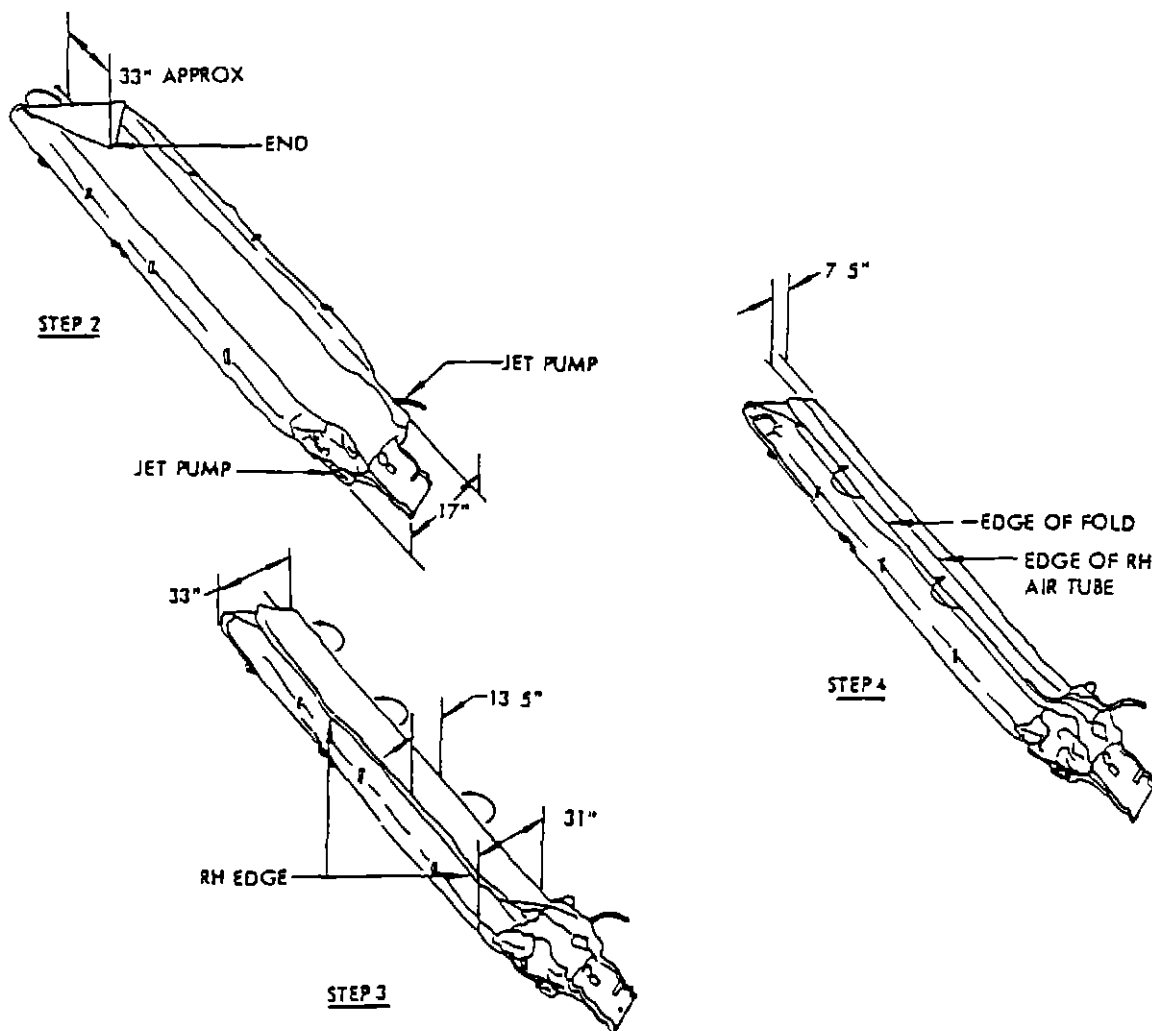
- (1) Turn on vacuum and allow slide to completely deflate.
- (2) Fold end up approximately 33 inches and tuck in jet pumps to 17 inches. (See step 2, figure 201.)

C. Step 3

- (1) Fold RH edge inward approximately 13.5 inches, so that foot end of slide is approximately 33 inches wide and upper end is approximately 31 inches wide. (See step 3, figure 201.)

D. Step 4

- (1) Fold RH air tube outward so that edge of air tube is 7.5 inches from outer edge of slide. (See step 4, figure 201.)



Door-Mounted Escape Slide - Packing
Figure 201 (Sheet 2)

E. Step 5

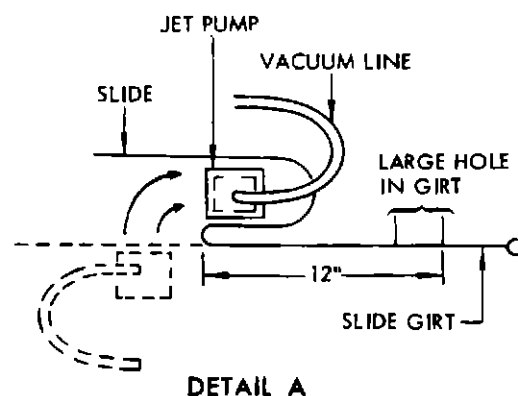
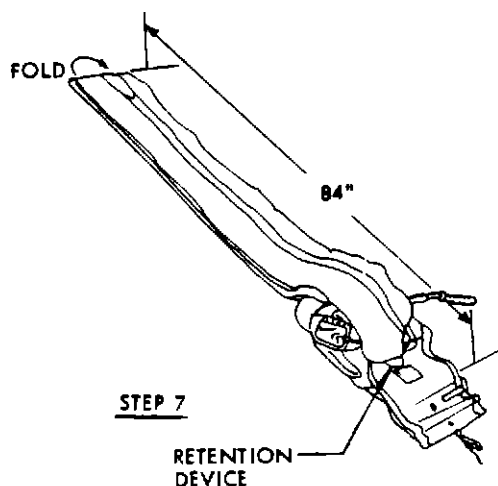
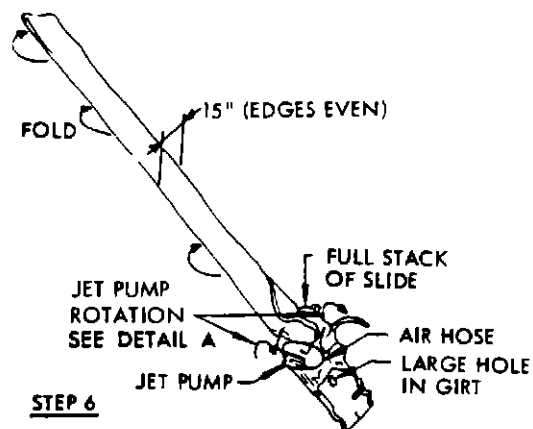
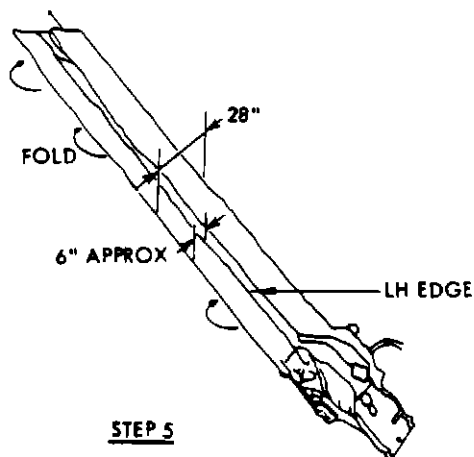
- (1) Fold LH edge inward approximately 6 inches to a total slide width of approximately 28 inches. (See step 5, figure 201.)

F. Step 6

- (1) Make final lengthwise fold to a total slide width of 15 inches. Edges should be even.
- (2) Rotate both jet pumps 180 degrees. Dimensions should be as shown. (See step 6, figure 201.)

G. Step 7

- (1) Fold slide in half and connect retention device by sliding the two halves together and snapping cover flaps around plastic clasp.



H. Step 8

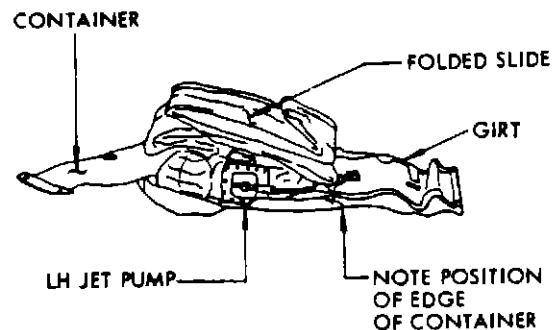
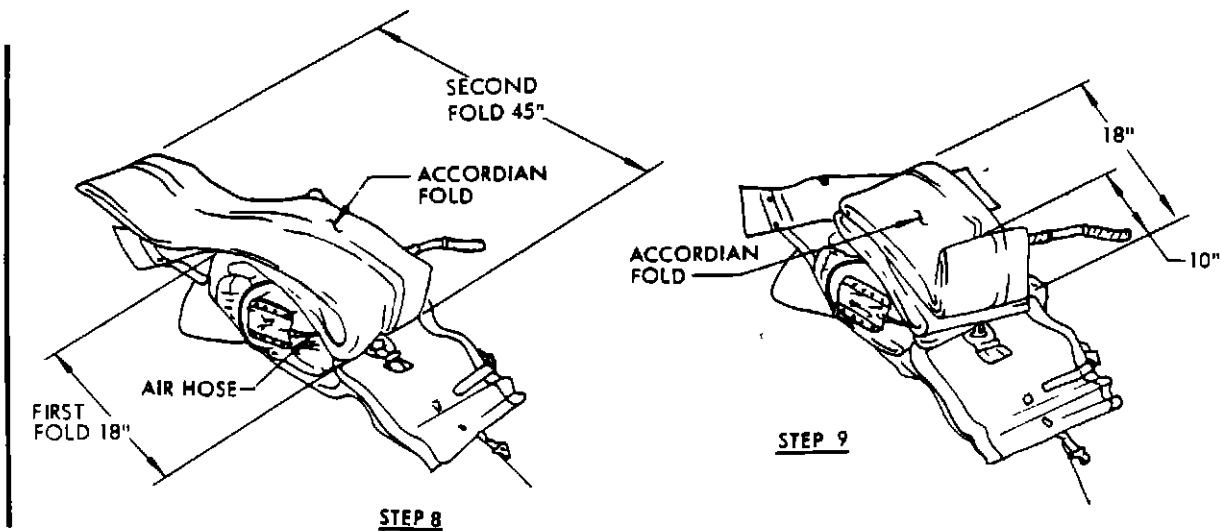
- (1) Begin accordion folds, making sure that the air hose from the LH jet pump is routed smoothly under the folds. (See step 8, figure 201.)

I. Step 9

- (1) Finish accordion folds. (See step 9, figure 201.)

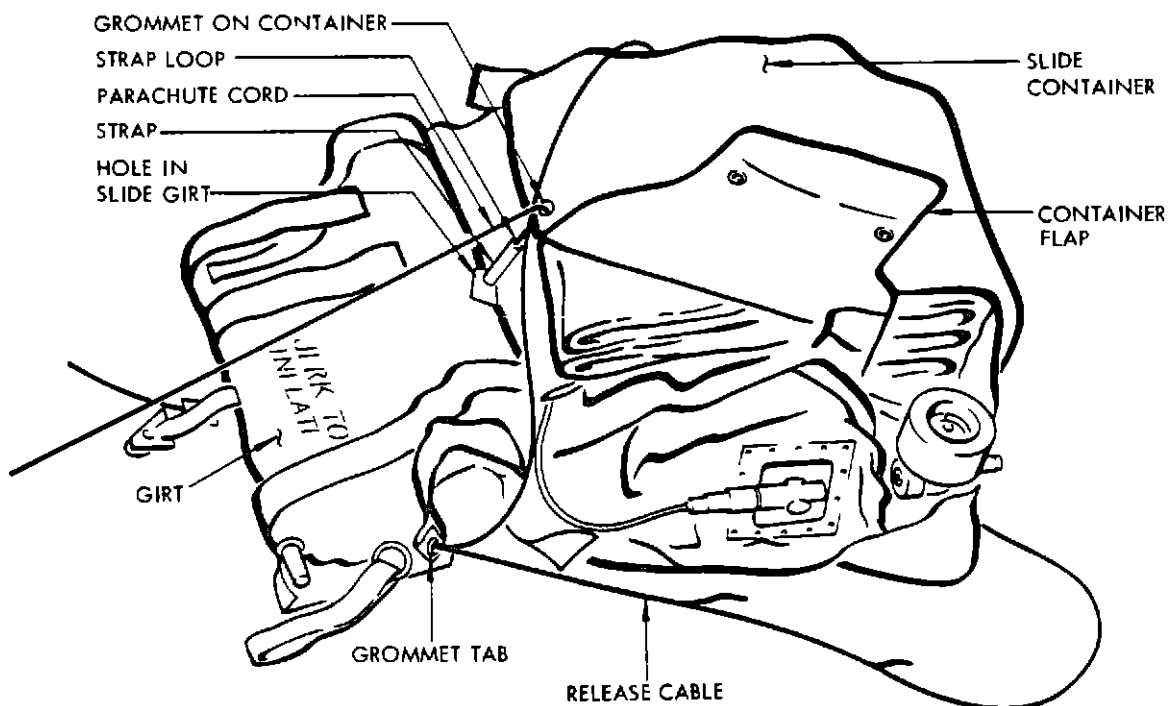
J. Step 10

- (1) Place folded slide in container, noting the position of the LH jet pump.
- (2) Check position of the air hoses to make sure they are not kinked and are not under the air cylinder. (See step 10, figure 201.)

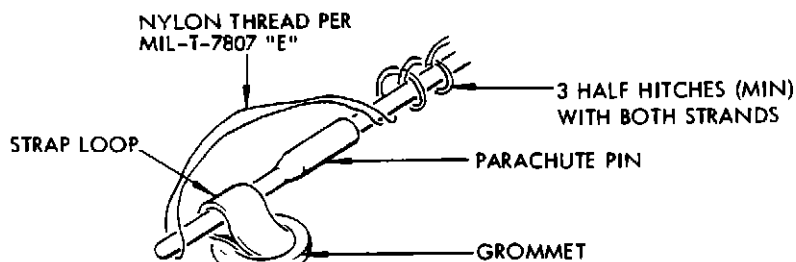


K. Step 11

- (1) With the slide properly positioned, fold the container up over the slide.
- (2) Insert strap thru the rectangular opening in the slide girt and pull the strap loop through the grommet in the container, using a 4 or 5 foot long piece of parachute cord.
- (3) Insert the parachute pin through the loop and safety tie with one strand of nylon thread per MIL-T-7807 size "E." (See step 11, figure 201.) Make sure release cable is properly positioned.
- (4) Disconnect vacuum hose, being sure to remove the tape and/or the cheesecloth packing from both jet pumps.



STEP 11



DETAIL B

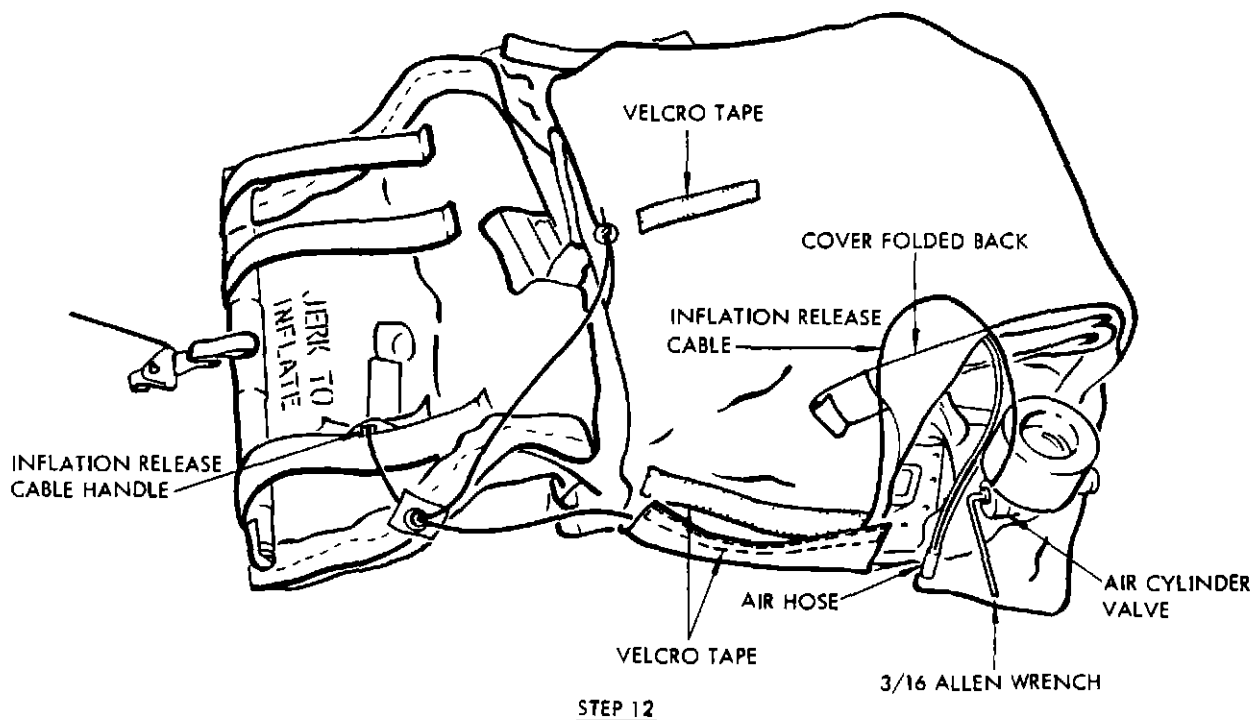
Door-Mounted Escape Slide - Packing
Figure 201 (Sheet 5)

L Step 12

- (1) Pull the remaining 4 loops through the respective grommets and secure with parachute pins as in step 11. (See step 11, figure 201.)
- (2) Safety tie each parachute pin with one strand of nylon thread per MIL-T-7807 size "E." (See detail B, step 11.)
- (3) Fold cover back to gain access to air hose and inflation release cable.
- (4) Tightly cap air outlet and open valve on air cylinder with 3/16 Allen wrench.
- (5) Insert inflation cable end into air valve and reclose valve.

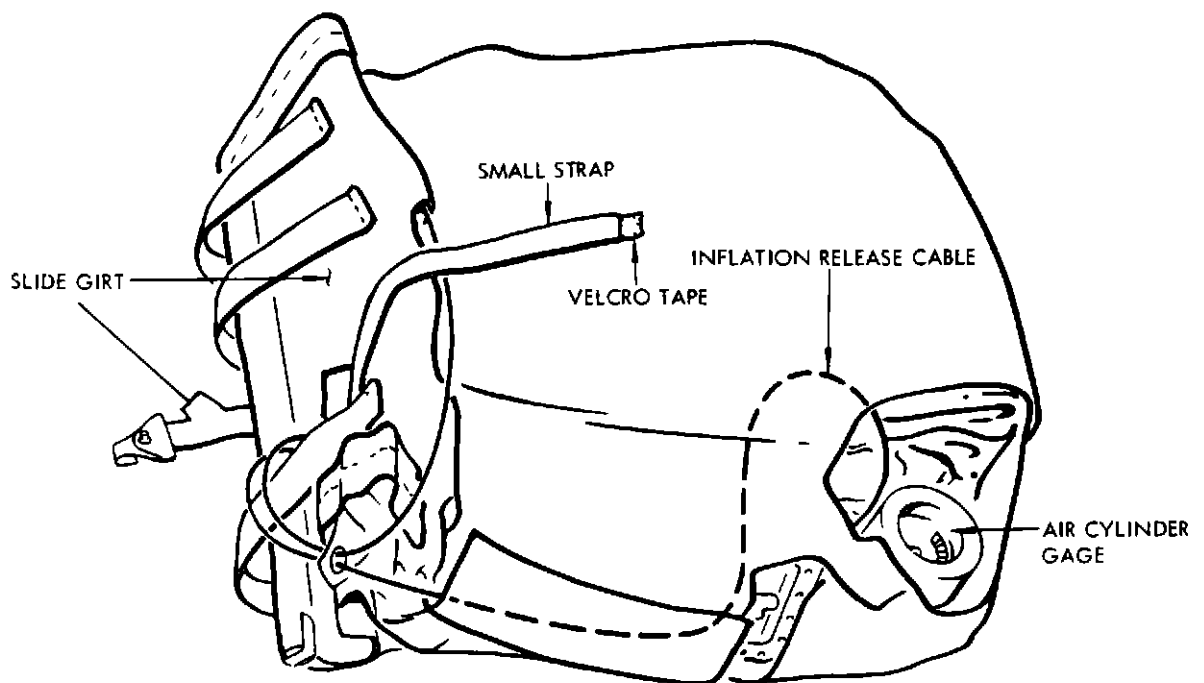
CAUTION: PLACING EXCESSIVE PRESSURE ON ALLEN WRENCH MAY BREAK AIR VALVE.

- (6) Remove cap from air outlet and plug from air hose, and connect hose to air outlet on valve.
- (7) Attach inflation release cable handle to slide girt.



M. Step 13

- (1) Close and seal container side flaps with attached velcro tape.
- (2) Push the inflation release cable into the container being careful to avoid binding or snagging on anything. Cable should form a smooth loop as shown in step 13.
- (3) Check that the air cylinder gauge is readable through the window of the container.
- (4) Position the slide girt and pull the small strap up and attach to patch of velcro tape. (See step 12, figure 201.)

STEP 13

-
MAINTENANCE MANUAL

DOOR-MOUNTED INFLATABLE ESCAPE SLIDES - REMOVAL/INSTALLATION

EFFECTIVITY

All 707-329C

1. Removal/Installation Escape Slide and Compartment

A. Remove Compartment (See figure 1.)

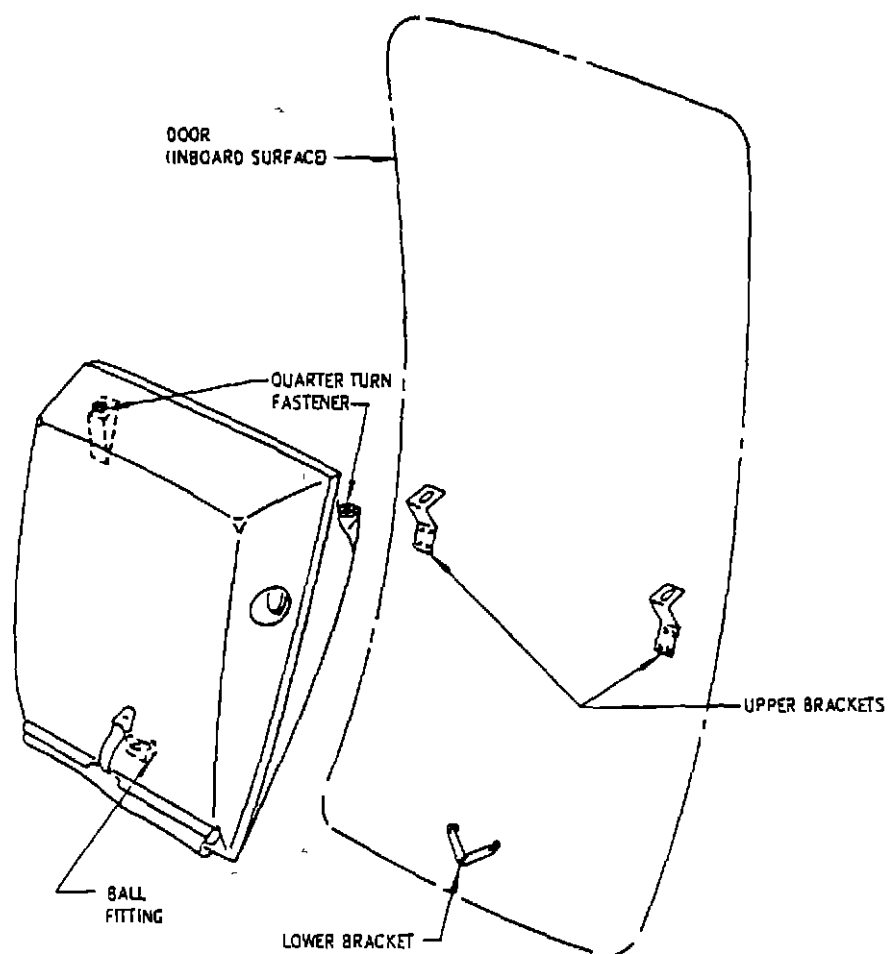
NOTE: To remove escape slide from compartment, it is not necessary that compartment be removed from door. Instructions are included for maintenance reasons.

- (1) Disengage quarter turn fasteners (2) at upper outboard ends of compartment.
- (2) Rock compartment inboard and lift compartment to remove its lower ball fitting from lower "V" shaped bracket on door.

B Remove Escape Slide from Compartment (See figure 2.)

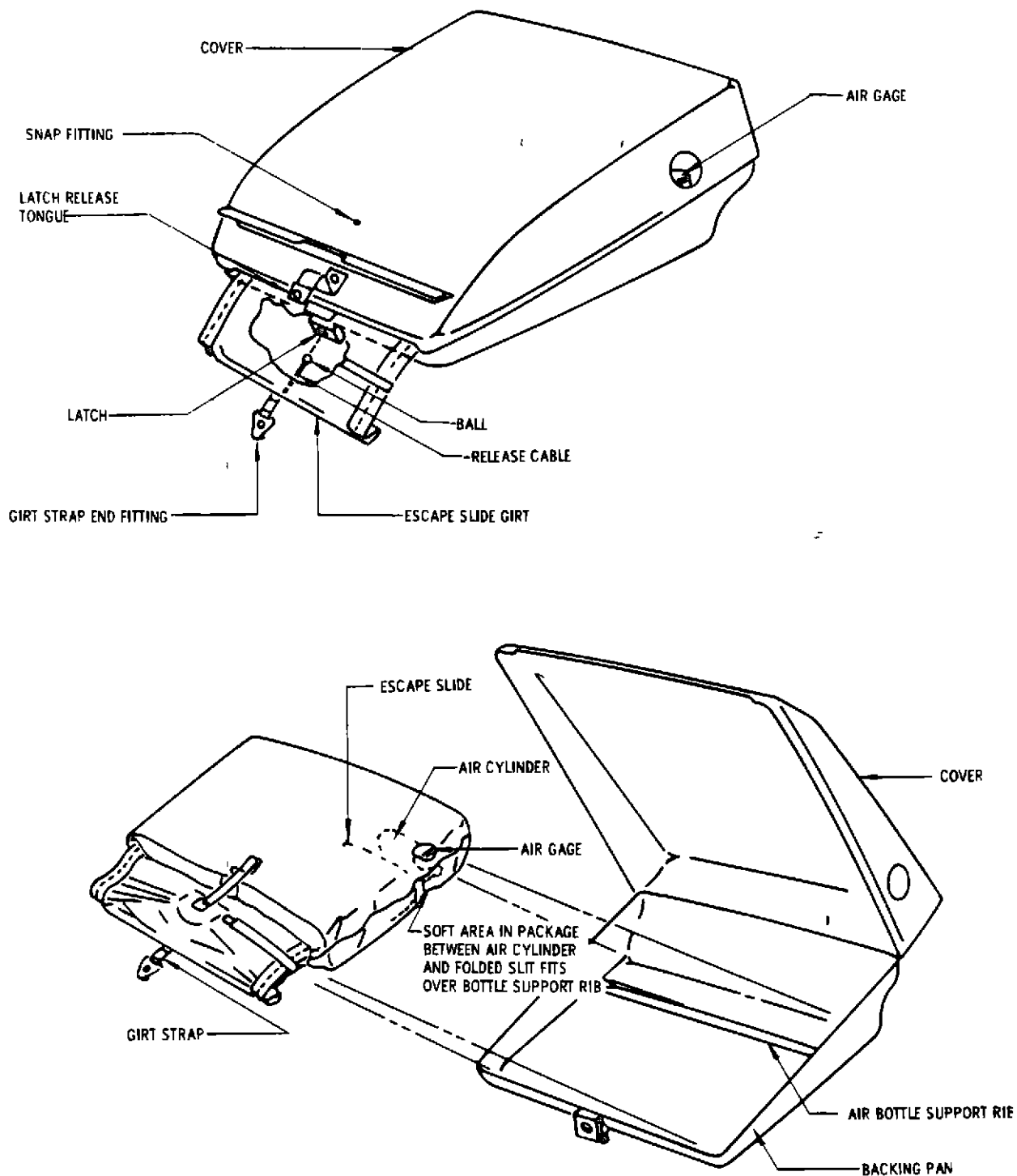
- (1) Unsnap girt strap end fitting from compartment.
- (2) Depress spring in latch by pushing in on latch release tongue.
- (3) Remove ball on release cable from round hole in latch.
- (4) Remove latch release tongue from latch and from hole in girt.
- (5) Open compartment cover and remove escape slide.

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Escape Slide Compartment Installation
Figure 1 (Sheet 1)

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C. Install Escape Slide in Compartment

- (1) Remove compartment from door if compartment was not removed previously. Refer to step A.
- (2) Put compartment on floor or other horizontal surface with cover facing upward. (See figure 2.)
- (3) Assemble retainer bar and girt strap to escape slide.
- (4) Place escape slide in compartment, being sure to place recess in bottom of escape slide over air bottle support rib on compartment backing pan.
- (5) Close compartment cover.
- (6) Check to see that pressure gage on air bottle is visible through window in compartment cover.
- (7) Place latch release tongue through hole in girt and into slot in latch.
- (8) Depress spring in latch by pushing in on latch release tongue.
- (9) Insert ball on release cable as far as possible into hole in latch.
- (10) Release pressure on latch release tongue.
- (11) Check floor fitting. Refer to 25-1-35, Escape Slide Floor Fitting - Inspection/Check.
- (12) Place girt in stowed position and snap girt strap end fitting to compartment cover

D. Install Compartment

- (1) Place ball fitting on compartment into lower V-shaped bracket on door. (See figure 1.)
- (2) Rock compartment onto the two upper fittings on door.
- (3) Engage quarter-turn fasteners to secure compartment.
- (4) Check floor fitting. Refer to 25-1-35, Escape Slide Floor Fitting - Inspection/Check.

LIFE RAFTS - MAINTENANCE PRACTICES

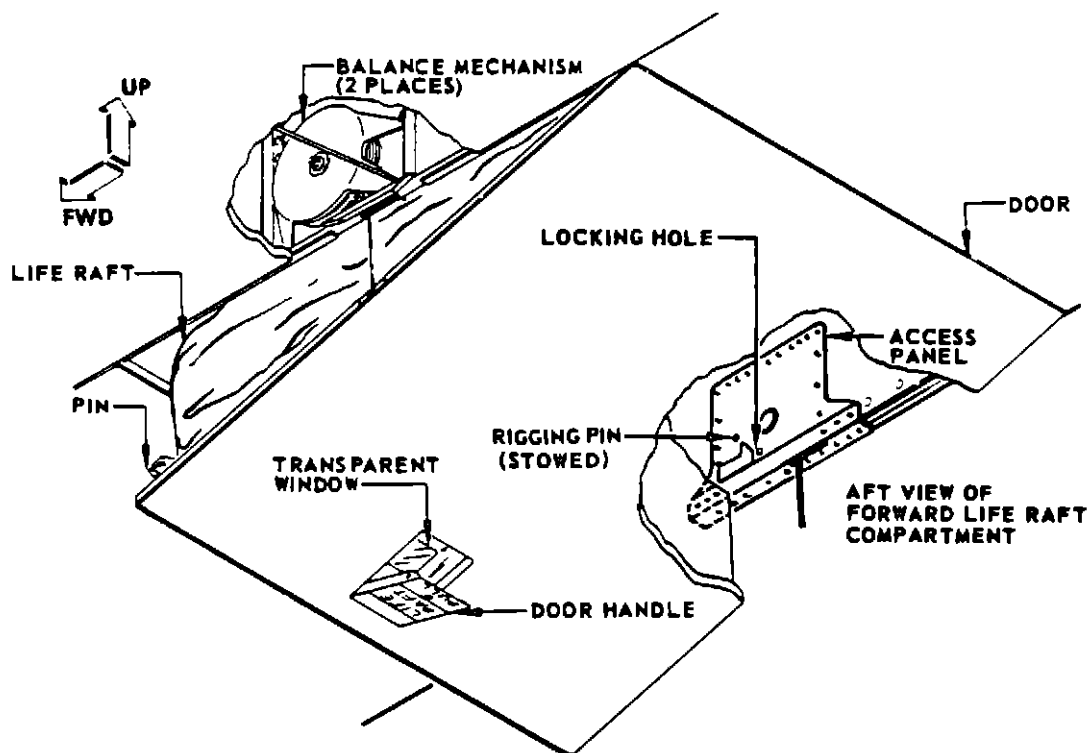
1. Removal/Installation Life Rafts

A. Remove Life Raft

- (1) Pull door handle and lower door to fully open position.
- (2) Place locking pins in both balance mechanisms to prevent door closing. (See figure 201.)

NOTE Move door slightly to locate holes.

- (3) Remove life raft.



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B Install Life Raft

NOTE: Before installing life rafts, place overhaul date card in spring clips provided over transparent panel.

- (1) Place life raft on door to the rear of spar with snap fasteners uppermost.
- (2) Remove locking pins from balance mechanisms and insert in stowage holes.
- (3) Close door and lock.

2. Inspection/Check Life Rafts

A. Check Life Rafts

- (1) Check date life raft was last overhauled.



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ESCAPE SLIDE FLOOR FITTING - REMOVAL/INSTALLATION

EFFECTIVITY

TCA	LX-N20198
	LX-N20199
RTCA	LX-N19997
	LX-N20000

1. Removal/Installation Escape Slide Floor Fitting

A. General

- (1) Escape slide floor fittings are installed at both entry and both galley doorways. All fittings are similar in that they are attached directly to the floor (standard type), except for the one at the aft entry doorway on cargo airplanes which is attached to the floor track (track-mounted type).

B. Remove Escape Slide Floor Fitting (Standard)

- (1) Loosen the quarter turn screws by rotating them 90 degrees and remove the escape slide floor fitting. (See figure 401.)

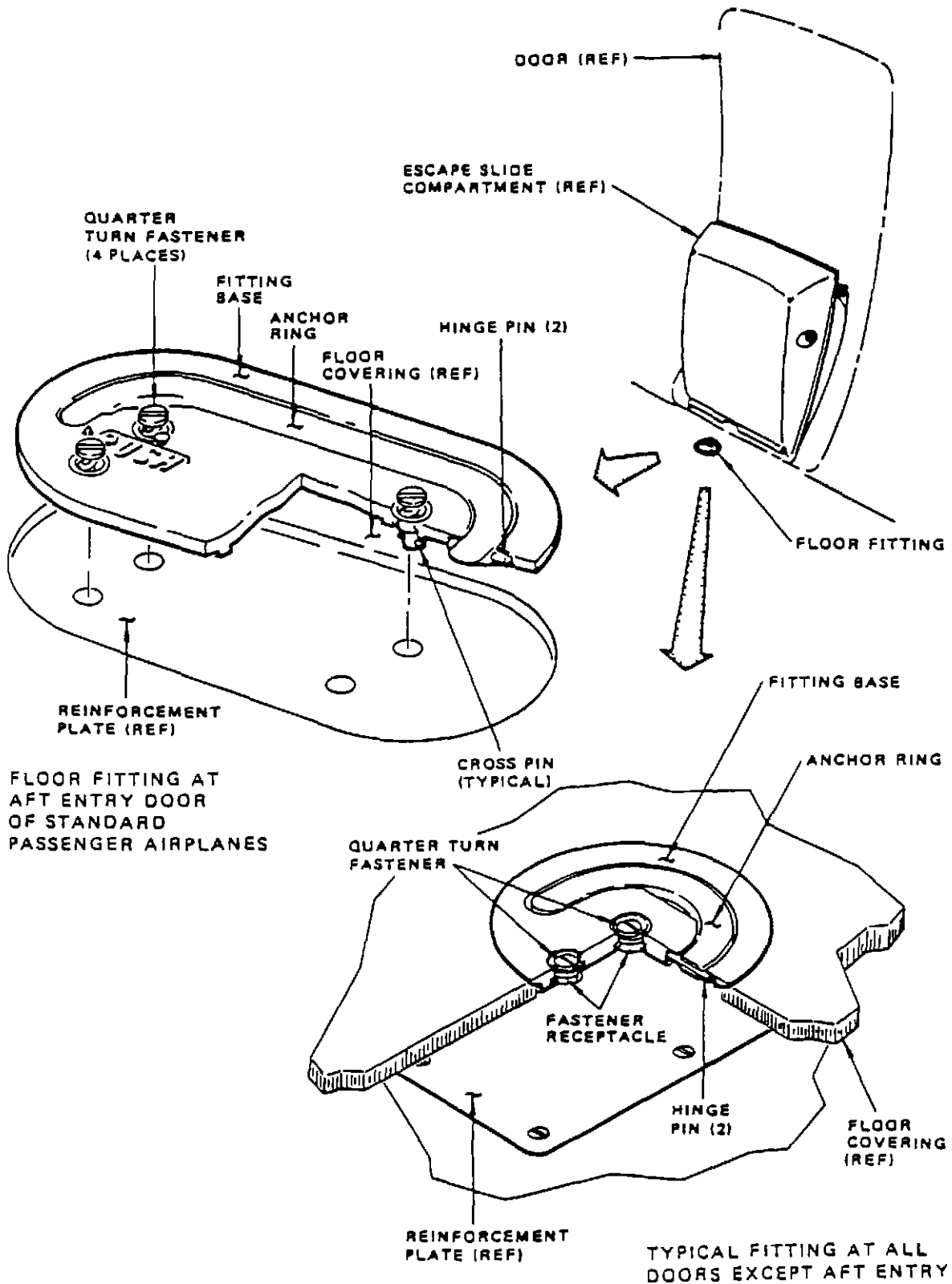
C. Install Escape Slide Floor Fitting (Standard)

- (1) Making sure the surrounding floor covering is smooth, place the escape slide floor fitting in position by lining up the quarter turn screws with their respective receptacles. (See figure 401.)
- (2) Tighten the quarter turn screws by rotating them 90 degrees and check that the escape slide floor fitting is secure.
- (3) Check floor fitting. Refer to Escape Slide Floor Fitting - Inspection/Check.

D. Remove Escape Slide Floor Fitting (Track-Mounted)

- (1) Remove screw from center of escape slide floor fitting. (See figure 401.)
- (2) Slide floor fitting forward or aft 1/2 inch along seat track to seat track cutout and remove floor fitting.
- (3) Remove locking nut from seat track.

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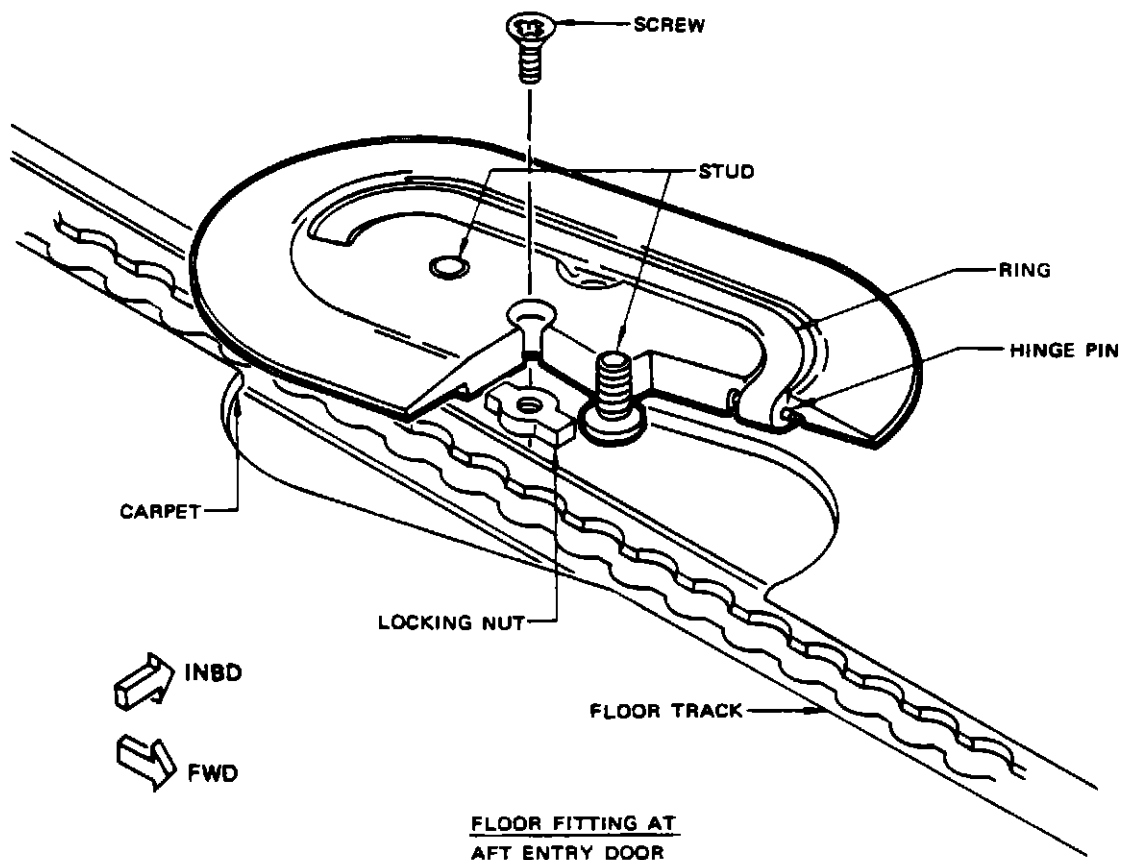
Escape Slide Floor Fitting Installation
 Figure 401 (Sheet 1)



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E. Install Escape Slide Floor Fitting (Track-Mounted)

- (1) Place the locking nut into the seat track cutout within the red area marked on the floor track. (See figure 401.)
- (2) Place the escape slide floor fitting onto the floor track allowing the two protruding studs on the bottom of the fitting to engage floor track cutouts.
- (3) Slide the escape slide floor fitting forward or aft along the seat track to line up the screw hole in the fitting with the locking nut already placed into the track.
- (4) Place screw in screw hole and tighten into locking nut.
- (5) Check floor fitting. Refer to Escape Slide Floor Fitting - Inspection/Check.





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ESCAPE SLIDE FLOOR FITTING - INSPECTION/CHECK

EFFECTIVITY

TCA	LX-N20198
	LX-N20199
RTCA	LX-N19997
	LX-N20000

1. General

- A. Escape slide floor fittings should be kept free of accumulated dirt, lint, sand and moisture to ensure free movement of the hinged anchor ring.

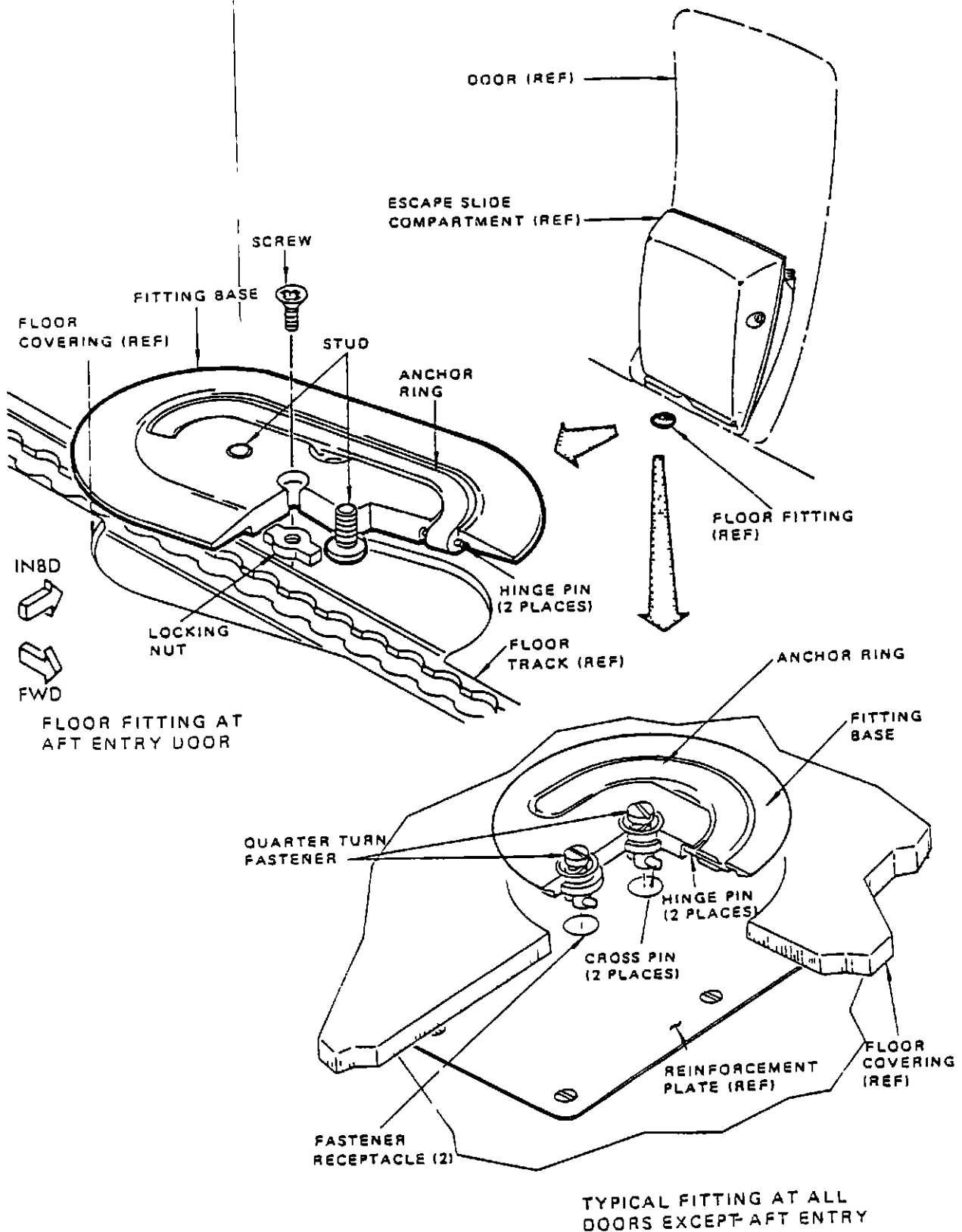
CAUTION: A CLOGGED ESCAPE SLIDE FLOOR FITTING WOULD BE A DEFINITE HINDERANCE TO ESCAPE SLIDE ACTIVATION.

2. Escape Slide Floor Fitting Check

A. Examine Escape Slide Floor Fitting.

- (1) Remove fitting. Refer to 25-1-35, Escape Slide Floor Fitting - Removal/Installation.
- (2) Clean all dirt and moisture from fitting and quarter turn fastener receptacles in floor. (See figure 601.)
- (3) Check that anchor ring can be easily raised with fingers.
- (4) Check that anchor ring moves freely on its hinge pins.
- (5) Check that recessed area in fitting base is free of dirt and moisture.
- (6) Check anchor ring, fitting base, and fasteners for damage and loose or defective attachments with particular attention to the cross pins in the quarter turn fasteners.
- (7) Install fitting. Refer to 25-1-35, Escape Slide Floor Fitting - Removal/Installation.

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Escape Slide Floor Fitting
Figure 601

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Jul 15/68



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B. Check Escape Slide Girt Strap

- (1) Snap hook of girt strap end onto escape slide floor ring. Hook must engage ring freely and spring-loaded retainer must close with audible snap.
- (2) Grasp strap end fitting and slide its hook along the ring. Without depressing the retainer, attempt to disengage the hook from the ring. Hook must slide freely on ring and must not disengage from ring unless retainer is manually depressed.
- (3) If installation fails to pass the above check, replace the strap end fitting or ring as required.

NOTE: Do not attempt to repair or alter parts.



LIFE VESTS - MAINTENANCE PRACTICES

1. Inspection/Check Life Vests

A. Check Life Vests

- (1) Examine for wear, cracks, tears or deterioration of the fabric
- (2) Check vest is clean, and all straps and attachments are secure.
- (3) Check CO₂ cartridges are not discharged.
- (4) Inflate life vest and examine for leaks.
- (5) Check oral inflation tube functions correctly.
- (6) Check polyethylene container is clean and free of tears.



LIFE RAFT COMPARTMENT DOORS BALANCE MECHANISMS -
MAINTENANCE PRACTICES

1. Removal/Installation Life Raft Compartment Door Balance Mechanism

A. Remove Balance Mechanism (See figure 201.)

- (1) Remove cable retaining screw from door
- (2) Release cable from door.

NOTE Cable is spring loaded Grip firmly before releasing then allow to retract slowly.

- (3) Remove screws holding access panel in position.
- (4) Remove access panel.

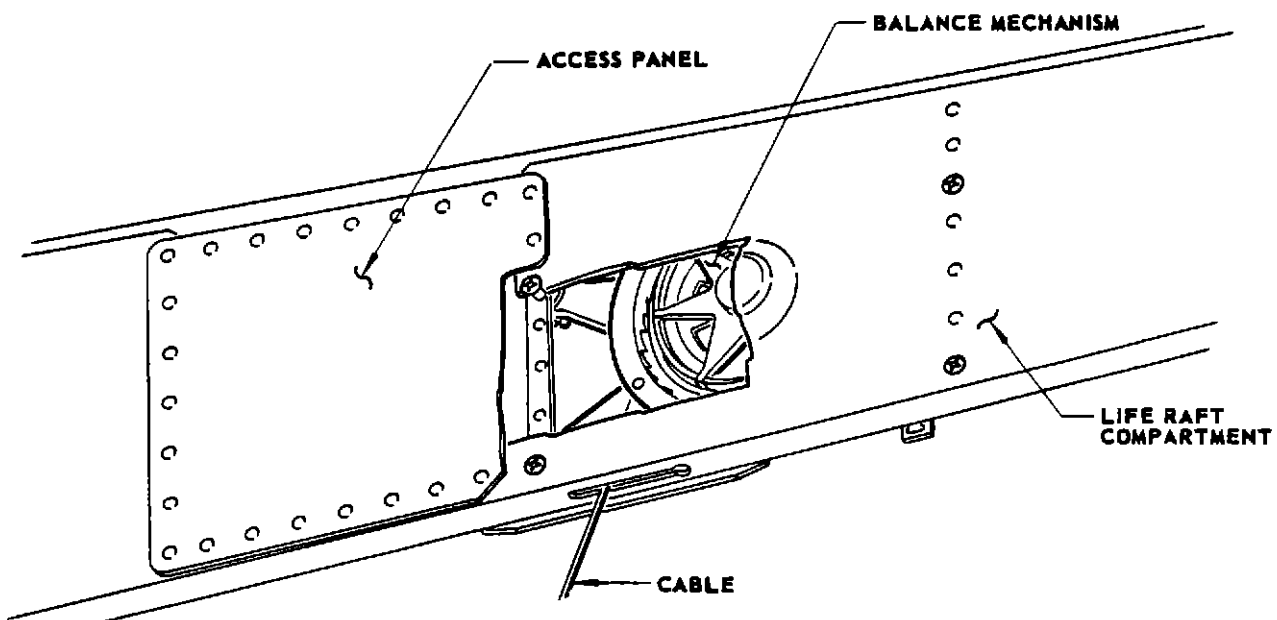
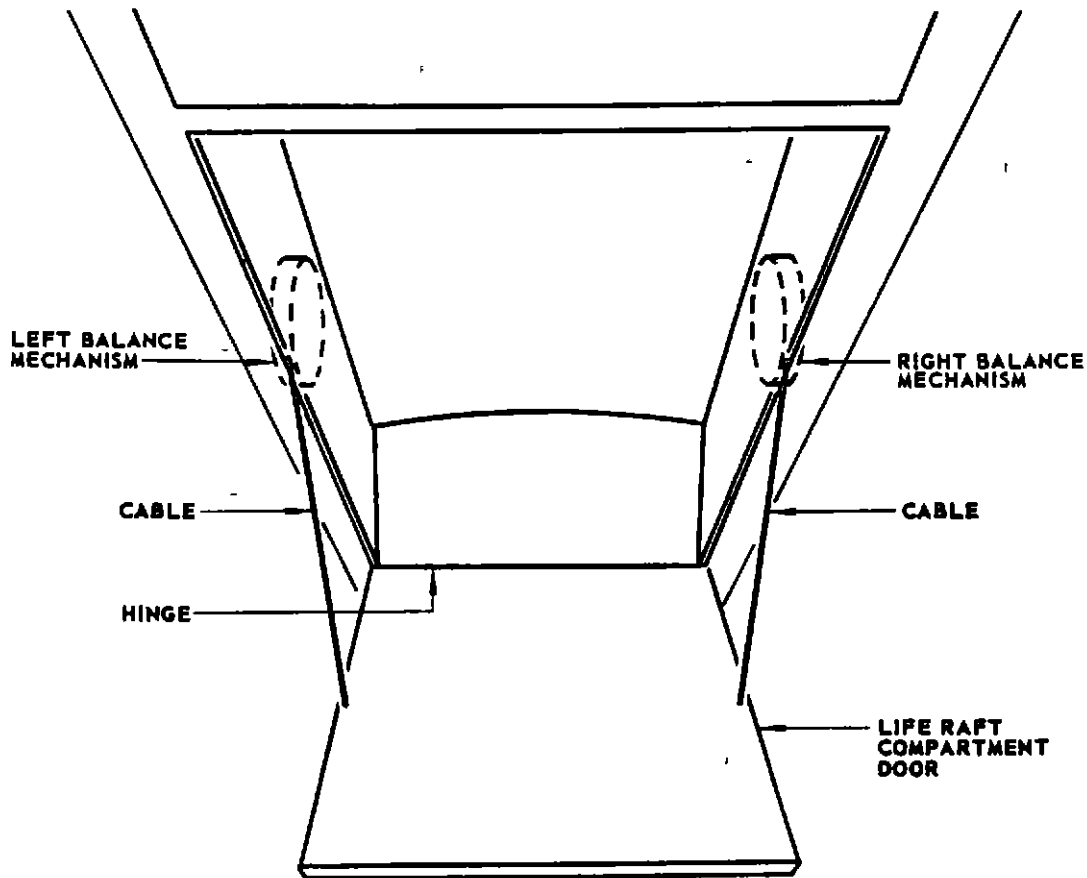
NOTE: The left balance mechanism in the forward compartment is attached to the access panel and will be removed with the panel. (See figure 202.)

- (5) Pull cable upward through slot in frame.
- (6) Remove fasteners holding balance mechanism in position.
- (7) Remove balance mechanism

B Prepare to Install Balance Mechanism

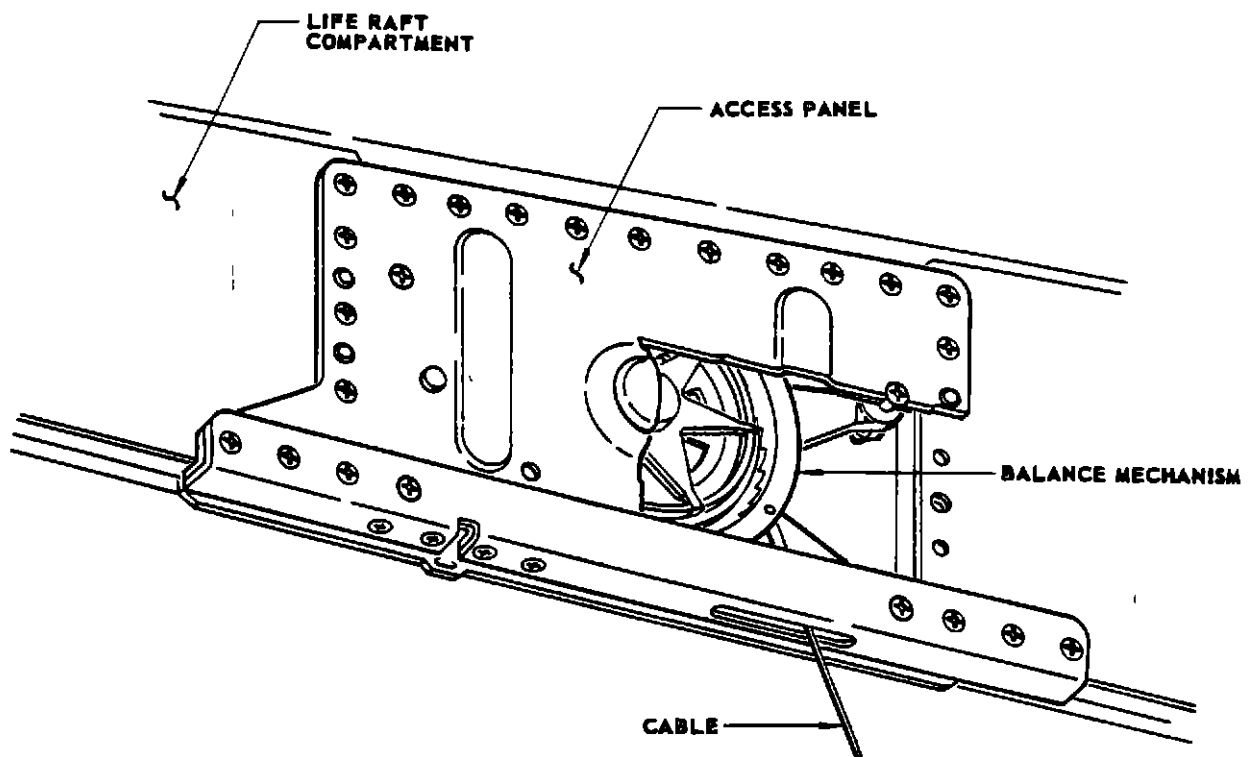
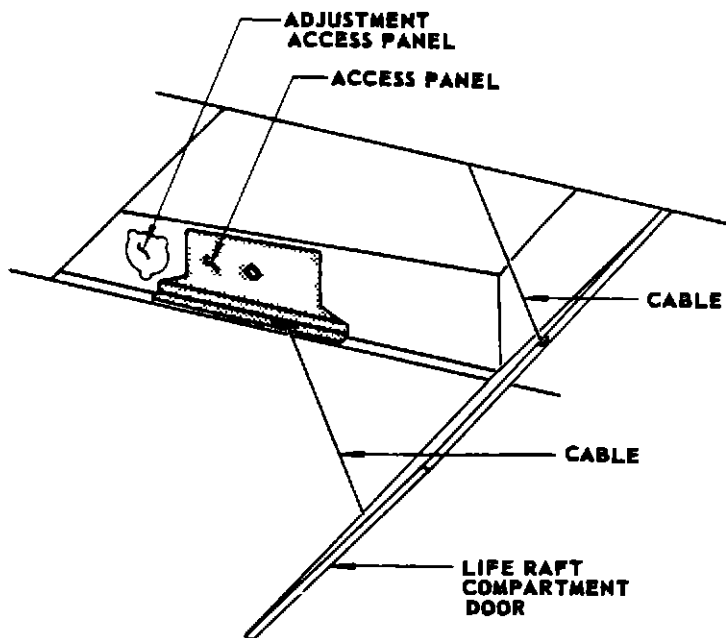
NOTE. Installations are designated right or left while facing the latch edge of the door and looking toward the hinge.

- (1) Check balance mechanism for right side installation. (See figure 203)
 - (a) Check that return spring is installed with spiral clockwise from center.
 - (b) Check that inside end of return spring is fastened to balance pulley flat marked "A".
 - (c) Check that balance ratchet is installed to lock when turned clockwise.
 - (d) Check that pawl is positioned as shown in figure 203.
 - (e) Check that pawl balance spring is positioned as shown in figure 203.



Typical Balance Mechanism Installation
Figure 201

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Intercontinental

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(f) Preload balance mechanism.

- 1) Mount or support balance mechanism support bracket in fixed position.
- 2) Preload spring by rotating balance pulley approximately two turns counterclockwise.
- 3) Align rigging pin hole marked "C" in pulley with hole in support frame and install rigging pin (NAS 1303-X).

NOTE: Force required to start the pulley rotating should be between 75 and 100 pounds.

- (g) Wind cable counterclockwise around pulley leaving approximately 6 inches free.

(2) Check Balance Mechanism for Left Side Installation (See figure 204.)

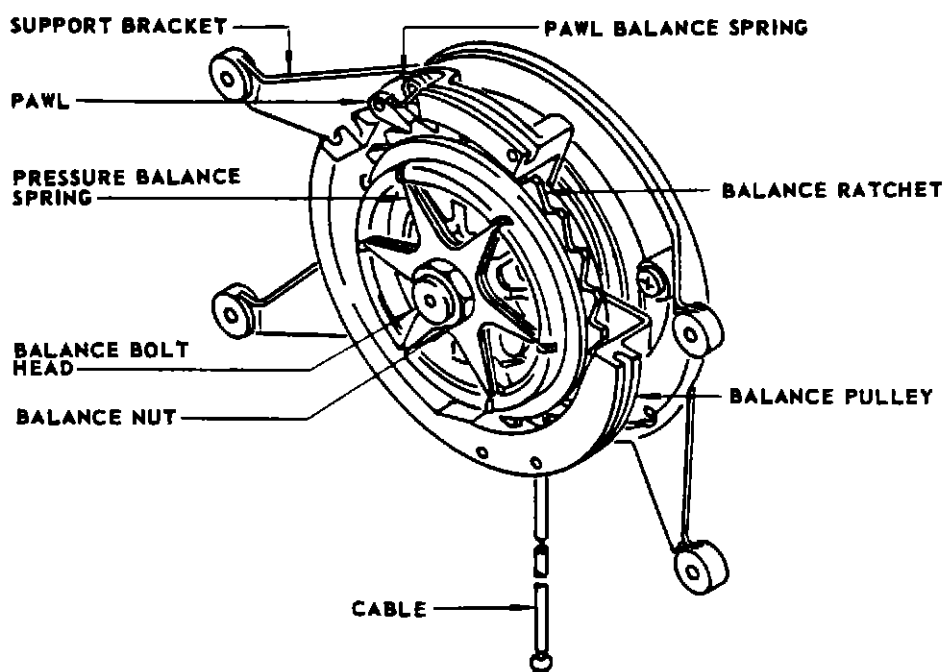
- (a) Check that return spring is installed with spiral counterclockwise from center.
- (b) Check that inside end of return spring is fastened to balance pulley flat marked "B".
- (c) Check that balance ratchet is installed to lock when turned counterclockwise.
- (d) Check that pawl is positioned as shown in figure 204.
- (e) Check that pawl balance spring is positioned as shown in figure 204.
- (f) Preload balance mechanism.

- 1) Mount or support balance mechanism support bracket in fixed position.
- 2) Preload spring by rotating balance pulley approximately two turns clockwise.
- 3) Align rigging pin hole marked "D" in pulley with hole in support frame and install rigging pin (NAS 1303-X)

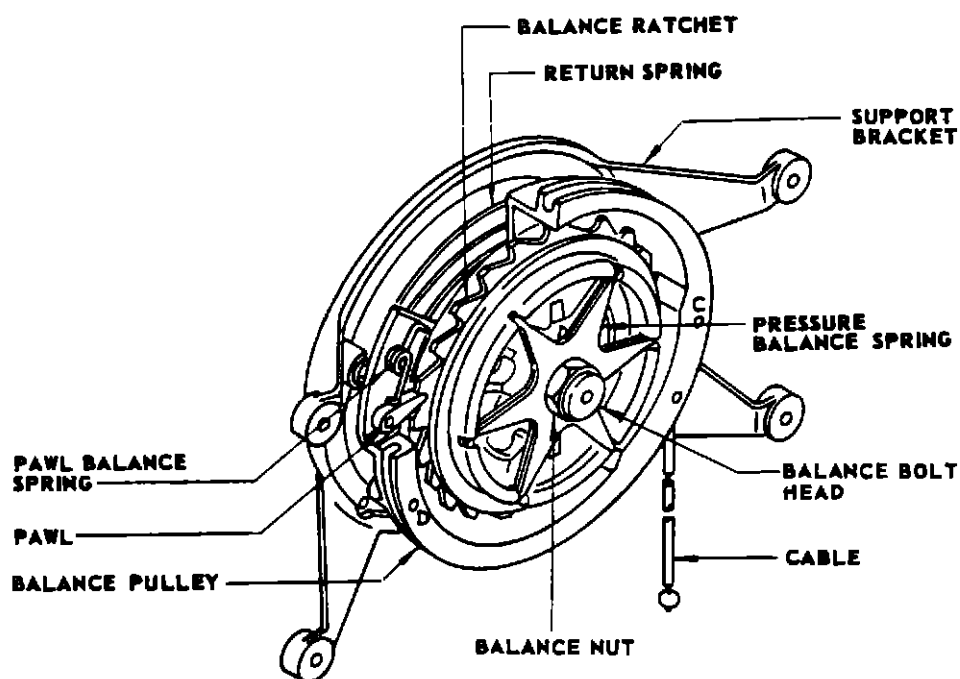
NOTE: Force required to start the pulley rotating should be between 75 and 100 pounds.

- (g) Wind cable clockwise around pulley leaving approximately 6 inches free.

MAINTENANCE MANUAL



Typical Right Balance Mechanism Assembly
Figure 203



Typical Left Balance Mechanism Assembly
Figure 204

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C. Install Balance Mechanism (See figure 201.)

- (1) Hold balance mechanism in mounting position.
- (2) Install mounting bolts.
- (3) Insert end of cable through slot in frame.
- (4) Secure cable end and remove rigging pin from pulley.

NOTE: Cable is spring-loaded. Grip firmly before releasing.

- (5) Pull cable downward sufficiently to position on compartment door.
- (6) Install screw connecting cable to the compartment door.

2. Adjustment/Test Life Raft Compartment Door Balance Mechanism

A. Adjust Cable Tension

NOTE: All balance mechanism may be adjusted while installed through adjoining access plates.

- (1) Adjust balance nut to obtain cable tension of between 75 and 100 pounds. (See figure 204.)

B. Test Life Raft Door Balance Mechanism

- (1) Release cable from compartment door.
- (2) Attach spring scale to cable and pull to extend cable.
- (3) Check that the force required is between 75 and 100 pounds.



CONTROL CABIN EQUIPMENT - DESCRIPTION AND OPERATION

1. General

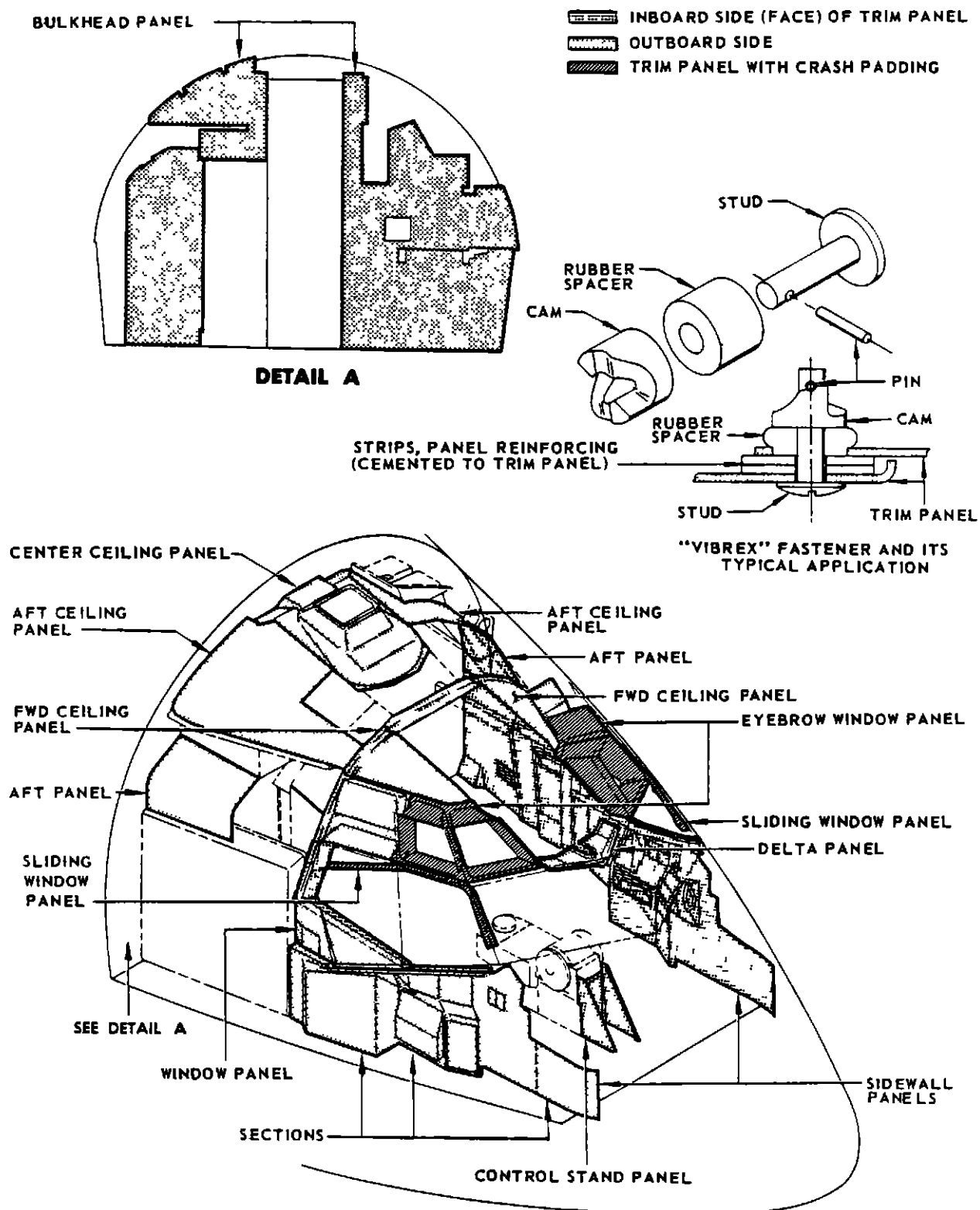
- A. Control cabin equipment includes stowage equipment, trim panels and crash padding, insulation, floor covering and miscellaneous equipment.

2. Logbook Stowage Cabinet

- A. The logbook stowage cabinet with the crew hat rack, crew coat rack and flight engineer's mask stowage form one assembly, located in the aft right corner of the cabin.
- B. The hat rack is the top of this assembly, and is about 5 feet above the floor. It is a shelf made of an aluminum honeycomb panel to each side of which is bonded a thin aluminum sheet. The shelf edges are reinforced by channels and tees which also serve to attach the stowage equipment to the airplane structure and to the flight engineer's panel support.
- C. The logbook stowage cabinet and flight engineer's mask stowage are attached to the underside of the hat rack. The logbook stowage cabinet is the aft section of the assembly. It has a flap door and two compartments. The mask stowage is the section forward of the logbook stowage cabinet.
- D. The coat rack is beneath the logbook stowage cabinet and mask stowage. It is a horizontal tube 1-1/2 inches in diameter and has a 22-inch usable length. The tube is located about 4-1/2 feet above the floor and is attached to the bulkhead and to the underside of the mask stowage section.

3. Control Cabin Lining

- A. The control cabin lining consists of trim panels which cover the inside walls of the control cabin except the area covered by instrument panels, circuit breaker panels, the main a-c power shield, and the forward bulkhead (figure 1).
- B. The panels are made of gray stiff plastic sheet 1/16-inch thick with a haircell finish on all inboard surfaces. Panel walls are reinforced around most cutouts and along some edges with one or two strips of panel material fully cemented to the panels.
- C. The trim panels are divided into sections of suitable sizes and shapes to insure close fitting to the insulated wall structure and to facilitate installation and removal. Cutouts are provided in the panels for air conditioning outlets, lights, auxiliary panels and miscellaneous equipment. The cabin bulkhead trim panels are perforated all over with 5/32 inch dia holes.



Control Cabin Trim Panels

Figure 1



- D Individual panel sections are attached to the structure and to each other primarily by Vibrex type panel fasteners. Screws are used in a few places.
- E. Crash padding is provided on the forward part of sliding window frames, on sliding window tracks and also on eyebrow windows trim panels.
- F Crash padding consists of suitably shaped polyurethane plastic foam cores, bonded to the window and track structure and to the eyebrow window trim panels. The cores are covered with 1/32-inch thick, gray flexible plastic sheet (Royalite, Boltaron or equivalent) which is cemented to the core surfaces and core base.

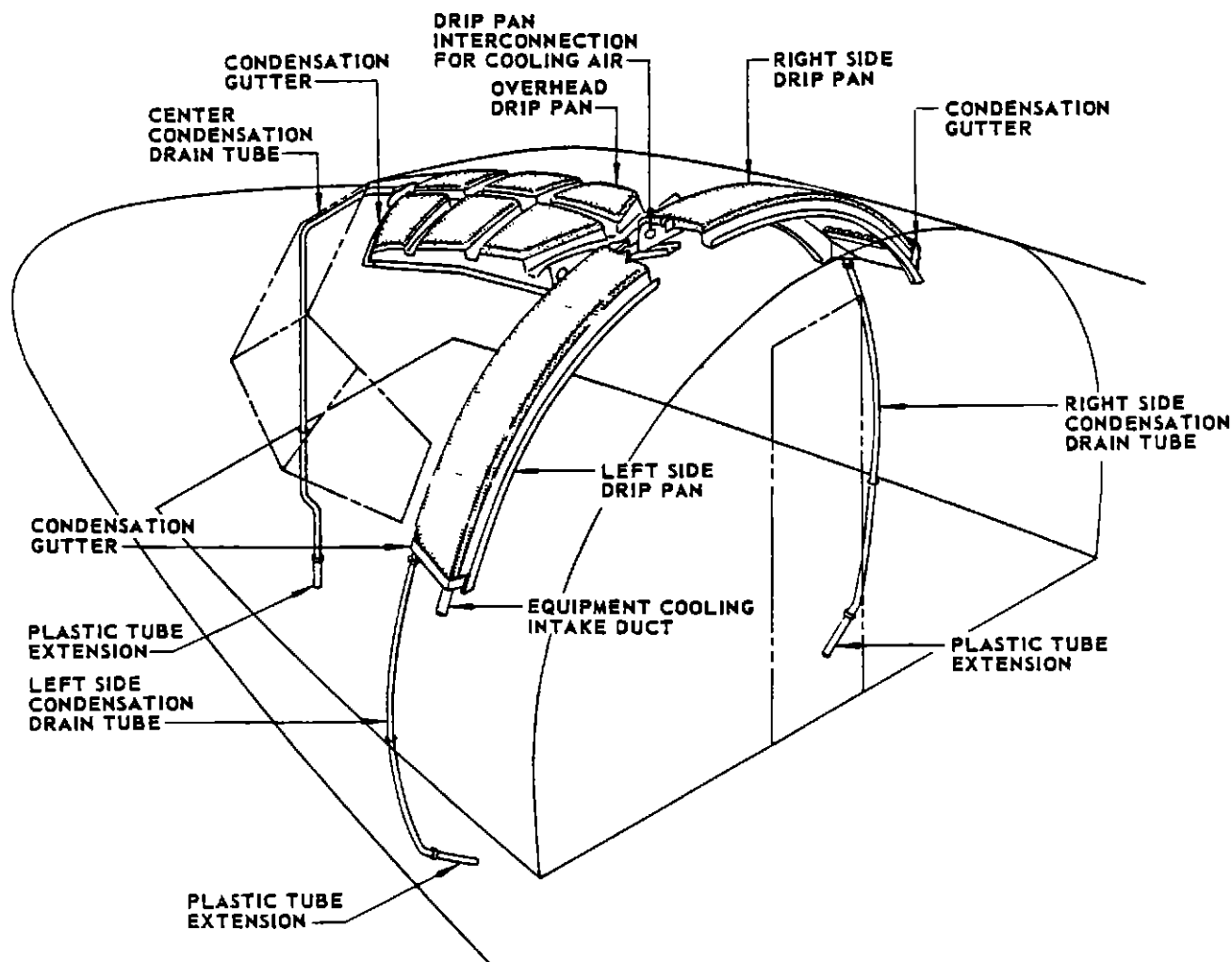
4. Control Cabin Floor Covering

- A The control cabin floor is covered by 1/4-inch thick aircraft carpet for the protection and insulation of the floor structure. The carpet is fire resistant and is made of sponge type plastic (expanded polyvinyl chloride), bonded to a semi-stiff top layer, coarse grain embossed. The top layer is made of vinyl coated fiber glass fabric.
- B The carpet is made in sections attached to the cabin floor with 2-inch wide double sided adhesive tape. Each section can be removed independently. They are cut out where necessary to clear structure or equipment fixed to the floor. Exposed carpet edges are protected by 1/16-inch thick trim plates or strips of stiff plastic (Royalite, Boltaron, or equivalent), cemented to the top layer. Edges of trim plates or strips are bevelled. The gaps between adjacent carpet sections are covered with 1/16-inch thick semi-stiff extruded plastic strips attached to the sections by double sided adhesive tape. Edges abutting against pilot's and copilot's dais are covered by plastic angles.

5. Control Cabin Insulation and Drip Pans

- A. The control cabin is insulated by fiberglass blankets, drip pans and sponge type plastic pads.
- B Fiberglass insulation blankets cover most of the cabin walls and cabin bulkhead (Station 302). The blankets are made in suitable sizes and shapes to insure good fitting to the wall structure and to facilitate the installation and removal. They have cutouts or slits where necessary to clear equipment, support structure or brackets. Wall blankets are two inches thick, bulkhead blankets are one inch thick.
- C. A typical blanket is made of fiberglass batts cemented with one side to the trim fabric, the other side is covered with backing fabric. All edges of the outline, cutouts and slits are bound with a strip of trim fabric and sewn together with one or two rows of stitches. All stitches are sealed with cement to make blankets moisture and oilproof.

- D. Insulation blankets are attached to the structure and to each other by blanket fasteners (plastic studs and washers,) spaced 4-1/2 to 7 inches apart. Studs only are used in a few places of limited accessibility. A few blankets are spot cemented to the structure along one or more edges. Spot cementing is used along the corners on the bulkhead at Station 176, under window sills and window slide rails, and on the right aft side of web of frame, Station 277. All blankets on bulkhead 302 are spot-cemented on entire backing surface.
- E. The drip pans are insulated covers above the overhead panels and circuit breaker panels (figure 2.). They protect the circuit breakers against the moisture condensation and large variations of temperature. The condensate collected by the drip pans drains through tubes routed below the lower nose compartment floor. The condensate is drained overboard through the airplane body drain system. (See Chapter 15, "Airframe Drainage") With the circuit breaker panels and the overhead panel installed, a passageway is formed through which cabin air is drawn. The overhead drip pan is connected to the side drip pans to allow air movement.



Drip Pans
Figure 2



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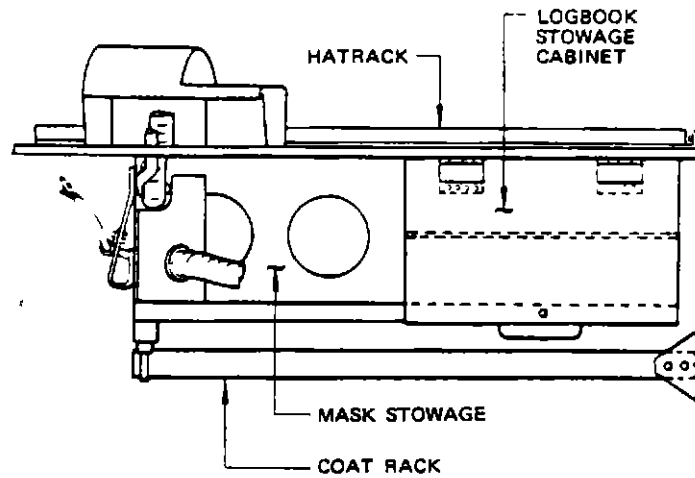
- F. The drip pans are made of fiberglass plastic having a normal wall thickness of about 1/32 inch. This thickness is increased in some areas to 1/16 inch to add stiffness. One drip pan protects the overhead panels; two arc-shaped pans and one small pan are used above the circuit breaker panels.
- G. The drip pans are insulated on all outboard surfaces. Pan flanges and ribs are covered with 1/8-inch thick strips of sponge-type plastic, fully cemented to the pans. All other pan surfaces are covered with pads of 2-inch thick fiberglass batts, enclosed between two sheets of neoprene coated nylon fabric. Both fabric sheets overlap outline of batts by one inch. The sheets are cemented to the batts and to each other along the whole outline. The pads are attached to the pans by cementing the borders to the sponge plastic strips.
- H. The overhead drip pan, reinforcing sheet metal bars and brackets are riveted to form an assembly which supports the overhead panels. Two arc-shaped pans are attached to airplane structure with screws which also retain the circuit breaker panel supports. The pan on the left side is provided with a cooling air duct.
- I. A small area around the periscopic sextant mount, and the web on the airplane centerline above the circuit breaker panels, is insulated by 1/4-inch thick sponge plastic pads cemented to the structure. A frame of 3/4-inch thick sponge plastic, cemented to the pad around the sextant mount, seals the opening in the trim panel.

6. Control Cabin Miscellaneous Equipment

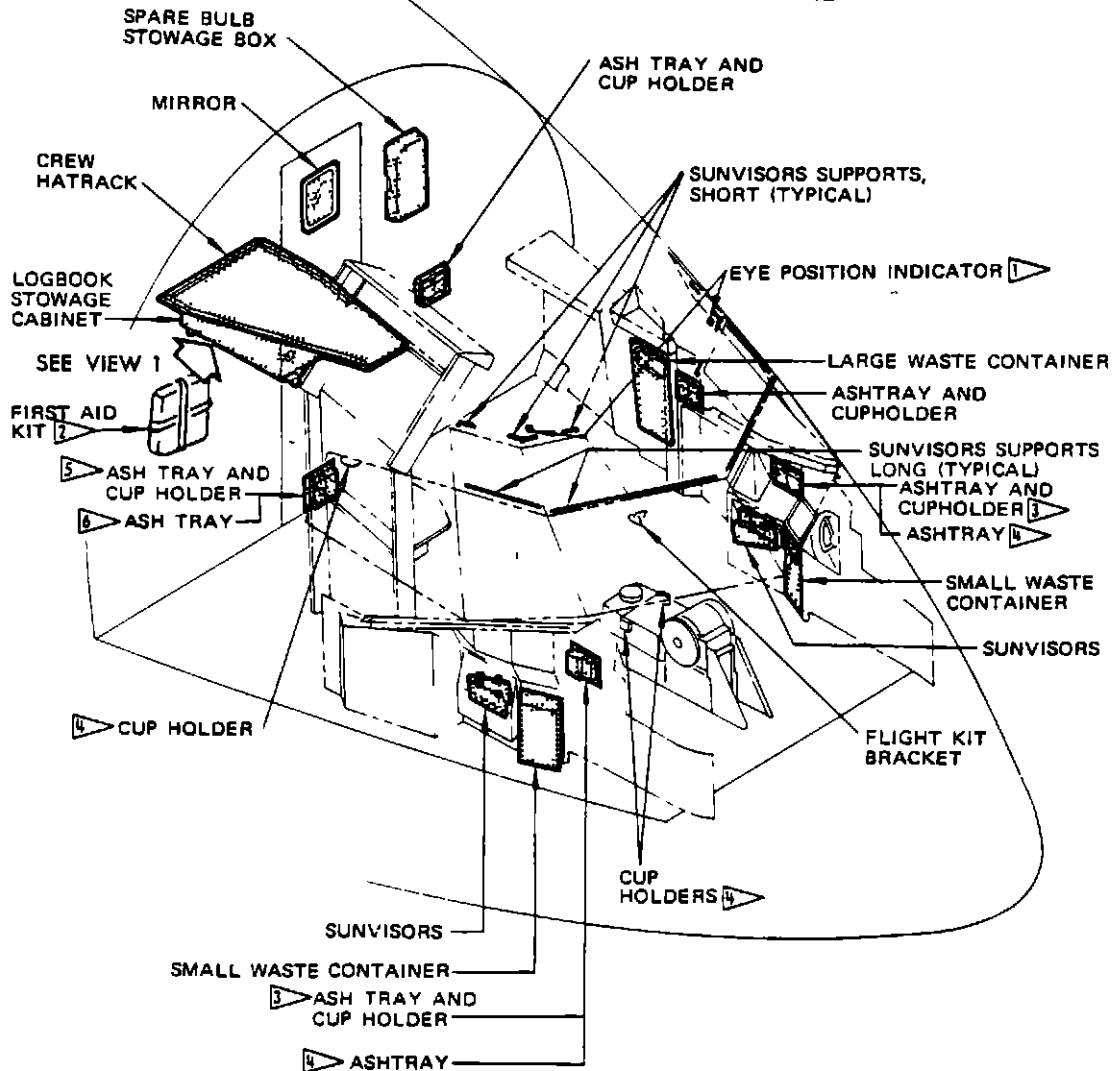
- A. Control cabin miscellaneous equipment includes a mirror, a holder for the first aid kit box, a spare bulb stowage box, three waste containers, five ashtray and cupholder units, the sunshade equipment, and flight kit brackets. Some later airplanes have eye position indicators at the pilot's and copilot stations. See figure 3 for effectivity.
- B. The mirror is located on the forward side of the entrance door. It is attached to the door with a frame made of stiff plastic sheet and secured by wood screws. Under each screw, between the mirror frame and door, is a plastic spacer.
- C. The holder for the first aid kit box is located on the forward right side of cabin bulkhead. It is attached to the bulkhead structure by means of brackets and screws. The screws pass through holes in the trim panel, reinforced by plastic spacers bonded to the panel.

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- 1 ▷ OO-SJL
- 2 ▷ OO-SJH, OO-SJJ thru OO-SJL
- 3 ▷ OO-SJA thru OO-SJH
OO-SJJ, OO-SJK
- 4 ▷ All except 3
- 5 ▷ OO-SJA thru OO-SJG
- 6 ▷ All except 5



VIEW 1



Control Cabin Equipment Location
Figure 3



MAINTENANCE MANUAL

- C The spare bulb stowage box is located on the cabin bulkhead just left of the door frame. It consists of two parts: the base, fixed to the bulkhead by screws, and the cover, hinged to the vertical outboard edge of the base. The cover is marked SPARE BULBS; it is kept closed by a friction catch. The base and cover are made of fiberglass plastic 1/16-inch thick. The box is provided with 1-inch thick sponge type plastic linings with location holes for various bulbs and fuses. The linings are cemented to the box.
- D. The waste containers are boxes marked WASTE and are inserted in the cutouts in trim panels flush with the inboard panel surface. Three waste containers are provided: one each outboard of the pilot's and copilot's seats and one outboard of the observer's seat. The waste containers are built up of parts made of 1/16-inch thick fiberglass plastic, and metal fittings. A small flap door on the containers is inward opening and is kept closed by springs. A waste container is retained in its position by an adjustable stop and latch mechanism, and can be removed simply by pushing it inboard.
- E. On certain airplanes, see figure 3, the ashtray and cupholder are arranged as a unit in a case made of fiberglass plastic. Five units are provided, one at each station, and one on the left side of the cabin bulkhead. On other airplanes, the cupholder and ashtray are provided at certain stations as separate units. In all cases, the ashtray can be removed from its case.
- F. The sunshade equipment is provided at the pilot's and copilot's station. It consists of the sunvisors (2 for each station) and the sunvisor supports. The sunvisor is made of .05-inch thick sheet of light green transparent plastic. The visors can be attached to the sunvisor supports by means of two plastic clips, tightly hinged to the edge of the sunvisor. The sunvisor support consists of 3/8-inch diameter mounting tubes and support fittings. The mounting tubes are fixed above the upper edges of No. 1 and No. 2 R and L windows. Support hinges are located above upper corners of all eyebrow windows.
- G. The flight kit bracket limits the position of the pilots' flight kit. The bracket is a flanged angular ridge, pressformed of stiff plastic sheet. It is fixed to the floor outboard of the observers seat.
- H On certain airplanes, see figure 3 for effectivity, an eye position indicator is installed above the No. 4 (eyebrow) windows on each side of the control cabin. Each eye position indicator consists of a telescoping antenna with a plastic knob on the end. The antenna is attached to a support bracket directly above the eyebrow window padding. When the antenna is fully collapsed, and a small filler plate is inserted to fill the hole in the eyebrow window padding, the eye positioner is hidden from view.

LOGBOOK STOWAGE CABINET - MAINTENANCE PRACTICES

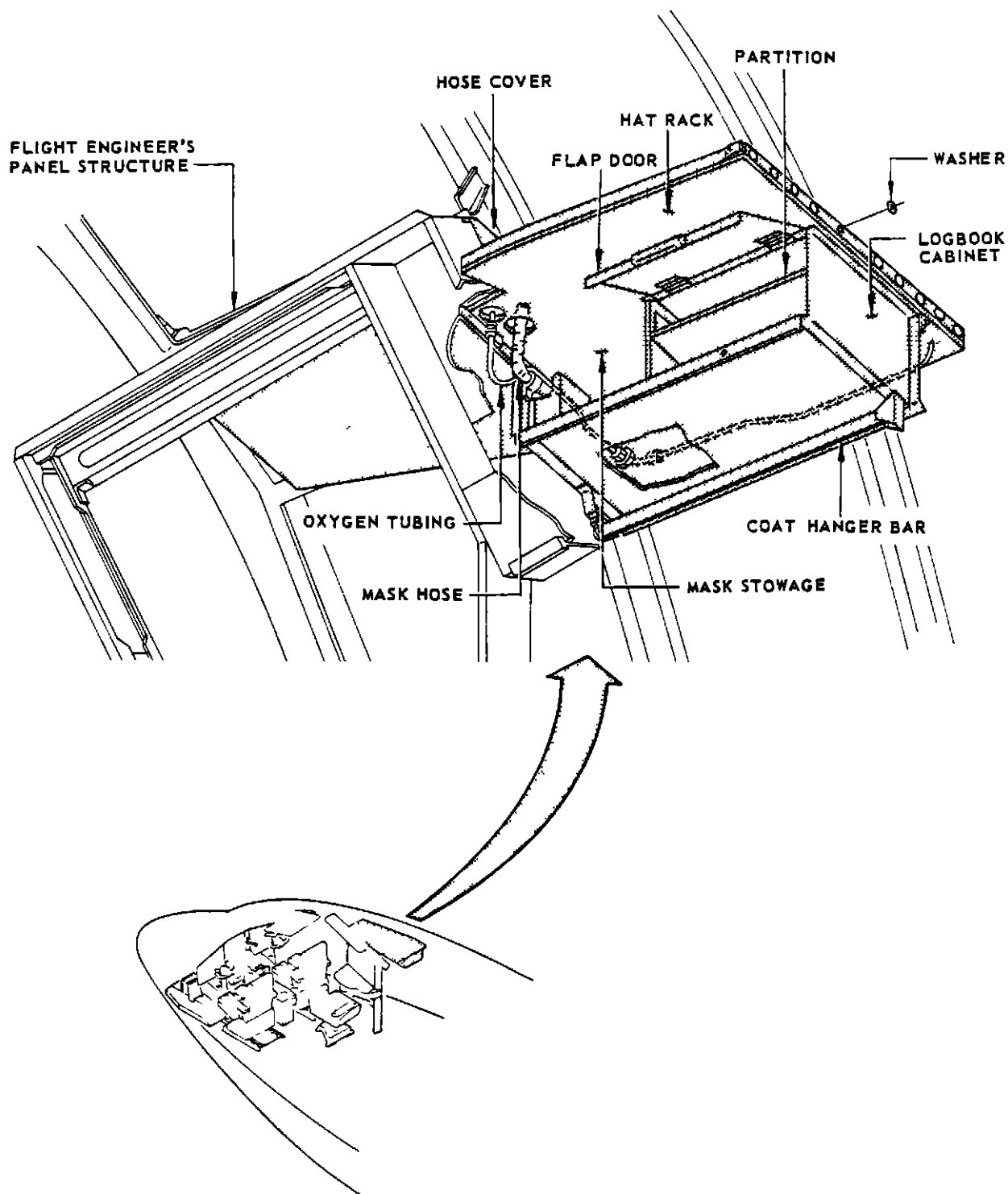
1 Removal/Installation Logbook Stowage Cabinet

A Remove Stowage Cabinet (See figure 201)

- (1) Open upper flight engineer's panel.
- (2) Remove cover of tubing and hose.
- (3) Disconnect oxygen tubing above hat rack Cap tubing to protect openings from dirt.
- (4) Disconnect oxygen mask.
- (5) Disconnect clamps holding tubing and wiring, and displace tubing and wire bundles, as necessary.
- (6) Disconnect wiring below and outboard of hat rack.
- (7) Remove trim panels above and below stowage cabinet.
- (8) Remove screws which secure stowage cabinet to panel support, to airplane structure and to bulkhead.

B. Install Stowage Cabinet

- (1) Place equipment in position and secure aft and forward corners with screws.
- (2) Insert and tighten all remaining screws.
- (3) Re-install lower and upper trim panels
- (4) Connect wiring.
- (5) Place wire bundles and tubing back in position and secure with clamps.
- (6) Connect oxygen mask.
- (7) Remove caps from ends of oxygen tubing and connect tubing.
- (8) Install cover.
- (9) Close and secure flight engineer's panel.





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CONTROL CABIN LINING - MAINTENANCE PRACTICES

1 Removal/Installation Trim Panels (Typical)

A. Remove Trim Panel (See figure 201.)

- (1) Remove equipment where necessary to clear.
- (2) Remove or loosen adjacent fittings and panels where necessary to free panel.
- (3) Loosen Vibrex fasteners by turning studs about half turn left.
- (4) Maneuver the panel in suitable directions, until completely free.

B Install Trim Panels

- (1) Place the panel in position and secure it with Vibrex fasteners
- (2) Tighten loose fittings or adjacent panels.
- (3) Install fittings and equipment.

2 Approved Repair Interior Lining

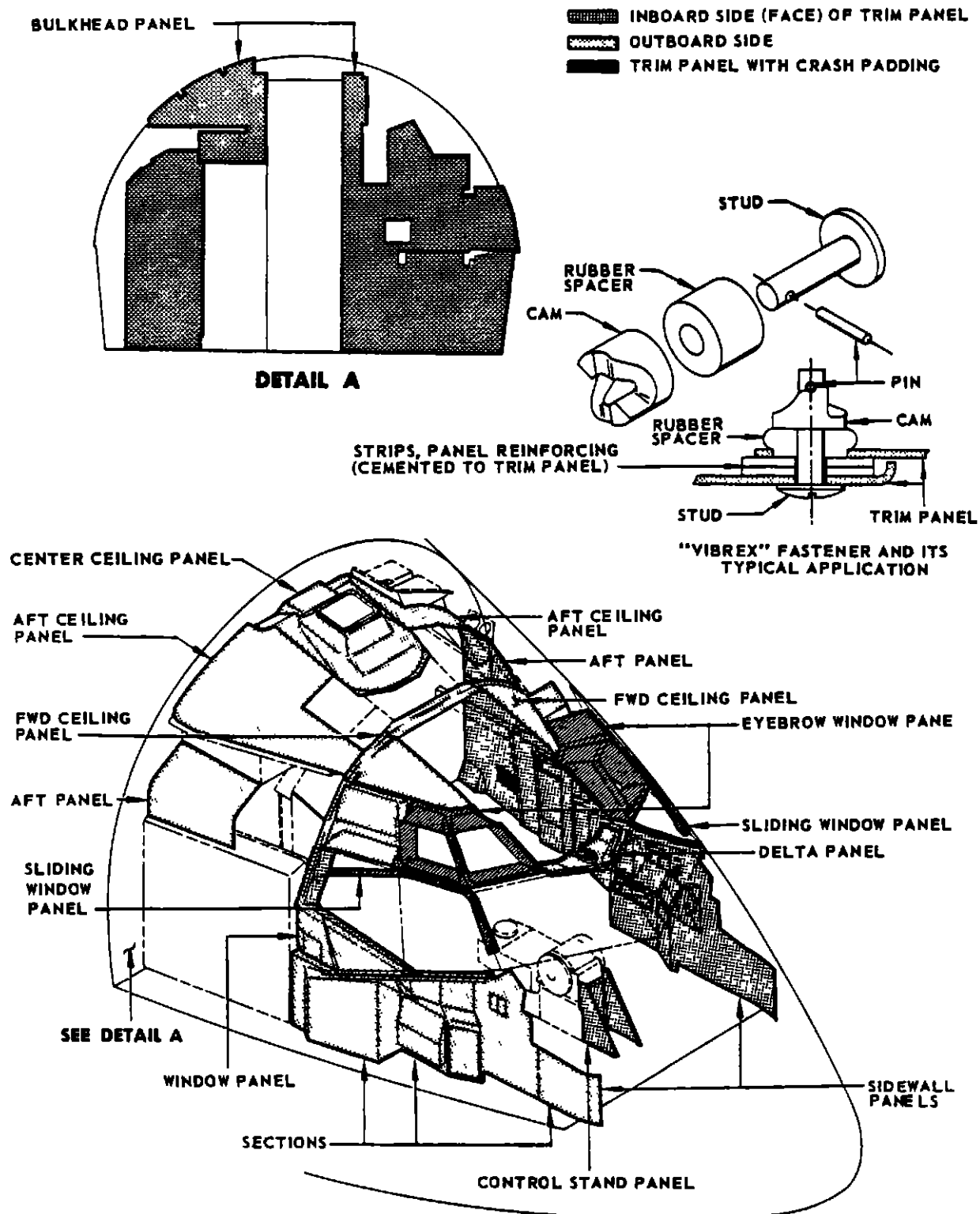
A. Move extensive repair procedures for the interior lining are covered in the following Boeing Documents:

- (1) D6-1910-"Repair Procedures for Interior Materials on the 707 Airplane."
- (2) D6-2862 - "Fabrication and Inspection Requirements for Adhesive Bonding of Decorative Interior Materials."

B. On 707-329 airplanes, identification of materials on portions of the interior lining to be repaired may be accomplished by consulting Boeing Document D6-1514 "Interior Finish Specification, SABENA," and D6-1514-1, "Interior Finish Specification Illustrations, SABENA."

C. On 707-329C airplanes, identification of materials on portions of the interior lining to be repaired may be accomplished by consulting Boeing Document D6-4434 "Interior Finish Specification, Sabena," and D6-4434-1, Interior Finish Specification Illustrations, Sabena."

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Trim Panels and Crash Padding Installation
Figure 201

3. Removal/Installation Crash Padding

A. Equipment and Materials

- (1) Adhesive EC-873
- (2) Aliphatic Naphtha TT-N-95
- (3) Methyl Ethyl Ketone

B. Remove Crash Padding (See figure 202)

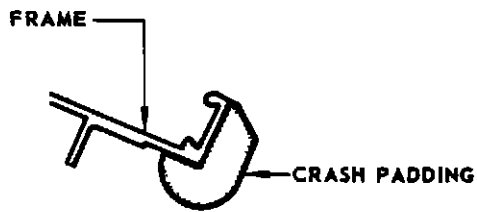
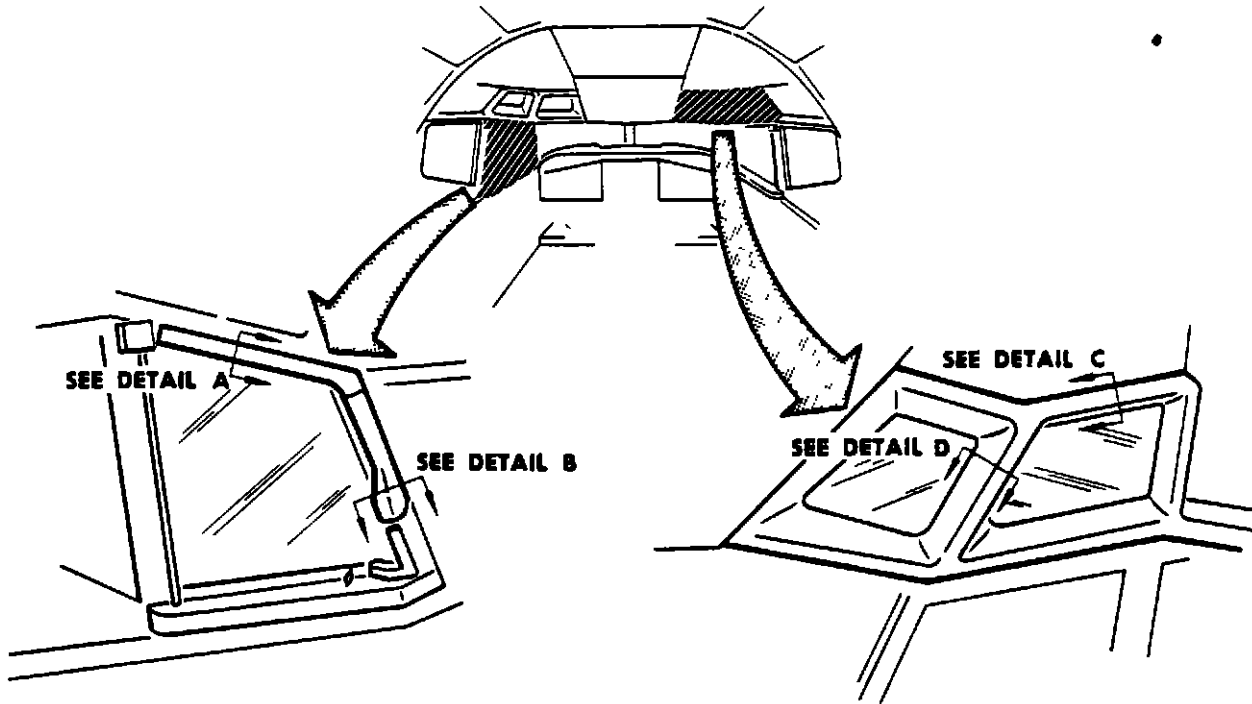
- (1) Remove equipment where necessary to gain access to crash padding.
- (2) Pull off crash padding as required.

C. Install Crash Padding

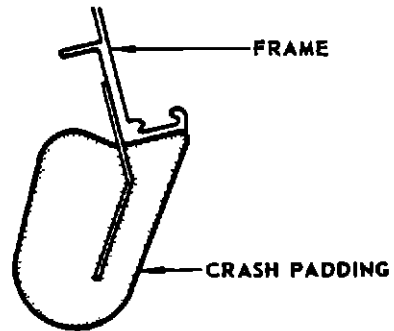
- (1) Clean all faying surfaces with methyl ethyl ketone.
- (2) Apply a thin even brush coat of adhesive to both the metal and foam faying surfaces.
- (3) Allow adhesive to dry until it becomes quite sticky but does not transfer to the finger.

NOTE: This point will be indicated by a color change from milky cream to transparent amber. Drying time can be accelerated by blowing air to evaporate the water base of the adhesive.

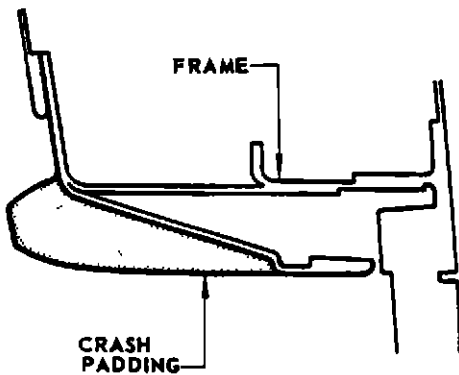
- (4) Press surfaces firmly together to join.
- (5) Eliminate dry adhesive with naphtha.



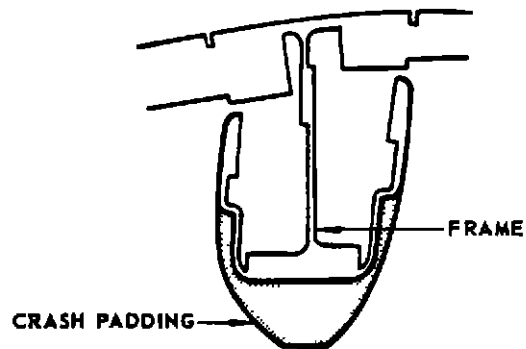
DETAIL A



DETAIL B



DETAIL C



DETAIL D

CONTROL CABIN FLOOR COVERING - MAINTENANCE PRACTICES

1 Removal/Installation Floor Covering (Typical)

A. Remove Carpet (See figure 201.)

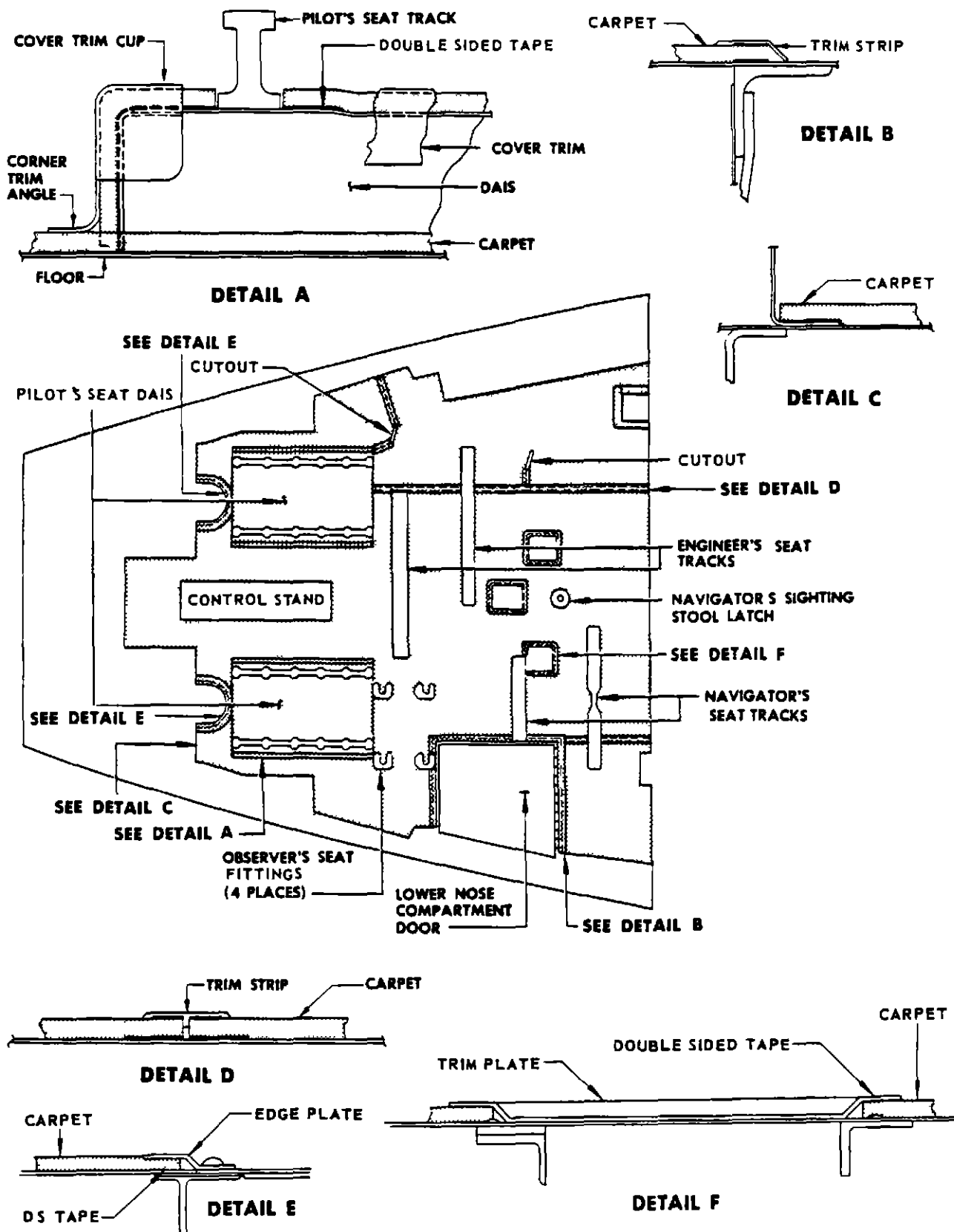
- (1) Remove equipment as necessary to clear.
- (2) Remove trim strips, trim plates or trim covers.
- (3) Remove the covering by peeling it off along edges.
- (4) Remove double sided adhesive tape.

B. Install Carpet

- (1) Clean thoroughly area under carpet, especially along edges.
- (2) Apply double sided adhesive tape two inches wide along all edges and press it firmly against the floor.
- (3) Place carpet in position and locate it correctly.
- (4) Remove protecting layer from top of adhesive tape along the longest edge.
- (5) Press carpet firmly down along this edge.
- (6) Do the same with all remaining edges.
- (7) Apply double sided adhesive tape half an inch wide on edges of carpet to be covered by trim strips.
- (8) Remove protecting layer from adhesive tape, apply trim strip carefully and press it firmly down
- (9) Install equipment.

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EQUIPMENT AND FURNISHINGS
 Control Cabin Floor Covering
 Maintenance Practices



CONTROL CABIN INSULATION AND DRIP PANS - MAINTENANCE PRACTICES

1 Removal/Installation Insulation Blankets (Typical)

A Remove Insulation Blanket (See figure 201)

- (1) Remove trim panels.
- (2) Remove equipment and equipment support as necessary.
- (3) Remove wiring and tubing clips
- (4) Disconnect and remove wiring or tubing where necessary.
- (5) Remove blanket fasteners
- (6) Remove blanket partly or completely, as necessary.
- (7) Examine both sides of blanket for damaged covers.

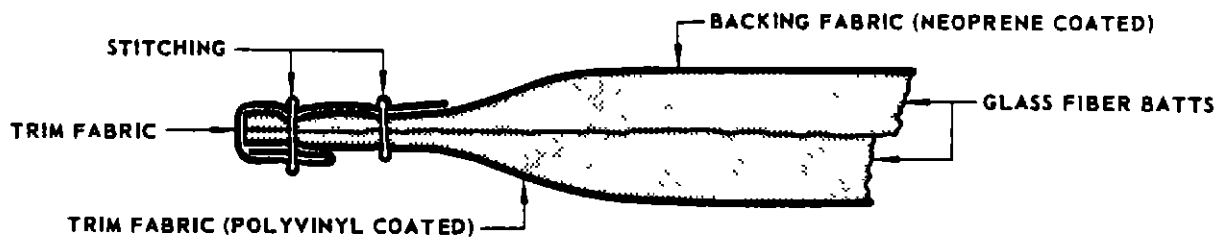
B. Install Insulation Blanket

- (1) Place blanket in position and wrap it around structure.
- (2) Attach blanket with blanket fasteners.
- (3) Connect wiring and tubing.
- (4) Install wiring and tubing clips.
- (5) Install trim panels.

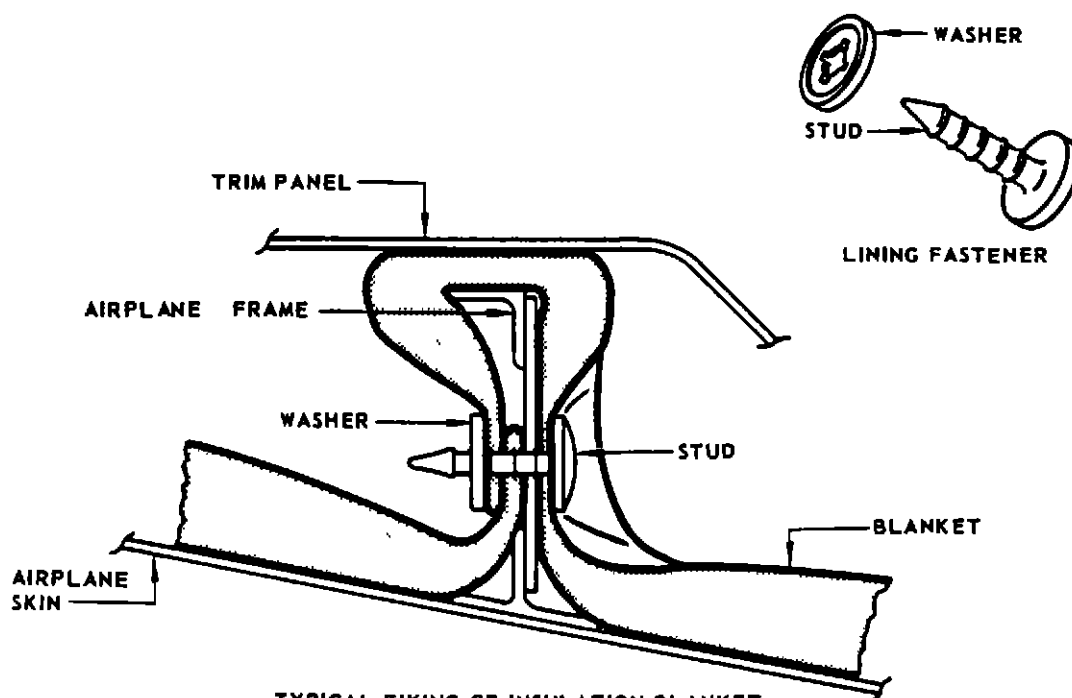
2. Removal/Installation Drip Pans (Typical)

A. Remove Drip Pan (See figure 202)

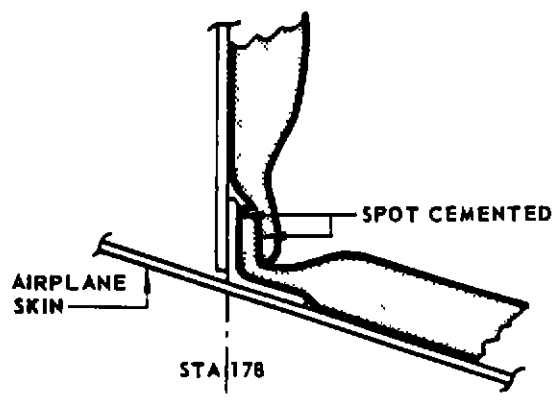
- (1) Remove overhead panels (circuit breakers or instrument)
- (2) Remove adjoining trim panels.



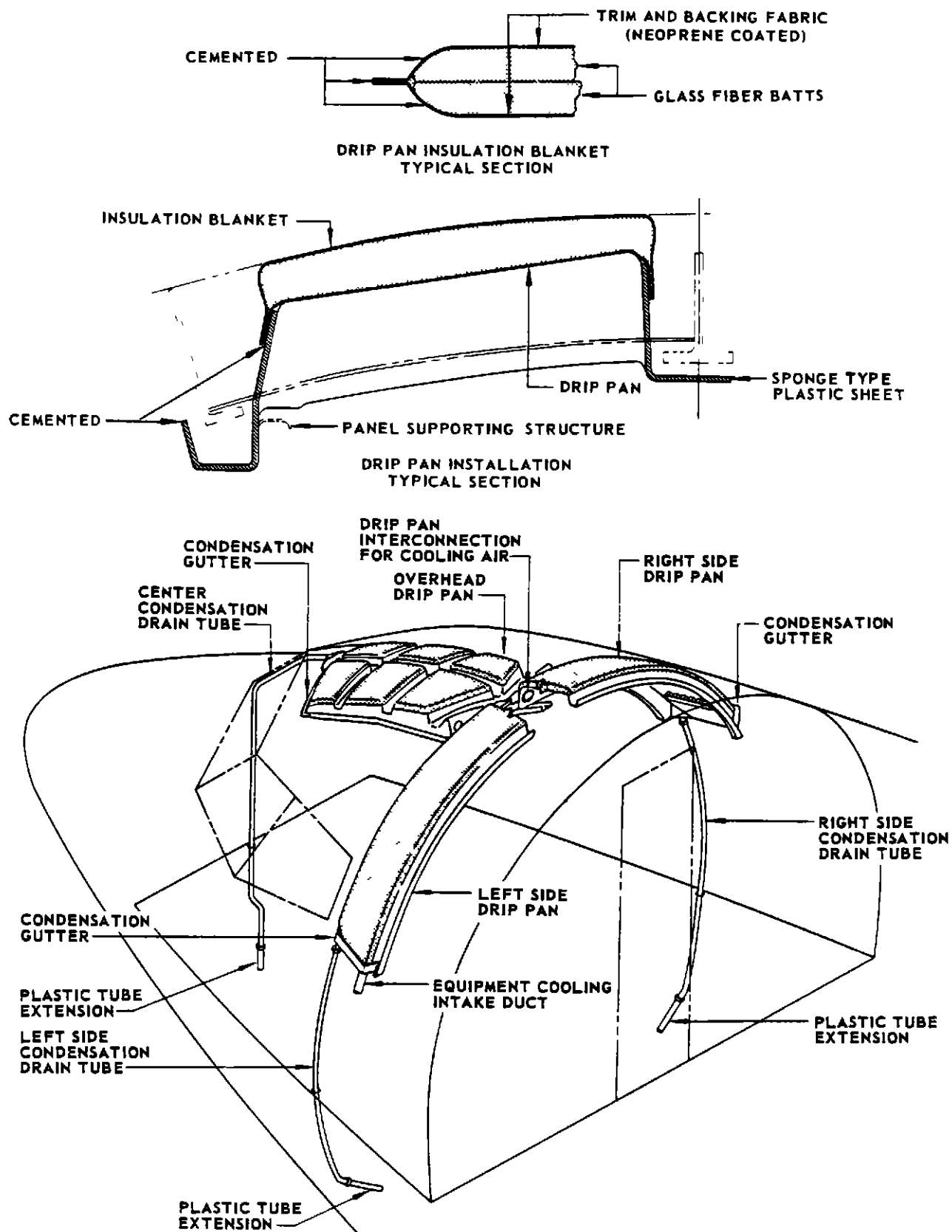
TYPICAL SECTION OF INSULATION BLANKET



TYPICAL FIXING OF INSULATION BLANKET



TYPICAL CEMENTING OF INSULATION BLANKET



- (3) Remove structure which supports panels.
- (4) Remove wiring supports and clips.
- (5) Disconnect wiring where necessary.
- (6) Loosen wire bundles where necessary.
- (7) Disconnect the cooling and drain tubing.
- (8) Remove remaining fasteners.
- (9) Remove pan, push wire bundles out of holes.
- (10) Examine for loose insulation and for damaged insulation pads.

B. Install Drip Pan

- (1) Place pan in position and secure it with bolts.
- (2) Connect the cooling and drain tubing.
- (3) Arrange wire bundles in correct position and re-bind bundles where necessary
- (4) Connect wiring where necessary.
- (5) Install wiring supports and clips.
- (6) Install structure supporting panels.
- (7) Install trim panels.
- (8) Install circuit breakers or instrument panels.

3. Approved Repairs Insulation Blankets

- A. Patch punctured or torn blankets to keep the insulation dry. Clean affected area, apply a suitable adhesive and cover with patch of same material as blanket cover.
- B. If area to be sealed is 25% or more of the blanket area, blanket should be replaced. (See 25-19-0, "Insulation Blanket and Molded Insulation Panel-Maintenance Practices.")
- C. Replace immediately any damaged blankets which are soaked with oil.

4. Approved Repairs Drip Pans

- A. Cement any loose parts of insulation strips or pads.
- B. Patch any damaged insulation pads.



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EYE POSITION INDICATOR - REMOVAL/INSTALLATION

EFFECTIVITY

00-SJL

1. General

- A. The eye position indicator is above the No. 4 (eyebrow) windows on each side of the control cabin. (See figure 401.) Each position indicator consists of a telescoping antenna with a plastic knob on the end; which, when fully extended and with the pilots' seats adjusted so that the plastic knob touches the pilots' forehead immediately between the eyes, assures maximum area vision. The eye position indicator is attached to a support bracket directly above the eyebrow window padding.

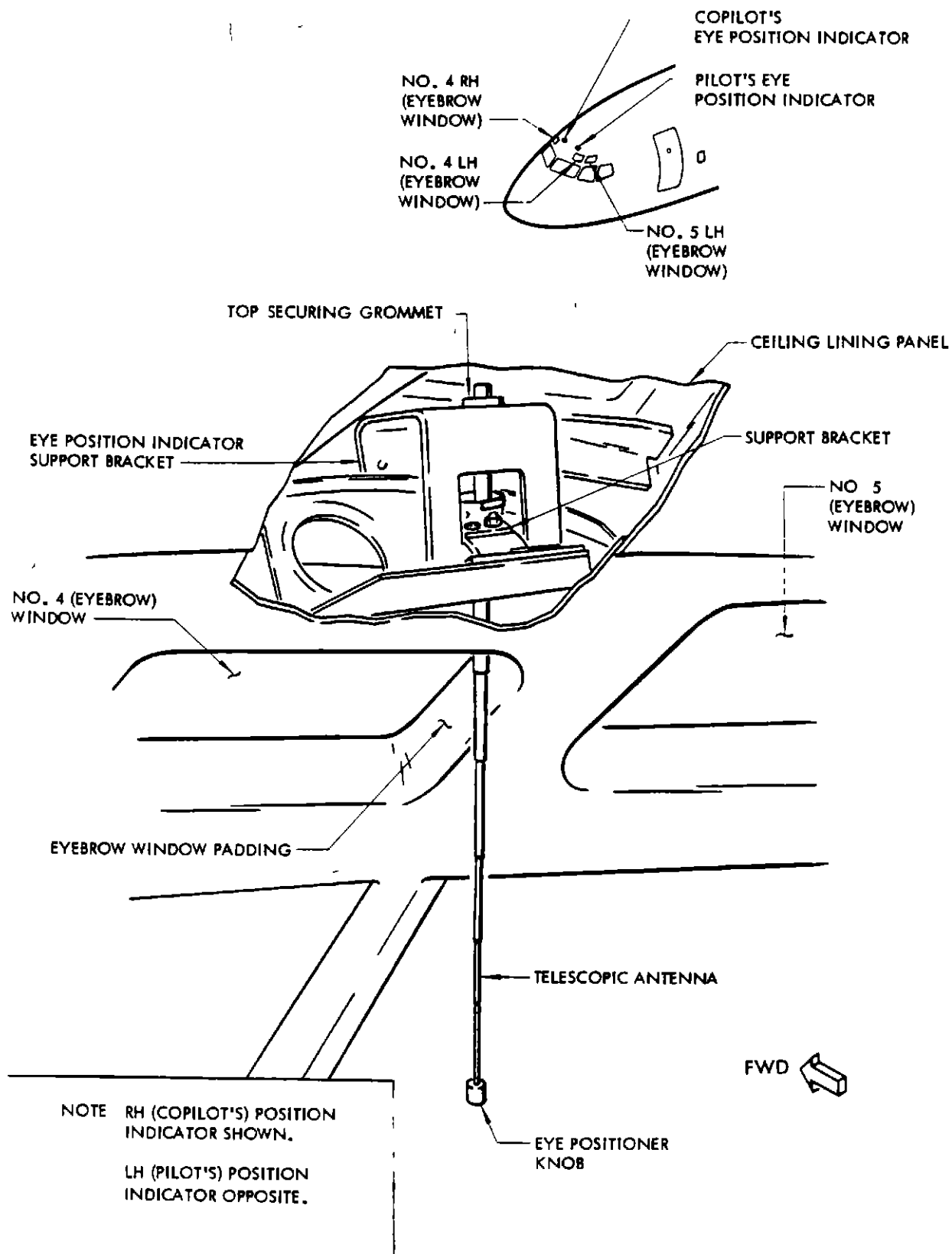
2. Remove Eye Position Indicator (See figure 401)

- A. Loosen screws and remove ceiling lining panel.
- B. Loosen clamp securing eye position indicator to eye position support bracket.
- C. Remove eye position indicator.

3. Install Eye Position Indicator

- A. Insert base of eye position indicator through clamp on eye position support bracket and thru top securing grommet.
- B. Fully extend eye position indicator and locate telescoping end at an eye position 46 inches from the floor.
- C. Tighten clamp securing eye position indicator to eye position support bracket.
- D. Install ceiling lining panel.

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Eye Position Indicator
 Figure 401



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PILOTS' STATION - DESCRIPTION AND OPERATION

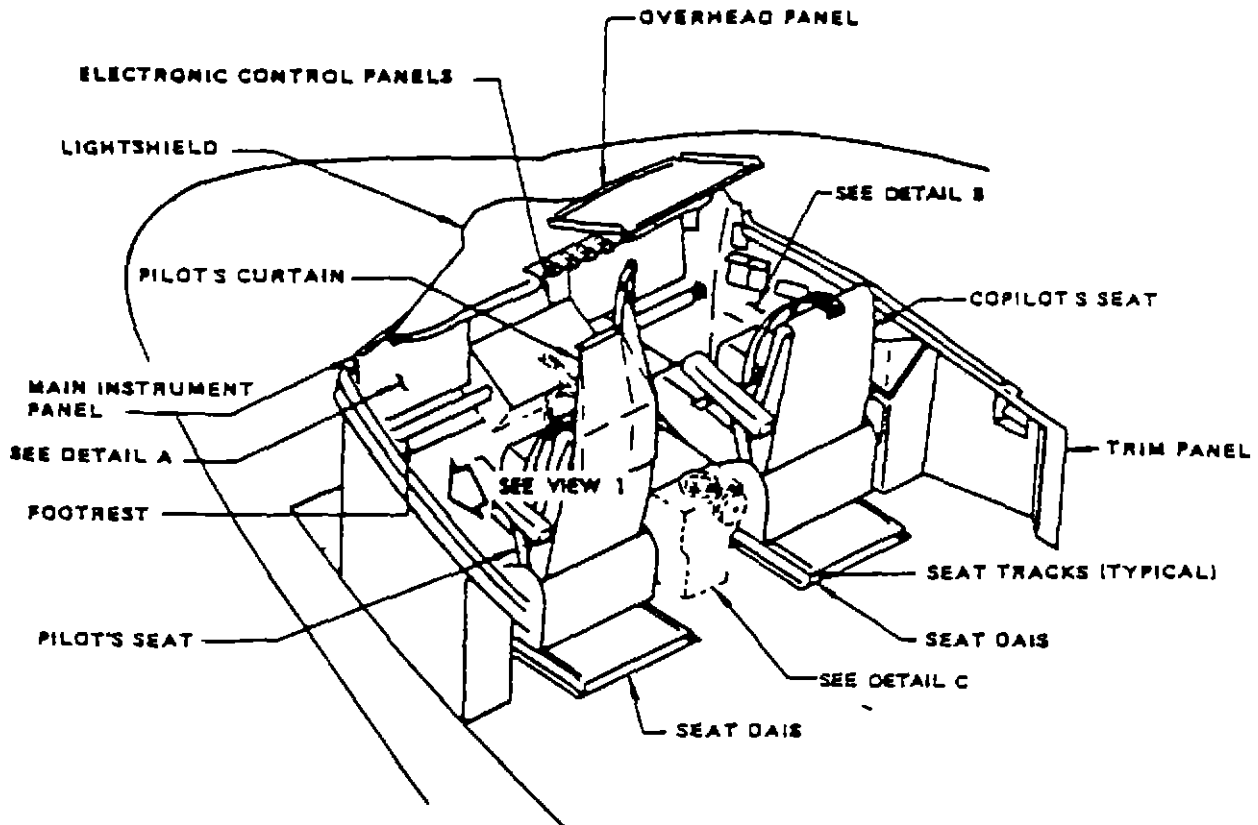
1. General

- A. The pilots' station occupies the forward part of the control cabin. The equipment includes the two pilots' seats and footrests, the main instrument panel and lightshield, the overhead and side panels and the pilots' curtain. The arrangement of the equipment is shown on figure 1.
- B. The control stand located between the pilot's seats houses the aft electronic control panel, the flight trim controls, and engine control levers.

2. Pilots' Seats (00-SJA thru 00-SJH, 00-SJJ, 00-SJK)

- A. The pilots' seats are on each side of the control stand. They are identical except for the location of the adjustment control levers, which are located on the inboard side of each seat. Each seat is attached to the cabin floor by means of two seat tracks fixed to the dais. The seats can be adjusted horizontally, vertically and in recline position, and the arm rests are adjustable in the vertical direction.
- B. The pilot's seat consists of a seat body and a base. The seat body consists of a seat structure, two seat cushions, two cushion covers, and seat harness.
- C. The seat body is a sheet metal structure with rigid seat frame and a reclinable seat back, spring-loaded in the forward position. The folding arm rests are attached to the seat back. The seat and back cushions are cemented to the seat body. The seat covers are attached by snap fasteners. The aft side of the seat back cover includes a pocket for lift vest stowage. The seat is spring-loaded upwards.
- D. The seat base is a rigid sheet metal structure with guides for vertical movement of the seat body. The seat base is provided with 4 rollers for movement of the seat on the seat tracks. Four retainers hold the seat to the tracks. Four stop plates on the seat and one stop on each track limit the movement of the seat. The clearance between the seat and the seat tracks can be reduced to a minimum by turning the eccentric bolts on which the rollers rotate.

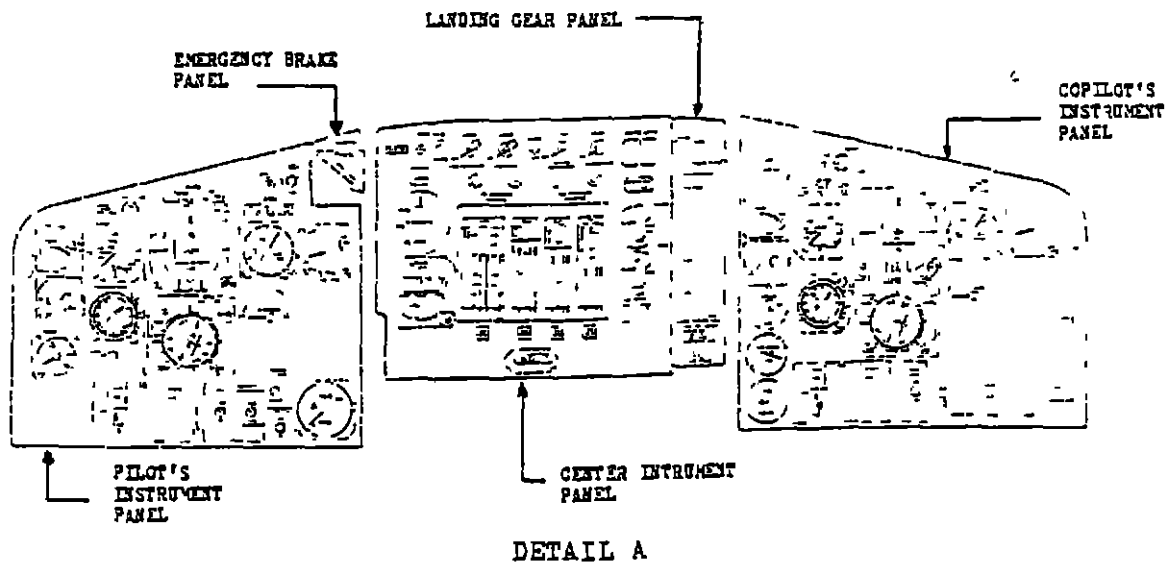
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1 ▷ OO-SJA thru OO-SJH
OO-SJL, OO-SJK

2 ▷ All except 1 ▷

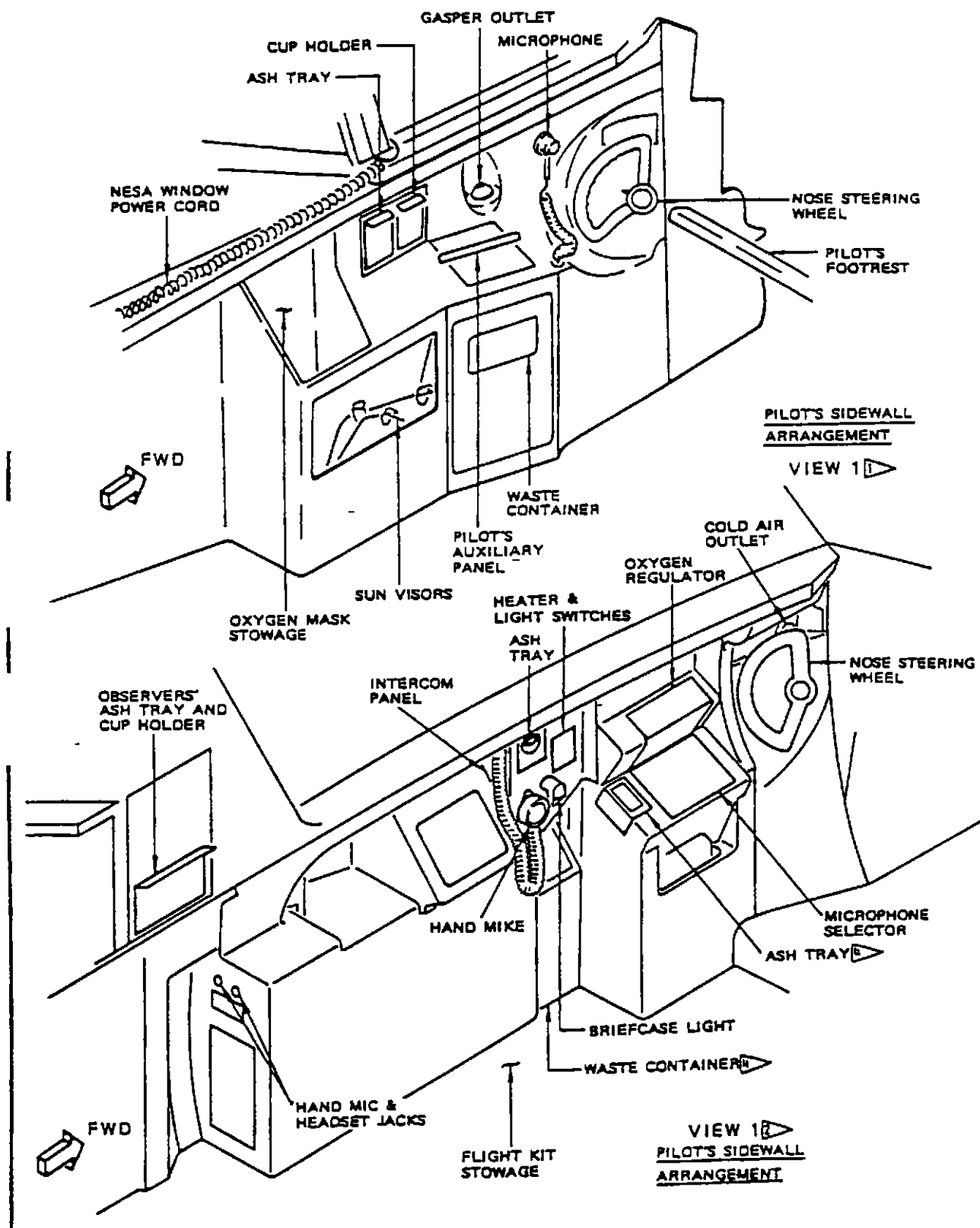
3 ▷ All except 1 ▷



Pilots' Station Equipment Location
Figure 1 (Sheet 1)



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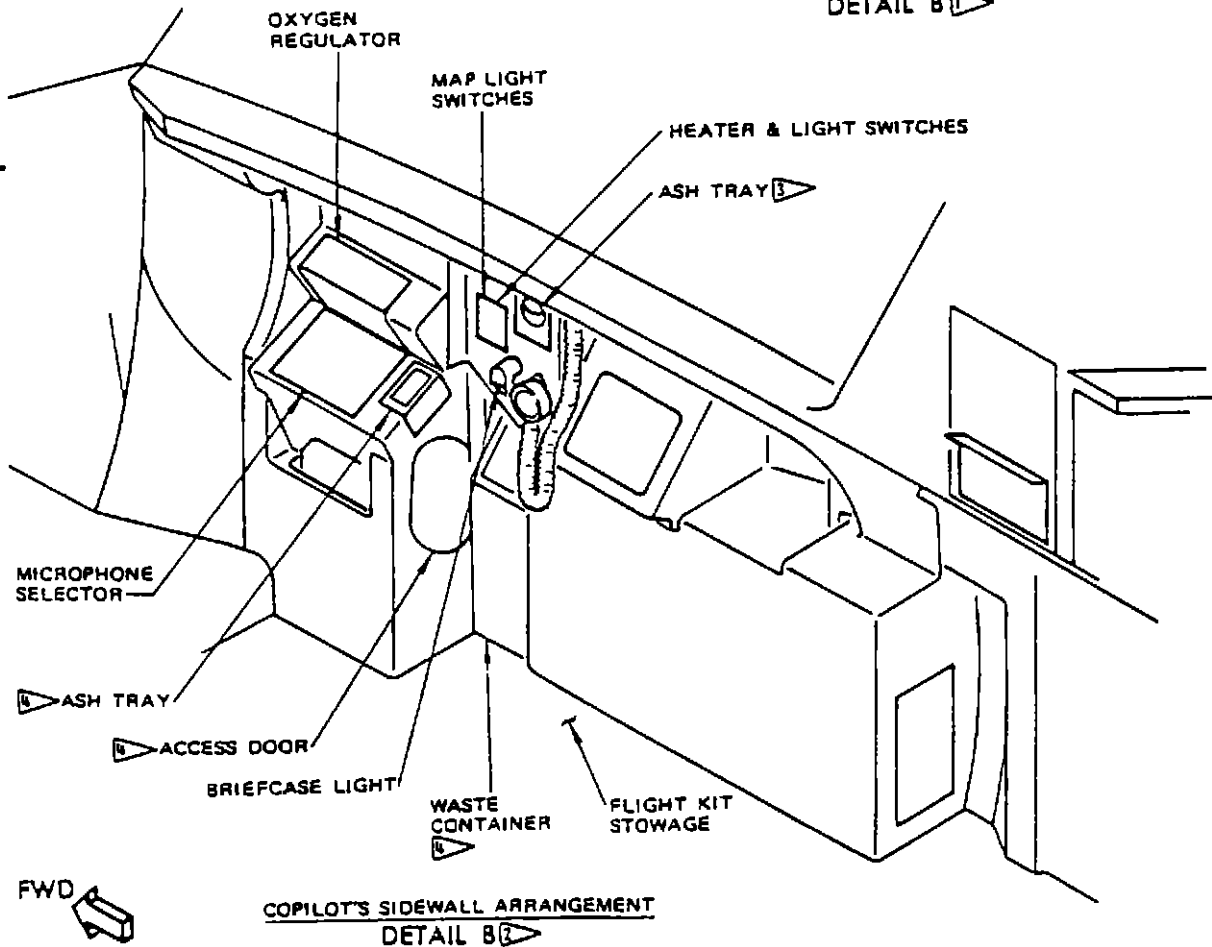
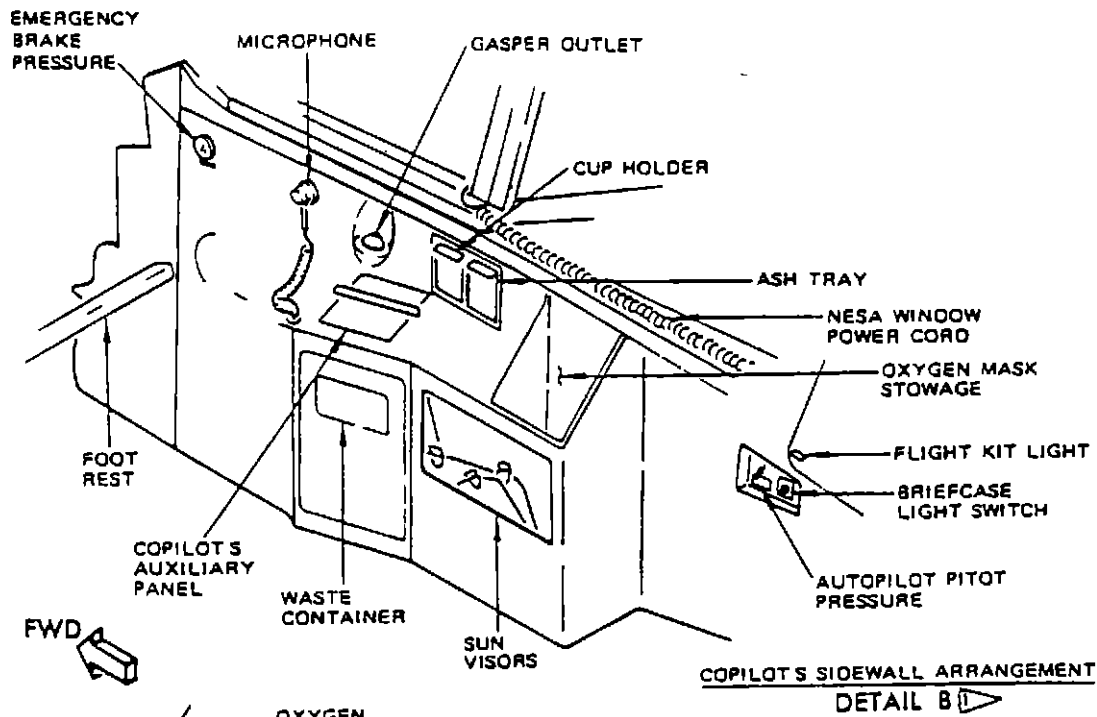


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Pilots' Station Equipment Location
Figure 1 (Sheet 2)

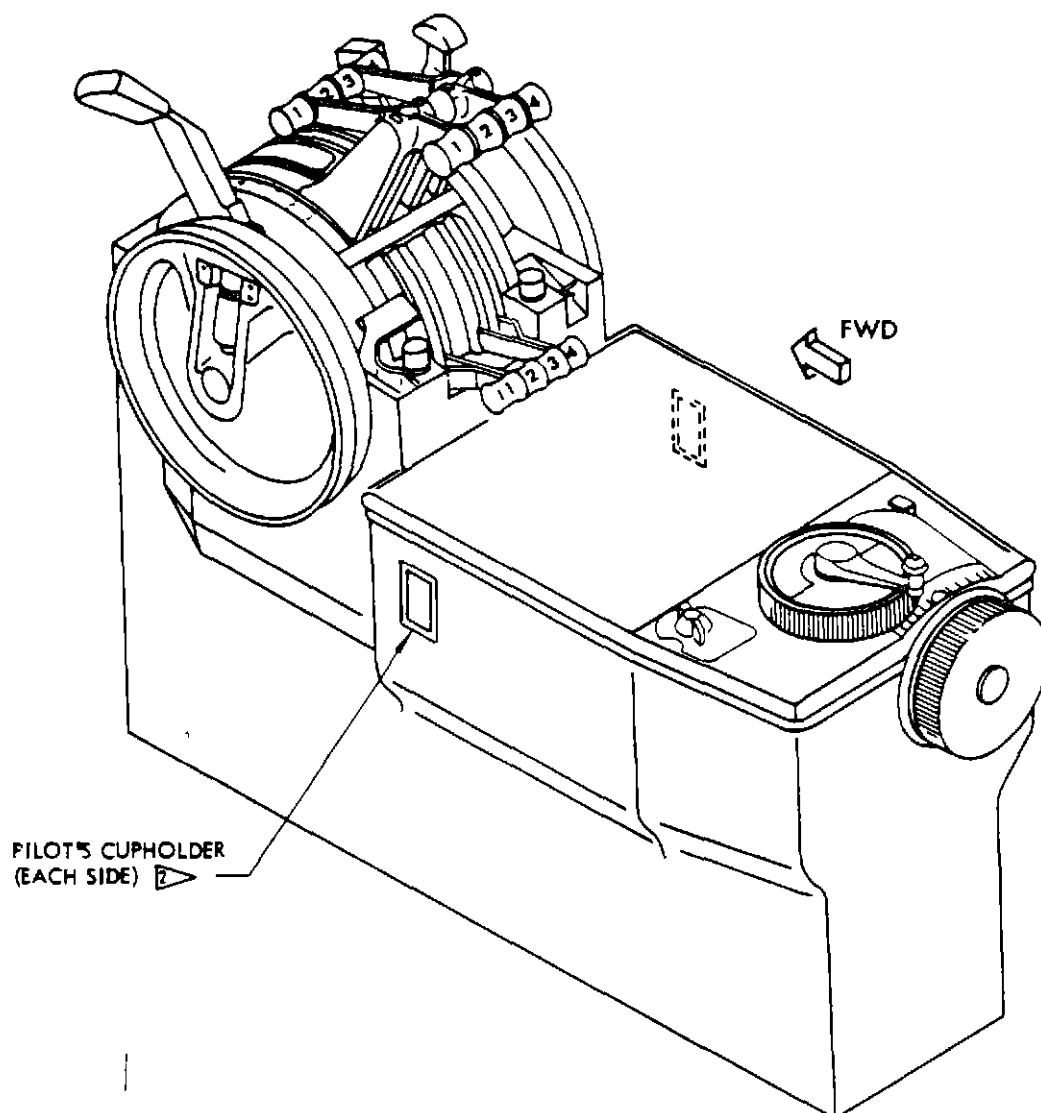
25-3-0
Page 3

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Pilots' Station Equipment Location
 Figure 1 (Sheet 3)

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DETAIL C
CONTROL STAND

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3 Pilots' Seats (All except those airplanes listed in paragraph 2.)

- A. The pilots' seats are opposite hand assemblies. The main elements of each seat are the base, the seat bottom, the seat back, the support and adjustment linkage and the safety harness.
- B. The base is bolted to the seat dais. The seat bottom and back are joined to the base by the support and adjustment linkage. The linkage allows the position of the seat bottom and back to be adjusted. The linkage locks to hold the bottom and back in a chosen position.
- C. A metal pan forms the main structure of the seat bottom. A cushion is fastened to the pan and a cover is attached to the cushion by snap fasteners.
- D. A metal frame forms the main structure of the seat back. A cushion is fastened to the frame and a cover is attached to the cushion by snap fasteners. The back cushion is made of a buoyant material and it is certified as an individual flotation device. It can be easily removed and used as a life vest. The angle of the seat back can be adjusted independently of that of the bottom.
- E. The seat can be adjusted fore and aft, and up and down; the angles of the seat back and bottom can also be independently varied. The adjustment control levers are on the inboard side of each seat.
- F. The seat has inertia shoulder harness, a crotch strap and a lap belt with a rotary buckle. The rotary buckle is fastened to the inboard part of the lap belt.

4 Footrests

- A. A footrest is forward of each seat and about 1-1/2 feet above the floor. It is a rectangular tube padded with stiff sponge rubber and covered with plastic sheet. Its ends are attached to the cabin wall and to the panel supporting structure.



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5. Main Instrument Panel

- A The main instrument panel is arranged in three main sections under the forward windshield and consists of the pilot's instrument panel, the engine instrument panel and the copilot's instrument panel. An emergency brake panel is located in a cutout between the left and center section and a landing gear panel is situated between the center and right section. (See figure 1)
- B. Sections are hinged independently in a common supporting structure. They rest against stops in the open position and are retained in the closed position by two quick-release fasteners. All three sections are provided with edgelit plates for controlled, selective illumination.
- C. Each section consists of a baseplate, lightplates, illuminating equipment and the instruments with switches and leads. (See 25-3-21, figure 201.) The baseplate is made of 1/8-inch thick magnesium reinforced with flanges, stiffeners and brackets. Lightplates are made of transparent plastic sheet (Lucite), coated with opaque vinyl paint to form a light seal. Lettering is then engraved through the paint. For information on illuminating equipment see Chapter 33, Control Cabin Lighting.
- D. Illustrations of the main instrument panel and instruments appear in Chapter 31, Instruments. Information on installed instruments and instrument systems will be found elsewhere in this manual.

6. Pilots' Light Shield

- A The light shield is a canopy over the main control panel arranged in three sections. It consists of a top, an underside covering, a supporting structure, and the lights. The top and the covering are attached to the structure by Vibrex fasteners. On the aft edge are the fire indicators and switches for the fire extinguishing system. Along the forward edge is an air duct with slots in the shield top, through which air is blown to defog the windows. A check list holder is attached to the top of the shield. (See 25-3-41, figure 201.)
- B The top of the shield is made of fiberglass and lights are attached to the lower side. The underside covering is made of stiff plastic sheet. Lights are mounted in cutouts in each section.

7. Forward and Aft Electronic Control Panels

- A. The forward electronic control panel is located just forward of the throttle levers on the control stand. It consists of seven smaller panels with the electronic equipment for weather radar and for the navigation and communication systems. The panels are fixed by quick-release fasteners.



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- B. The aft electronic control panel is located just aft of the control levers on the control stand. It consists of five small panels with the radio and autopilot control equipment. These panels are fixed to the top of the control stand by quick-release fasteners.
- C. Illustrations of the electronic control panels and instruments appear under sections 31-37-1 and 31-38-1.

8. Pilots' Sidewall Arrangement

- A. The pilot's and copilot's sidewall arrangements are very similar for their corresponding effectivity. They are located on the cabin walls under the No. 2 and No. 3 windows (See figure 1.)

9. Overhead Panel

- A. The overhead panel is located on the cabin ceiling above the control stand. It is provided with lightplates for illumination by edge lights. (See paragraph 5.D.) The panel is bolt hinged and suspended on a strap when open and is secured in closed position by two quick-release fasteners
- B. The panel is fabricated from 1/16-inch thick aluminum sheet, reinforced by flanges and stiffeners

10. Pilot's Curtain

- A. The pilot's curtain is arranged just aft of the pilot's seat. It is made of two-ply blackout cloth and attached to the cabin ceiling by four snap fasteners. Its lower edge is 2-1/2 feet above the floor. When not needed, the curtain can be rolled up and bound to the ceiling by two straps

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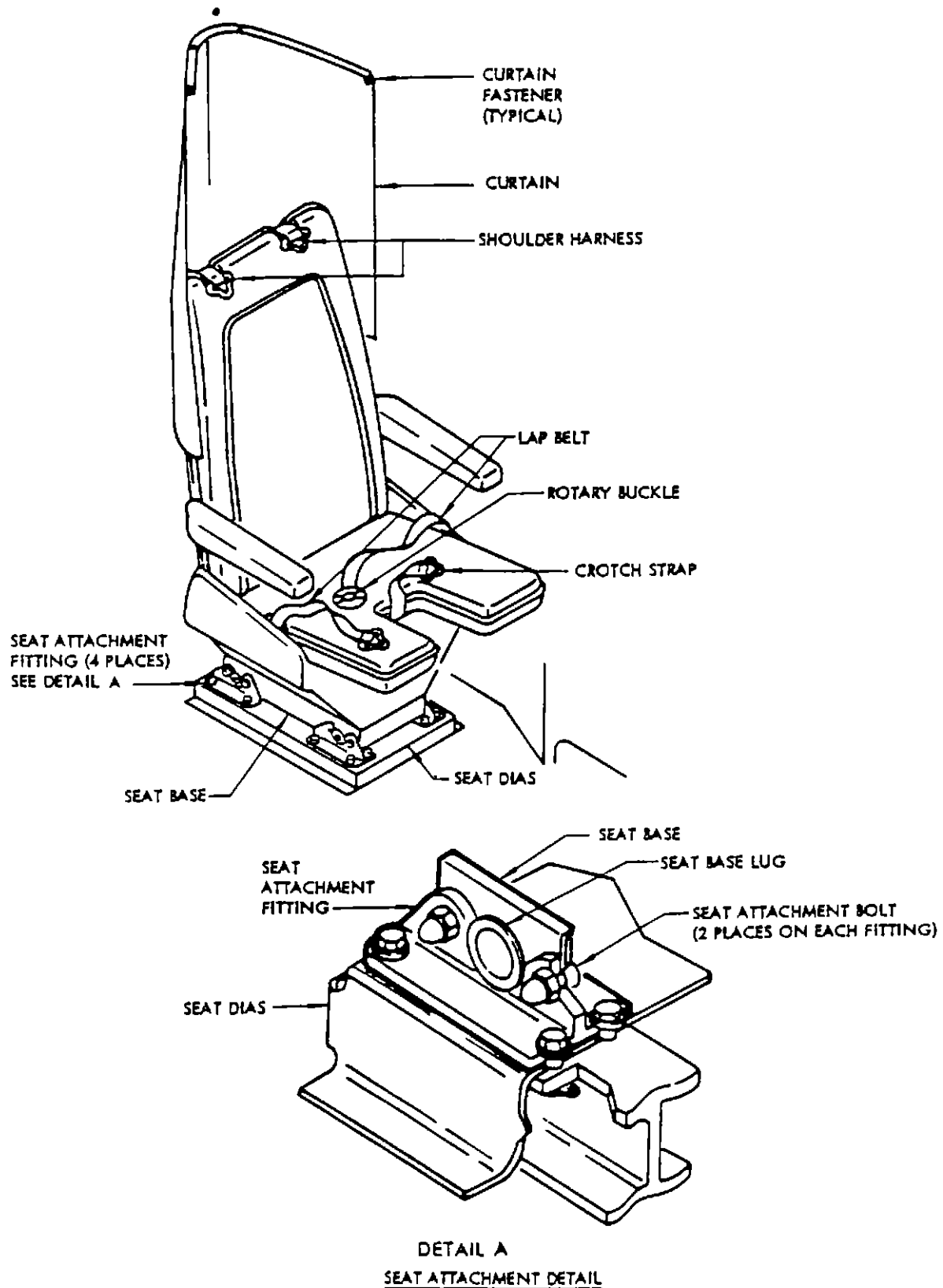
PILOTS' SEATS - REMOVAL/INSTALLATION

EFFECTIVITY

1 All

1. Remove Pilots' Seats (See figure 401.)
 - A. Remove eight seat attachment bolts which fasten seat base to seat attachment fittings.
 - B. Lift seat from seat attachment fittings.
2. Install Pilots' Seats (See figure 401.)
 - A. Put seat in position with seat base lugs resting in seat attachment fitting recesses.
 - B. Install eight seat attachment bolts and tighten cap nuts.

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Pilot's Seat and Curtain Installation
 Figure 401

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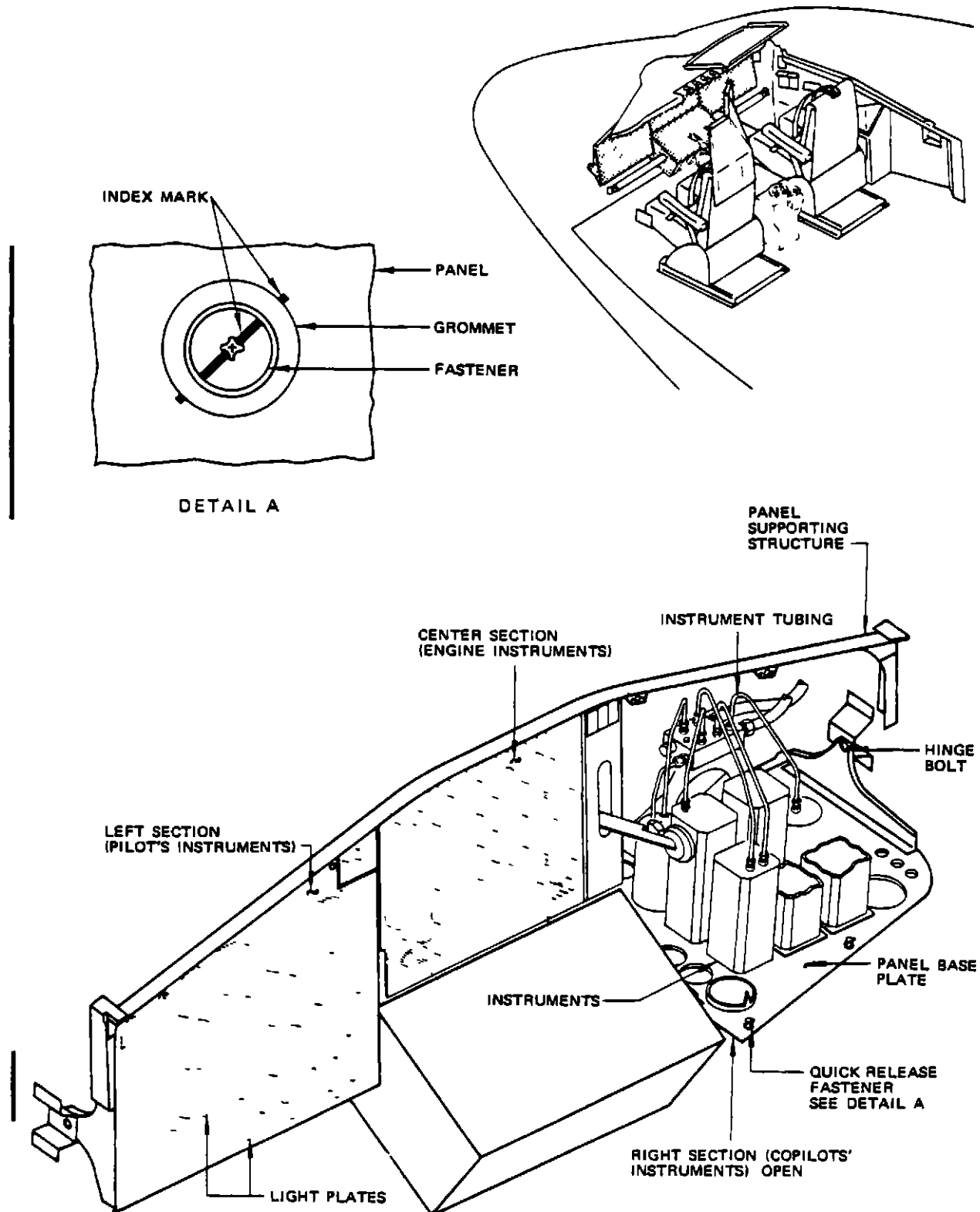
MAIN INSTRUMENT PANEL - REMOVAL/INSTALLATION

1. Remove Main Instrument Panel (See figure 401)
 - A Loosen the quick-release fasteners.
 - B Open the panel and lower it gently to the stop position
 - C Disconnect wiring
 - D Disconnect tubing. Cap tubing ends to protect them from dirt
 - E Remove instruments and brackets where necessary for access to bolts
 - F Disconnect supporting straps if used
 - G Support the panel, remove bolts, and lift panel away
2. Install Main Instrument Panel (See figure 401)
 - A Place panel in position which permits installation of hinge bolts
 - B Insert hinge bolts and tighten
 - C Connect supporting straps as necessary
 - D Install instruments and brackets as necessary
 - E Uncap tubing ends and connect tubing.

CAUTION: MAKE SURE THAT TUBING IS CONNECTED TO PROPER INSTRUMENTS AND PORTS

 - F Connect wiring.
 - G Flush and test pitot static system. Refer to Chapter 34, Pitot Static Systems.
 - H Close the panel and secure it with quick-release fasteners
 - I Verify that index marks are properly aligned (See detail A) If there are no index marks, or if marks are partially obliterated, verify security of fasteners, then paint two white index marks approximately 1/32 inch wide by 1/4 inch long on fastener and grommet as shown in detail A to indicate the locked position of fasteners.

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Main Instrument Panel Installation
 Figure 401



MAINTENANCE MANUAL

SIDEWALL LINING AND INSULATION - MAINTENANCE PRACTICES

1. General

- A. It may be necessary or desirable to remove passenger seats before attempting to dismantle sidewall lining and insulation.
- B. Each air exit grille may be removed independently from the sidewall lining. Access to the air grille retaining screws is gained by removing the gap covers at each exit grille joint.

2. Special Tools and Equipment

- A. Interior Trim Remover Assembly - F70033 or equivalent, for removing snap-on trim without marring or tearing vinyl covering.

3. Removal/Installation Sidewall Lining (Typical)

A. Remove sidewall Lining - Typical

- (1) Remove top trim molding. (See figure 201.)

NOTE: Top trim molding is continuous for three consecutive bays.

- (2) Remove window panel side trim on either side of window panel.

- (a) Loosen screw on latch plate, turn latch plate sufficiently to clear tab on side trim.

- (b) Snap trim strip loose at bottom, using special tool.

- (c) Lift trim strip to disengage lower tab from floating trim.

- (3) Disengage retainer fasteners and remove window panel retainer on either side of panel.

NOTE: Fasteners are quick-release type and are disengaged by rotating through one-quarter turn.

- (4) Remove window panel by working upward to disengage lower edge from groove of dado panel floating trim. (See figure 202.)

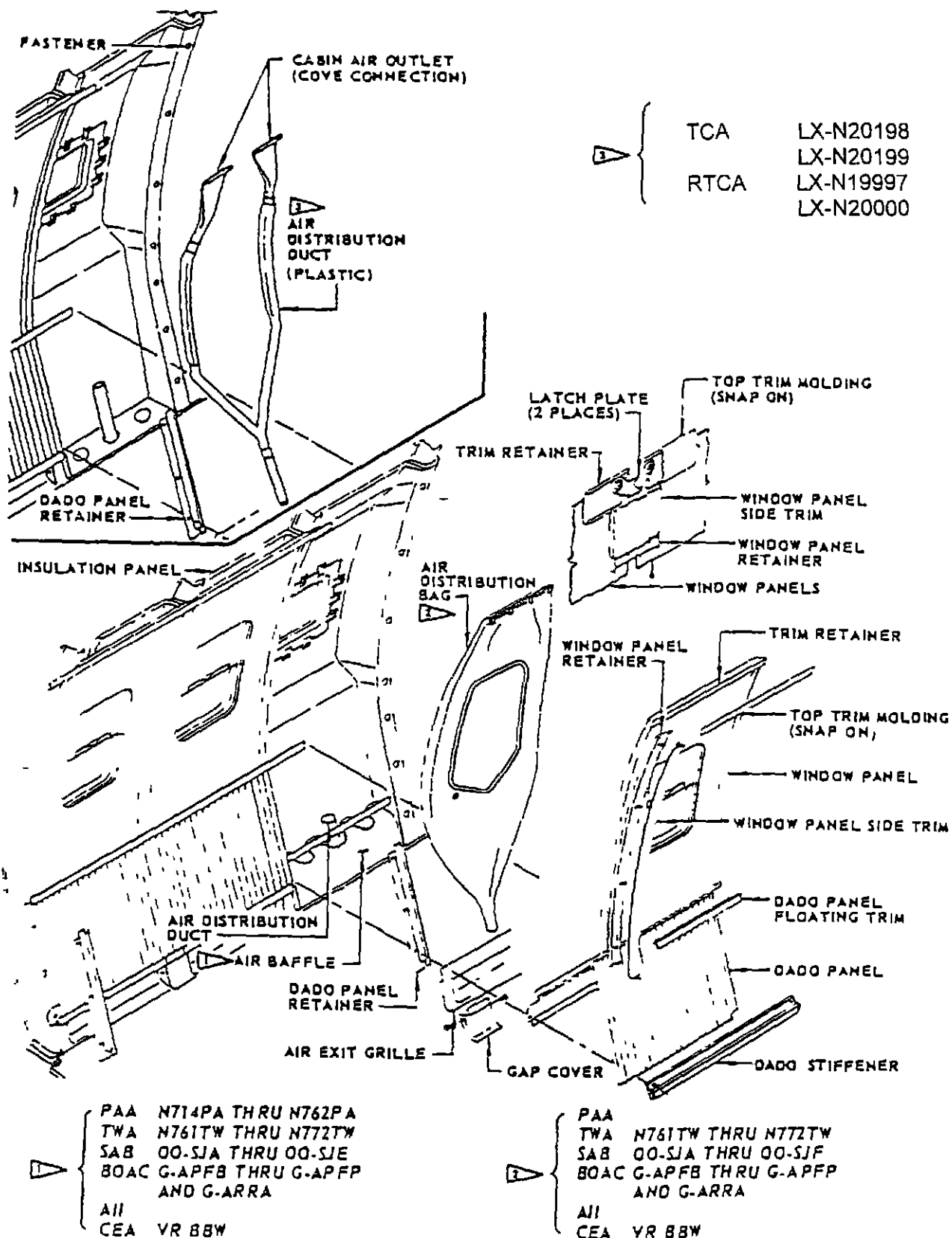
- (5) When three consecutive window panels have been removed, remove dado panel floating trim.

- (6) Remove dado panel by sliding upward to disengage lower edge from groove in air return grille, and flexing with care to disengage side edges from dado panel retainers.

- (7) Disengage dado panel retainer fasteners and remove retainer.

NOTE: Fasteners are quick-release type and require one-quarter turn to disengage.

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Typical Passenger Cabin Sidewall
Figure 201

FLIGHT ENGINEER'S STATION - DESCRIPTION AND OPERATION

1. General

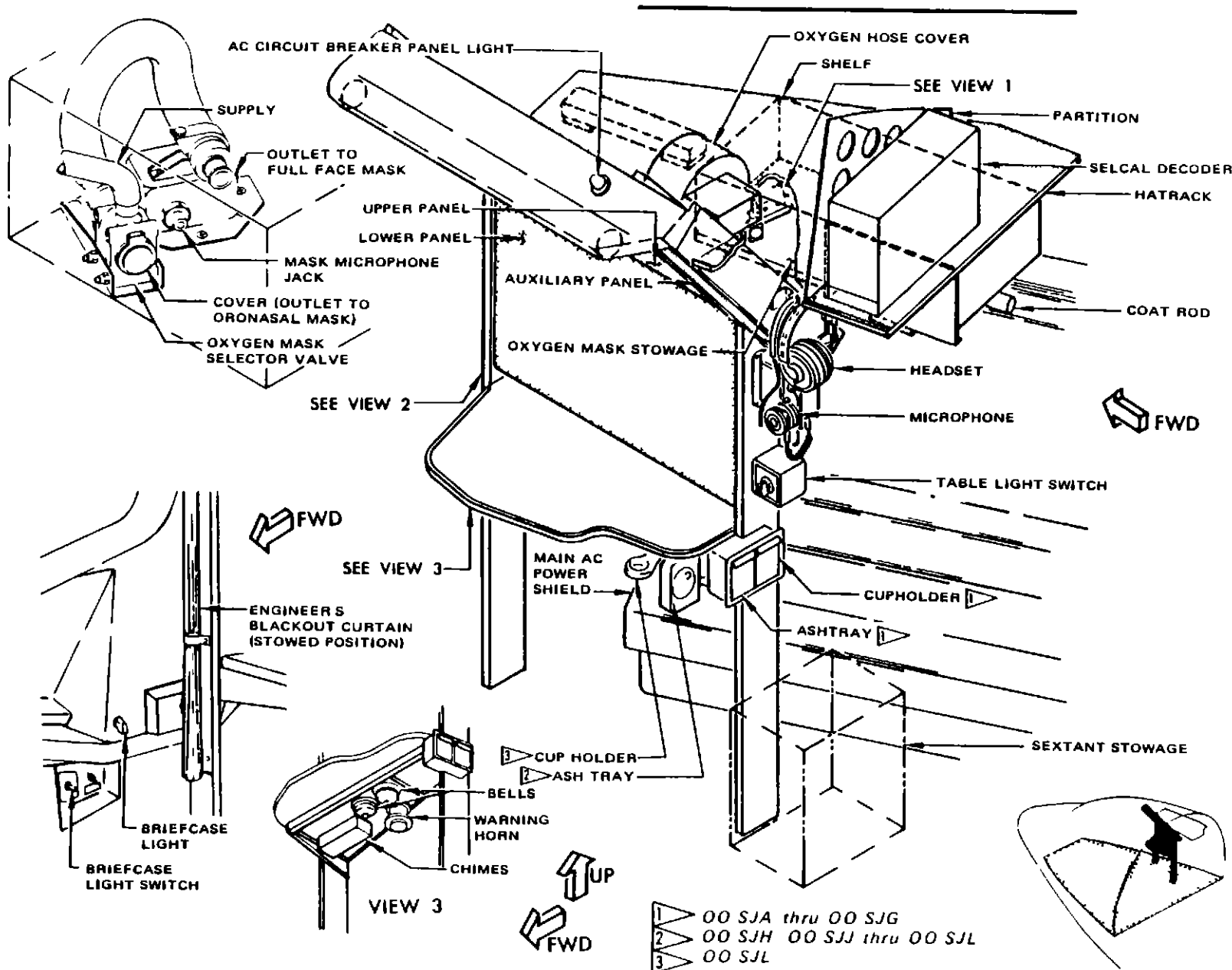
- A The flight engineer's station is on the right side of the control cabin, aft of the copilot's station. Installed equipment includes a seat, a table, the control panels and a light shield, the circuit breaker panels, and the flight engineer's curtain. (See figure 1.)

2. Flight Engineer's Seat

- A. The flight engineer's seat consists of seat body, base, control levers, and a multi-motion seat carriage. Attachment provisions are provided for a commercial seat belt, and inertia type shoulder harness.
- B. The seat body is a rigid sheet metal structure with a tubular leg, supported by the base. The seat back is provided with two folding arm rests. The seat and back cushions are cemented to the seat body. The seat covers are attached by snap fasteners. The aft side of the seat back cover includes a pocket for life vest stowage.
- C. The seat base is a light casting with a tubular column on which the seat body can swivel and move vertically. The seat base is provided with four rollers for movement on the carriage tracks. Two retainers hold the seat to the tracks. Seat movement is limited by stop plates and a stop on the inboard track. The clearance between the seat and the carriage tracks can be reduced to a minimum by turning the eccentric bolts, on which the rollers rotate.
- D. The multi-motion carriage, with the horizontal adjustment control levers, is attached to two seat tracks on the control cabin floor. The carriage permits inboard and outboard travel. Two seat tracks are installed on top of the carriage providing fore and aft adjustment of the seat body and base.
- E. The swivel and vertical adjustment control levers are on the left side of the seat base. Two foot control levers, for horizontal adjustment, are on the seat carriage and are released by a downward movement. The forward lever controls fore and aft travel. The aft lever controls lateral travel. Travel adjustment is in increments of 1 inch.

3. Flight Engineer's Table

- A. The flight engineer's table is attached to the structure supporting the flight engineer's panels. It is made of honeycombed plate to each side of which is bonded a thin aluminum sheet. Its top is lined with plastic sheet. Its edges are trimmed with a trim strip, also providing a ridge.



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4. Flight Engineer's Panel

- A. The flight engineer's panel consists of a lower panel, an upper panel, and an auxiliary panel. The lower panel is upright, and the upper and auxiliary panels slope inboard. The first two panels are hinged between the stanchions, and the auxiliary panel is fixed by screws. The hinged panels are suspended on straps when open. They are secured in the closed position by two quick release fasteners. All three panels are provided with edge lighted plates for selective and controlled illumination.
- B. Each panel consists of the baseplate, the light plates, illuminating equipment and the instruments with switches and leads.
- C. The base plate of upper and lower panel is made of 1/8 inch thick magnesium plate reinforced by a flange and stiffeners. The structure of the light plates is the same as of those on the main panel. (See 25-3-0)

5. Flight Engineer's Light Shield

- A. The flight engineer's light shield is located on the top of the upper and auxiliary panels. It contains lights, arranged in a cylindrical reflector, for the illumination of the panels. It is fabricated of parts made of sheet metal, and of fiberglass plastic. The outer surface of the reflector is insulated with a sheet of cork compound. The whole shield is fixed by screws to the panel supporting structure.

6. Circuit Breaker Panels

- A. There are eight circuit breaker panels, arranged in an arc above the flight engineer's station. The panels are hinged on continuous hinges and are secured in closed position by two quick release fasteners. Open panels are suspended on straps.
- B. The panels are made of 0.05 inch thick aluminum sheet, reinforced by stiffeners. Hinges are riveted to the panels, and attached to the supporting structure by screws.

7. Flight Engineer's Curtain

- A. The flight engineer's curtain is arranged just forward of the flight engineer's table. The curtain is made of a two-ply blackout cloth. It is attached to the forward stanchion of the panel supporting structure and to the cabin ceiling by snap fasteners. The bottom edge of the curtain is about two feet above the floor. When not needed, the curtain can be rolled outboard and bound to the stanchion by three straps with snap fasteners.

END

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FLIGHT ENGINEER'S SEAT - MAINTENANCE PRACTICES

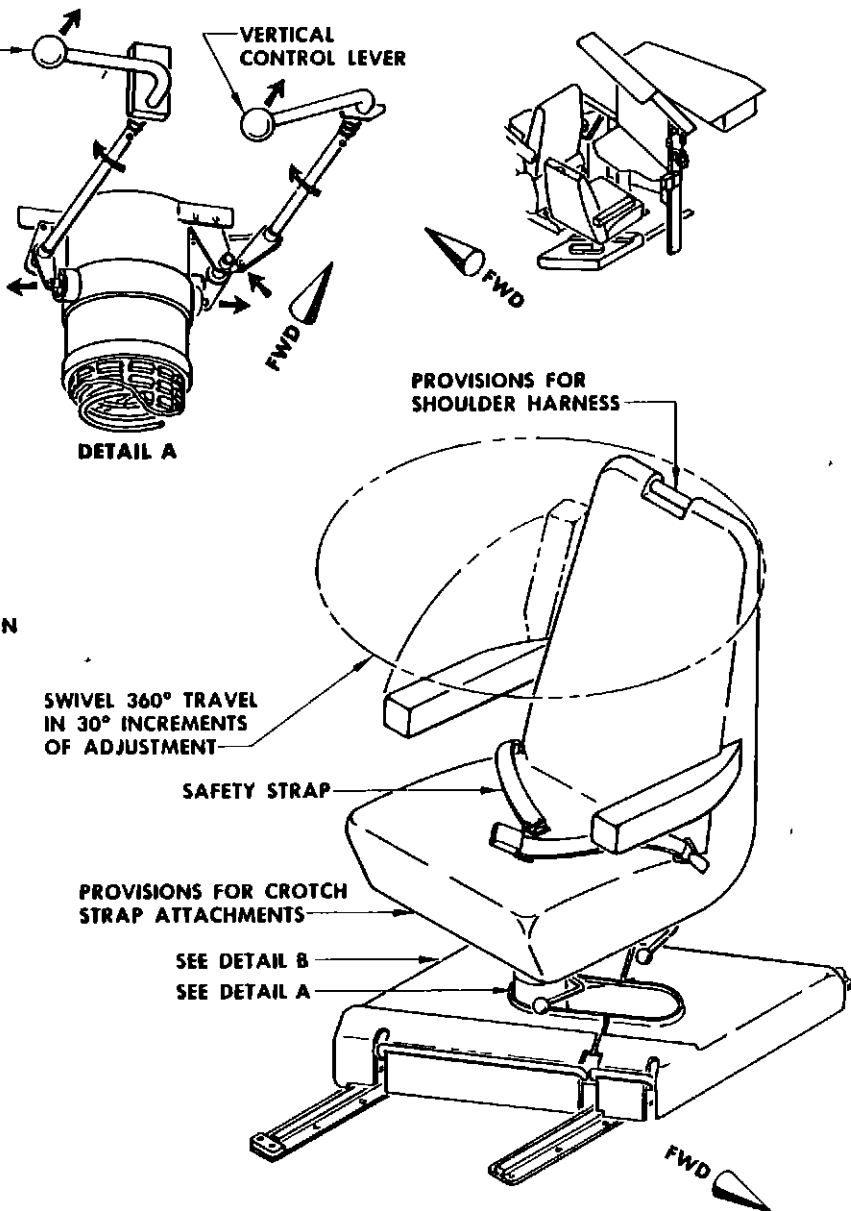
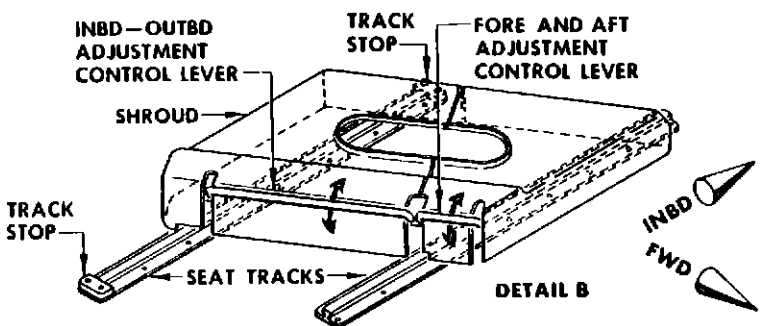
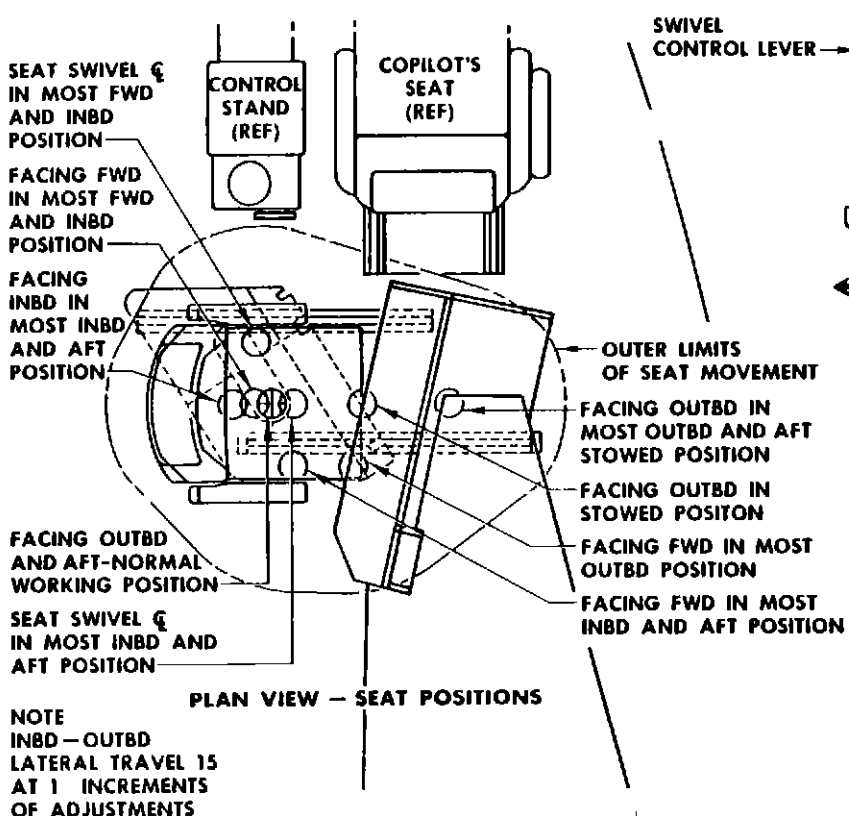
1. Removal/Installation Flight Engineer's Seat

A. Remove Flight Engineer's Seat (See figure 201.)

- (1) Remove stop plate from end of aft seat track.
- (2) Move seat inboard until carriage is past seat track ends.
- (3) Remove seat from airplane.

B. Install Flight Engineer's Seat

- (1) Place seat on tracks and slide outboard, slide carriage past track ends.
- (2) Install stop plate at end of aft seat track.



CIRCUIT BREAKER PANELS - MAINTENANCE PRACTICES

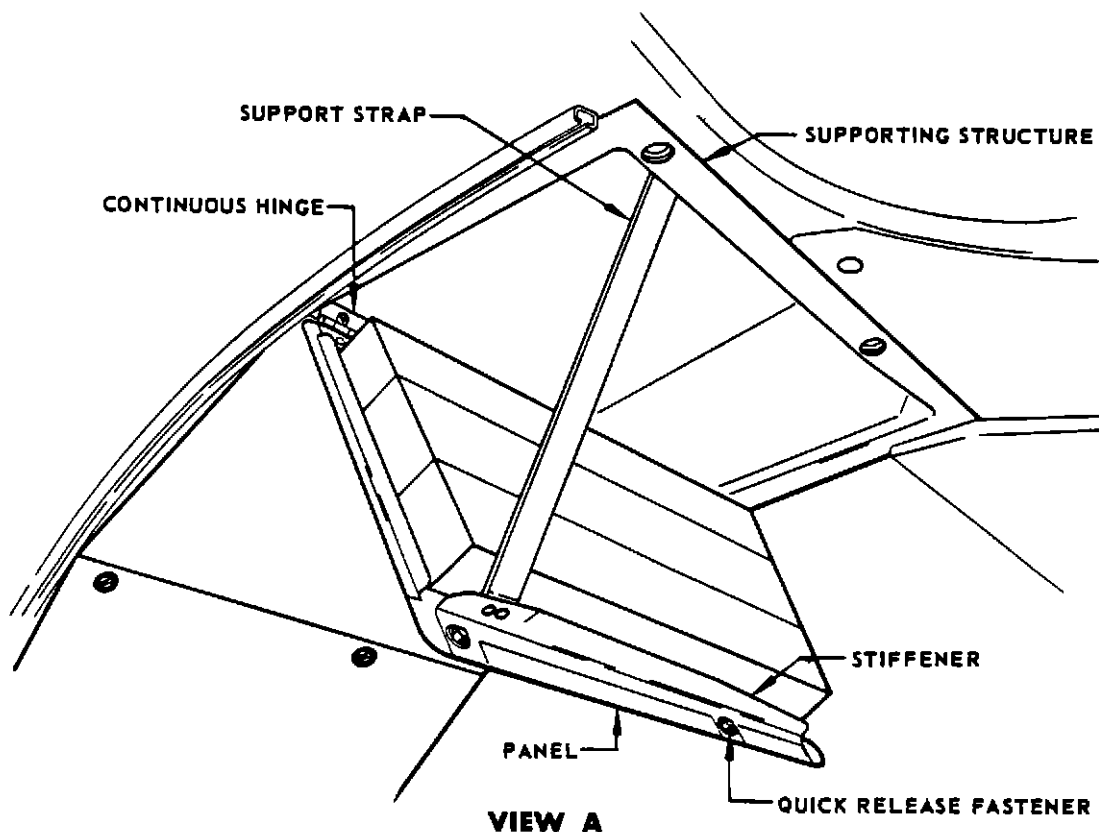
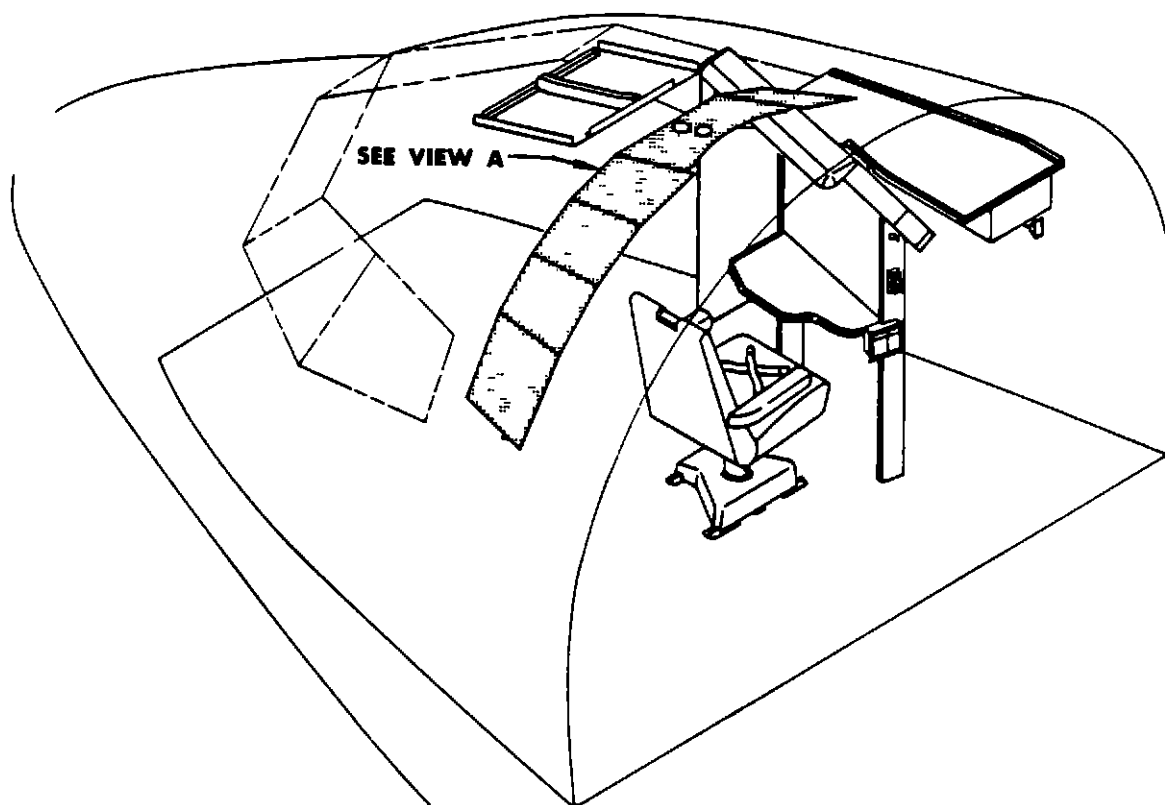
1 Removal/Installation Circuit Breaker Panel(Typical)

A. Remove Circuit Breaker Panel (See figure 201)

- (1) Loosen quick release fasteners
- (2) Open the panel and lower it to the stop position.
- (3) Disconnect wiring
- (4) Disconnect supporting strap
- (5) Remove screws which secure continuous hinge to supporting structure

B. Install Circuit Breaker Panel

- (1) Place panel in position which permits fixing of hinge and secure panel by a screw at each end.
- (2) Connect supporting strap.
- (3) Install all remaining screws.
- (4) Connect wiring.
- (5) Close panel and secure it by quick release fasteners.



Typical Circuit Breaker Installation
Figure 201

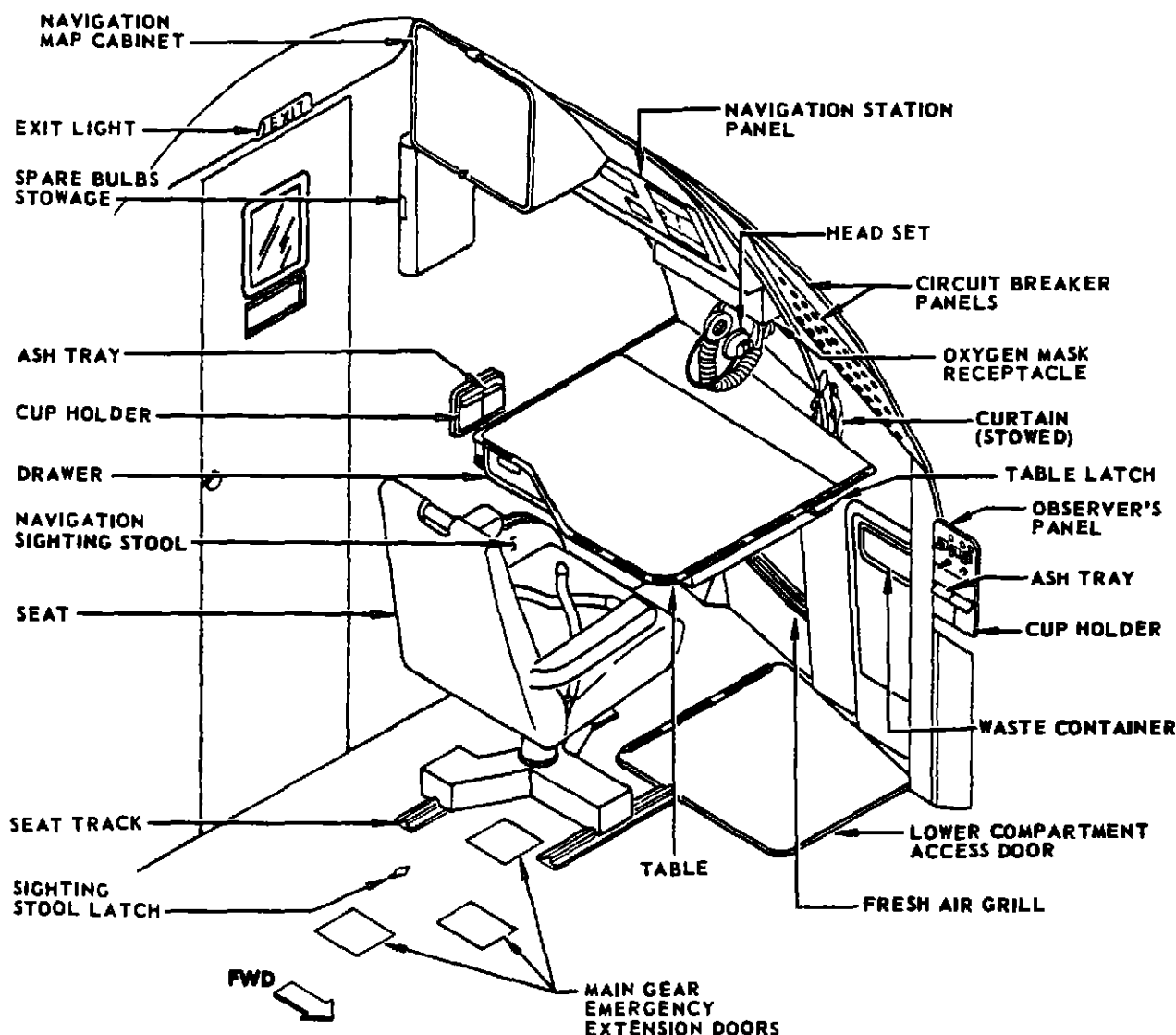
NAVIGATION STATION - DESCRIPTION AND OPERATION

1 General

A. The navigation station is on the left side just forward of the bulkhead 302. The equipment includes the navigator's seat, the navigator's panel, a table, a map cabinet, a curtain, a navigation sighting stool, and the periscopic sextant mount. Figure 1 shows the arrangement of navigation station.

2 Navigator's Seat

A. The navigator's seat is identical with the flight engineer's seat except the seat tracks are longer and the transverse adjustment greater. There is one stop only on the aft track.



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Navigation Station Location
 Figure 1

3. Navigator's Panel and Light Shield

- A. Navigator's panel is located under the navigator's map cabinet. The panel consists of a base plate made of 1/16 inch thick aluminum sheet, four small panels and a plate with the lights control. The base plate is reinforced by a flange and stiffeners. The panel is hinged to the supporting structure, and is secured in the closed position by two quick-release fasteners. The panel rests against the stops when open. The small panels are attached to the base plate by small quick-release fasteners. The lights control plate is secured by screws.
- B. The light shield is located under the lower edge of the panel. It contains lights for the illumination of the navigator's table. The shield is made of fiberglass plastic, and sheet metal. It is secured to the supporting structure by screws.

4. The Navigator's Table

- A. The navigator's table is a folding table located in the aft left corner of the cabin, about 2-1/2 feet above the floor. It is hinge bolted to the bulkhead 302 and is secured in the horizontal position by a retractable bolt (latch). The table is provided with a small drawer.
- B. The table top is made of two thin aluminum sheets bonded to a honeycomb panel. It is reinforced by stiffeners. The upper surface is lined with a sheet of AVTRIM plastic, or equivalent. The edge of the table top is reinforced by a trim, forming a ridge.

5. Navigator's Map Cabinet

- A. The navigator's map cabinet is located just outboard of the cabin entrance door, about 5-1/2 feet above the floor. It has a flap door with a catch. The door is retained in its fully opened position by a spring. The base of the cabinet is arranged as a light shield for the navigator's panel.
- B. The cabinet is made of fiberglass plastic, and of metal fittings. It is attached to the cabin bulkhead and to the supporting brackets.

6 Navigator's Curtain

- A The navigator's curtain is arranged just forward of the navigator's table. It is made of a two-ply blackout cloth. The curtain is attached to the cabin walls by two snap fasteners, and by several plastic studs, sliding inside a guide rail, which is fixed to the cabin walls. The lowest edge of the curtain is 1-1/2 feet above the floor. When not needed, the curtain can be folded down to the lower end of the rail.

7. Navigation Sighting Stool

- A The navigation sighting stool is a round collapsible stool consisting of two round flanged discs, an expanding lever mechanism, and a locking mechanism. It is stowed under the navigator's table, where it is attached to the bulkhead. When used, the stool is locked to the floor by means of a latch.
- B The top disc is provided with an anti-slip coating. The stool height can be locked in three positions.

8. Periscopic Sextant Mount

- A The periscopic sextant mount consists of a rectangular base plate and ball jointed sleeve, serving as a holder for the periscopic sextant. The base plate is fixed by screws to the airplane ceilings skin, just forward of the cabin entrance door.

END

NAVIGATION STATION SEAT - MAINTENANCE PRACTICE

1 Removal/Installation Navigation Station Seat

A Remove Navigation Station Seat (See figure 201.)

(1) Remove stop plate from aft seat track.

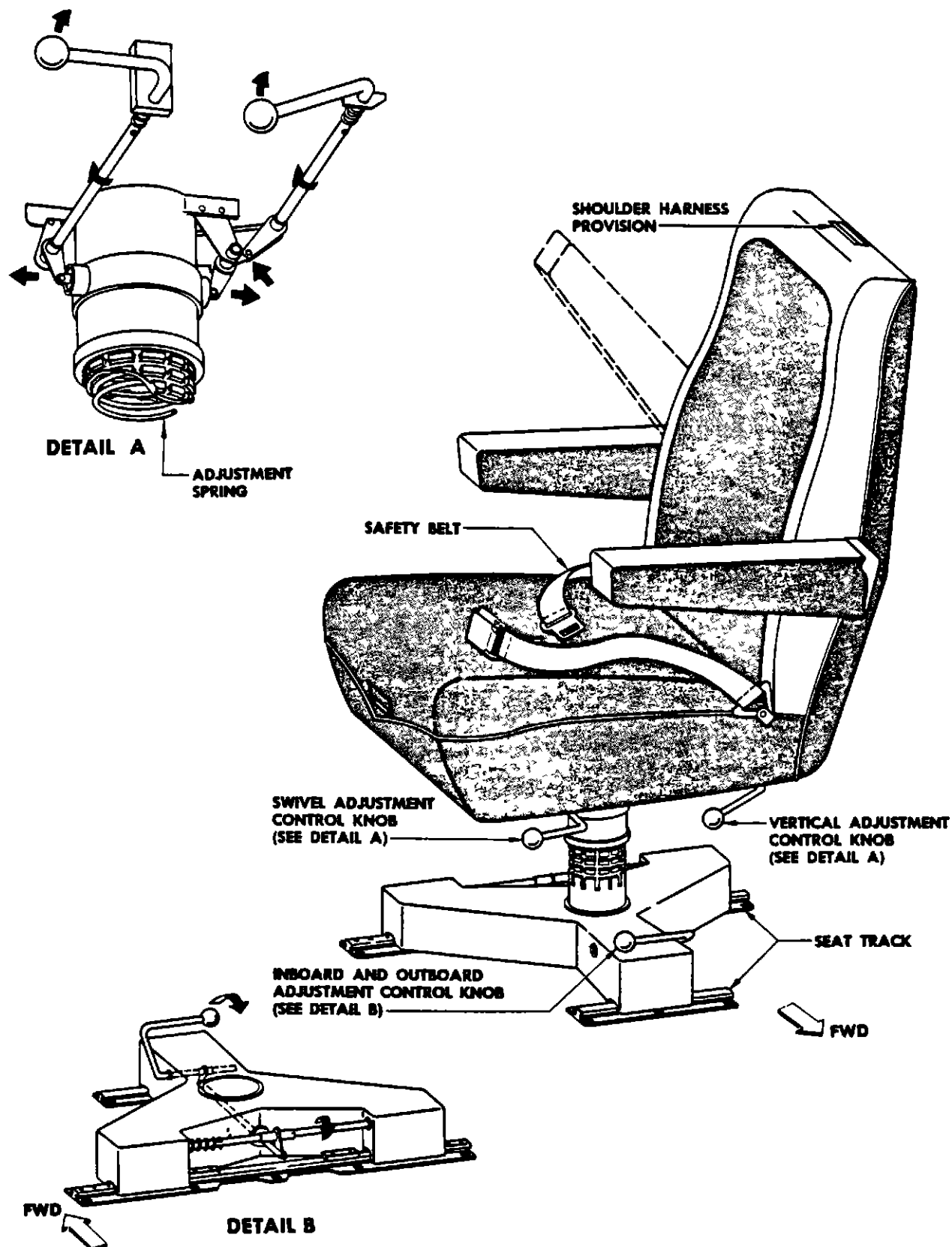
(2) Move seat inboard until retainer plates are clear of tracks

B Install Navigator's Seat

(1) Place seat inboard of tracks

(2) Move seat slowly outboard until retainer plates engage with seat tracks

(3) Install stop plate on aft seat track.





OBSERVER'S STATION - DESCRIPTION AND OPERATION

1. General

- A The observer's station is located at the left side of the control cabin, between the pilot's and the navigation station. Equipment includes the observer's seat and the observer's side panel.

2. Observer's Seat

- A The observer's seat is located aft of the pilot's seat. It has no adjustments, but can be tilted forward. The seat consists of the seat body and the base.
- B The seat body is a rigid sheet metal structure hinged to the base. It has two seat cushions protected by the seat covers which are attached by snap fasteners. The seat is provided with a folding footrest, hinged to the seat body. In the leg of the seat is a life vest stowage space with the access door under the seat back.
- C The seat base is a rigid sheet metal structure with a simple mechanism for attaching and securing the seat to the cabin floor. This mechanism and four anchor plates permit a quick removal of the seat.

3. The Observer's Panel

- A. The observer's panel is located on the cabin wall just aft of the lower corner of No. 3 left window. It consists of three small panels. The upper panel carries the oxygen regulator and flow controls. The middle panel has the light and communication controls. The lower panel is blank. All panels are fixed to the support structure by quick release fasteners. The upper and middle panels have light plates which are edge-lighted.

END



OBSERVER'S SEAT - MAINTENANCE PRACTICES

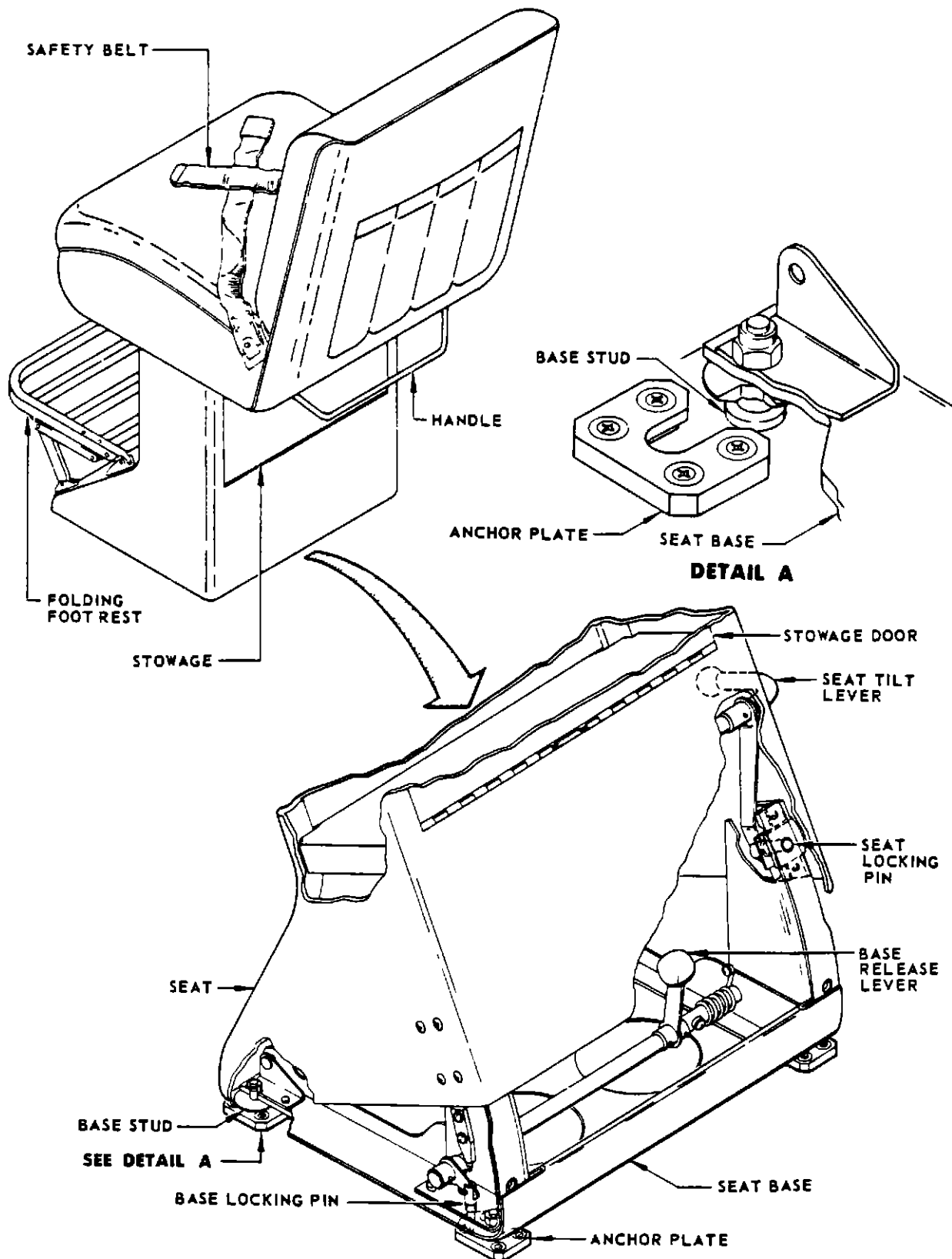
1. Removal/Installation Observer's Seat (See figure 201)

A. Remove Observer's Seat

- (1) Pull tilt lever and tilt seat into forward position.
- (2) Press the base release lever forward, to disengage base lock pins, and pull seat inboard until clear of anchor plates.
- (3) Lift seat to clear surrounding equipment.

B. Install Observer's Seat

- (1) Place tilted seat in position, with locating studs just inboard of anchor plates.
- (2) Press base lever forward and move seat outboard until lock pins engage in holes
- (3) Return seat to normal position.





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PASSENGER CABIN EQUIPMENT - DESCRIPTION AND OPERATION

1. General

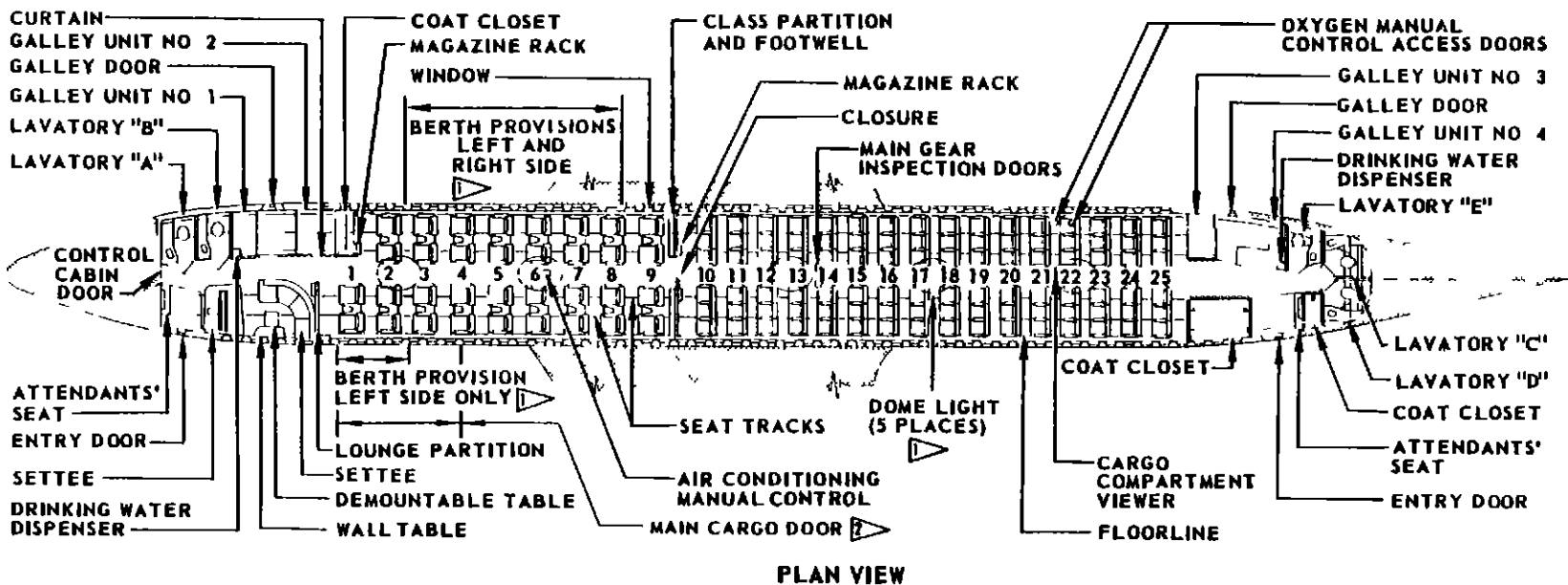
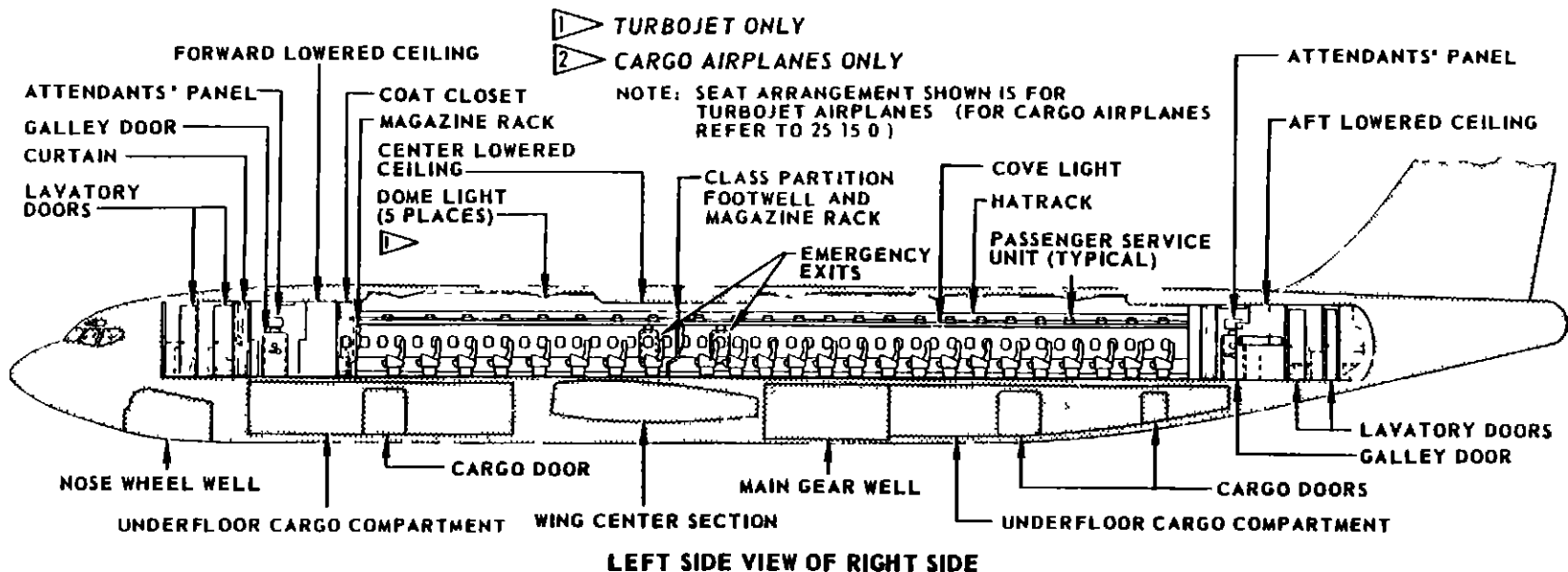
- A The passenger cabin equipment includes window shades, sidewall and ceiling lining and insulation, floor covering, hatracks, passenger lounge and miscellaneous equipment. (See figures 1 and 2.)
- B The passenger cabin is insulated thermally and acoustically by means of fiberglass material on the sidewalls and ceiling.
- C Vinyl-aluminum laminate, the material used for much of the decorative lining, consists of vinyl bonded to aluminum sheet.

1A Passenger Cabin Miscellaneous Equipment

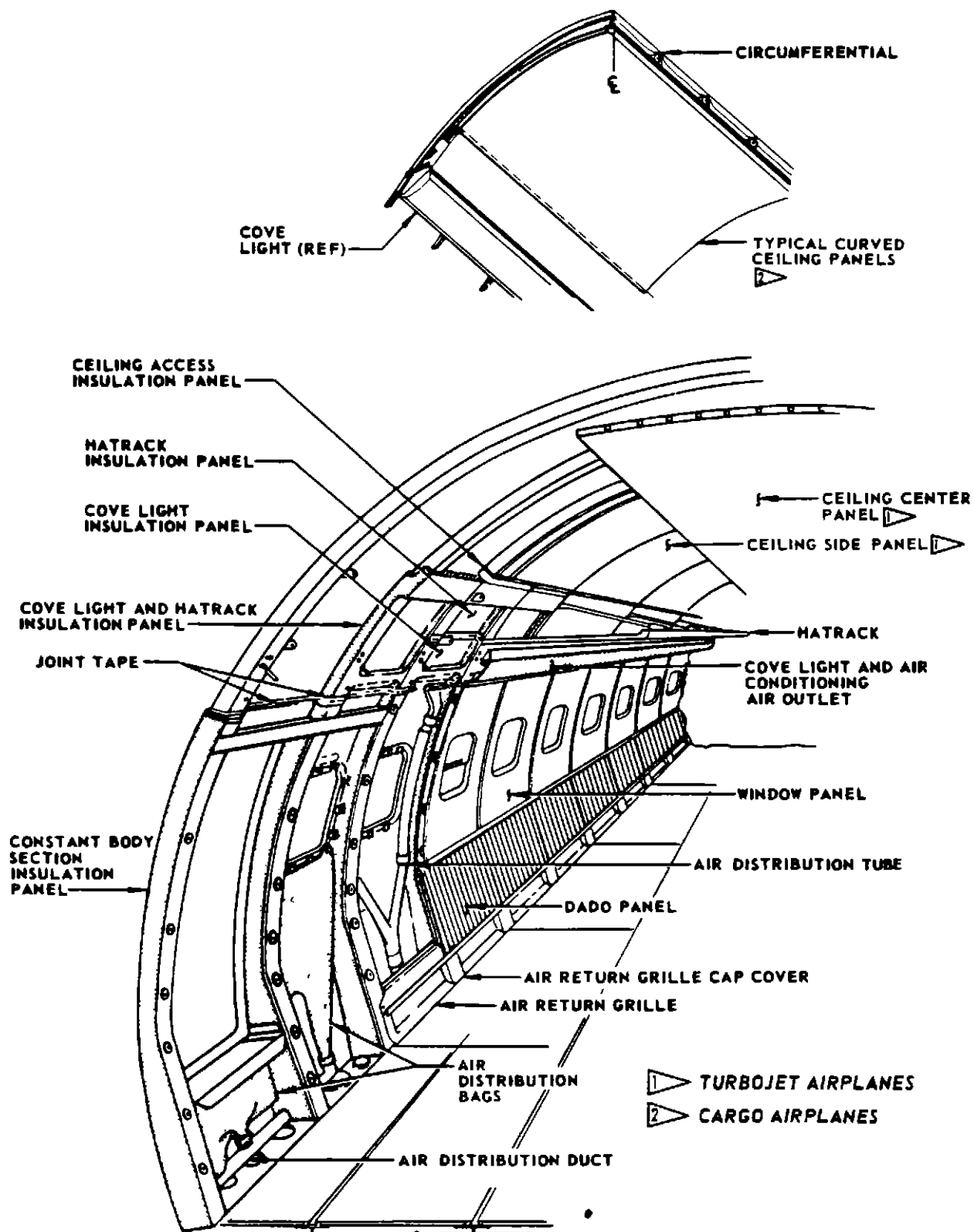
- A A literature and stowage bag is installed on the sidewall adjacent to all seats which face bulkheads, partitions or galleys.
- B Safety barrier straps are provided for all entry and galley doors.
- C Galleys and closets are provided with fabric curtains that attach to tracks mounted on the lowered ceiling panels.
- D A thermometer indicating cabin air temperature is mounted on the forward side of the class partition with double-backed adhesive tape.

2. Sidewall Lining and Insulation

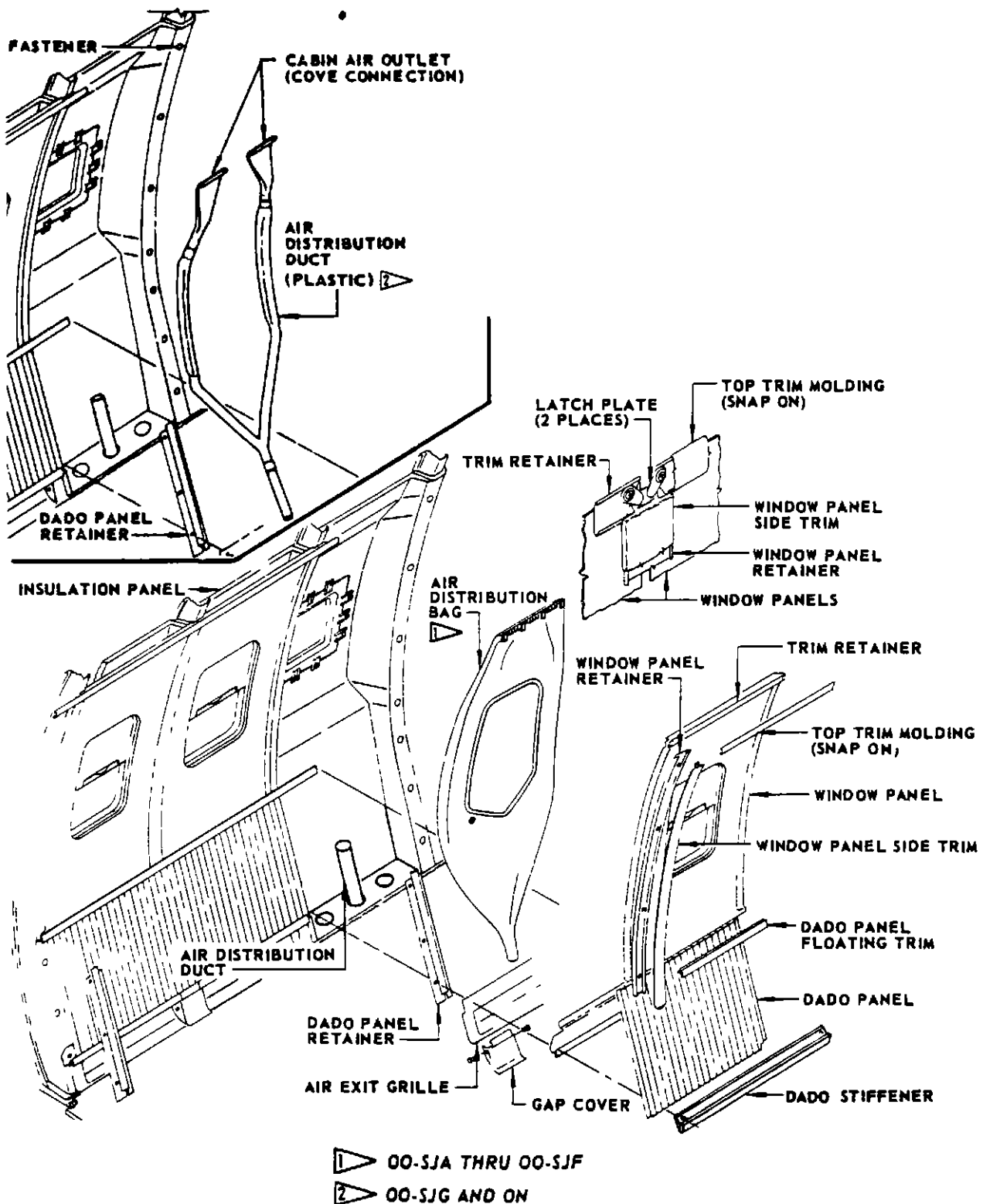
- A Sidewall lining components include air return grilles, dado panels, window panels, cove light covers and closure panels. Decorative trim and molding are installed at joints and edges. (See figure 2.)
 - (1) Air return grilles provide an exit for cabin conditioning air and also secure the outboard edge of the floor covering. A gap cover is installed at each joint.
 - (2) Dado panels, of vinyl-aluminum laminate, make up the lower sidewall lining. Fiberglass insulation material with nylon or mylar fabric covering is installed on the outboard surface of each panel. The lower edge of the panel fits into a groove in the air return grille, the upper edge is attached to the window panel with a floating trim strip, and the panel is attached to the body structure with the dado panel retainers.
 - (3) Window panel assemblies consist of a decorative panel of vinyl-aluminum laminate, an inner window pane, a plastic reveal and window trim, a fiberglass insulating blanket and a roll-type window shade. The window panels are connected to the dado panels by the dado panel floating trim, and attached to the body structure by the window panel retainers.



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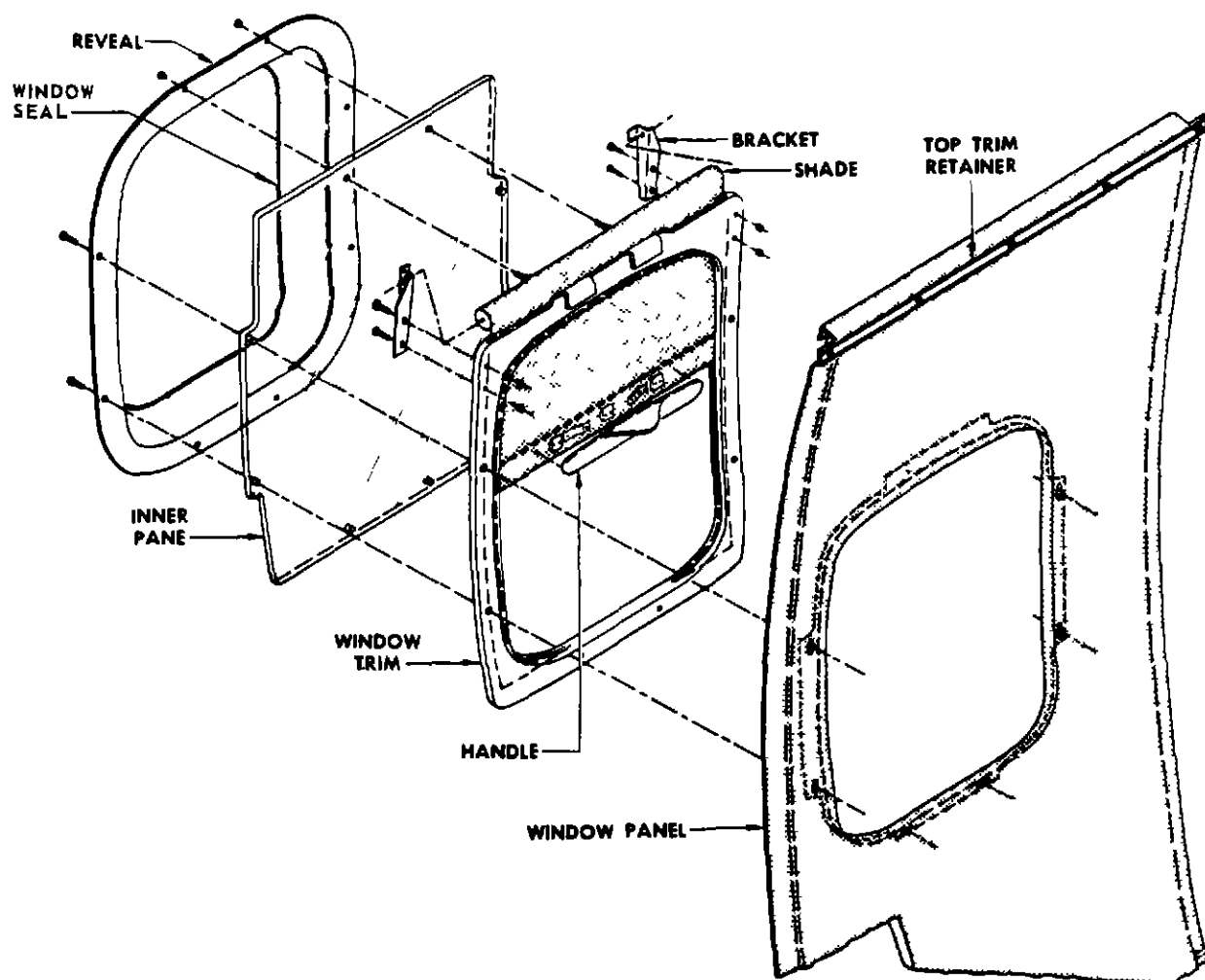
MAINTENANCE MANUAL



Typical Passenger Cabin Sidewall
Figure 2

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- (4) The cove light cover on the upper wall adjacent to the hatrack is fabricated of vinyl-aluminum laminate and perforated to provide an inlet for cabin conditioning air.
- (5) Snap-on side trim conceals the window panel joints, dado panel retainers cover the joints in the dado panels, and floating trim attaches the window panel to the dado panel. The upper edge of the window panel is concealed by the top trim molding. Lining retainers are attached to the body structure through quick-release type, rubber, soundproofing fasteners.
- (6) Closure panels conceal the gap between the top of the hatracks and the lower edges of the ceiling panels. On Passenger/Cargo Convertible Airplanes these are defined as upper closure panels, lower closure panels may be hinged from these to conceal and protect the cove area when the hatracks are folded down in their cargo configuration. (Refer to 25-10-44, Hatrack Closure Panels.)





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- B. Thermal-acoustical fiberglass insulation is installed on the body structure behind the sidewall lining. Some airplanes have panel-type insulation sections formed to the structure contour. Other airplanes have a blanket-type insulation in the window areas of the sidewall. The insulation blankets are more flexible than the formed panels and are packed around the windows and between the sidewall frame structures. Insulation is attached with double-sided adhesive tape and plastic retainers. Adjacent sections are taped together to form a continuous insulating blanket which extends from the floor to the ceiling side panels.

3. Door Lining and Insulation

- A. The entry door panels are decorative linings made of a vinyl-aluminum laminate, with an insulation blanket cemented to the outboard side of each panel. Each entry door has an upper panel, center panel and a lower panel.
- B. The galley service door panel is a decorative lining made of a vinyl-aluminum laminate, with an insulation blanket cemented to the outboard side. The galley service door is covered by a single panel.
- C. On Cargo Airplanes the main cargo door is lined and insulated so that it appears similar to the rest of the passenger cabin interior sidewall. Maintenance Practices for the Main Cargo Door Lining, Insulation and Heating Blankets are provided in Chapter 52.

4. Window Shades

- A. A window shade assembly consists of a Mylar-aluminum foil-vinyl laminate shade with one end cemented to a spring-loaded roller and the other end rivited to a stiffener. The roller is installed in brackets mounted on the outboard side of the window panel assembly. (See figure 3.) A spring-loaded brass shoe in either end of the stiffener rides in a groove in the window trim and a plastic handle is attached to the stiffener.

5. Ceiling Lining and Insulation (Standard Passenger Airplanes)

- A. Ceiling top and ceiling side panels provide both lining and insulation for the curved ceiling.
- B. Panels are made of rigid aluminum frames containing fiberglass insulating batts. On airplanes OO-SJF and on, these batts contain thin sheets of lead foil for noise level reduction. The convex surface of the batts is covered with coated nylon material to protect the fiberglass from moisture. A decorative covering is stretched over the concave surface and cemented to the aluminum framework.
- C. Ceiling panels are mounted to frames with support pins. Adjacent panels are butted together and a rubber extrusion located on the panel edge forms a tight joint. Moisture is prevented from entering the passenger cabin by condensation troughs and flaps located at panel joints. These troughs and flaps allow drainage of moisture behind the sidewalls.

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6. Ceiling Lining and Insulation (Cargo Airplanes)

- A. The cabin ceiling is lined with a series of fiberglass and fiberglass honeycomb panels which follow the profile of the upper lobe of the fuselage. Thermal accoustical fiberglass insulation panels are attached to the airplane skin and structure above the ceiling panels.
- B. In certain areas of the cabin lowered ceilings provide stowage compartments for emergency equipment. One of these areas is at the extreme forward end of the cabin where the ceiling lining is at the same level as the door of a stowage compartment. The aft end of this area is at body station 382, at which point the ceiling lining rises to its normal concave contour at the maximum height permitted by the shape of the fuselage frames, and continues in this configuration to the extreme aft end of the cabin. Three sections of lowered ceiling are installed below the concave lowered ceiling, all of which are removable as complete units when converting the cabin accommodation to cargo carrying configurations. The profile continuity of the concave ceiling lining is not affected by these removable lowered ceilings, and provisions are made for their suspension fittings and electrical connections to be accessible on the inside face of the ceiling panels.
- C. Except in the areas above the forward and aft removable lowered ceilings, the curved ceiling lining throughout the cabin consists of a series of fiberglass honeycomb panels in pairs, left and right. These panels are supported at their inboard edges along the center of the airplane by a continuous extrusion which retains both left and right panels. The outboard edges of all except the aft pair of panels are bolted to the upper sidewall, just behind the upper closure panel above the hattracks. The outboard edges of the aft pair of panels are retained by screws.
- D. The curved ceiling lining in the areas above the forward and aft removable lowered ceilings consists of thin panels of molded fiberglass. These panels are attached around their edges directly to supporting structure and are formed with bulges, recesses and apertures necessary to allow the lowered ceiling attachments and services to protrude below their surfaces.
- E. In the area of the main cargo door the curved ceiling lining consists of thick fiberglass honeycomb panel similar to those throughout most of the cabin. The two panels which cover the door hinge and the upper part of the door, however, have to be removed when the door is used. To provide a ceiling lining for this area in cargo-carrying configurations an additional thin sheet lining is provided above the removable honeycomb panels.



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7 Lowered Ceiling Lining and Insulation (Standard Passenger Airplanes)

- A. The center and aft lowered ceiling areas provide stowage space for various emergency items and other equipment. For information on emergency equipment, refer to 25-1-0, Emergency Equipment - Crew and Passenger Cabins.
- B. Lowered ceiling panels are made of honeycomb core sandwiched between two sheets of fiberglass. Wood edging is applied to the periphery of the panel and a vinyl covering is cemented to the lower surface. The lowered ceiling ends are formed of vinyl-aluminum laminate with wood reinforcement. A plastic extrusion covers the joint at the intersection with the curved ceiling panels.
- C. Molded fiberglass blankets provide thermal-acoustical insulation for the lowered ceiling areas. The blankets are attached to the body structure with double-backed adhesive tape and with plastic lining retainer studs.

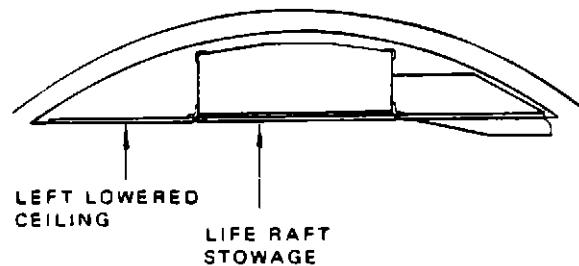
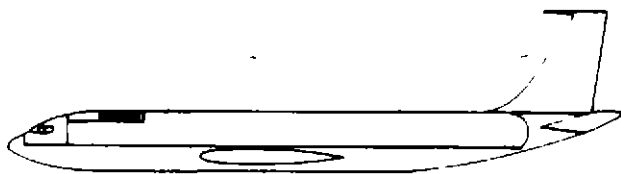
8 Lowered Ceilings (Passenger/Cargo Convertible Airplanes)

- A. All the sections of lowered ceilings, except the permanent section between body station 304 and 382, are readily removable for conversion of the cabin accommodation between passenger and cargo carrying configurations. These removable sections are the forward lowered ceiling aft of body station 382, the center life raft stowage compartment and the aft lowered ceiling. The attachments which suspend the forward and aft lowered ceilings and the center life raft compartment from the upper fuselage structure, protrude through cutouts in the permanent upper ceiling panels. To minimize the flow of air through these cutouts, and any consequent fire risk, a kit of covers is provided by means of which the cutouts can be individually covered after any one of these lowered ceiling components is removed. In the case of the center life raft compartment, which has two alternative locations, the covers also serve to conceal the attachments to which the compartment is not installed.
- (1) The forward lowered ceiling (figure 4) comprises left, center and right sections, and a single fairing across the aft end of all three.
 - (a) The left section is a plain panel retained at its outboard edge by a slot in the overhead ceiling structure and latched along its inboard edge to the center section.

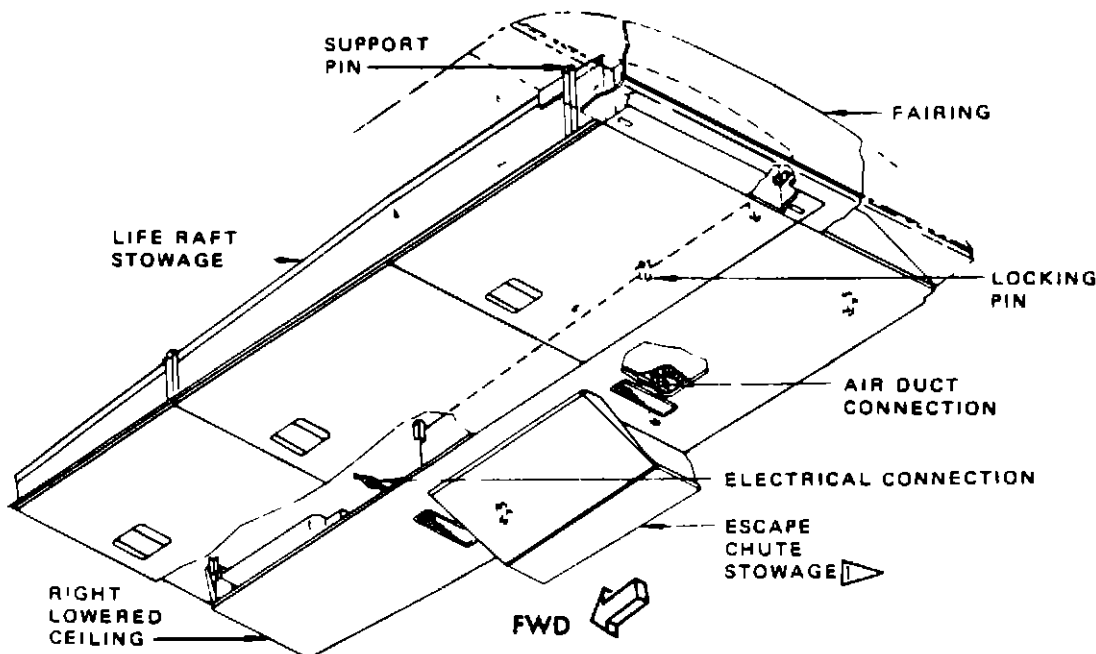
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- (b) The center section consists of a stowage compartment for two life rafts, and is suspended from the overhead fuselage structure by a series of horizontal support pins. Two locking pins are provided to secure this section of the ceiling in its installed position. When the life rafts are removed and the locking pins withdrawn, the section may be removed by sliding it aft until its support pins disengage.
- (c) The right section is over the No. 1 and No. 2 galleys and includes the escape slide stowage (on some airplanes) and the curtain track for both galleys. It is suspended from the overhead structure by a series of horizontal support pins, and is secured in position by two locking pins. When these pins are removed, and some services disconnected, the section may be removed complete with the escape slide by moving it inboard until its support pins disengage.
- (d) The fairing across the aft end of the forward lowered ceiling is latched to the center section and engages with fittings in the left and right sections.

1 AF F BLCC and F-BLCF thru F-BLCJ
SABENA 00-SJH 00-SJJ, and 00-SJK
BOAC G-ASZF and G-ASZG
DLH D-ABUA



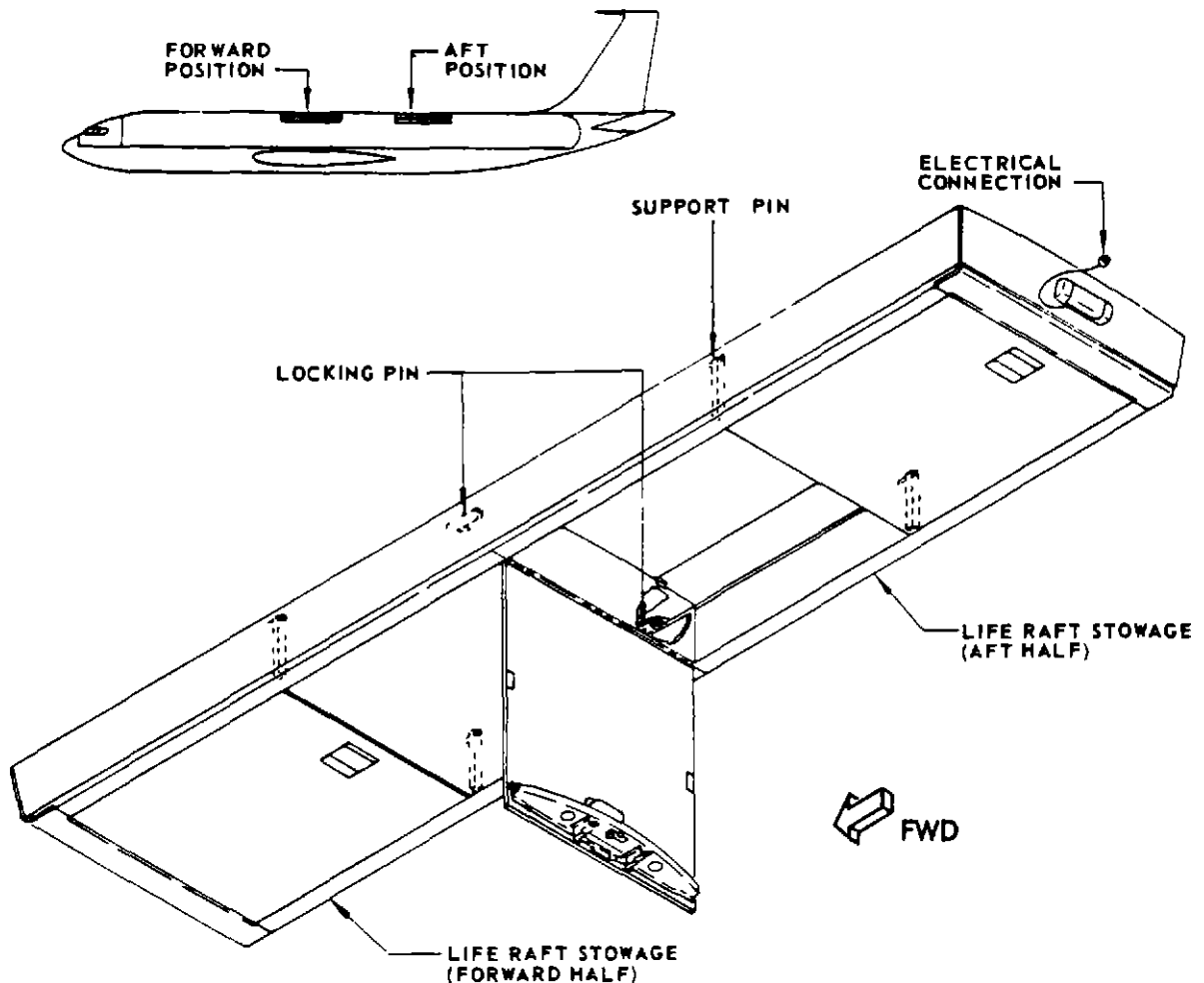
SECTION LOOKING FORWARD



Forward Lowered Ceiling
Figure 4

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- (2) The center lowered ceiling (figure 5) contains provisions for stowages of four life rafts and forms a lowered ceiling area in the mid-portion of the cabin.
- (a) It is suspended by four horizontal support pins and secured in position by two locking pins. When the life rafts are removed and both locking pins withdrawn, and its electrical supply disconnected, the compartment may be removed by sliding it aft until its support pins disengage.
- (b) Two alternative positions are provided for this unit. It is installed in its forward position (opposite the overwing emergency escape hatches at B.S. 690 and 770) in the all-passenger configuration and the 3 and 4 pallet combined passenger/cargo configurations. In combined configurations of 5 or more pallets, the unit is installed in its aft position, opposite the escape hatches at B.S. 990. An identical set of attachments (including an electrical connection) is provided at each position, and a set of detachable covers close off whichever attachments are not in use.

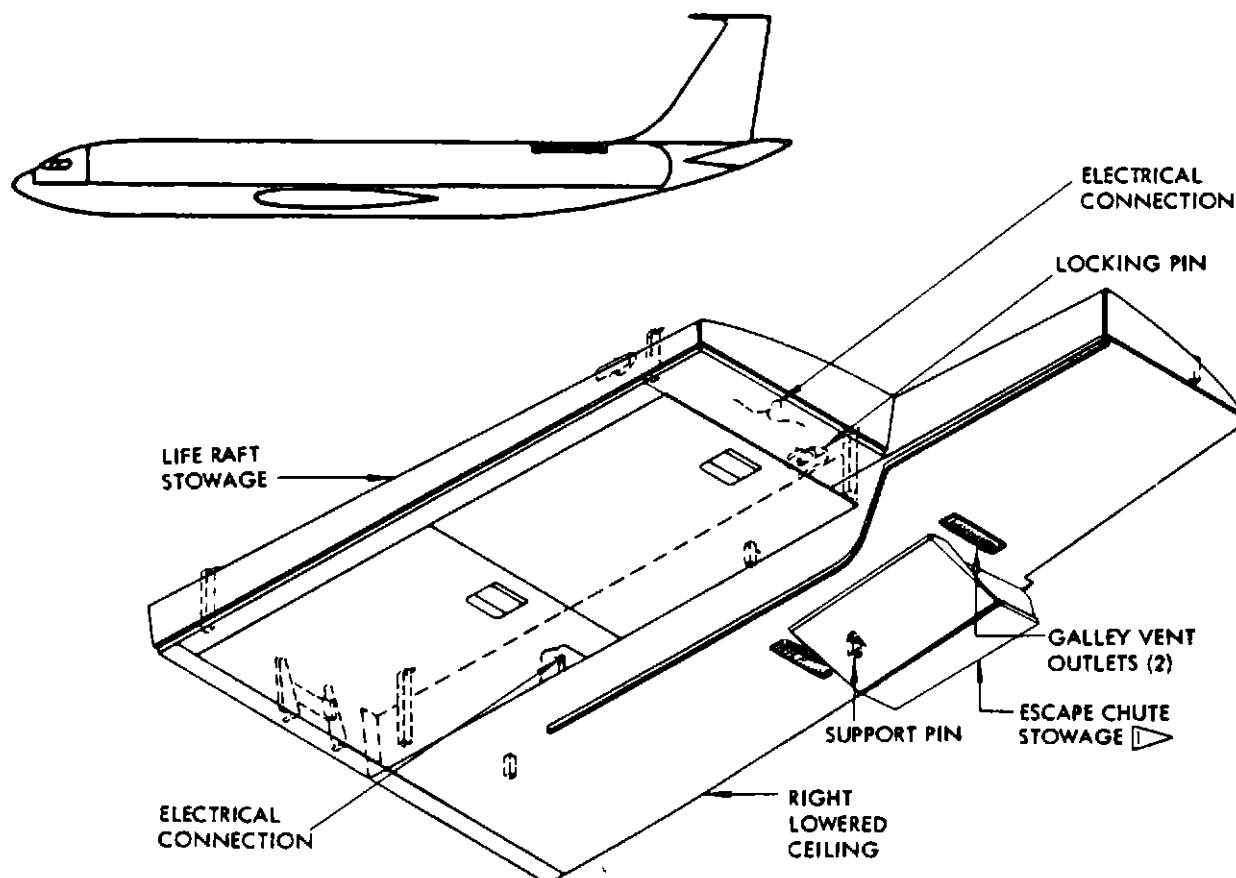




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- (3) The aft lowered ceiling consists of a center and a right section.
- (See figure 6.)
- (a) The center section is the aft life raft compartment and provides stowage for two life rafts. It is suspended on horizontal support pins and secured in position by two locking pins. When the life rafts are removed and both locking pins withdrawn, and its electrical supply disconnected, the section may be removed by sliding it forward until its support pins disengage.
- (b) The right section is suspended over both aft galleys by horizontal support pins and, on some airplanes, includes an escape slide stowage. Two locking pins secure the section in position. When these pins are removed, and an electrical plug and the galley vent ducts disconnected, the section may be removed, complete with the escape slide, by moving it inboard until its support pins disengage.

▷ AF F BLCC and F BLCF thru F BLCJ
SABENA 00 SJH 00-SJJ and 00 SJK
BOAC G ASZF and G-ASZG
DLH D-ABUA



Aft Lowered Ceiling
Figure 6

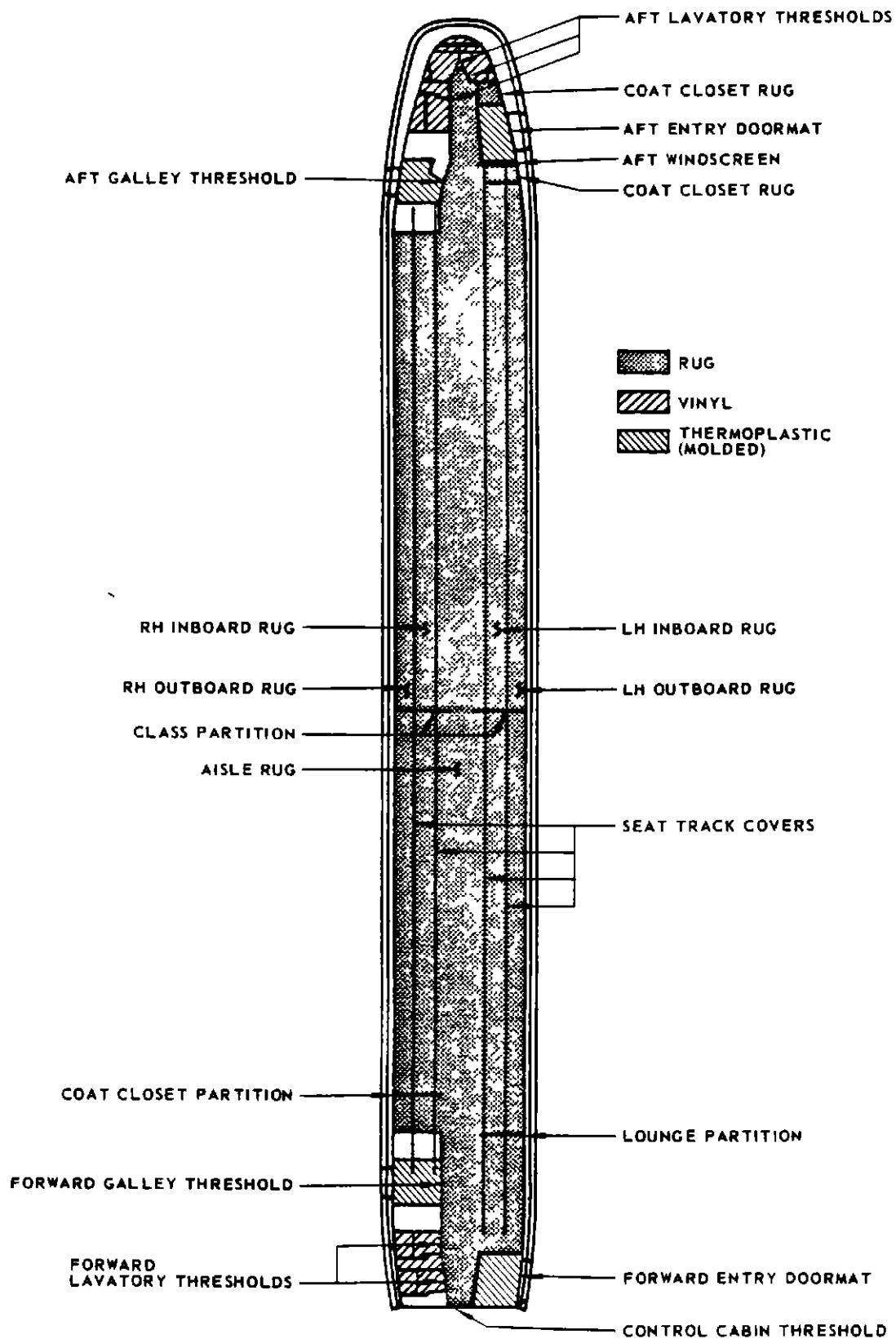
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| 9. Deleted

10. Floor Covering (Turbojet airplanes)

- A. The passenger cabin floor covering consists of polyurethane-backed rugs, polyurethane-backed vinyl mats, and seat tracks covers. (See figure 7.)
- B. Several polyurethane-backed rugs cover the cabin floor between seat tracks. These rugs are attached with double-backed tape. The edges are retained by the air exit grilles at the sidewalls, by the seat track covers at the seat tracks and by the thresholds at various locations. Double-backed tape is used to retain rug ends at partitions and to join rug ends to each other. Where rugs cover servicing doors, the rugs are attached to the floor with velcro tape. Access doors include the fore and aft cargo compartment viewers, the manual temperature control door, two main gear inspection doors, two oxygen manual control access doors, and two main gear door ground release cable access doors. The rug ends in these areas are located by tabs attached to the rug ends. Vinyl type floor mats cover the aisleways adjacent to both forward and aft galley and lavatory areas. A polyvinyl chloride extrusion bonded to the floor is used for butting a rug to a vinyl mat or for two vinyl mat joints. The upper deck cargo compartment floor is 3/8-inch plywood and is installed with double-backed tape. The polyurethane backing on the underside of the rugs throughout the cabin is specifically for soundproofing the passenger cabin.
- C. Electric blankets are taped to the floor panels under the carpets in all of the main wheel well and wing center section area excepting under the cargo floor of the upper deck cargo compartment.
- D. The forward and aft passenger entrance and galley doorways are provided sponge-backed vinyl mats and safety-non-slip pads. The sponge-backed vinyl mats are cemented to the floor panels and sealed at the thresholds and bulkheads. The safety-non-slip pads are cemented to the door reveals.
- E. Extruded plastic seat track covers are snapped into seat tracks between seats to retain carpet edges.



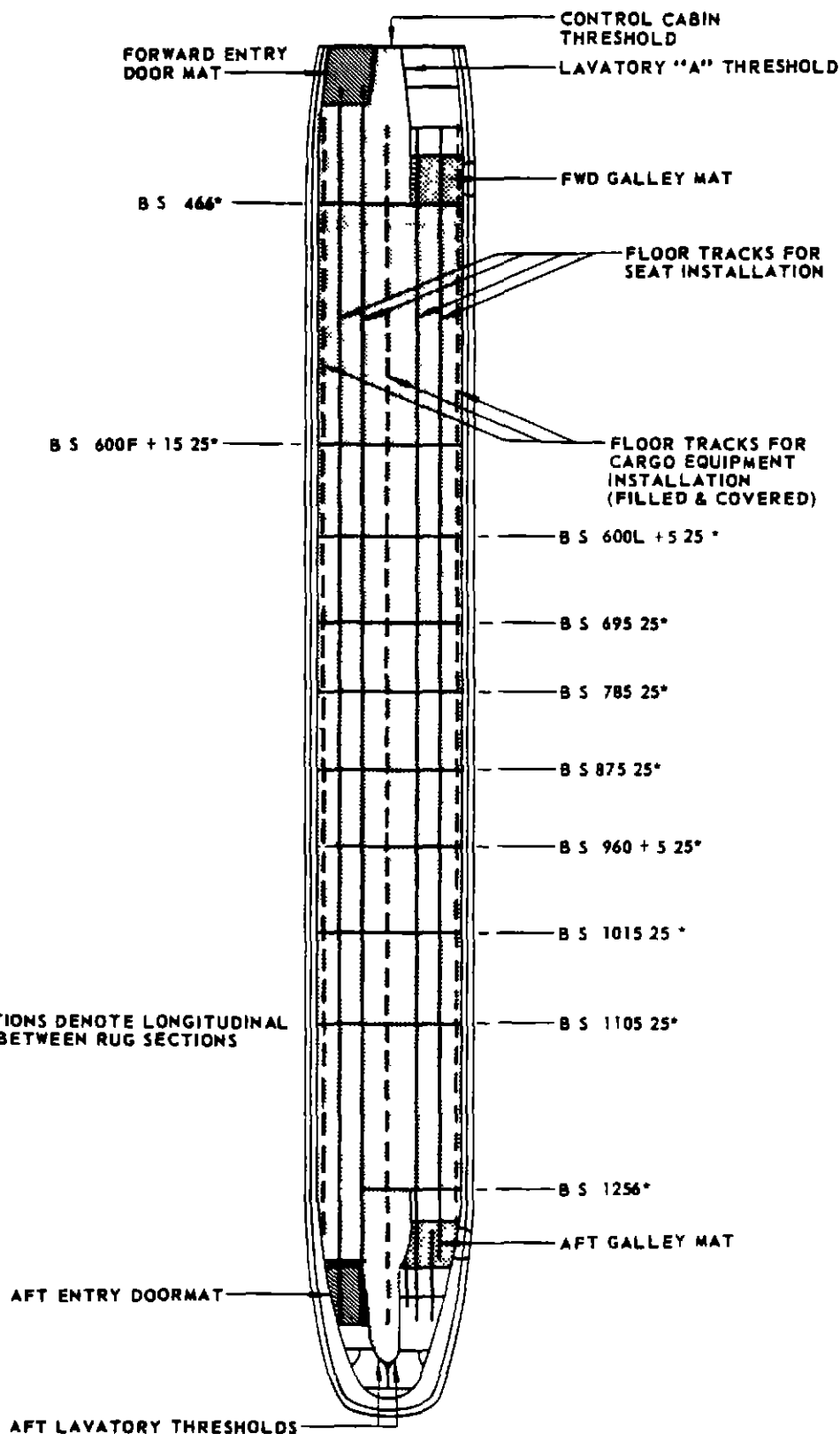
Floor Covering
Figure 7

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11. Floor Covering (Cargo airplanes)

- A. The cabin floor is generally covered with rugs laid on insulating pads. These pads rest directly on the floor panels. The areas of floor between the galleys and at the forward and aft entry doors are covered with vinyl mats. (See figure 8.)
- (1) The rugs are laid out across the cabin in five strips so that all the floor is covered except the four seat tracks. The rug strips are divided longitudinally into sections to facilitate removal and installation, and to allow the rugs to be removed from the cargo area of any of the combined passenger/cargo configurations. Each section of rug rests upon a pad of the same length. The ends of the rug sections are butt-joined to each other by strips of velcro (hook and loop) tape. The forward and aft sections of the central rug strip are cut to fit the profile of the galleys, toilets and doorways, and are trapped in place by threshold strips in certain portions of these areas. Strips of double-backed adhesive tape are used to attach the ends of each rug strip to its pad, and to attach each of these pads to the cabin floor. Five of the rug sections in the cabin are provided with isolated press-stud fasteners attaching to the floor panels. These fasteners are located to indicate the proximity of certain inspection and control facilities in the floor, to which it may be necessary to obtain access during flight and with rugs installed.
 - (2) Between both pairs of galleys and at both entry doors, the cabin floor is covered with vinyl mats which are attached to the floor by double-backed adhesive tape. Trapping strips bonded to the inboard edges of these mats serve to retain the adjacent sections of the rug.



*** NOTE**

BODY STATIONS DENOTE LONGITUDINAL DIVISIONS BETWEEN RUG SECTIONS

Floor Covering
Figure 8

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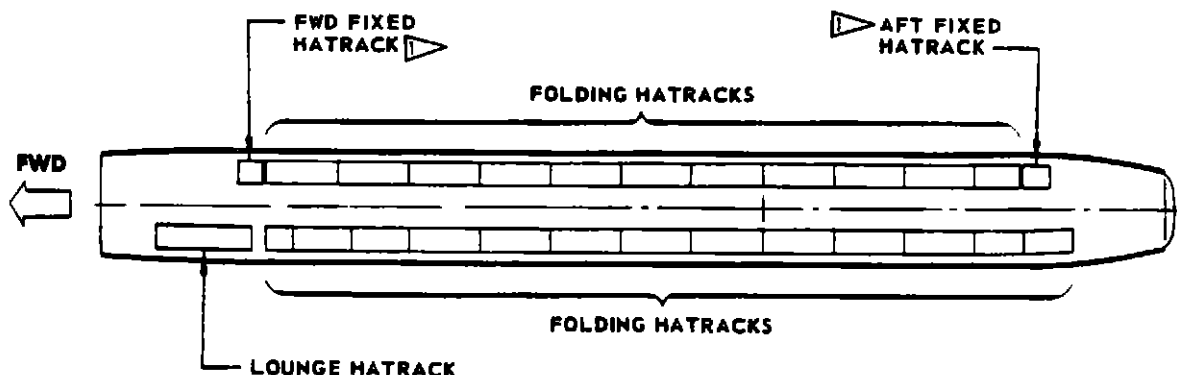
12. Hatracks (Turbojet airplanes)

- A. Hatracks, for inflight stowage of hats, small packages, pieces of luggage, and other personal equipment, are installed above seats on both sides of the cabin. On the left side the hatrack extends from the aft bulkhead of the upper deck cargo compartment to the aft galley service unit. On the right side it extends from the forward galley to the aft coat closet. The sidewall of the upper deck cargo compartment is equipped with provisions for hatracks.
- B. Hatrack sections are made of styrofoam sheets and a urethane foam filler. The styrofoam has a sheet metal covering. An aluminum extrusion, extending along the outboard edge of the hatrack, forms the outboard track to which partitions and passenger service units are attached.
- C. The nose section, along the inboard edge of the hatrack, is padded with urethane foam and covered with flexible Boltaron. The inboard track spacers are part of the hatrack nose section and provide the inboard attachment for the partitions and passenger service units.
- D. The hatrack lower attachment fastens the outboard edge of the sections at each body frame. Adjustable tension tie tube, fastened at the hatrack upper attachment, support the sections at the inboard edge. Adjacent sections are bolted together on installation.

13. Hatracks (Cargo airplanes)

A. General

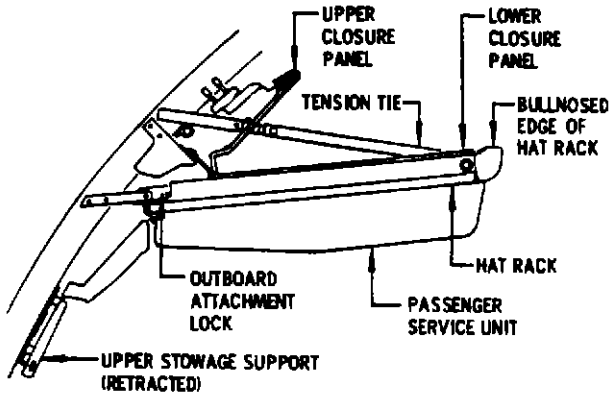
- (1) The hatracks extend along both sides of the cabin and are grouped into three distinct types: the folding hatracks, the fixed hatracks and the lounge hatrack. (See figure 9.)



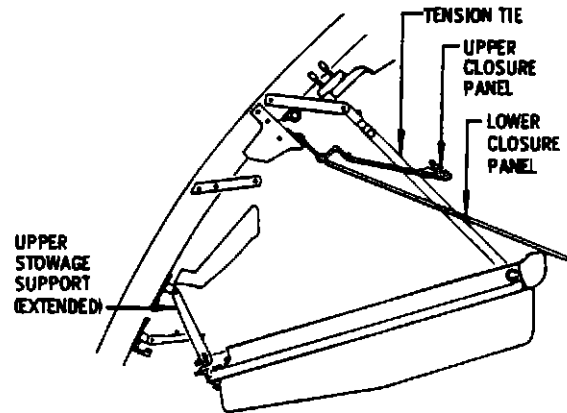
 AVAILABLE FOR USE WITH CABIN CONFIGURATIONS IN WHICH GALLEY NO 2 OR GALLEY NO 3 IS ABSENT

B. Folding Hatracks

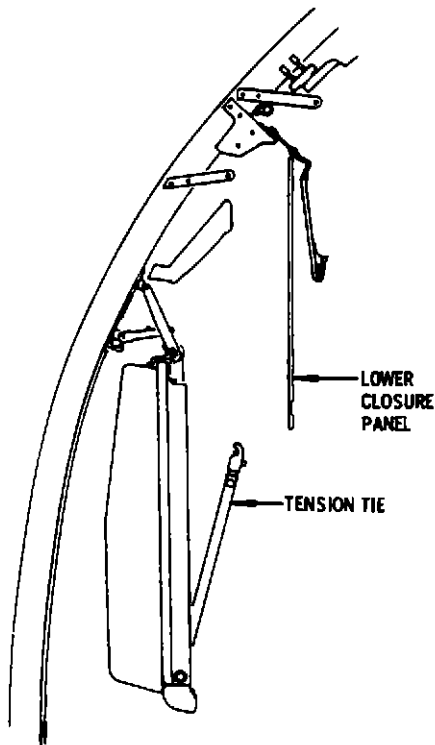
- (1) The folding hatracks extend from end to end along both sides of the cabin, terminating at the forward end of the main cargo door, and are divided into thirteen sections along the left side and eleven on the right. Each section is individually supported from the fuselage structure and all the sections along each side are connected to each other at their inboard edges. (The two sections on the main cargo door are exceptions to this, being connected to each other but not to the next section aft.) Each of the sections may be disconnected from its neighbor, folded down and stowed against the sidewall, when converting the cabin to carry cargo, or may be removed from the airplane completely for replacement purposes or as an optional method of conversion to a cargo carrying configuration. The cargo door may be opened and closed with its two hatrack sections folded down and stowed against its inboard surface. Refer to 25-15-0, "Cabin Accommodation Conversions," for more information on the convertibility provided by these folding hatracks.
- (2) When a section of these hatracks is to be folded down, its outboard attachments to the fuselage structure are disconnected and attached instead to upper stowage supports on the sidewall. (See figure 10.) (These supports can be retracted to lie flush with the sidewall when not in use.) Disconnection of the tension ties supporting the inboard edge allows the section to rotate until it hangs from the upper stowage supports. The bottom of each section is then secured to the sidewall dado panel by a portable lower stowage support, one of which is carried into the airplane for each hatrack section to be stowed. An upper and lower closure panel are hinged to each other so that, when the hatrack is installed for normal use, the upper closure panel forms the outboard wall of the space above the rack, and the lower closure panel lies flat on the upper surface of the rack. When the rack folds down the inboard edge of the lower closure panel drops and is connected to the hatrack so that the entire sidewall as far down as the dado panel is covered by the upper and lower closure panels and by the hatrack itself. The passenger service units installed on the underside of each hatrack section may remain installed when the section is stowed. The air and oxygen flexible lines and the electrical cables leading to each unit are long enough to allow the unit to drop to the stowed position without requiring any of the services to be disconnected. Any service unit which has been installed across a joint between two hatrack sections must be moved to one section or the other before either section is folded down.



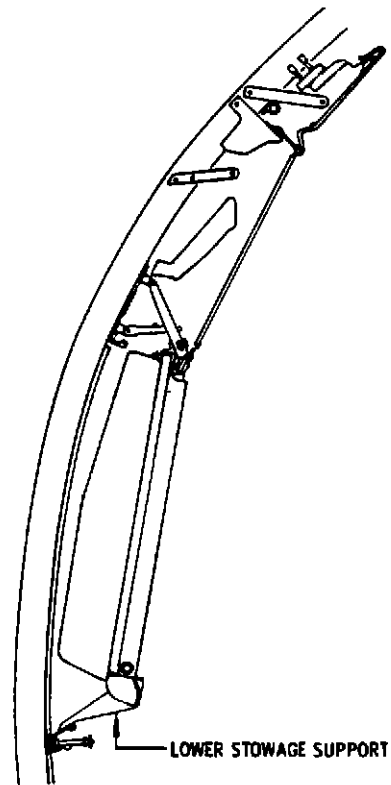
PASSENGER CONFIGURATION



INTERMEDIATE POSITION



HANGING POSITION



CARGO CONFIGURATION



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C. Fixed Hatracks

- (1) The fixed hatracks consist of two sections of hatrack (one forward, one aft) which are similar in cross-section to the folding hatracks. These fixed sections, however, cannot be folded and must be removed and installed, as required by changes in cabin accommodation configuration.
- (2) The aft section of fixed hatrack is installed in place of No. 3 galley in the combined passenger/cargo configurations. (See 25-15-0, "Cabin Accommodation Conversions.") It forms an extension of the aft end of the folding hatracks along the right side of the cabin, and supports a standard passenger service unit. In order to preserve the appearance of furnishing continuity, a section of standard sidewall cove is installed immediately below the fixed hatrack section. (Due to the nonstandard length of this section of cove, it is not provided with a cove strip light.)
- (3) The forward section of fixed hatrack is similar to the aft section, forming a forward extension beyond the forward end of the folding hatracks along the right side of the cabin. This section is installed in the all-passenger configuration.

D. Lounge Hatrack

- (1) This is the single section of hatrack along the left side of the cabin, forward of the main cargo door. It is defined as the lounge hatrack because its configuration would facilitate adaptation of this portion of the cabin as a lounge. On airplanes as delivered, however, this portion of the cabin contains normal passenger seating and lounge furniture is not provided.
- (2) The lounge hatrack contains a series of service units which are flush with its lower surface. Between the service units the blank panels are the same width as the units, so that the positions of the units may be adjusted by rearranging the sequence of blank panels and service units. This allows for conversion between different densities of passenger accommodation.
- (3) The lounge hatrack may be hinged up from its normal attitude and locked against the ceiling when cargo is to be carried or if this portion of the cabin is ever furnished as a lounge.

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14. Passenger Cabin Miscellaneous Equipment (Turbojet Airplanes)

- A. A literature and stowage bag is installed on the sidewall adjacent to all seats which face bulkheads, partitions or galleys. Since stowage bags can not be installed on escape hatches, they are mounted on the aft sides of the class partitions for seats adjacent to the aft escape hatches.
- B. Safety barrier straps are provided for entry and galley doors.
- C. A thermometer, indicating passenger cabin air temperature is mounted on forward surface of the left class partition.

15. Passenger Lounge

- A. The passenger lounge is situated on the left side of the cabin forward of the lounge partition at station 480. The lounge may be replaced with passenger seats for a high-density tourist configuration.
- B. The lounge consists of a curved settee and a back-to-back settee installed in seat tracks on the floor, and a cocktail table mounted on the sidewall.
 - (1) The curved settee will accommodate four passengers. Three removable armrests, equipped with ash trays, are installed in receptacles between cushions.
 - (2) The back-to-back settee has two forward-facing and two aft-facing seats. Removable armrests with ash trays and drink-holder attachments are installed between cushions.

16. Passenger Berth (Turbojet Airplanes)

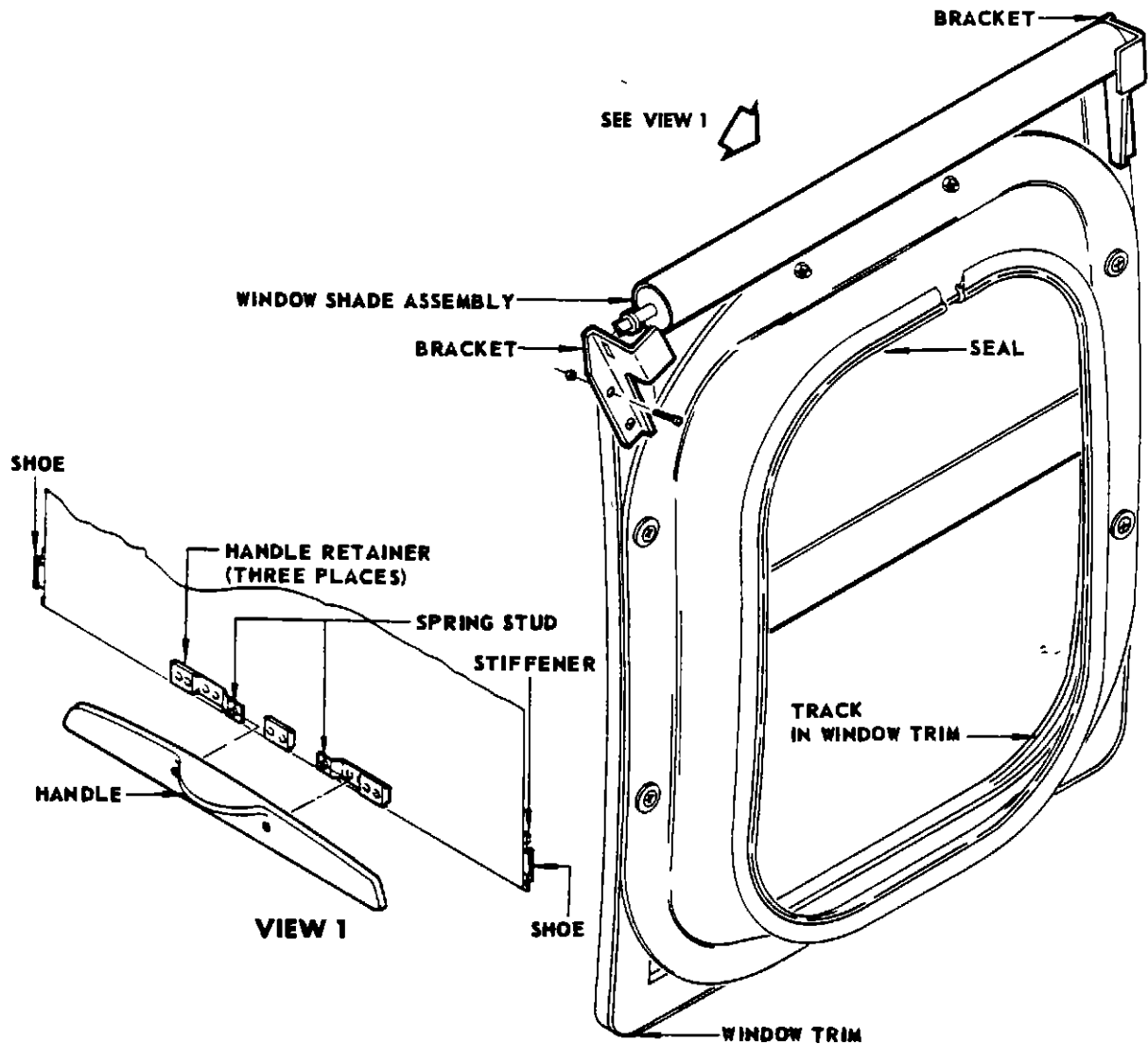
- A. Structural fittings are provided for the installation of berths in the passenger cabin. The berth fittings are located behind the closure panels and side ceiling panels.

WINDOW SHADES - MAINTENANCE PRACTICES

1 Removal/Installation Window Shades

A Remove Window Shade (See figure 201)

- (1) Remove window panel for access to window shade
- (2) Remove window shade handle by pressing in spring studs and sliding to disengage
- (3) Remove one screw and loosen the other on the bracket which has the slotted hole. (See figure 201.)
- (4) Disengage shade assembly by sliding stiffener out of track in window trim.



B. Install Window Shades

- (1) Check that track in window trim is clean.
- (2) Install spring and shoe in either end of stiffener.
- (3) Engage shoes in track and insert shade in window panel
- (4) Roll up window shade and insert one end of roller in bracket.
- (5) Pre-wind roller spring four turns clockwise with shade rolled up and engage other end of roller in slotted bracket.
- (6) Install bracket screws and adjust so that shade movement is parallel to track in window trim.
- (7) Install shade handle.
- (8) Operate shade several times through complete up and down positions. Shade must operate smoothly without sticking or wrinkling shade material. If shade sticks or operates unevenly, remove window shade and check shoes in stiffener for smooth finish on sliding surface.
- (9) Pull shade to down position and tap window panel with fingers. Shade must not creep up.
- (10) Install Window Panel.

2. Cleaning/Painting Window Shades

A. Cleaning Window Shade Track

- (1) Place strip of wax paper on stick of wood which will fit shade track.
- (2) Slide wax paper up and down shade track until clean.

3 Approved Repairs Window Shades

A. General

- (1) Damaged window shade assemblies may be replaced with new assemblies if desired, however, the shade material may be renewed according to the following procedure.
- (2) A fixture should be constructed to assure proper alignment of shade material on roller and stiffener.

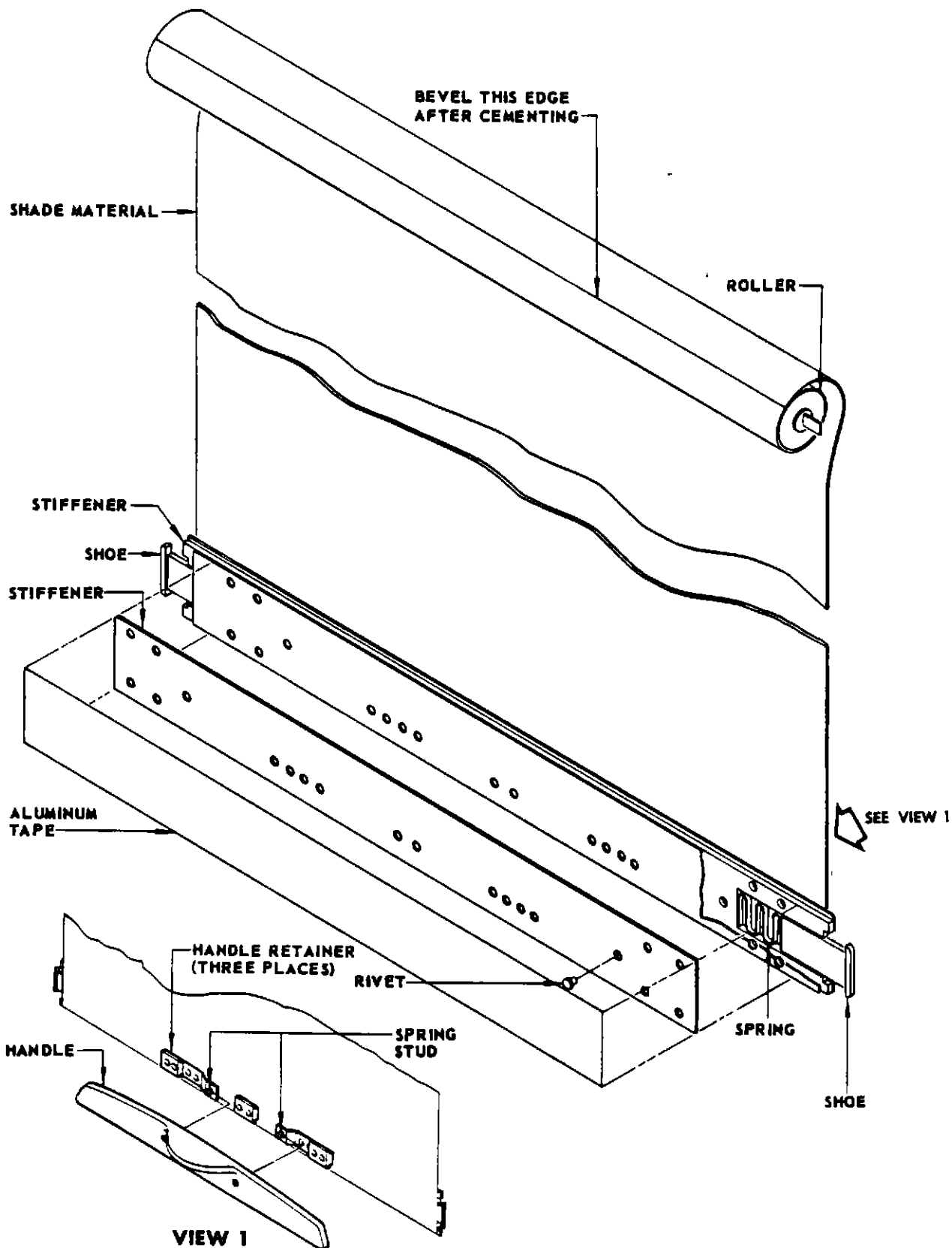


B Materials

- (1) C.C1C to C C115 Mylar-aluminum foil-vinyl laminate Color: Vinyl side-BAC White No 744; Mylar side-silver Texture: Seiberling Rubber Co. Emb No. 203 Material. Seiberling NO 105
- (2) Pro-Seal 501 adhesive.
- (3) Aluminum pressure sensitive tape No 3659 (Optional Metal-Cal aluminum foil)

C Replace damaged shade material (See figure 202)

- (1) Remove window shade assembly.
- (2) Remove shade from roller and clean roller
- (3) Remove aluminum tape on stiffener
- (4) Carefully drill out rivets in stiffener.
- (5) Cut shade material to proper size.
- (6) Rivet shade material to stiffener with Mylar (silver) side down
- (7) Rivet handle retainers and spring studs in place
- (8) Cement Mylar (silver) side of shade to roller. (Apply cement to a 90-degree arc of roller) When cement has dried bevel edge of shade by sanding to fair with roller surface.
- (9) Install aluminum tape on stiffener
- (10) Install window shade assembly.





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SIDEWALL LINING AND INSULATION - MAINTENANCE PRACTICES

1. General

- A. It may be necessary or desirable to remove passenger seats before attempting to dismantle sidewall lining and insulation.
- B. Each air exit grille may be removed independently from the sidewall lining. Access to the air grille retaining screws is gained by removing the gap covers at each exit grille joint.

2. Special Tools and Equipment

- A. Interior Trim Remover Assembly - F70033 or equivalent, for removing snap-on trim without marring or tearing vinyl covering.

3. Removal/Installation Sidewall Lining (Typical)

A. Remove sidewall Lining - Typical

- (1) Remove top trim molding. (See figure 201.)

NOTE: Top trim molding is continuous for three consecutive bays.

- (2) Remove window panel side trim on either side of window panel.

- (a) Loosen screw on latch plate, turn latch plate sufficiently to clear tab on side trim.

- (b) Snap trim strip loose at bottom, using special tool.

- (c) Lift trim strip to disengage lower tab from floating trim.

- (3) Disengage retainer fasteners and remove window panel retainer on either side of panel.

NOTE. Fasteners are quick-release type and are disengaged by rotating through one-quarter turn.

- (4) Remove window panel by working upward to disengage lower edge from groove of dado panel floating trim. (See figure 202.)

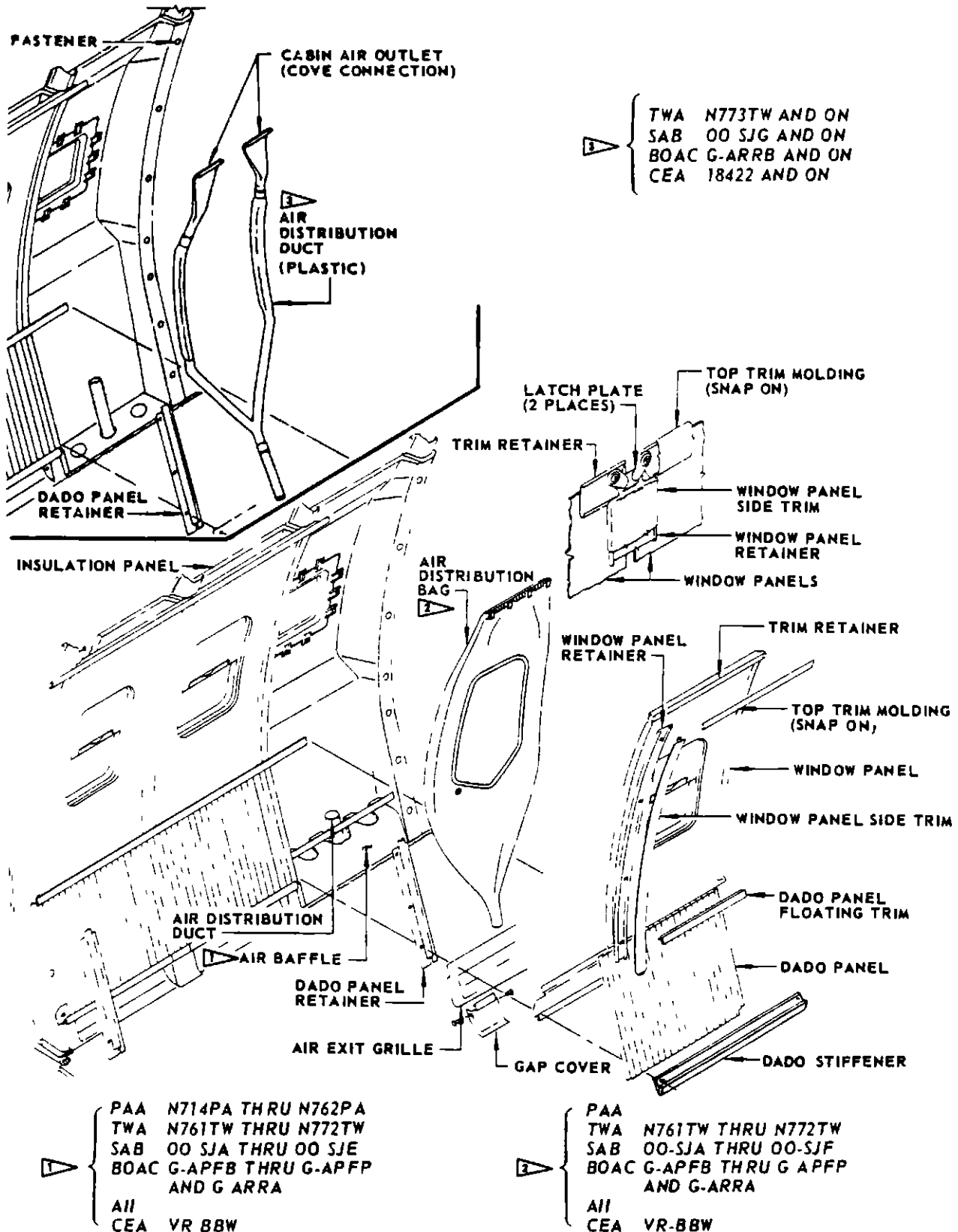
- (5) When three consecutive window panels have been removed, remove dado panel floating trim.

- (6) Remove dado panel by sliding upward to disengage lower edge from groove in air return grille, and flexing with care to disengage side edges from dado panel retainers.

- (7) Disengage dado panel retainer fasteners and remove retainer.

NOTE: Fasteners are quick-release type and require one-quarter turn to disengage.

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Typical Passenger Cabin Sidewall
Figure 201

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- (8) Remove gap covers from either side of air return grille by removing two retaining screws. (See figure 201.)
- (9) Remove air exit grilles as required.
- (10) Remove screws in lower edge of closure panel and remove panel by sliding upward to clear angle on ceiling side panel.

B. Install Sidewall Lining

NOTE. The quick-release fasteners used on the sidewall are of three different sizes with the size designation stamped on the head of the fastener. The number on the lower edge of the fastener head designates length. The length designations are 18, 20 and 22 and it is important that the proper size be used in the correct location.

- (1) Install closure panel by sliding hooked edge over angle on ceiling side panel. Attach lower edge of panel to hatrack with screws.
- (2) Deleted
- (3) Position two adjacent air exit grilles simultaneously with the adjoining dado panel retainer. Engage retainer quick-release fasteners.

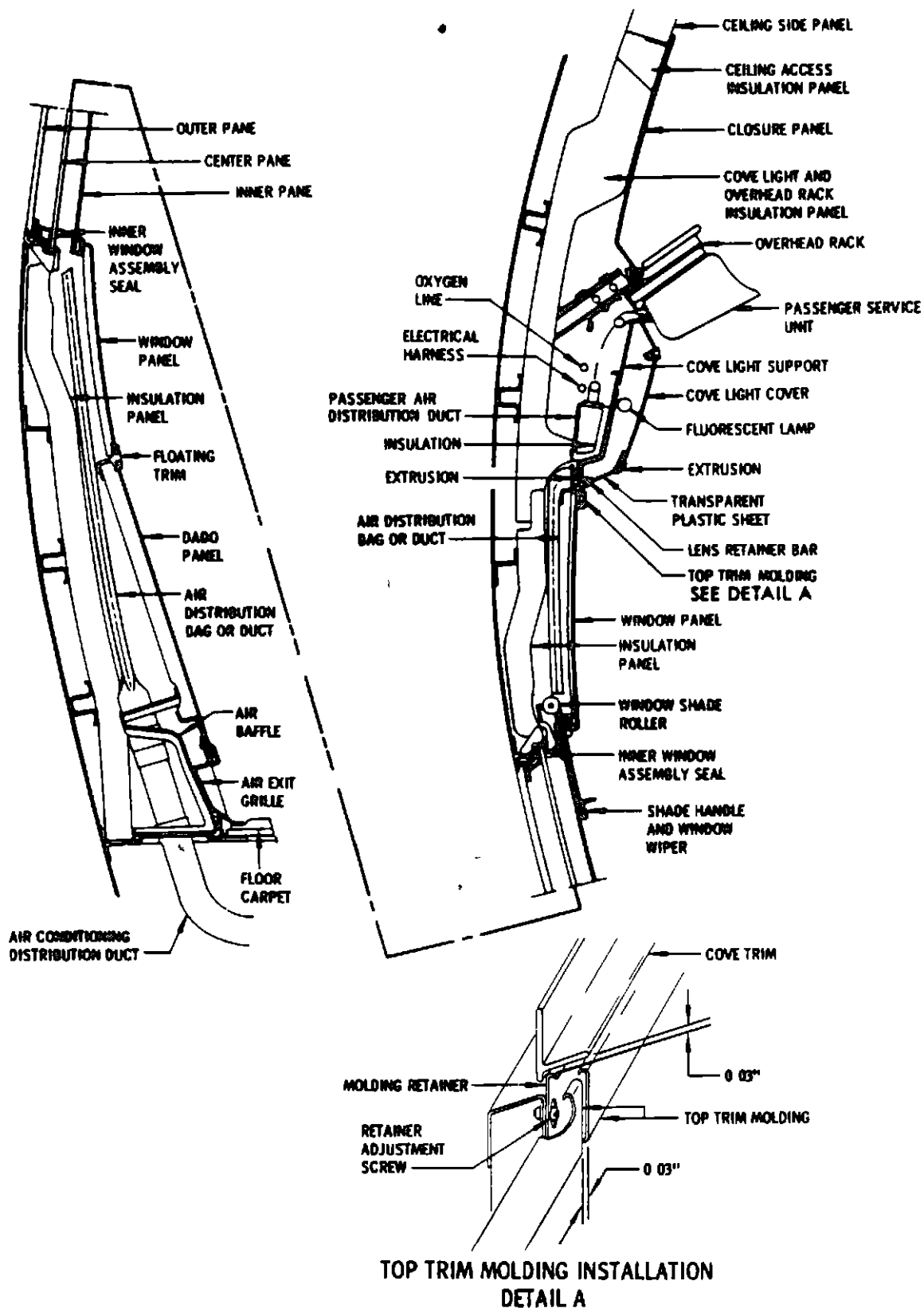
NOTE. The lower retainer fastener is common to both air return grille stiffeners and the dado panel retainer: use number 22 fastener for this location and number 18 for remaining locations.

- (4) Position air grille gap covers and install retaining screws.
- (5) Install dado panel by sliding edges into grooves in the dado panel retainers and working panel downward into groove in air exit grille.
- (6) When dado panels are in position in three consecutive bays, install dado panel floating trim.
- (7) Engage lower edge of window panel in groove of dado panel floating trim and push panel into proper location.

NOTE. Check that seal on window panel reveal seats smoothly on center window pane. (See figure 202.)

- (8) Position window panel retainer and engage quick-release fasteners.
- (9) Press on window panel side trim and install latch plates.

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**TOP TRIM MOLDING INSTALLATION
DETAIL A**

Passenger Cabin Sidewall Installation
Figure 202

- (10) Install top trim molding when window panels have been installed in three consecutive bays.
 - (a) Check that trim retainer strip has 0.03 inch clearance from cove trim. (See detail A, figure 202.)
 - (b) Install top trim molding. Trim sections must have 0.03 inch gap at all trim section joints. (See detail A, figure 202.)

NOTE: Use wood block approximately 3/4 x 1 x 5 inches to apply pressure for trim snap on action. Do not use fingers or hands to snap on trim. Localized pressure tends to deform trim strip.

4. Removal/Installation Entry Door Sidewall Lining

A. Remove Entry Doorway Sidewall Lining

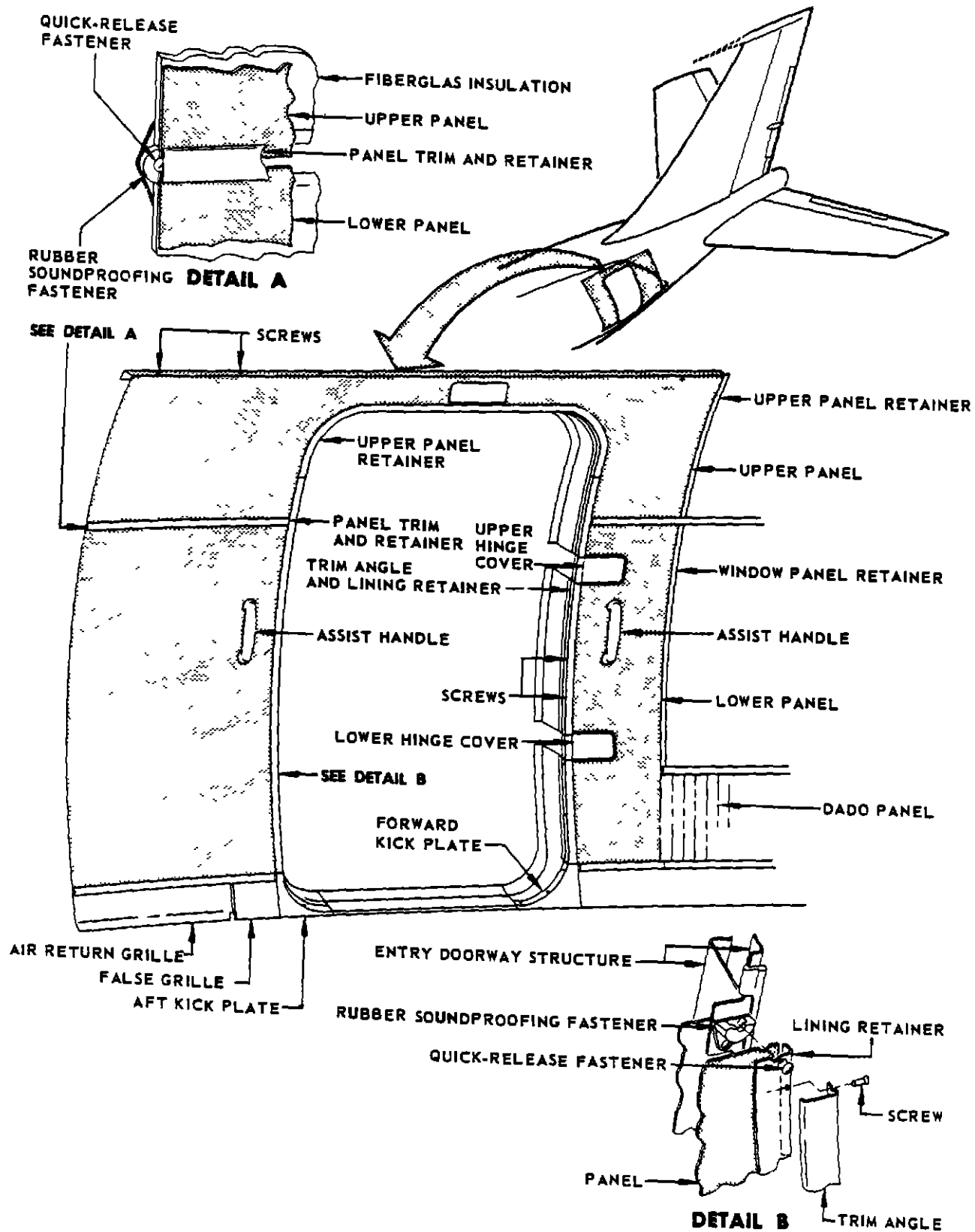
- (1) These are general instructions for removal of sidewall lining in the vicinity of forward and aft entry doors. (See figure 203.)
- (2) Remove assist handles.

NOTE: The forward assist handle at the forward doorway is attached to the bulkhead and need not be removed.

- (3) Remove screws that attach trim angle and remove trim angle.
- (4) Remove lining retainers. (See detail B, figure 203.)

NOTE: Lining retainers are attached with quick-release fasteners which require one-quarter turn to disengage.

- (5) Remove forward and aft kick plates.
- (6) Remove panel trim and retainer. (See detail A, figure 203.)
- (7) Remove upper panel retainer.
- (8) Remove screws along upper edge of upper panel.
- (9) Remove "EXIT" sign.
- (10) Remove upper panel.
- (11) Remove window panel retainer.
- (12) Remove lower panel.
- (13) Remove false grille.



B. Install Entry Doorway Sidewall Lining

- (1) These are general instructions for installation of sidewall lining in the vicinity of forward and aft entry doors. (See figure 203.)
- (2) Install false grille.
- (3) Install lower panel.
- (4) Install window panel retainer.
- (5) Install upper panel.
- (6) Install "EXIT" sign.
- (7) Install screws along upper edge of upper panel.
- (8) Install upper panel retainer.
- (9) Install panel trim and retainer. (See detail A, figure 203.)
- (10) Install forward and aft kick plates.
- (11) Install lining retainers. (See detail B, figure 203.)

NOTE Lining retainers are attached with quick-release fasteners, which require one-quarter turn to engage.

- (12) Install trim angle.
- (13) Install assist handles.

5 Removal/Installation Sidewall Insulation (Typical)

A. Remove Sidewall Insulation

- (1) General
 - (a) Removal of all or any part of the sidewall insulation may be accomplished. However, due to variety of installation methods and lack of a typical example, only general instructions are given.
- (2) Removal of one or more components of sidewall lining will be required in order to gain access to any particular section of sidewall insulation.

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- (3) It will be necessary to remove the air distribution bag or duct for access to insulation panels. See Chapter 21, "Air Distribution System" for bag or duct removal and installation. It may also be necessary to remove certain equipment that is installed by attachments that extend through the insulation panels.
- (4) Remove joint tape and lining retainers as required.
- (5) When all obstructions have been removed, insulation panels may be removed by pulling them free of the double-sided adhesive tape which is used, in some places, to retain them against the airplane structure.
- (6) Mark insulation components as they are removed so that they may be located properly when reinstalled.

B. Install Sidewall Insulation

- (1) General
 - (a) Installation of all or part of the sidewall insulation may be accomplished according to the following general instructions.
- (2) Position insulation panels in proper location on sidewall.

NOTE When installing insulation panels around windows it is necessary that the soft sponge rubber seal around the window cutout in the insulation panel be compressed against the window reveal and retainer brackets to form an air seal.
- (3) Replace or apply double-sided adhesive tape as required to hold insulation panels in place.
- (4) Install lining retainers where applicable.
- (5) All butt joints, overlapping joints, gaps between adjacent insulation panels, and between insulation panels and the airplane structure are to be taped closed.
- (6) Install air distribution bag or duct and other equipment removed for removing sidewall insulation. See Chapter 21, "Air Distribution System" for bag or duct removal and installation.
- (7) Check to insure that all insulation components are in proper places so as not to interfere with sidewall lining or other equipment installed on the sidewall.



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6. Approved Repairs Sidewall Lining and Insulation

A. General

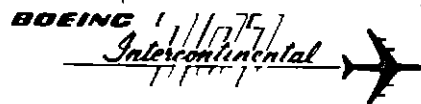
- (1) Damaged insulation panels may be patched by cementing a piece of Mylar (preferred) or Nylon (optional) covering material over the damaged area. Small tears may be repaired with Mylar adhesive tape. Small cutouts, holes or cracks may be sealed with liquid vinyl sealant. If area to be sealed is 25% or more of the panel area, the panel should be replaced. (Refer to 25-19-0, Insulation Blanket and Molded Insulation Panel - Maintenance Practices.)
- (2) The procedure for repair of damaged Marvibond (vinyl-aluminum laminate) panels described here applies specifically to window panels which have been scratched, dented or pierced.
- (3) Other vinyl-covered components and other materials such as Boltaron, Royalite, and Cyclolac, which are used as decorative surfaces may be repaired similar to Marvibond except that the Mylar film used must be embossed with the appropriate texture and the proper finish color must be used.
- (4) For repair of window pane, see Passenger Cabin Windows, Chapter 56.
- (5) More extensive repair procedures for the interior lining are described in 25-10-81, Interior Materials.

B. Special Tools

- (1) Rigid squeegee, approximately 3/16 by 3 by 4 inches (phenolic laminate or equivalent).

C. Materials

- (1) Epibond 126 resin
- (2) HN 9812 hardener



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EQUIPMENT AND FURNISHINGS
Sidewall Lining and Insulation
Maintenance Practices

- (3) Talc (Precipitated calcium carbonate)
- (4) Lubricant (vaseline or light oil)
- (5) Mylar embossing film (0.001 - inch thickness) embossed with "haircell" texture same as the Marvibond panel.
- (6) Vinyl ink, BAC White No. 777
- (7) Vinyl ink, BAC Green No. 429

D Repair Window Panel

- (1) Clean vinyl surface
- (2) Prepare resin by mixing thoroughly 100 parts by weight (PBW of Epibond 126 and 65 PBW of HN9812 hardener, then adding 165 PBW of talc. (Add talc slowly, folding in rather than beating
- (3) Apply sufficient resin to fill damaged area.
- (4) Place Mylar embossing film over resin with dull side of Mylar down
- (5) Apply lubricant to upper surface of Mylar
- (6) Sweep the resin to the desired contour with the squeegee, working from the center outward
- (7) Allow resin to cure eight hours at 70°F or two hours at 130°F
- (8) Remove Mylar embossing film
- (9) Restore finish color with vinyl ink using brush, pen, air brush and/or silk screen as required
- (10) For repair of window panel, see "Passenger Cabin Windows", Chapter 56

END

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CEILING LINING AND INSULATION - MAINTENANCE PRACTICES

1. Removal/Installation Ceiling Lining and Insulation (Turbojet Airplanes)

A. Remove Ceiling Lining and Insulation

- (1) Remove closure panel to gain access to ceiling side panel support mounts.
- (2) Remove spring pin and support pin at each frame.
- (3) Lower side panel until hook is disengaged from slot in center panel. (See figure 201.)
- (4) Remove spring pins and support pins along either side of ceiling center panel and remove panel.

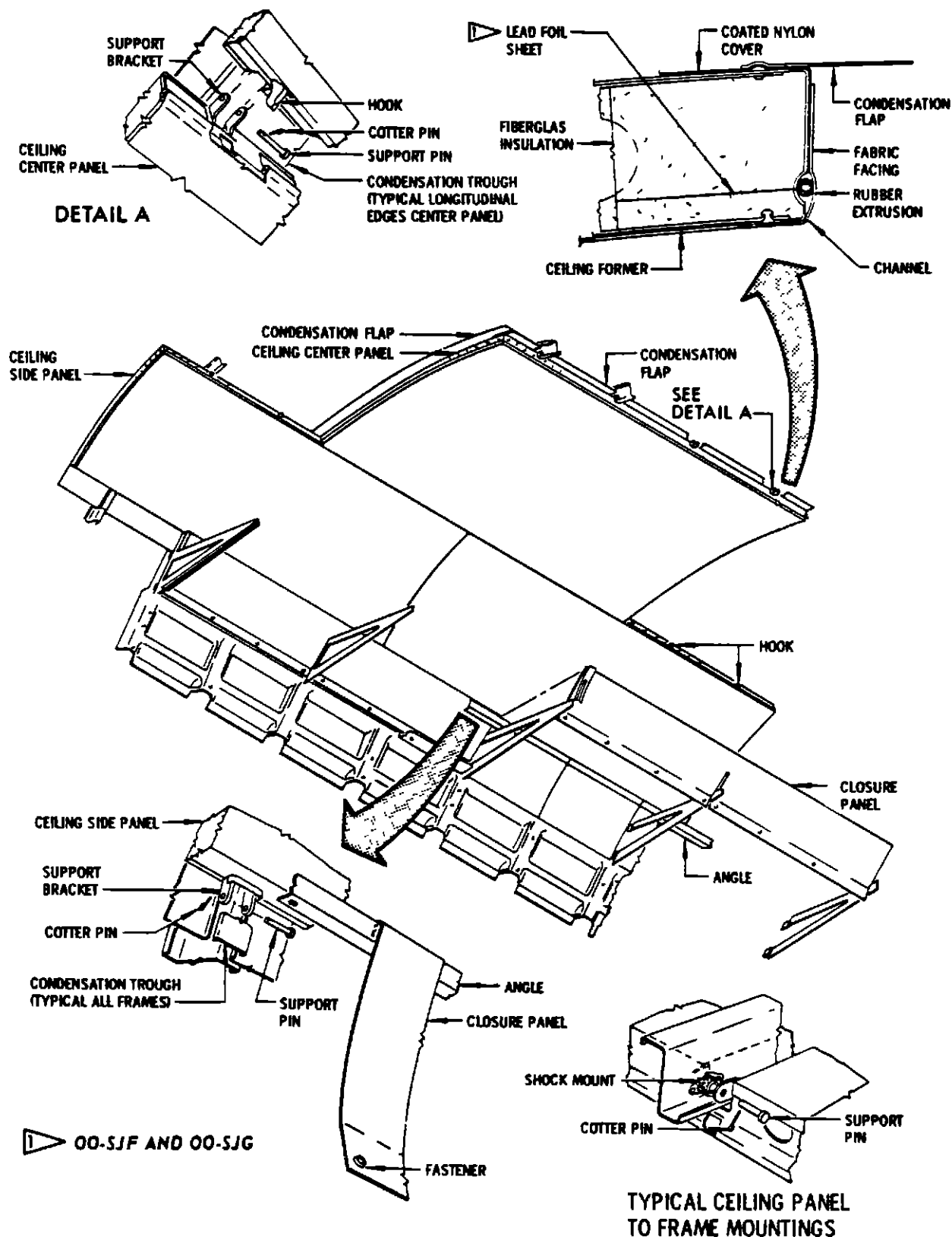
B. Install Ceiling Lining and Insulation

- (1) Position ceiling center panel and install support pins and spring pins.
- (2) Engage hooks on ceiling side panel in slots of center panel and raise side panel to proper position.
- (3) Install support pins and spring pins.
- (4) Install closure panel.

2. Removal/Installation Dome Light Ceiling Lining and Insulation (Turbojet Airplanes)

A. Remove Dome Light Ceiling Lining and Insulation

- (1) Remove closure panel and ceiling side panel.
- (2) Remove dome light. See Chapter 33, "Passenger Cabin Lighting."
- (3) Remove ceiling center panel.
- (4) Remove lining retainer studs.
- (5) Remove insulation blanket by pulling loose double-sided adhesive tape.



Passenger Cabin Ceiling Panels Installation
Figure 201

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Feb 15/65

B. Install Dome Light Ceiling Lining and Insulation

- (1) Install dome light insulation blanket so that it will lay on top of and be supported by the dome light and the ceiling panels
- (2) Install lining retainer studs and double sided adhesive tape to position and hold insulation blanket when ceiling panels and dome lights are not installed.
- (3) Install ceiling center panel.
- (4) Install dome light. (See Chapter 33, "Passenger Cabin Lighting.")
- (5) Install ceiling side panel and closure panel.

2. Removal/Installation Ceiling Panel (Cargo Airplanes)

NOTE· This procedure applies to any one of the series of curved fiberglass honeycomb panels installed either side of the retaining extrusion along the center of the cabin ceiling. It does not apply to the thin molded fiberglass panels which line the ceiling in the areas above the forward and aft removable lowered ceiling.

A. Remove Ceiling Panel (Typical)

- (1) Remove equipment and furnishings which interfere with access to ceiling panels.

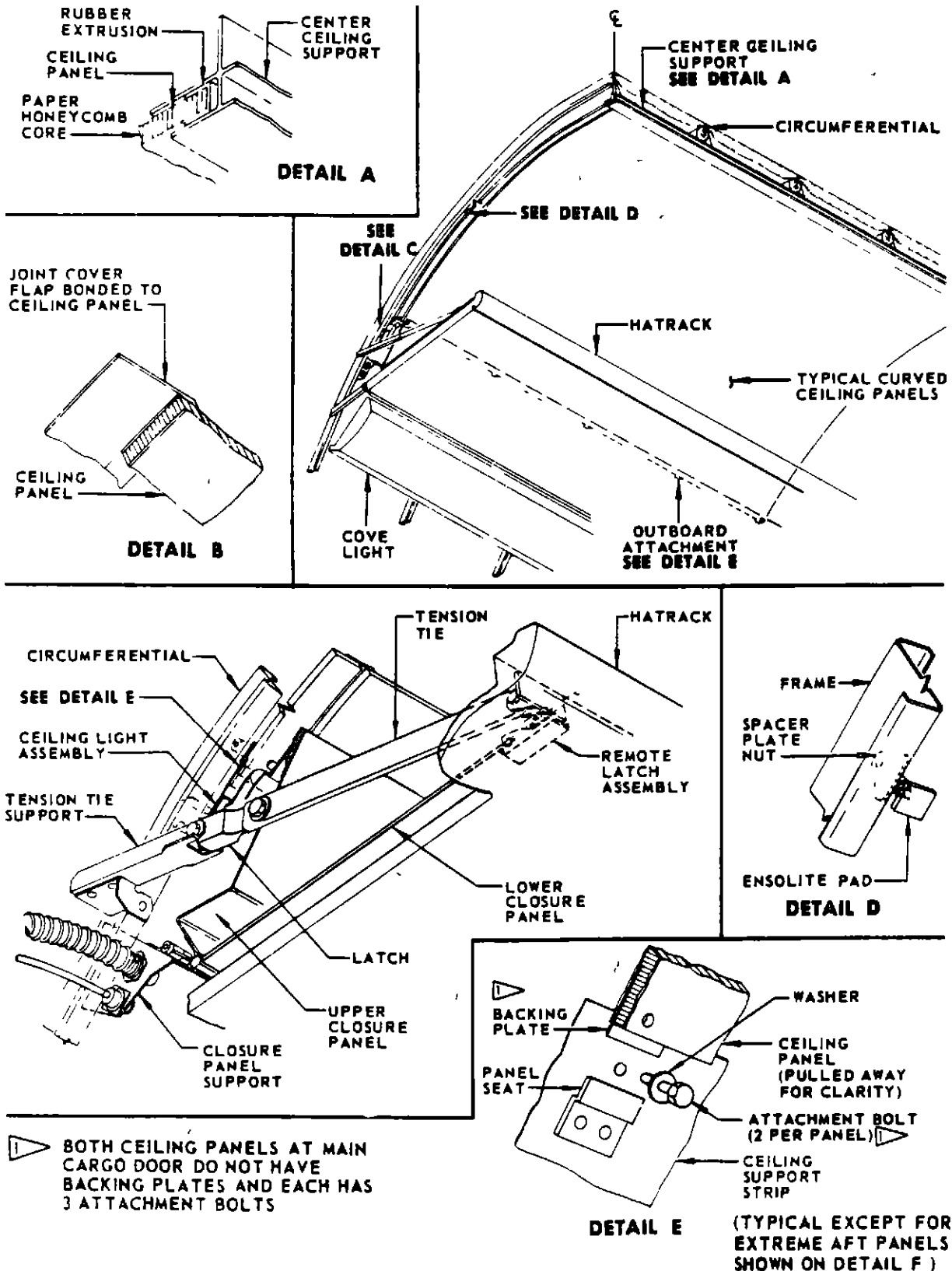
NOTE. In most cases this consists only of lifting the appropriate sections of upper closure panels (above the hatracks) clear of their attachments and lying them down out of the way.

In some cases it is necessary to remove the forward, center or aft lowered ceiling. (Refer to 25-10-26 "Forward Lowered Ceiling", 25-10-24, "Center Lowered Ceiling"; or to 25-10-25, "Aft Lowered Ceiling.")

At the extreme aft end of the cabin, access to the left ceiling panel also requires removal of the forward partition of the No. 2 aft left coat closet, and access to the adjacent panel on the right side also requires removal of Lavatory "E" compartment and the No. 4 galley. (Refer to 25-13-0, "Passenger Cabin Partitions and Coat Closets"; 25-17-43, "Galley Units"; and 25-18-42, "Lavatory Compartments.")

- (2) Remove bolts attaching outboard edge of ceiling panel to overhead structure. (See figure 202.)

NOTE· The outboard edge of the extreme aft left panel is secured by two screws, and that of the opposite (right) panel by six screws.



Ceiling Panel Installation
Figure 202 (Sheet 1)

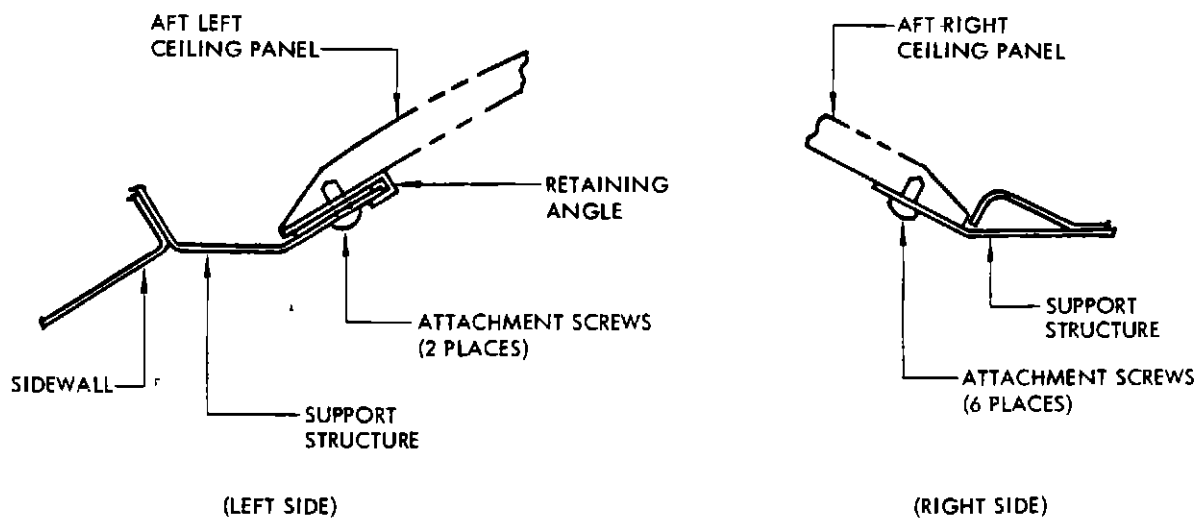


MAINTENANCE MANUAL

- (3) Push ceiling panel upwards (toward center of cabin ceiling) to disengage its outboard attachments; allow outboard edge of panel to drop inboard and disengage panel from its center (inboard) supporting extrusion by withdrawing it downward (outboard).

NOTE. The two extreme aft ceiling panels should be disengaged by lifting their outboard edges up and withdrawing their inboard edges from the central extrusion; the panels can then be removed by moving them inboard from their outboard edges. Certain of the aft ceiling panels incorporate floodlights and air conditioning diffusers which must be disconnected before the panels are removed.

The two ceiling panels across the hinge of the main cargo door do not need to be pushed inboard and upwards to disengage their outboard attachments.



DETAIL F

OUTBOARD ATTACHMENT OF EXTREME
AFT PAIR OF CURVED CEILING PANELS

EFFECTIVITY

Passenger/Cargo Convertible Airplanes



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B. Install Ceiling Panel

- (1) Raise panel to ceiling level, insert its inboard edge into slot of center (inboard) supporting extrusion, raise its outboard (lower) edge, and allow panel to move slightly down into engagement with its outboard attachments. (On both extreme aft ceiling panels, engage outboard edges first, then engage inboard edges in central extrusion.)

NOTE: Floodlights and air conditioning diffusers should be reconnected on certain aft ceiling panels.

On all ceiling panels, the joint cover flap along one end of the panel being installed must be tucked above end of adjacent panel.

- (2) Install attachment bolts and washers securing outboard edge. (Aft end panels secured by screws; refer to 2.A.(2).)
- (3) Install equipment and furnishings which were removed for access. (Refer to 2.A.(1).)

3. Approved Repairs Ceiling Lining and Insulation

A. Repair Ceiling Panel

- (1) The coated nylon cover on the top surface of the ceiling panel may be patched by cementing a piece of coated nylon material in place.
- (2) Small punctures may be repaired with tape or with liquid vinyl sealant (surface coating type, Angier Products, or equivalent).
- (3) If area to be sealed is 25% or more of the blanket area, the blanket should be replaced. (Refer to 25-19-0, Insulation Blanket and Molded Insulation Panel - Maintenance Practices.)
- (4) More extensive repair procedures for the interior lining are described in 25-10-81, Interior Materials.

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CENTER LOWERED CEILING - MAINTENANCE PRACTICES

EFFECTIVITY

CARGO AIRPLANES

1. Removal/Installation Center Lowered Ceiling

A. Remove Center Lowered Ceiling (See figure 201.)

- (1) Unlatch and open doors of all four sections of life raft compartment. Remove all four life rafts.
- (2) Uncouple electrical connection.
- (3) Withdraw safety pins retaining two vertical locking pins from fittings inside top of compartment. (One each side.) Remove locking pins.
- (4) Remove life raft compartment by sliding aft until it is free to drop clear of its attachments.
- (5) Install covers on all seven holes in curved ceiling panels to conceal life raft compartment attachments and connections.

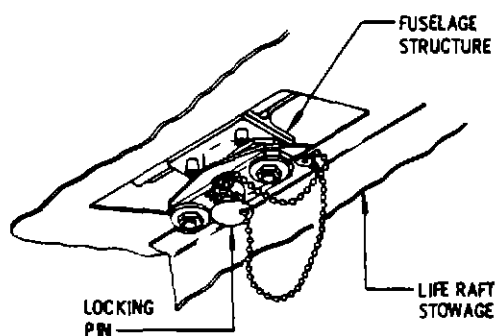
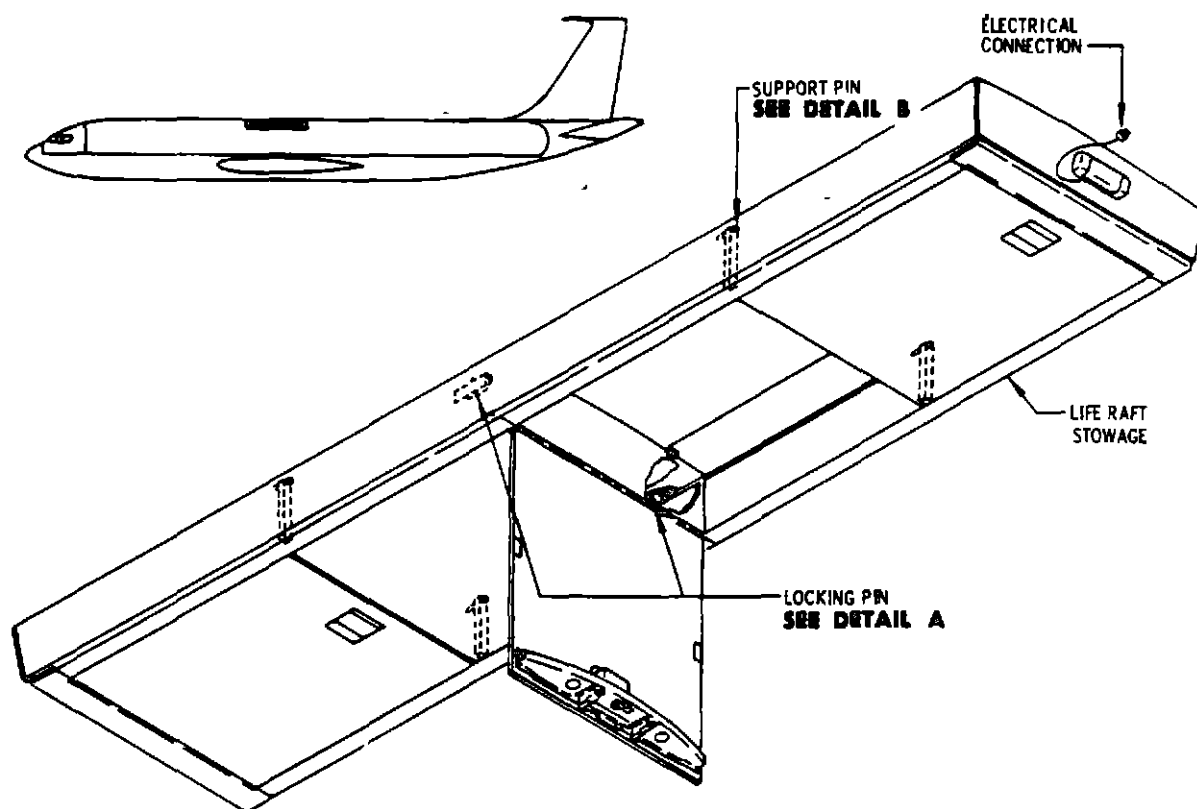
B. Install Center Lowered Ceiling

- (1) Remove covers from all seven holes in upper ceiling at forward location.
- (2) Carry life raft stowage compartment into airplane. Open all four of its stowage doors (taking care to prevent doors from hitting floor and so being damaged) and raise compartment to ceiling level. Slide compartment forward to engage its support pins in fuselage structure.

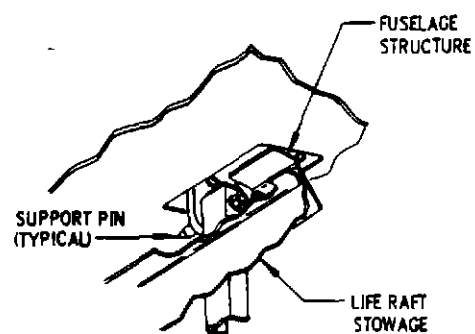
NOTE: A pair of small studs in the curved ceiling panels may be used to locate the forward end of the center life raft compartment prior to sliding it forward.

- (3) Install two vertical locking pins to secure compartment in position. (Locking pins are inside compartment, one each side.) Install safety pin to each locking pin.
- (4) Couple electrical connection at aft end.
- (5) Install all four life rafts and close stowage doors.

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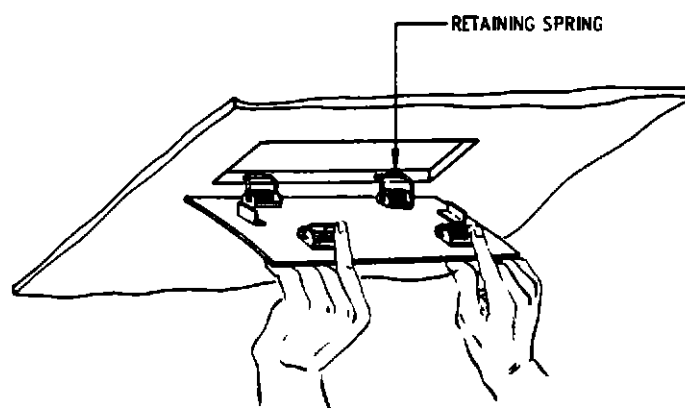
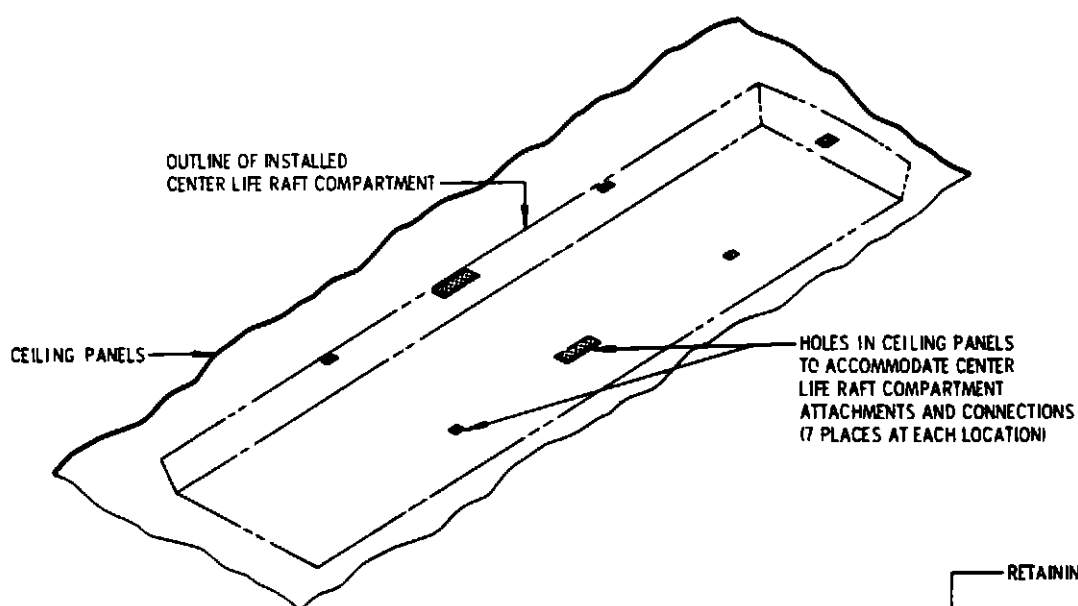
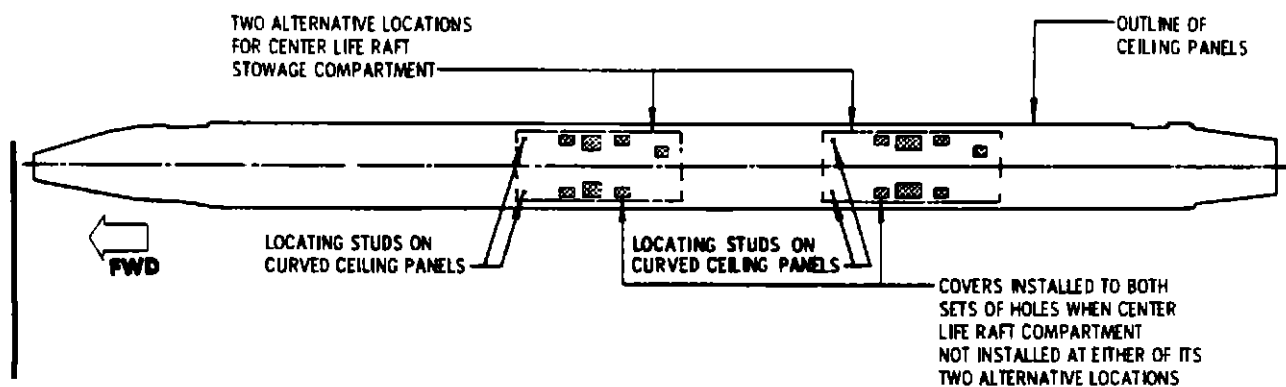
DETAIL A



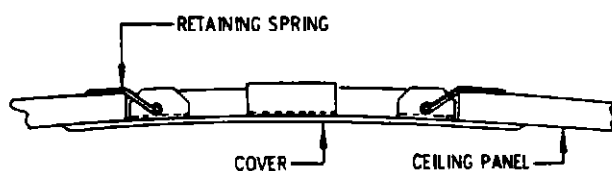
DETAIL B

Center Lowered Ceiling Installation
 Figure 201 (Sheet 1 of 2)

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TYPICAL COVER BEING INSTALLED



SECTION THROUGH TYPICAL INSTALLED COVER

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AFT LOWERED CEILING - MAINTENANCE PRACTICES

EFFECTIVITY

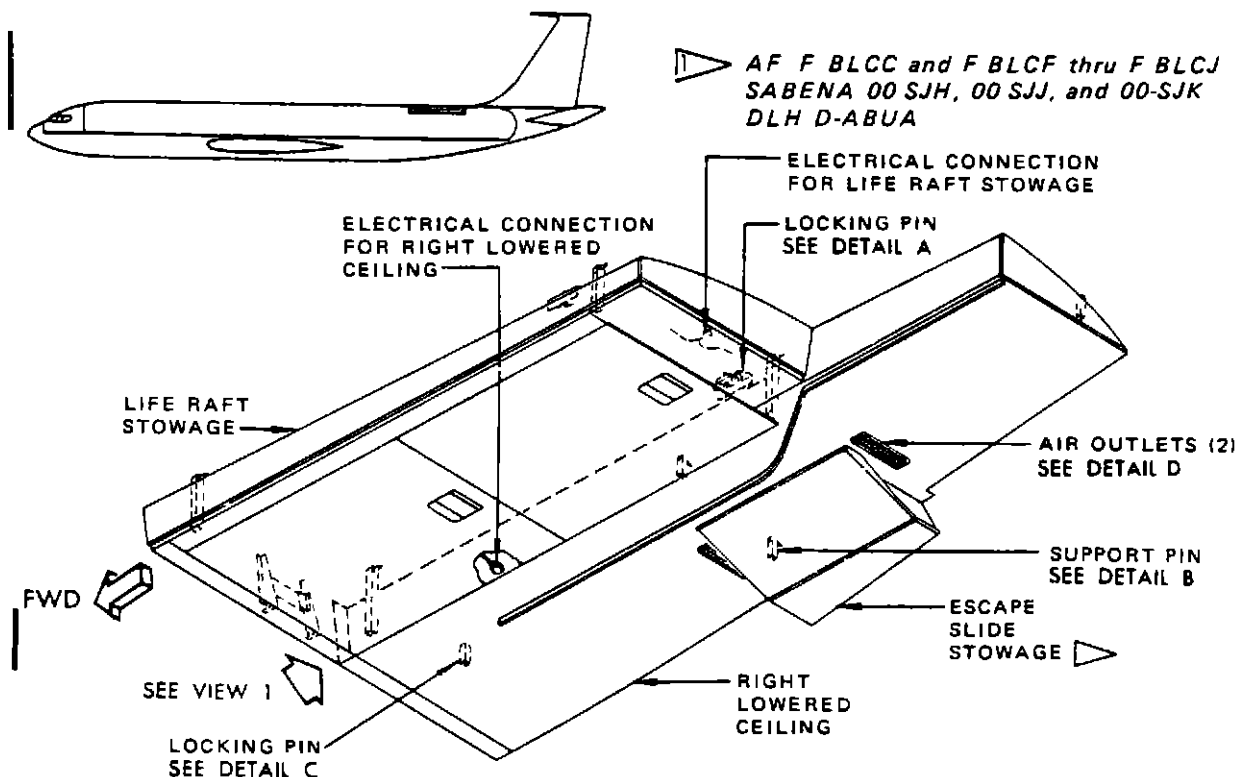
Passenger/Cargo Convertible Airplanes

1. Removal/Installation Aft Lowered Ceiling

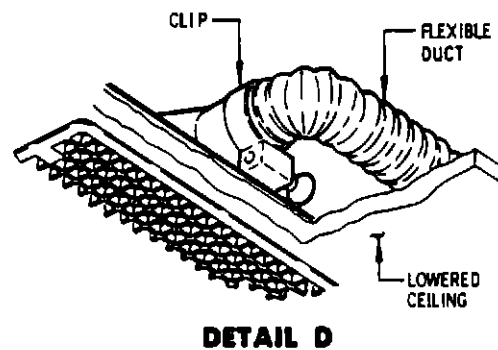
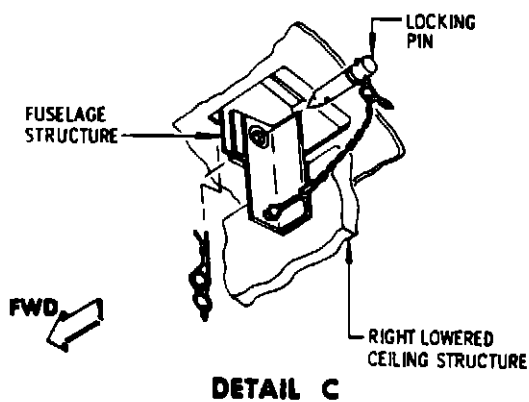
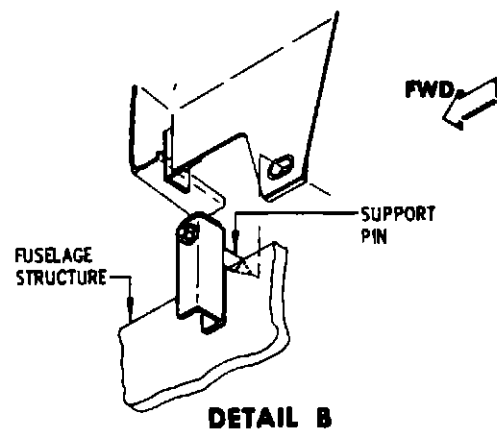
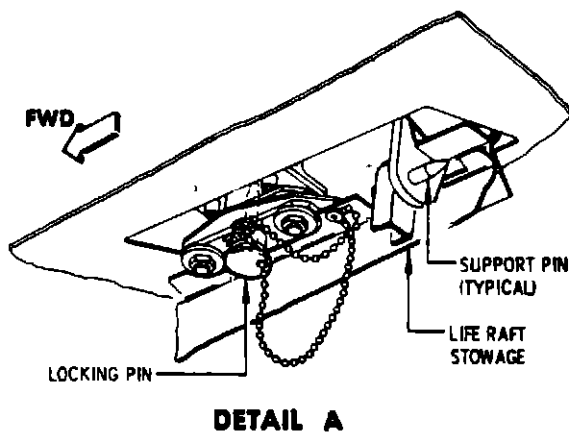
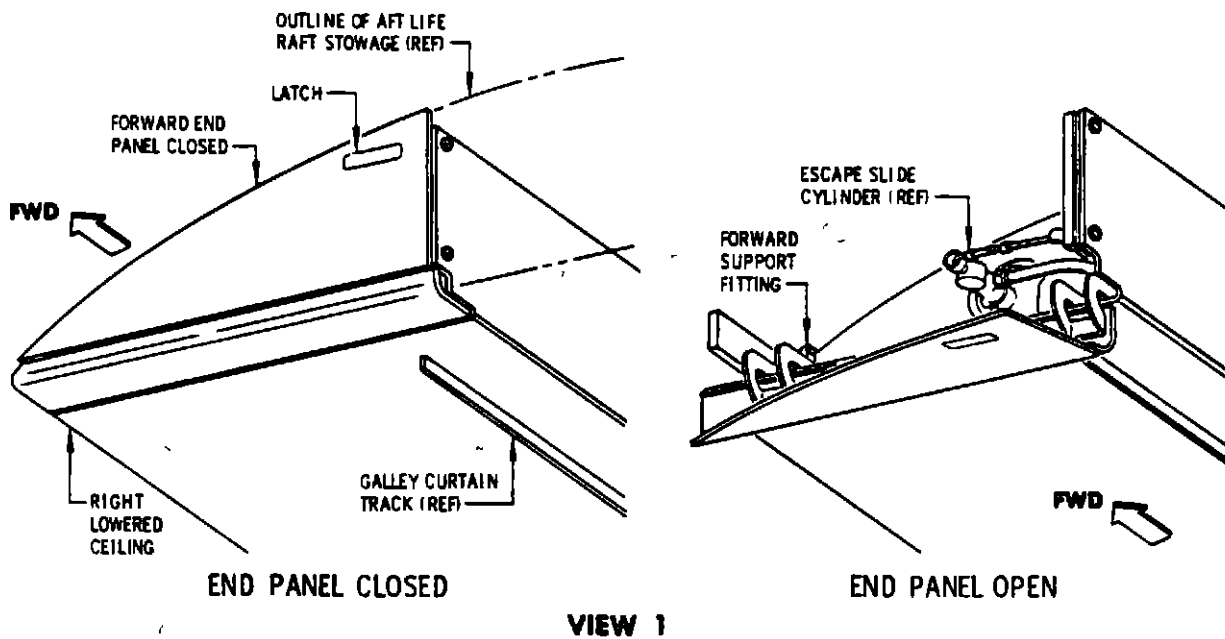
A. Remove Aft Lowered Ceiling (See figure 201.)

NOTE: It is not necessary to remove the escape slide (on applicable airplanes) in order to remove its stowage compartment.

- (1) Unlatch and open both doors of life raft compartment, remove both life rafts.
- (2) Withdraw safety pins retaining two vertical locking pins from fittings inside top of life raft compartment. Remove both locking pins (one each side). Disconnect electrical cable.
- (3) Remove life raft compartment by sliding whole unit forward until it is free to drop clear of its attachments.
- (4) Disconnect electrical lead and both air conditioning ducts above lowered ceiling on right side. (Air conditioning duct clips are secured by thumbscrews.)

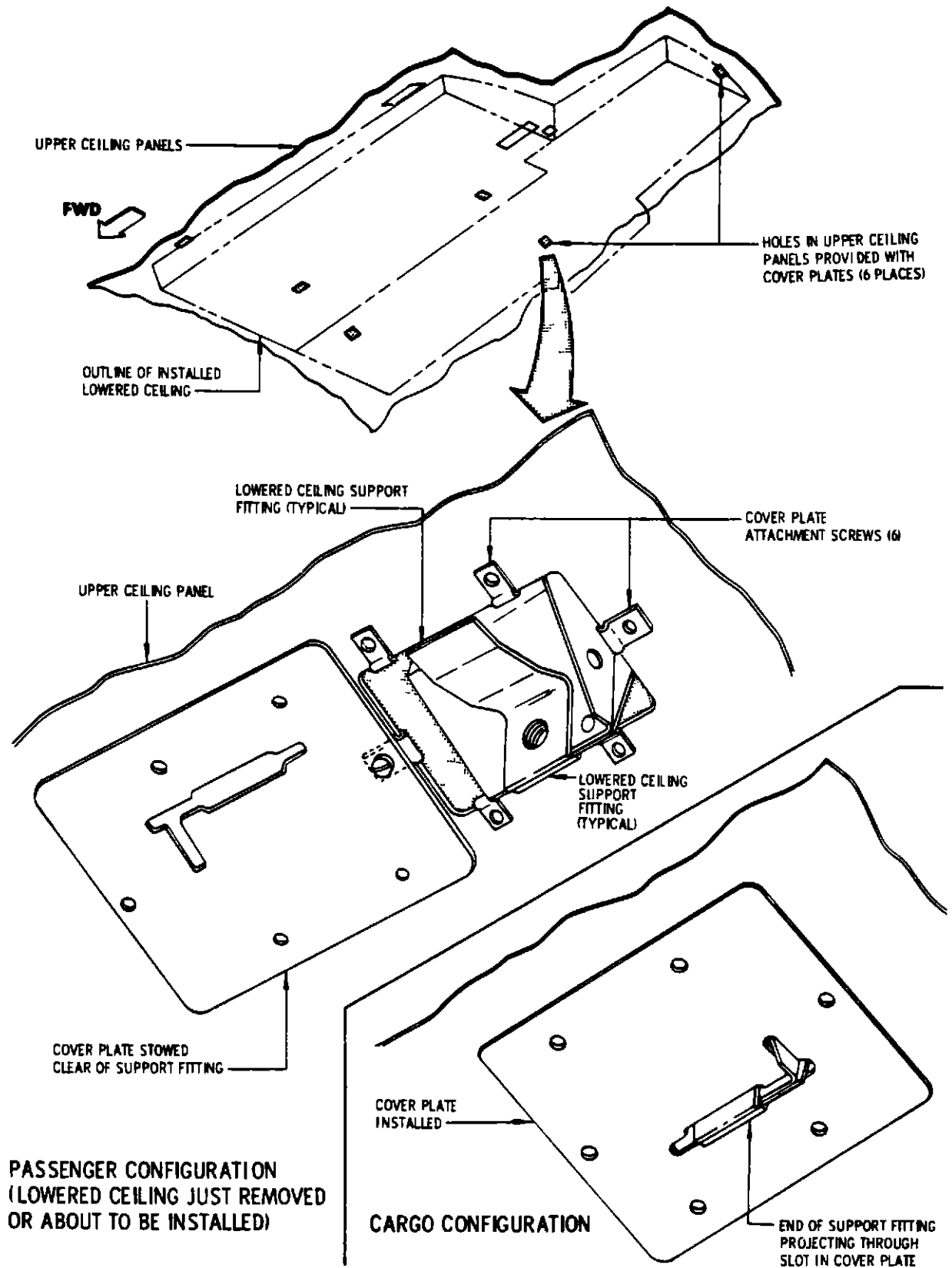


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Aft Lowered Ceiling Installation
Figure 201 (Sheet 2 of 3)

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Aft Lowered Ceiling Installation
Figure 201 (Sheet 3 of 3)

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- (5) Withdraw safety pins retaining two longitudinal locking pins from fittings above lowered ceiling. Remove both locking pins. (One each end of ceiling.)
- (6) Remove lowered ceiling, complete with escape slide stowage, by sliding it inboard until it clears its attachments.
- (7) Install coverplates, where applicable, to certain of the holes in upper ceiling through which lowered ceiling support fittings protrude.

NOTE: Coverplates are stowed adjacent to holes they should cover.

B. Install Aft Lowered Ceiling (See figure 201.)

- (1) Remove and stow coverplates, where applicable, from holes in upper ceiling.
- (2) Carry right lowered ceiling (containing, on applicable airplanes, complete escape slide installation) into airplane. Lift it above galleys, engage its support pins in fuselage structure, slide outboard and engage both longitudinal locking pins to secure ceiling in position. Install safety pin to each locking pin.
- (3) Connect electrical plug and both air conditioning ducts above ceiling. (Air conditioning duct clips are secured by a thumbscrew.)
- (4) Carry life raft stowage compartment into airplane. Open all of its stowage doors (taking care to prevent doors from hitting floor and so being damaged) and raise stowage compartment to ceiling level, alongside but slightly forward of right lowered ceiling. Slide compartment aft to engage its support pins in fuselage structure, and engage two vertical locking pins to secure compartment in position. (Locking pins are inside top of compartment, one each side.) Install safety pin to each locking pin. Connect electrical plug.
- (5) Install life rafts in stowage compartment and close doors.
- (6) Clip curtain to hangers in curtain track on right lowered ceiling, if curtain was not left on track when removed.

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FORWARD LOWERED CEILING - MAINTENANCE PRACTICES

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1 General

- A. The forward lowered ceiling aft of BS 382 is readily removable for conversion purposes and includes a life raft stowage compartment and, on some airplanes, an escape slide compartment.
- B. The forward lowered ceiling forward of BS 382 is permanent in that it is not designed to be readily removable for conversion purposes.

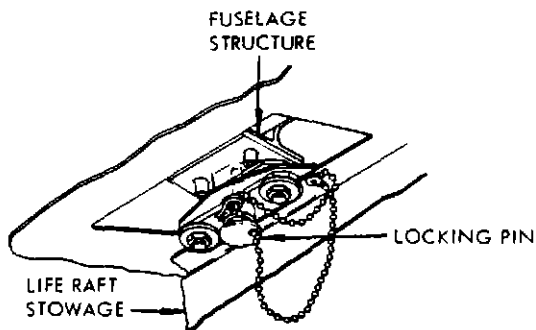
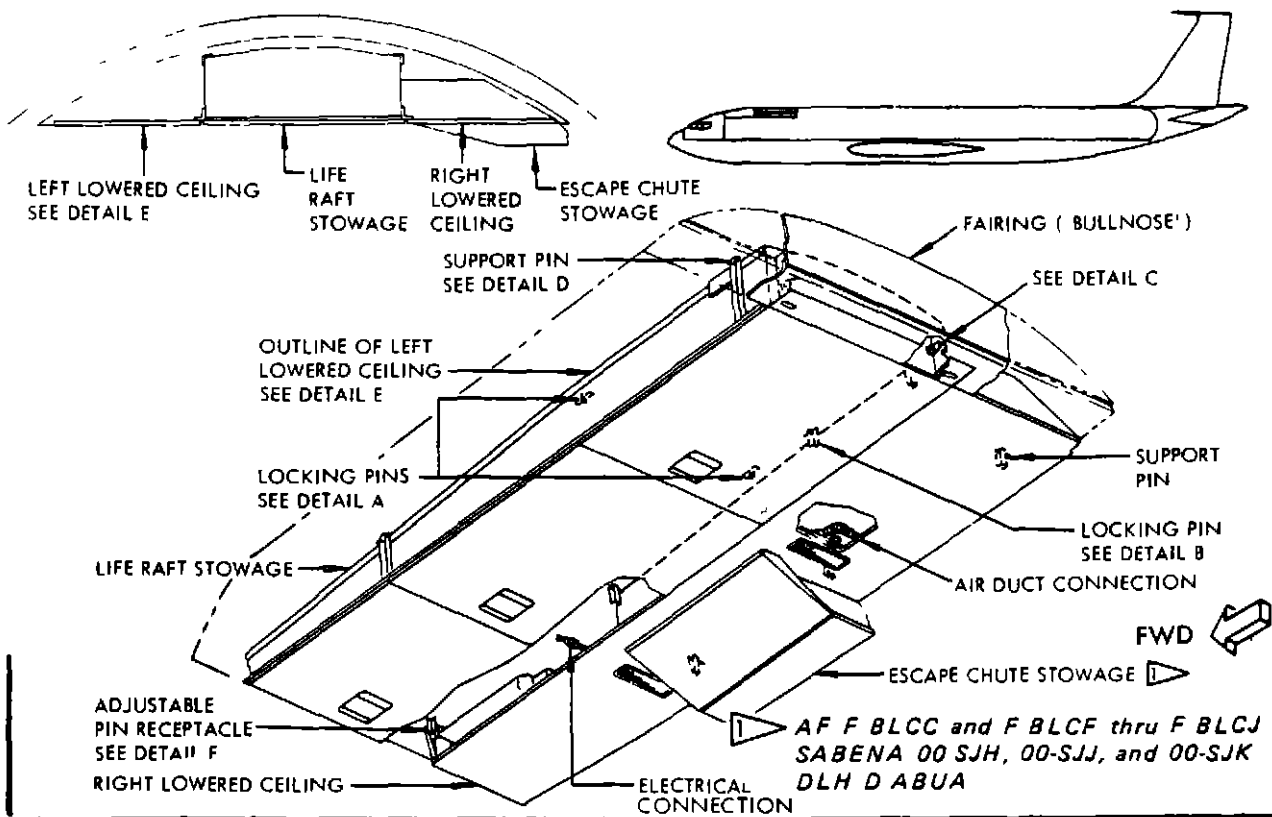
2. Removal/Installation Forward Lowered Ceiling (Aft of BS 382)

- A. Remove Forward Lowered Ceiling (See figure 201.)

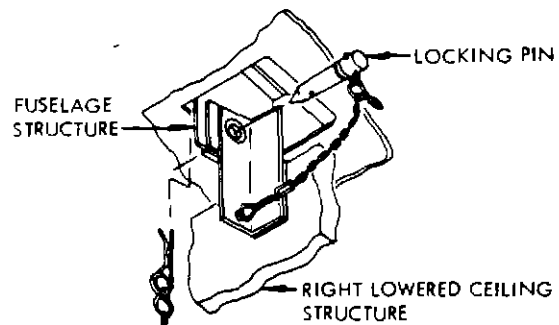
NOTE It is not necessary to remove the escape slide (on applicable airplanes) from its stowage compartment in order to remove the lowered ceiling.

- (1) Remove fairing ("bullnose") across aft end of forward lowered ceiling.
 - (a) Hinge down central transverse access flap along base of fairing.
 - (b) Disconnect electrical plug inside fairing, rotate thumbscrew latches at each end of accessible cavity, swing latches clear of their hooks and slide fairing aft until it is disengaged from lowered ceiling.
- (2) Unlatch and open doors of both sections of life raft compartment. Remove life rafts.
- (3) Place hand under lowered ceiling panel along left side of life raft compartment and release latches retaining inboard edge.
- (4) Lower inboard edge of panel, reach above and uncouple electrical connection, and remove panel by sliding it inboard until its outboard edge is free from its retaining slot in overhead ceiling.
- (5) Withdraw safety pins retaining two locking pins from fittings inside top of life raft compartment. Remove both locking pins (one each side, near aft end).
- (6) Remove life raft compartment by sliding whole unit aft until it is free to drop clear of its attachments.

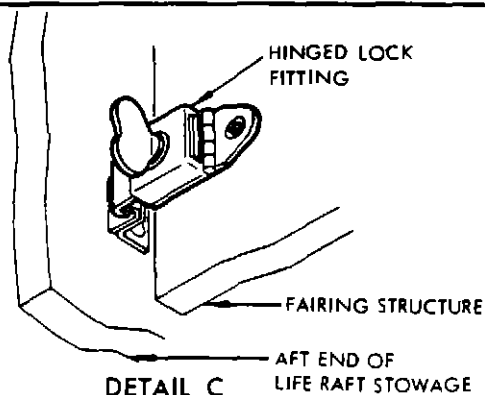
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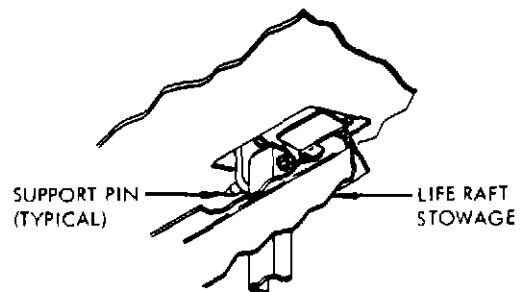
DETAIL A



DETAIL B



DETAIL C

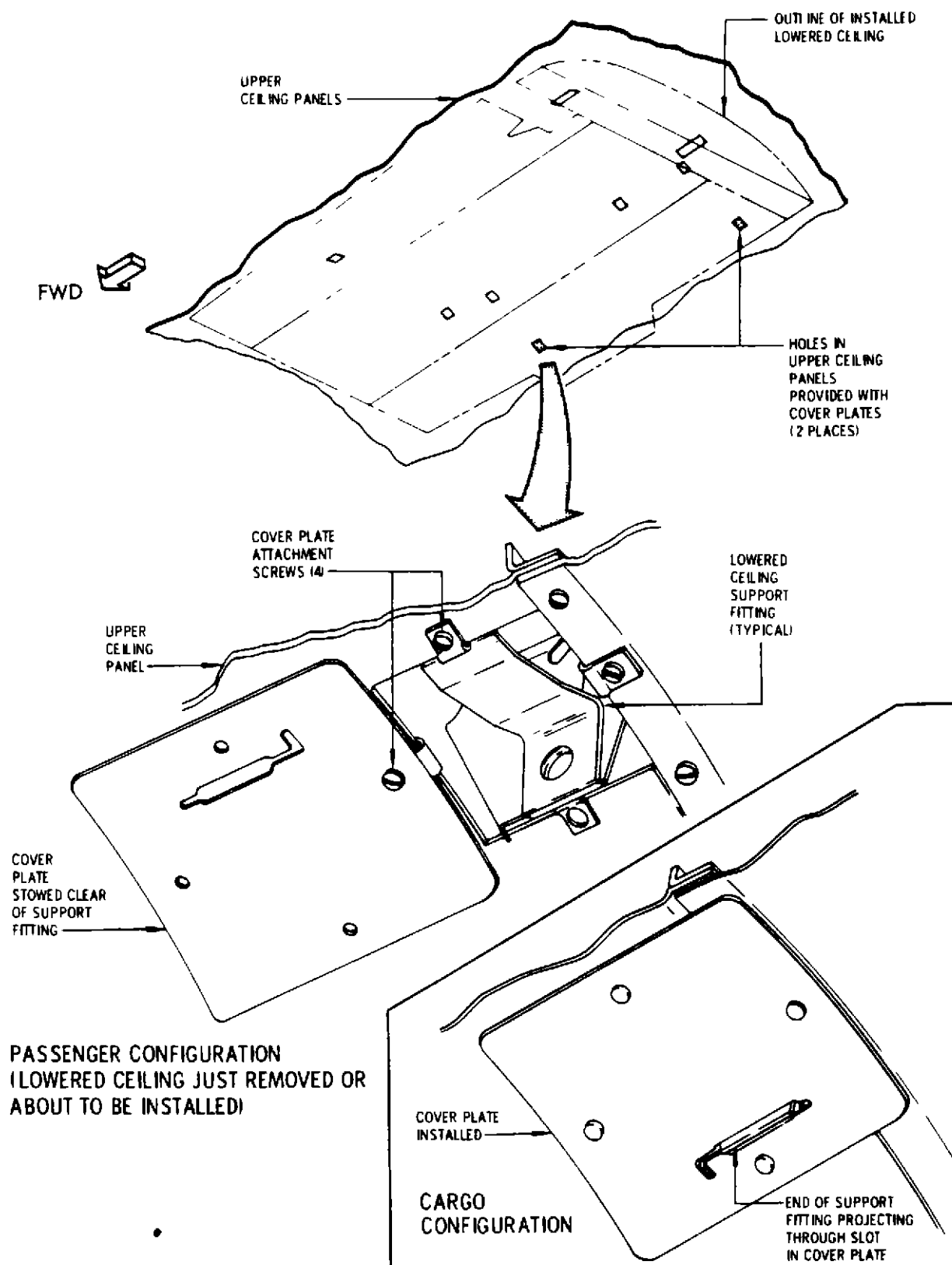


DETAIL D

Forward Lowered Ceiling Installation (Aft of BS 382)
Figure 201 (Sheet 1)

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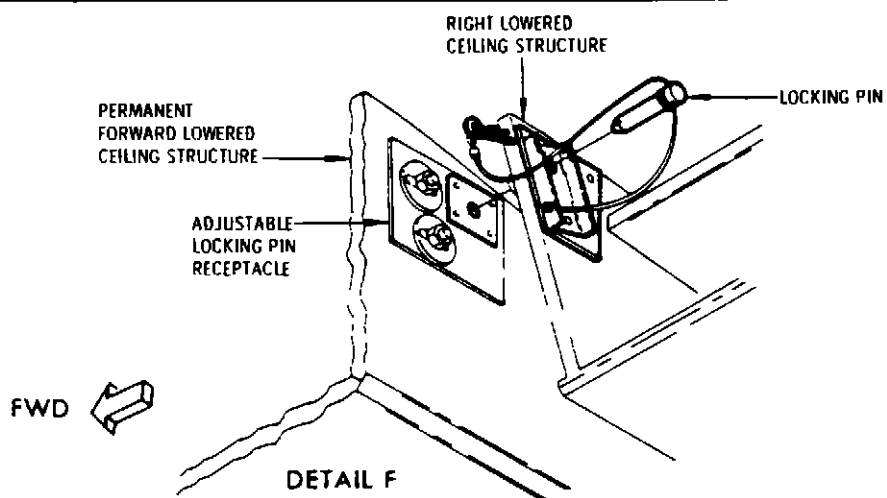
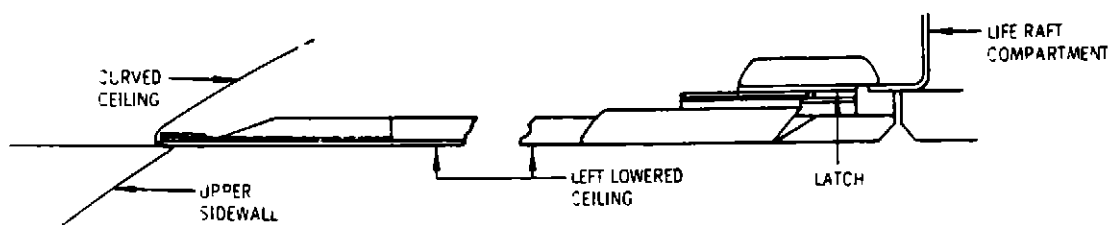
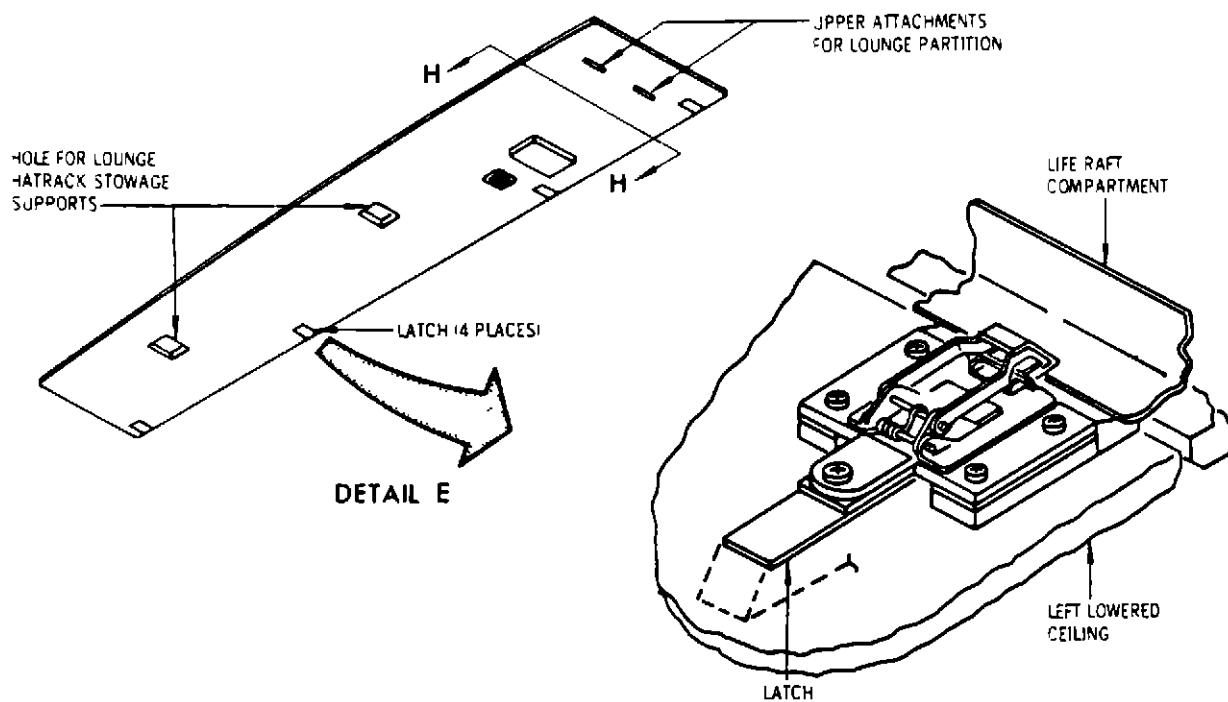


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Forward Lowered Ceiling Installation (Aft of B.S. 382)
Figure 201 (Sheet 2 of 3)

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Forward Lowered Ceiling Installation (Aft of BS 382)
Figure 201 (Sheet 3)



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- (7) Disconnect electrical lead and both air conditioning ducts above lowered ceiling on right side. (Air conditioning duct clips are secured by thumbscrews.)
- (8) Withdraw safety pins retaining two longitudinal locking pins from fittings above lowered ceiling. Remove both locking pins. (One each end of ceiling.)
- (9) Remove lowered ceiling, complete with escape slide stowage, by sliding it inboard until it clears its attachments and the galleys.
- (10) Install cover plates, where applicable, to certain of the holes in upper ceiling panels through which lowered ceiling support fittings protrude.

NOTE Cover plates are stowed adjacent to holes they should cover.

B. Install Forward Lowered Ceiling

- (1) Remove and stow cover plates, where applicable, from holes in upper ceiling.
- (2) Carry right lowered ceiling (containing, on applicable airplanes, complete escape slide installation) into airplane. Lift it above galleys, engage its support pins in fuselage structure, slide outboard and engage both locking pins to secure ceiling in position. Install safety pin through retainer channel and groove in head of locking pin at BS 382. Install safety pin through hole in tapered end of locking pin at BS 460.

NOTE The forward locking pin receptacle may be adjusted laterally for alignment of right lowered ceiling with life raft stowage compartment. After installation of life raft stowage compartment, adjustable receptacle is accessible through life raft stowage doors.

- (3) Connect electrical plug and both air conditioning ducts above lowered ceiling. (Air conditioning duct clips are secured by a thumbscrew.)



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- (4) Carry life raft stowage compartment into airplane. Open its stowage doors (taking care to prevent doors from hitting floor and so being damaged) and raise stowage compartment to ceiling level, alongside but slightly aft of right lowered ceiling. Slide compartment forward to engage its support pins in fuselage structure, and engage two locking pins to secure compartment in position. (Locking pins are inside top of compartment, one each side.) Install safety pin to each locking pin.
- (5) Carry left lowered ceiling into airplane, raise toward ceiling level, tilting its outboard edge up to engage in slot along ceiling structure of fuselage. Push panel outboard into this slot, reach above panel to couple its electrical connection, raise inboard edge and latch to left side of life raft stowage.
- (6) Install life raft in each section of stowage compartment and close each door.
- (7) Carry transverse fairing into airplane, open long access flap in its lower surface, engage two tongues on its forward face with corresponding slots on aft face of lowered ceiling assembly already installed. Slide fairing forward, hinge both of its latches into engagement with their hooks and rotate thumbscrew of each latch to bring fairing up tight against lowered ceiling. Connect electrical lead and close access flap.



MAINTENANCE MANUAL

FLOOR COVERING - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1 General

- A Procedures which follow describe the removal and installation of typical portions of floor covering. For location and identification of each floor covering component refer to 25-15-0, Cabin Accommodations and Conversions. Figure 401 shows typical installation details.

2. Removal/Installation Passenger Cabin Rugs

- A Remove Passenger Cabin Rugs (See figure 401.)

- (1) Slacken screws-securing threshold strips across entries to control cabin and lavatories A, C, D, galleys and at aft entry mat.
- (2) Lift and remove sections of rug, together with their acoustic padding, from forward and aft ends of cabin. Pull rugs clear of plastic extrusions trapping them to edges of mats at forward entry door and adjacent to galleys.
- (3) Retighten threshold attachment screws.
- (4) Lift and remove sections of rug from main cabin floor, together with their acoustic padding.

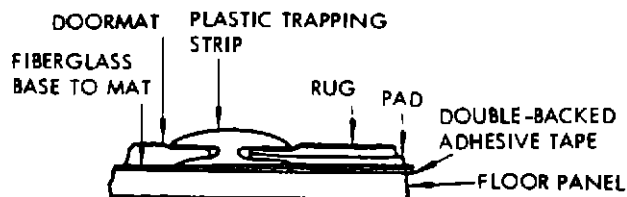
NOTE: The padding at the forward and aft ends of the two narrow rug strips on each side of the cabin is secured to the floor by double-backed adhesive tape. The rug sections are butt-joined to each other by overlapping integral strips of velcro tape, and these joints are attached to the floor by double-backed adhesive tape. Rug sections and their pads may be rolled up together but should be rolled with the rug outside to avoid damage to the rug fabric.

- (5) Lift tape from seat tracks previously covered by rugs and padding. Remove fillers from these tracks.

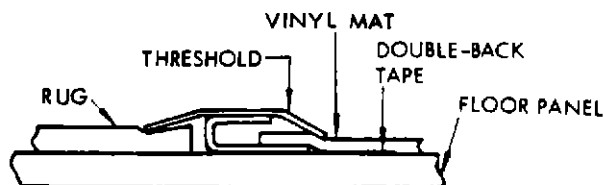
- B. Install Passenger Cabin Rugs (See figure 401.)

- (1) Install fillers in all floor tracks not to be used for installation of passenger equipment. Cover these filled floor tracks with four-inch wide single-sided adhesive tape, facing downward.
- (2) Slacken screws securing threshold strips across entries to control cabin and lavatories A, C, D, galleys and at aft entry mat.

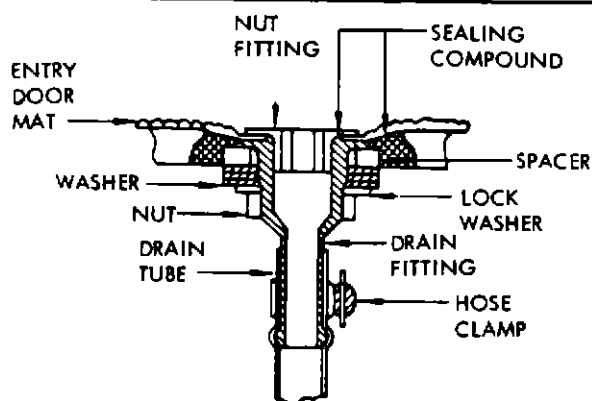
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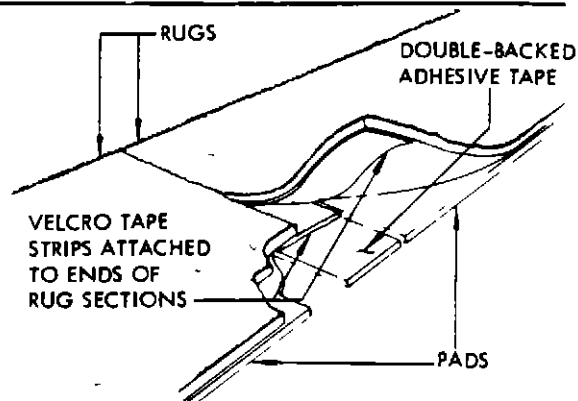
FORWARD DOORMAT TO RUG



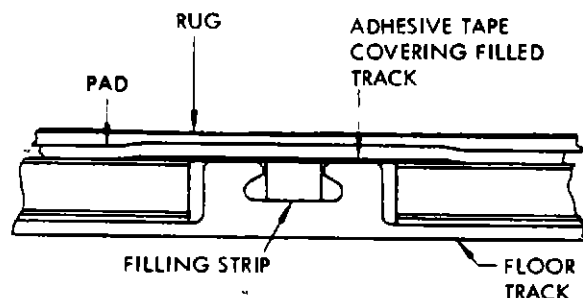
GALLEY MAT AND AFT DOORMAT THRESHOLD



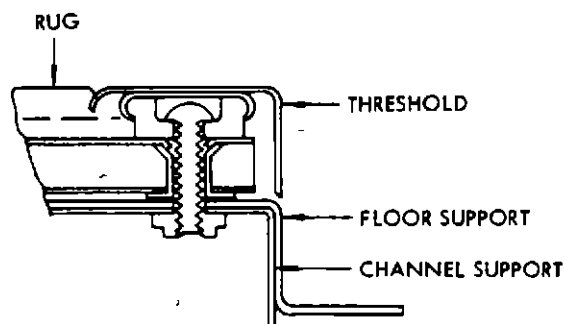
ENTRY DOORMAT DRAIN



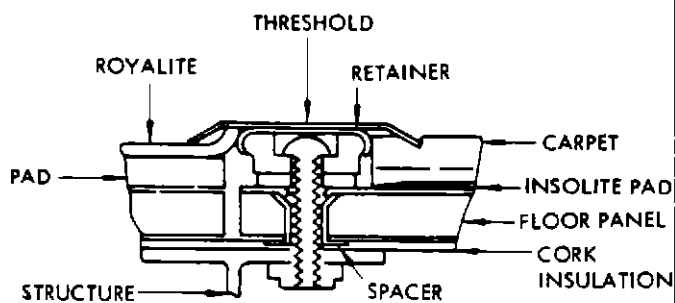
TYPICAL BUTT JOINT BETWEEN RUG SECTIONS



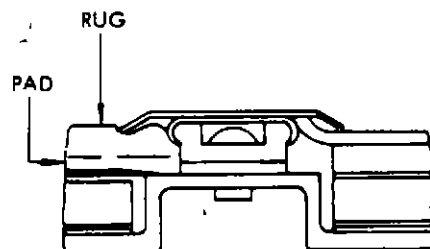
FLOOR TRACK FILLER
(FOR TRACKS ONLY USED
IN CARGO CONFIGURATION)



CONTROL CABIN THRESHOLD



LAVATORY 'C' AND 'D' THRESHOLDS



FWD LAVATORY 'A' THRESHOLD



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- (3) Install all sections of rug, together with their acoustic padding, to cabin floor. Pry open plastic trapping strips around edges of forward entry and adjacent to galleys and slip edges of rugs and padding under them. Take care to correctly locate sections of rugs which are fitted with press-stud fasteners to indicate proximity of access and viewing locations through floor. Locate edges of rugs and padding at thresholds and retighten threshold strips.

NOTE: Each rug section is marked on its underside with an arrow indicating the end to be installed forward. This ensures uniformity in the appearance of the pile on the upper surface of all adjacent rug sections.

3. Removal/Installation Mats at Entry and Galley Doors

A. Equipment and Materials

- (1) Allen Wrench, 1/2-inch

B. Remove Mats

- (1) Remove escape slide floor fitting at each entry and galley service door. Refer to 25-1-35, Escape Slide Floor Fitting.
- (2) Slacken screws attaching scuff plates to door thresholds.
- (3) Remove threshold strips across galley entries and at aft entry mat.
- (4) Lift and remove mats from floor. (Mats are attached to floor by double-backed adhesive tape.)

NOTE: Before lifting mats at entry doors it is necessary to remove the nut of the drain fitting on each mat. (A half-inch Allen Wrench is required for this.) (See figure 201)

- (5) Retighten screws attaching scuff plates to thresholds.

NOTE: When removing these mats for conversion to a cargo configuration, the escape slide floor fitting attachment and threshold attachment screws should be reinstalled to the floor to prevent dirt fouling their nuts and to prevent the screws being lost.



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C. Install Mats

- (1) Slacken screws attaching scuff plates to thresholds.
- (2) Position mats on floor at both entry doors and both galley doors.

NOTE: Mats are attached to floor by double-backed adhesive tape. Care should be taken to align the escape slide bracket holes and the drain fitting holes with the equivalent holes in floor.

- (3) Install drain fitting nut to each entry door mat, using half-inch Allen wrench.
- (4) Install escape slide brackets to floor at either end of both entry doors and both galley doors.
- (5) Retighten screws attaching scuff plates to thresholds.
- (6) Install threshold strips across galley entries and at aft entry mat.

4. Removal/Installation Entry and Galley Doors Nonslip Pads

A. General

- (1) Nonslip pads may be applied to the reveal at all entry and galley doors to prevent passengers from slipping when entering or leaving the airplane. (See figure 402.)

B. Equipment and Materials

- (1) Nonslip Pad - Safety Walk, 6-inches wide, Type B, Medium Aluminum Color, Minnesota Mining and Manufacturing Co., St. Paul, Minnesota
- (2) Nonslip Pad - Safety Walk, 4-inches wide, Type B, Medium Aluminum Color, Minnesota Mining and Manufacturing Co., St. Paul, Minnesota
- (3) Adhesive - Nycote Cement, Type 4-30, Nycote Laboratories, 15002 Delano Street, Van Nuys, California
- (4) Solvent - Methyl Ethyl Ketone
- (5) Clean, lint-free cloth

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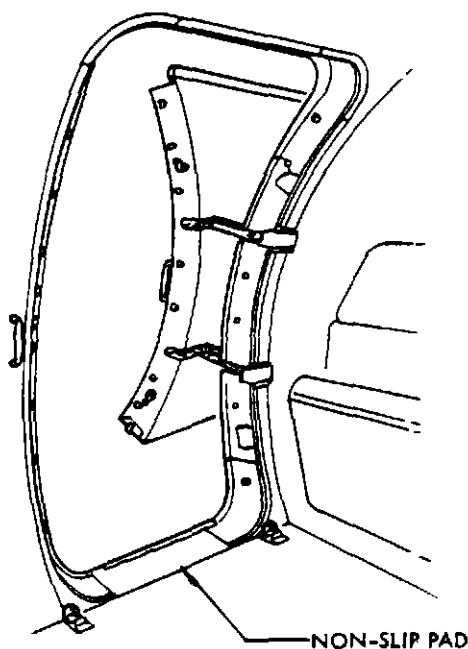
C. Remove Entry and Galley Nonslip Pad

- (1) Grasp corner of pad and peel away from reveal. If necessary a plastic scraper may be used to assist in removing pad.

NOTE: A cloth moistened with methyl ethyl ketone solvent may be used to soften the adhesive.

D. Install Entry and Galley Doors Nonslip Pad

- (1) Clean door reveal at floor level with methyl ethyl ketone.
- (2) Apply nonslip pad to reveal.
- (3) Seal edges of pads with two coats of Nycote Type 4-30 cement.



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HATRACKS - MAINTENANCE PRACTICES

EFFECTIVITY

CARGO AIRPLANES

1. General

- A. When the folding hatracks are originally installed the attachments of each section are individually adjusted so that the service unit tracks throughout the whole series are in proper alignment. Although two pairs of sections on each side are manufactured as identical parts (figure 201) their initial installation adjustment tailors them to their particular position among all the other sections in the numbered sequence shown in figure 201. (These numbers are stencilled on each hatrack section and on the upper and lower closure panels installed at the corresponding position, and are also stencilled on the lowered ceiling insulation at each position.) Thus the hatrack sections are not interchangeable. However, once they have been properly installed the sections may be folded down and re-erected any number of times without further adjustment being required. When sections of the folding hatracks have been removed, adjustment of their attachments is not necessary when they are reinstalled, provided that the sections are those originally installed on that particular airplane and provided also that they are installed in their proper positions. The instructions in paragraph 2 describe the adjustments necessary when installing new sections of folding hatrack, or sections which have previously been installed on another airplane.
- B. When the fixed hatracks are installed for the first time some adjustment of their attachments is necessary to ensure alignment of their service unit tracks with those of the adjacent folding hatrack sections. After such adjustment the sections may be removed and reinstalled to the same airplane by attachment bolts which require no adjustment. The instructions in paragraph 3 describe the attachment adjustments necessary when installing a new section of fixed hatrack, or one which has previously been installed on another airplane.
- C. The lounge hatrack is hinged upward and locked to the ceiling, rather than removed, for certain configurations of accommodation. (See 25-15-0, "Cabin Accommodation Conversions.") The instructions in paragraph 4 describe the removal and installation of a lounge hatrack, as would be required for replacement.

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FOLDING HATRACK SECTION PT NOS		
LEFT	HATRACK NUMBER	RIGHT
BAC P/NO		BAC P/NO
65-31501-18	9	---
-19	8	65-31501-13
-20	7	-14
-3	6	-4
-9	5	-10
-11	4	-12
-1	3	-2
-3	2	-4
-5	1 INDEX	-6
-7	A	-8
-1	B	-2
-15	C	---
△	D	△

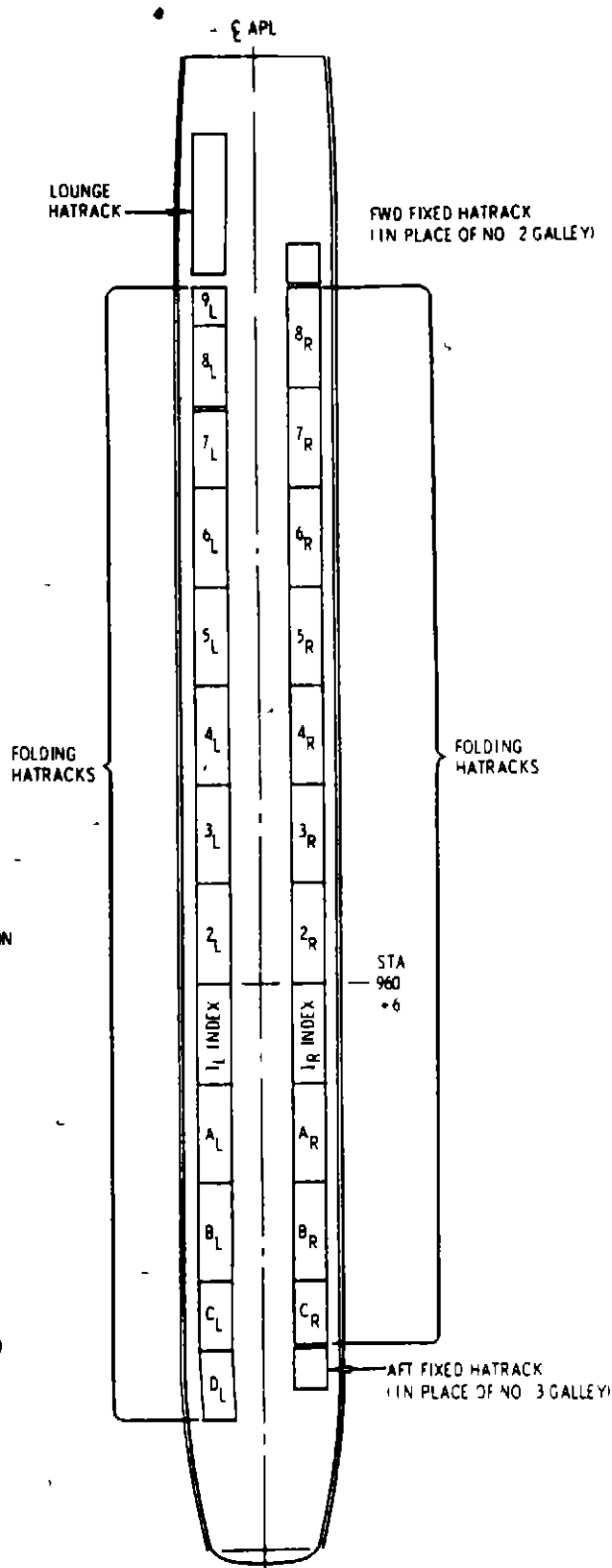
NOTE 1 HATRACK NUMBERS ARE STENCILLED ON HATRACK UPPER AND LOWER CLOSURE PANELS AND ON SIDEWALL INSULATION

2 THE SUB-LETTERS L AND R DENOTE LEFT AND RIGHT

3 FOR CORRESPONDING BAC PART NOS SEE TABLE

△ NWA 65-31501-35/SABENA 65-61501-17

△ NWA 65-31501-34/SABENA 65-31501-40



Hatrack Locations
Figure 201

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2. Removal/Installation Folding Hatracks

A. General

- (1) When the whole series of folding hatrack sections along each side of the cabin were originally installed during manufacture, the first sections to have been installed were the INDEX or No. 1 sections. The remaining sections were then installed one by one progressing forward and aft from these two index sections, each one being correctly positioned fore and aft by its connecting slide bolt, some of which were adjusted to prevent the accumulation of excessive longitudinal tolerance throughout the series. It follows from this that if, for example, the forward four sections of one side are being replaced by new sections (and the sections aft of these are already properly installed), the most aft replacement section should be installed first and be followed by the next forward one, and so on. In such an instance it may be necessary to adjust some of the slide bolts, as described in step D (13). Installation of replacement sections in accordance with this sequence ensures that the longitudinal location of all the sections is based on the index sections.

B. Equipment and Materials

- (1) Allen wrench, 5/32 Inch

NOTE. This is for use when adjusting slide bolts, and will therefore only be required when installing a replacement hatrack section.

C Remove Folding Hatrack Section

- (1) Slide joint cover clips at each end of the hatrack section to be removed clear of the joints in the outboard passenger service unit tracks which they conceal

NOTE. If a passenger service unit is installed across the joint between the hatrack section to be removed and an adjacent section, it should be removed or re-installed clear of the joint. (Refer to 25-12-2, Passenger Service Units - Maintenance Practices.) If an oxygen bottle or a fire extinguisher is installed above the hatrack section it should be removed. When batteries supplying power for illumination of overwing emergency escape routes are installed in hatracks, disconnect wiring from batteries, connect wiring to dummy receptacle and remove batteries.



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- (2) Pull out lower ends of upper stowage supports to be used by hatrack section being removed.

NOTE: Support is initially released from its retracted position against the sidewall by pressing some dull-pointed tool into the slotted hole drilled into the aft edge of the support, while lifting the support away from the sidewall.

- (3) Withdraw connecting slide bolts to disengage inboard edge of section from its adjacent sections fore and aft. (Bolts are accessible above inboard edges of racks.) See figure 202.
- (4) Unlock outboard attachment latches. (Control cable knob of each latch, adjacent to inboard end of tension tie, should be pulled inboard and secured in this position by raising knob to lock it in keyhole slot.)
- (5) Lift hatrack section clear of its attachments with an inboard and upward movement and lower outboard edge to engage its attachments with upper stowage supports. Secure outboard latches by releasing control cable knobs from their keyhole slots, thus allowing latch plunger to spring into its extended (locked) position.

NOTE: As this takes place, the upper closure panel above this section of rack will probably slide clear of its upper attachments. It can be re-engaged later.

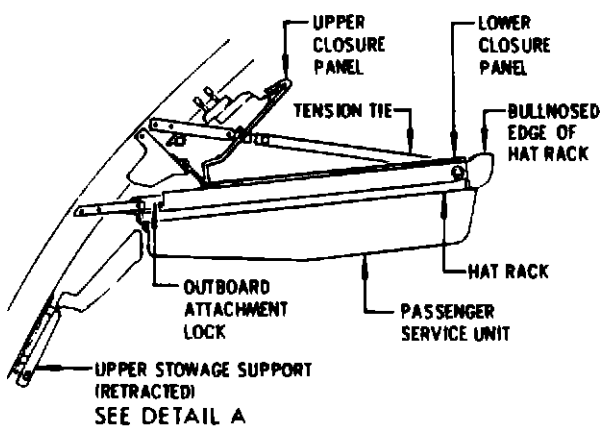
The upper stowage supports of each hatrack section are one and one quarter inch forward of its normal attachments to the fuselage. The tension ties allow the forward and downward movements to be simultaneous. The two hatrack sections on the main cargo door require a forward movement of five inches (approx). For this reason, on these two sections, the lower closure panels are attached (by quick-release fasteners) directly to the hatrack surface instead of being hinged to the upper closure panels, as on most other sections. The lower closure panel of the section immediately aft of the main cargo door is attached in the same manner, due to the disposition of its tension ties.

- (6) Disconnect tension ties by sliding their latch knobs inboard and lifting tension ties clear of their attachments. Allow rack to swing down and hang inverted from its upper stowage supports, and stow tension ties in recesses on face of rack.
- (7) Disconnect and cap oxygen, electrical and air supplies to passenger service units at connections behind upper closure panel. Disconnect passenger service unit adjustment limiting lanyard.

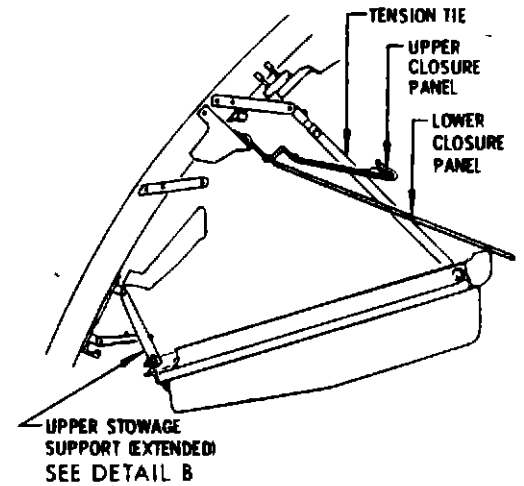
NOTE: Passenger service units may be removed from the hatrack or may remain attached to it.

- (8) On SABENA airplanes OO-SJJ and on, at hatrack section BL, disconnect flexible duct from line to the air temperature sensing pickup in the hatrack.

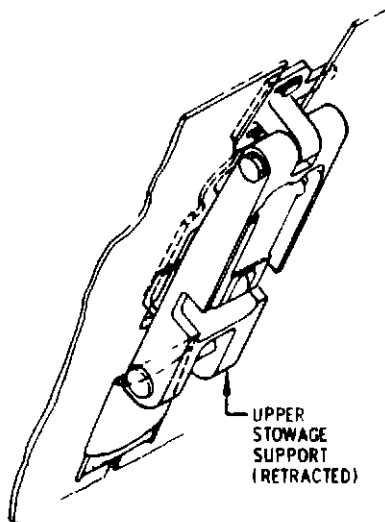
MAINTENANCE MANUAL



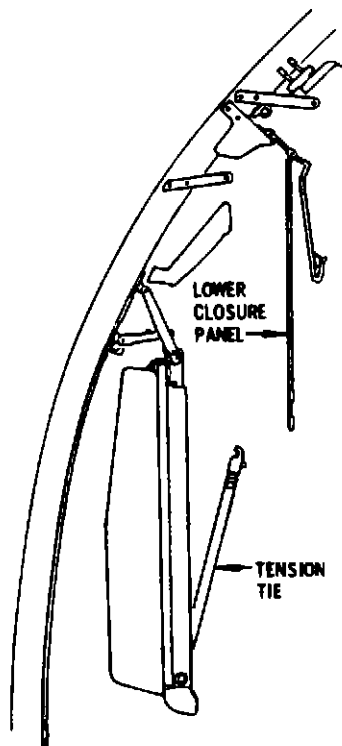
(INSTALLED)
PASSENGER CONFIGURATION



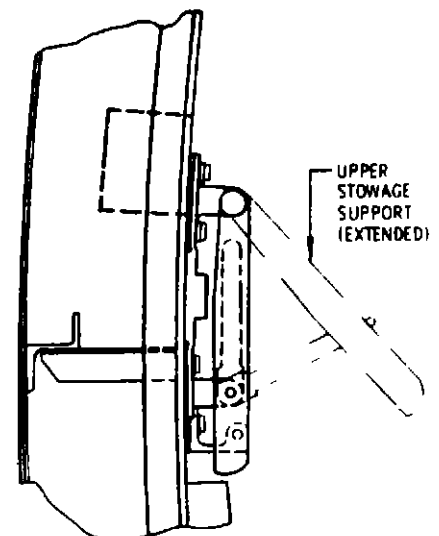
(ATTACHED TO UPPER STOWAGE SUPPORT)
INTERMEDIATE POSITION



DETAIL A

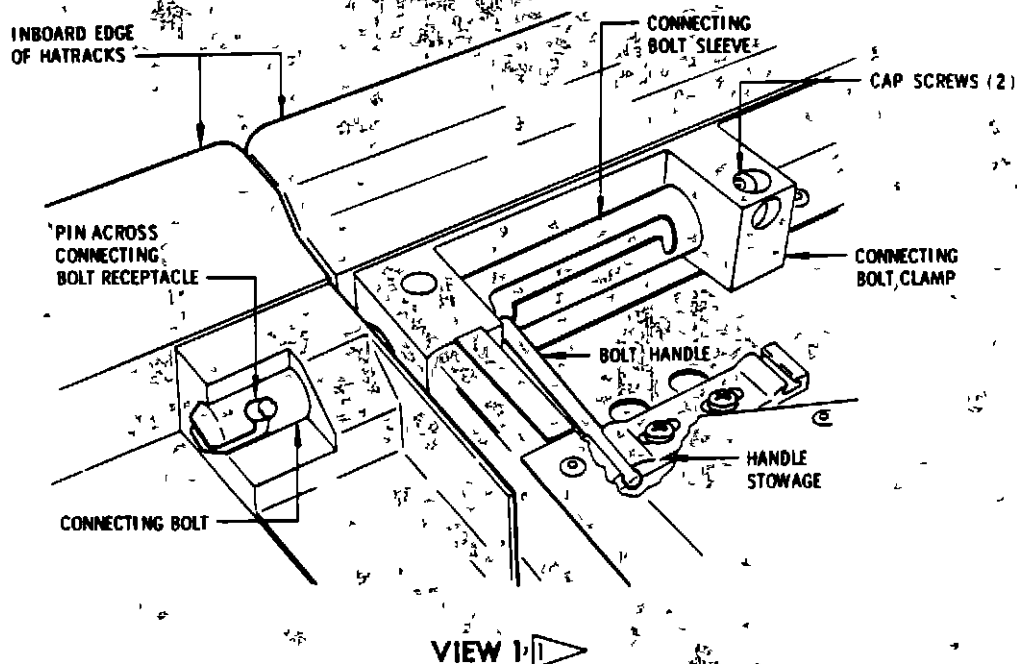
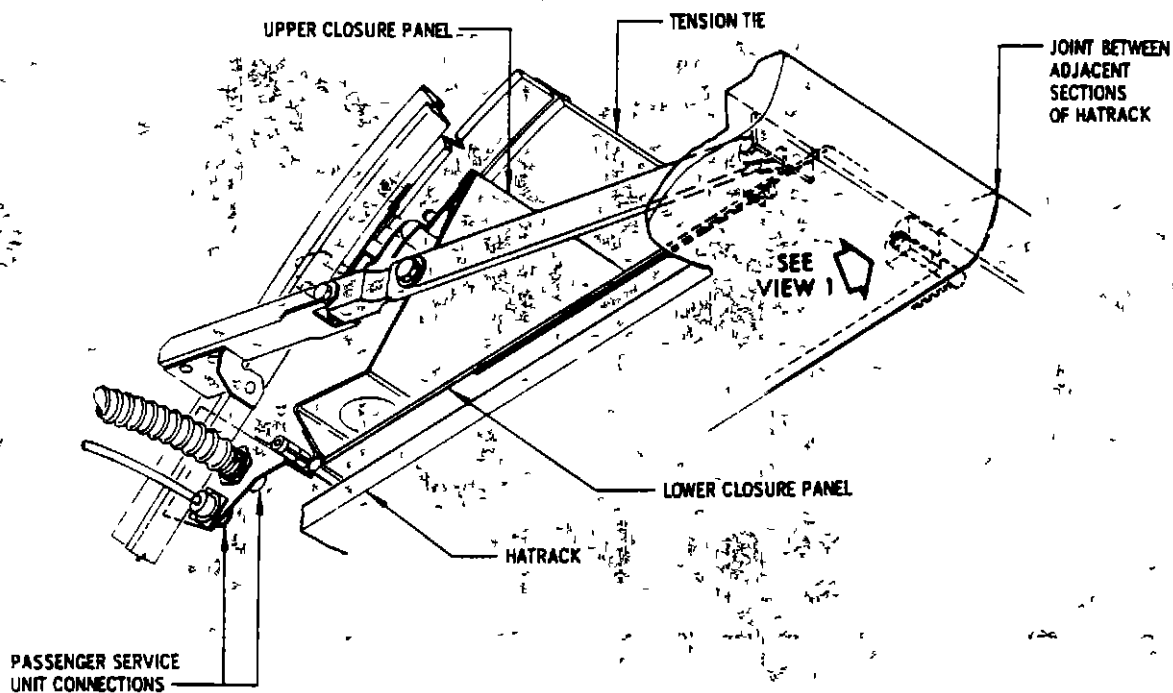


(HANGING FROM
UPPER STOWAGE SUPPORT)
HANGING POSITION



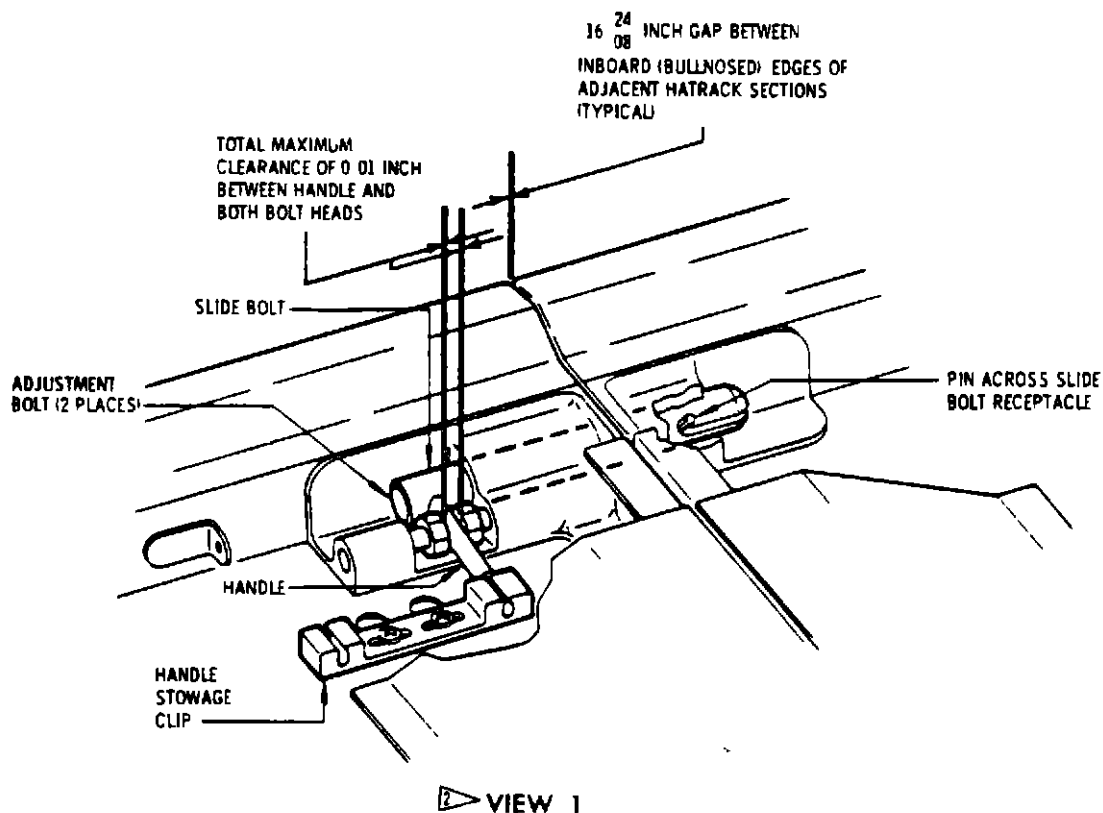
DETAIL B

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Folding Hatrack Installation
 Figure 202 (Sheet 2)

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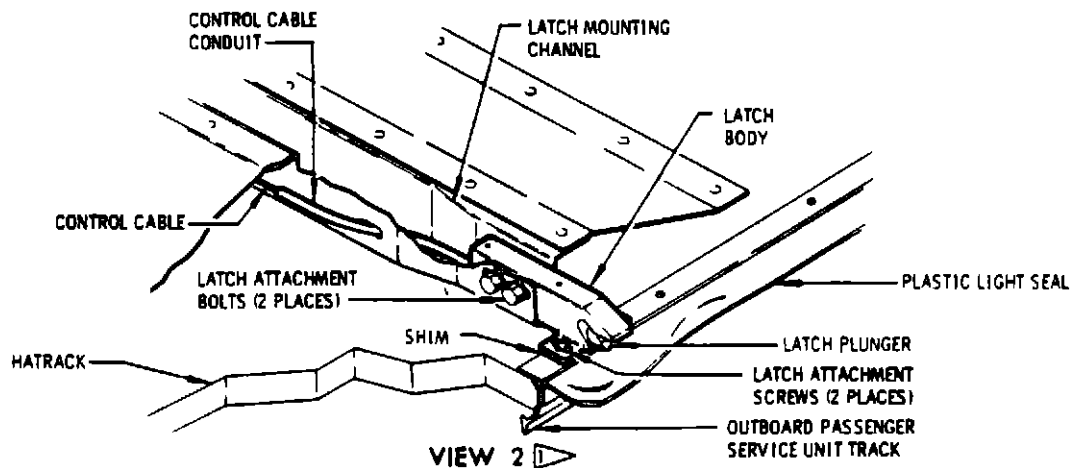
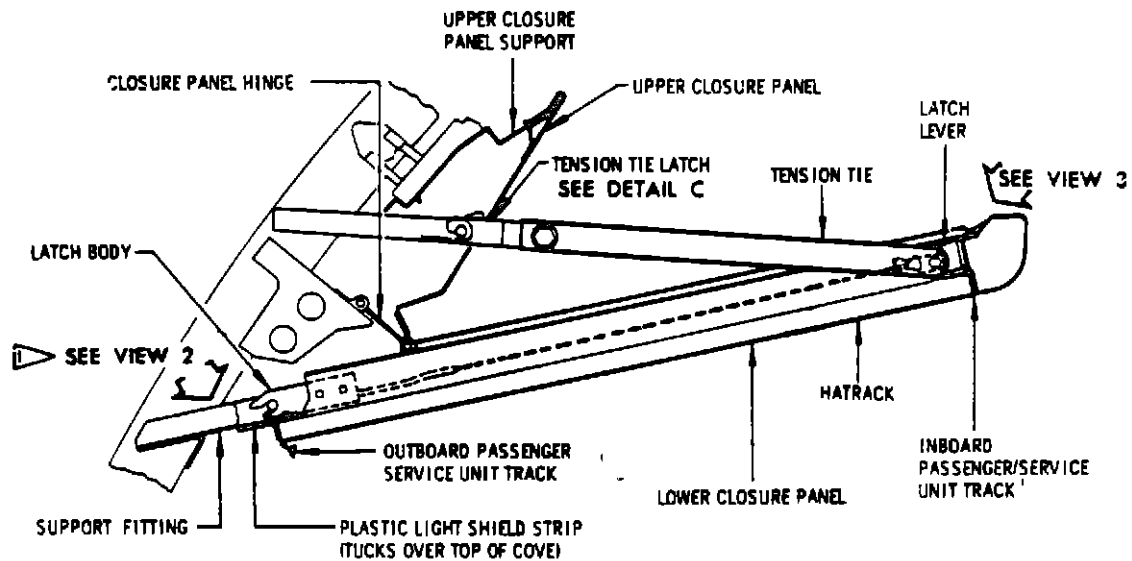


1 AF F-BLCC
SABENA OO-SJH
BOAC G-ASZF, G-ASZG
DLH D-ABUA
NWA N356US THRU N363US
IIA EI-AMW, EI-ANO
CAL N17321 THRU N17324
FTL N322F, N323F

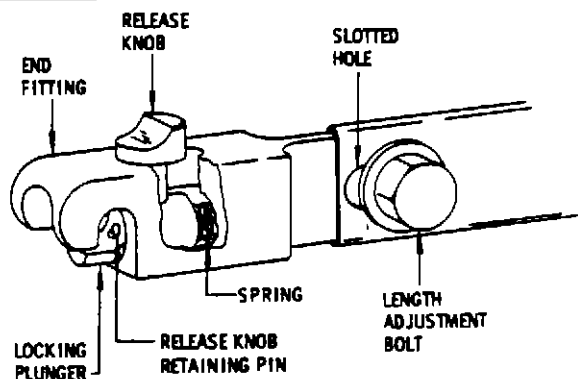
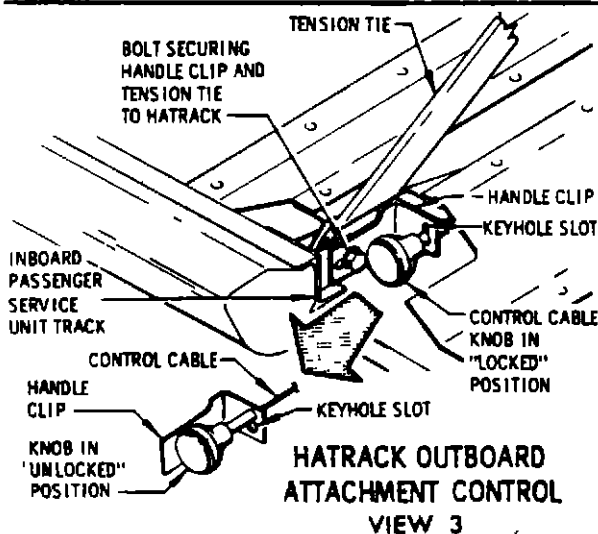
2 ALL OTHER AIRPLANES



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VIEW 2

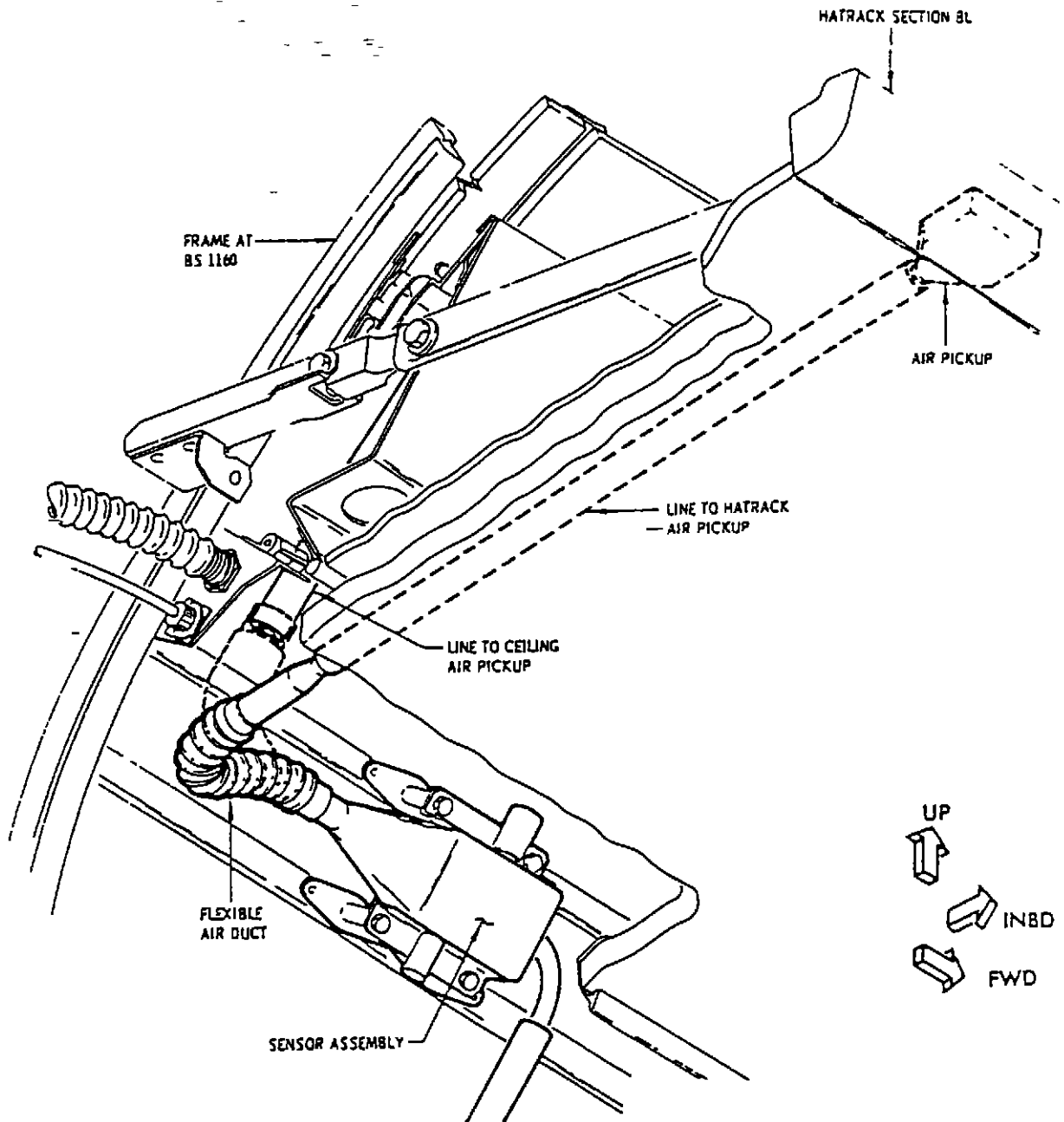


DETAIL C

Folding Hatrack Installation
Figure 202 (Sheet 4)



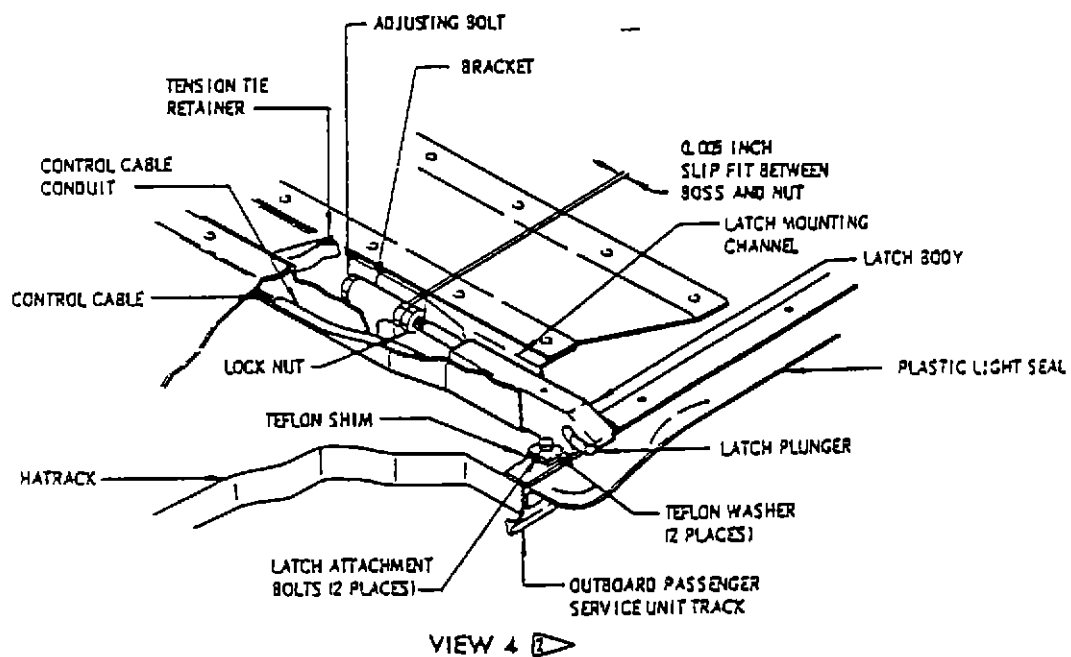
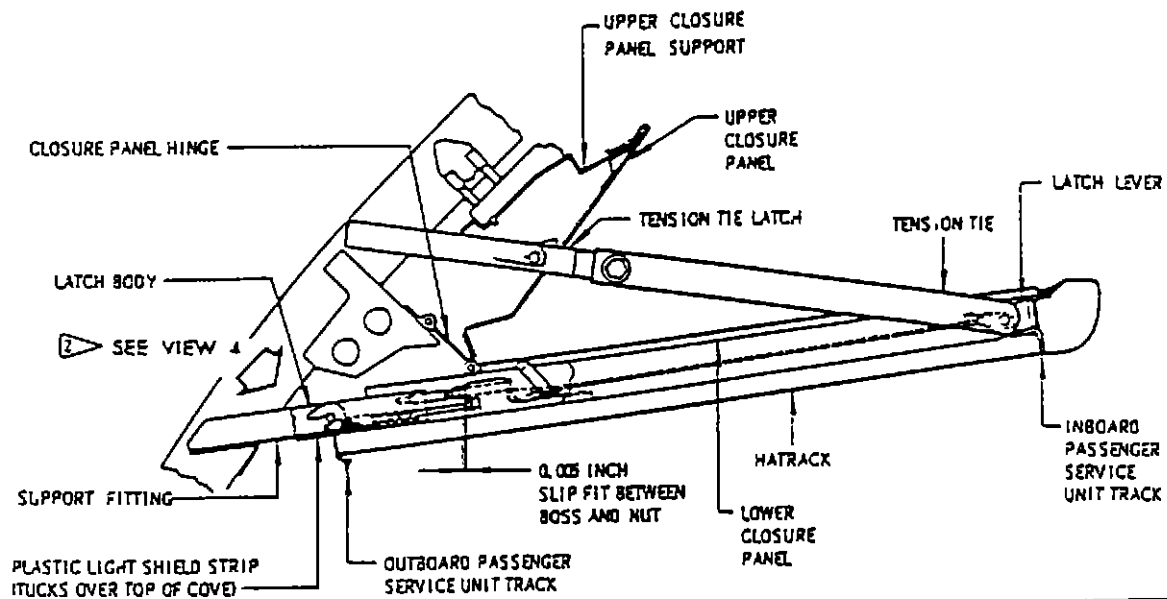
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EFFECTIVITY

TCA	LX-N20198
	LX-N20199
RTCA	LX-N19997
	LX-N20000

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707
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1 ▷ 00-SJH, 00-SJJ

2 ▷ TCA LX-N20198
LX-N20199
RTCA LX-N19997
LX-N20000



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- (9) On all airplanes, re-engage upper closure panel on its upper attachments and remove lower closure panel, if this has been installed, by withdrawing quick-release hinge pins supporting it

NOTE: On either of the hatrack sections of the main cargo door, or on the section immediately aft of the door, the lower closure panel has remained attached to the surface of the hatrack by quarter-turn fasteners. These two hatrack sections may be removed with their lower closure panels still so attached, or the panels may be removed first by disconnecting their fasteners.

- (10) Pull control cables to release latches from upper stowage supports and remove hatrack section complete with its passenger service units, unless these have already been removed
- (11) Retract upper stowage supports flush against sidewall

D. Install Folding Hatrack (See figure 202)

- (1) Position upper stowage supports in readiness to carry hatrack section to be installed.
- (2) Engage outboard attachments of hatrack section with stowage supports and allow rack to hang vertically from support.
- (3) Release tension ties from their stowage recesses in rack upper surface.
- (4) Connect lower closure panel (if it is to be installed) to upper closure panel at their common hinge fittings. Disengage upper closure panel from its support and allow panel to hang from its hinge

NOTE On the two hatrack sections on the main cargo door and the one immediately aft of it, the lower closure panel is attached to the upper surface of the hatrack. Quick-release fasteners are provided on the hatrack.

- (5) Rotate hatrack section and secure free ends of its tension ties with their normal attachments to fuselage structure.

NOTE As hatrack rotates upward it will be necessary, on all sections except the two on the main cargo door and the one immediately aft of it, to lift the inboard edge of the lower closure panel (if installed) clear of the bullnose (inboard edge) of the hatrack. The lower closure panel will fall into place when hatrack installation is completed



MAINTENANCE MANUAL

- (6) Install passenger service units on hatrack section if these units are not already installed. (See 25-12-2, "Passenger Service Units - Maintenance Practices.") Connect oxygen, electrical and air supply lines at nearest connection behind upper closure panel, but do not attempt to install any unit across a joint between two sections. Connect adjustment limiting lanyard. The units should be correctly positioned and finally installed only after the hatrack sections are properly installed and (if necessary) adjusted.

- (7) On the following airplanes
- | | |
|------|-----------|
| TCA | LX-N20198 |
| | LX-N20199 |
| RTCA | LX-N19997 |
| | LX-N20000 |

at hatrack section BL, connect flexible duct from air temperature sensor to the air pickup line inside hatrack.

- (8) On all airplanes, unlock latches attaching hatrack to upper stowage supports. Lift rack clear of its stowage supports and engage its attachments in its normal attachment fittings on fuselage structure, but do not lock latches until installation adjustments are completed.

CAUTION CARE SHOULD BE TAKEN TO GUIDE ALL PASSENGER SERVICE UNIT LINES UP INTO THEIR PROPER LOCATIONS WHILE HATRACK IS BEING RAISED TO ITS NORMAL ATTACHMENTS. IT IS ESSENTIAL THAT ALL LINES BE KEPT CLEAR OF THE ATTACHMENT FITTINGS. FAILURE TO ENSURE THIS COULD RESULT IN THE LINES BEING DAMAGED BY THE LATCH BODIES ON THE HATRACK WHEN THESE ENGAGE THE FITTINGS.

NOTE: It is suggested that one man should attend to this duty, in addition to the two men who will be lifting the hatrack.

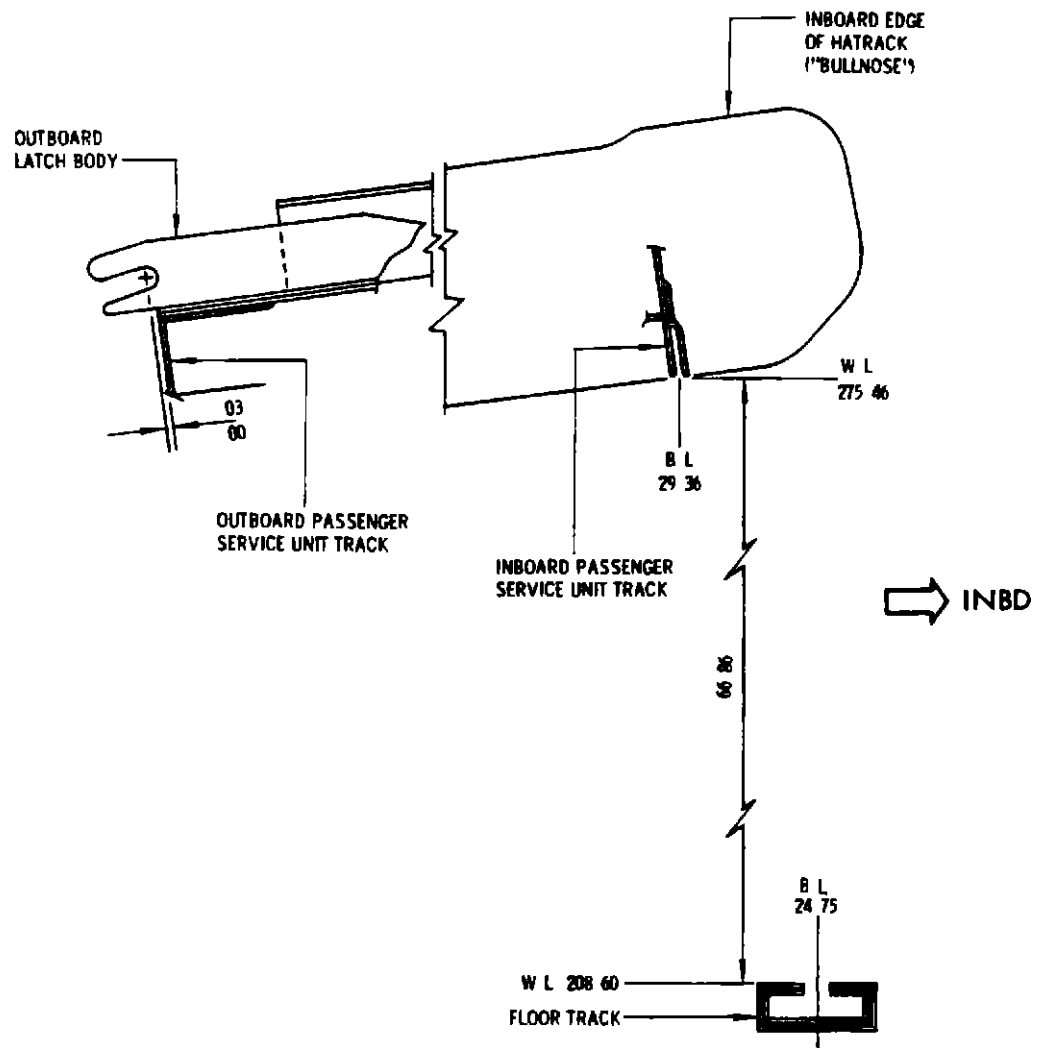
- (9) Tuck plastic light shield strip (at outboard edge of hatrack) over top of cove, using any blunt, thin implement.
- (10) Adjust hatrack attachments.

NOTE These instructions apply only to replacement sections of hatrack (either new or from another airplane) as such sections will not have been initially adjusted when installed within their series.

The object of these adjustments is to obtain proper alignment of the passenger service unit tracks and the slide bolts between adjacent hatrack sections throughout a series. Normally, the index section may be used as a datum and all other sections adjusted to align with it. If difficulty is experienced, however, the index section may itself be adjusted to the dimensions shown on figure 202A.

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Folding Hatrack Adjustment Dimensions
Figure 202A



MAINTENANCE MANUAL

(a) Adjust section laterally (inboard-outboard).

1) On the following airplanes

SABENA OO-SJH, OO-SJJ
CAL N17323, N17324
OA SX-DBA, SX-DBB
BNF N7095 thru N7097
FTL N322F, N323F
AF All Airplanes
BOAC All Airplanes
DLH All Airplanes,

slacken attachments of each latch body and move latches until the outboard passenger service unit tracks are properly aligned with those of adjacent section. Tighten latch body attachments when this adjustment is complete.

NOTE The handle clip at the inboard end of the control cable may be loosened, if this is necessary to accomplish proper adjustment. If it is necessary to adjust the latch body vertically, it may be temporarily removed and shims added to, or peeled from, the shim pad on which it rests. Check that "star" lock washers are properly installed to prevent any shifting of latch body when its attachments are tightened.

2) On all airplanes except those listed in the preceding paragraph, turn adjusting bolt right or left, as required, until the outboard passenger service unit track is aligned with track of adjacent section.

NOTE Do not loosen bolts attaching latch to hatrack. The latch will slide between the surfaces of the teflon shim and teflon washers. The handle clip at the inboard end of the control cable may be loosened to accomplish latch adjustment.

3) On all airplanes, adjust control cable travel. Loosen handle clip, if this has not already been done to accomplish latch adjustment. Position clip so that stem of control cable knob is engaged in main bore of keyhole when lock is engaged, and so that, when knob stem is pulled inboard and retained by keyhole slot, latch plunger is completely withdrawn inside latch body.



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- (b) Adjust section vertically.
- 1) Loosen bolt attaching latch fitting to outboard end of each tension tie.
 - 2) Manually adjust height of inboard edge of section so that its passenger service unit track is in vertical alignment with that of adjacent installed section.
 - 3) Hold in this position until tension tie lengths are locked by retightening bolts at their outboard ends.
- (11) With outboard latches unlocked, engage connecting slide bolt between inboard edge of hatrack section being installed and equivalent edge of adjacent installed section. Lift bolt handle, slide bolt into engagement and rotate handle down into its locked position.

NOTE In some instances, this slide bolt is mounted on the section being installed, and in other cases it is on the adjacent section. In either case the method of operation is the same. If a single hatrack section is being installed between two adjacent sections which are already installed, the slide bolts at both ends must be engaged.

- (12) Lock outboard attachment latches.
- (13) Adjust fore and aft location of hatracks.

(a) General

- 1) This adjustment is only necessary in the event that a new hatrack section requires slight fore and aft adjustment to equalize its position between the adjacent sections in each direction.
- 2) No outboard latch fitting should be closer than .09 inch to either end of its mating fitting on fuselage. The gap between the bullnoses (inboard edges) of adjacent hatrack sections should be between 0.08 and 0.24 inch except at the aft end of the main cargo door.
- 3) Adjustment is accomplished by varying the travel of the slide bolts connecting the inboard edges of adjacent hatrack sections.



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(b) Adjust slide bolts on the following airplanes

AF	F-BLCC
SABENA	OO-SJH
BOAC	G-ASZF, G-ASZG
DLH	D-ABUA
TWA	N785TW thru N788TW, N791TW, N792TW
WAI	N373WA thru N376WA
CAL	N17321 thru N17324
FTL	N322F, N323F

- 1) Slacken cap screws securing clamp around sleeve of slide bolt, using Allen wrench. Unlock outboard attachment latches, engage slide bolt and move hatrack section forward or aft until desired fore and aft position is achieved. Lock outboard attachment latches and tighten cap screws of connecting bolt to a torque of between 25 and 30 pound-inches.



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- (c) Adjust slide bolts on all airplanes except those listed in the preceding paragraph.
- 1) Rotate adjustment bolts away from slide bolt handle. Loosen handle stowage clip screws. Unlock hatrack outboard attachment latches, engage slide bolt, and move hatrack section forward or aft until desired position is achieved. Lock outboard attachment latches and turn adjustment bolts to give a clearance of 0.01 inch (total) on the slide bolt handle. Tighten handle stowage clip screws.
- (14) Engage upper closure panels on their supports.
- (15) Retract upper stowage supports against the sidewall.
- (16) Slide joint cover clips in position along outboard passenger service unit track so that they conceal the joints at ends of hatrack section.
- (17) Check that the light seals along the forward and aft edges of the hatrack section are evenly overlapping the seals of the adjoining sections, and are not twisted or irregular.
- (18) Attach oxygen bottle or fire extinguisher (as required) to receptacles provided on upper surface of hatrack.
- NOTE: If the lower closure panel is installed, the receptacles will be exposed by holes in the closure panel.
- (19) Position passenger service units properly in accordance with seating requirements. Install as described in 25-12-2, Passenger Service Units - Maintenance Practices.
- (20) Where batteries are required to supply power for illumination of overwing emergency escape routes, install batteries on hatracks, disconnect wiring from dummy stowage receptacle and connect it to the batteries.

MAINTENANCE MANUAL

3. Removal/Installation Fixed Hatracks

NOTE: This procedure applies to the forward or the aft sections of fixed hatrack, which may be installed in place of galleys No. 2 and No. 3 in certain cabin configurations.

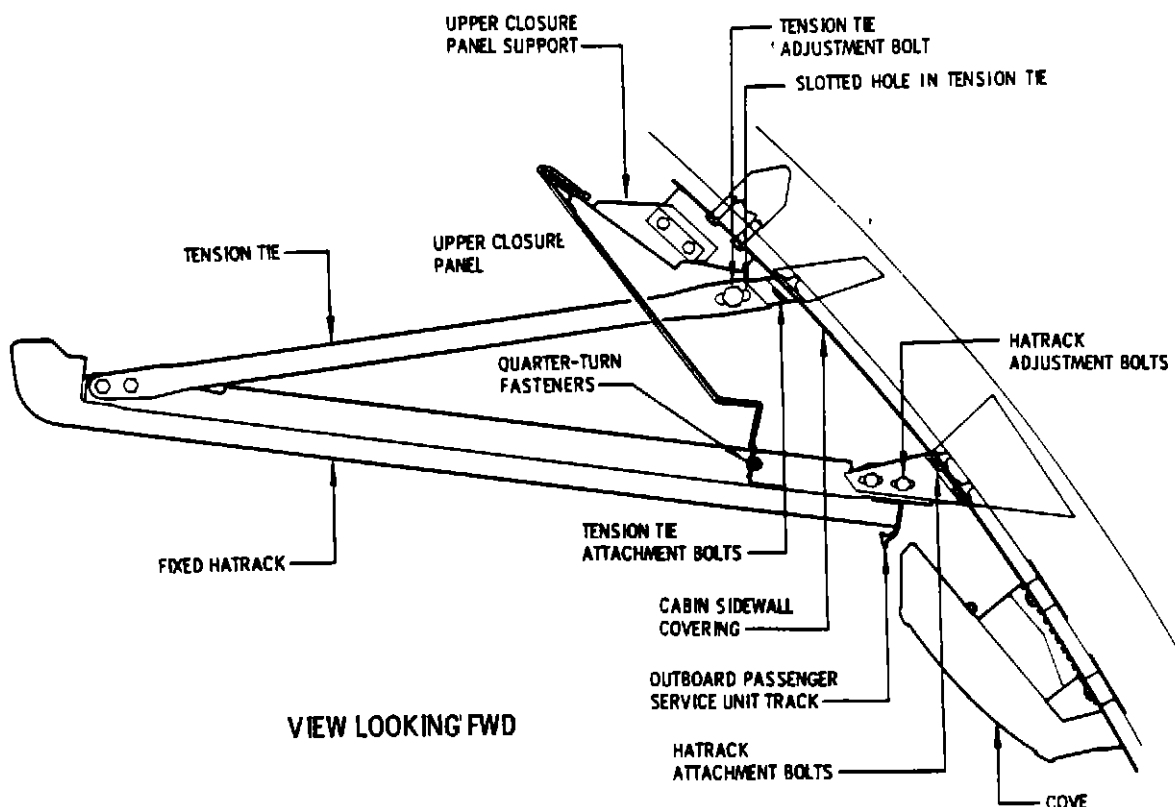
A. Remove Fixed Hatrack

- (1) Remove section of cove below hatrack by removing its face panel and removing screws attaching cove to sidewall. See figure 203.

NOTE: This is applicable if fixed hatrack is being removed to permit installation of a galley.

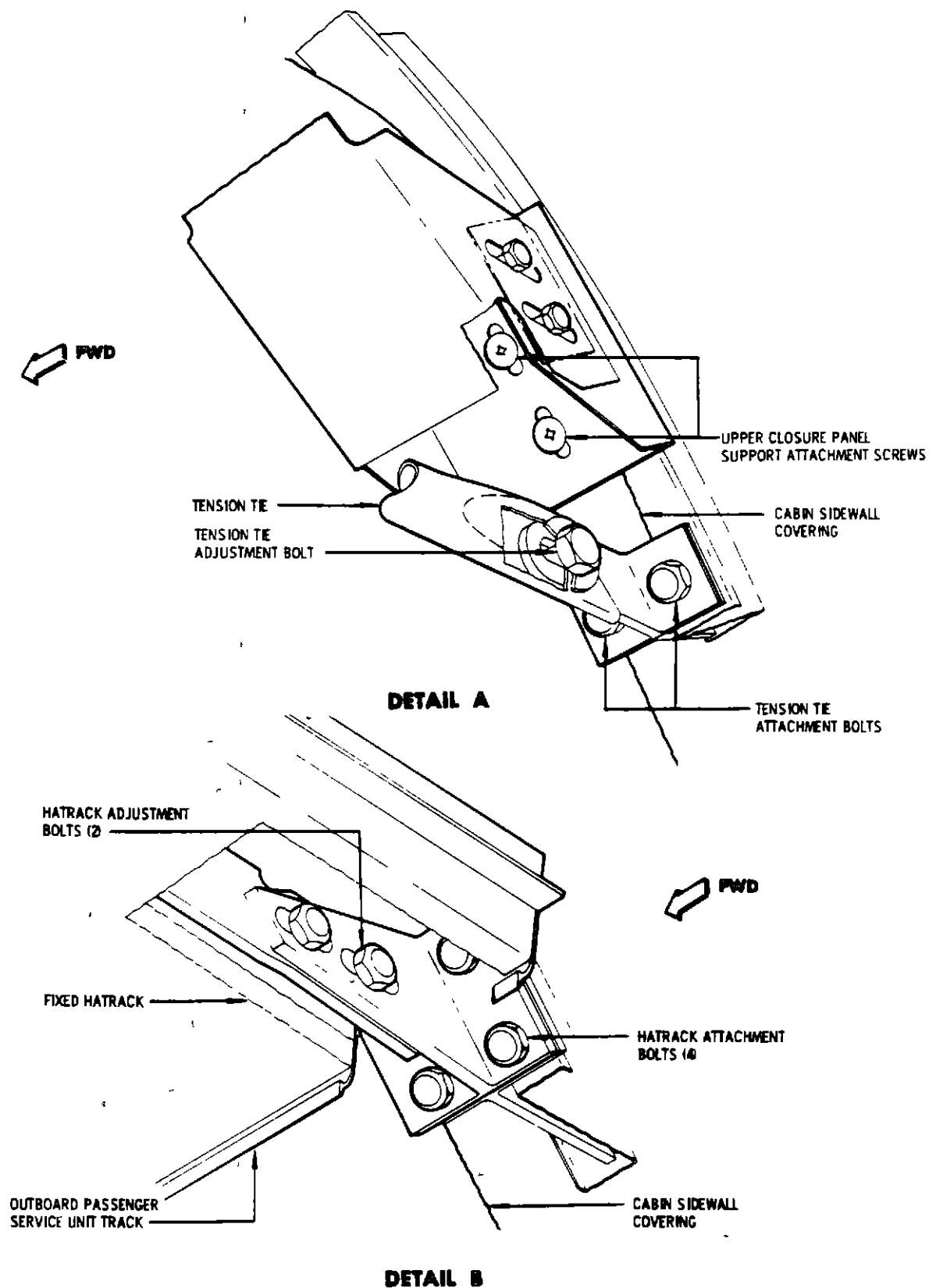
- (2) Disconnect quarter-turn cowl fasteners at lower edge of upper closure panel and lift panel off its upper support.
- (3) Disconnect air, oxygen and electrical services to passenger service unit.

NOTE: Passenger service unit may be removed from hatrack or may remain installed to it.



Fixed Hatrack Installation
Figure 203 (Sheet 1)

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Intercontinental
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- (4) Support hatrack while removing two bolts attaching each tension tie to cabin sidewall.
- (5) Remove four bolts attaching each outboard support to cabin sidewall, and remove hatrack.
- (6) Remove screws attaching upper closure panel support brackets to sidewall.

B. Install Fixed Hatrack

- (1) Install upper closure panel support brackets to sidewall. (See figure 203.)
- (2) Check for alignment of upper closure panel supports with adjacent upper closure panel, and adjust, if necessary by slackening off attachments and using movement permitted by slotted holes. Retighten all attachments when adjustment is complete.
- (3) Position hatrack against sidewall and install four bolts attaching each outboard support to sidewall and two bolts attaching each tension tie to sidewall.
- (4) Check for alignment with adjacent section of installed folding hatrack and adjust, if necessary as follows:
 - (a) Adjust outboard passenger service unit track laterally (inboard-outboard direction) by slackening two adjustment bolts on each outboard attachment fitting. Use lateral movement permitted by slotted holes to obtain proper adjustment, and re-tighten bolts.
 - (b) Adjust inboard passenger service unit track vertically by slackening adjustment bolt at outboard end of each tension tie. Move inboard edge of hatrack vertically, using movement permitted by slotted hole in tension tie, and re-tighten tension tie adjustment bolt when adjustment is complete.
- (5) If passenger service unit is not already installed to hatrack, install it at this stage. (Refer to 25-12-2, "Passenger Service Units - Maintenance Practices.") Connect air, oxygen and electrical services.
- (6) Slide upper closure panel on to its attachments and connect its lower edge to top of hatrack by installing quarter-turn cowl fasteners.
- (7) Install cove to sidewall below hatrack.

4. Removal/Installation Lounge Hatrack

A Remove Lounge Hatrack

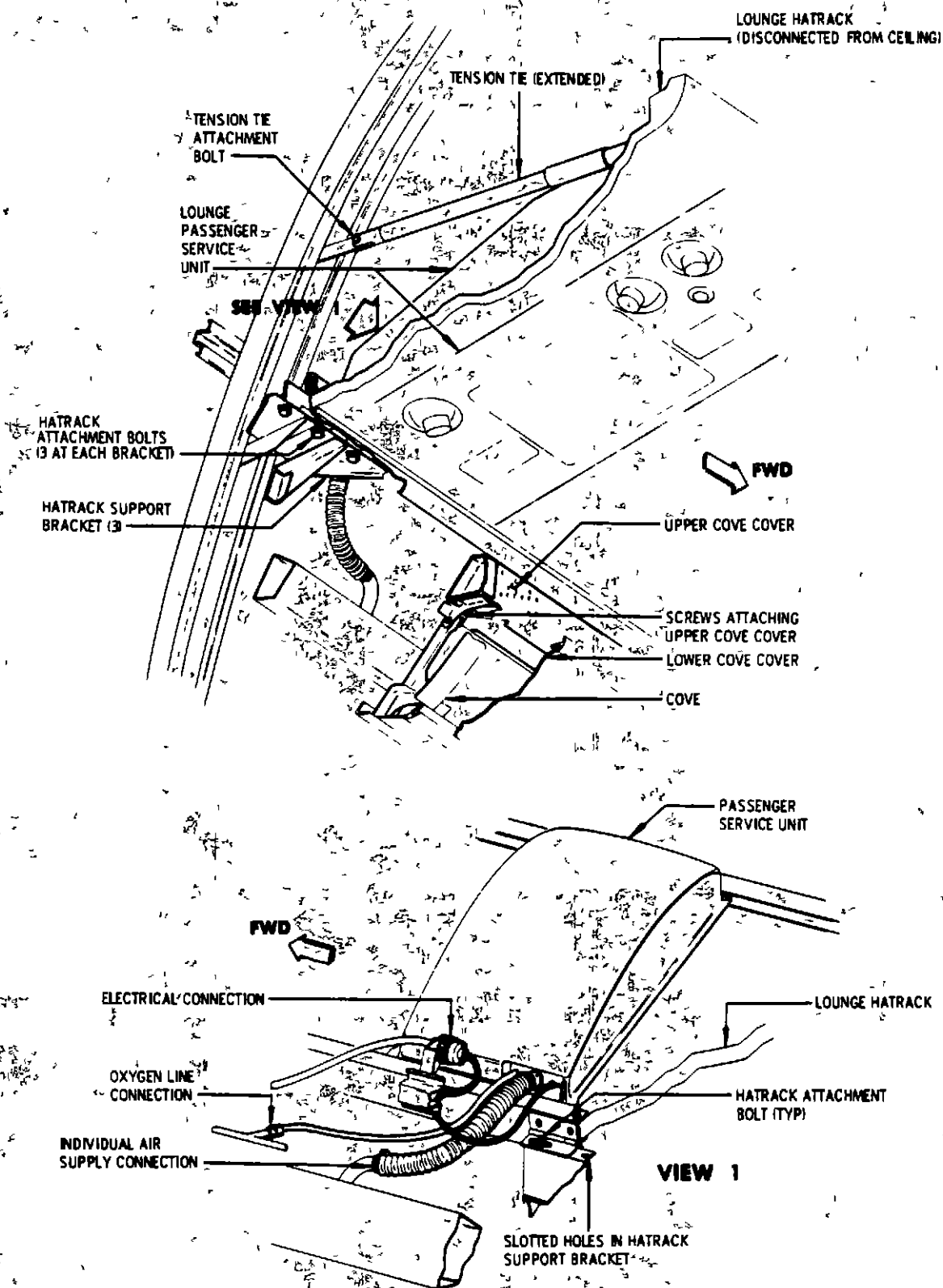
- (1) If hatrack is folded up against ceiling, insert screw driver into guide sleeve of both upper attachments, rotate lock release screws 90° and allow hatrack to return to its lowered, or normal, position. (See figure 204.)
- (2) Obtain access to hatrack attachments by removing upper cove cover
 - (a) Peel away plastic trim which retains upper edge of lower cove cover and remove cover.
 - (b) Unscrew and remove upper cove cover.
- (3) Disconnect air, oxygen and electrical lines leading to each passenger service unit at their connections above cove
- (4) Slacken three bolts at each of three hinged attachments to fuselage structure along outboard edge of hatrack.
- (5) Support hatrack while disconnecting tension ties (one bolt at outboard end of each tie) and removing nine previously slackened attachment bolts Remove hatrack.

NOTE: When tension ties are disconnected and hinges still attached, hatrack should not be allowed to rotate below a horizontal attitude.

B Install Lounge Hatrack

- (1) Position hatrack with its three hinged outboard attachments aligned with their support brackets and loosely install at least one bolt at each attachment, still supporting weight of hatrack manually.
- (2) Connect all three tension ties to their attachments to fuselage.
- (3) Install remaining bolts along hinged outboard attachments, but do not tighten until sure that stowage studs engage their receptacles when rack is hinged up to ceilings as described in (6).
- (4) Set both stowage studs along inboard edge of hatrack into their erect position, as shown in figure 204.
- (5) Remove both cover plates which conceal stowage attachments above ceiling, by inserting finger through holes in plates and pulling down

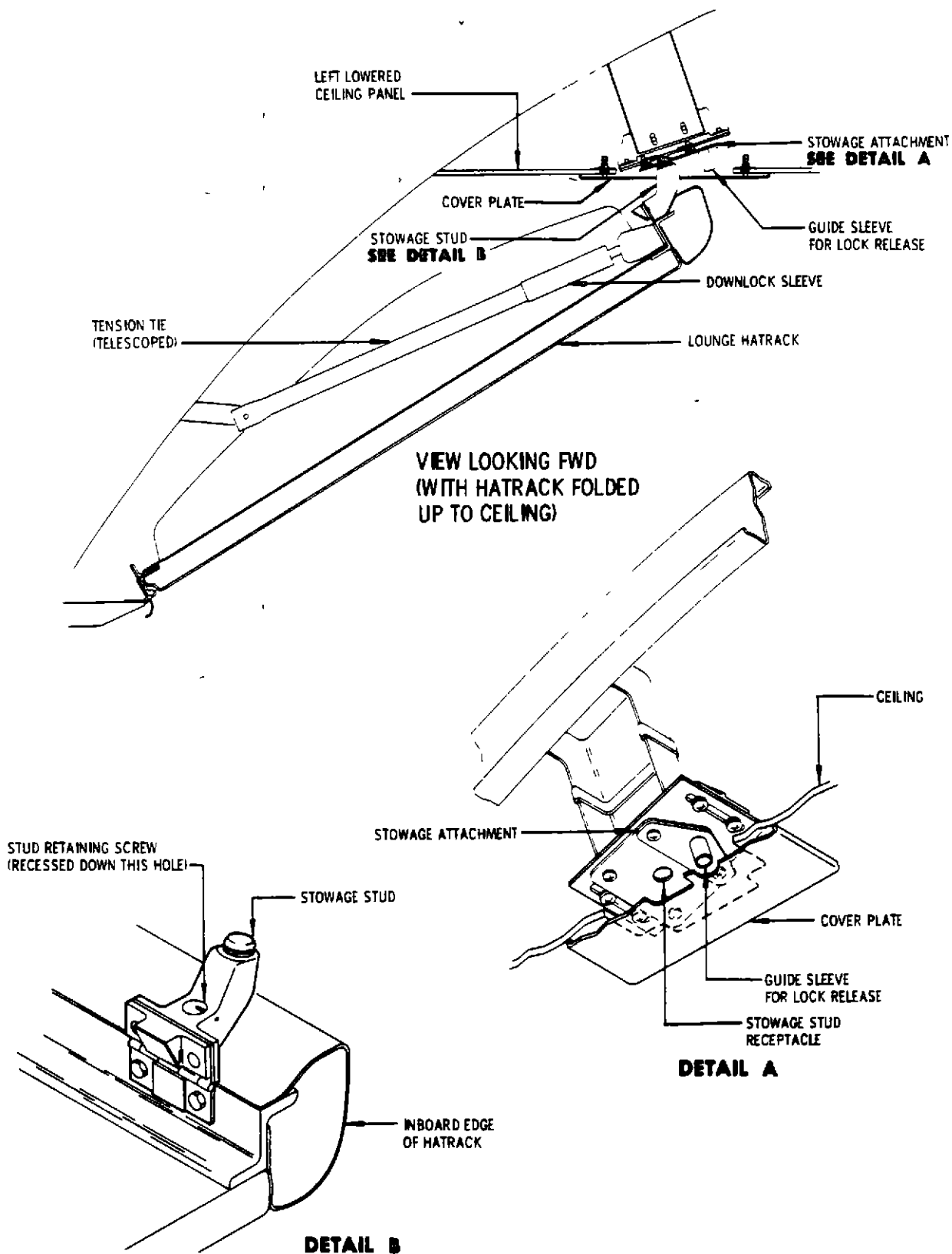
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Lounge Hatrack Installation
Figure 204 (Sheet 1 of 2)

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Lounge Hatrack Installation
Figure 204 (Sheet 2 of 2)

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- (6) Hinge hatrack upwards and check that stowage studs engage properly with receptacle of stowage attachments above ceiling.

NOTE: If adjustment is necessary the position of the stowage receptacle can be adjusted by slackening the appropriate screws and using the movement permitted by the slotted holes. Slotted holes in the hatrack support brackets allow the rack to be adjusted fore and aft. Re-tighten all screws, and the hatrack attachment bolts, when adjustment is complete.

The angle of the stowage receptacle is set during manufacture and should not need adjustment. But if this proves necessary it can be adjusted by removing selected washers from its mounting screws. If such adjustment should be made it may cause hatrack stowage to be too high relative to the ceiling: in this event the ceiling panel would have to be removed and the length of the bracket supporting the stowage receptacle can be adjusted by slotted holes within the bracket.

- (7) Unlock hatrack from its stowage attachment, return it to normal position and fold its stowage studs back to their concealed position.
- (8) Lock hatrack in its lowered position by screwing sleeve on each tension tie inboard.
- (9) Replace cover plates on holes in ceiling panels, making sure that covers are the right way round, i.e. that two holes on each plate line up with stud receptacle and release screw of stowage attachment.
- (10) Connect air, oxygen and electrical lines from each passenger service unit to their proper connection above cove.
- (11) Replace upper and lower cove covers.

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HATRACK CLOSURE PANELS - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1. General

- A. Closure panels are installed adjacent to every section of folding hatrack. They are of two types, upper and lower closure panels, extending along the passenger cabin above the hatracks in sections equal in length to their corresponding hatrack sections.
- B. Each upper closure panel section is attached to a lower closure panel section, and the two may be removed together as an assembly or may be separated during removal.
- C. The closure panels are installed in cargo-carrying and passenger-carrying configurations. In the passenger configuration the lower closure panels lie on top of the hatracks. It is not necessary that they be installed in the passenger configuration.

2. Remove Hatrack Closure Panels (See figure 401.)

- A. If hatrack is in passenger configuration, fold hatrack section down to its Hanging Position, as described in 25-10-42, Hatracks, or, Folding Hatracks.

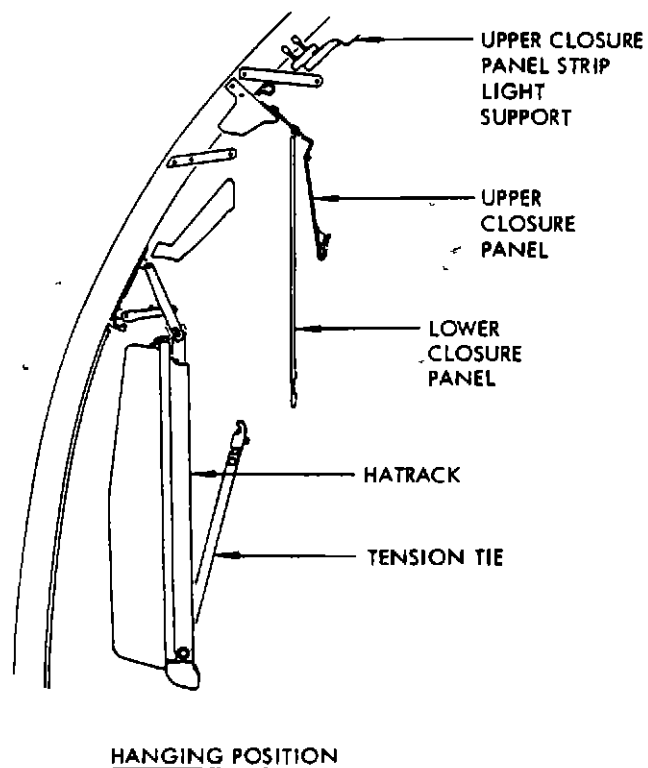
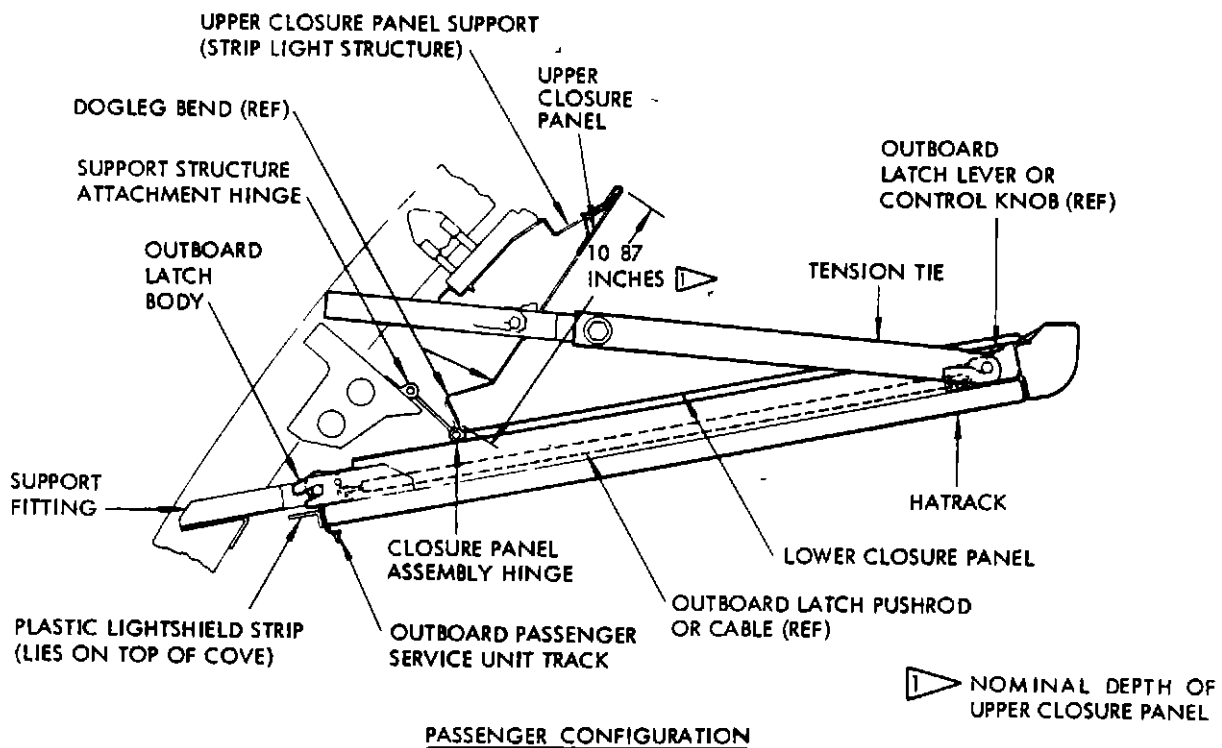
NOTE: Do not completely stow hatrack against sidewall.

- B. If hatrack is in cargo configuration, rotate locking tabs 90 degrees to disconnect lower closure panel section from upper edge of folded hatrack section. Ensure that lower closure panel swings free from its attachment to the hatrack. Hinge closure panel assembly upward and pull hooked top edge of upper closure panel inboard and up to free it from the strip light support. Allow both closure panels to hang downward.
- C. With closure panel assembly hanging freely, remove bolts from support structure attachment hinges and remove closure panel assembly.

NOTE: Upper and lower closure panels may be separated upon removal by removing the bolts in the closure panel assembly hinges instead of the bolts in the support attachment hinges.

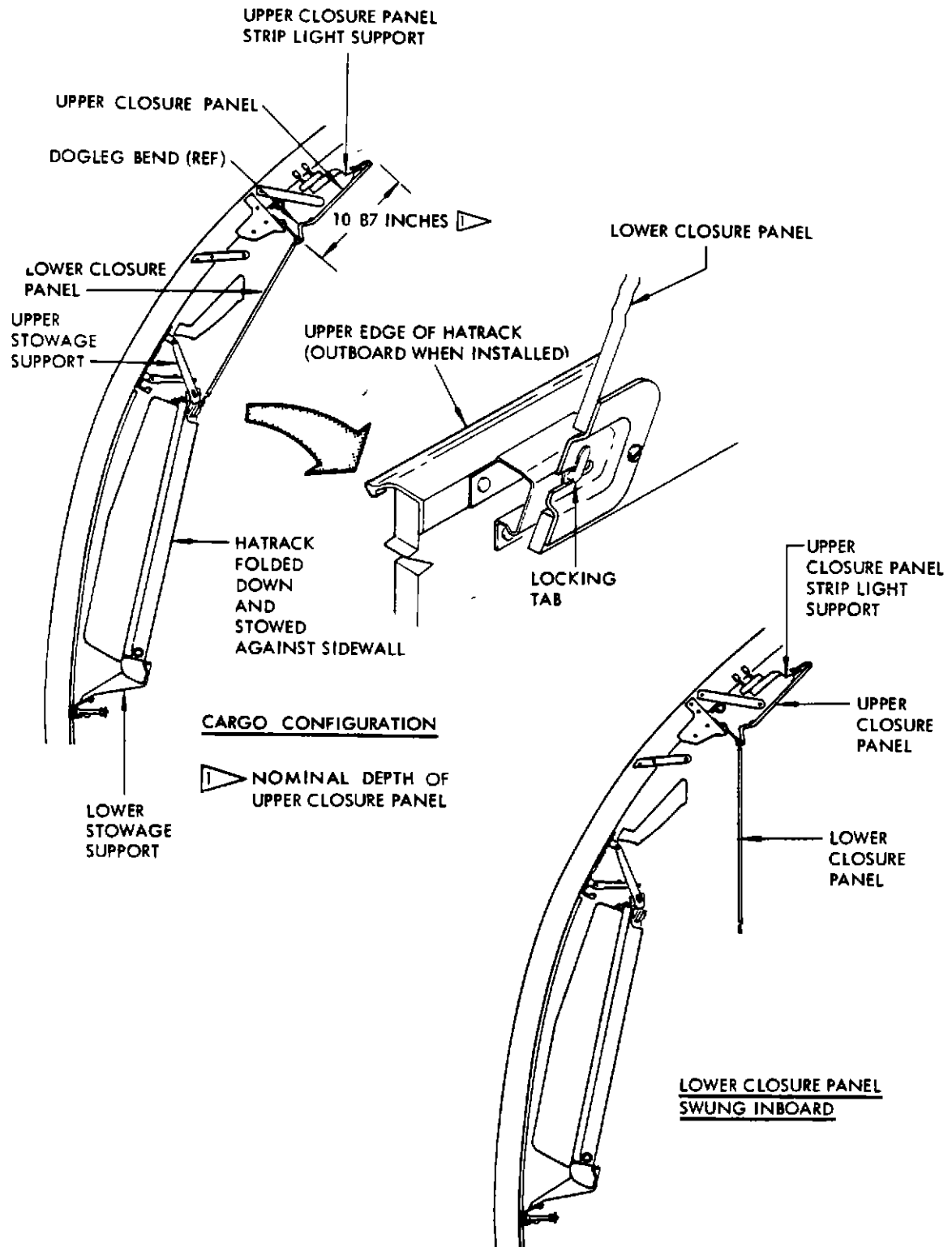
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Closure Panels Installation
Figure 401 (Sheet 1)

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3. Install Hatrack Closure Panels (See figure 401.)

- A. Check that depth of upper closure panel is in accordance with dimension shown on figure 401, and adjust if necessary.

NOTE: The upper closure panel may have become deformed through use or improper handling, causing it to fit poorly over the strip light support. If its depth does not agree with the dimension on the figure, manually stretch or compress the upper closure panel, by changing the angles at the "dogleg," or joggle, along the lower edge of the panel.

- B Place closure panel assembly in position on support structure engaging hinges in attachments and install hinge bolts and nuts. Allow panels to hang down freely.

NOTE: If upper and lower closure panels were separated upon removal install bolts and nuts in assembly hinges instead of support structure hinges.

- C. If hatrack is in cargo configuration, hinge closure panel assembly upward and hook top edge of upper closure panel over strip light support. Swing lower edge of lower closure panel against upper edge of folded hatrack and attach closure panel to hatrack by rotating locking tabs 90 degrees. Check that upper closure panel fits firmly over strip light support, and readjust, if necessary.
- D. To restore hatrack to passenger configuration refer to 25-10-42, Hatracks, or, Folding Hatracks.



MAINTENANCE MANUAL

PASSENGER CABIN TEMPERATURE SENSOR AIR INLET GRILLE - REMOVAL/INSTALLATION

EFFECTIVITY

AF	F-BLGD and on
SABENA	OO-SJJ and on
IIA	EI-ANV and on
CAL	N17325 and on
FTL	N324F and on
ELAL	4X-ATR and on
NWA	707-351B and N365US and on
TWA	all Turbofan except N746TW thru N759TW

1. General

- A. Maintaining unobstructed flow of cabin air around the passenger cabin temperature sensor is necessary for optimum operation of the temperature control system. For this reason it is essential to keep the sensor air inlet grille clean.
- B. In order to clean the grille, it must be removed from the hatrack inboard edge (bullnose). To avoid possibility of damaging the grille on removal, a simple tool may be fabricated from either a thin piece of spring steel or heat treated aluminum. Refer to figure 401.

2. Remove Air Inlet Grille

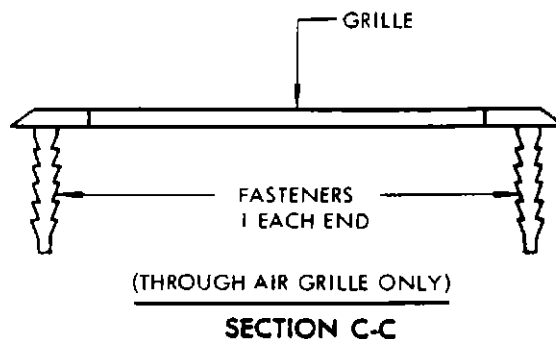
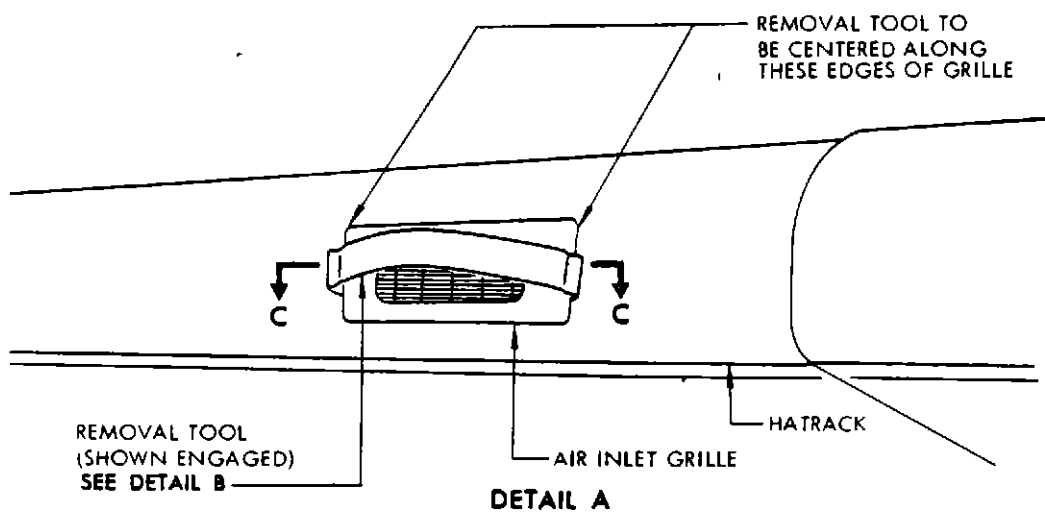
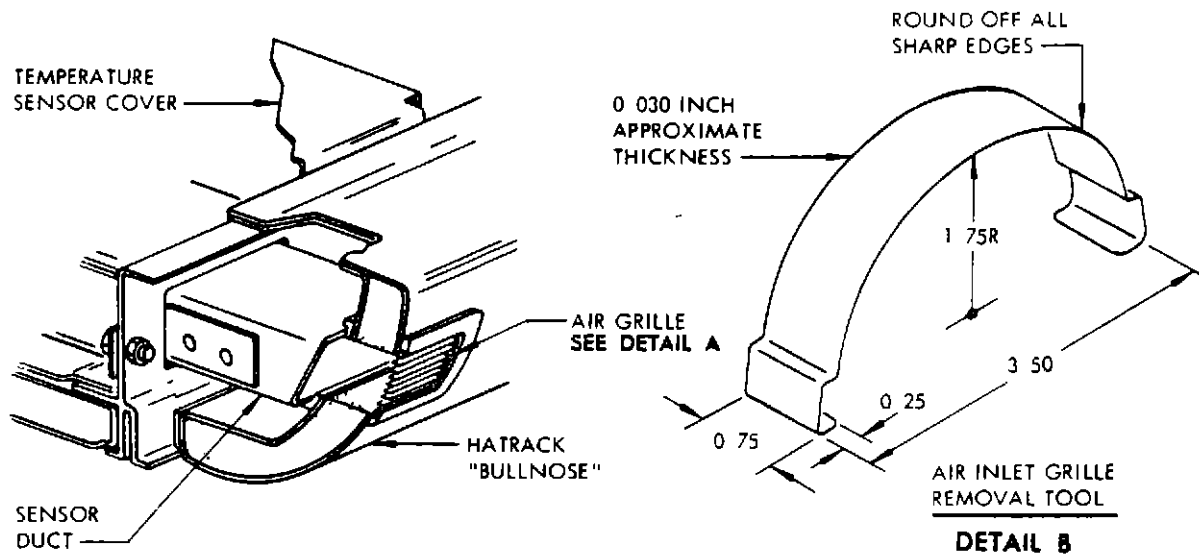
- A. Insert tabs of tool between bullnose and flange of grille. Center tool with respect to the grille vertical edges. Grasp center of tool, and pull straight out away from bullnose. Be careful that force exerted is approximately the same on both ends of the grille.

CAUTION STUDS ON THE GRILLE FIT INTO FASTENERS IN THE BULLNOSE. UNLESS THE FORCE IS EVENLY DISTRIBUTED, THE STUDS MAY BE BROKEN AND DAMAGE THE GRILLE BEYOND REPAIR.

3. Install Air Inlet Grille

- A. Locate grille so that studs are in line with fasteners and press evenly toward bullnose until flanges are flush with bullnose.

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MAINTENANCE MANUAL



Passenger Cabin Temperature
 Sensor Air Inlet Grille Installation
 Figure 401



MAINTENANCE MANUAL

FIXED HATRACKS - REMOVAL/INSTALLATION

1 General

- A Fixed hatracks, located aft of galley No 2 and at the forward and aft edges of the main cargo door, are used to fill gaps in the hatrack-areas (See figure 401)

2 Removal/Installation Galley Area Fixed Hatracks

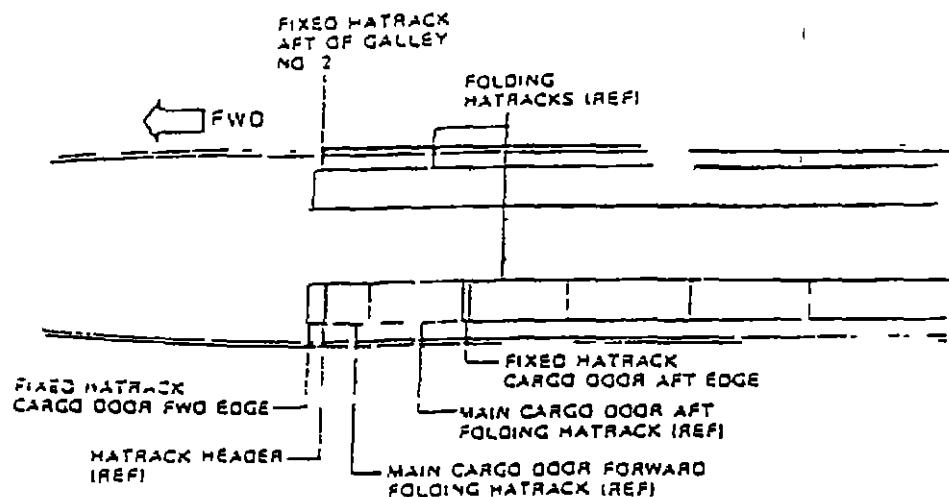
A General

- (1) The fixed atrack section installed aft of galley No 2 is supported by a tension tie, outboard attachments to the structure and attachments to the adjacent folding hatrack section

B Remove Fixed Hatrack Aft of Galley No 2 (See figure 402)

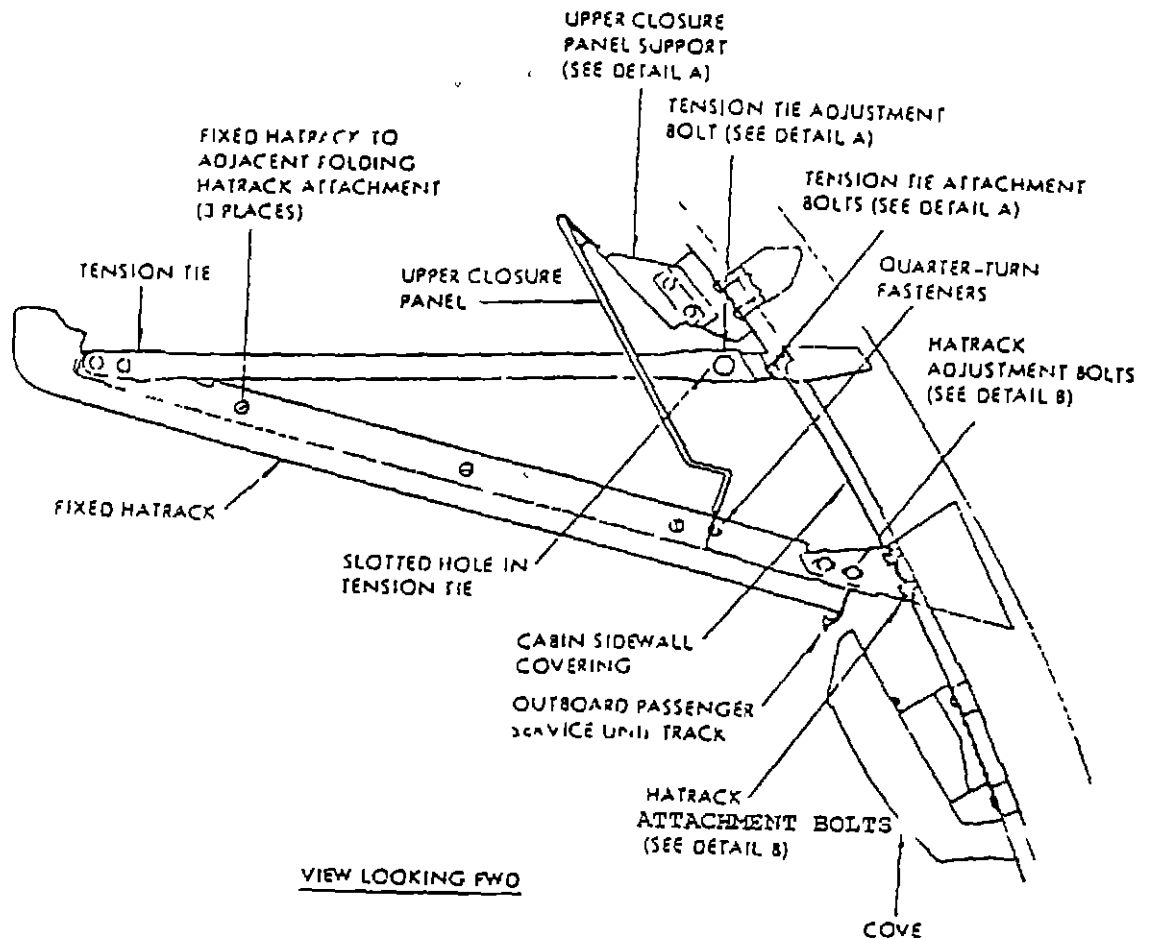
- (1) Disconnect quarter-turn cowl fasteners at lower edge of upper closure panel and lift panel off its upper support
- (2) If passenger service unit is installed to fixed hatrack section, disconnect air, oxygen and electrical services to service unit
Refer to 25-12-2, Passenger Cabin Service Units

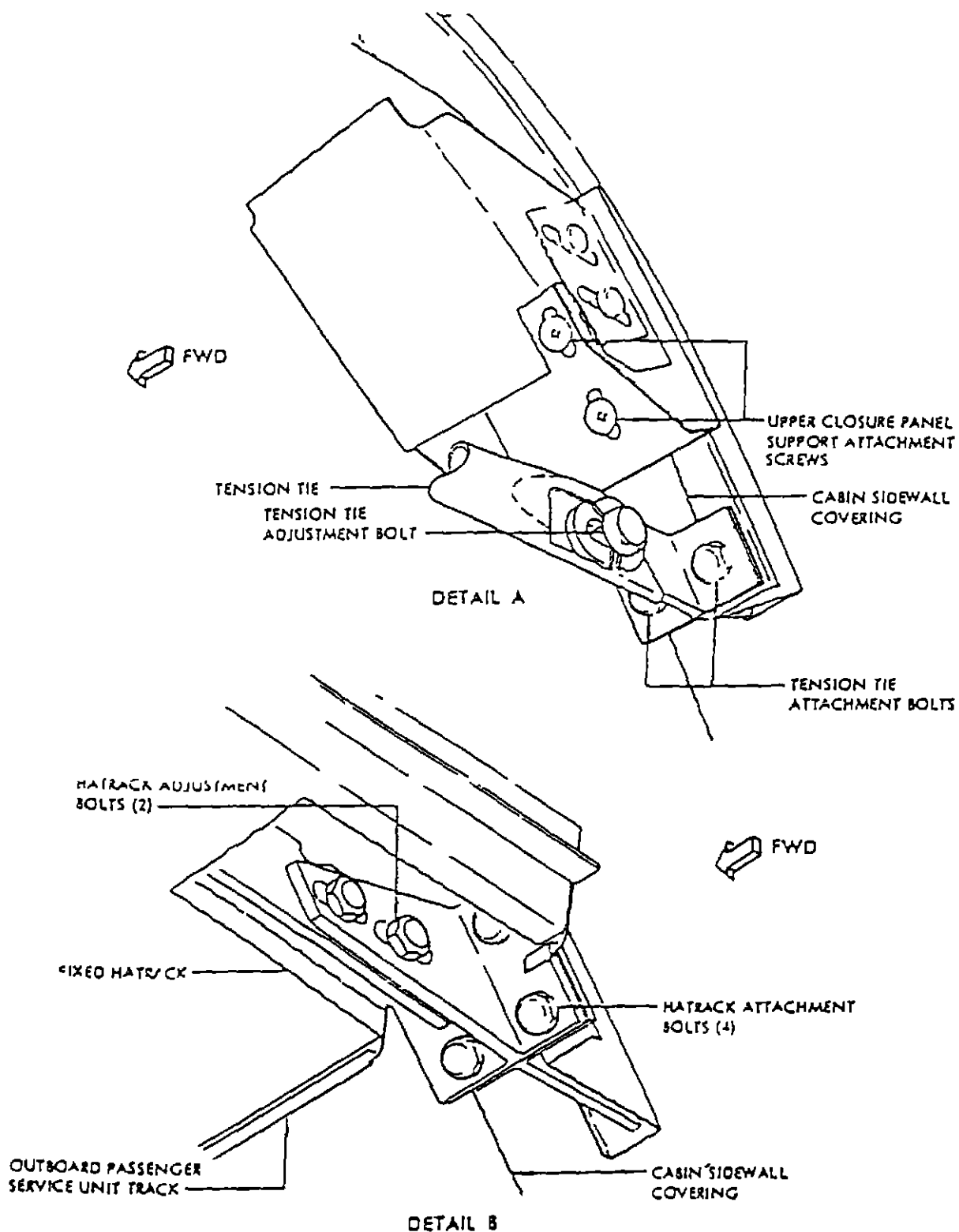
NOTE Passenger service unit may be removed from hatrack or may remain installed to it



Fixed hatrack Location
Figure 401

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Fixed Hatrack (Aft of Galley No. 2) Installation
 Figure 402 (Sheet 2)



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- (3) Support hatrack and remove bolts attaching tension tie to cabin sidewall
- (4) Remove bolts attaching outboard support to cabin sidewall and remove screws attaching fixed hatrack to adjacent folding hatrack section

C Install Fixed Hatrack (See figure 402)

- (1) Install screws attaching fixed hatrack to adjacent folding hatrack section
- (2) Install bolts attaching outboard support to cabin sidewall
- (3) Install bolts attaching tension tie to cabin sidewall
- (4) Install passenger service unit if required Refer to 25-12-2, Passenger Cabin Service Unit
- (5) Connect air, oxygen and electrical services to passenger service unit Refer to 25-12-2, Passenger Cabin Service Unit
- (6) Engage upper edge of upper closure panel over closure panel upper support and install quarter-turn cowl fasteners at bottom edge of upper closure panel

3 Removal/Installation Fixed Hatrack Aft Edge of Main Cargo Door

A Remove Fixed Hatrack (See figure 403)

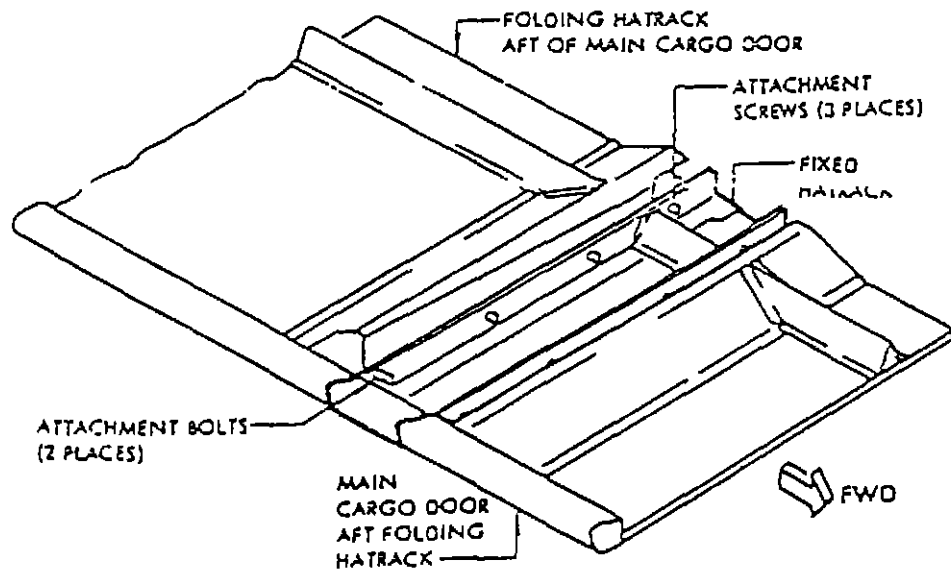
- (1) Disconnect quarter-turn cowl fasteners at closure panel and lift panel off its upper support
- (2) If passenger service unit is installed on fixed hatrack, relocate service unit to folding hatrack section forward or aft of fixed hatrack Refer to 25-12-2, Passenger Cabin Service Units
- (3) Remove screws and bolts attaching fixed hatrack to adjacent folding hatrack section

B Install Fixed Hatrack (See figure 403)

- (1) Set fixed hatrack in position against sidewall and adjacent folding hatrack section
- (2) Install screws and bolts attaching fixed hatrack to adjacent folding hatrack section

NOTE The folding hatracks are provided with slotted holes for the attachment bolts allowing lateral (inboard-outboard) adjustment of the fixed hatracks

- (3) Engage upper edge of upper closure panel over closure panel upper support and install quarter-turn cowl fasteners at bottom edge of upper closure panel



Fixed Hatrack (Aft Edge of Main Cargo Door) Installation
Figure 403



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4 Removal /Installation Fixed Hatrack Forward Edge of Main Cargo Door

A General

- (1) The fixed hatrack section installed at the forward edge of the main cargo door is supported by a tension tie, outboard attachments to the structure and attachments to the adjacent partition. The method of attaching this hatrack is similar to that used on the fixed hatrack aft of galley No 2. See figure 402.
- (2) A hatrack header may be installed on the forward end of the forward hatrack on the main cargo door. Refer to 25-10-48, Hatrack Headers.

B Remove Fixed Hatrack Forward Edge of Main Cargo Door (See figure 404)

- (1) Disconnect quarter-turn cowl fasteners at lower edge of upper closure panel and lift panel off its upper support.
- (2) If passenger service unit is installed to fixed hatrack section, disconnect air, oxygen and electrical services to service unit. Refer to 25-12-2, Passenger Cabin Service Units.

NOTE Passenger service unit may be removed from hatrack or may remain installed to it.

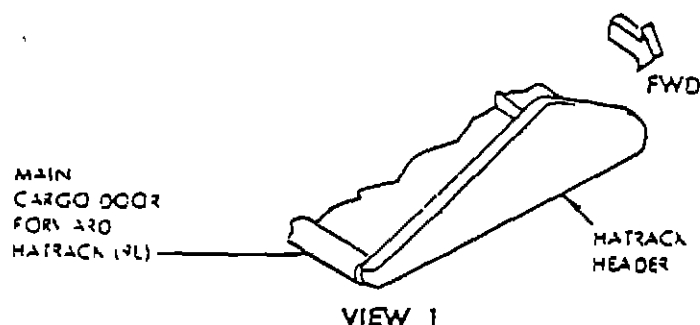
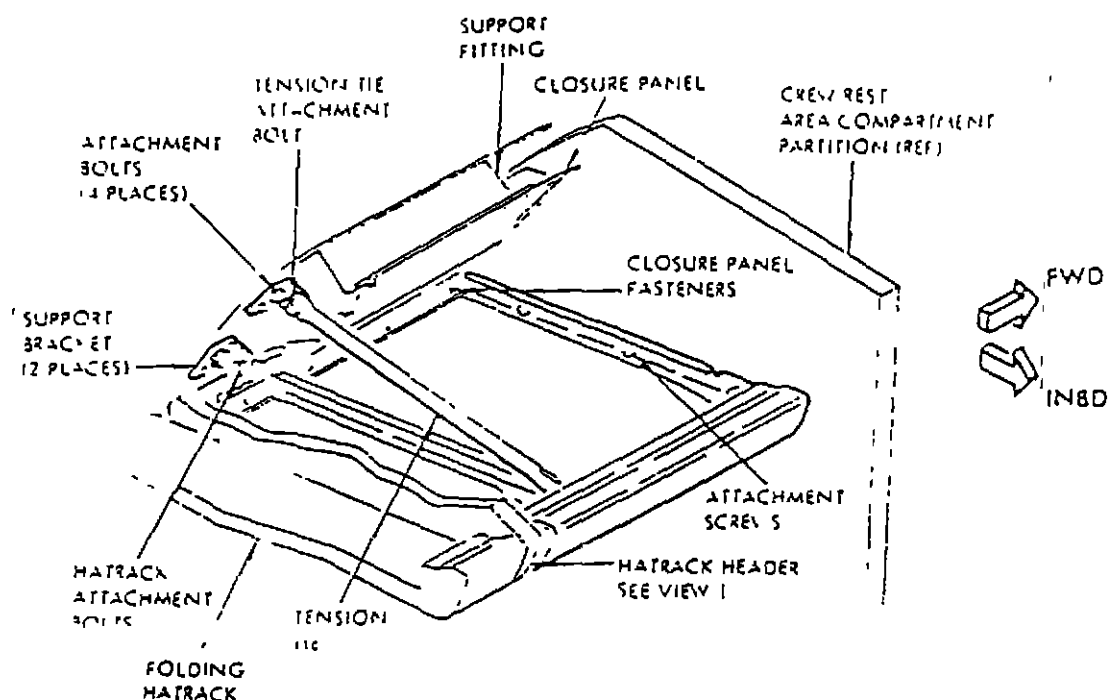
- (3) Support hatrack and remove bolts attaching tension tie to cabin sidewall.
- (4) Remove bolts attaching outboard support to cabin sidewall and remove screws attaching fixed hatrack to adjacent partition.
- (5) Remove hatrack.

C Install Fixed Hatrack (See figure 404)

- (1) Support hatrack in installed position.
- (2) Install screws attaching fixed hatrack to adjacent partition.
- (3) Install bolts attaching outboard support to cabin sidewall.
- (4) Install bolts attaching tension tie to cabin sidewall.

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- (5) Install passenger service unit if required. Refer to 25-12-2, Passenger Cabin Service Unit.
- (6) Connect air, oxygen and electrical services to passenger service unit. Refer to 25-12-2, Passenger Cabin Service Unit.
- (7) Engage upper edge of upper closure panel over closure panel upper support and install quarter-turn cowling fasteners at bottom edge of upper closure panel.



Fixed hatrack (Forward Edge of Main Cargo Door) Installation
Figure 404





MAINTENANCE MANUAL

HATRACK HEADERS - REMOVAL/INSTALLATION

1. General

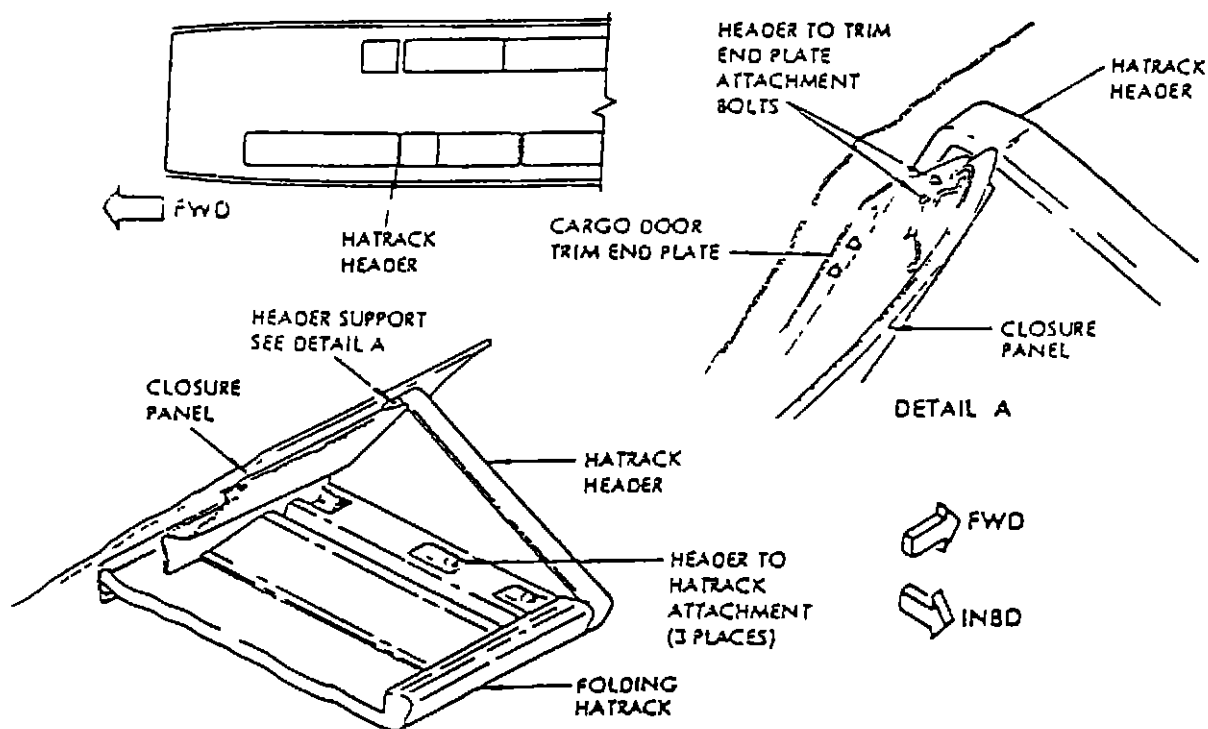
- 4 A hatrack header is located on the forward end of the forward left folding hatrack. The header serves as a filler between the end of the hatrack section and the passenger cabin ceiling lining panel. Hatrack headers are not located at the aft end or on the right side since the hatrack ends abut against partitions.

2. Remove Hatrack Header (See figure 401.)

- A. Remove three screws attaching hatrack header to adjacent folding hatrack section.
- B. Remove header by removing two bolts attaching header to cargo door trim end plate.

3. Install Hatrack Header (See figure 401.)

- 4 Place header in position against end of folding hatrack section and install three screws attaching header to hatrack.
- 3 Secure header to cargo door trim end plate with two bolts.



Hatrack Header Installation
Figure 401

LOUNGE MISCELLANEOUS EQUIPMENT - MAINTENANCE PRACTICES

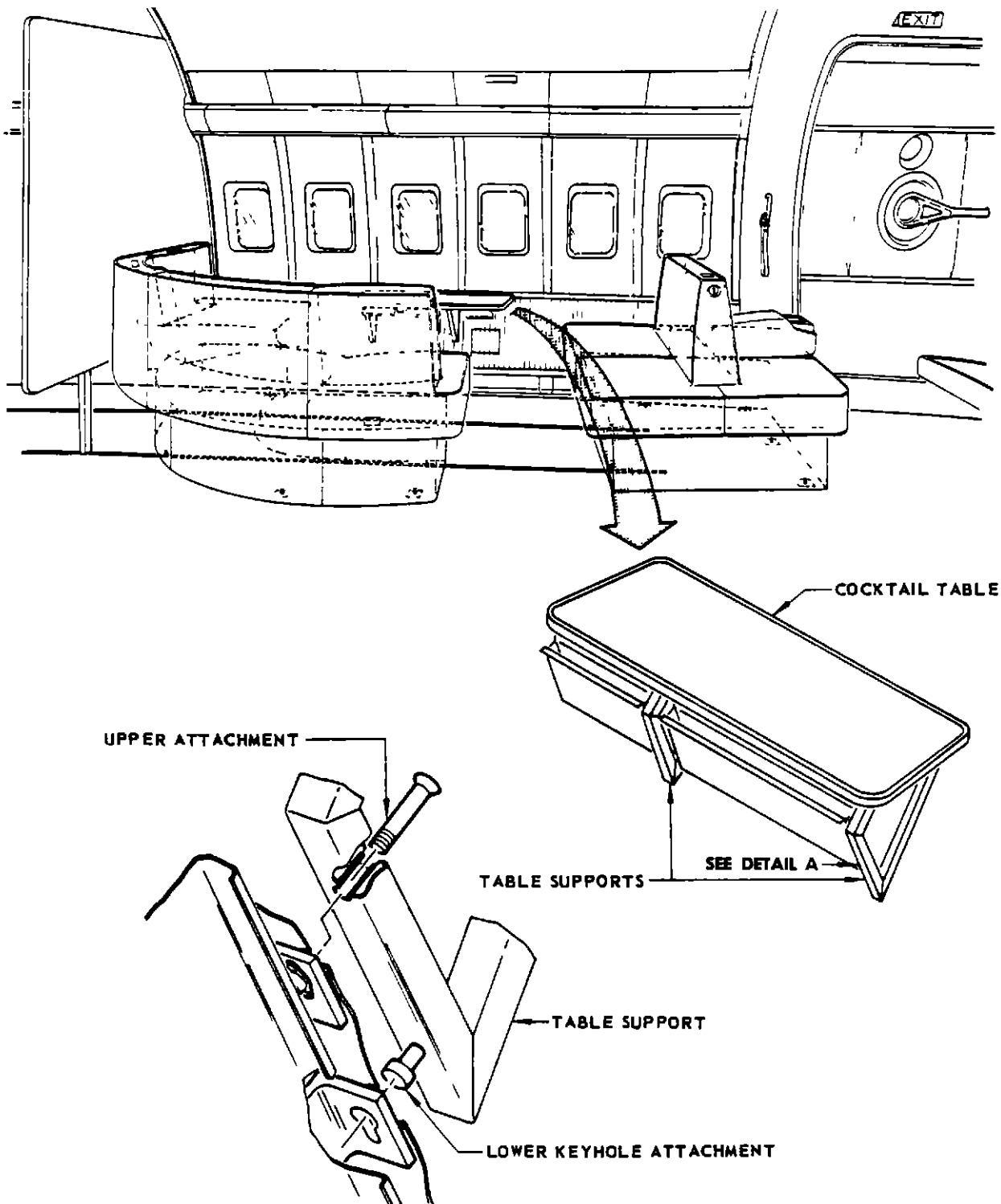
1. Removal/Installation Wall Table

A. Remove Wall Table

- (1) Remove two screws from wall table attach support.
- (2) Lift table up and pull out, to clear studs from keyhole slots.
- (3) Disengage and remove table.

B. Install Wall Table

- (1) Place table in proper position.
- (2) Insert studs in keyhole slots and push table down to lock studs in slots.
- (3) Install two screws in table attach supports.



DETAIL A

— —
MAINTENANCE MANUAL

DOOR LINING AND INSULATION - MAINTENANCE PRACTICES

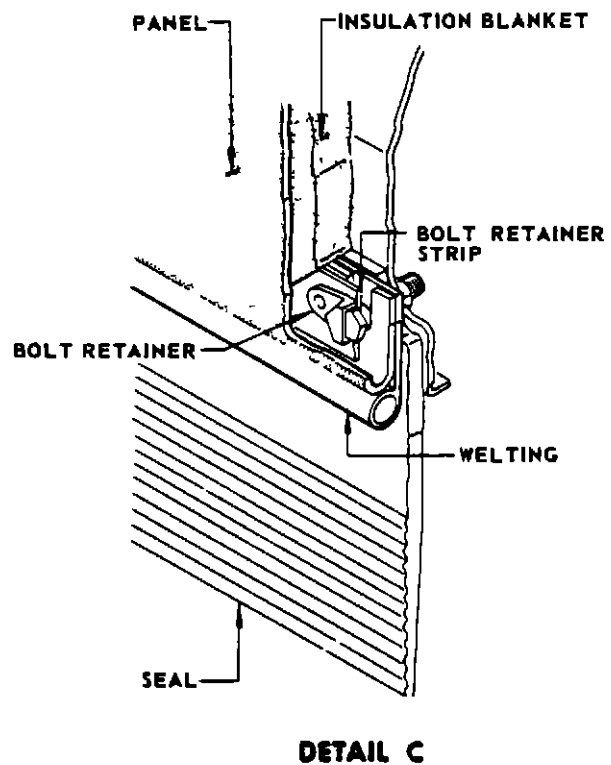
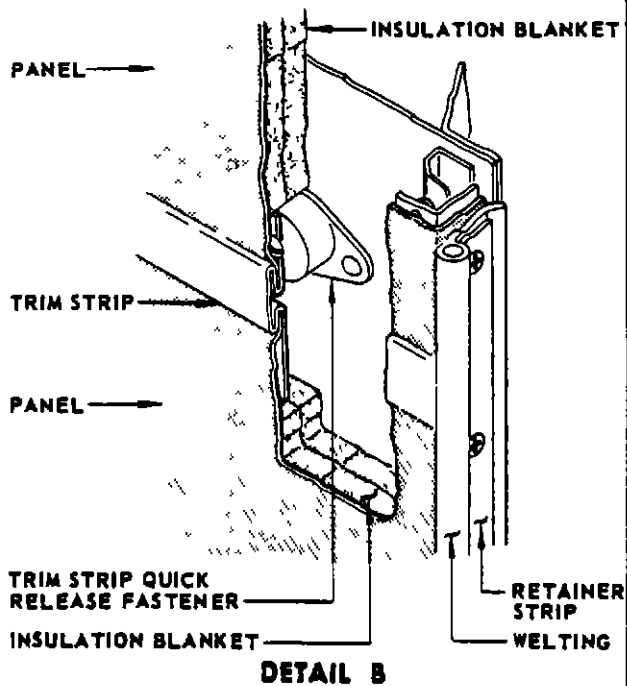
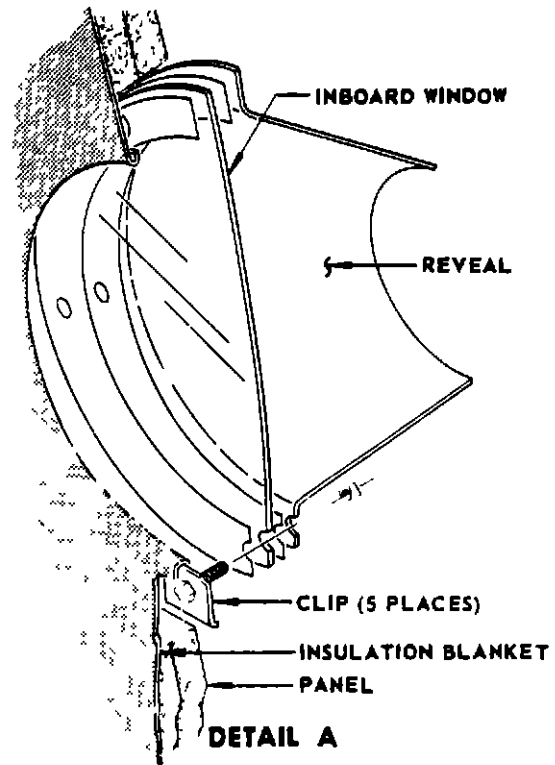
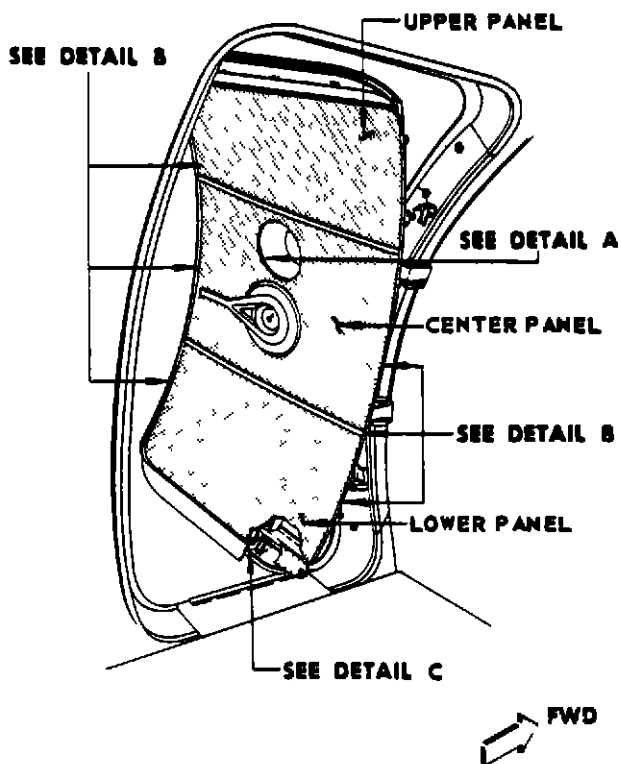
1. Removal/Installation Entry Door Panels - Turbojet Airplanes (See figure 201.)

A. Remove Entry Door Panels

NOTE: When removing panel with window assemblies, inboard window assembly will be removed with panel.

- (1) Remove upper panel.
 - (a) Loosen nuts at upper edge of panel.
 - (b) Remove screws, welting, and retaining strips from forward and aft door edges.
 - (c) To remove panel, pull upper edge inboard and up, then pull up to release panel from trim strip.
- (2) Remove center panel.
 - (a) Remove entry door handle. (See Chapter 52, "Entry Doors.")
 - (b) Remove screws from escutcheon plate and remove plate.
 - (c) Remove screws, welting, and retaining strips from forward and aft door edges.
 - (d) To remove panel pull panel inboard to release panel from trim strips.
- (3) Remove lower panel.
 - (a) Loosen nuts at lower edge of panel.
 - (b) Remove screws, welting, and retaining strips from forward and aft door edges.
 - (c) To remove panel pull lower edge inboard and down, then pull down to release panel from trim strip.
- (4) Remove inboard window assembly by removing retaining nuts.
- (5) Remove trim strips.

NOTE: Trim strip fasteners are quick release type and require one-quarter turn to disengage.



Main Entry Door Panel Installation
Figure 201

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B. Install Entry Door Panel

- (1) Install trim strips.

NOTE: Trim strip fasteners are quick release type and require one-quarter turn to disengage.

- (2) Install inboard window assembly by installing retaining nuts.
- (3) Install lower panel.

- (a) Position panel, welting, and retaining strips in proper position and insert panel in trim strip.

- (b) Tighten nuts at lower edge of panel.

- (c) Install screws in forward and aft door edge.

- (4) Install center panel.

- (a) Position panel, welting, and retaining strips in proper position and insert panel in upper and lower trim strips.

- (b) Install screws in forward and aft door edge.

- (c) Install escutcheon plate.

- (d) Install entry door handle. (See Chapter 52, "Entry Doors.")

- (5) Install upper panel.

- (a) Position panel, welting, and retaining strips in proper position and insert panel in trim strip.

- (b) Tighten nuts at upper edge of panel.

- (c) Install screws in forward and aft door edge.

2. Removal/Installation Entry Door Panels - Cargo Airplanes (See figure 202.)

A. Remove Entry Door Panels

NOTE: When removing panel with window assemblies, inboard window assembly will be removed with panel.

- (1) Remove upper panel.

- (a) Loosen nuts at upper end of panel.

MAINTENANCE MANUAL

- (b) Remove screws, welting, and retaining strips from forward and aft door edges.
- (c) To remove panel, pull upper edge inboard, then pull up to release panel from trim strip.
- (2) Remove escape slide compartment.
 - (a) To remove escape slide compartment from forward entry door, remove four nuts on outboard side of sweeper seal retainer and pull lower compartment edge out and down to free upper edge from "Z" retainer.
 - (b) To remove escape slide compartment from aft entry door, remove five screws from trim attach angle located on lower edge of door, and pull lower compartment edge out and down to free upper edge from "Z" retainer.
- (3) Remove lower panel.
 - (a) Remove entry door handle. See Chapter 52, "Entry Doors."
 - (b) Loosen nuts at lower edge of panel.
 - (c) Remove screws, welting, and retaining strips from forward and aft door edges.
 - (d) To remove panel, pull lower edge out and down to release panel from trim strip.
- (4) Remove inboard window assembly by removing retaining nuts.
- (5) Remove trim strips.

NOTE. Trim strip fasteners are quick release type and require one-quarter turn to disengage.

B. Install Entry Door Panel.

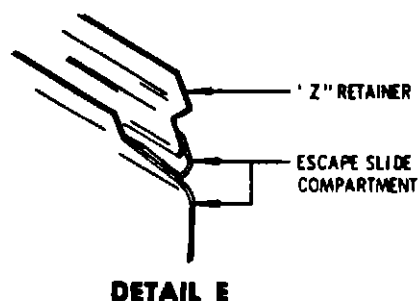
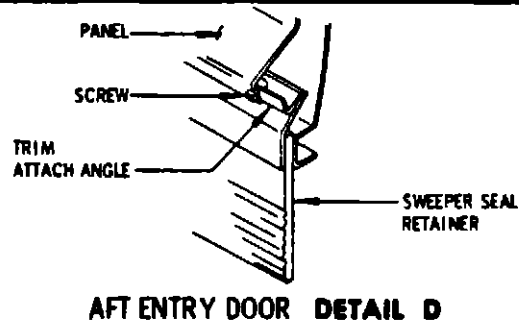
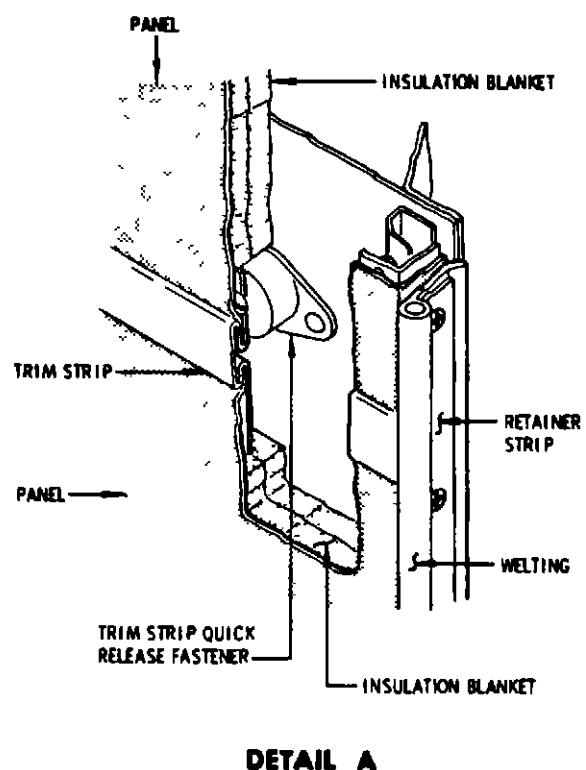
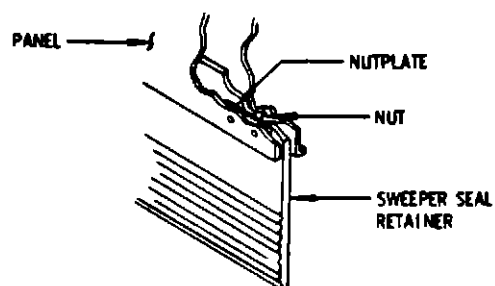
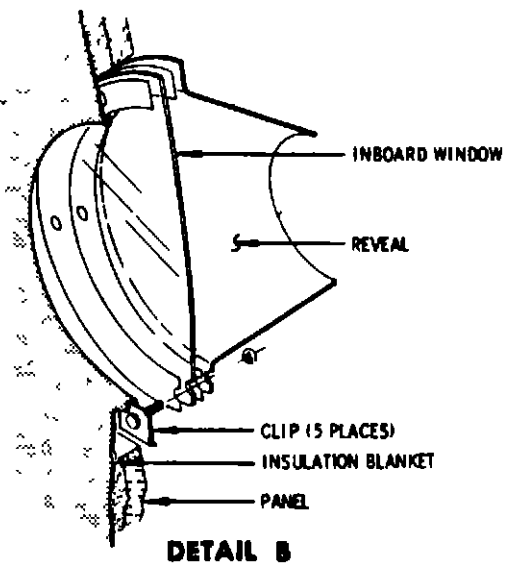
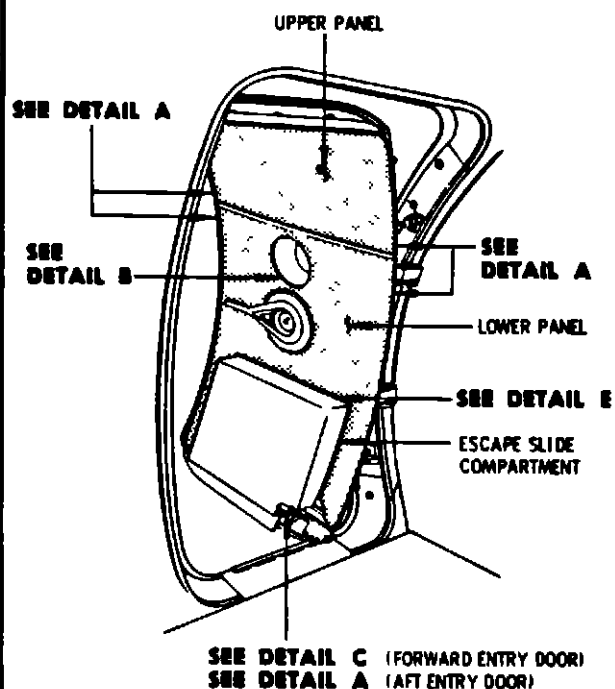
- (1) Install Trim Strips

NOTE: Trim strip fasteners are quick release type and require one-quarter turn to disengage.

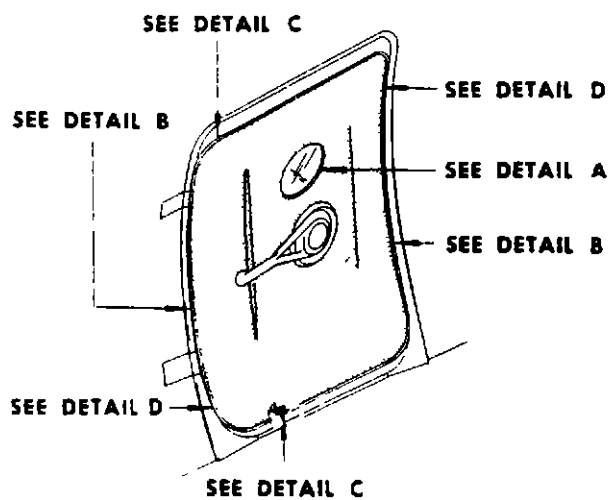
- (2) Install inboard window assembly by installing retaining nuts.

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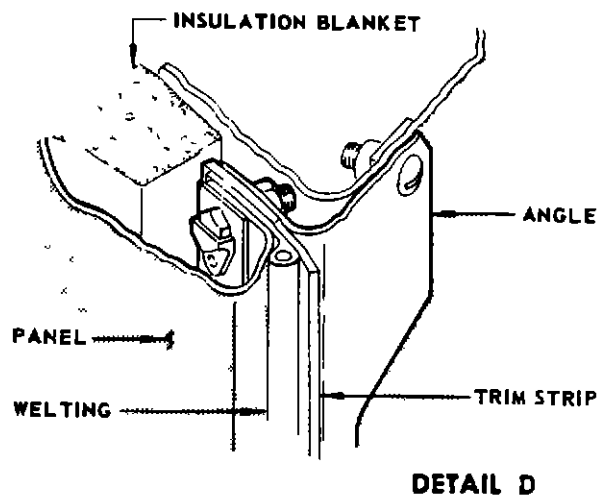
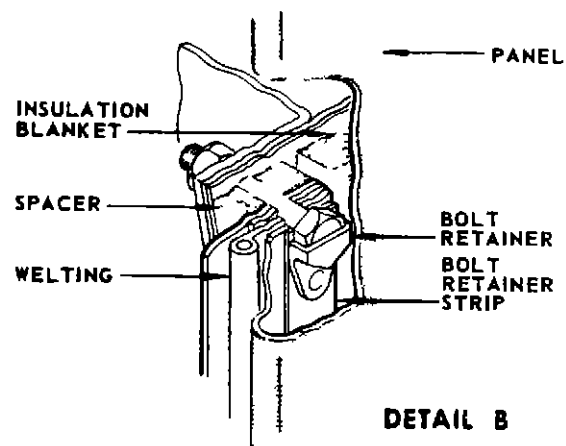
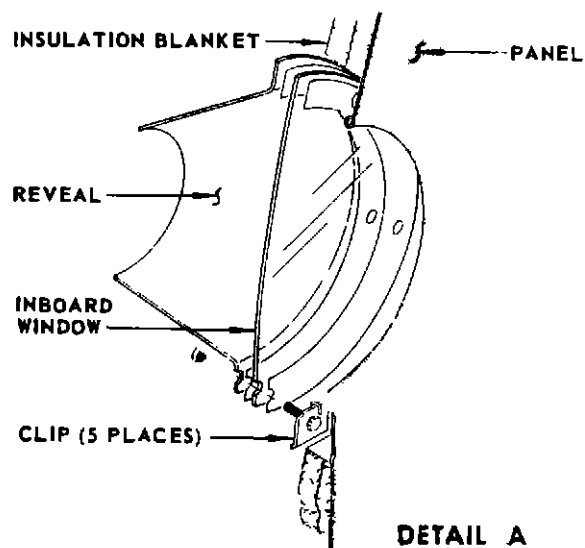
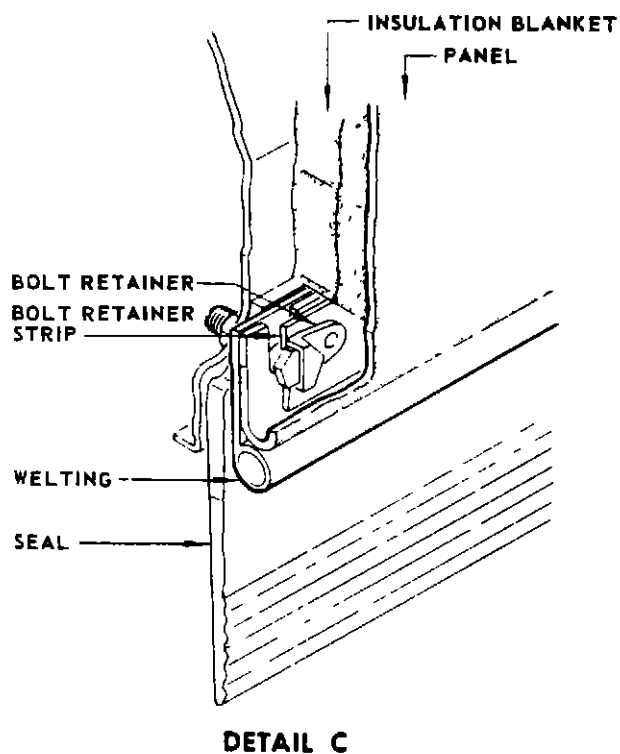
- (3) Install lower panel.
 - (a) Position panel, welting, and retaining strips in proper position and insert panel in trim strip.
 - (b) Tighten nuts at lower edge of panel.
 - (c) Install screws in forward and aft door edge.
 - (d) Install entry door handle. See Chapter 52, "Entry Doors."
 - (4) Install escape slide compartment
 - (a) To install escape slide compartment on aft entry door, insert upper edge into "Z" retainer and insert five screws into trim attach angle located on lower edge of door
 - (b) To install escape slide compartment on forward entry door, insert upper edge into "Z" retainer and attach four nuts to outboard side of sweeper seal retainer on lower edge of door
 - (5) Install upper panel.
 - (a) Position panel, welting, and retaining strips in proper position and insert panel in trim strip.
 - (b) Tighten nuts at upper edge of panel.
 - (c) Install screws in forward and aft door edge.
3. Removal/Installation Galley Service Door Panel (See figure 203.)
- A. Remove Galley Service Door Panel
- NOTE: When removing panel inboard window assembly will be removed with panel.



Main Entry Door Panel Installation
 Figure 202



FWD



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- (1) Remove galley service door handle See Chapter 52, Galley Service Doors
- (2) Remove four screws from escutcheon plate
- (3) Remove bolts and screws from outer edge of panel
- (4) Remove welting and panel from door structure.

NOTE Galley door insulation blanket is cemented to outboard side of galley door panel to form one assembly

B Install Galley Service Door Panel

- (1) Position panel and welting on door structure.
- (2) Install bolts and screws at outer edge of panel
- (3) Position escutcheon plate and install four screws.
- (4) Install galley service door handle. See Chapter 52, Galley Service Doors.

4. Removal/Installation Main Cargo Door Lining (Cargo Airplanes)

- A** For removal/installation procedure, refer to Chapter 52, Main Cargo Door Lining.

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EMERGENCY EXIT HATCH LINING - REMOVAL/INSTALLATION

1. General

- A. The following instructions are typical for removal and installation of emergency exit hatch lining at any one of the four exit hatches. These do not include the removal/installation of emergency exit hatch insulation blankets and emergency exit hatch heating blankets. For removal/installation of heating blankets, refer to Escape Hatch Heating Blankets, Chapter 21. For removal/installation of insulation blankets, refer to 25-19-0.

2. Equipment and Materials

- A. Interior Trim Remover Assembly, F70038 or equivalent, for removing snap-on trim without marring or tearing vinyl covering
- B. Wood block or any non-metallic block, approximately 3/4 x 1 x 5 inches, to apply pressure for trim snap-on action

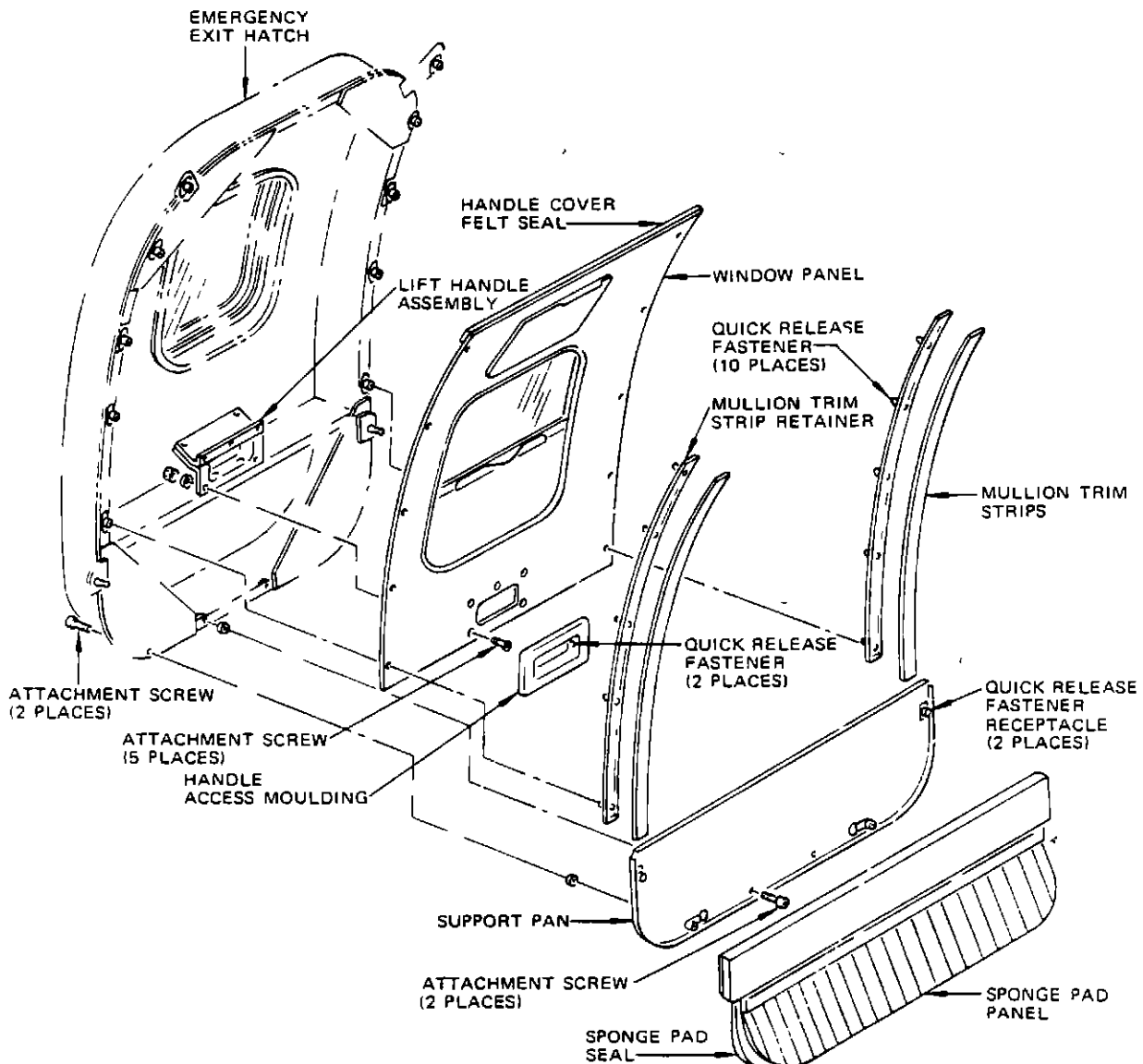
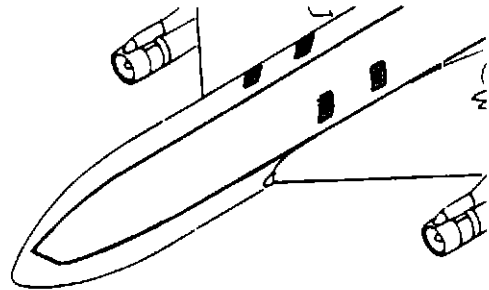
3. Prepare for Removal

- A. If the exit hatch is provided with heating blankets, open circuit breaker affecting escape hatch heater.
- B. Remove exit hatch. Refer to Emergency Exit Hatch, Chapter 52.
- C. If an armrest is installed at exit hatch, remove armrest. Refer to 25-11-21, Armrests on Escape Hatches - Removal/Installation.

4. Remove Emergency Exit Hatch Lining

- A. Release snap-on dado panel floating trim along bottom of window panel.
- B. Remove two quick-release fasteners securing handle access moulding, and remove moulding. (See figure 401.)
- C. Remove five attachment screws located underneath handle access moulding.
- D. Remove sponge pad panel and seal.
- E. Remove four attachment screws attaching support pan to hatch structure.

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NOTE INSULATION BLANKET
 NOT SHOWN FOR CLARITY

Emergency Exit Hatch Lining Installation —
 Figure 401



MAINTENANCE MANUAL

- F. Pull support pan inboard to disconnect two quick-release fasteners, and remove support pan.
 - G. Remove two sidewall mullion trim strips from retainers using special tool.
 - H. Release five quick-release fasteners securing each mullion trim strip retainer, and remove mullion trim strip retainers.
 - I. On airplanes provided with heating blankets, carefully unplug electrical connection to remove window panel. For more information on heating blankets, refer to Escape Hatch Heating Blankets, Chapter 21.
 - J. Remove window panel.
 - K. If necessary, remove two flat head screws securing lift handle assembly and remove lift handle assembly.
5. Install Emergency Exit Hatch Lining
- A. If lift handle assembly was removed before, install lift handle assembly and secure with two attachment screws. (See figure 401.)
 - B. Set window panel in position to hatch structure.
 - C. On airplanes provided with heading blankets, plug electrical connection.
 - D. Install mullion trim strip retainers along both edges of hatch. Secure retainers with quick-release fasteners.
 - E. Install two mullion trim strips on retainers.
- NOTE. Use wood block or any nonmetallic block to apply pressure for trim snap-on action.
- F. Install support pan and secure with two quick-release fasteners and four attachment screws.
 - G. Install sponge pad seal and panel.
 - H. Install five attachment screws securing window panel to lift handle assembly.
 - I. Install handle access moulding and secure with two quick-release fasteners.
 - J. Engage snap-on dado panel floating trim along bottom of window panel.

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6. Restore Airplane to Normal

- A. If armrest is previously removed, replace armrest. Refer to 25-11-21, Armrests on Escape Hatches.
- B. Install exit hatch. Refer to Emergency Exit Hatch, Chapter 52.
- C. Close circuit breaker.

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EMERGENCY EXIT HATCH LINING (STATION 990) - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1. General

- A. The following procedure is typical for removal and installation of emergency exit hatch lining at any one of the two exit hatches at station 990. This does not include the removal/installation of emergency exit hatch insulation blankets and emergency exit hatch heating blankets. On applicable airplanes, for removal/installation of heating blankets, refer to Escape Hatch Heating Blankets, Chapter 21. For removal/installation of insulation blankets, refer to 25-19-0.

2. Equipment and Materials

- A Interior Trim Remover Assembly, F70038 or equivalent, for removing snap-on trim without marring or tearing vinyl covering
- B Wood block or any nonmetallic block, approximately 3/4 x 1 x 5 inches, to apply pressure for trim snap-on action

3. Prepare for Removal

- A On emergency exit hatch provided with heating blankets, open exit hatch heater circuit breaker.
- B Remove emergency exit hatch. Refer to Emergency Exit Hatch, Chapter 52.
- C If an armrest is installed at exit hatch, remove armrest. Refer to 25-11-21, Armrest on Escape Hatches - Removal/Installation.

4. Remove Emergency Exit Hatch Lining

- A Remove emergency exit hatch window panel. (See figure 401.)
- (1) Release snap-on dado floating trim along bottom of window panel.
- (2) Remove studs securing molding around hatch lifting handle, and remove molding.
- (3) Remove flathead screws located underneath lifting handle molding.



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- (4) Remove mullion trim strip from retainer assemblies along each edge of hatch using special tool.
- (5) Remove screws securing each mullion trim strip retainer, and remove mullion trim strip retainers.
- (6) On emergency exit hatch provided with heating blankets, carefully unplug electrical connection to remove window panel.
- (7) On all emergency exit hatches, lift window panel free of dado panel floating trim, and remove panel with remaining attachments.

B. Remove dado panel floating trim.

NOTE: On emergency exit hatch provided with heating blankets, to remove dado panel floating trim, it will be necessary to unbolt ground strap bonded to trim from airframe ground strap.

C. Remove dado panel.

- (1) Remove screws securing dado panel above air grille stiffener or bottom trim at bottom of hatch.
- (2) Remove fastening screws along the forward and aft edges of hatch, and remove dado panel, air grille stiffener or bottom trim and hatch seal along bottom of hatch.

NOTE: On emergency exit hatch provided with heating blankets, to remove air grille stiffener, it will be necessary to unbolt ground strap attached to trim from airframe ground strap.

5. Install Emergency Exit Hatch Lining

A. Install dado panel. (See figure 401.)

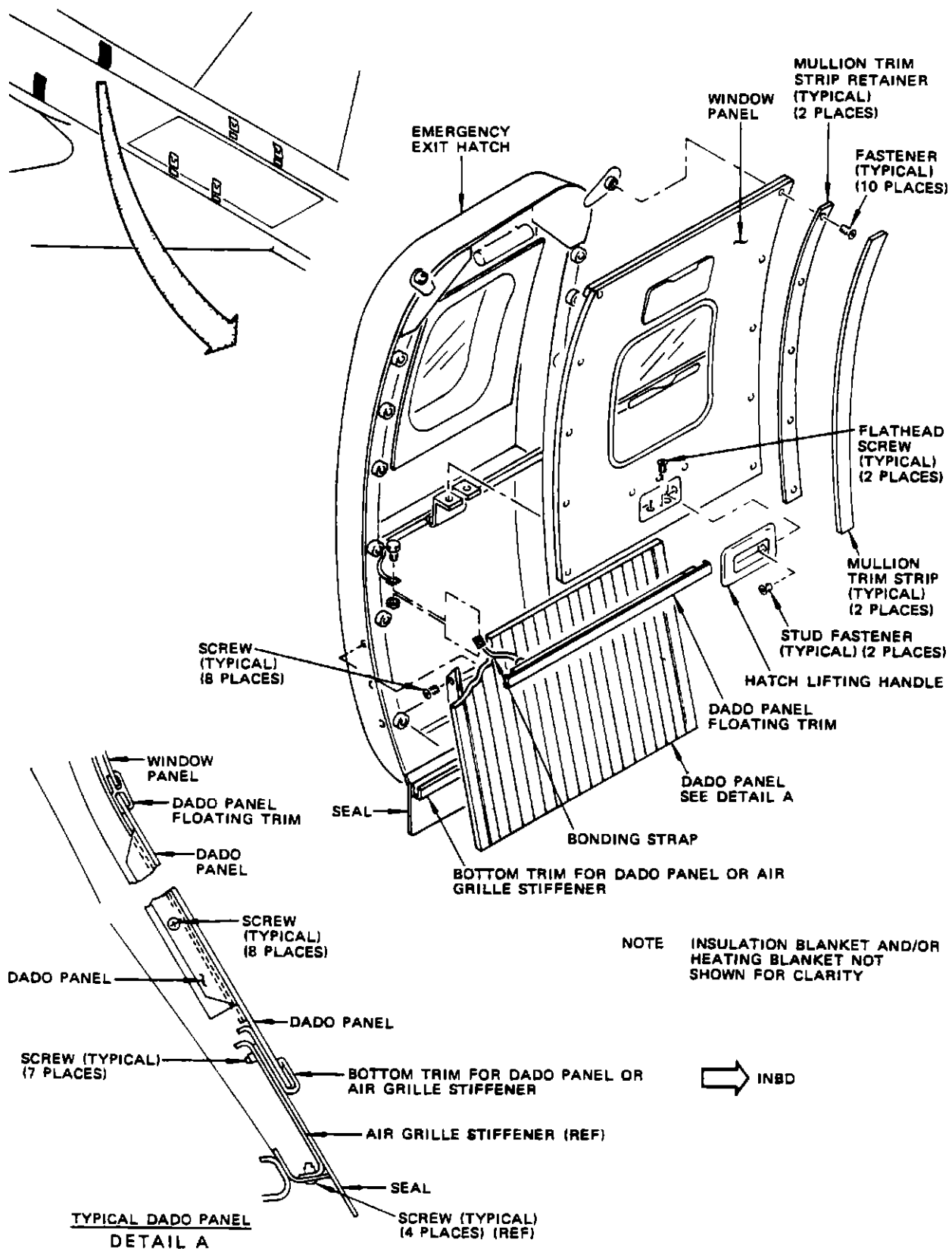
- (1) Set dado panel, air grille stiffener, and seal assembly in position on hatch.
- (2) Install screws above air grille stiffener securing bottom of dado panel. On emergency exit hatch provided with heating blankets, install ground strap.
- (3) Install screws along fore and aft edges of hatch.

B. Set dado panel floating trim in position along top of dado panel. On emergency exit hatch provided with heating blankets, reinstall ground strap.

C. Install emergency exit hatch window panel.

- (1) Set window panel in position in dado panel floating trim.

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Typical Emergency Exit Hatch Lining (Sta 990) Installation
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- (2) On airplanes provided with heating blankets, plug electrical connection.
- (3) Install mullion trim strip retainers along both edges of hatch. Secure retainers with screws.
- (4) Install mullion trim strip on retainer.

CAUTION: DO NOT USE BARE HANDS OR FINGER PRESSURE EXCEPT WHEN ABSOLUTELY NECESSARY TO SNAP-ON TRIM. LOCALIZED PRESSURE TENDS TO DEFORM TRIM STRIP.

NOTE: Use wood block or any nonmetallic block to apply pressure for trim snap-on action.

- (5) Install flathead screws securing window panel in hatch lifting handle area.
- (6) Install hatch lifting handle molding and install stud fasteners securing molding.
- (7) Engage snap-on dado panel floating trim along bottom of window panel.

6. Restore Airplane to Normal

- A. If an armrest is previously removed, replace armrest. Refer to 25-11-21, Armrest on Escape Hatches.
- B. Install exit hatch. Refer to Emergency Exit Hatch, Chapter 52.
- C. On emergency exit hatch provided with heating blankets, close exit hatch heater circuit breaker.

BERTHS - REMOVAL/INSTALLATION

1 Remove Berth Assembly (See figure 401)

A Remove berth closure panel

(1) Remove lower molding trim strip

(2) Remove fasteners from lower edge of closure panel

NOTE Fasteners are 1/4 turn quick-release type

(3) Remove garment bag

(4) Pull bottom of closure panel inboard and push up to remove

B Disconnect air and electrical supply to upper and lower berth service units

C Disconnect and cap oxygen supply to upper and lower berth service units (See Chapter 35, Passenger Oxygen System)

D Remove upper berth service unit (See 25-12-21, and Chapter 35, Passenger Oxygen System)

E Remove linkage covers if installed

F Remove ball lockpins from upper and lower attachments and remove berth

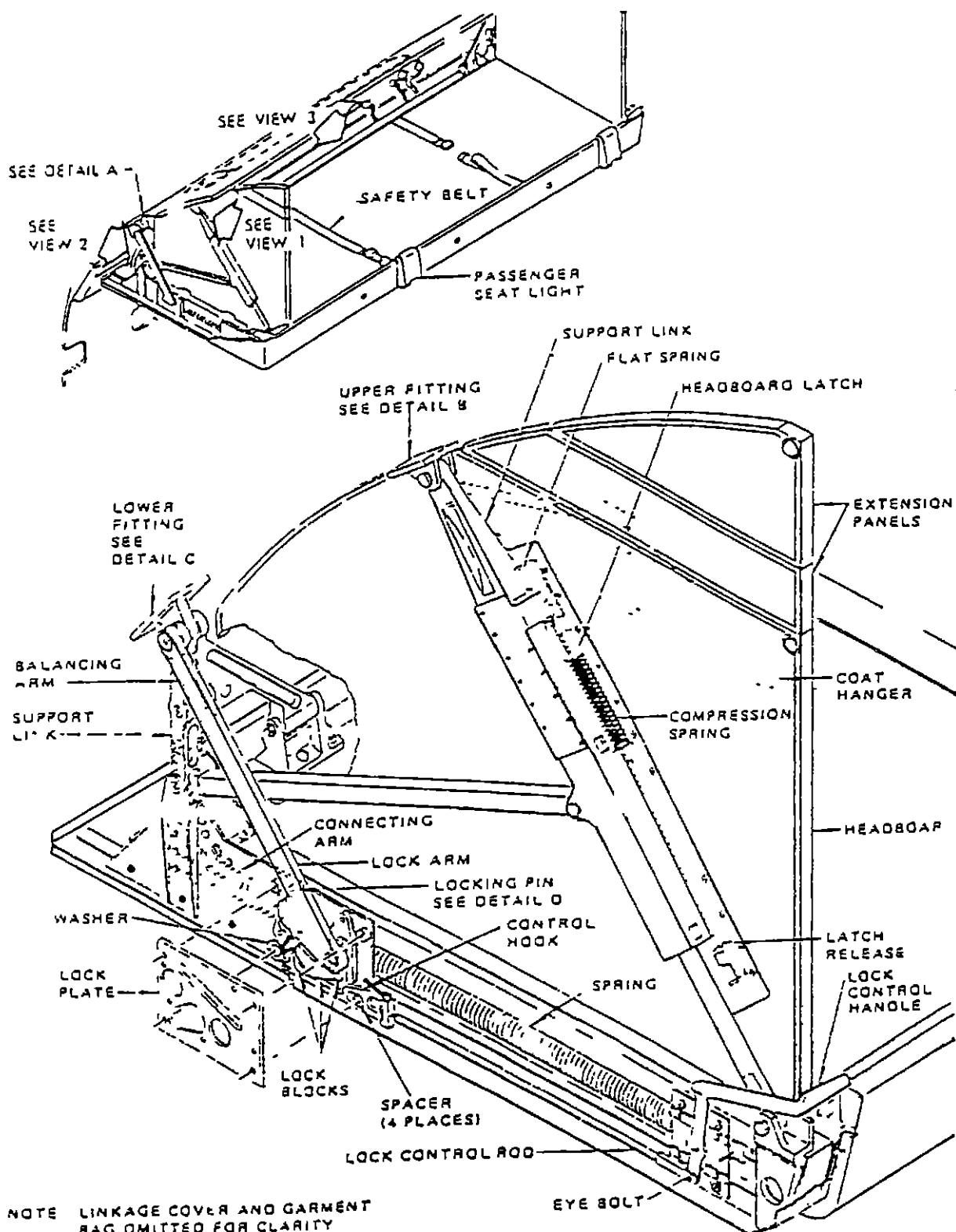
CAUTION INSERT LOCKBOLTS AT EACH OUTBOARD END OF BERTH ASSEMBLY
REMOVING ATTACHMENT PINS

G Remove lower attachment fitting

H Remove upper attachment fitting

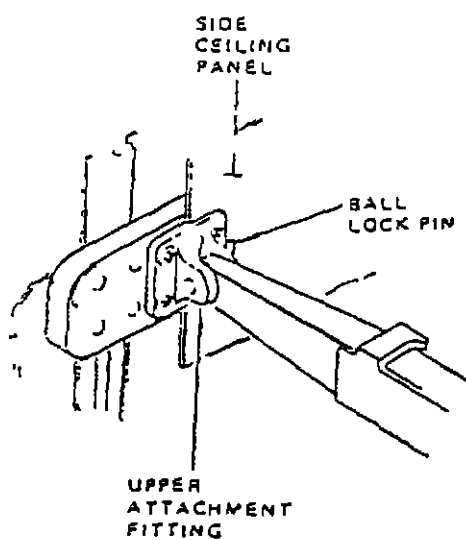
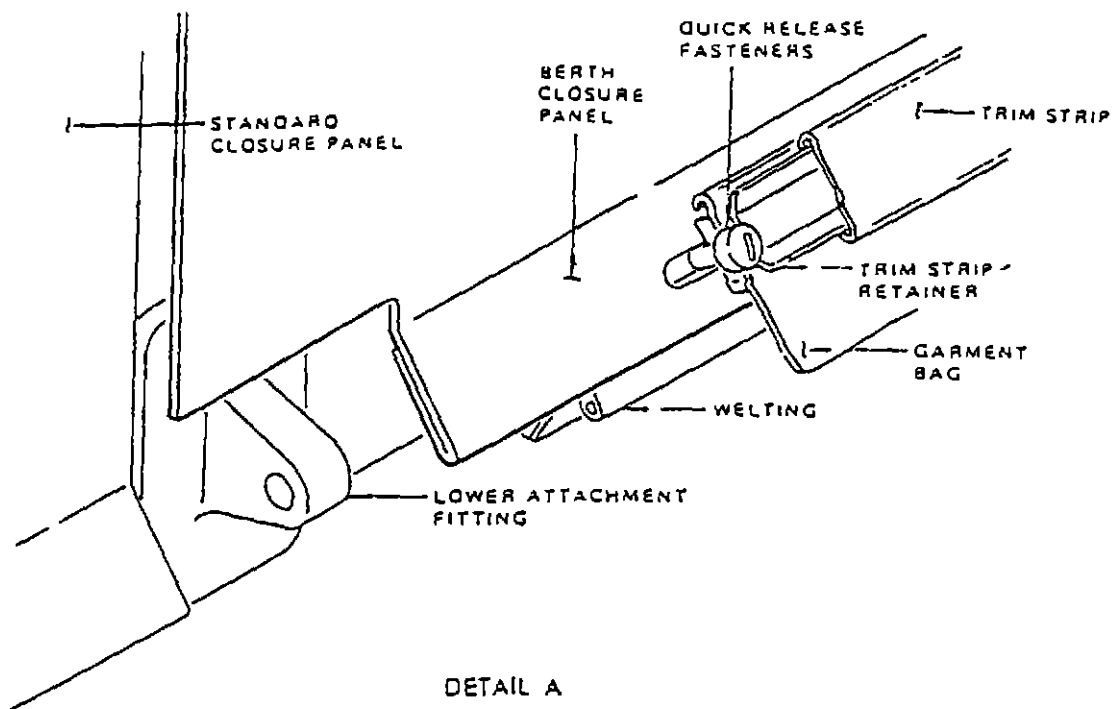
I Install cover over upper attachment plate

J Install lower-hatrack fitting

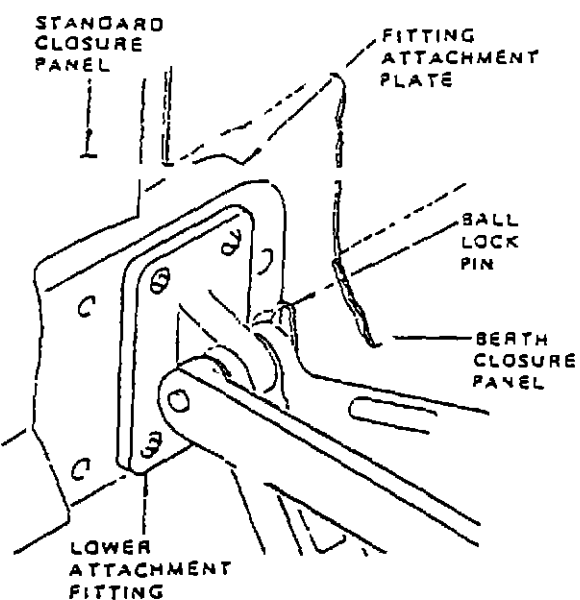


Berth Installation
Figure 401 (Sheet 1)

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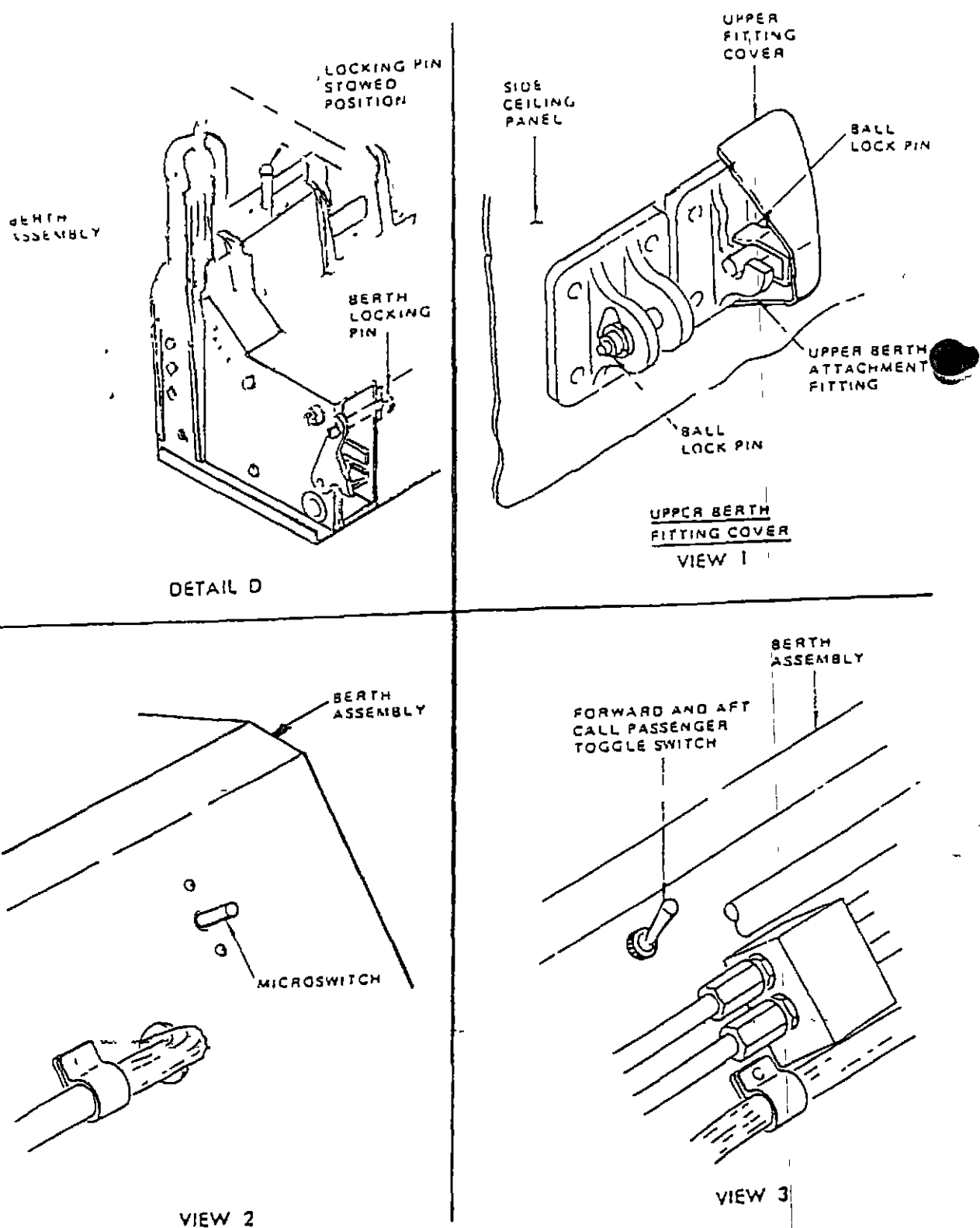
DETAIL B



DETAIL C

Berth Installation
Figure 401 (Sheet 2)

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Berth Installation
Figure 401 (Sheet 3)



K Install standard closure panel (See 25-10-21)

L Install hatrack sections as required (See 25-10-42)

NOTE In areas where hatrack sections abut area of removed berth assemblies, the hatrack tension tie-rods adjacent to the berth must be replaced with standard tension tie-rods

M Install passenger service units as required (See 25-12-1, and Chapter 35, Passenger Oxygen System)

2 Install-Berth Assembly (See figure 401)

A Remove passenger service units as required (See 25-12-1, and Chapter 35, Passenger Oxygen System)

B Remove hatrack sections as required (See 25-10-42)

NOTE In areas where hatrack sections abut berth assemblies, the hatrack tension tie-rods adjacent to the berth must be replaced with a passenger berth kit tension tie-rod

C Remove standard closure panel (See 25-10-21)

D Remove cover from upper attachment plate

E Remove lower hatrack fitting

F Install lower attachment fitting

G Install upper attachment fitting

H Install upper berth service unit (See 25-12-21 and Chapter 35, Passenger Oxygen System)

NOTE Upper service unit should be installed with light at headboard end of berth

I Install berth closure panel

(1) Position closure panel and engage upper lip attachment,, then pull down to engage lip

J Position berth assembly and Insert upper and lower ball lockpins

NOTE Insert ball lockpins with head on berth sides of fitting



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K Connect air and electrical supply fittings

NOTE Lower service units must be installed with cold air outlets forward

L Remove cap from oxygen tubing and connect oxygen supply (See Chapter 35, Passenger Oxygen System)

M Install garment bag

N Install fasteners in lower edge of closure panel

NOTE Fasteners are 1/4-turn quick-release type

O Install lower molding trim strip

F Remove lockbolts at each outboard end of berth assembly

NOTE Check operation of passenger call. If passenger call does not operate place two position switch in opposite position.

Q Position linkage covers and engage snap fasteners

NOTE Linkage covers are installed to improve appearance

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INTERIOR MATERIALS - MAINTENANCE PRACTICES

1. General

- A. This section of the maintenance manual describes the procedures to be used when cleaning or repairing the various decorative materials of the airplane interior. It incorporates the information in Boeing Document D6-1910, Repair Procedures for Interior Materials on Commercial Aircraft
- B. Figure 1 tabulates the various decorative materials and specifies the number of the cleaning and repair methods recommended for each type of material.
- C. Decorative interiors are originally finished with lacquers in a controlled factory environment. However, certain latex paints of equivalent color may be used as optional decorative finishes. Such paints may be applied without normal safety precautions normally required during lacquer applications, and thus may be applied with power on the aircraft. The recommended brands of latex paints are as follows
 - (1) Atlas AC500 - XX, Atlas Chemical Co., Miami, Florida
 - (2) Walker W32 - XXXX, Walker Paint Co., Sunnyvale, California

NOTE. In both cases, the identification "X" indicates color-code letter or digit.

2. Cleaning Methods

A. General

- (1) The following Cleaning Methods numbered 1 thru 7, correspond with the numbers listed in figure 201 as methods of cleaning aircraft interiors.

B. Cleaning Methods No. 1

- (1) Equipment and Materials
 - (a) Soap, Orvus or Vel
- (2) Clean:
 - (a) Clean vinyl surfaces by use of mild soap (Orvus WA Paste or Vel and lukewarm water).
 - (b) Rinse with clean water and wipe dry with clean cloth.



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MATERIAL	CLEANING METHOD NO.	REPAIR METHOD NO.	
		TYPE I	TYPE II
Vinyl-Aluminum Laminate	1, 3, 4	2, 4	5, 12, 13
Unsupported Semi-Rigid Vinyl	1, 3, 4	2, 4	5, 6, 14
Fabric Supported Vinyl and Vinyl-Coated Fabrics	1, 3, 4	2, 4	5, 7
Semi-Rigid and Rigid Boltaron and Royalite	2, 3, 4 1, 3, 4	2, 4	5, 7
Cycolac	1, 3, 4	1	3 followed by 1
Silk-Screened Rigid Vinyl	1, 3, 4	1, 2	
PVC Extrusions and Moldings	5	6	6
Leather	3	1	8
Flexible Urethane Foam	3		9, 10
Nylon	4, 5, 6	11	
Stainless Steel	1, 3, 5	16	
Anodized Aluminum	1, 3, 5	17	
Decorative Formica	1, 5, 7	19	18, 21
Tedlar-Covered Vinyl	1, 2, 3	20 23	
Tedlar-Covered Conolite	3, 5, 7	19, 23	21
Perforated Panels	1, 3	22	24
Textured Finishes	7	25	25
Duracote 200A	1, 3	26	

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- 1 ▷ Type I Damage Scratches and small cuts; damage which affects only the surface texture.
- 2 ▷ Type II Damage. Cuts or tears which completely penetrate the decorative material.
- 3 ▷ Unpainted
- 4 ▷ Painted
- 5 ▷ Remove old adhesive by light sanding or scraping. Clean faying surfaces prior to bonding with ethyl alcohol.
- 6 ▷ Rebonding, Method 15.
- 7 ▷ Non-Skydrol areas only.

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C. Cleaning Method No. 2

(1) Equipment and Materials

- (a) Cleaning Solution, Terecote No. 60 - 1 and 2

(2) Clean

- (a) Wash with clean cloth saturated with Terecote No. 60, Cleaning Solution No. 1.
- (b) Wash thoroughly with cloth saturated with Terecote No. 60, Cleaning Solution No. 2.
- (c) Wipe dry with clean cloth. Allow surface to dry thoroughly before applying finish.

D. Cleaning Method No. 3

(1) Equipment and Materials

- (a) Ethyl Alcohol

(2) Clean.

- (a) Mix 1 part ethyl alcohol with 1 part water.
- (b) Clean greasy material by swabbing on ethyl alcohol and water solution with a clean gauze pad.
- (c) Wipe off with a clean dry gauze pad. (Do not allow solvents to evaporate from surface.)
- (d) Wipe dry.

E. Cleaning Method No. 4

(1) Equipment and Materials

- (a) Dimethyl Formanide

NOTE. Adjustment in dimethyl formanide concentration may be necessary for extrusions, lacquers, paints, etc.

WARNING DIMETHYL FORMANIDE IS EXTREMELY TOXIC AND SHOULD NOT BE ALLOWED TO COME IN CONTACT WITH THE SKIN.

- (b) Ethyl Glycol



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(2) Clean.

- (a) Mix 82 parts (by weight) dimethyl formamide with 18 parts ethylene glycol.
- (b) Moisten swab (gauze pad taped to tongue depressor or equivalent) with mixture.
- (c) Rub stained area with swab.
- (d) Dry with clean dry swab.
- (e) Drop both swabs in water.
- (f) Repeat operation if necessary.

F. Cleaning Method No. 5

(1) Equipment and Materials

- (a) Solvent, Methyl Ethyl Ketone
- (b) Swab gauze sponge taped to tongue depressor, or equivalent.

(2) Clean

- (a) Moisten swab with solvent.
- (b) Rub soiled area with swab.
- (c) Dry with dry gauze sponge.
- (d) Repeat (b) and (c) if necessary.

G. Cleaning Method No. 6

(1) Equipment and Materials

- (a) Hydrogen Peroxide

WARNING HYDROGEN PEROXIDE IS EXTREMELY TOXIC AND SHOULD NOT BE ALLOWED TO COME IN CONTACT WITH THE SKIN.

- (b) Swab gauze sponge taped to tongue depressor, or equivalent.

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(2) Clean:

- (a) Mix solution of 37 percent hydrogen peroxide in water.
- (b) Moisten swab with solution.
- (c) Rub stained area with swab.
- (d) Dry with dry gauze sponge.
- (e) Repeat (c) and (d) if necessary.

H. Cleaning Method No. 7

(1) Equipment and Materials

- (a) Solvent, Aliphatic Naphtha TT-N-95A.

(2) Clean.

- (a) Moisten gauze sponge with solvent.
- (b) Rub soiled area with gauze sponge.
- (c) Dry with clean dry gauze sponge. (Do not allow solvents to evaporate from the surface.)

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3. Repair Methods

A. General

- (1) The following Repair Methods are numbered to correspond with the numbers in figure 201 (Repair Methods for Aircraft Interiors).

B. Repair Method No. 1

(1) General

- (a) This method is used to repair slight surface abrasions.

(2) Equipment and Materials

- (a) No. 400 sandpaper, or finer.

(3) Repair (Sanding)

- (a) Rub damaged area with No. 400 sandpaper.

C. Repair Method No. 2

(1) General

- (a) This method is used to repair small cracks, gaps, or slits in the decorative material.

(2) Equipment and Materials

- (a) Tetrahydrofuran--200 grams
- (b) Cyclohexanone--200 grams
- (c) Boltaron
- (d) Royalite
- (e) Vinyl--85 to 130 grams
- (f) BAC No. 712--white silk screen vinyl ink--500 grams (vinyl ink is used only to match BAC712 white).

(3) Repair (Touch Up Solution)

- (a) Mix touch-up solution as follows

- 1) From scrap of the same type and color material to be repaired, cut quantity of small pieces.
- 2) Measure equal portions by weight of Tetrahydrofuran and Cyclohexanone.

- 3) Pour Tetrahydrofuran into quart can (with seal-tight lid).



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- 4) Combine one half of the cut scrap material in can with the Tetrahydrofuran and put on mechanical agitator (paint shaker). Scrap material will dissolve in 5 to 15 minutes depending on temperature of solvent.
- 5) When first half of scrap material is dissolved, add the Cyclohexanone and other half of cut scrap material to solution. Continue agitation until all of scrap material is dissolved. Since specific properties of these scrap materials vary, it may be necessary to make adjustments in the solvent (equal parts of Tetrahydrofuran and Cyclohexanone) and/or the scrap material proportions in order to obtain desired viscosity.
- 6) There is a slight difference in the touch-up solution after formulation when compared to the basic vinyl color. This factor (when important) may be corrected by the addition of 50 grams of silkscreen vinyl ink of the required BAC color to one quart of the touch-up solution.
- 7) When the solution is stored for any length of time it may gel slightly. The addition of a small amount of equal parts of Cyclohexanone and Tetrahydrofuran to the solution and agitation will restore it to proper viscosity.
- 8) Very small cracks, cuts, or slits may be touched up using an artist's brush. Quality of repair will depend upon the skill of repairman. Repair of silk screened rigid vinyl shall be performed as follows.
- 9) Sufficient touch-up solution shall be applied, in the form of a bead, to the crack, gap or split in the cleaned decorative material. The bead shall be approximately 1/16 of an inch higher than surface texture of damaged material.
- 10) When the material has cured but can still be dented with the fingernail, a razor blade shall be held flat against the surface of the damaged material and the bead cut off.

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D. Repair Method No. 3

(1) General

(a) This method is used to repair cracks, gaps, or splits in decorative material.

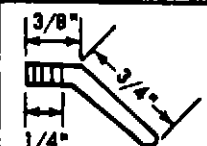
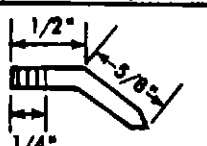
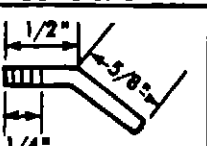
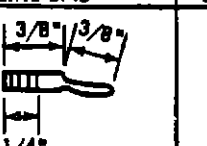
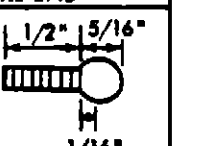
(2) Equipment and Materials

(a) Ungar Soldering Iron (with shaped tip).

(b) Variable Autotransformer (Powerstat Type 116) (Powerstat Setting 120 to 125).

(c) Shaped tips for soldering iron (Cooper, Chrome Plated) (See figure 202.)

NOTE. The tip used will depend upon the type and location of the damage and the skill of the repairman.

COPPER SMOOTH BLUNT CONE	COPPER SHARP POINTED CONE	COPPER SMOOTH ROUND END	COPPER SPOON-LIKE END	COPPER SPHERE-LIKE END
				



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(3) Repair (Heat Fused Patch)

- (a) After cleaning damaged area, cut piece of material same size, color, shade, hand surface texture as damaged material.
- (b) Place patch in damaged area.
- (c) Using soldering iron with shaped tip, point heat fuse decorative patch to match surrounding material.
- (d) After damaged material has been heated sufficiently to flow, patch shall be fused to surrounding material, using stippling motion.

NOTE. The quality of re-embossing will depend upon skill of the operator.

- (e) A patch that is over 1/8 inch wide shall be bonded with appropriate adhesive as called out on engineering drawing prior to heat fusing operation.

E. Repair Method No. 4

(1) General

- (a) This method of repair is used to re-emboss small cuts and scratches where no base material is removed.

(2) Equipment and Materials

- (a) Ungar Soldering Iron (with shaped tip)
- (b) Variable Autotransformer (Powerstat, Type 116--See Table 1.)

NOTE The tip used will depend upon the type and location of the damage and the skill of the repairman.

(3) Repair: (Hot Point Embossing)

- (a) Use soldering iron with shaped tip and point heat fuse re-emboss small cuts and scratches in decorative part where no base material is removed.



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- (b) After the damaged material has been heated sufficiently to flow, the part shall be re-embossed to produce correct surface texture by using stippling motion.

NOTE The quality of re-embossing will depend upon the skill of the operator.

F. Repair Method No. 5

(1) General

- (a) This method is used to repair cuts or tears which completely penetrate the decorative material.

(2) Equipment and Materials

- (a) Screws
- (b) Traffic Wax, Johnson's Heavy Duty or equivalent
- (c) Decorative Materials, similar to material being repaired.
- (d) Wood Frame
- (e) "C" Clamps
- (f) Hardener, Kish 50-AM
- (g) Resin, Kish 426-M
- (h) Mylar Film
- (i) Metco SF Aluminum
- (j) Cloth, Osnaburg
- (k) Resin, Epibond 126
- (l) Hardener, HN 9812
- (m) Ferro No. 7005 (white titanium dioxide)
- (n) Calcium Carbonate
- (o) X-Acto Knife No. 1 and X-Acto Blade No. 11

(3) Repair. (Epoxy Sweep - Fairing)



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(a) Splash Casting Procedure for Embossing Mylar Film.

- 1) With wood details, construct frame to one square foot (inside dimension). Nails or screws shall be used to hold frame together. The joints of frame must be tight as possible.
- 2) Apply heavy duty traffic wax to all side of wooden frame. Three coats shall be applied in order to form reliable parting surface to the wood.
- 3) Obtain piece of decorative material that will match the surface texture of material to be repaired. The size of material must be at least 4 inches in excess of the inside dimensions of wooden frame.
- 4) Clean decorative side of material with aliphatic naphtha (TP-C-95A) in accordance with cleaning Method 7.
- 5) Place decorative material texture side up on small surface table.
- 6) Apply parting film of heavy duty traffic wax to textured surface of vinyl. Remove excess wax by polishing.
- 7) Place wood frame on decorative material and clamp to table surface with "C" clamps.
- 8) Accurately weigh and thoroughly mix the following materials (Stir slowly. Do not mechanically agitate.)

100 parts by weight - Kish 426M Resin

18 parts by weight - Kish 50AM Hardener

NOTE: The total volume of resin to be used will depend on the size of splash casting required. This procedure is not limited to casting size. The 12 x 12 inch casting described herein is an arbitrary dimension. The dimensions of the splash casting are limited to the platen size of the press to be used for embossing the mylar film.



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- 9) Deaerate mixture for approximately 10 minutes using Bell jar and vacuum pump.
 - 10) Pour resin slowly onto prepared surface of decorative material. The mixture shall be poured as close as possible to surface of decorative material in order to prevent air inclusions in the casting.
 - 11) The casting shall be at least 1/4 inch in thickness.
 - 12) Cure casting for 8 hours at room temperature or 4 hours at 120°F.
 - 13) After cure, carefully remove wood frame and decorative material from the casting.
 - 14) Smooth edges (flash) of casting by sanding or filing.
- (b) Metal Spraying of Plastic Coating
- 1) Metal spray a 0.055 ± 0.005 inch buildup of Metco SF aluminum over plastic casting to obtain a metal positive of surface texture.
 - 2) Carefully remove metal sprayed positive from plastic casting.
 - 3) Trim rough edges if present.
- (c) Embossing Textures onto Mylar Film
- 1) Place double layer of Osnaburg cloth on surface of lower platen of a hydraulic press.
 - 2) Place metal sprayed positive, textured side up, on Osnaburg cloth.
 - 3) Place single sheet of mylar film, 0.001 inch x metal sprayed positive dimension, on metal positive.
 - 4) Place sheet of silicone rubber, 0.125 inch x platen dimension, dusted with talcum powder, over the mylar film.



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- 5) Place sheet of stainless steel, 0.040 to 0.050 inch x platen dimension, over the rubber sheet.
- 6) Close platens of the press and apply pressure of 225 psi (to the total embossing area) at a temperature of 375°F ± 10°F for 8 minutes.

NOTE: Excessive heating will cause the mylar film to break down and discolor. This will cause the mylar film to adhere to the Epibond 126 when making repairs.

- 7) The mylar film shall be cooled to temperature of 100°F ± 10°F before pressure is released.
 - 8) Before removing mylar film from the embossing plate, make a spiral line on the top side of the mylar from the center to its edges, using felt-point marking pen. The spiral lines shall be kept approximately 1/2 inch apart. The purpose of marking is to provide identification of the negative side of film no matter how or where it is cut.
- (d) Definitions of negative and positive surface textures. To clarify the use of the terms negative and positive surface textures, the following definitions are offered.
- 1) Texture on decorative material - positive
 - 2) Texture on plastic splash casting - positive
 - 3) Texture on metal sprayed plate - positive
 - 4) Texture on unmarked surface of embossed mylar - negative
 - 5) Texture on sweep-fair patch (Epibond 126) - positive
- (e) Repair Procedures
- 1) Trim ragged edges of damaged material with No. 1 X-Acto knife and No. 11 blade.
 - 2) Clean the material to be repaired as described in the material section. (See figure 201.)



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- 3) Apply film of heavy duty traffic wax from edge of damaged area outward. The wax shall be applied at least 2 inches in all directions from edge of damage.

NOTE. Care should be exercised to keep the wax out of the area to be repaired.

- 4) Accurately weigh and thoroughly mix the following materials.

10.0 parts by weight - Epibond 126 resin

6.5 parts by weight - HN 9812 Hardener

1.5 parts by weight - Ferro No. 7005 white titanium dioxide pigment

16.0 parts by weight - calcium carbonate

- 5) Apply sufficient resin to fill damaged area.
- 6) Cut a piece of embossed mylar 1/4 inch larger than the periphery of damaged area and place over the resin. The unmarked or negative side of the mylar should be against the resin.
- 7) Lubricate upper surface of mylar film with light machine oil.
- 8) Working from the center of repair sweep and fair resin to desired contour, using 1/16 x 3 x 4 inch rigid squeegee.

NOTE It is very important that as much as possible of the excess resin be swept out from under the mylar film.

- 9) Allow resin to cure for eight hours at 70°F or two hours at 120°F.
- 10) After cure, strip mylar film from resin.
- 11) Using stiff bristle brush which has been dipped in aliphatic naphtha (TT-N-95A), remove excess resin and wax from area surrounding the repair.

NOTE. Any excess resin left in area surrounding the damage will show up when repair is painted.

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G. Repair Method No. 6

(1) General.

- (a) This method is used to repair cuts or tears which completely penetrate the decorative material. The size of the patch required shall be determined by the extent and type of damage.

(2) Equipment and Materials

- (a) Patch Material
- (b) Tape (Permacel No. 94)
- (c) X-Acto Knife - No. 1 and X-Acto Blade No. 11
- (d) Adhesive, Eastman 910

(3) Repair: (patching)

- (a) The patch material shall be selected from scrap materials. Patch material to be used shall match damaged area as closely as possible in shade of color, design, and surface texture. Correct matching may be accomplished by holding various pieces of scrap material over damaged area and observing color, design, and texture compatibility.

NOTE. Color matching of patch materials is of primary importance. Mismatching of color will tend to make the patch repair very apparent. Since different rolls of the same decorative material will have slight color variances, extreme care should be taken in selecting material for each repair. Of secondary importance is matching material design and texture as closely as possible. Improper design or texture matching will also make the repaired area apparent.

- (b) Sufficient double-backed tape (Permacel No. 94) shall be applied over damaged area to hold patch material securely while the patch cutout is made.



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- (c) Patch material shall then be carefully aligned (design and texture) over damaged area and pressed down firmly onto double-backed tape.

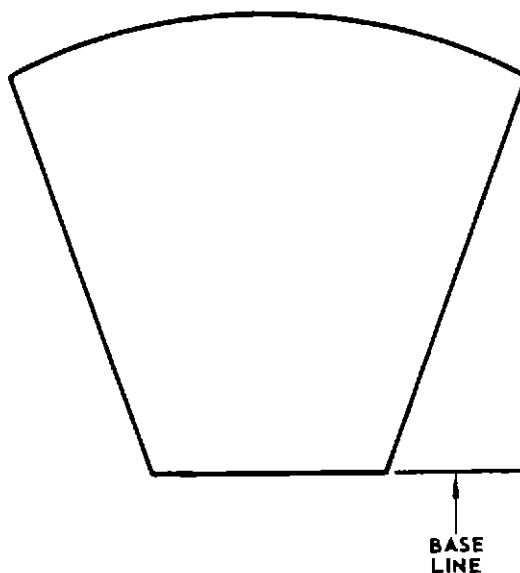
NOTE It is very important that the patch material be indexed and registered in line with the damaged area as closely as possible.

- (d) The shape of the patch shall be as shown in figure 203.

NOTE Several shapes and sizes of patches have been evaluated to determine which configuration blended best with the textured vinyl surfaces. The "cup cake" patch (shown in figure 202) has proved to have the best "hiding power" of any of the configurations tested.

- (e) Patch for those materials which have geometric designs shall be cut following the design or pattern of material.

NOTE It is extremely important to align the design of the patch material to the damaged material. If the patch cutout does not match the damaged area, the mismatch will not be acceptable from an appearance standpoint.





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- (f) Position of the "cup cake" patch's indexing line shall be as follows.
- 1) When patch repairing "grass cloth" embossing (10-60199-103, -105, -136, -148, -158, -162, -185 and -1002), the indexing line of the "cup cake" patch shall always be perpendicular (at right angles or 90°) to the direction of the lines in the surface texture of the damaged material.
- (g) When patch repairing all other types of surface textures (embossing), the position of the cup cake patch's indexing line will be to the discretion of the repairman.
- (h) Patch material and damaged material shall be cut through simultaneously using an X-Acto No. 1 knife with an X-Acto No. 11 blade only.

NOTE: It is very important that the knife blade be sharp and held perpendicular to the repair when cutting out the patch. If the knife is slanted or held at an angle, the result will be an undersized or oversized patch. If this occurs, a new and larger patch must be made.

- (i) Patch and damaged material shall then be removed. The old adhesive shall then be removed by sanding or scraping.

NOTE: If the old adhesive is not removed, it may cause the patch to be high and not acceptable from an appearance standpoint.

- (j) Area to be patched shall be cleaned with ethyl alcohol and water in accordance with Cleaning Method III.
- (k) A light film of Eastman 910 adhesive shall be applied to sides and surface of area to be patched. A small spatula shall be used to spread adhesive.

NOTE: Do not apply an excessive amount of adhesive as an excess will inhibit cure. Eastman 910 adhesive shall be kept in a closed container when not in use and preferably stored in a cool place.



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- (l) Using the indexing line, the patch shall be aligned and worked down lightly and progressively at all edges (do not apply pressure at this point). When patch edges are in place, the X-Acto knife handle shall be used to roll down patch tightly. Work from the center of patch to the edges until patch is free of air inclusions, wrinkles, and all edges are down evenly.
- (m) Maximum hand pressure shall then be applied until a bond is assured approximately 60 seconds.
- (n) Remove double-backed tape.

H. Repair Method No. 7

(1) General

- (a) This method is used to repair holes in Boltaron and Royalite decorative material.

(2) Equipment and Materials

- (a) Polyvinyl Alcohol
- (b) Epibond 126
- (c) Hardener, HN 9812
- (d) Calcium Carbonate
- (e) Gloss Cloth, Volan No. 128

(3) Repair: (Boltaron and Royalite Repair)

- (a) Form an aluminum plate to contour of the panel to be repaired.
- (b) Wrap aluminum plate with polyvinyl film.
- (c) Mix thoroughly the following materials

100 parts by weight: Epibond 126
65 parts by weight HN 9812 Hardener
15 parts by weight Calcium Carbonate



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- (d) Impregnate Volan No. 128 gloss cloth with above mixture.
- (e) Lay impregnated gloss cloth over hole in non-decorative side of damaged part.
- (f) Clamp aluminum plate over gloss cloth.
- (g) Complete repair in accordance with Repair Method No. 5, (e), item 4.

J. Repair Method No. 8

(1) General

- (a) This method is used to repair holes (Type II damage in leather).

(2) Equipment and Materials

- (a) Resin, Hydrol 2020-176
- (b) Hardener, Hysol Ak-875
- (c) Traffic Wax, Heavy Duty
- (d) Mylar Film

(3) Repair (Leather)

- (a) Thoroughly mix the following materials.
 - One (1) part by weight Hydrol 2020-176 Resin
 - Two (2) parts by weight. Hysol Ak-875 Hardener
- (b) Apply heavy duty traffic wax with cotton tipped swab to area surrounding damage.
- (c) Sufficient resin shall be applied to fill damaged area.
- (d) Embossed mylar film shall then be placed over resin. The unmarked side of mylar film shall be against the resin.
- (e) The upper surface of mylar film shall be lubricated with light oil.



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- (f) Working from center of repair, the resin shall be swept and faired to contour desired, using flexible or rigid squeegee.

NOTE: It is important that as much as possible of the excess resin be swept out from under the mylar film.

- (g) Resin shall be allowed to cure 12 hours at $75^{\circ} \pm 5^{\circ}\text{F}$.
- (h) The mylar film shall be carefully stripped from the cured resin.

K. Repair Method No. 9

(1) General

- (a) This method describes the procedures required for the rework of voids in foam material.

(2) Equipment and Materials

- (a) Stabond Adhesive T-100
- (b) Cork Bore
- (c) Foam Material

(3) Repair: (Foam)

- (a) All voids $1/2$ inch in diameter or larger shall be reworked as follows: When a void is located, its size shall be determined. A cylindrical plug of foam shall then be cut out of the void area equal to or not more than $1/2$ inch larger than the void, using a cork bore or other suitable tool.
- (b) The same tool that was used to core out the void shall also be used to cut a plug of foam for bonding into the void area. The foam plug shall be of the same density and compression deflection as the foam that is in the part.
- (c) Foam plug shall be conded into void area, using Stabond Adhesive T-100.



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(d) Adhesive shall be applied as follows:

- 1) Apply one medium brush coat of adhesive to each of the faying surfaces.
- 2) Allow adhesive to dry until it is tacky, but will not transfer to knuckle when lightly touched.
- 3) Press faying surfaces together with maximum hand pressure.
- 4) Assemblies may be handled immediately, but do not stress bond for 24 hours.

L. Repair Method No. 10

(1) General

- (a) This method describes procedures required for rework of voids in material of the Hatrack Bullnose.

(2) Equipment and Material

- (a) Pro-Seal BMS 8-40
- (b) Resin PR-1201Q
- (c) Catalyst PR-1201A
- (d) Resin #727
- (e) Paste #727
- (f) Cork Bore
- (g) Mylar Film
- (h) Machine Lubricating Oil
- (i) Masking Tape #718
- (j) Squeegee



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- (k) PE-102 Component I (R)
 - (l) PE-102 Component II (C)
 - (m) Gun, Semco Sealant No. 250
 - (n) Polyethylene Nozzle, #420
 - (o) Cartridge, 6 ounce, Polyethylene
- (3) Repair foam Foam in Hatrack Bullnose Prior to Bonding Nose Former in Place.

NOTE Three methods are available for this repair. Method No. 9 may be used, or repair may be made with BMS 8-40 or Stafoam PE-102 as described in the following paragraphs.

- (a) Repair with BMS 8-40.
- 1) Work table shall be covered with clean wrapping paper to protect boltaron cover material from soiling.
 - 2) A cylindrical foam plug shall be cut out of void area equal to or not more than 1/2 inch larger than the void, using cork bore or other suitable tool.
 - 3) Kits of BMS 8-40 are coded either as FRC or Pro-Seal. If FRC is designated, mix following materials as follows

100 grams	PR-1201Q Resin
10 grams	PR-1201A Catalyst

If Pro-Seal is designated, mix following materials as follows:

100 grams	Pro-Seal #727 Resin
12 grams	Pro-Seal #727-A Paste



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Accelerator paste shall be thoroughly mixed to smooth creamy consistency. Base resin shall be stirred until material is smooth and homogenous. Catalyst shall be added to resin and mixed until no catalyst streaks or traces of unmixed compound are visible. Compound can be checked for complete mixing by spreading a drop very thinly over a piece of white paper and checking for streaks or specks. Once mixed, the material slowly increases in viscosity and eventually becomes a firm rubbery mass. Pot life is approximately one hour at 75°F.

- 4) Sufficient material shall be applied to fill the void and allow for a slight excess.
 - 5) A piece of mylar film shall be placed over BMS 8-40 compound. Mylar film shall extend about 1/2 inch around outer edge of the filled void area.
 - 6) Upper surface of mylar film shall be lubricated with light machine oil.
 - 7) Working from center of repair, BMS 8-40 shall be swept and faired to desired contour, using a rigid squeegee.
 - 8) Mylar film shall be attached to foam of the Hatrack Nosing with masking tape.
 - 9) Bullnose Former shall be inserted in place and wrapped with masking tape (Permacel No. 718) in order to maintain proper contour.
- CAUTION:** IF PERMACEL NO. 718 MASKING TAPE IS NOT AVAILABLE, THE MASKING TAPE USED SHALL NOT BE APPLIED DIRECTLY TO THE BOLTARON COVER MATERIAL BECAUSE THE ADHESIVE ON THE TAPE WILL TEND TO DISCOLOR THE BOLTARON.
- 10) BMS 8-40 compound shall then be cured for one hour at room temperature and five hours at 115°F.
 - 11) Bullnose Former shall be removed and mylar film shall be carefully removed from repaired area.



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(b) Repair with Stafoam P.E. 102

- 1) Follow steps (a) 1) and 2) of preceding (BMS 8-40) repair.
- 2) Thoroughly mix the following materials as described below.
50 grams P.E. 102 Component I (R)
2.8 grams P.E. 102 Component II (C)
Add Component II to Component I. Mix slowly for 10 seconds and rapidly for 20 seconds or until mixture turns white.
- 3) Void area shall be filled approximately 3/4 full.
- 4) Immediately cover with mylar film and completely tape mylar in such a way as to restrain foam as it reacts.
- 5) If possible, the hatrack nose former shall be inserted in place. If this is not possible, add weights.
- 6) Foam shall be cured 25 minutes at room temperature.
- 7) Flex or knead foam area thoroughly and post cure for one (1) hour at 150°F.

(4) Repair of foam after bonding Nose Former in place.

NOTE. This includes completion of all bonding except Boltaron flap which is bonded to lower flange of Nose Former.

- (a) Two openings shall be punched above void area through exposed foam adjacent to the unbonded flap, using a probe approximately 1/32 inch in diameter. By placing a finger on material (Boltaron) in the void area, it is possible to feel when the probing instrument has made contact with it.
- (b) Areas around distorted area shall be protected with asbestos sheet and heat shall be applied with heat gun until the Boltaron snaps back into its original shape.

CAUTION. AVOID OVERHEATING.



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- (c) BMS 8-40 shall be mixed in accordance with paragraph (3) (a) and poured into a 6 ounce polyethylene cartridge with a #420 polyethylene nozzle and installed in a pressure gun. (Semco Sealant Gun No. 250)
- (d) A hypodermic needle or similar type tube shall be inserted through foam into void area to allow air to escape.
- (e) Nozzle shall be inserted into one of the probed openings and BMS 8-40 material shall be forced into void until filled.
- (f) A felt caul plate shall be placed over repaired area and secured with masking tape (Permacel No. 718).

NOTE. Do not allow masking tape to come into direct contact with Boltaron unless it is Permacel No. 718 masking tape.

- (5) Repair after complete bonding of Nose Former.

NOTE: This method includes foam repair after installation of hatrack bullnose into the airplane.

- (a) Cut hole in Boltaron cover material of 1/4 inch to 1/2 inch in diameter using a cork bore or other suitable tool.
- (b) Repair foam in accordance with Repair Method 9 or with BMS 8-40, paragraph (a).
- (c) The Boltaron cover material shall be repaired in accordance with Repair Method 5.

M. Repair Method No. 11

(1) General

- (a) This method is used to repair abrasions, scratches, mold lines, and sprue marks on nylon parts.

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(2) Equipment and Material

- (a) Learock--Type BS-30 and B815
- (b) Disc Sander, with No. 400 Sandpaper
- (c) Spindle Shaper
- (d) Sandpaper, No. 600 grit
- (e) Buffing Wheel (4")

(3) Repair (for Abrasions and Scratches)

- (a) Area adjacent to damage shall be sanded flush with the abrasion or scratch, using 400 grit wet or dry sandpaper.
- (b) Area surrounding damage shall also be sanded to feather in the parts' surface.
- (c) Damaged area shall then be sanded, using 600 grit wet or dry sandpaper.
- (d) Surface gloss shall be restored by buffing with Learock, Type BS-30 or Type B815 buffing compound. Use standard 4" buffing wheel.

CAUTION: EXTREME CARE SHOULD BE TAKEN TO AVOID OVERHEATING THE NYLON PART DURING THE BUFFING OPERATION. BURNISHING OF THE PART WILL RESULT AND CAUSE DISCOLORATION.

(4) Removal of Mold Lines

- (a) Mold lines shall be removed, using a small disc sander (No. 400 or finer sandpaper).
- (b) Mold lines shall be sanded away, using very light pressure.

CAUTION CARE MUST BE TAKEN NOT TO SAND INTO THE PARTS MOLDED SURFACE.



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- (c) Procedure outlined in M (3)(c) shall be used if polishing is required.

(5) Removal of Gate Flash

NOTE. Gate Flash is that excess of material which usually remains on any injection molded part after the part has been ejected from the mold and the sprue and runners have been removed.

- (a) A small amount of flash shall be removed, using procedure outlined in (4) (a).
- (b) A large amount of flash shall be removed, using a spindle shaper.
- (c) After removing the gate flash with the spindle shaper, the shaper marks shall be removed, using No. 400 wet or dry sandpaper (sand dry).
- (d) Surface gloss shall be restored using Learock Type BS-30 or Type B-815 buffing compound.

N. Repair Method No. 12

(1) General

- (a) See Repair Method No. 12 (patching), except that vinyl for repairing vinyl-aluminum laminates shall be obtained from scrap vinyl-aluminum materials as follows:

(2) Equipment and Materials

- (a) X-Acto Knife
- (b) Scrap Material
- (c) Heat Lamp
- (d) Soldering Iron

(3) Repair (Patching of Munster Textural Vinyl-Aluminum Laminate)

- (a) Using an X-Acto Knife, cut a square of vinyl in the scrap vinyl-aluminum material.

NOTE. This square shall be larger than the damaged area in order that a cupcake patch may be made as in Repair Method 6.



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- (b) Heat shall be applied locally to metal side of laminate opposite the square cut in the vinyl, using a heat lamp, soldering iron, or other heating device.
- (c) When laminate has heated up, knife blade or other similar tool shall be used to lift out square of vinyl material.

CAUTION EXERCISE CAUTION WHEN REMOVING VINYL AS IT WILL
STRETCH VERY EASILY RESULTING IN TEXTURE DISTORTION.

- (d) When the patch material has been removed from scrap aluminum laminate, proceed with patch repair, Method No. 6.

0. Repair Method No. 13

(1) General

- (a) This method describes the procedures used to repair holes which completely penetrate vinyl-aluminum panels.

(2) Equipment and Materials

- (a) Drill
- (b) Adhesive, Eastman 910
- (c) Backing Plate, Aluminum
- (d) Epibond #126
- (e) Ferro No. 7005 White (Titanium Dioxide Pigment)
- (f) Calcium Carbonate
- (g) Glass Cloth, Volan No. 128
- (h) Mylar Film
- (i) Resin
- (j) Hardener, HN 9812

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(3) Repair: (Holes in Vinyl-Aluminum Panels)

(a) Repair of holes less than 1/2 inch in diameter in solid colored or silk screened vinyl-aluminum panels.

- 1) Damaged area shall be made circular and uniform in size, using a drill or other suitable tool. Remove all burrs.
- 2) A piece of embossed mylar shall be taped tightly over the hole in decorative (vinyl) side of the laminate.
- 3) Accurately weigh and thoroughly mix the following materials
 - 10.0 parts by weight - Epibond 126
 - 6.5 parts by weight - HN 9812 Hardener
 - 1.5 parts by weight - Ferro No. 7005 White Titanium Dioxide Pigment
 - 1.5 parts by weight - Calcium Carbonate
- 4) From the non-decorative (aluminum) side of panel, sufficient resin shall be applied to fill damaged area.
- 5) Resin shall be swept and faired to panel contour.
- 6) A piece of Volan No. 128 glass cloth, approximately 1/4 to 1/2 inch larger than the diameter of the hole, shall be impregnated with above mixture.
- 7) The impregnated glass cloth shall be layed over hole on non-decorative (aluminum) side of panel. Sweep glass down tightly over hole and onto panel.
- 8) Resin shall be allowed to cure eight hours at 70°F or two hours at 120°F.
- 9) After cure, mylar film shall be stripped from resin.
- 10) Color restoration shall be accomplished in accordance with Section.



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- (b) Repair of holes less than 1/2 inch in diameter in multicolored (munster) vinyl-aluminum panels.
- 1) Damaged area shall be made circular and uniform in size using a drill or other suitable tool. Remove all burrs.
 - 2) Vinyl shall be cut 1/4 inch in diameter larger than hole in aluminum.
 - 3) A small piece of mylar tape shall be placed tightly over hole on decorative (vinyl) side of panel and flush with aluminum.
 - 4) Damaged area shall be filled in accordance with paragraph (a) Item (3) through Item (8).
 - 5) Vinyl shall be replaced by patching in accordance with Repair Method 6.
- (c) Repair of holes 1/2 inch or more in diameter in vinyl-aluminum panels
- 1) Damaged area shall be made circular and uniform in size using a drill or other suitable tool. Remove all burrs.

NOTE: This operation is necessary in order that the aluminum disk (See paragraph (c) 4)) may be more easily made.
 - 2) An aluminum backing plate, approximately 1/4 to 1/2 inch larger than the diameter of the hole, shall be bonded over the hole on the nondecorative (aluminum) side of panel, using Eastman 910 adhesive.
 - 3) Eastman 910 adhesive shall be applied as follows:
 - a) Aluminum faying surfaces shall be cleaned with ethyl alcohol.
 - b) Wipe dry.

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- c) Apply a thin coat of Eastman 910 adhesive to faying surfaces.

NOTE: Do not apply an excessive amount of adhesive as an excess will inhibit cure.

- d) Aluminum backing plate shall then be pressed firmly in place on back of panel, using maximum hand pressure, until a bond is assured - approximately 60 seconds.
- 4) A disk of aluminum the same diameter as the hole and same thickness as aluminum of the panel shall be bonded in the hole, using procedures given in paragraph (c) Item 2).

NOTE: This disk must be flush with the aluminum of the panel and free of burrs and other imperfections.

- 5) Complete this repair in accordance with Method No. 12.

P. Repair Method No. 14

(1) General

- (a) This method is used to repair holes that partially or completely penetrate vinyl (cloth-backed or semi-rigid) honeycomb (aluminum or paper) or plywood panels.

(2) Equipment and Materials

- (a) Epibond 126
(b) Hardener, HN 9812
(c) Calcium Carbonate
(d) Masking Tape (Permacel No. 718)

(3) Repair: (Holes in Vinyl-Honeycomb or Plywood)

- (a) Area adjacent to damaged area shall be masked off (Permacel No. 718 tape) in order to protect face of panel from damage due to filling with potting compound and sanding.

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- (b) Thoroughly mix the following materials as follows:
 - 100 parts by weight - Epibond 126
 - 65 parts by weight - BN 9812 Hardener
 - 15 parts by weight - Calcium Carbonate
- (c) Hole in panel shall be filled flush with the fiberglass skin or plywood beneath decorative sheet material using above compound.

NOTE. It may be necessary to sand the potting compound in order for it to be flush with the aluminum or fiberglass skin or plywood. This may be accomplished, using a microshaver or equivalent equipment.

- (d) Remove masking tape.
- (e) Complete repair in accordance with Method No. 6, (patching).

Q. Repair Method No. 15

(1) General

- (a) This method describes the procedures used to rebond PVC extrusions and molded parts (BMS 6-8-9) and PVC plastisols, cast and molded (BMS 8-44).

(2) Equipment and Materials

- (a) Adhesive, Eastman 910
- (b) Spatula

(3) Repair: (Rebonding of PVC Plastisol Parts)

- (a) After the part has been cleaned, a thin film of Eastman 910 adhesive shall be applied with a small spatula to one or other of faying surfaces - approximately two (2) square inches at a time.

NOTE: Do not apply an excessive amount of adhesive as an excess will inhibit cure. Eastman 910 adhesive shall be kept in a closed container when not in use and preferably in a cool place when not in use.



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(b) Surfaces to be bonded shall be pressed firmly together with maximum hand pressure and held until adhesive sets, approximately 60 seconds.

(c) Continue the rebonding operation progressively.

R. Repair Method No. 16

(1) General

(a) This method is used to repair slight surface abrasions in stainless steel.

(2) Equipment and Materials

(a) Sandpaper, No. 240 grit

(3) Repair: (Stainless Steel)

(a) Sand damaged area, using No. 240 grit sandpaper.

S. Repair Method No. 17

(1) General

(a) This method is used to repair slight surface abrasions in anodized aluminum parts.

(2) Equipment and Materials

(a) Alodine - 1000 Class B

(b) Burnishing Tool

(3) Repair: (Anodized Aluminum)

(a) Remove all burrs and rough edges with burnishing tool.

(b) Apply alodine 1000 Class B, Method 2, in accordance with BAC5719, Process Specification for alodizing to damaged area with cotton swab.

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T. Repair Method No. 18

(1) General

- (a) This method is used to repair damaged, decorative paper base laminate faces on interior honeycomb sandwich panels. This repair shall not be used on defects greater than 3/4" in the maximum dimension. The minimum spacing between repairs shall be 1 inch.

(2) Equipment and Materials

- (a) Fiber Resin No. 5-418S or 5-419S
(b) Fiber Resin Hardener No. 5-40A
(c) Epocast 46
(d) Hardener #951
(e) Epoxy Enamel (D6-1408, BAC3-71-3-900)

(3) Repair: (Honeycomb Sandwich Panels)

(a) Repair Procedure

- 1) Area adjacent to damage shall be adequately protected during rework to prevent further damage to decorative panels.
- 2) Damaged area shall be removed from honeycomb sandwich panel by cutting a hold slightly larger than damage, but not exceeding 3/4" in diameter. Do not drill through skin on opposite side of panel.
- 3) Hole shall be filled with a slight excess of epoxy resin (listed below) to compensate for shrinkage during cure.

EPOXY RESIN

PARTS BY WT.

Fiber Resin No. 5-418S or 5-419S

100

Fiber Resin Hardener No. 5-40A

12-13



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Color match or tint the resin using color matching kit from Fiberlay, Inc., or equivalent. Optional Resin to be used in nonperforated panels only.

PARTS BY WT.

Epocast 4b 100

*Hardener 951 5-7

The work life at $80^{\circ}\text{F} \pm 10^{\circ}\text{F}$ is 20-30 minutes, and the cure at $80^{\circ}\text{F} \pm 10^{\circ}\text{F}$ is 18 to 24 hours.

* The amount of catalyst can be varied within these limits to suit the using Shop.

- 4) After curing, potting compound shall be finished smooth and flush with face of panel by sanding or machining.
- 5) Color shall be restored in accordance with Section. Spray the repaired area with an epoxy enamel (D6-1408, BAC371-3-Color) tinted to match the panel. When color has been restored, spray the repair with clear epoxy enamel (D6-1408, BAC3-71-3-900).
- 6) This repair has been approved for use on D10-60199-308 decorative formica (BAC color No. 588). The first repairs on other decorative-paper base laminates shall be submitted to the Materials Technology Unit and Passenger Accommodations for approval of color match and color fastness.

U. Repair Method No. 19

(1) General

- (a) This method is used to repair cuts and scratches and other surface damage in decorative paper-base laminates (Formica) and in Tedlar-Conolite laminates.

NOTE: Color match with this repair is very difficult, and an unsatisfactory gloss and color match may result. The resin used in the repair is Skydrol-resistant when fully cured.

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(2) Equipment and Materials

- (a) Sandpaper (400 to 600 grit)
- (b) Fiber Resin No. 5-4185 or 5-4195
- (c) Fiber Resin Hardener No. 5-40A
- (d) Color Matching Kit (Fiberlay Inc.)
- (e) Polishing Wheel, Cotton
- (f) Buffing Compound (Learrock S-30)
- (g) Mylar Tape
- (h) Plexiglas

(3) Repair. (Epoxy Paste)

(a) Repair Procedure

- 1) Area surrounding damage shall be protected during rework to prevent additional damage to decorative panel. Make a piece of Plexiglas with two inch wide Mylar tape. Place the masked Plexiglas over damaged area, and with a knife cut out a section of tape slightly larger than damaged area. Remove the Mylar tape from the Plexiglas and place tape over damaged area so that cutout is centered over damaged area.
- 2) Remove all burrs or protruding material from damaged area so that all edges are flush with the surface.
- 3) Clean the damaged area with aliphatic naphtha, per Method 7.
- 4) Fill remaining void with the following resin tinted to match color.



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Fiber Resin No. 5-418S or 5-419S -100 parts by wt.
Fiber Resin Hardener No. 5-40A -12-13 parts by wt.

Color match using the above white resin and an epoxy color matching kit from Fiberlay Inc., or equivalent.

- 5) Allow resin to cure at temperatures of 70 - 140°F.
- 6) Sand repaired area until surface is smooth and flush with the decorative surface. Final sanding shall be done with 400 to 600 grit paper. To match gloss, polish with a cotton polishing wheel and Learock S-30 or 888 buffing compound.

V. Repair Method No. 20

(1) General

- (a) This method is used to repair cuts and scratches and other surface damage in the decorative surface of Tedlar-vinyl laminates.

(2) Equipment and Materials

- (a) Sandpaper (400 to 600 grit)
- (b) Duracote S-25 (top finish)
- (c) Air Brush
- (d) Duracote 027.5 (dulling agent)

(3) Repair: (Vinyl Paste and Clear Coat)

- (a) Repair the vinyl per Method 2.
- (b) Sand repaired area until surface is smooth. Final sanding shall be done with 400 or 600 grit paper.
- (c) To match decorative color patterns, apply silkscreen vinyl ink of required color, using an artist's brush.

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- (d) Coat the repaired area with Duracote S-25 top finish or Sherwin-Williams Hi-Speed lacquer. Apply 4 or 5 passes by spraying with an "Air-Brush;" allow drying time between passes. Gloss can be altered by adding Duracote 027.5 dulling agent (15% by weight) to the S-25 top finish. Sherwin-Williams Hi-Speed lacquer can be obtained in various degrees of gloss. S-25 may be thinned with a 50-50 mixture (by volume) of tetrahydrofuran and cyclohexanone for spraying.

W. Repair Method No. 21

(1) General

- (a) This method is used for the repair of damage that penetrates decorative paper base laminates (Formica) and Tedlar-Conolite laminates. This is a sweep fairing repair method.

(2) Equipment and Materials

- (a) Fiber Resin No. 5-4195 or 4185
- (b) Hardener, Fiber Resin No. 5-40A
- (c) Embossed Mylar
- (d) Teflon Squeegee
- (e) Masite 1440 (Silicone Rubber)
- (f) Sandpaper (600 grit)
- (g) Epoxy Enamel - EMS 10-11, Type 2
- (h) Aluminum (.060 inches thick)
- (i) Color Matching Kit (Fiberlay Inc.)
- (j) Decorative Material
- (k) Wax Parting Agent



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(3) Repair: (Epoxy Sweep Fairing - Colored)

NOTE: This repair shall not be used on defects greater than 3/4" in the maximum dimension. The minimum spacing between repairs shall be 1 inch. The materials used in this repair are Skydrol-resistant when fully cured.

CAUTION. COLOR MATCHING WITH THESE MATERIALS IS VERY DIFFICULT AND A REPAIR WITH AN UNSATISFACTORY COLOR MATCH MAY RESULT.

- (a) Cut out damaged area and remove honeycomb core in opening. Trim off all loose and ragged edges. Decorative material shall be cut on an angle slanting (inward) toward center of damage.
- (b) Apply wax parting agent to area surrounding damage. Do not allow wax to contact the cut edge in decorative sheet (from above item a).
- (c) Fill damaged area to 1/8 inch from the decorative surface, with the following resin.

Fiber Resin No. 5-419S or 5-418S - 100 parts by wt.

Fiber Resin Hardener No. 5-40A - 12 to 13 parts by wt.

- (d) Allow to cure until surface is firm. Temperatures up to 140°F may be used to cure resin.
- (e) Fill remaining void with the following resin tinted to match color.

Resin No. 5-418S or 5-419S - 100 parts by wt.

Fiber Resin Hardener No 5-40A - 12-13 parts by wt.

Color match using above white resin and an epoxy color matching kit from Fiberlay, Inc. or equivalent.

- (f) Place embossed Mylar (per D6-1910) over the resin. Use plain Mylar if surface being repaired is not embossed. Mylar shall be 1/2 inch to 1 inch larger in size than damaged area. Working from the center of repair, resin shall be swept and faired to desired contour, using a rigid phenolic or Teflon squeegee held perpendicular to the decorative surface.

NOTE: It is very important that as much as possible of the excess resin be swept out from beneath the Mylar film.

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- (g) Optional method of embossing mylar or Tedlar sweep fairing film.
 - 1) Place a piece of 2 or 3 mil mylar or Tedlar over decorative surface of 6 inch x 8 inch piece of Tedlar-Conolite laminate or other decorative material of same texture as that to be repaired.
 - 2) Place this between two 1/8 inch thick sheets of silicone rubber (Mosite 1440, or equivalent).
 - 3) Place Item 2, build up between two pieces of .060 inch thick aluminum.
 - 4) Place this in a press having platen temperatures of $340 \pm 10^{\circ}\text{F}$. Pressurize to 190 to 200 psi and hold for 7 to 10 minutes. Cool to less than 100°F under pressure and remove embossed film.
- (h) Allow resin to cure a temperatures of $70-140^{\circ}\text{F}$ and then remove sweep fairing film.
- (j) If necessary, sand edges flush with decorative surface using 600 grit abrasive paper. (Andrew Brown Epoxy Enamel System per EMS 10-11, Type 2, may be used for color and gloss matching, if desired.)

X. Repair Method No. 22

(1) General

- (a) This method is used to repair cuts and scratches and other surface damage in decorative perforated acoustical panels.

(2) Equipment and Material

- (a) Drill ($0.027 \pm .002$ inch dia)
- (b) Drilling Template
- (c) Decorative Material

(3) Repair: (Surface Touchup)



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(a) Repair Procedure

- 1) Determine the type of decorative material that is to be repaired. Locate this type of material and repair surface damage per any method listed under Type I for that decorative material.
- 2) Perforations may be restored by drilling using $0.027 \pm .002$ inch diameter drill. Use piece of perforated material as a drilling template.

Y. Repair Method No. 23

(1) General

- (a) The repair method in item (3) (a) 1) below is used for deglossing small shiny spots in the surface of a Tedlar laminate. This repair is limited to glossy spots less than $1/2$ inch in the maximum dimension. Not more than six glossy spots shall be deglossed per panel and the minimum spacing between glossy spots shall be one inch. The repair method in item (3) (a) 2) below is used for repair of scuffs and scratches that do not penetrate the Tedlar.

(2) Equipment and Materials

- (a) Scotch Brite, Abrasive Disc, Type A
- (b) Sandpaper (600 grit)
- (c) Buffing Wheel (Cotton Flannel)
- (d) Buffing Compound, Learock S-30 or 888

(3) Repair: (Abrading and Polishing)

(a) Repair Procedure

- 1) Glossy spots may be deglossed by light rubbing with a Scotch Brite abrasive disc, Type A, made by Minnesota Mining & Manufacturing Company or equivalent. Do not abrade through the Tedlar.



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- 2) Scuffs and scratches that do not penetrate the Tedlar may be repaired as follows:

Remove burrs of Tedlar by very light sanding with 600 grit or emery paper. Do not sand through the Tedlar. Polish to match gloss using a cotton flannel buffing wheel and buffing compound.

Z. Repair Method No. 24

(1) General

- (a) This method is for the repair of perforated acoustical panel having damage that penetrates the decorative surface and the fiberglass fly screen. This repair is limited to damage greater than 3/4 inch in diameter and less than 1.5 inch in diameter.

(2) Equipment and Materials

- (a) Female Routing Template (Dia 7.5 to 4")
- (b) Tape (Double-Back)
- (c) Mylar Tape
- (d) Male Routing Template
- (e) Epibond 126
- (f) Hardener, Furane #9812
- (g) Plexiglas (6" x 6" x 8" x 1/4")

(3) Repair: (Patch)

- (a) A female routing template with a hole diameter of 1.5 inch to 4 inch shall be centered over the damage and held in place with double-back tape. A Formica repair kit has such a template.



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- (b) Rout out the damaged area. Set router depth so that the fiberglass fly screen beneath the decorative face is not cut. Remove the flow-resistant fabric.

NOTE: On Tedlar-covered laminates, put several pieces of Mylar tape over the damaged area and matching perforated decorative sheets to keep the Tedlar film from fraying during routing.

- (c) Using a male template (Formica repair kit) rout out a matching patch from a piece of the perforated decorative sheet material. Prefit the patch by light sanding the high points. The patch should require only light hand pressure to insert. Index patch by marking two places on the patch and on the surface being repaired. Marking shall be capable of being removed after bonding.
- (d) Cut a piece of BMS 8-64 flow-resistant fabric to same size as patch.

NOTE: This may be done by bonding the fabric to the decorative material per below Item 7, and then cut the patch and fabric together per above Item c.

- (e) Insert the flow-resistant fabric and patch in cutout area of panel and adjust for a flush fit of patch to the surrounding surface.
- (f) Mask the decorative side of patch and area surrounding cutout in the panel. Clean faying surfaces with naphtha.
- (g) Spray heavy coat of the following adhesive on faying surface of patch and cutout area.

Epibond 126	- 100 parts by weight
Furane Hardener 9812	- 60-65 parts by weight

Blend together above adhesive and hardener. Dilute it with one volume of methyl ethyl ketone and one volume of toluene to one volume of adhesive plus hardener. Allow 10 minutes for air drying after spraying prior to bonding. Bond within 30 minutes after spraying.



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- (h) Remove masking from patch and panel. Apply double-back (thin as possible) tape to decorative side of patch and to area around cutout in the panel. Do not cover up patch index markings.
 - (i) Stick patch to 6 inch x 6 inch or 8 inch x 1/4 inch piece of Plexiglas. Insert flow-resistant fabric before patch so that it is between the patch and flyscreen. Insert patch in cutout area, looking through Plexiglas to line up index markings.
 - (j) Apply enough pressure to Plexiglas to assure flush fit. Cure for 24 hours at room temperature or 3 hours at $120 \pm 5^{\circ}\text{F}$.
- NOTE· A "cupcake" patch per figure 203 may be used instead of above circular patch.
- (k) Fill any visible cracks in the decorative surface.
 - (l) Perforations may be restored by drilling. Use a piece of the perforated material as a drilling template.

AA. Repair Method No. 25

- (1) General
 - (a) This method is for the repair of Textured Finishes.
- (2) Equipment and Materials
 - (a) Spray Gun (DeVilbiss JGA502)
 - (b) Spray Gun Head (AV-15-E, 402E Needle)
 - (c) Spray Gun Air Cap (765)
 - (d) Scotch Brite Pads
 - (e) Lacquer - Hi-Speed

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(3) Repair: (Textured Finish)

(a) Minor Repair of Coating (Scratches, Gouges, etc.)

- 1) Solvent clean the area to be repaired using BMS 3-2 solvent or naphtha.
- 2) Apply coating (Hi-Speed Lacquer, Sherwin-Williams Paint Company) to the area to be repaired by brush or conventional spray equipment. If texture is desired in small areas, stippling with a stiff, short bristled brush, or scotch brite pad, using the hi-speed lacquer at unthinned consistency, is recommended.

(b) Major Repair of Coating (Refinish of Large Areas to Restore Texture)

- 1) Solvent clean the area to be repaired using BMS 3-2 solvent or naphtha.
- 2) Mask surfaces surrounding area to be repaired. Apply base coat of hi-speed lacquer to all areas where substrate has been exposed or where color hiding is inadequate. Color of base coat shall be identical to that of texture coat. Base coat is applied with conventional spray equipment to full color hiding and smooth, uniform film. Allow base coat to dry at least 30 minutes before applying texture coat.
- 3) Texture Coat - Apply hi-speed lacquer without thinning using pressure feed spray equipment. A DeVilbiss JGA 502 spray gun with AV-15-E head, 402E needle and 765 air cap is satisfactory. Line pressure of 24 psi and spray pot pressure of 5 psi are recommended. Spray gun should be held approximately 12 inches from surface to be coated. Apply cross coat to obtain desired texture. Allow to dry at least 30 minutes between spray passes. One cross coat normally consists of two passes of spray gun with one pass crossing the other at right angles. Masking lines can be obliterated by stippling with a stiff, short bristled brush, or scotch brite pad using hi-speed lacquer of unthinned consistency.

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BB. Repair Method No. 26

(1) General

- (a) This method is for the repair of Duracote 200A construction, a smoke stain resistant coating.

(2) Equipment and Materials

- (a) Duracote S-25 (top finish)
- (b) Air Brush
- (c) Duracote 027.5 (dulling agent)

(3) Repair: (Clear Coat)

- (a) Repair base material per D6-1910. Base materials are usually vinyl.
- (b) Coat repaired area with Duracote S-25 top finish or Sherwin-Williams Hi-Speed Lacquer. Apply 4 or 5 passes by spraying with an "Air Brush," allow drying between passes. Gloss can be altered by adding Duracote 027.5 dulling agent (15% by weight) to S-25 top finish. Sherwin-Williams Hi-Speed Lacquer can be obtained in various degrees of gloss. S-25 may be thinned with a 50-50 mixture (by volume) of tetrahydrofuran and cyclohexanone for spraying.

PASSENGER SEATS - DESCRIPTION AND OPERATION

1. General

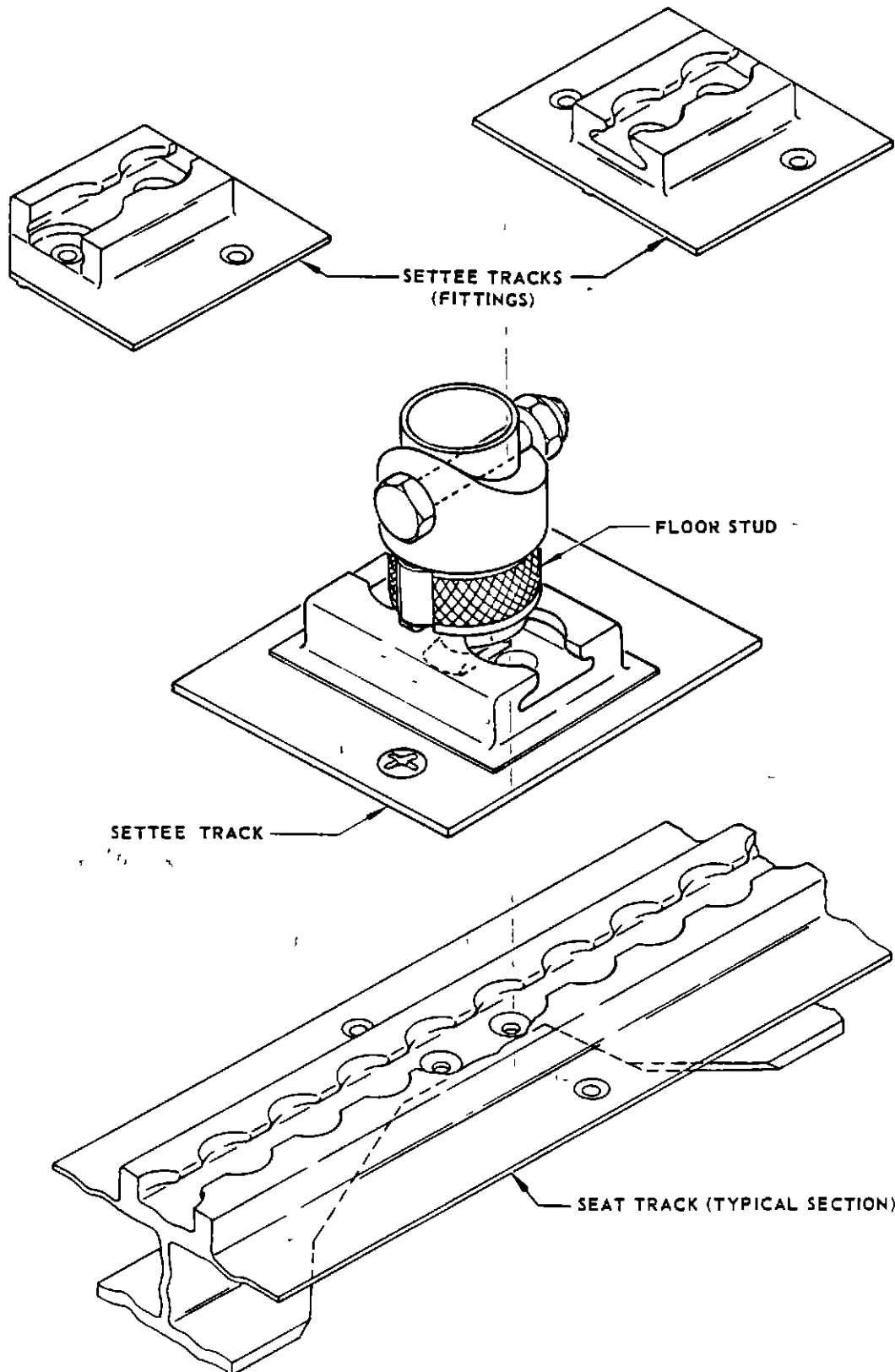
- A. The passenger seat equipment consists of the passenger seat tracks, double passenger seats, triple standard passenger seats, triple tourist passenger seats, back-to-back lounge settee and the curved lounge settee.

2. Passenger Seat Tracks (See figure 1.)

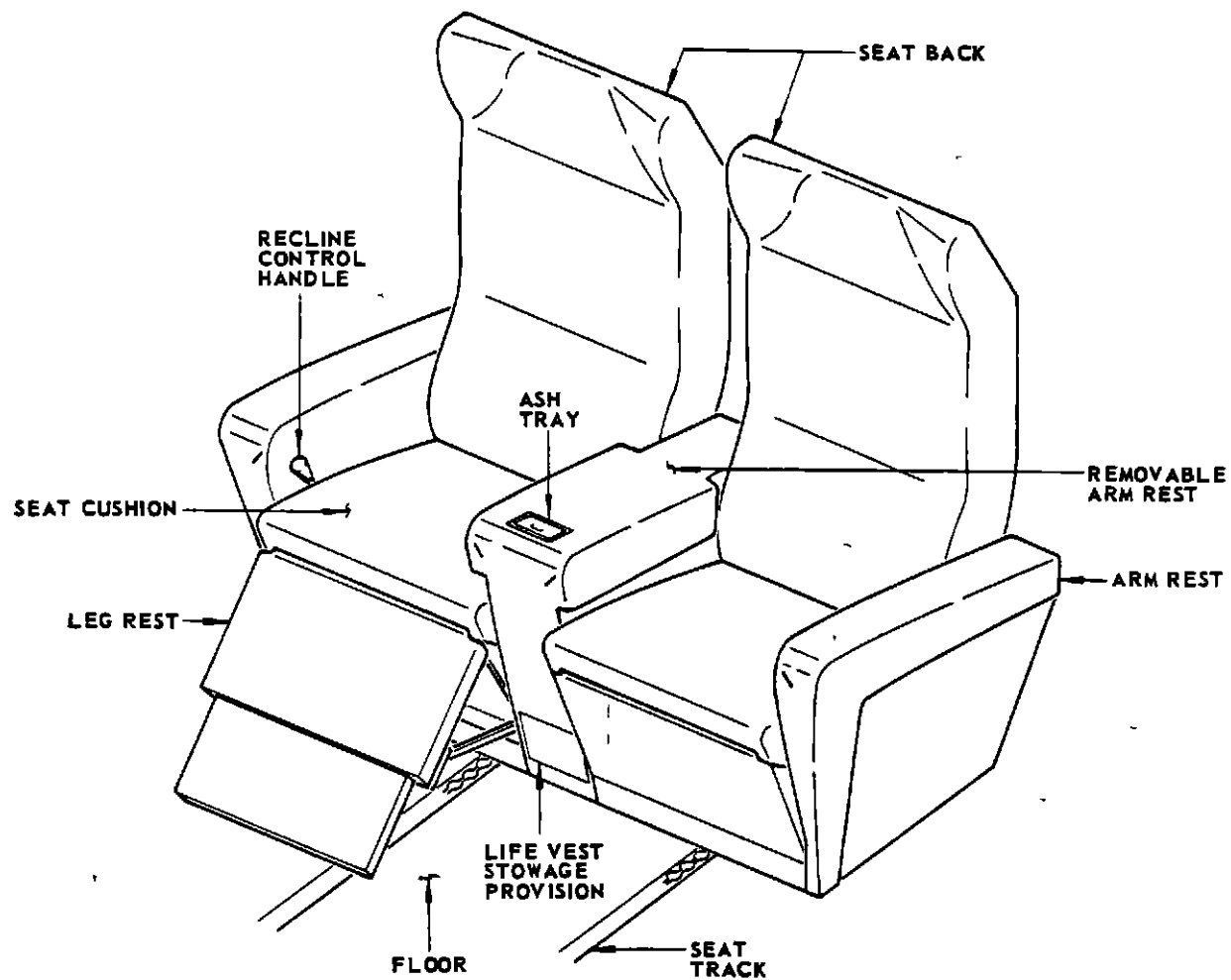
- A. The passenger seat tracks are used for attaching the passenger seats to the cabin floor.
- B. The seat tracks consist of a series of short extruded sections bolted to the floor structure. They are provided with one inch spaced circular cutouts for the seat studs and lock pins which lock the seat in position. Figure 1 shows a typical arrangement of the seat track.
- C. The seat tracks for attaching the lounge seats are short pieces of seat track section, machined, and bolted to the floor.

3. Double Passenger Seat (See figure 2.)

- A. The double passenger seat is a combination of two seats on one seat base. The seat consists of two reclinable seat backs, two seat cushions, two safety belts, an arm rest, and the seat base with two fixed arm rests, two legs and a life jacket stowage compartment.
- B. The seat back is a metal frame with two cushions and removable upholstery. The seat back is hinged to the seat base and can be reclined and locked in position. The recline control mechanism is controlled by a handle located between the seat cushion and the arm rest. The seat back returns automatically from recline to the upright position when the handle is operated to release the locking mechanism.
- C. An ashtray is provided in the removable center arm rest, and a safety belt is installed in each seat.
- D. A safety belt is secured to the seat base. It is provided with a quick coupling rotary buckle.
- E. thru G. deleted.



Passenger Seat Tracks (Typical)
Figure 1



Passenger Seat Assembly
Figure 2

4. Triple Passenger Seat

- A. The triple passenger seat is a combination of three seats on one seat base. It is similar in design to the double passenger seat.
- B. The seat backs, the seat cushions, the safety belts, the armrests, the folding legs and the folding tables are the same as on the double passenger seat.
- C. The attachment of the seat to the seat track is the same as of the double seat.

5. Back-to-Back Lounge Settee (See figure 3)

- A. The back-to-back lounge settee is located just aft of the forward entrance door. It can accommodate four passengers; two forward facing, and two aft facing.
- B. The settee consists of a rigid structure with fittings for the attachment to the cabin floor, cushions with covers, seat belts, and a removable armrest between the forward seats.
- C. Stowage space is provided in the settee base. Seat cushions are removable for access to the stowage space, and to the fitting attachments. The seat base enclosure is covered with floor carpet material.

6. Curved Lounge Settee (See figure 3)

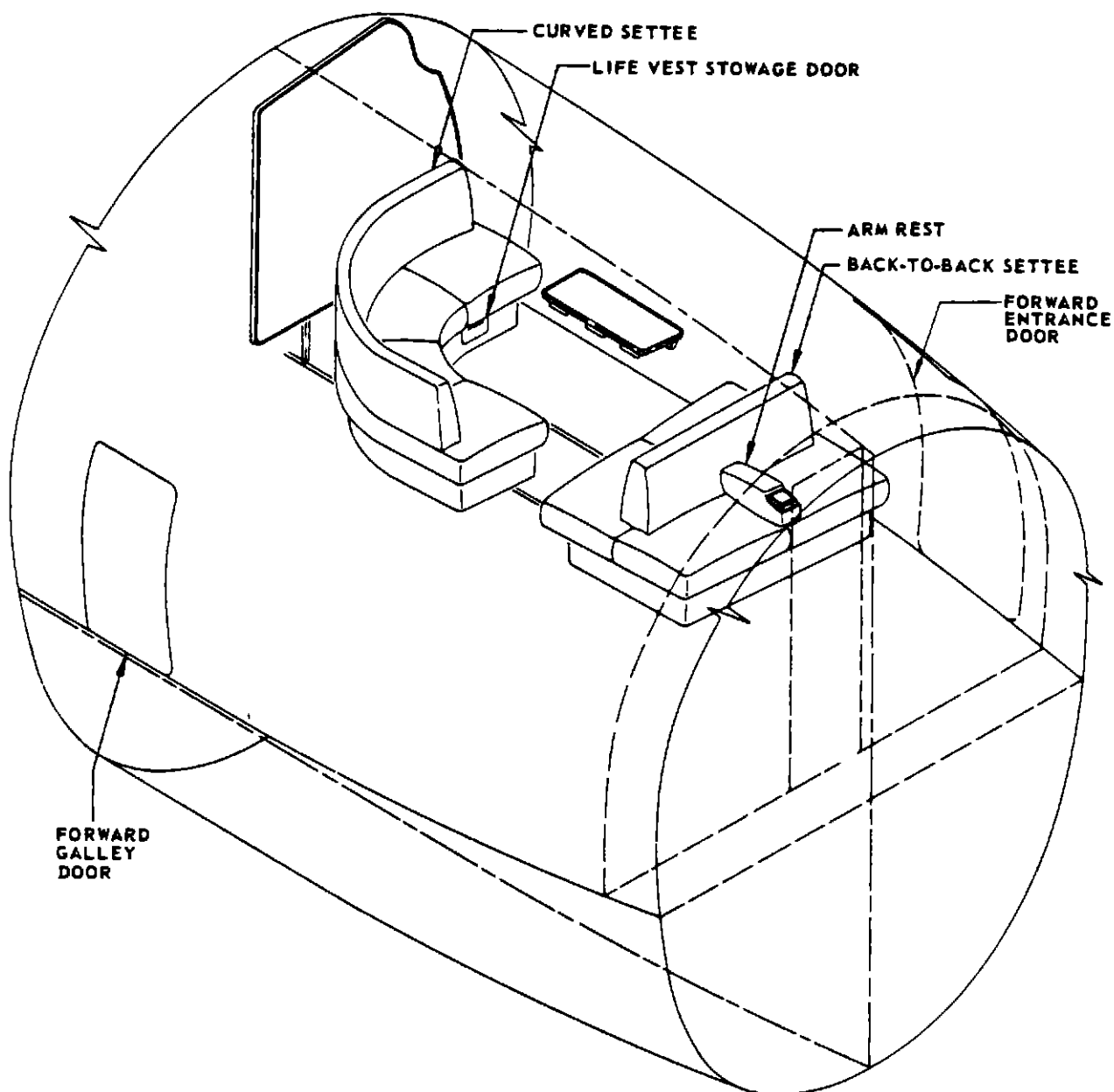
- A. The curved lounge settee is located aft of the back-to-back settee. It can accommodate four passengers.
- B. The curved settee consists of a rigid, arc shaped structure with fittings for the attachment to the cabin floor, cushions with covers, and seat belts.
- C. Life vest stowage is provided under both end seats. It is accessible through the doors in the base enclosure. Additional space is provided under the three forward seats. Seat cushions are removable for access to the stowage space and to the fitting attachments. The seat base enclosure is covered with floor carpet material.

EQUIPMENT AND FURNISHINGS

Passenger Seats

Description and Operation →

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Passenger Lounge Seats (Back to Back and Curved)
Figure 3

END

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PASSENGER SEAT TRACKS - MAINTENANCE PRACTICES

1 General

- A The passenger seat tracks are constructed of aluminum alloy X7178-T6 and require a minimum of care if kept clean and free of moisture. However, the original finish on the track is chromic acid anodize which is easily damaged by strong acid cleaners. The following cleaning procedure should be used whenever any corrosion has been found.

2. Cleaning and Painting Passenger Seat Tracks

A. Equipment and Materials

- (1) Alodine 1000 (clear chemical conversion coating), product of Amchem Products Inc. of Ambler Pa.
- (2) Naptha solvent
- (3) 320 grit aluminum oxide paper

B Clean Passenger Seat Track

- (1) Manually clean seat track with naptha and remove any oil or grease
- (2) Remove corrosion by sanding with 320 grit aluminum oxide paper.
- (3) Remove sanding residues with vacuum cleaner.
- (4) Clean the reworked surface again with naptha.
- (5) Treat the surface with Alodine 1000.

CAUTION ALODINE MAY STAIN FABRICS, THEREFORE COVER NEARBY CARPETS WHILE APPLYING ALODINE.

WARNING SINCE ALODINE 1000 CONTAINS CHROMIC ACID, CARE SHOULD BE TAKEN TO AVOID SKIN CONTACT. DO NOT ALLOW ALODINE SOAKED CLOTHS TO DRY OUT BEFORE DISPOSING OF THEM, SINCE SPONTANEOUS COMBUSTION MAY OCCUR.



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FLOOR TRACK INSERTS - REMOVAL/INSTALLATION

EFFECTIVITY

ALL 707-329C

1. General

- A. Replaceable cargo tiedown floor track insert sections are installed in the main cargo door area. (See figure 401.) The track inserts provide rapid replacement capability in the event of track damage in this area during cargo loading and unloading.

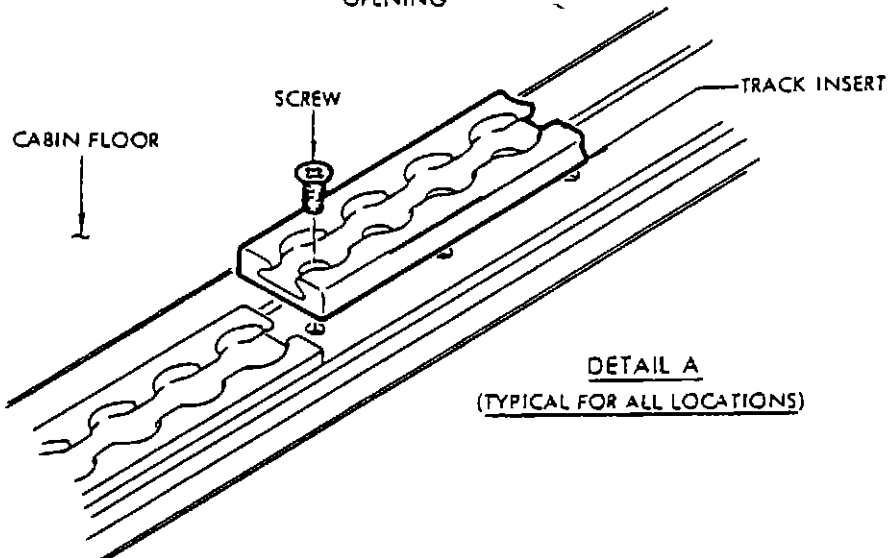
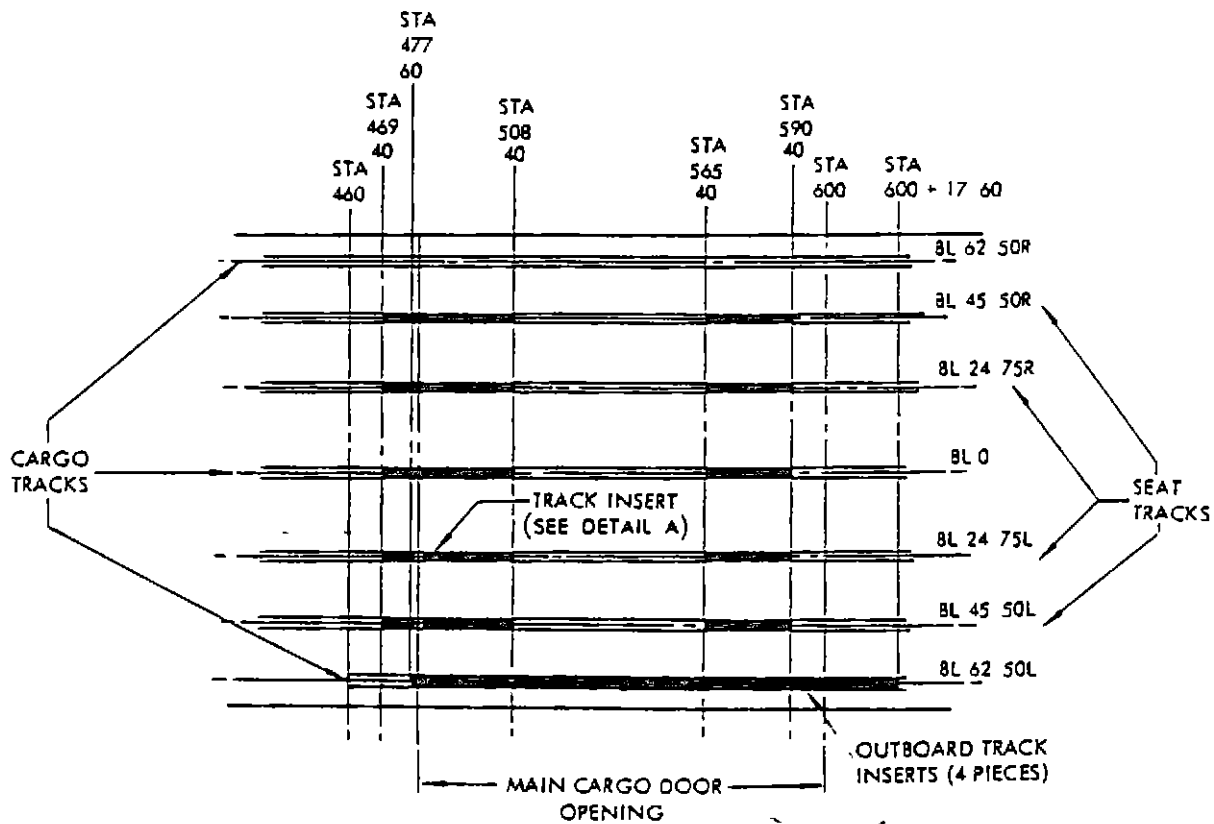
2. Remove Floor Track Insert

- A. Remove screws between stations of applicable track insert as shown in figure 401 and remove track insert section.

3. Install Floor Track Insert

- A. Ensure that track insert area is clean and free of obstructions.
- B. Place track insert section in position, align holes of track insert with those of track support extrusion, and install screws.
- C. Ensure screws have seated correctly and do not protrude above the inner surface of the track insert.

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ARMRESTS ON ESCAPE HATCHES - REMOVAL/INSTALLATION

1. General

- A. The procedures in this section assume that armrest attachment fittings are installed in the escape hatches (See figure 401.)
- B. If these fittings have not been installed, the lower lining of the hatch should be removed and the attachment fittings installed to the first and fifth pairs of nutplates (from aft end) along the channel existing within the escape hatch. Corresponding holes should be provided in the lining and these should be furnished with trim plugs to conceal the holes when the armrests are not installed.
- C. The following instructions are typical for removal and installation of an armrest at any one of the escape hatches.

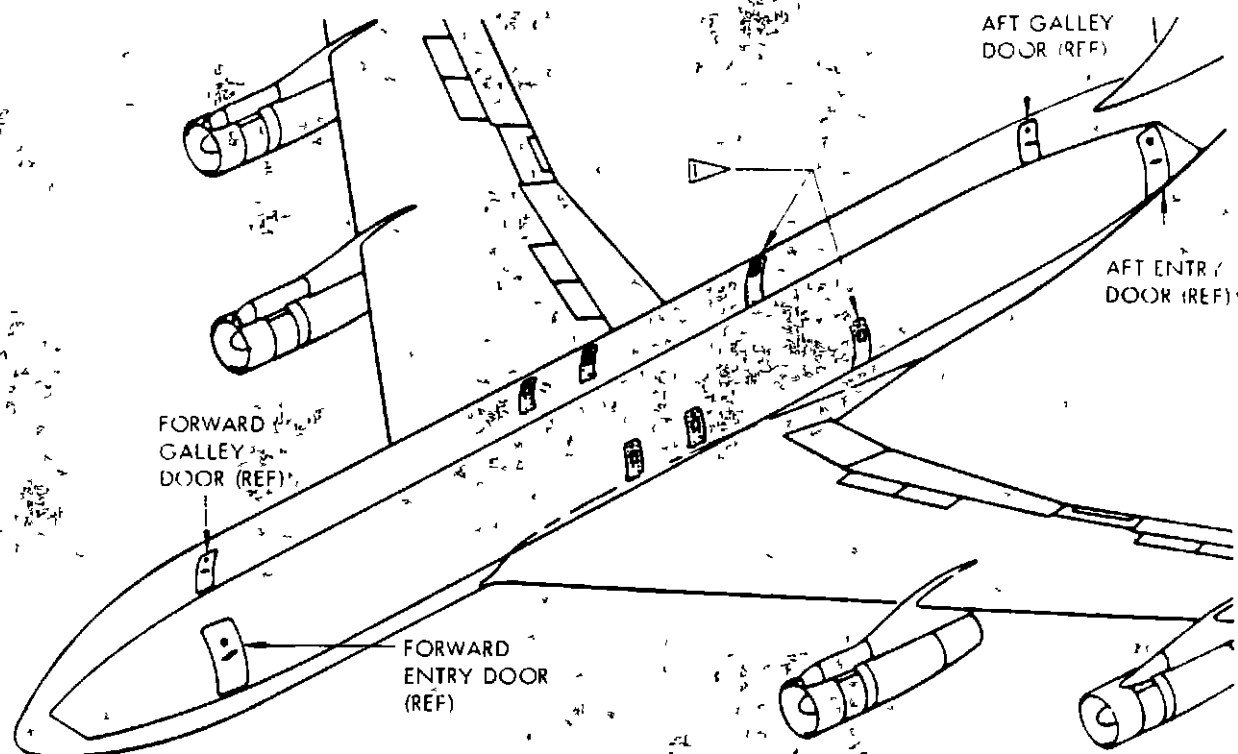
2. Remove Armrest

- A. Remove bolts securing armrest attachment bracket to escape hatch, remove armrest, and install trim plugs over bolt holes in pad assembly

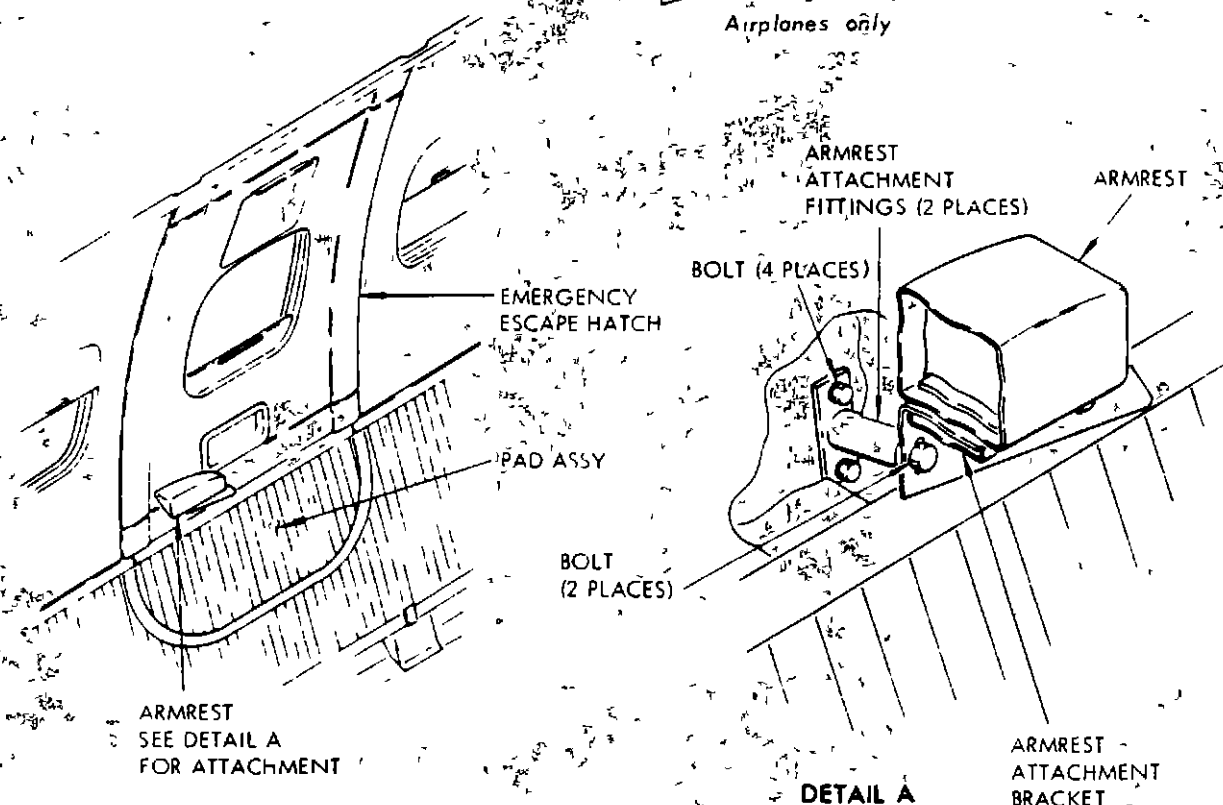
3. Install Armrest

- A. Remove trim plugs from pad assembly on lower portion of escape hatch
- B. Position armrest on escape hatch, aligning holes in armrest attachment bracket with armrest attachment fittings inside the hatch.
- C. Install bolts through holes in armrest attachment bracket and into armrest attachment fittings.

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Passenger/Cargo Convertible
Airplanes only



Typical Armrest Installation on Emergency Escape Hatch
Figure 401

PASSENGER LOUNGE SEATS - MAINTENANCE PRACTICES

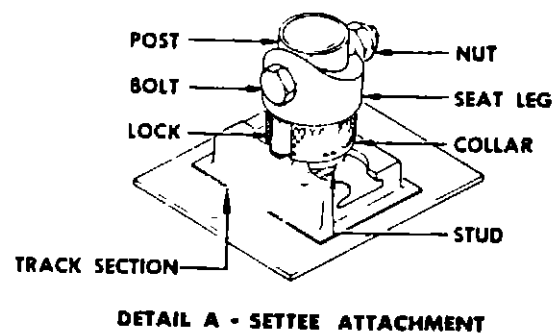
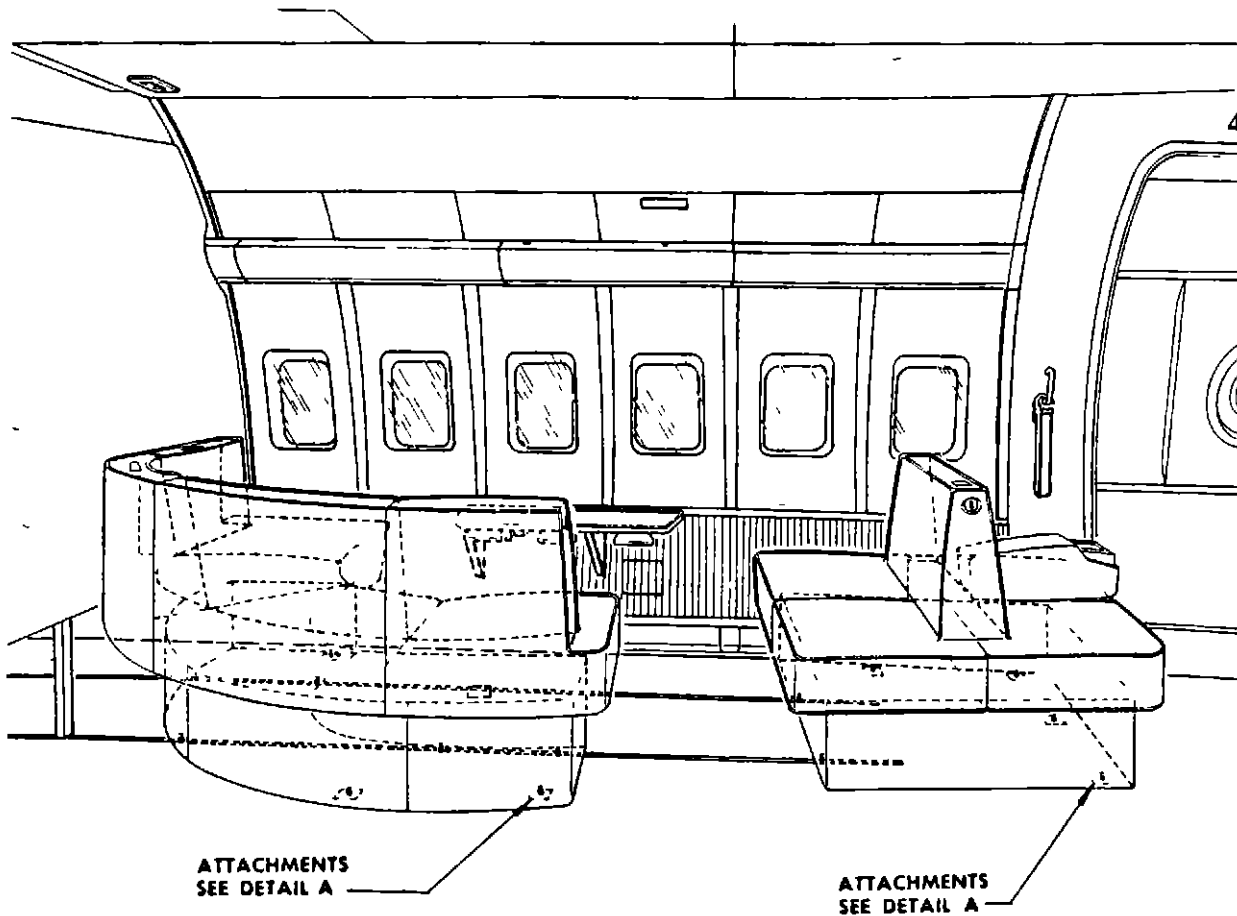
1 Removal/Installation Back-to-Back and Curved Settee (See figure 201)

A. Remove Back-to-Back and Curved Settee

- (1) Remove arm rests where necessary
- (2) Remove seat cushions for access to floor connections.
- (3) Unscrew quick release nuts at floor connections.
- (4) Move seat 1/2 inch forward or aft to disengage studs from floor track and remove seat

B. Install Back-to-Back and Curved Settee

- (1) Remove seat track covers as required
- (2) Drop studs into floor tracks
- (3) Move seat about 1/2 inch forward or aft to place studs in position between holes
- (4) Screw quick release nuts on floor connections to lock connections
- (5) Install seat cushions
- (6) Install arm rests where required

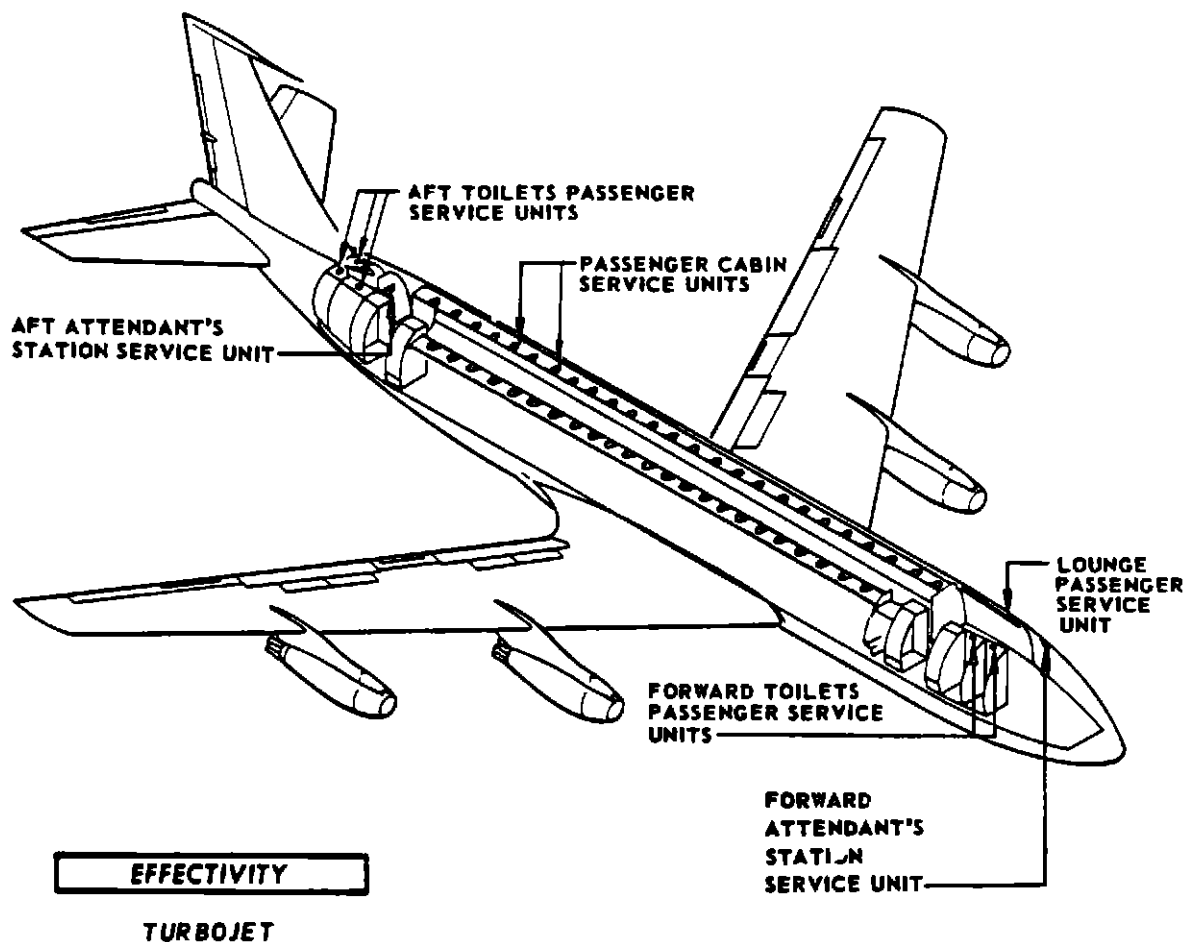


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PASSENGER SERVICE UNITS - DESCRIPTION AND OPERATION

1. General

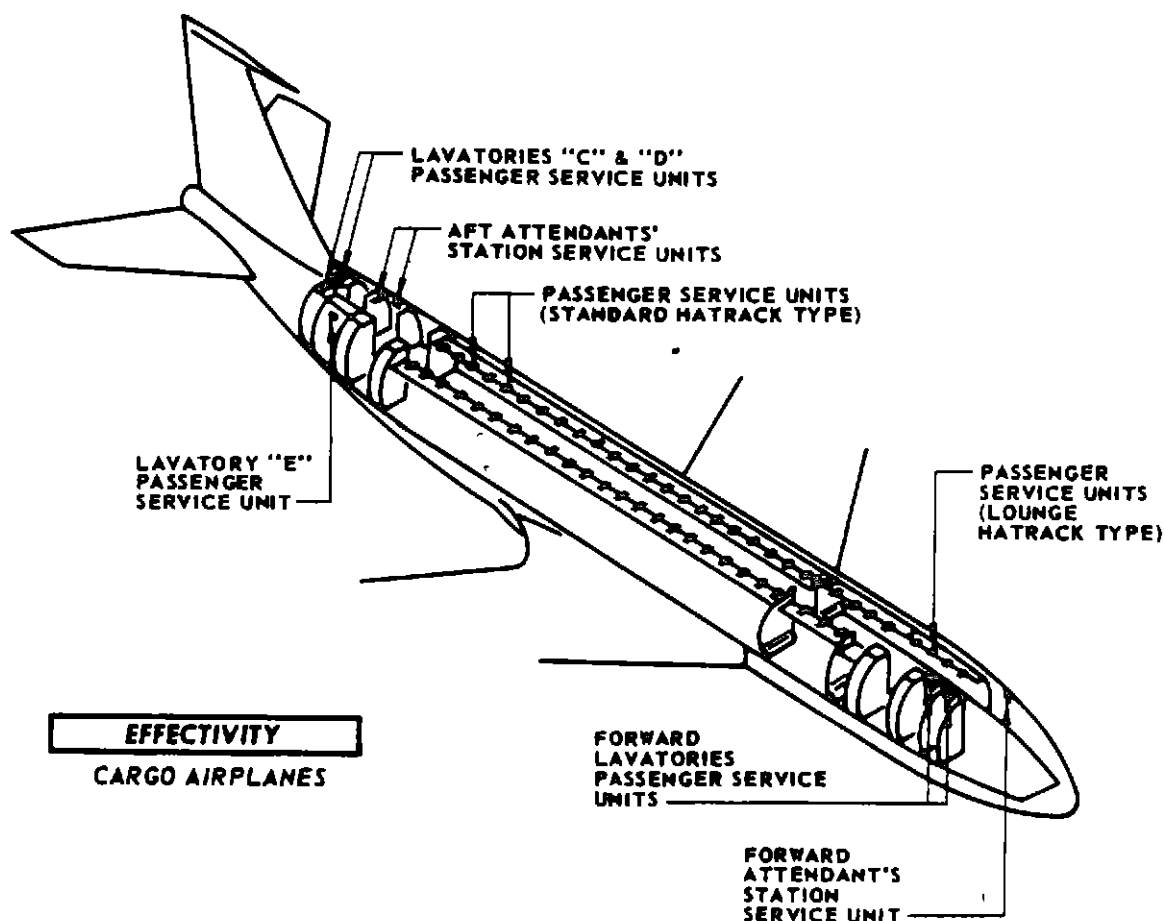
- A. Service units are provided in the airplane to supply air, emergency oxygen and electrical service for passengers' and attendants' use. The units are located in the passenger cabin over each row of seats, in the forward lounge, the lavatories and the attendants' stations. (See figures 1 and 2.)
- B. The units offer the following services as necessary: individual air, emergency oxygen, loudspeaker, reading lights, call button, and call light.
- C. Oxygen masks are stored in the units and released automatically by a pressure sensitive latch or manually by the attendant.



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2. Passenger Service Units (Standard Hatrack Type)

- A. The units provide the following services: individual air, emergency oxygen, loudspeaker, reading lights, call button, and call light.
- B. The units are suspended from two tracks on the hatracks along both sides of the cabin, and may be adjusted for different seat arrangements in increments of 1 inch. Each unit is located 4.5 inches forward from the intersecting line of the seat cushion and the seat back.
- C. Each unit has three individual-air outlets, three adjustable reading lights, one call button, and one call light. Each unit has provisions for four oxygen masks, with one mask supplied per seat.
- D. Air and oxygen outlets and electrical connectors are provided behind the upper closure panels at intervals of 20 inches throughout the length of the airplane. Flexible lines attached to the units permit an adjustment of 10 inches forward or aft of nominal location; on cargo airplanes these lines are long enough to allow the hatracks to be folded down into their stowed position without disconnecting the services.



Service Unit Locations
Figure 2

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3. Passenger Service Units (Lounge Hatrack Type, Cargo Airplanes Only)

- A. These are individual units installed in the lounge hatrack, flush with its lower surface. Each of these units is equipped with the same services as the units on the folding hatracks, from which they differ only in that they protrude above instead of below the hatrack.

4. Lounge Service Unit (Turbojet)

- A. The lounge unit mounts along the length of the wall of the forward lounge, and contains eight oxygen masks and two loudspeakers.

5. Lavatory Compartments Service Units

- A. Recessed into the ceiling of each lavatory compartment there is one unit containing one oxygen mask, a loudspeaker, and a domelight. On cargo airplanes the oxygen mask receptacle of lavatory "E" is in the upper part of the outboard wall of the compartment.

6. Attendant's Station Service Units

- A. These units are covered in section 25-16-0.

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PASSENGER CABIN SERVICE UNITS - MAINTENANCE PRACTICES

EFFECTIVITY

CARGO AIRPLANES

1. General

- A. The passenger service units throughout the cabin are of two types; those installed to the standard hatracks and those installed to the lounge hatrack
- B. The "standard hatrack" type of passenger service units are suspended from the underside of the hatracks along both sides of the cabin. (This includes all the folding hatracks and, where applicable, the fixed sections at the extreme forward and aft ends of the right side.) The positions of these passenger service units may be adjusted fore and aft along these hatracks in increments of one inch.
- C. The "lounge hatrack" type of passenger service units are mounted within the frame of the lounge hatrack, which is the single hatrack along the left side of the cabin forward of the cargo door. Also mounted within the lounge hatrack frame are blank panels of identical size to the passenger service units. Adjustment of the fore and aft location of these passenger service units is made by rearranging the sequence of passenger service units and blank panels.

2. Removal/Installation Passenger Service Unit (Standard Hatrack Type)

A. Remove Service Unit (See figure 201.)

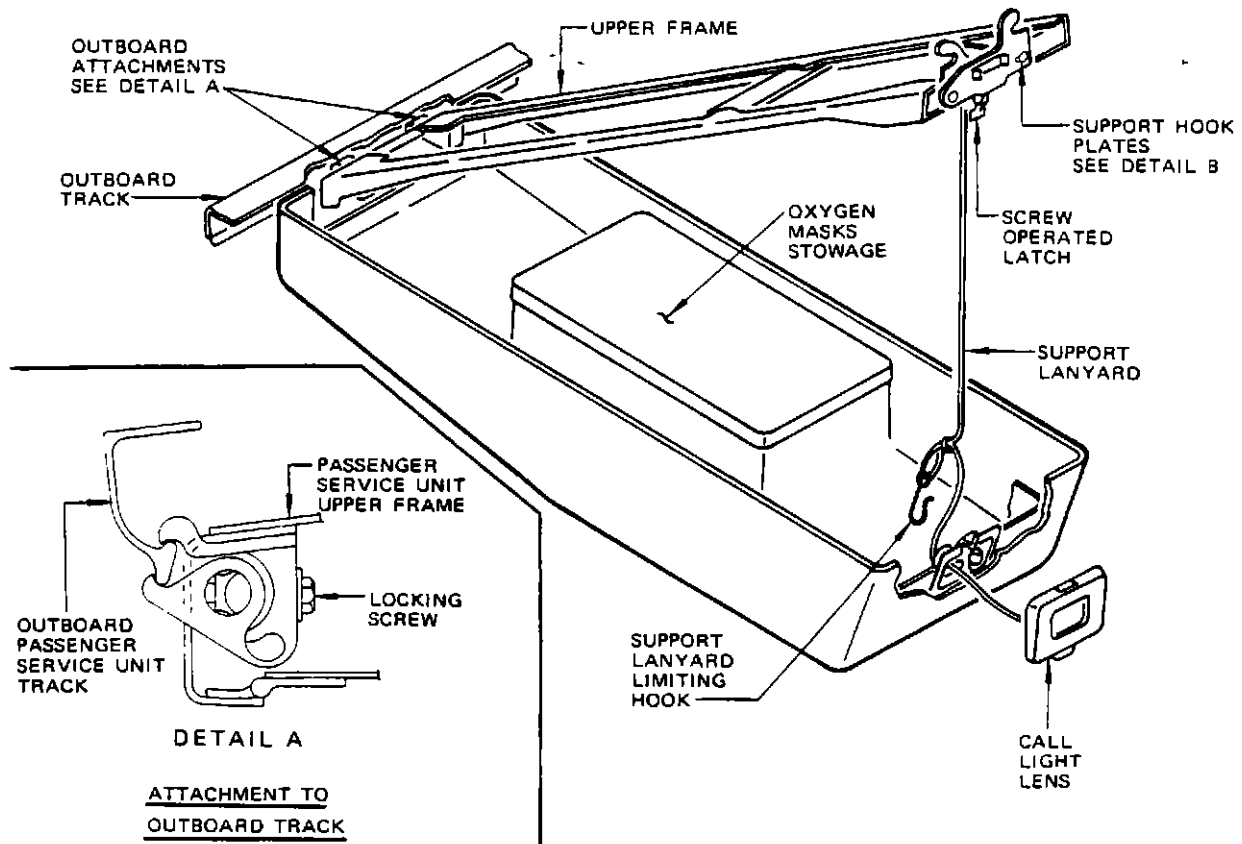
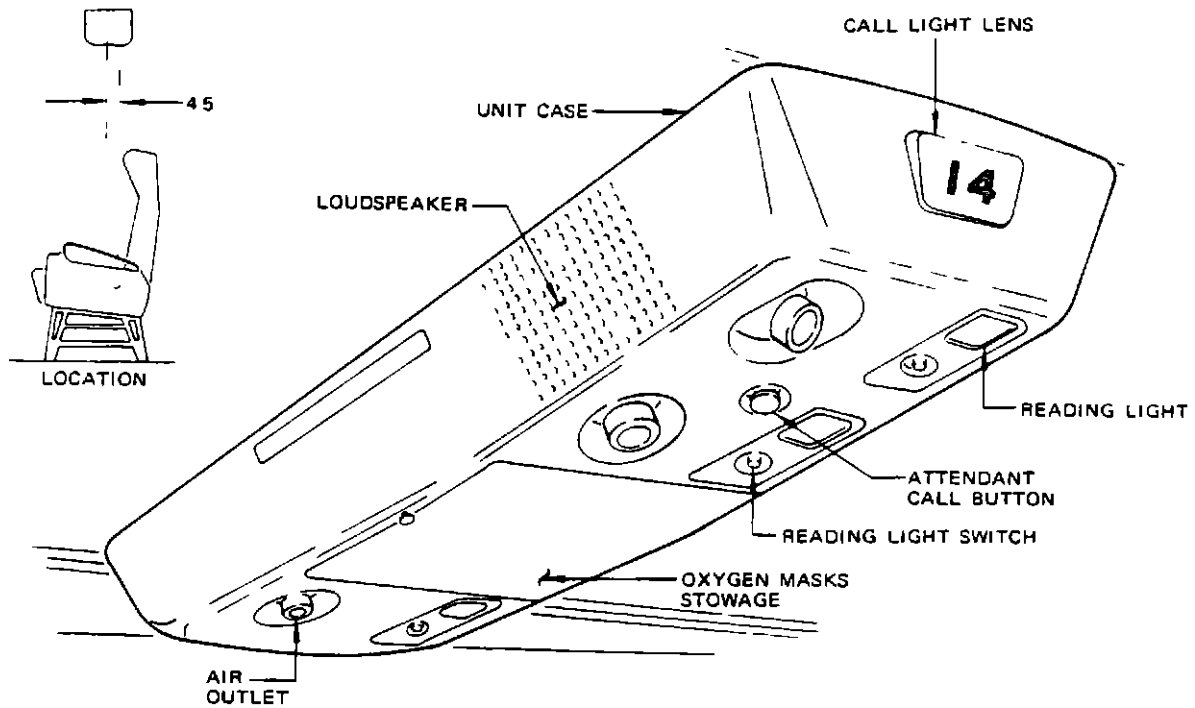
- (1) Obtain access behind upper closure panel by lifting panel clear of its support and allowing it to hinge down to upper surface of hatrack.

NOTE: At the fixed hatrack sections, the upper closure panel must be removed by disconnecting its lower edge from the hatrack upper surface and then lifting it off its upper support.
Refer to 25-10-42.

- (2) Disconnect air, oxygen and electrical connections and the adjustment range limiting lanyard. Install caps to all supply connections on fuselage.

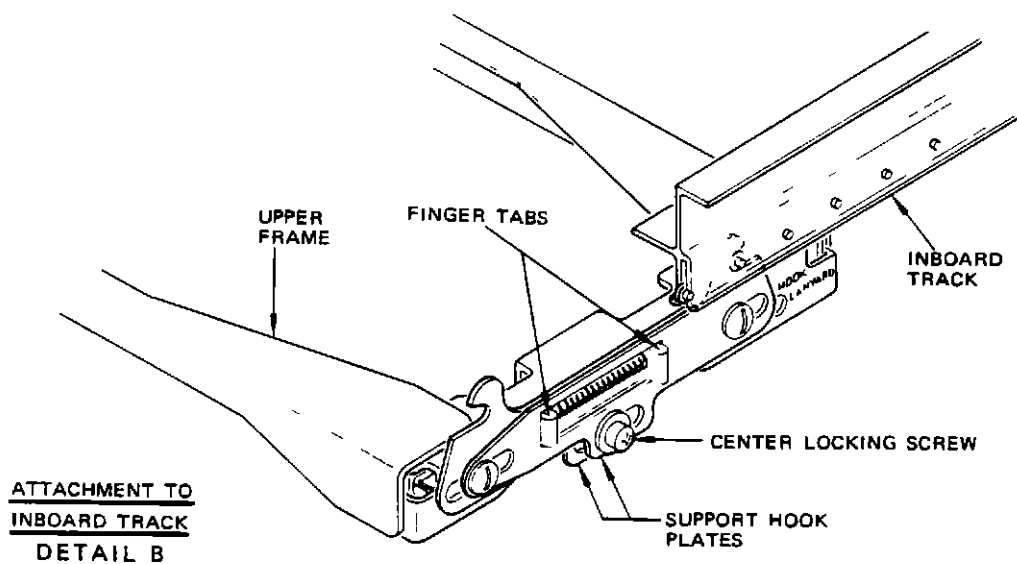
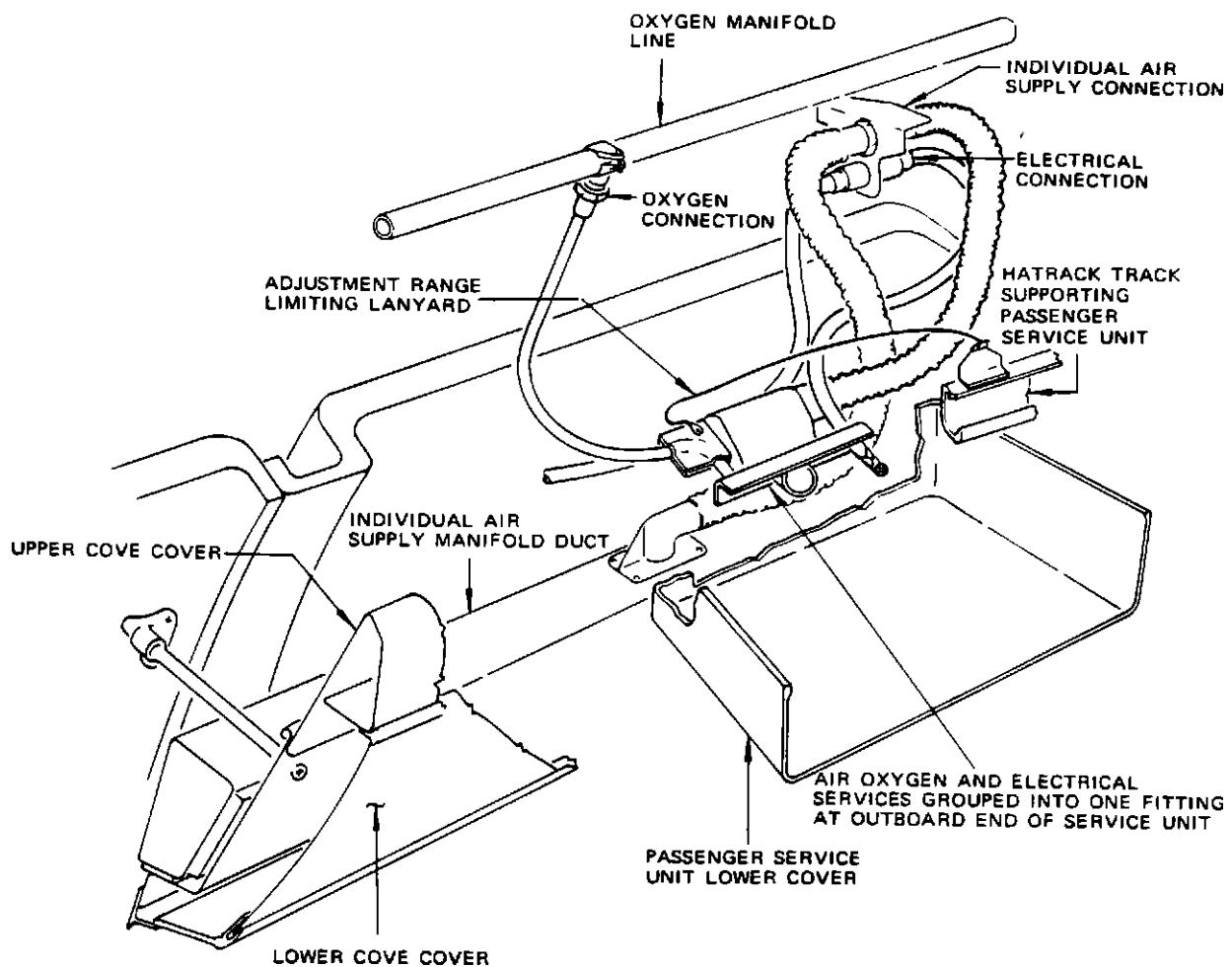
NOTE: Caps for the air and oxygen systems are provided adjacent to each connection. The air duct cap is stowed on a flexible plastic tab and the oxygen connection cap hangs from a short lanyard.

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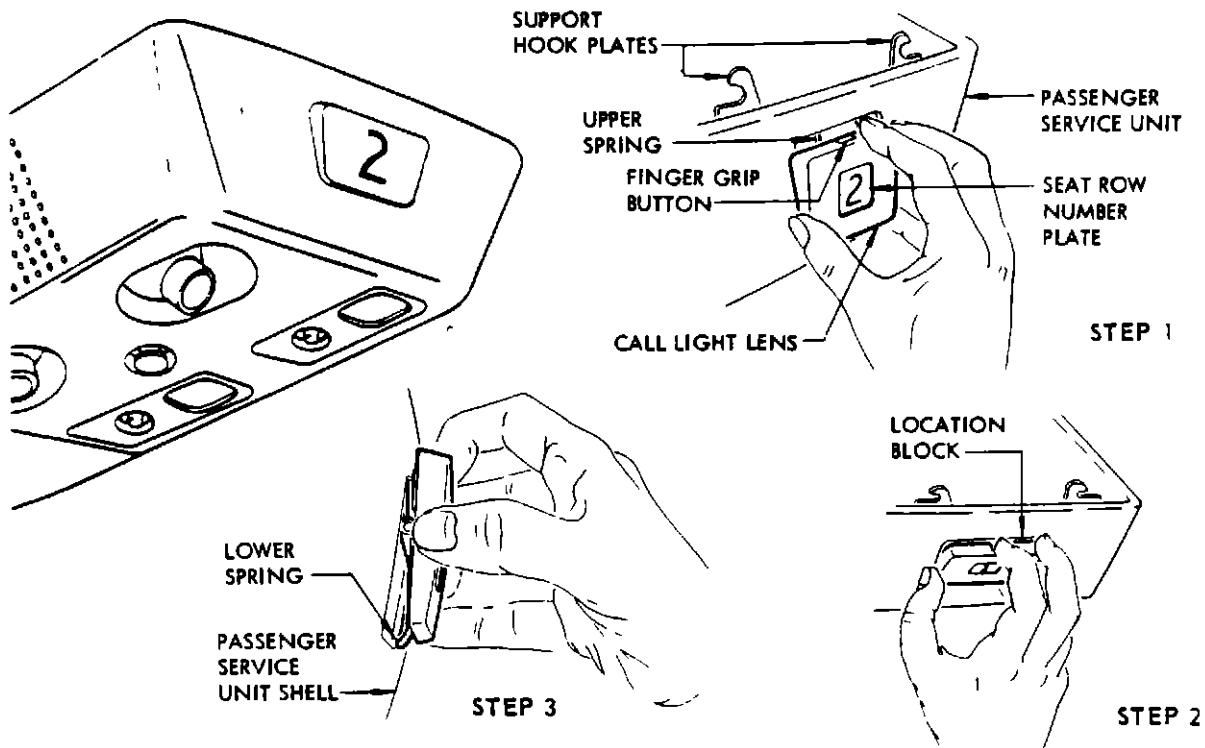


Passenger Service Unit (Standard Hatrack) Installation
 Figure 201 (Sheet 1)

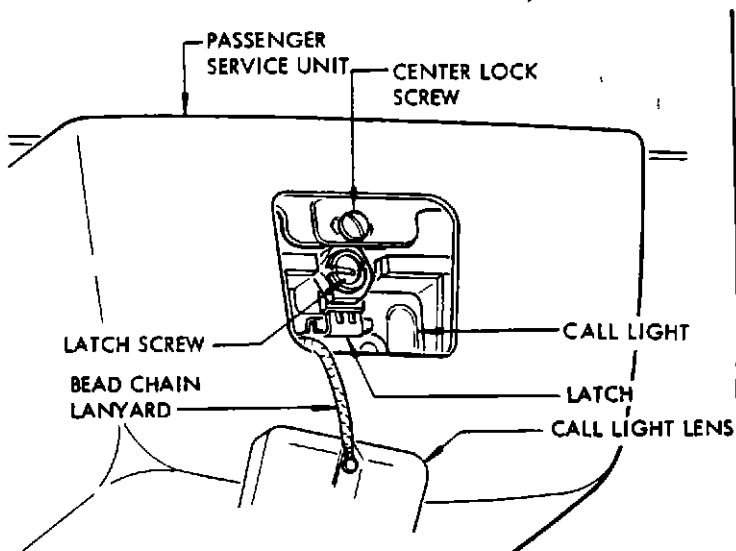
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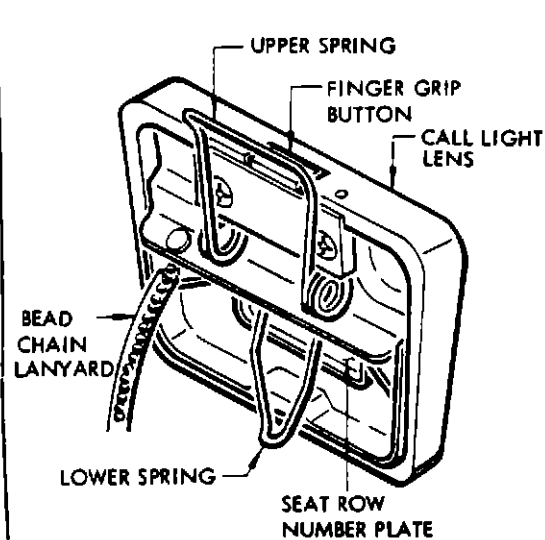
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CALL LIGHT LENS INSTALLATION ➤

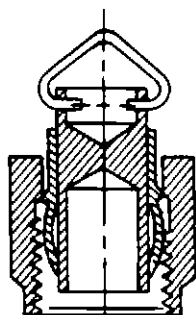


LOCKING DETAIL



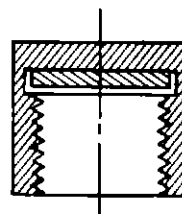
CALL LIGHT LENS DETAIL

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METAL CAP
(WITH NO GASKET)

TORQUE 120-130 IN LBS
WITH TORQUE WRENCH



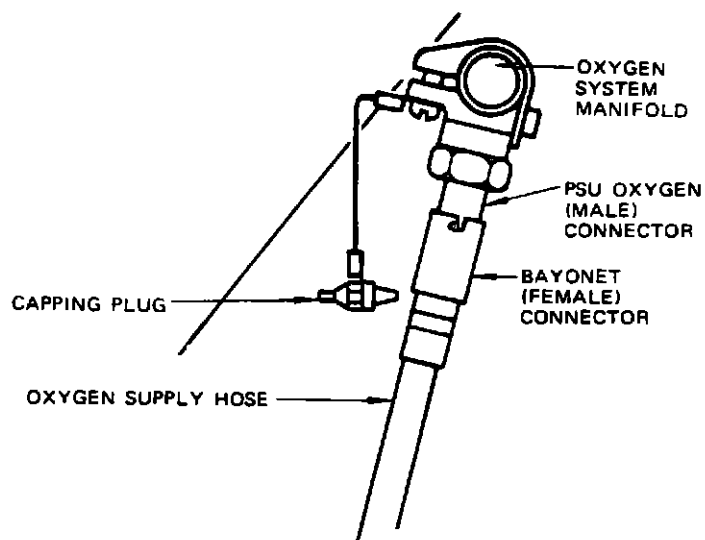
METAL CAP
(WITH GASKET)

TORQUE
7-10 IN LBS
(FINGER TIGHT)

NOTE THIS IS THE TYPE
INSTALLED ON
LATER AIRPLANES

TWO TYPES OF OXYGEN LINE CAPS

(Used on screw on type oxygen supply hook up)



BAYONET TYPE OXYGEN SUPPLY HOOK UP

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- (3) Open call light lens.
 - (a) Depress button with forefinger.
 - (b) Pull upper half of number holder upwards to clear lower spring.
 - (c) Withdraw call light lens.
- (4) Lower Passenger Service Unit.
 - (a) Unlock upper frame from lower case by turning latch screw counterclockwise as far as possible.
 - (b) Raise lower case to release latch.
 - (c) Lower unit case to extent of lanyard.
- (5) Loosen both outboard attachments.
- (6) Unscrew center locking screw and squeeze finger tabs on support hook plates together.
- (7) Lower inboard upper frame part of unit to clear inboard track, and release finger tabs.



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- (8) Raise unit case up to meet upper frame which is held up near hatrack and with a slight upward, inboard movement remove unit from outboard track.
 - (9) Close unit to its fully latched condition.
 - (10) Install call light lens.
 - (a) Insert upper spring in opening in passenger service unit
 - (b) Slide up till location block touches edge of opening.
 - (c) Pull out on top to clear location block, and slide up until lower spring goes into opening.
 - (d) Slide down and then side to side until cover seats in opening
 - (11) Check low pressure oxygen system for open connections. Refer to chapter 35, Passenger Oxygen System
- ≡ Install Service Unit (See figure 201)
- (1) Open call light lens.
 - (2) Unlatch upper frame from unit case.
 - (a) Turn latch screw counterclockwise as far as possible, raise lower case to release latch, remove limiting hook from slot in support hook plate, and lower unit case to full length of lanyard.



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- (3) With unit in approximately the right fore and aft location, and with unit tilted down on inboard end approximately 10° to hatrack (approximately horizontal) set outboard attachments of unit onto outboard track
- (4) With one hand holding upper frame-work, lower unit case to full length of lanyard.
- (5) Squeeze together finger tabs on support hook plates and insert into inboard track.

NOTE: Slight fore and aft adjustment may be required to put unit into exact position.

- (6) With unit located exactly and with inboard end full up, release finger tabs, and tighten center locking screw.

NOTE. Before tightening screw, spread finger tabs apart with fingers, and center inboard hook plates over flange of inboard upper support bracket. These precautions will eliminate rattle and will facilitate latching of inboard end of unit.

- (7) Tighten outboard locking screws.
 - (8) Index lights as required per seat-light arrangement diagram.
 - (9) Raise unit case up to approximately 3 inches from upper frame work and attach lanyard limiting hook to slot in support hook plate. Latch inboard end.
 - (a) Raise lower case, depress spring latch and release lower case. Turn latch screw clockwise as far as possible to tighten latch.
- CAUTION LANYARD MUST BE CLEAR OF INBOARD LATCHES BEFORE LATCHING OPERATION.
- (10) Install call light lens.
 - (11) Uncap oxygen fitting in sidewall and connect flexible oxygen hose.

CAUTION. FLEXIBLE HOSE MUST FOLD AFT IN ONE NEAT, UNKINKED, UNTWISTED LOOP AND MUST HAVE AN OBVIOUSLY FREE PATH FOR MOVEMENT. (See figure 201)



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- (12) Uncap air outlet on sidewall and connect flexible air duct

CAUTION DUCT MUST FOLD FORWARD IN ONE NEAT, UNKINKED, UNTWISTED LOOP AND MUST HAVE AN OBVIOUSLY FREE PATH FOR MOVEMENT (SEE FIGURE 201.)

- (13) Uncap electrical outlet on sidewall and connect electrical harness

CAUTION. ELECTRICAL HARNESS MUST FOLD FORWARD IN ONE NEAT, UNKINKED, UNTWISTED LOOP ON TOP OF FLEXIBLE AIR DUCT AND MUST HAVE AN OBVIOUSLY FREE PATH OF MOVEMENT (SEE FIGURE 201)

- (14) Connect adjustment range limiting lanyard.

- (15) Check all clamps, oxygen fittings and other components for a distance of 10 inches fore and aft of unit for proper positioning so that a minimum of interference to the free passage or folding of looped service lines will result in subsequent relocating operations. A trial relocating operation to extreme fore and aft limits will facilitate this check.

- (16) Check low pressure oxygen system for open connections Refer to chapter 35, Passenger Oxygen System.

5. Adjustment/Test Passenger Service Unit (Standard Hatrack Type)

A. Adjust Service Unit Location

- (1) Open call light lens.
- (2) Unlatch upper frame from unit case.
 - (a) Turn latch screw counterclockwise as far as possible, raise lower case to release latch, remove limiting hook from slot in support hook plate, and lower unit case to full length of lanyard.
- (3) Loosen center locking screw
- (4) Loosen outboard attachments.
- (5) Squeeze together finger tabs of inboard support hook plates and to the inboard upper frame until hooks just clear inboard track
- (6) Raise unit case until upper frame-work can rest on it. In this position the entire unit is approximately level and its inboard end is just clearing track.



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- (7) In a pushing movement, with pressure applied by palm of hand near outboard track, and with other hand resting under unit at inboard end to hold that end up level, relocate unit to desired position.

NOTE. It may be necessary to aid movement of lines by frame fittings. This can be done by inserting a screwdriver into loop of flexible oxygen or air hose after service unit is swung down from inboard hang-up point, and then carefully directing lines by outboard connections as unit is slowly moved past tight spot.

- (8) Squeeze finger tabs of inboard support hooks together and insert into inboard track.
- (9) With unit located exactly and with inboard end fully up, release finger tabs, and tighten center locking screw.

NOTE. Before tightening screw, spread finger tabs apart with fingers, and center inboard hook plates over flange of inboard upper support bracket. These precautions will eliminate rattle, and will facilitate latching of inboard end of unit.

- (10) Raise inboard end of unit case to secure limiting hook to slot in support hook plate.
- (11) Tighten outboard locking screws.
- (12) Raise inboard end of unit case to join upper frame.

CAUTION MAKE SURE THAT INBOARD LOCKING PINS ENGAGE UPPER FRAME SECURELY. (See Figure 201.)

- (13) Install call-light lens
- (14) Install upper closure panel



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4. Removal/Installation Passenger Service Unit (Lounge Hatrack Type)

A. General

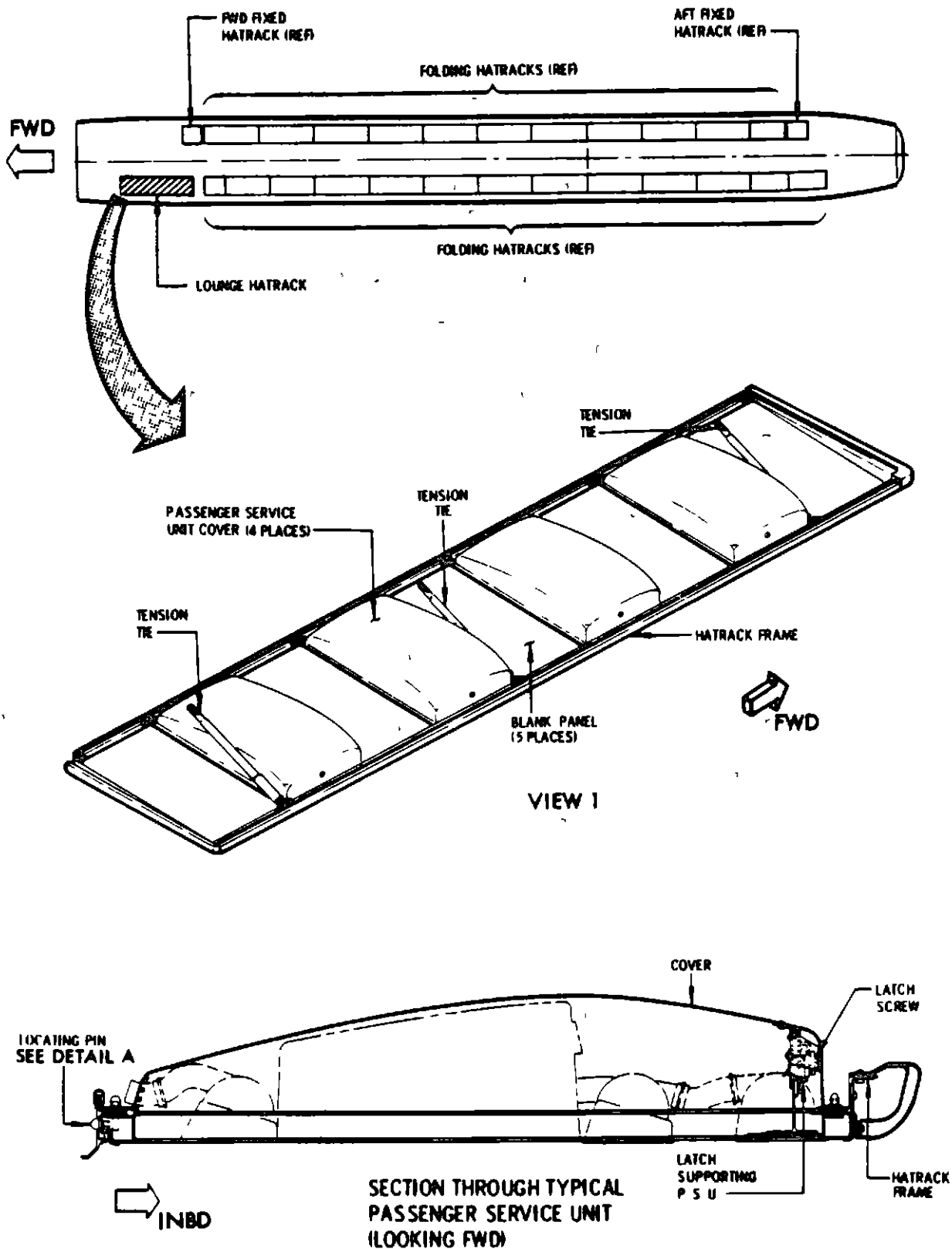
- (1) The lounge hatrack contains four passenger service units and five blank panels. The disposition of the passenger service units along the hatrack may be varied by exchanging any one of them with either of its adjacent blank panels, in order to provide for different accommodations configurations. The air, oxygen and electrical lines leading to each service unit are long enough to permit such changes of position to be accomplished without disconnection of the lines. The inboard end of each service unit may be hinged down for maintenance access to its air, oxygen and electrical components.
- (2) Disconnection of the air, oxygen and electrical lines is only necessary in the event that a service unit is to be completely removed from the airplane, or in the event that the whole hatrack is to be removed. See 25-10-42, "Hatracks - Maintenance Practices."
- (3) The service units are supported at their outboard ends by the lounge hatrack frame and at their inboard ends by covers which are attached to the hatrack frame. The blank panels are supported at their outboard ends in the same manner as the service units and their inboard ends are bolted to the hatrack frame.
- (4) Before any work is performed on the service units the hatrack must be in its down position. Refer to 25-10-42, "Hatracks - Maintenance Practices."

B. Relocation of Passenger Service Units and Blank Panels

- (1) Rotate latch screw counterclockwise as far as possible, lift service unit to disengage latch and lower inboard end of unit to extent permitted by lanyard.

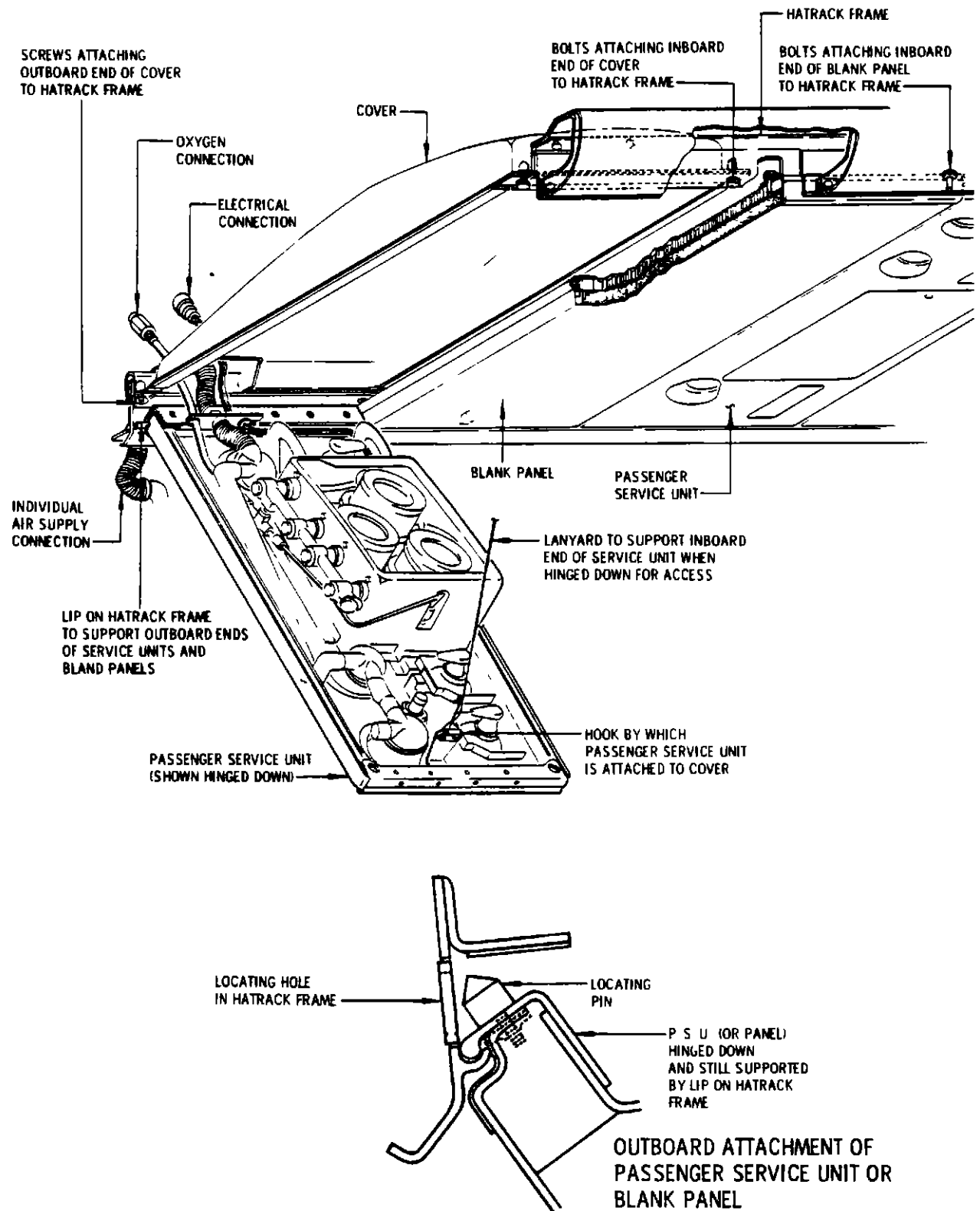
NOTE: The latch screw is accessible through a hole in the inboard end of the cover.

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Passenger Service Unit (Lounge Hatrack) Installation
Figure 202 (Sheet 1)

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DETAIL A

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- (2) Remove blank panels on either side of service unit.
 - (a) Unscrew two bolts attaching inboard end of each panel to hatrack frame.
 - (b) Lower inboard ends of panels until outboard ends may be disengaged from supporting lip on hatrack frame.
- (3) Disconnect cover from hatrack frame.
 - (a) Remove bolts attaching inboard end of cover to hatrack frame.
 - (b) Remove screws attaching outboard end of cover to hatrack frame.

NOTE: To obtain access to these screws it will be necessary to slide the service unit a short distance forward and aft along the lip in the hatrack frame which supports its outboard end.
- (4) Move service unit and its cover forward or aft along hatrack frame to new position. Attach cover to frame, sliding service unit slightly forward and aft as necessary to provide access to outboard attachment screws of cover.

NOTE: The outboard end of each service unit, and of each blank panel, has a locating pin which, when the unit (or panel) is raised, engages a corresponding locating hole in the hatrack frame. These locating holes, and sets of attachment holes for the covers and blank panels, are provided at equal intervals along the hatrack frame.
- (5) Reinstall blank panels.
 - (a) Engage outboard edge of one blank panel in lip on hatrack frame and slide panel along until its locating pin aligns with locating hole of hatrack frame.
 - (b) Raise inboard end of panel and install two bolts attaching it to hatrack frame.
 - (c) Repeat these steps for other blank panel.

NOTE: One of these blank panels will now be in the position previously occupied by the service unit.
- (6) Raise inboard end of service unit and hold while rotating latch screw clockwise as far as possible to lock unit to cover.

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C. Remove Passenger Service Unit

- (1) Unlatch and lower inboard end of service unit, as described in B.(1).
- (2) Obtain access to air and oxygen connections by removing upper cove cover.
 - (a) Peel away plastic trim which retains upper edge of lower cove cover and remove cover.
 - (b) Unscrew and remove upper cove cover.
- (3) Disconnect and cap individual air supply duct, and disconnect oxygen line.
- (4) Reach above hatrack and obtain access to electrical connection by pulling fabric trim (attached by velcro tape) from between sidewall and outboard edge of hatrack.
- (5) Disconnect and cap electrical connection.
- (6) Disconnect lanyard from cover and lower inboard end of service unit until its outboard end may be disengaged from lip on hatrack frame. Withdraw air, oxygen and electrical lines carefully through slot at outboard end of cover, and remove complete service unit.

D. Install Passenger Service Unit

- (1) Insert air, oxygen and electrical lines through slot at outboard end of cover, engage outboard end of service unit in lip of hatrack frame and connect lanyard which suspends its inboard end from cover.
- (2) Reach above hatrack to uncap and reconnect electrical connection, and replace fabric trim (attached by velcro tape) which was removed for access.
- (3) Uncap and reconnect air supply duct, reconnect oxygen line and reinstall upper and lower cove covers.
- (4) Raise inboard end of service unit and hold while rotating latch screw clockwise as far as possible to lock unit to cover.

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PASSENGER SERVICE UNITS - INSPECTION/CHECK.

1. Inspection/Check Service Units.
 - A. Lower service unit or service panel until it is supported by the lanyard.
 - B. Check general condition of cool air and oxygen equipment. Check support clamps and latches.
 - C. Check that there is no twisting, binding or kinking in the service unit wire bundle and oxygen line when unit is in the closed position. Check that cold air hose does not have kinks or excessive bending.
 - D. Raise and latch service unit or service panel in closed position.
 - E. Test reading lights, call button, call light and loudspeaker whatever is installed.



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PASSENGER SERVICE UNITS - CLEANING/PAINTING

1. Passenger Service Units Cleaning

A. General

- (1) It is important to use only the cleaning detergents listed below to clean passenger service units. Use of improper cleaning materials may cause damage to the painted surfaces and plastic materials of the passenger service unit.

B. Equipment and Materials

- (1) Cleaning detergent, any of the following:
 - (a) High Concentrate 40.1
American-Lincoln Division of Scott and Fetzer Co.
518 S. St. Clair Ave., Toledo, Ohio 43606
(Mix 1 part cleaner to 32 parts water.)
 - (b) Spraywhite E, Kelite Corp., Berkeley Heights, New Jersey
(Mix 1 part cleaner to 10 parts water.)
 - (c) Clean Quick, Proctor and Gamble Co., 5201 Spring Grove,
Cincinnati, Ohio 45217
(Mix 1 part cleaner to 64 parts water.)
 - (d) Orvus W.A. Paste, Proctor and Gamble Co., 5201 Spring Grove,
Cincinnati, Ohio 45217
(Mix 1 part cleaner to 30 parts water.)
 - (e) Glo Do-All Formula 3B, The Chemithon Corp.
5430 W. Marginal Way S.W., Seattle, Wash.
(Mix 1 part cleaner to 30 parts water.)
 - (f) Glo Do-All Formula 1B, The Chemithon Corp.
5430 W. Marginal Way S.W., Seattle, Wash.
(Mix 1 part cleaner to 20 parts water.)
- (2) Clean, dry cloths or absorbent paper toweling
- (3) Plastic spray bottle or sponge



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C. Clean Passenger Service Units

- (1) Apply one of detergent solutions listed in paragraph B by spray or by sponge dampened in solution.

CAUTION: DO NOT USE SOLVENTS. SOME SURFACES MAY BE DAMAGED BEYOND REPAIR BY USING IMPROPER CLEANING MATERIALS

- (2) Allow detergent solution to remain on surface approximately 2 minutes; then wipe with damp cloth.
- (3) Rinse surface with a clean cloth saturated with clean water.
- (4) Wipe dry with clean, dry cloth.

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PASSENGER SERVICE UNITS - APPROVED REPAIRS

1. General

A This procedure applies to the following approved repairs of passenger service unit shells made from Polysulfone:

- (1) Repair of scraped areas
- (2) Repair of cuts and gouges that do not penetrate the material
- (3) Repair of cracked areas
- (4) Repair of broken-off nondecorative sections

2. Passenger Service Units Approved Repairs

A Equipment and Materials

- (1) Pint or quart can with seal tight lid
- (2) Mechanical agitator
- (3) Rotary file (for repair of cracks on decorative side)
- (4) Clean dry cheesecloth
- (5) No. 400 (or finer) sandpaper
- (6) Methylene Chloride
- (7) Magna 8-W-5 Filler Compound
- (8) Magna Hardener 50-C-3
- (9) Naphtha
- (10) Strips of glass cloth, Style No. 120, Volan "A" finish (for repair of cracks and broken-off sections)

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B. Repair Passenger Service Unit Shell

(1) Preparation of Repair Cement

- (a) Cut or grind the same type and color of plastic to be repaired into approximately 1/8 inch squares.
- (b) Pour, by weight, four parts of Methylene Chloride and add one part of the cut plastic into a pint or quart can (with seal tight lid) and put on mechanical agitator. Continue agitation until plastic has dissolved (approximately 20 to 30 minutes).

(2) Preparation of Filler Compound

- (a) Mix Magna 8-W-5 Filler Compound with Magna Hardener 50-C-3 in accordance with manufacturer's instructions.

(3) Repair of Scraped Areas

- (a) Wet sand (cold water) the scraped area with No. 400 (or finer) sandpaper.
- (b) Rinse the sanded area with cold water to remove sandpaper grit.
- (c) Wipe dry with cheesecloth.
- (d) Retexture the repaired surface if required.

(4) Repair of Cuts or Gouges that do not Penetrate the Material (Nondecorative Side)

- (a) Clean the cut or gouge with naphtha.
- (b) Fill the cut or gouge with repair cement so that the height of cement is above the surface of the material. Allow to dry.
- (c) If the repair cement shrinks below the surface of the material after drying, repeat step (b) above.
- (d) If required, sand the cemented area flush with the material surface using No. 400 (or finer) sandpaper.



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- (5) Repair of Cuts or Gouges that do not Penetrate the Material (Decorative Side)
- (a) Follow procedure described in steps (4)(a) through (c)
 - (b) Abrade the cemented area until flush with the decorative surface.
 - (c) Wet sand (cold water) the abraded areas with No. 400 (or finer) sandpaper to remove coarse marks.
 - (d) Rinse the sanded areas with cold water and wipe with cheesecloth.
 - (e) If repaired surface is "pitted" or "pock-marked," when viewed through a magnifying glass, use the following procedure to repair the "pitted" areas.
 - 1) Clean the "pitted" areas with naphtha.
 - 2) Apply filler compound. Allow to dry thoroughly.
 - 3) Wet sand (cold water) the repair areas using No. 400 (or finer) sandpaper until the excess filler compound has been removed.
- NOTE: The repaired areas shall be sanded within 4 to 6 hours; otherwise it will be very difficult to remove the excess filler compound.
- 4) Rinse the sanded areas with cold water and wipe dry with cheesecloth.
 - 5) Retexture the repaired surface, if required.
- (6) Repair of Cracked Areas (Nondecorative Sections)
- (a) Clean the crack and adjacent areas with naphtha.
 - (b) Clamp the cracked sections together.
 - (c) Brush coat the crack and adjacent surfaces (approximately 1/2 inch on either side of the crack) with repair cement.
 - (d) While the cement is still wet, place a 3/4 to 1 inch strip of glass cloth (Style No. 120, Volan "A" finish) over the crack on each side of the cracked section.
 - (e) Brush coat the glass cloth with repair cement. Allow to dry.

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(7) Repair of Cracked Areas (Decorative Sections)

- (a) Clamp the cracked sections together.
- (b) Cut a "V" groove in the crack on the decorative side using a rotary file. The depth of "V" groove shall be approximately one-half to two-thirds the thickness of the cracked section.
- (c) Clean the crack and adjacent areas with naphtha.
- (d) On the nondecorative side, brush coat the crack and approximately 1/2 inch area on both sides of the crack with repair cement.
- (e) While the cement is still wet, place a 3/4 to 1 inch wide strip of glass fabric (Style No. 120, Volan "A" finish) over the cemented crack and brush coat the glass cloth with repair cement. Allow to dry.
- (f) Fill the "V" groove on the decorative side with repair cement so that the height of the cement is above the decorative surface. Allow to dry.
- (g) Complete the repair in accordance with steps (4)(c) and (5)(b) through (e)5).

(8) Repair of Broken-Off Nondecorative Sections

- (a) Clean the faying and adjacent surfaces with naphtha.
- (b) Brush coat the faying surfaces with repair cement and immediately clamp the broken sections together.
- (c) Brush coat both sides of the bondline and adjacent surfaces (approximately 1/2 inch on either side of the bondline) with repair cement.
- (d) While the cement is still wet, place a 3/4 to 1 inch wide strip of glass cloth (Style No. 120, Volan "A" finish) over the bondline on each side of the section.
- (e) Brush coat the glass cloth with repair cement. Allow to dry.



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BERTH SERVICE UNITS - MAINTENANCE PRACTICES

1 Removal/Installation Upper Berth Service Unit (see figure 201)

A Remove Upper Berth Service Unit

- (1) Remove closure panel
 - (a) Remove trim strip
 - (b) Disengage closure panel fasteners by turning 1/4-turn
 - (c) Pull bottom of closure panel inboard and push up to disengage upper lip attachment
- (2) Remove service unit attachment screws
- (3) Disconnect electrical and air supply connections
- (4) Disconnect and cap oxygen supply
- (5) Remove berth service unit

B Install Upper Berth Service Unit

- (1) Remove cap and connect oxygen supply
- (2) Connect electrical and air supply
- (3) Install service unit attachment screws
- (4) Install closure panel
 - (a) Position closure panel and pull panel down to engage upper lip attachment
 - (b) Engage closure panel fasteners
 - (c) Install trim strip

2 Removal/Installation Lower Berth Service Unit (see figure 201)

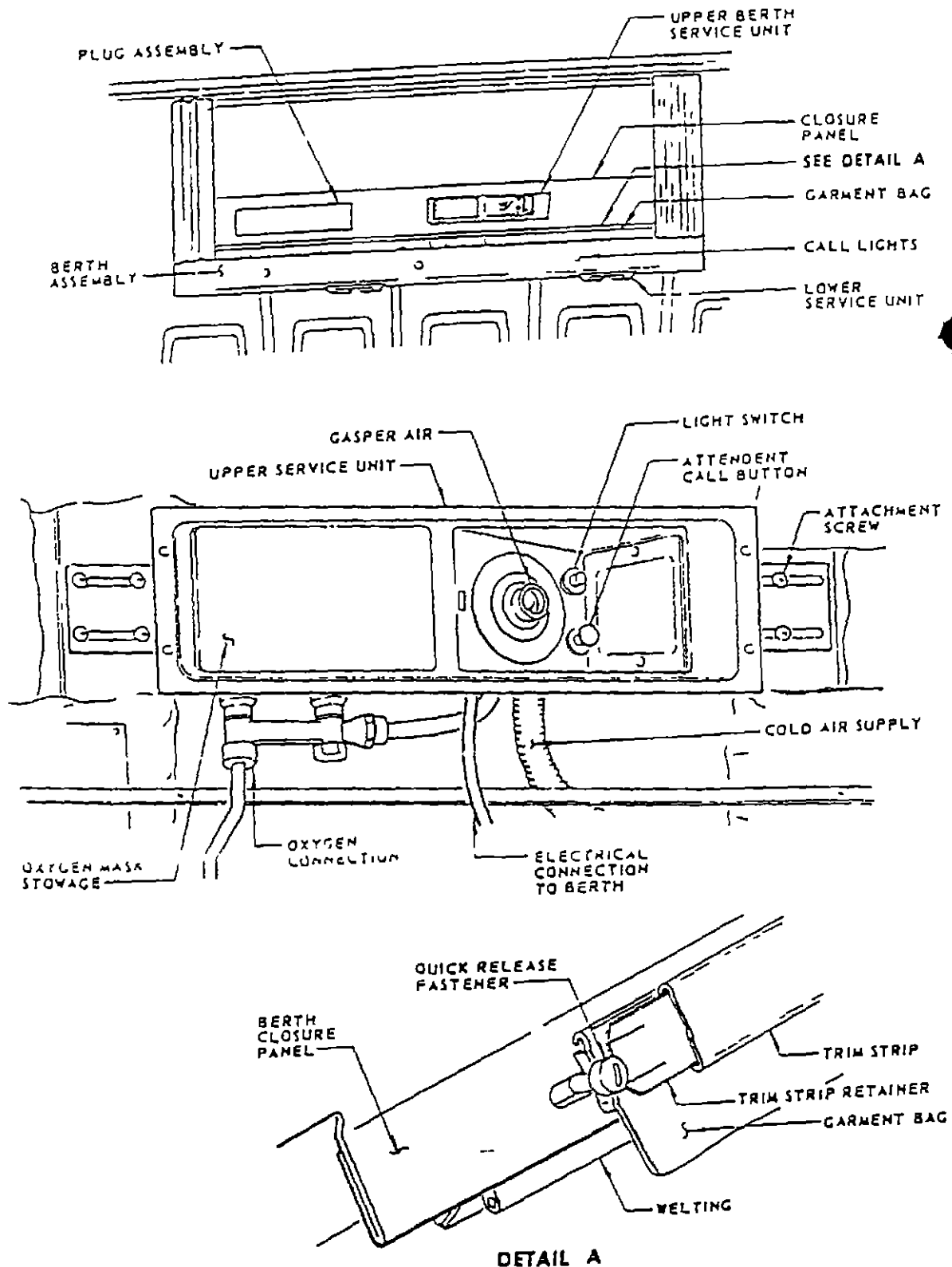
A Remove Lower Berth Service Unit

- (1) Disengage service unit cover fasteners by turning 1/4-turns

NOTE To gain access to service unit cover fasteners, hold the berth above the hatrack position

- (2) Pull outboard edge of service unit cover down and pull outboard to remove

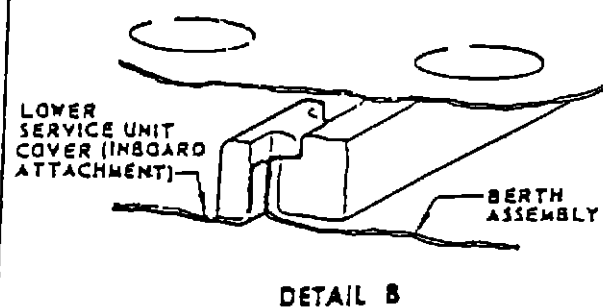
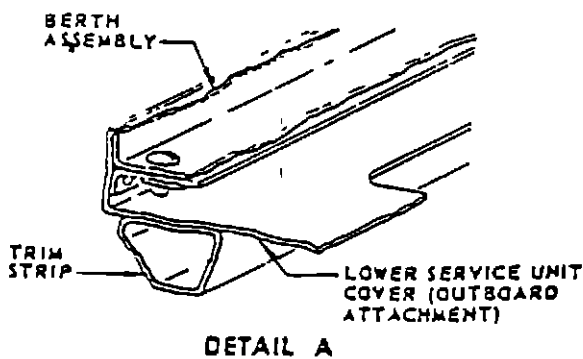
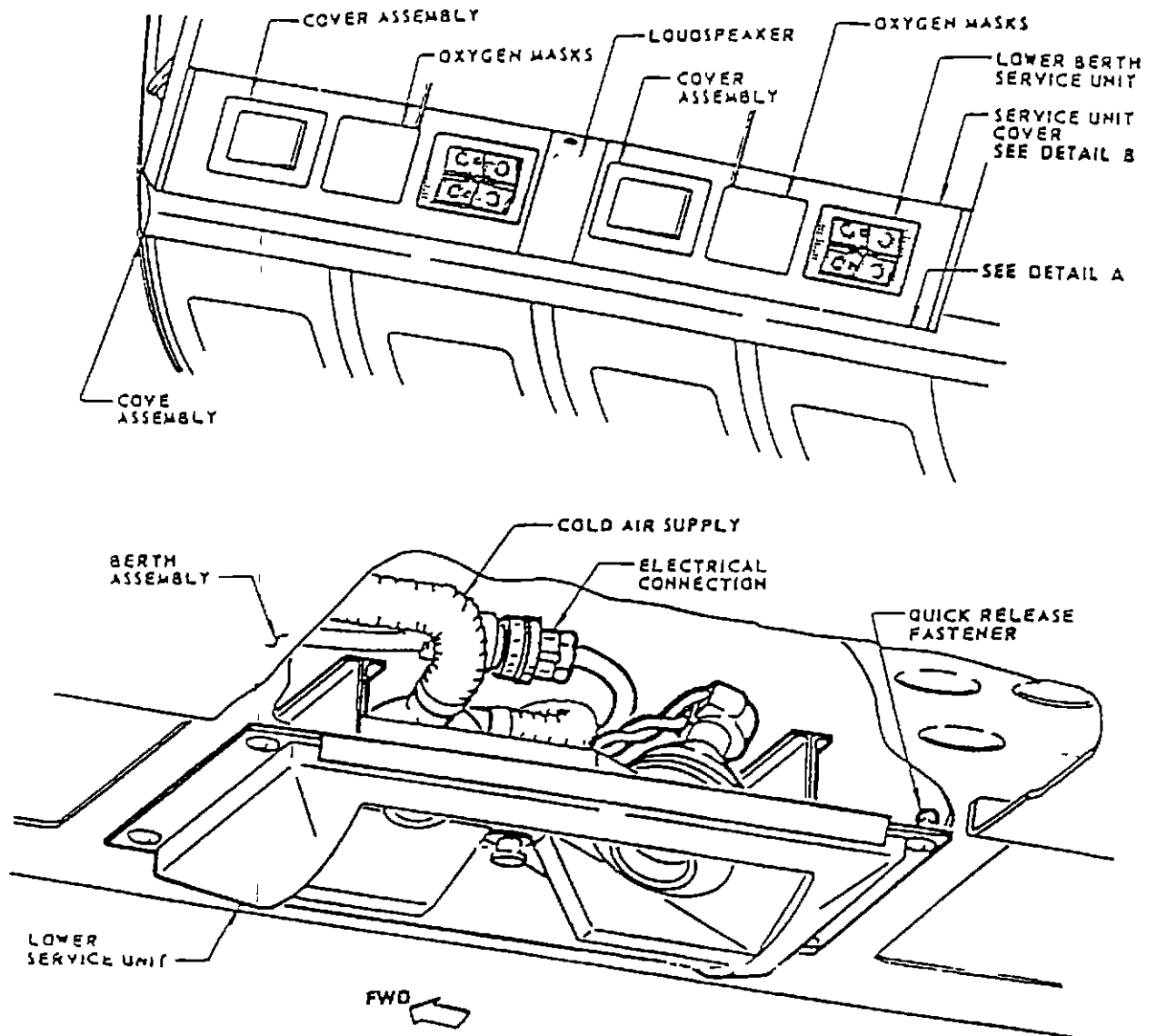
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Upper Berth Service Unit Installation
Figure 201

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Lower Berth Service Unit Installation
Figure 202

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- (3) Disengage service unit fasteners
- (4) Disconnect electrical and air supply
- (5) Disconnect and cap oxygen supply
- (6) Remove service unit

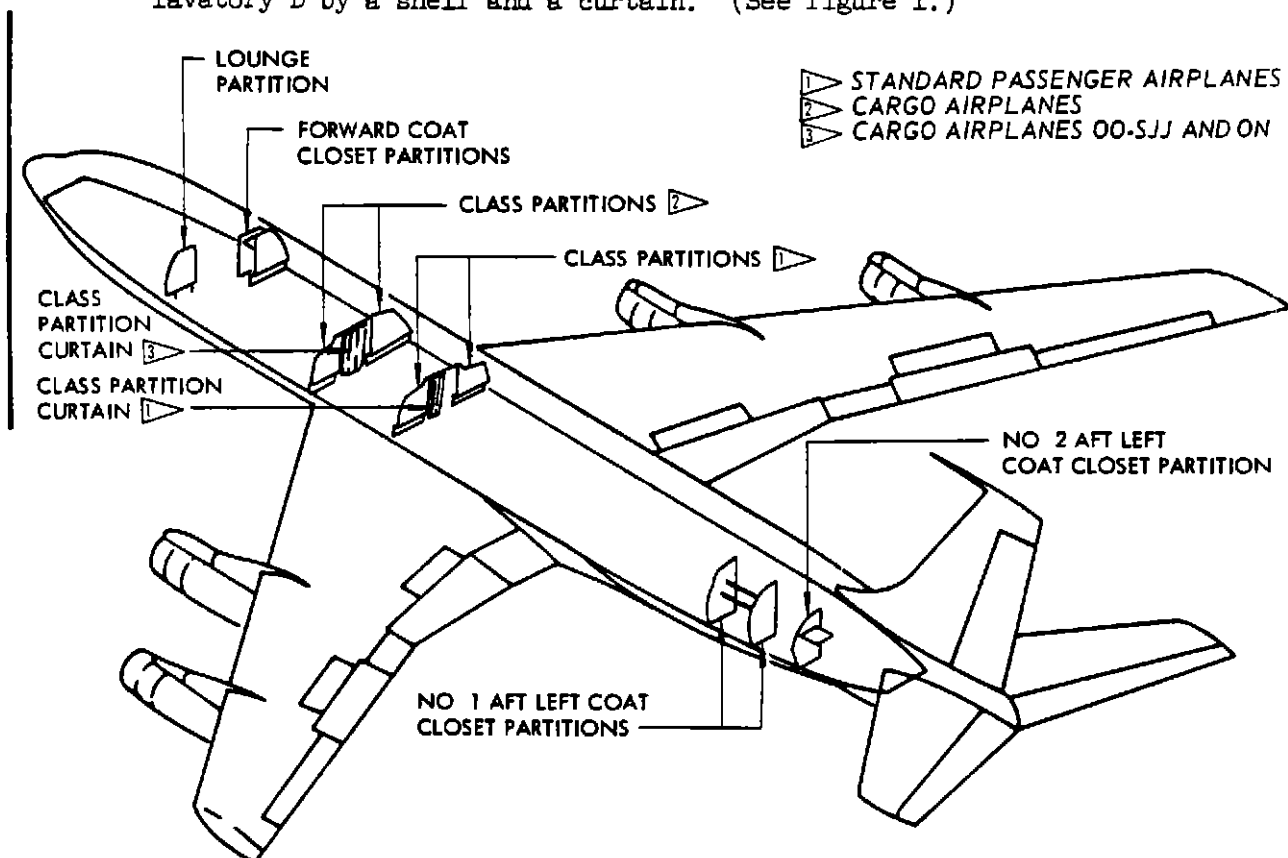
B Install Lower Berth Service Unit

- (1) Remove cap and connect oxygen supply
- (2) Connect electrical and air supply
- (3) Position service unit and engage service unit fasteners
- (4) Position service unit cover and push inboard to engage cover edge in attachment groove
- (5) Engage service unit cover fasteners

PASSENGER CABIN PARTITIONS - DESCRIPTION AND OPERATION

1. General

- A. Partitions are installed in the passenger cabin to divide it into different accommodation classes, to provide protection from weather at doorways, and to form closets and compartments. (See figure 1) The outboard edges of the partitions are shaped to the sides of the cabin sidewall and the inner edges vertical at the passageway. Special fittings such as cradle attachment and magazine racks are included as required. The partitions are attached to the floor tracks, hatracks and the overhead fuselage structure. They are made of fire resistant honeycomb core with a fiberglass facing and are vinyl covered for decorative purposes. Shelves and coat rods are attached between partitions to form coat closets, which are also furnished with a curtain.
- B Turbojet airplanes are provided with a lounge partition, class partitions, a forward coat closet and two aft coat closets. The No 1 aft left coat closet is immediately forward of the aft entry door, on the left side of the airplane. No 2 aft left coat closet is aft of the entry door and consists of a single forward partition, connected to the forward face of lavatory D by a shelf and a curtain. (See figure 1.)





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- C. Cargo airplanes are provided with partitions and closets similar to those of turbojet airplanes, except that certain components are designed to permit easier removal and installation for cabin conversion purposes. (See figure 1.)

2. Class Partitions

- A. The class partitions comprise a left and right partition with a passageway curtain. The partitions are attached to the floor seat tracks and overhead hatracks, which permit the partitions to be positioned anywhere along the constant cross section of the cabin, in increments of one inch. The configuration of the passenger cabin, after movement of the partitions, must meet the requirements of FAA regulation.
- B. On the standard passenger airplanes and cargo airplane OO-SJH, the class partition curtain consists of vertical curved slats arranged, in the manner of a folding door, to fold flat against the edge of the left partition when opened. When extended, closure is maintained by a ball catch fitting into a keyhole slot on the edge of the opposite partition. The curtains are supported internally by two rods which are attached to the locking frame of the curtain, and extend into the partition for support. Correct shape is ensured, when extended, by tapes attached internally to each slot. Stops are provided on the ends of the support rods and on the edge of the partition.
- C. The class partition curtain on the cargo airplanes OO-SJJ and on, consists of drapery fabric attached to a curtain track installed between the partitions, with a curtain tie-back installed on the left partition.

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3. No. 2 Aft Left Coat Closet

- A. The No. 2 aft left coat closet has a forward partition and uses the forward face of Lavatory "D" as its aft partition. A shelf and a curtain track are installed between these two partitions.
- B. The forward partition, on the forward face of which the aft attendant's seat is mounted, consists of a metal frame covered by forward and aft decorative panels. A trim strip with snap type fasteners is installed on the inboard edge of the partition. To gain access to electrical or oxygen equipment routed through the partition, the trim strip is detached from the inboard edge of the partition and the aft panel is removed by removing the screws attaching it to the frame. On cargo airplanes the electrical leads are connected to receptacles recessed into the lower sidewall just aft of the forward partition.

4. Partition Attachment Fittings (Turbojet)

- A. Several types of partition attachment fittings may be used to install partitions in the passenger cabin. These fittings consist of floor attachments, ceiling latches, hatrack attachments, shelf attachment, and coat rod attachment.
- B. Two types of floor attachments may be used. On one the stud foot is bolted to the seat track, and the partition leg is attached to the stud with an attachment pin. On the other type attachment the stud foot and partition leg form a foot assembly. This fitting is positioned in the seat track and secured by a retaining nut.
- C. Partitions are also attached at the hatrack or ceiling structure. Partitions are attached to the hatrack by bolts, or by two fittings attached to the inboard and outboard edge of the hatrack. The outboard fitting consists of an upper and lower jaw which are positioned on the hatrack track and secured to the track with a retaining screw. The inboard fitting consists of two wedge assemblies which are positioned between the spacers provided along the inboard edge of the hatrack. A retaining bolt secures the two wedges in position. These fittings slide into cut-outs in the top of the partition. Partitions may be secured at the ceiling with latch assemblies.
- D. Coat rods and shelves are provided in several of the coat closets. Two types of coat rods are used. One is a slide-out type which is bolted to the lower surface of the shelf. The other type is socket mounted to the partitions. The shelves are bolted to angles which are bolted to the surface of the partitions.

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5. Forward Coat Closet (Cargo airplanes)

- A. The forward coat closet consists of a forward full-height partition immediately aft of No. 2 galley and an aft partition extending from the floor to the underside of the hatrack. The forward partition is attached to the floor tracks and, by two locking pins, to the right side lowered ceiling panel. The aft partition is attached to the floor tracks and is connected to the forward partition by two coat rails and a shelf. The coat rails and the shelf are provided with pin connections for easy removal. A curtain track is provided across the inboard face of the closet and is connected to the forward and aft partitions.

6. Lounge Partition (Cargo airplanes)

- A. The lounge partition extends to the forward lowered ceiling and is installed aft of the lounge area, and immediately forward of the main cargo door opening. It is attached to the floor tracks by its two supporting legs and by two locking pins to the overhead structure.

7. No. 1 Aft Left Coat Closet (Cargo airplanes)

- A. The aft coat closet is immediately forward of the aft entry door and consists of two partitions, both attached to the floor tracks. The aft partition is attached to the aft end of the hatrack. The forward partition is attached to the aft partition by two coat rods and a decorative cover, which incorporates a curtain track.

8. Movable Cargo/Passenger Partition (Cargo airplanes)

- A. This partition is installed across the cabin in the combined passenger/cargo configurations to separate the passenger compartment from the cargo compartment. For further information refer to 25-36-0, "Cargo Equipment."



MAINTENANCE MANUAL

PASSENGER CABIN PARTITIONS - MAINTENANCE PRACTICES

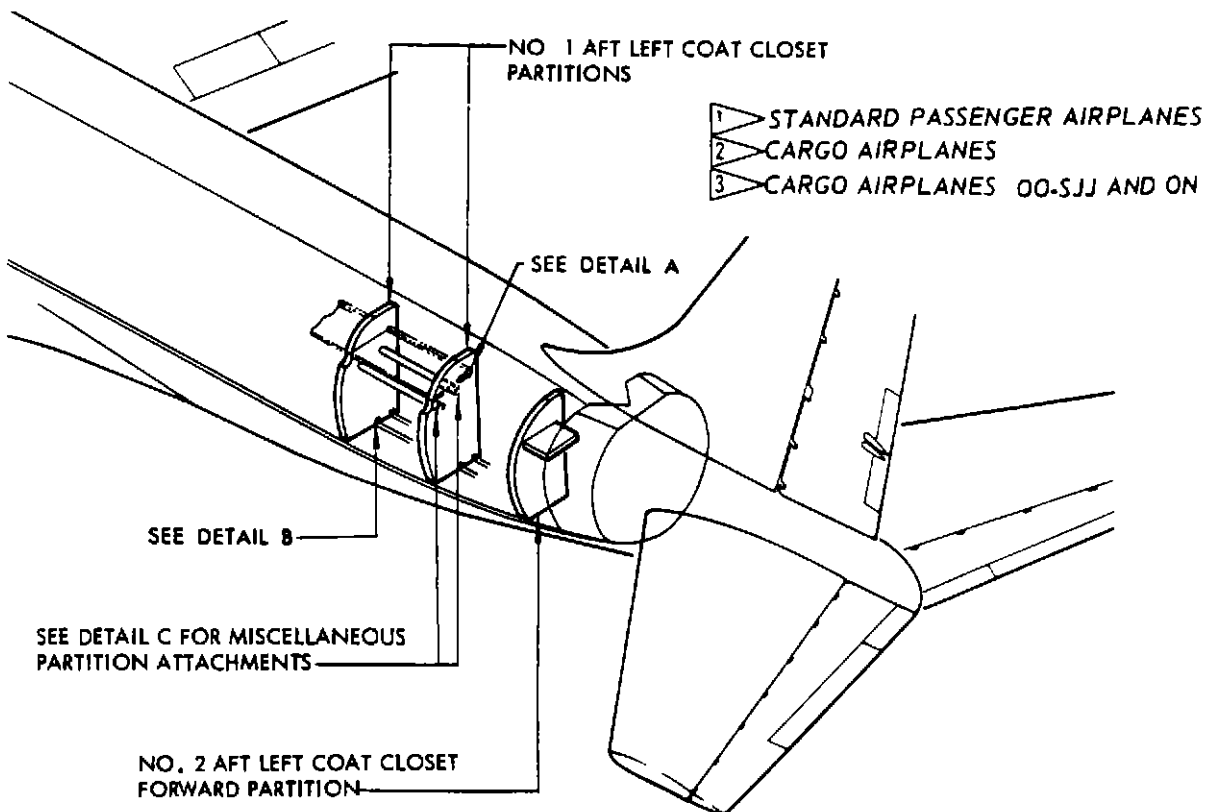
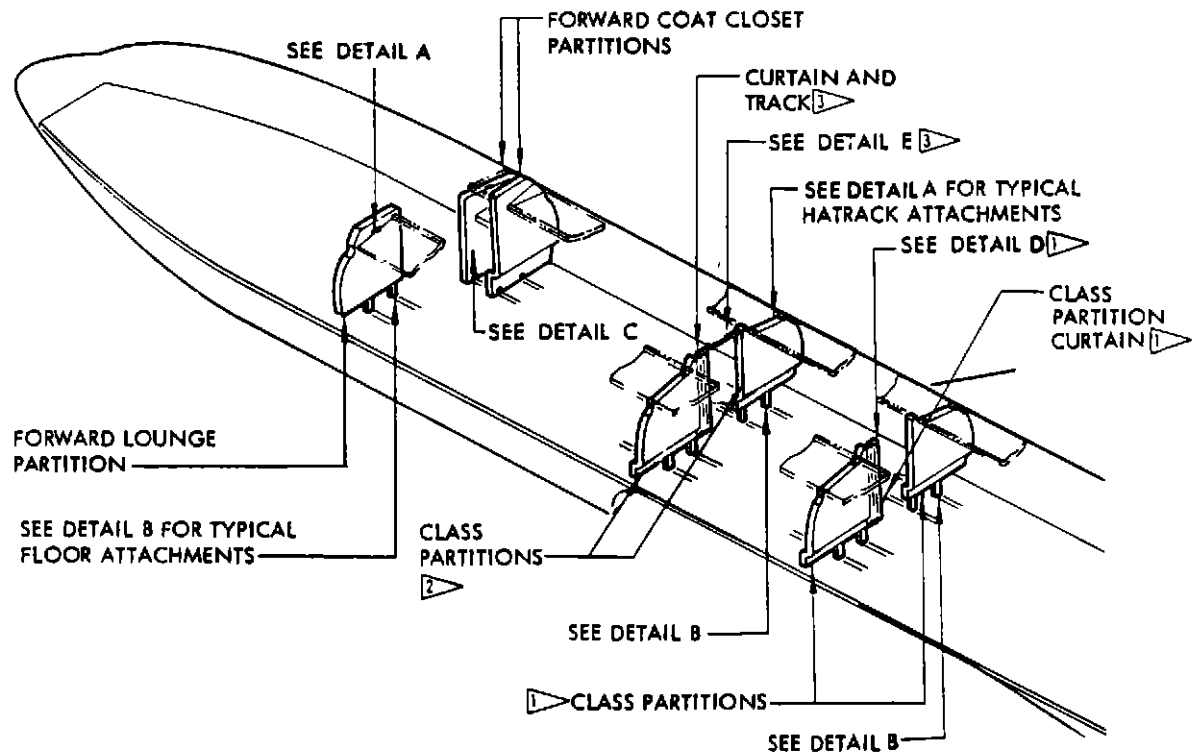
1. General

- A. Partitions installed in the passenger cabin are removed or installed in a similar manner, therefore, a typical removal and installation is given. Several types of partition attachments are used, these attachments are shown in figure 201. Partitions which are secured at the hatrack with inboard and outboard fittings are removed by releasing or removing the floor attachments and sliding the partition inboard until the partition clears the hatrack fittings. The other partitions are removed by releasing or removing the upper and lower attachments.

2. Removal/Installation Passenger Cabin Partitions (Typical)

- A. Remove Passenger Cabin Partitions (See figure 201.)
- (1) Disconnect wiring, and remove curtain tracks as required
 - (2) Remove shelves and coat rods as required
 - (3) Disconnect or release floor attachments
 - (4) Disconnect hatrack attachments as required
 - (5) Move partition forward or aft 1/2-inch allowing floor attachment fittings to release from seat tracks or seat track fittings.
 - (6) Remove partition
- B. Install Passenger Cabin Partitions (See figure 201.)
- (1) Support partition in proper position
 - (2) Connect hatrack attachment as required
 - (3) Move partition forward or aft 1/2-inch allowing floor attachment fittings to engage seat tracks or seat track fittings. Secure floor attachments.
 - (4) Install shelves and coat rods as required
 - (5) Connect wiring, and install curtain tracks as required

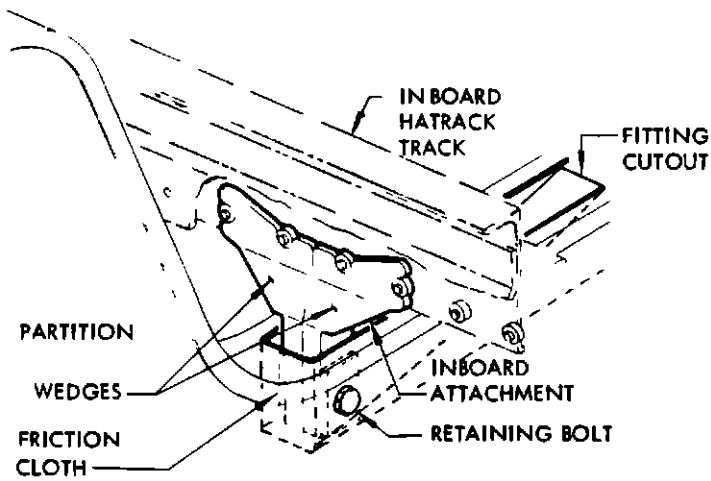
MAINTENANCE MANUAL



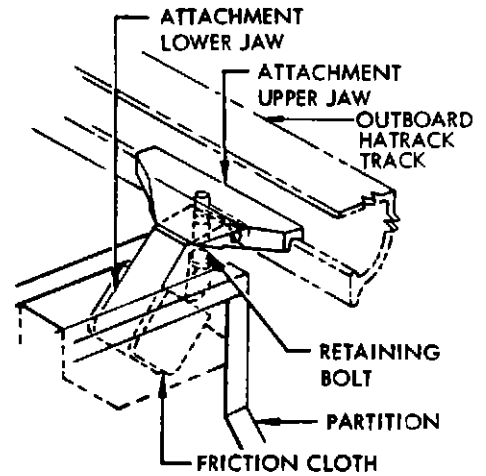
Passenger Cabin Partitions Installation
Figure 201 (Sheet 1)

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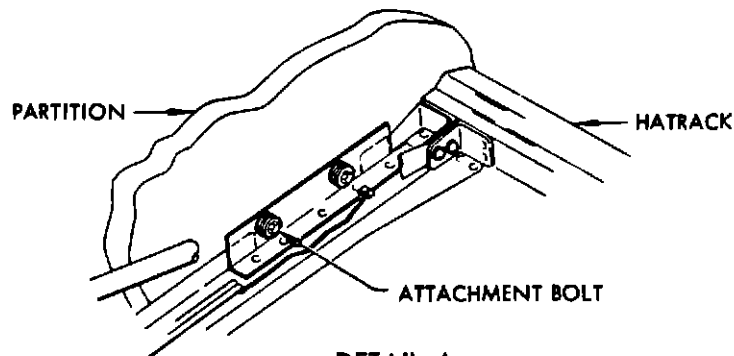
MAINTENANCE MANUAL



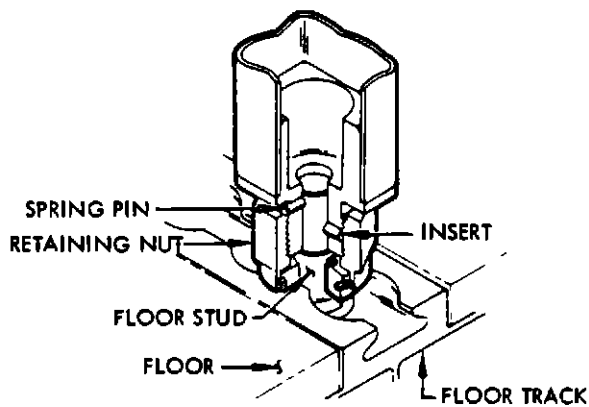
ATTACHMENT TO INBOARD TRACK OF HATRACK



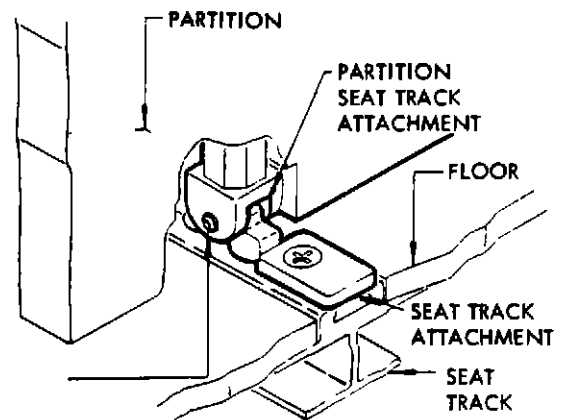
ATTACHMENT TO OUTBOARD TRACK OF HATRACK



DETAIL A
TYPICAL PARTITION TO HATRACK ATTACHMENTS



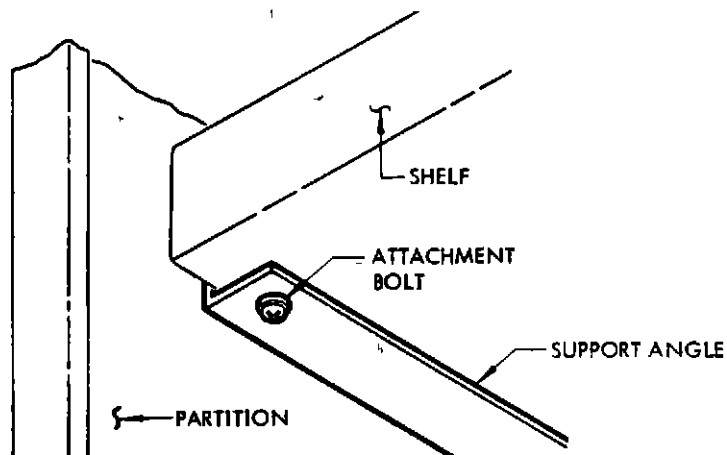
TYPICAL PARTITION TO SEAT TRACK ATTACHMENT



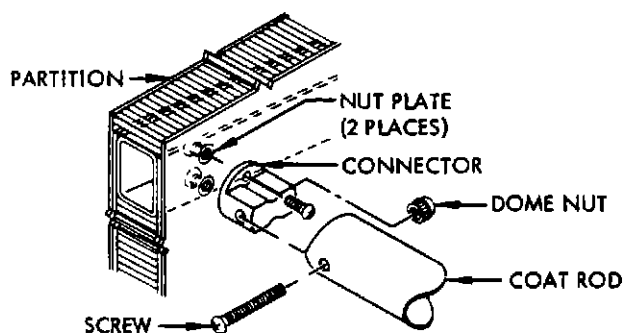
TYPICAL PARTITION TO FLOOR ATTACHMENTS

TYPICAL PARTITION TO SEAT TRACK ATTACHMENT

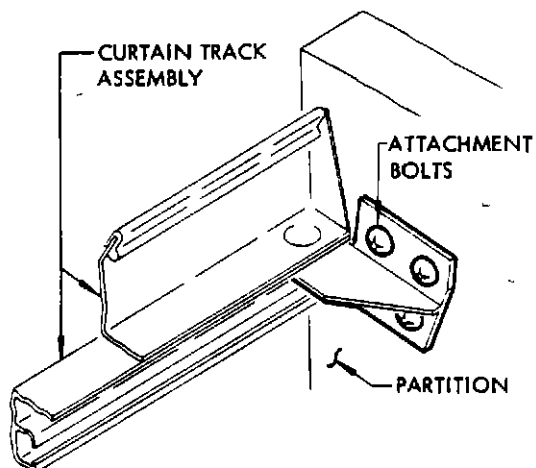
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SHELF ATTACHMENT



COAT ROD TO PARTITION ATTACHMENT

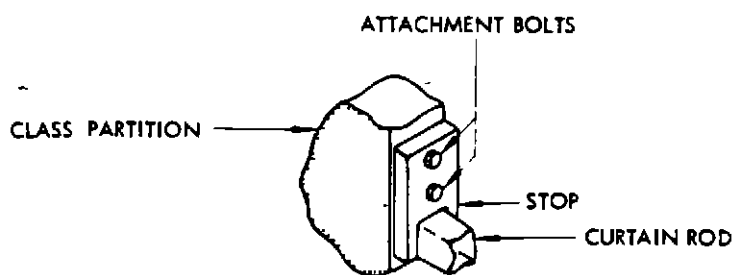


TYPICAL CURTAIN TRACK TO PARTITION ATTACHMENT

MISCELLANEOUS COAT CLOSET EQUIPMENT ATTACHMENTS

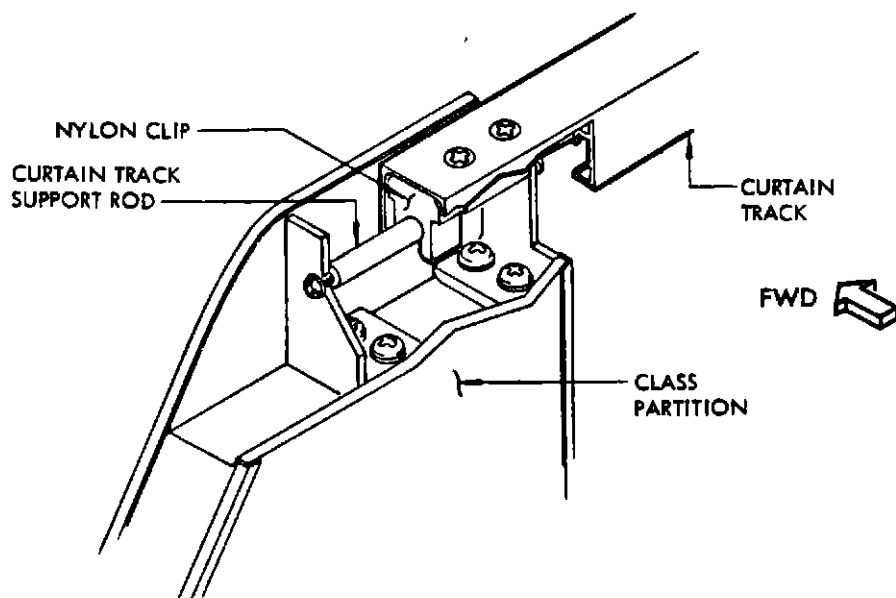
Passenger Cabin Partitions Installation
 Figure 201 (Sheet 3)

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DETAIL D 

CLASS PARTITION FOLDING
DOOR TYPE CURTAIN ATTACHMENT



DETAIL E 

CLASS PARTITION FABRIC
CURTAIN TRACK ATTACHMENT

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3. Removal/Installation Class Partition Curtain (Folding Door Type)

A. Remove Curtain

- (1) Peel plastic extrusion from partition at curtain attaching edge.
- (2) Unbolt stops from partition edge. (See figure 201.)
- (3) Slide curtain out from partition.

B. Install Curtain

- (1) Unbolt stops from partition edge.
- (2) Insert curtain support rods into partition.
- (3) Bolt stops to partition edge.
- (4) Press plastic extrusion on curtain attaching edge.

4. Removal/Installation Class Partition Curtain (Fabric Type)

A. Remove Curtain

- (1) Remove curtain from track.
- (2) Remove curtain track from top of each partition by lifting up on track. (See figure 201.)

B. Install Curtain

- (1) Position curtain track and press down on each end to engage nylon clip in track with support rod in top edge of each partition.
- (2) Attach curtain to track.

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CLASS PARTITIONS - MAINTENANCE PRACTICES

1. Removal/Installation Class Partition (See figure 201.)

A. Remove Class Partition

- (1) Unscrew nuts of floor track attachments. (Wrench may be required)
- (2) Disengage partition from floor track and slide inboard until upper attachments are free
- (3) Remove bolt from inboard hatrack attachment and withdraw both halves from track.
- (4) Loosen bolt in outboard hatrack attachment and remove attachment from track.

B. Install Class Partition

- (1) Insert inboard hatrack attachment halves at required position and bolt together.
- (2) Position outboard hatrack attachment in line with inboard attachment and bolt in place.
- (3) Slide partition outboard from aisle to engage slot along its upper edge with hatrack track attachments, adjusting position of outboard attachment if necessary.
- (4) Engage track attachment studs in floor tracks and position correctly.
- (5) Screw nuts down on floor track attachments (These should be finger tight only)

2. Removal/Installation Class Partition Curtain (Folding Door Type) (See figure 201)

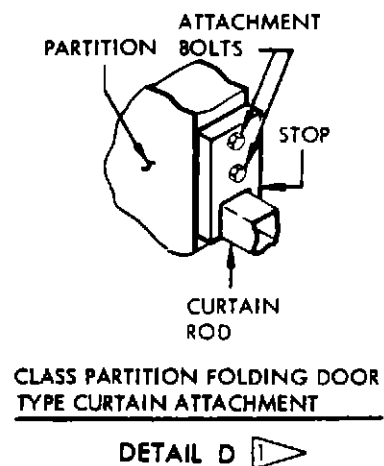
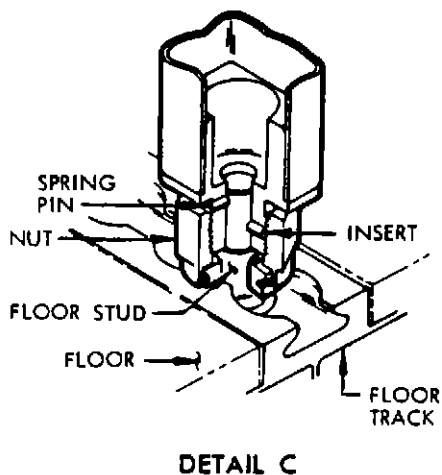
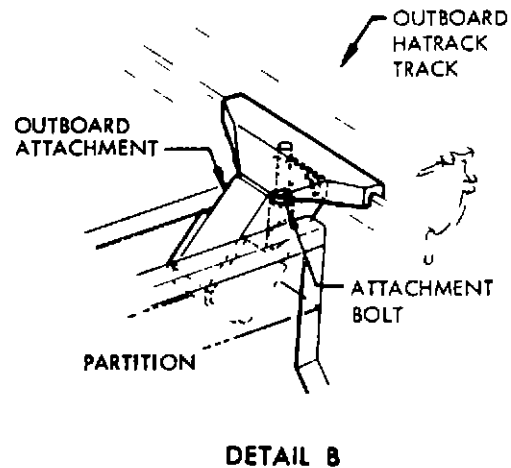
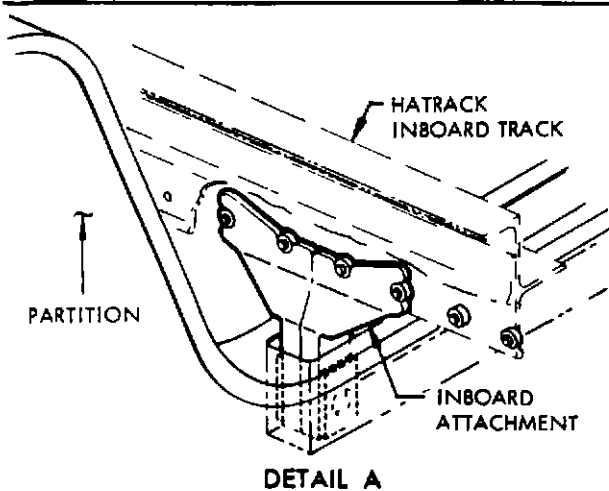
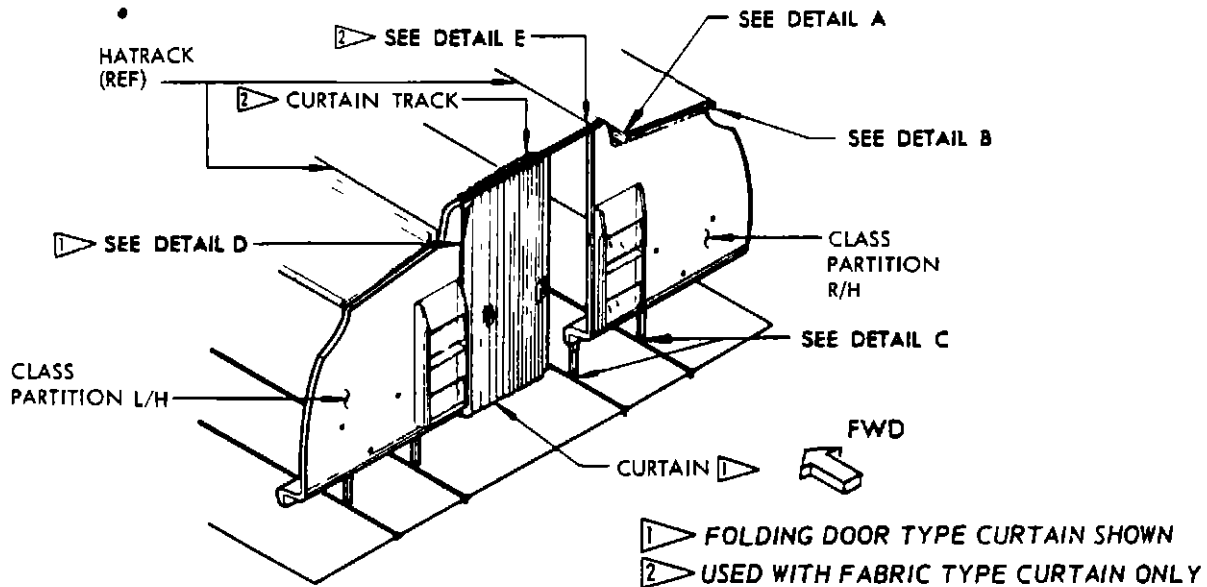
A. Remove Curtain

- (1) Peel plastic extrusions from inboard edge of left class partition.
- (2) Remove bolts attaching stops to edge of partition and withdraw curtain from partition.

B. Install curtain

- (1) Insert curtain support rods into edge of left partition.
- (2) Install bolts attaching stops to partition edge.
- (3) Press plastic extrusions into place

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Class Partition Installation
Figure 201 (Sheet 1)

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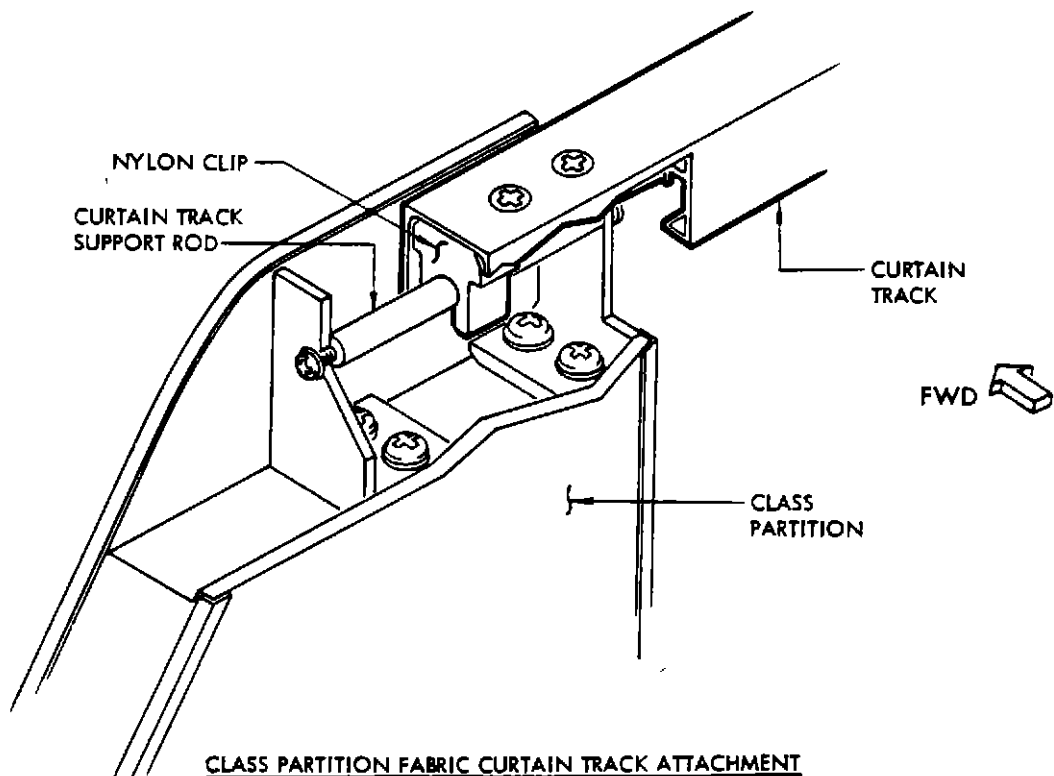
3. Removal/Installation Class Partition Curtain (Fabric Type)

A. Remove Curtain

- (1) Remove curtain from track.
- (2) Remove curtain track from top of each partition by lifting up on track. (See figure 201.)

B Install Curtain

- (1) Position curtain track and press down on each end to engage nylon clip in track with support rod in top edge of each partition. (See figure 201.)
- (2) Attach curtain to track.



DETAIL E



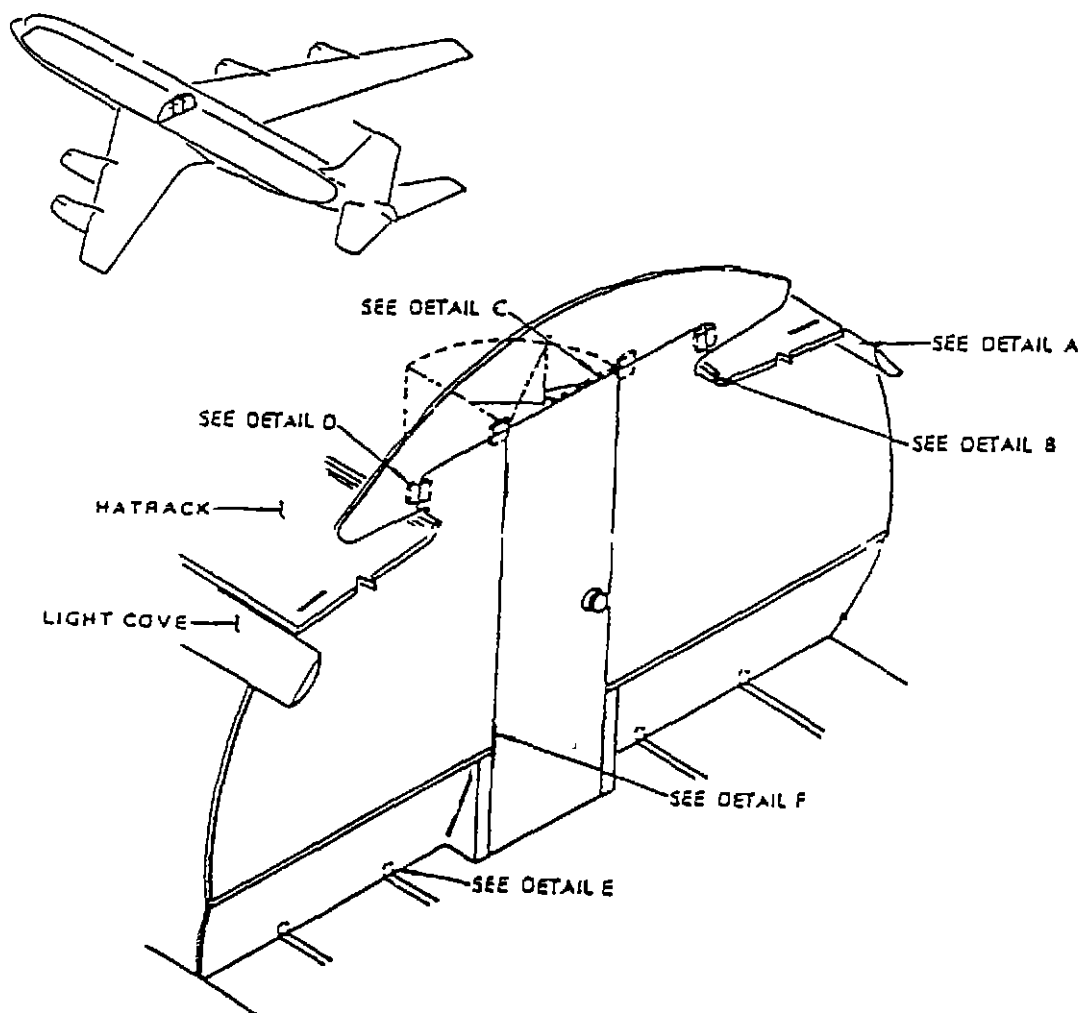
MAINTENANCE MANUAL

VIP AFT DIVIDING PARTITIONS - REMOVAL/INSTALLATION

- 1 Remove VIP Aft Dividing Partition (See figure 401)
 - A Remove VIP Aft Dividing Partition Door
 - (1) Open door and remove retaining arm
 - (2) Move door to position where slots in edge of door adjacent to hinge pins are accessible
 - (3) Provide adequate support for door
 - (4) Using an Allen wrench in head of upper hinge pin set screw, release set screw and fully depress hinge pin and retain in this position
 - (5) Repeat step (d) for lower hinge pin
 - (6) Remove door from door opening
 - B Remove Left Side VIP Aft Dividing Partition
 - (1) Use Allen wrench to release partition to header latch assemblies
 - (2) Unscrew nuts on seat track attachment fittings
 - (3) Disengage partition from seat tracks and slide inboard until upper hatrack attachments are free
 - (4) Remove screw from inboard hatrack attachment and remove wedges
 - (5) Remove screw in outboard hatrack attachment and remove from track
 - C Remove VIP Aft Dividing Partition Header
 - (1) Use Allen wrench to release right side partition to header latch assemblies and remove header

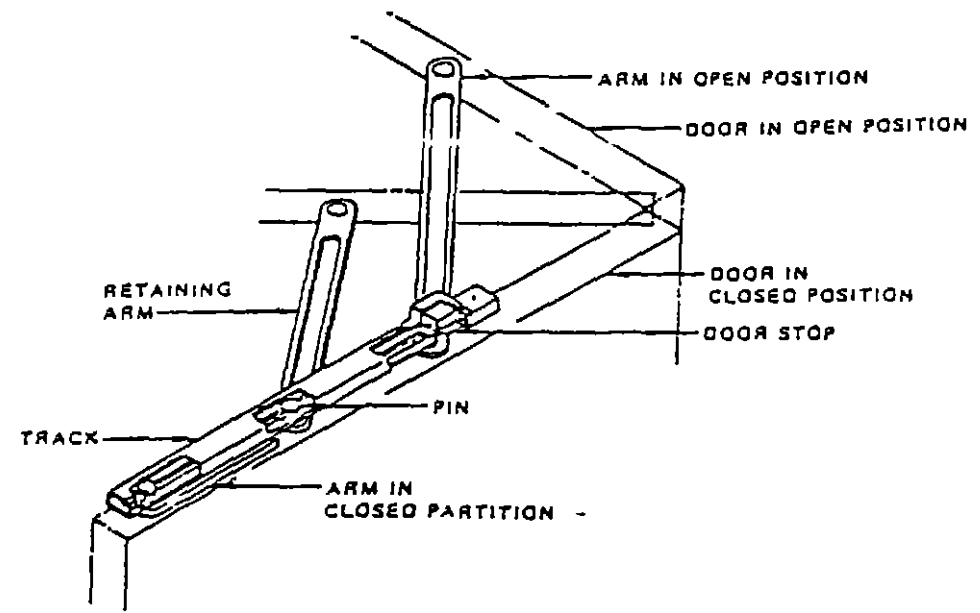
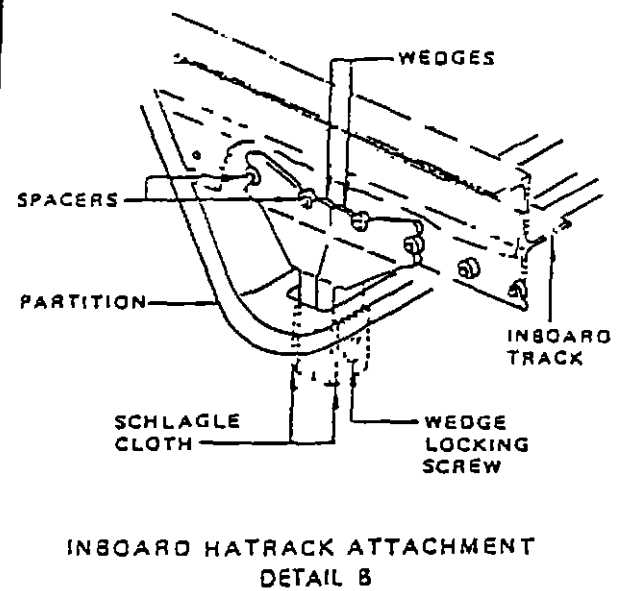
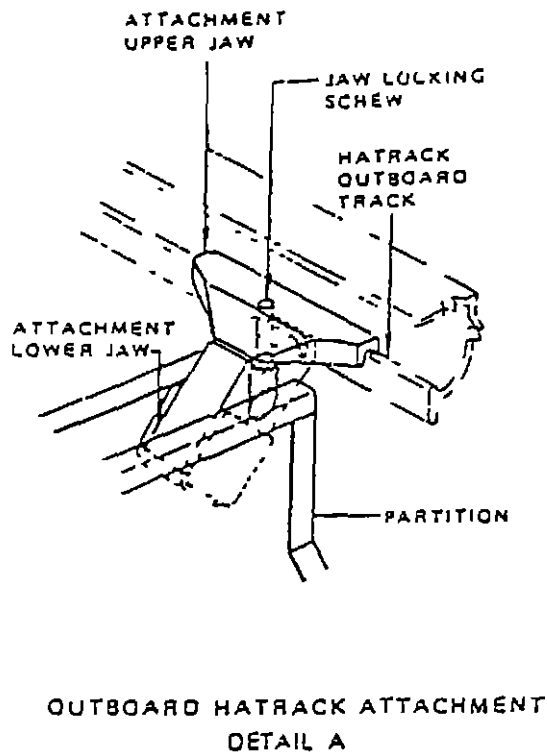
D Remove Right Side VIP Aft Dividing Partition

- (1) Unscrew nuts on seat track attachment fittings.
- (2) Disengage partition from seat tracks and slide inboard until upper hatrack attachments are free.
- (3) Remove screw from inboard hatrack attachment and remove wedges.
- (4) Remove screw in outboard hatrack attachment and remove from track



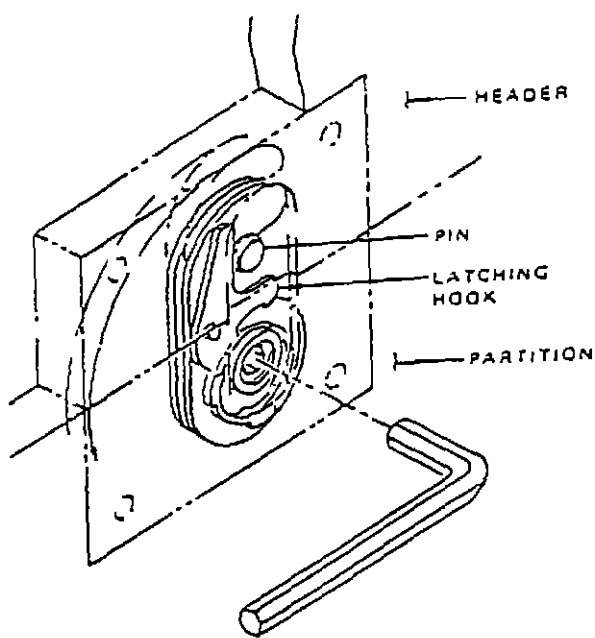
VIP Aft Dividing Partition Installation
Figure 401 (Sheet 1)

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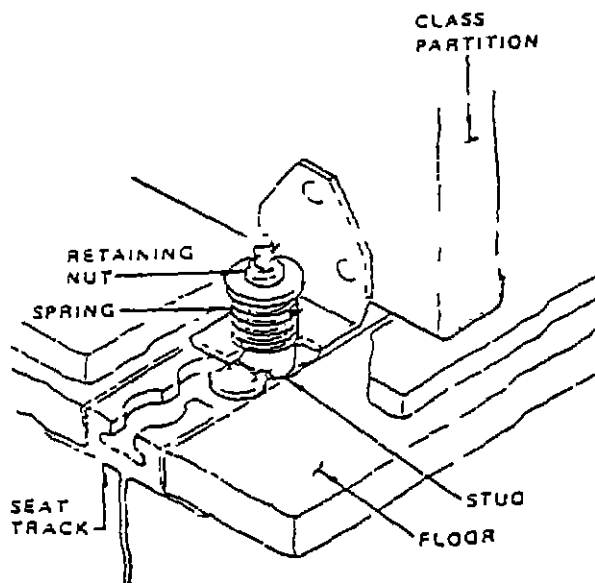


**VIP AFT DIVIDING PARTITION DOOR STOP INSTALLATION
DETAIL C**

VIP Aft Dividing Partition Installation
Figure 401 (Sheet 2)



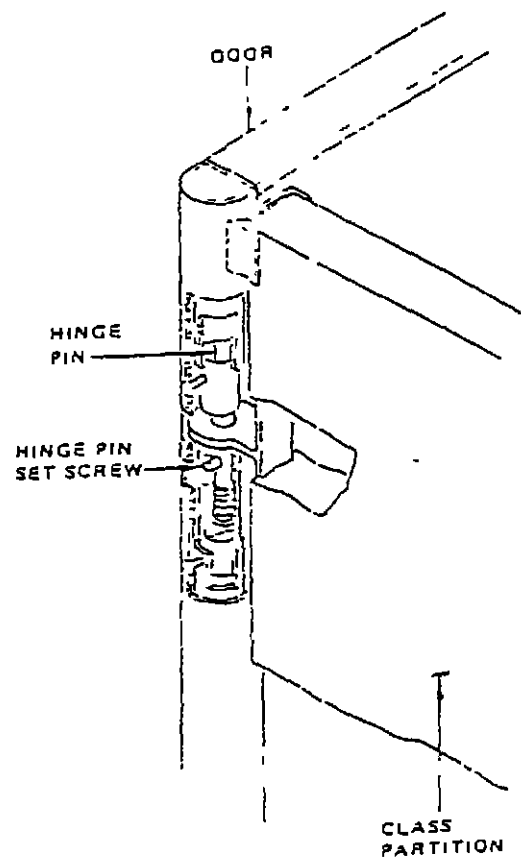
LATCH ATTACHMENT
 DETAIL D



VIP AFT DIVIDING
 PARTITION FLOOR
 ATTACHMENT

DETAIL E

VIP Aft Dividing Partition Installation
 Figure 401 (Sheet 3)



DOOR HINGE
 DETAIL F

2. Install VIP Aft Dividing Partition (See figure 401)

A. Install Right Side VIP Aft Dividing Partition

- (1) Position inboard hatrack attachment wedges at proposed location and install retaining screw.
- (2) Position outboard hatrack attachment jaws on track and install retaining screw.
- (3) Slide partition in from passageway to engage hatrack attachments, adjusting position of outboard attachment if necessary.
- (4) Drop seat track attachment studs into seat track cutouts.
- (5) Move partition forward or aft 1/2-inch to position attachment studs between cutouts.
- (6) Screw nuts down on seat track attachments.

B. Install VIP Aft Dividing Partition Header

- (1) Support header in mounting position, with Allen wrench engage latch assemblies on right side partition.

C. Install Left Side VIP Aft Dividing Partition

- (1) Position inboard hatrack attachment wedges at proposed location and install retaining screw.
- (2) Position outboard hatrack attachment jaws on track and install retaining screw.
- (3) Slide partition in from passageway to engage hatrack attachments, adjusting position of outboard attachment if necessary.
- (4) Drop seat track attachment studs into seat track cutouts.
- (5) Move partition forward or aft 1/2-inch to position attachment studs between cutouts.
- (6) Screw nuts down on seat track attachment.
- (7) With Allen wrench engage partition to header latch assemblies.

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D Install VIP Aft Dividing Partition Door

- (1) Support door in door opening
- (2) Using an Allen wrench in header of upper hinge pin set screw, fully suppress hinge pin and retain in this position
- (3) Repeat step (b) for lower hinge pin
- (4) Position hinge brackets in center of hinge slots on door and allow hinge pins to engage with hole in hinge support.
- (5) Secure set screws.
- (6) Install retaining arm.



VIP AFT DIVIDING PARTITION - APPROVED REPAIRS

1 Repair VIP Aft Dividing Partition

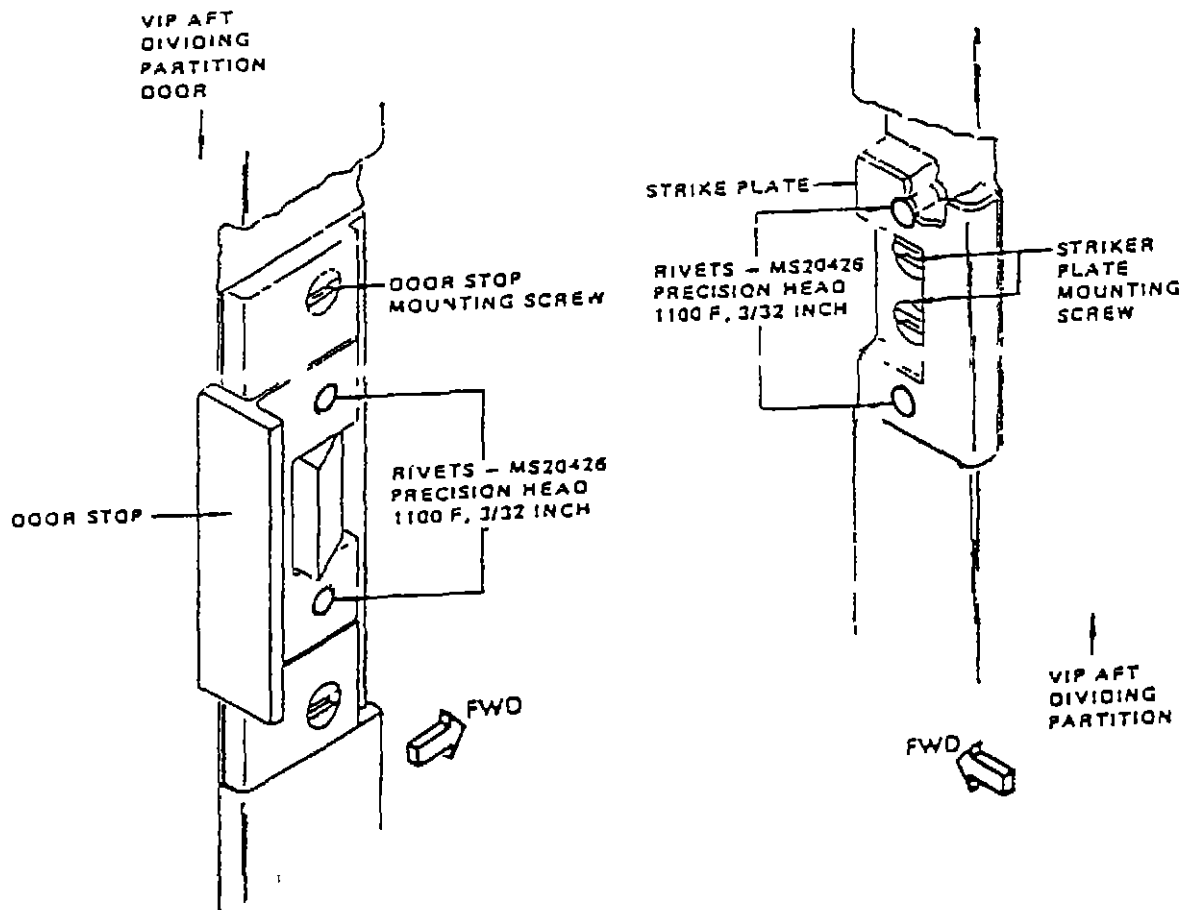
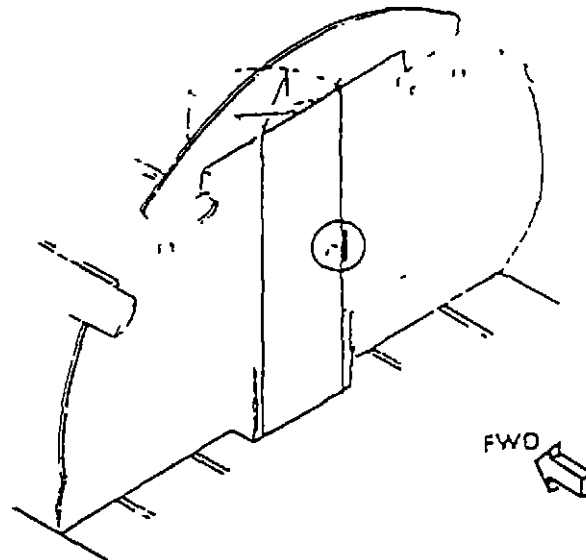
A. Replace VIP Aft Dividing Partition Door Latch Shear Rivets (See Figure 601)

- (1) Remove door stop from door and strike plate from door frame
- (2) Remove rivets from door stop and strike plate
- (3) Install MS20426, 1100-F, 3/32 inch diameter rivets

CAUTION: THE DOOR LATCH IS DESIGNED TO FAIL WHEN 350 POUNDS PRESSURE IS EXERTED ON THE DOOR. WHEN REPLACING SEAL RIVETS THEY MUST BE MS20426, PRECISION HEAD, 1100-F, 3/32" DIAMETER RIVETS OR EQUIVALENT.



MAINTENANCE MANUAL



VIP Aft Dividing Partition
Door Latch Shear Rivets Replacements
Figure 801



MAINTENANCE MANUAL

AFT WINDSCREEN - MAINTENANCE PRACTICES

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1 Removal/Installation Aft Windscreen

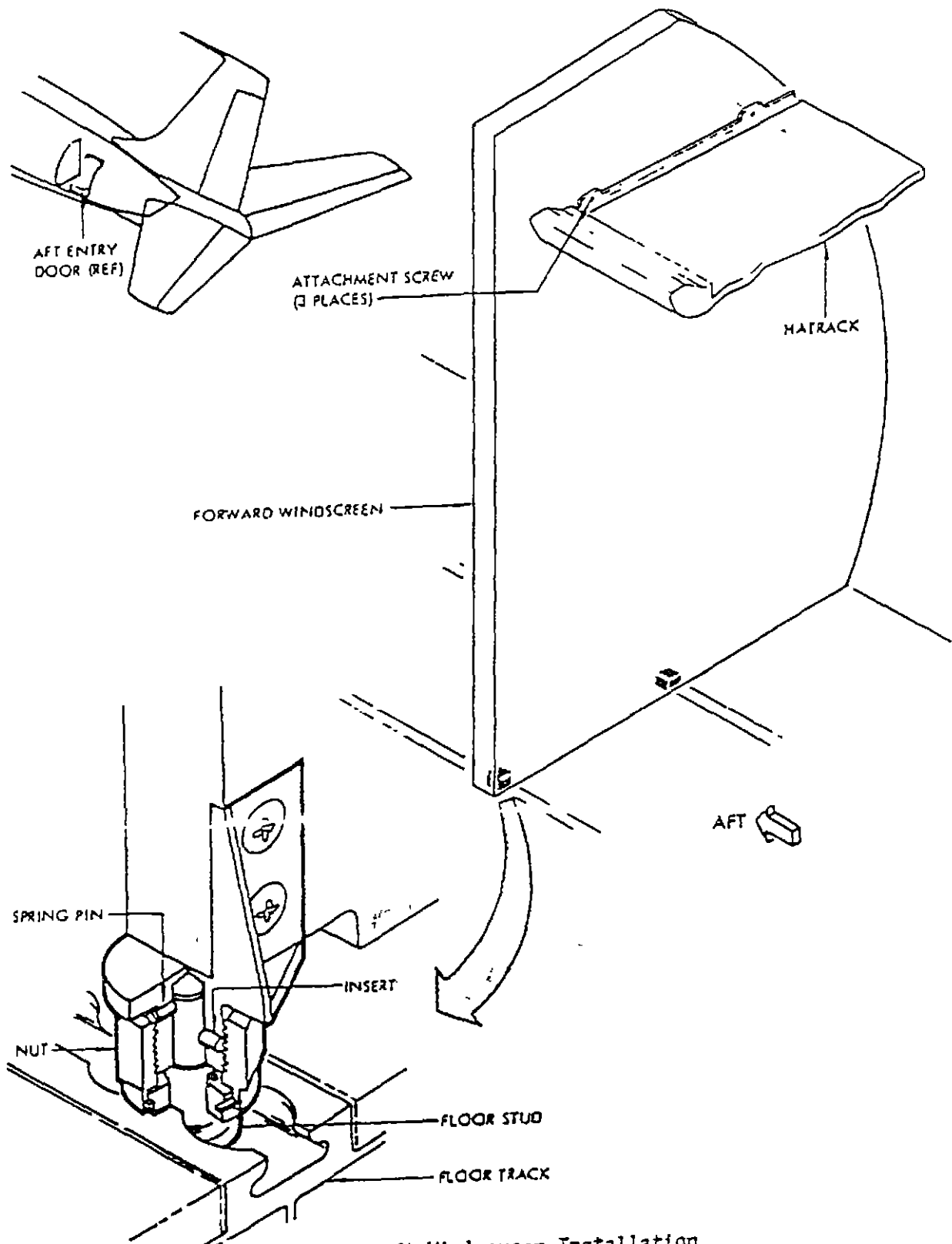
A Remove Aft Windscreen

- (1) Slack-off locking nut on both floor track attachments. (See figure 201.)
- (2) Remove three screws attaching aft face of windscreen to aft end of hatrack.
- (3) Move base of windscreen one-half inch forward or aft and lift clear of floor tracks.
- (4) Replace hatrack attachment screws in forward face of windscreen.

B. Install Aft Windscreen

- (1) Remove hatrack attachment screws from forward face of windscreen.
- (2) Engage floor attachments in floor tracks. (See figure 201.)
- (3) Attach forward face of windscreen to aft end of hatrack by installing three screws.
- (4) Tighten locking nut on both floor track attachment fittings finger-tight only.

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Aft Windscreen Installation
 Figure 201

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FORWARD COAT CLOSET - MAINTENANCE PRACTICES

EFFECTIVITY

CARGO AIRPLANES

1. Removal/Installation Forward Coat Closet

A. Remove Forward Coat Closet (See figure 201.)

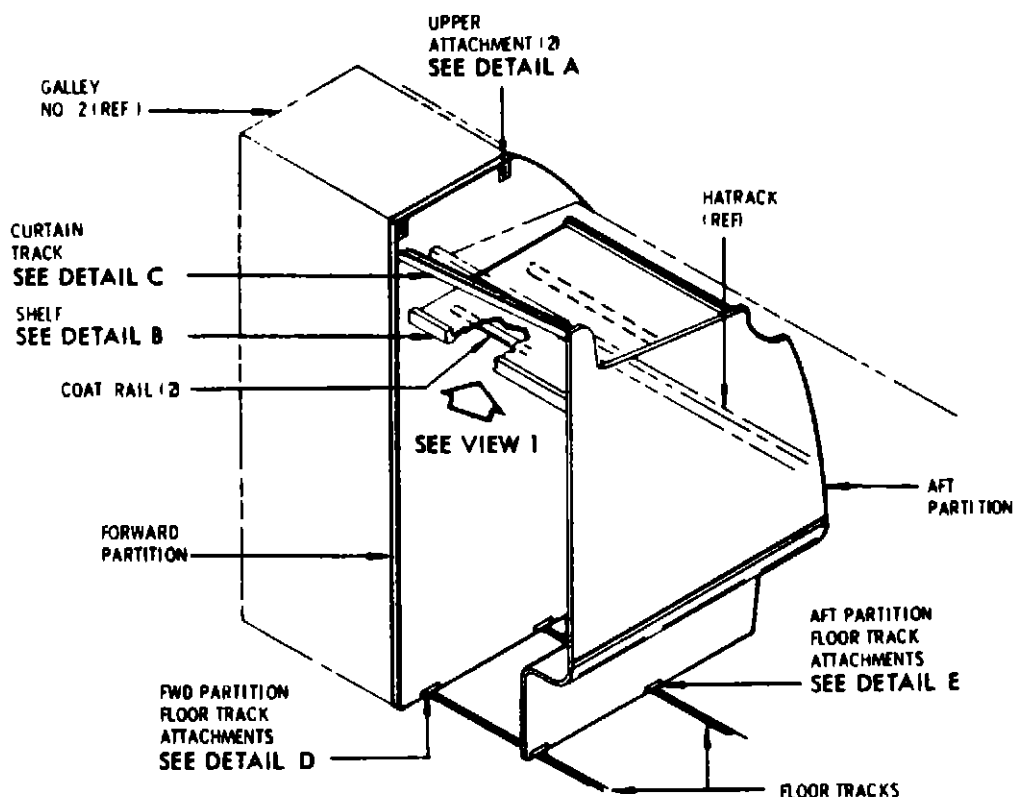
- (1) Remove two screws attaching curtain track, remove curtain and its track and replace both screws in their attachment fittings on partitions.
- (2) Withdraw hinge pins connecting aft end of shelf to aft partition. Raise disconnected end of shelf enough to replace hinge pin in shelf without reconnecting shelf to partition.
- (3) Withdraw pins locking coat rods to forward partition. Swing rods down and stow on forward face of aft partition. (Aft partition is now free of any upper attachment.) Allow shelf to hinge down and lie along aft face of forward partition.
- (4) Unscrew and remove locking cap from both floor track attachments of aft partition. Move base of aft partition forward or aft one half inch and remove by lifting clear of floor tracks.
- (5) Reinstall locking cap attachment screw on both seat track attachments of aft partition to avoid loss of screws.
- (6) Release floor track attachment fittings of forward partition, slackening nuts enough to allow locating fitting to be raised clear of recesses in track.
- (7) Slacken screw at each upper latch fitting until latch pin may be dropped out of engagement. Tighten screw into lower keyhold recess when pin is fully disengaged.
- (8) Raise floor track attachments and move forward partition one half inch aft to disengage from tracks.

B. Install Forward Coat Closet (See figure 201.)

- (1) Carry forward partition into airplane and stand immediately aft of aft face of No. 2 galley, engaging its attachment fittings in floor tracks by sliding one half inch forward.
- (2) Release screw retaining latch bolt of each upper latch fitting in its disengaged position. Slide both lock bolts up into engagement with fuselage structure and tighten screws into upper keyhole recesses to secure lock bolts in position.
- (3) Tighten down floor track attachments.

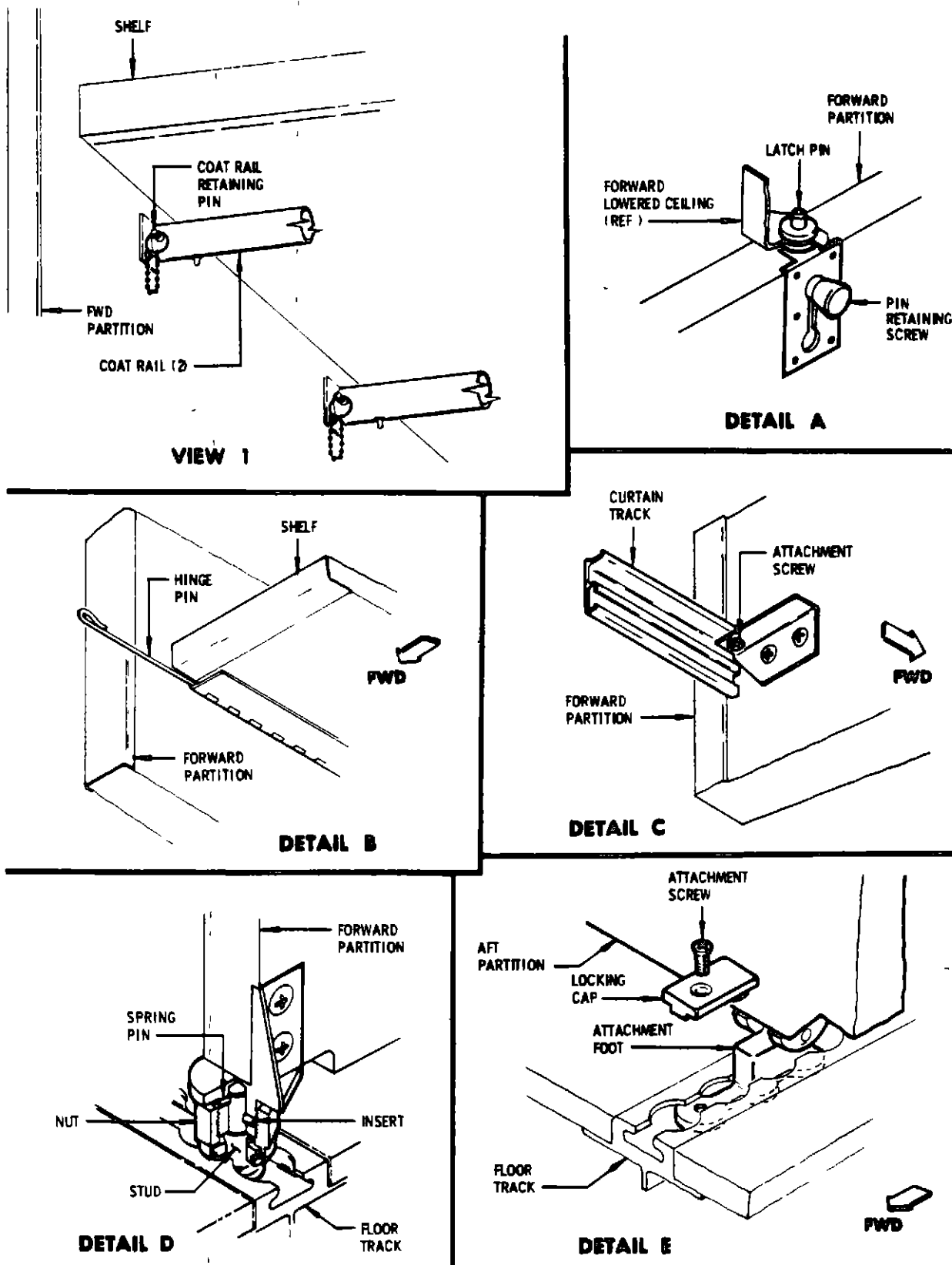
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- (4) Carry aft partition into airplane, remove locking cap attachment screw from both floor track attachments and engage attachments loosely in floor tracks approximately 21 inches aft of forward partition.
- (5) Remove hinge pin from free end of shelf on aft face of forward partition, swing shelf up to horizontal position and insert hinge pin to connect aft end of shelf to forward face of aft partition.
- (6) Swing both coat rods up and engage them with fittings on forward partition, using pins provided on forward partition.
- (7) Locate floor track attachments to position aft partition vertically, and install locking cap on foot of each attachment.
- (8) Carry curtain and track into airplane. Remove one curtain track attachment screw from each partition, position curtain track and install two attachment screws. Clip curtain to fittings of curtain track.



Forward Coat Closet Installation
 Figure 201 (Sheet 1)

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Forward Coat Closet Installation
Figure 201 (Sheet 2)

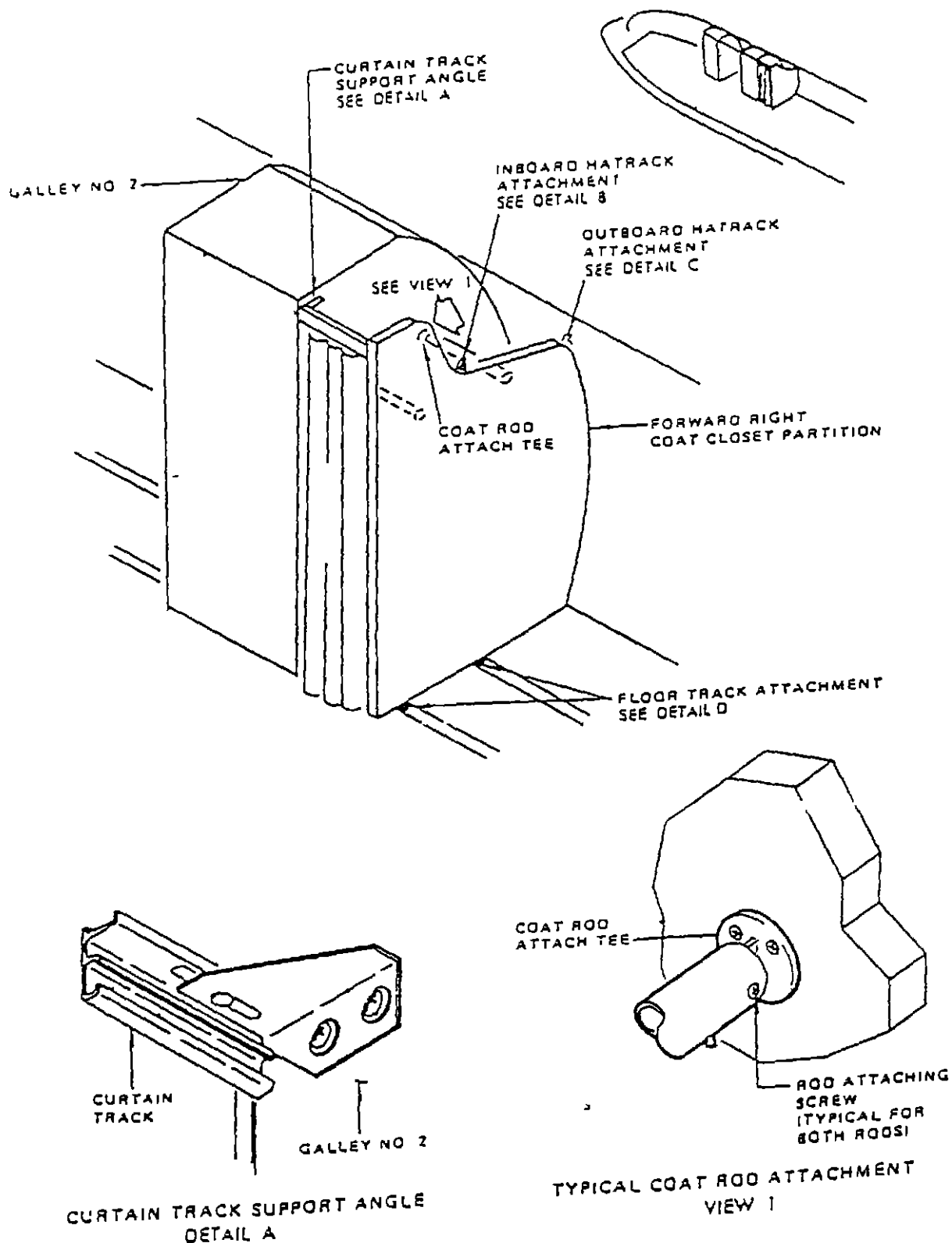
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Page 203

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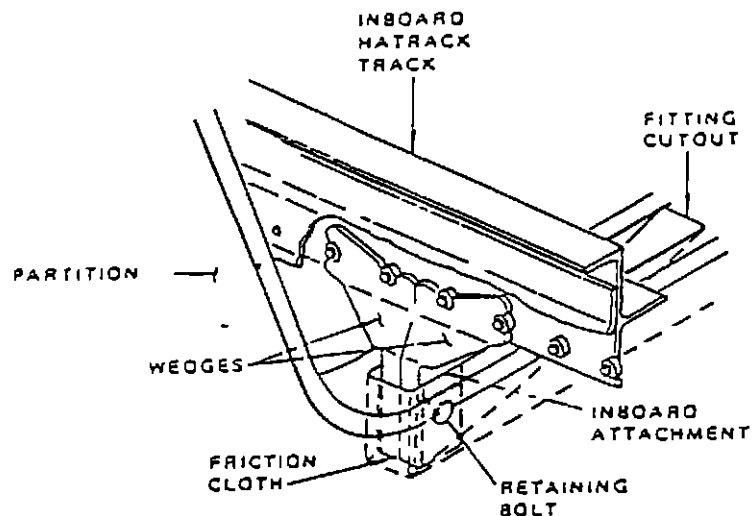
FORWARD RIGHT COAT CLOSET - REMOVAL/INSTALLATION

1. Remove Forward Right Coat Closet (See figure 401)
 - A. At each end of curtain track, remove screw and nut attaching track to support angle. Remove curtain and curtain track.
 - B. Remove screw and nut attaching forward end of each coat rod to attach tee on aft face of galley No. 2. Swing coat rods down and stow along forward face of closet partition.
 - C. Remove locking cap from each floor attachment on closet partition. Move base of partition forward or aft to disengage floor attachments.
 - D. Lift partition and slide inboard until clear of hatrack attachments.
 - E. Install locking caps on floor track attachments.
 - F. Remove coat rod attach tees and curtain track support angle from aft face of galley No. 2.
 - G. Remove hatrack attachments from hatracks.
2. Install Forward Right Coat Closet (See figure 401.)
 - A. Install hatrack attachments in proper position on hatrack.
 - B. Install coat rod attach tees and curtain track support angle to aft face of galley No. 2.
 - C. Remove locking caps from floor track attachments on closet partition.
 - D. Slide closet partition outboard to engage hatrack attachments.
 - E. Place floor track attachments in track and move forward or aft one-half inch to engaged position. Install locking caps to floor track attachment fittings.
 - F. Swing coat rods up and install screws and nuts attaching them to attach tees on aft face of galley No. 2.
 - G. Place curtain track and curtain in installed position. Attach each end of curtain track to support angle with screw and nut.

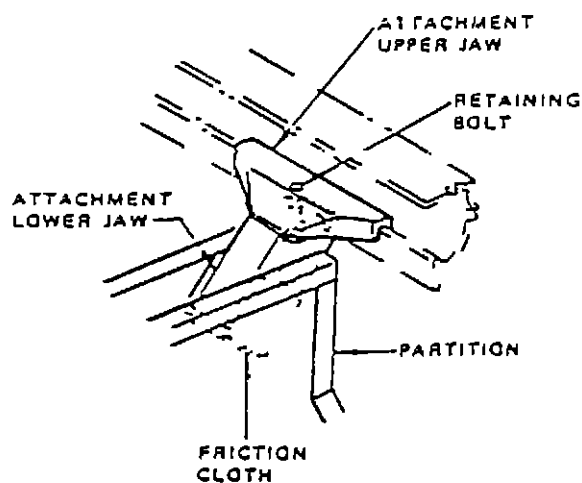


Forward Right Coat Closet Installation
Figure 404 (Sheet 1)

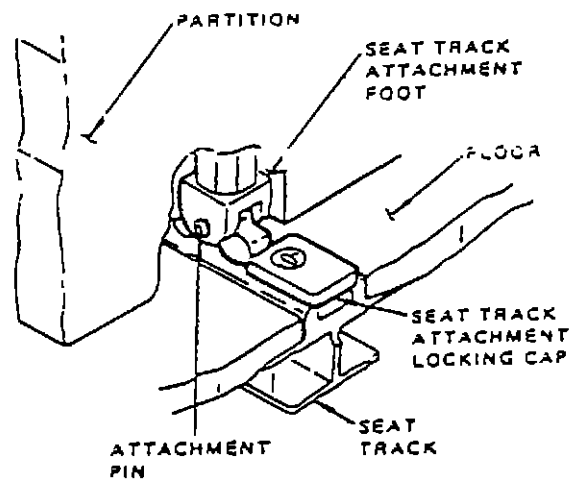
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ATTACHMENT TO INBOARD
 TRACK OF HATRACK
 DETAIL B



ATTACHMENT TO OUTBOARD
 TRACK OF HATRACK
 DETAIL C



TYPICAL PARTITION TO SEAT
 TRACK ATTACHMENT
 DETAIL D

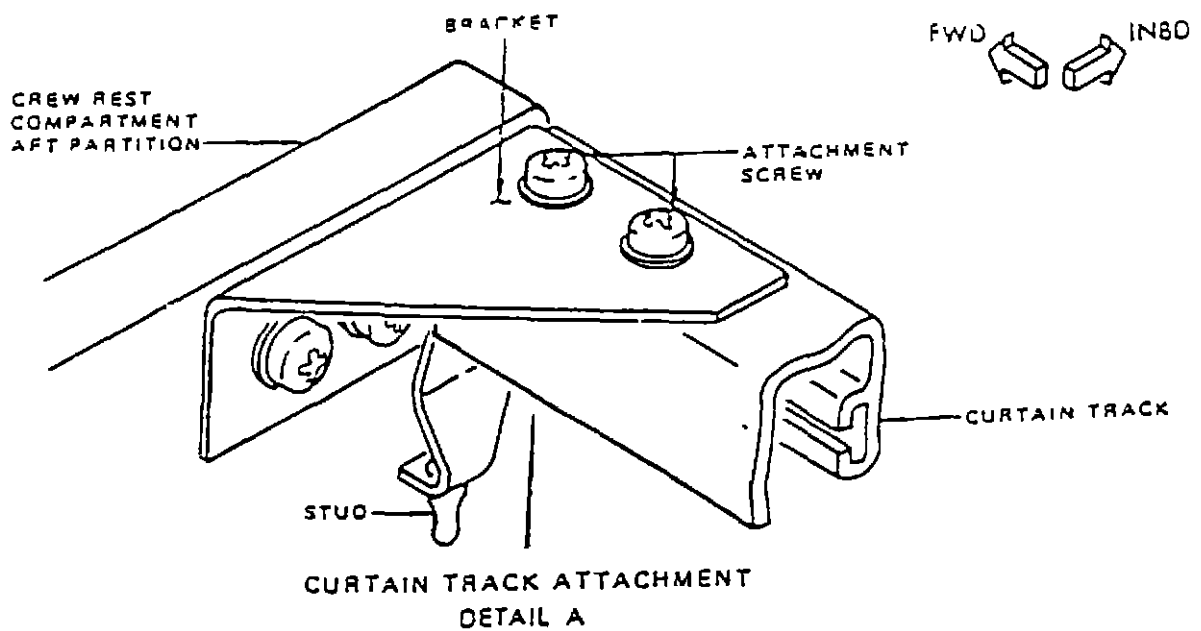
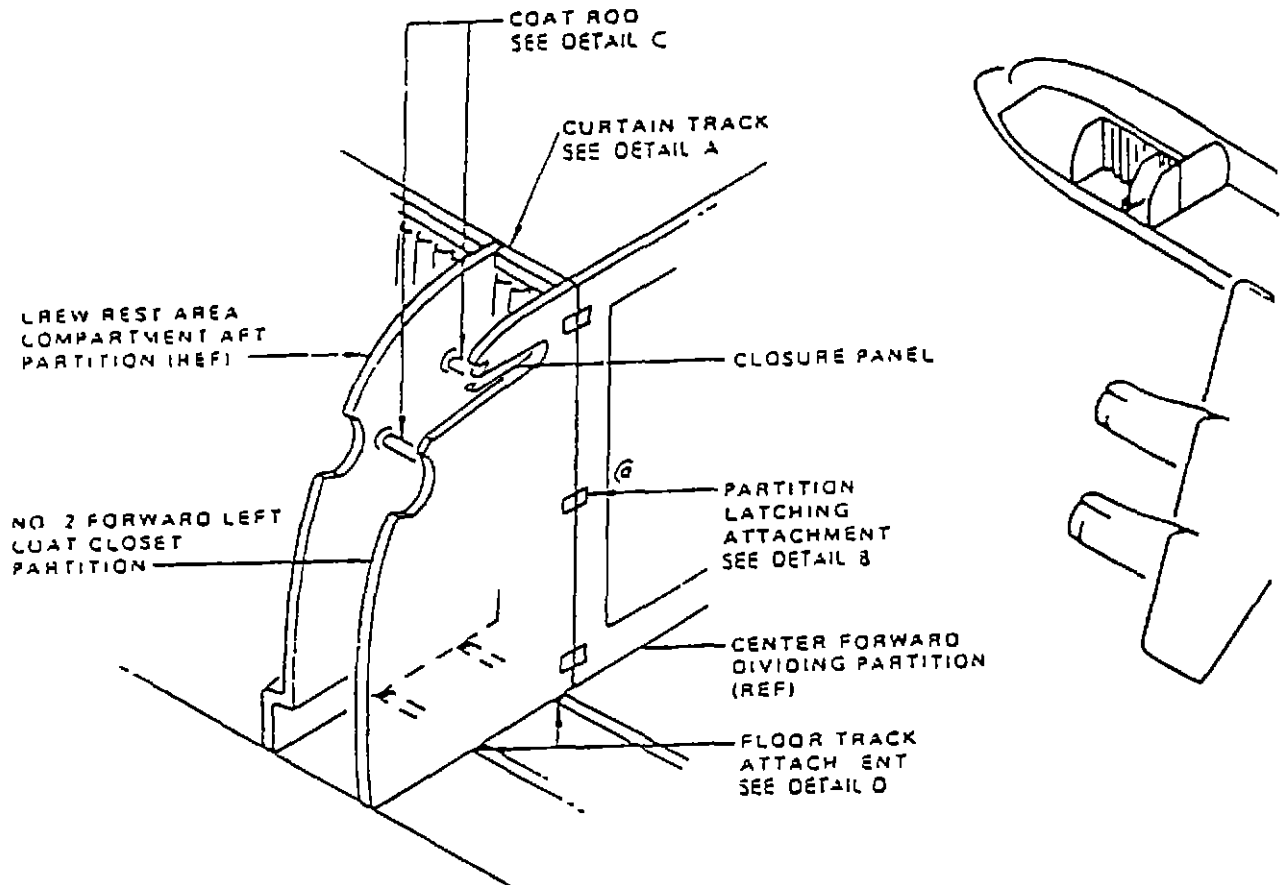
Forward Right Coat Closet Installation
 Figure 401 (Sheet 2)



NO 2 FORWARD LEFT COAT CLOSET-REMOVAL/INSTALLATION

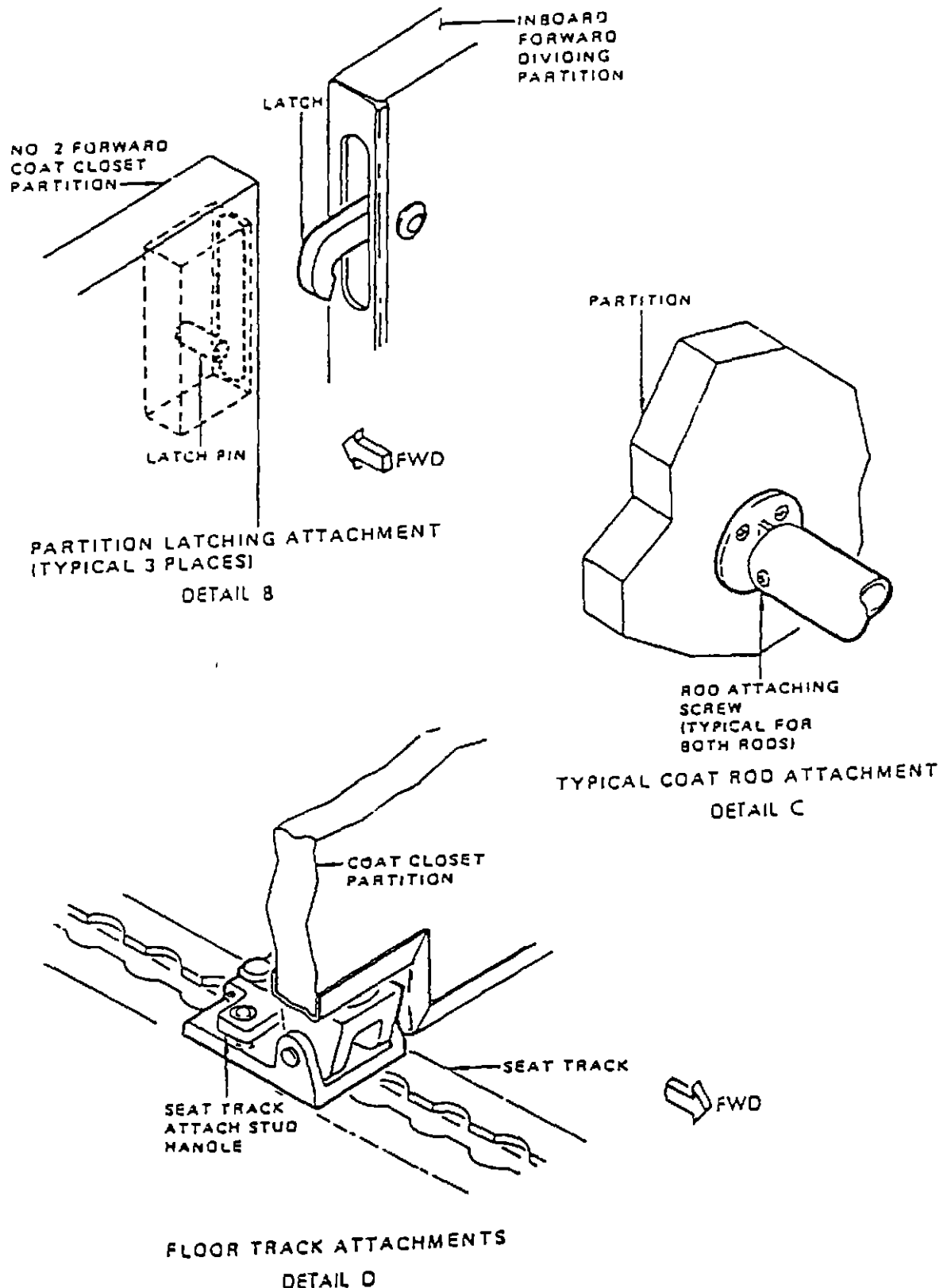
1. Remove No. 2 Forward Left Coat Closet (See figure 401)
 - A. Remove curtain assembly from curtain track.
 - B. Remove screws attaching curtain track to bracket on aft partition of crew rest area compartment. Swing forward end of curtain track downward, engaging stud on curtain track with receptacle on coat closet partition.
 - C. Remove closure panel from cutaway in partition above hatrack.
 - D. Rotate latches to disconnect coat closet partition from center forward dividing partition
 - E. Remove screw and nut attaching each curtain rod to fitting on aft partition of crew rest compartment. Allow forward end of curtain rod to swing downward until it is stowed vertically parallel to forward face of coat closet partition. Support partition.
 - F. Raise floor track attachment handles to vertical and rotate 90 degrees. Disengage attachments from floor tracks.
 - G. Move partition forward or aft to clear inboard forward dividing partition.
 - H. Slide partition inboard and remove.
2. Install No 2 Forward Left Coat Closet (See figure 401.)
 - A. Slide coat closet partition outboard.
 - B. Place floor attachments in tracks and move partition forward or aft to align it with inboard forward dividing partition. Support partition
 - C. Engage floor track attachments and lock by rotating handle 90 degrees and folding down to engage lock pin.
 - D. Swing each coat rod up and attach to fitting on aft partition of crew rest area compartment with screw and nut.
 - E. Rotate latches to connect coat closet partition to inboard forward dividing partition.
 - F. Install closure panel in cutaway in partition above hatrack.
 - G. Swing curtain track up and attach it to bracket on aft partition of crew rest area compartment using screws.
 - H. Install curtain assembly in curtain track.

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No. 2 Forward Coat Closet Installation
Figure 401 (Sheet 1)

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No. 2 Forward Coat Closet Installation
Figure 401 (Sheet 2)

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LOUNGE PARTITION - MAINTENANCE PRACTICES

EFFECTIVITY

CARGO AIRPLANES

1. Removal/Installation Lounge Partition

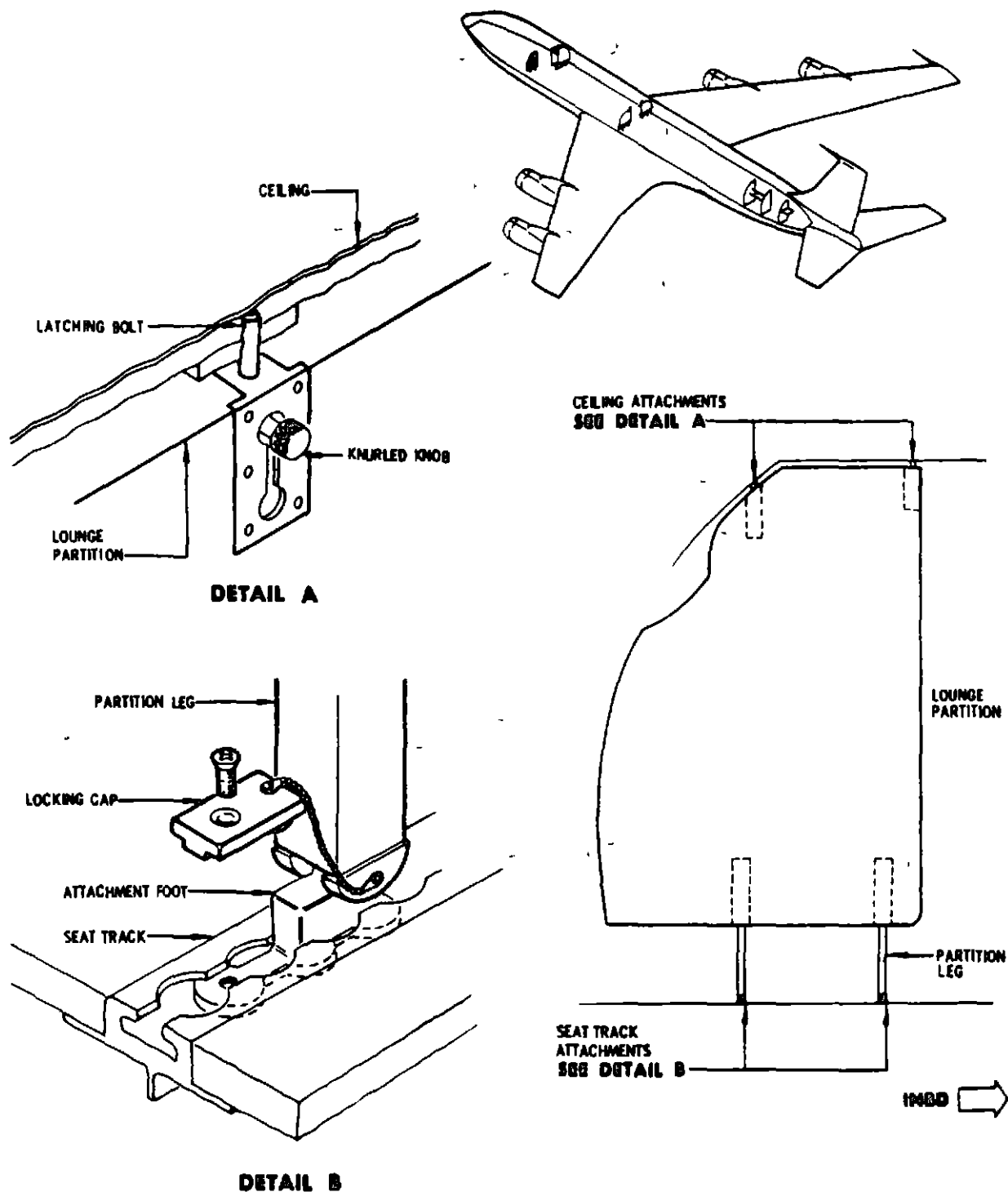
A. Remove lounge partition. (See figure 201.)

- (1) Unscrew and remove locking cap from both floor track attachments.
- (2) Unscrew knurled knob at each upper latch fitting until latch bolt may be dropped out of engagement. Screw knob back into lower keyhole recess.
- (3) Move legs of partition one half inch forward or aft and lift clear of floor tracks.
- (4) Reinstall locking cap attachment screw on track attachment foot of each leg, to avoid loss of screw.

B. Install lounge partition. (See figure 201.)

- (1) Unscrew locking cap attachment screw from both seat track attachments.
- (2) Position partition in seat tracks at Body Sta. 478.
- (3) Unscrew knurled knob at both upper latch fittings until latch bolts are free to be raised into engagement with fuselage structure. When bolts are engaged, tighten knobs into upper keyhole recesses.
- (4) Reassemble locking cap on track attachment foot of each leg.

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Lounge Partition Installation
 Figure 201

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MAINTENANCE MANUAL

NO. 1 AFT LEFT COAT CLOSET - MAINTENANCE PRACTICES

EFFECTIVITY

CARGO AIRPLANES

1. Removal/Installation No. 1 Aft Left Coat Closet

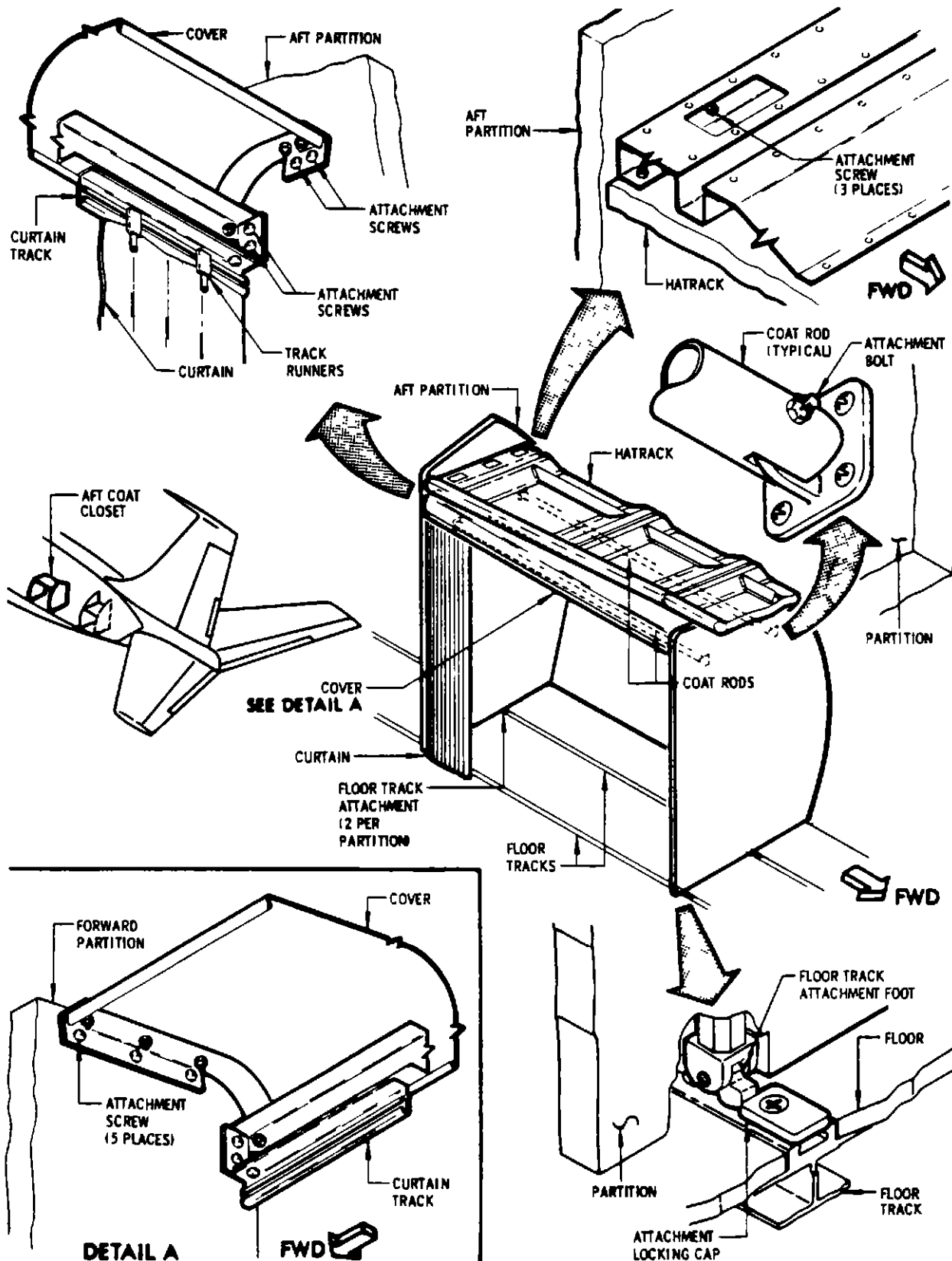
A. Remove No. 1 Aft Left Coat Closet. (See figure 201.)

- (1) Unsnap and remove curtain from its track runners.
- (2) Remove coat rods by removing their attachment bolts from both ends.
- (3) Remove screws attaching cover to both partitions and remove cover.
NOTE: Forward partition should be supported as it is now without fore and aft connection.
- (4) Remove locking caps from floor track attachments of both partitions.
- (5) Disengage forward partitions from floor tracks and remove partition.
- (6) Remove screws attaching aft end of hatrack to aft partition, and remove aft partition by disengaging its attachments from floor tracks.
- (7) Reinstall track attachment locking caps and all attaching hardware to both partitions to avoid loss of small parts.

B. Install No. 1 Aft Left Coat Closet. (See figure 201.)

- (1) Remove track attachment locking caps and all small attaching parts from both partitions.
- (2) Engage track attachment feet of aft partition in floor tracks, install screws attaching partition to aft end of hatrack and install track attachment locking caps.
- (3) Engage track attachment feet of forward partition in floor tracks and support partition while installing cover between both partitions. Install track attachment locking caps.
- (4) Install both coat rods between partitions.
- (5) Snap curtain on to its track runners.

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No. 1 Aft Left Coat Closet Installation
Figure 201

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NO. 2 AFT LEFT COAT CLOSET - MAINTENANCE PRACTICES

EFFECTIVITY

CARGO AIRPLANES

1 Removal/Installation No. 2 Aft Left Coat Closet

A Remove No. 2 Aft Left Closet

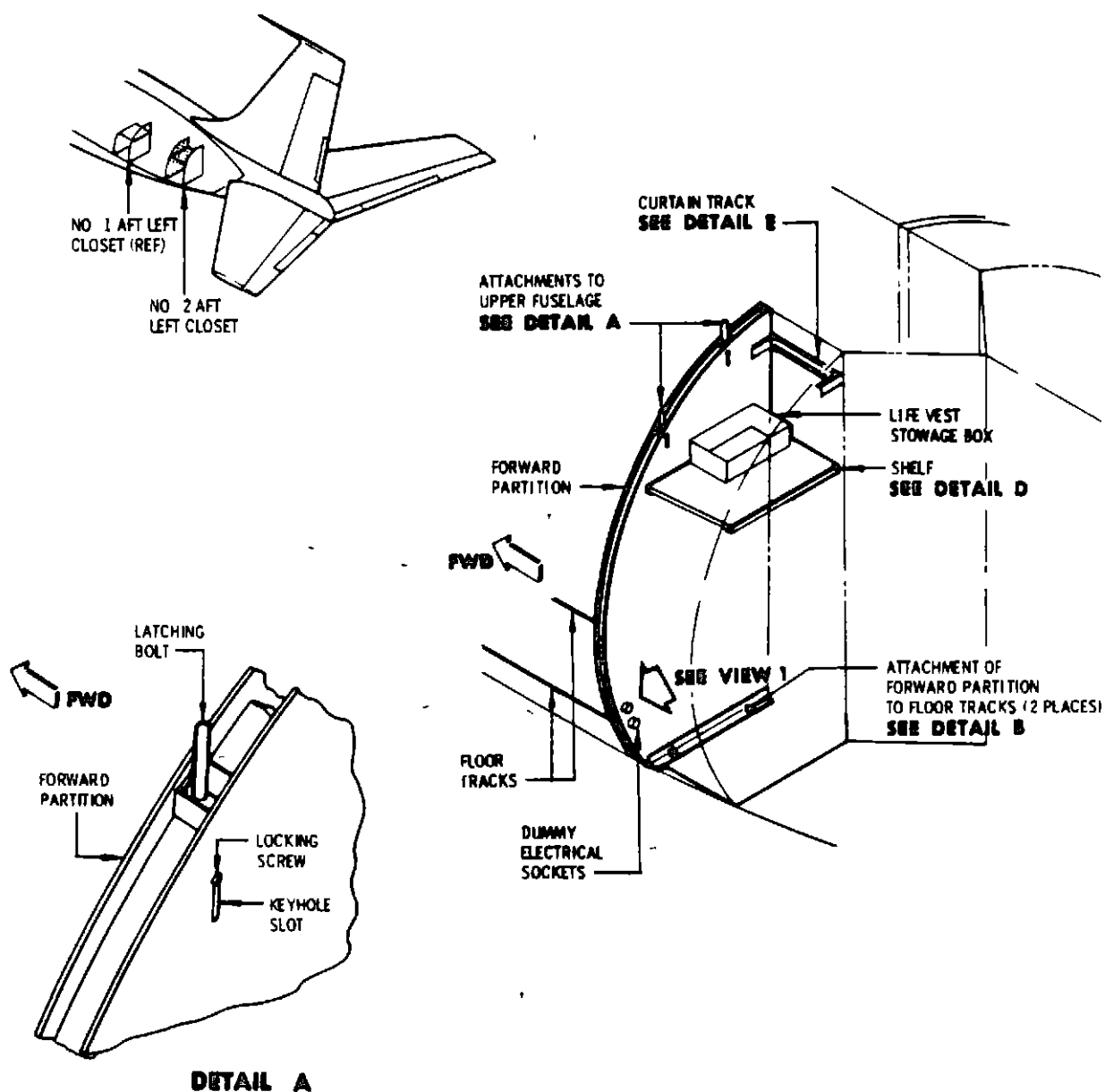
- (1) Tape clean rag to coat rail below shelf to prevent damage to other surfaces when shelf is folded.
- (2) Remove life vest container from shelf
- (3) Withdraw hinge pin attaching aft end of shelf to forward face of lavatory partition, and allow shelf to swing down against aft face of forward partition. Replace hinge pin in disconnected end of shelf. (See figure 201.)
- (4) Remove two screws attaching ends of curtain track. Remove track, with curtain and replace attachment screws.
- (5) Release floor track attachments, slackening nuts enough to allow fittings to be raised clear of locating recesses in tracks.
- (6) Slacken off screws locking both upper latch pins in engagement, pull pins down and retighten screws.
- (7) Raise floor track attachment fittings and disengage partition from tracks by moving it forward or aft one half inch. Disconnect electrical lead from plug at sidewall and carry partition out of airplane.

B. Install No. 2 Aft Left Closet

- (1) Position forward partition in airplane and engage its floor track attachment loosely with seat tracks so that forward face of partition is at B.S. 1382.75. Connect electrical lead to receptacle at sidewall
- (2) Withdraw hinge pin from disconnected end of shelf, swing shelf up to horizontal position and connect aft end of shelf to forward partition of lavatory "D" by installing hinge pin. Remove any protective padding from coat rail.

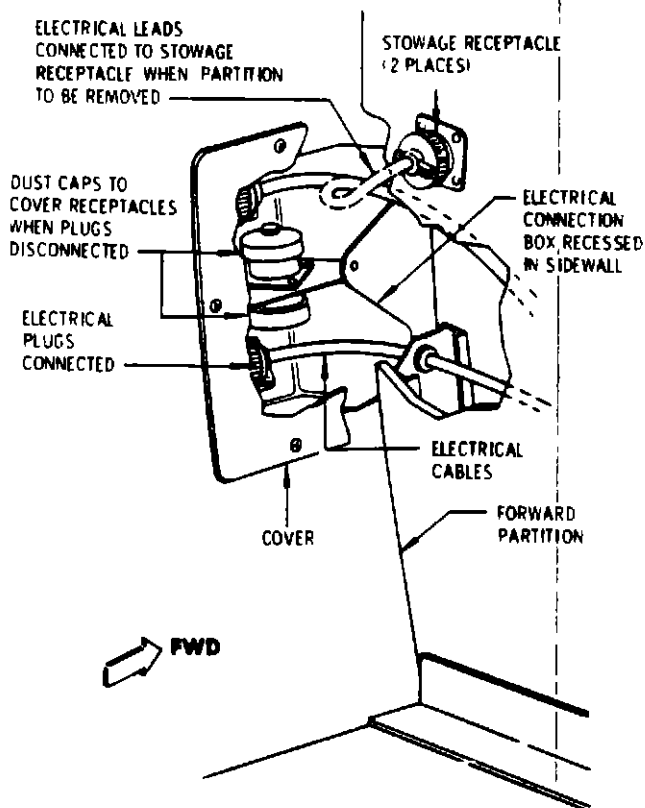
MAINTENANCE MANUAL

- (3) Slacken off screws locking both upper latching bolts out of engagement slide bolts up to engage fuselage structure and retighten screws into upper keyhole recesses.
- (4) Tighten floor track attachment fittings.
- (5) Install life vest container above shelf.
- (6) Remove two screws attaching ends of curtain track, position curtain track, with curtain, across closet and reinstall and tighten both attachment screws.

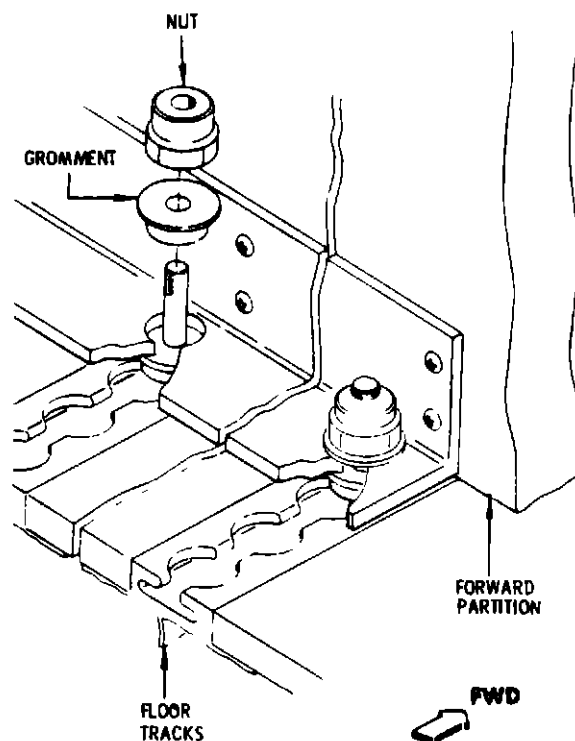


No. 2 Aft Left Closet Installation
Figure 201 (Sheet 1 of 2)

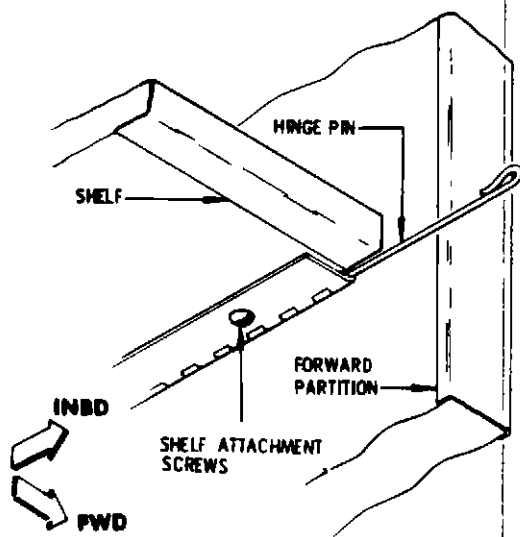
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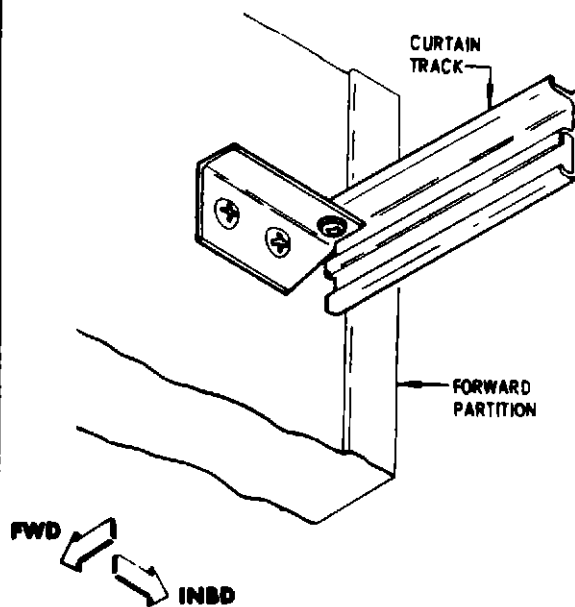
VIEW 1



DETAIL B



**DETAIL D
SHELF ATTACHMENT**



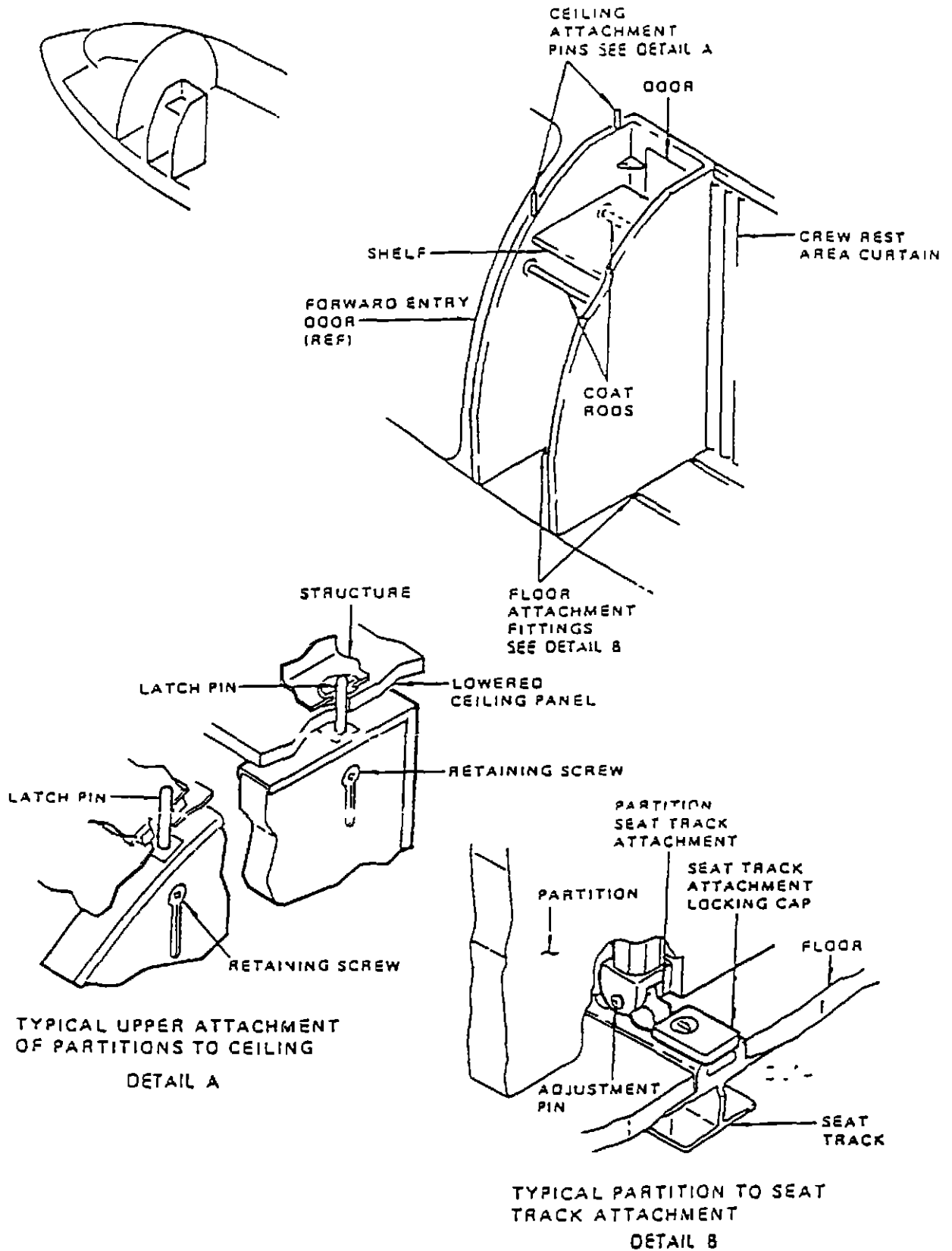
**DETAIL E
CURTAIN TRACK ATTACHMENT**

NO 1 FORWARD LEFT COAT CLOSET - REMOVAL/INSTALLATION

1. Remove No 1 Forward Left Coat Closet
 - A. Remove miscellaneous equipment from closet.
 - B. Disconnect wiring leading to forward partition
 - C. Remove the seat track attachment locking caps. (See figure 401.)
 - D. Disengage latch pins locking forward partition to ceiling, by loosening retaining screw to allow the latch pin to drop clear of ceiling receptacle.
 - E. Move closet forward or aft slightly to disengage floor attachments and remove closet, by lifting closet to clear attachments from floor tracks and sliding inboard.
 - F. Attach locking caps to seat track attachment fittings for safekeeping.
2. Install Crew Rest Compartment Partitions
 - A. Remove locking caps from seat track attachment fittings. (See figure 401.)
 - B. Lifting closet slightly, slide closet outboard into position.
 - C. Engage seat track attachment fittings and secure locking cap in place.
 - D. Raise latch pins to engage ceiling receptacle and secure by tightening retaining screws.
 - E. Connect wiring to forward partition and install miscellaneous equipment in closet as required.

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No. 1 Forward Left Coat Closet Installation
Figure 401



MAINTENANCE MANUAL

CREW REST AREA PARTITION - REMOVAL/INSTALLATION

1. General

- A. The crew rest area partitions are installed at the aft end of the crew rest area. The partitions also form part of the fume-tight division between the crew accommodation area and the cargo area when the forward part of the cabin is in the cargo configuration. This is accomplished by installation of seals around the edges of the partitions.
- B. The crew rest area partition includes two separate partition sections. The outboard crew rest area partition extends from the left side of the cabin to the edge of the center aisle. When installed the inboard crew rest area partition extends aft along the left side of the center aisle from the outboard crew rest area partition to the center forward dividing partition. Refer to 25-15-0, Cabin Accommodation Conversions for a description of the various cabin configurations in which the crew rest area partitions are installed.

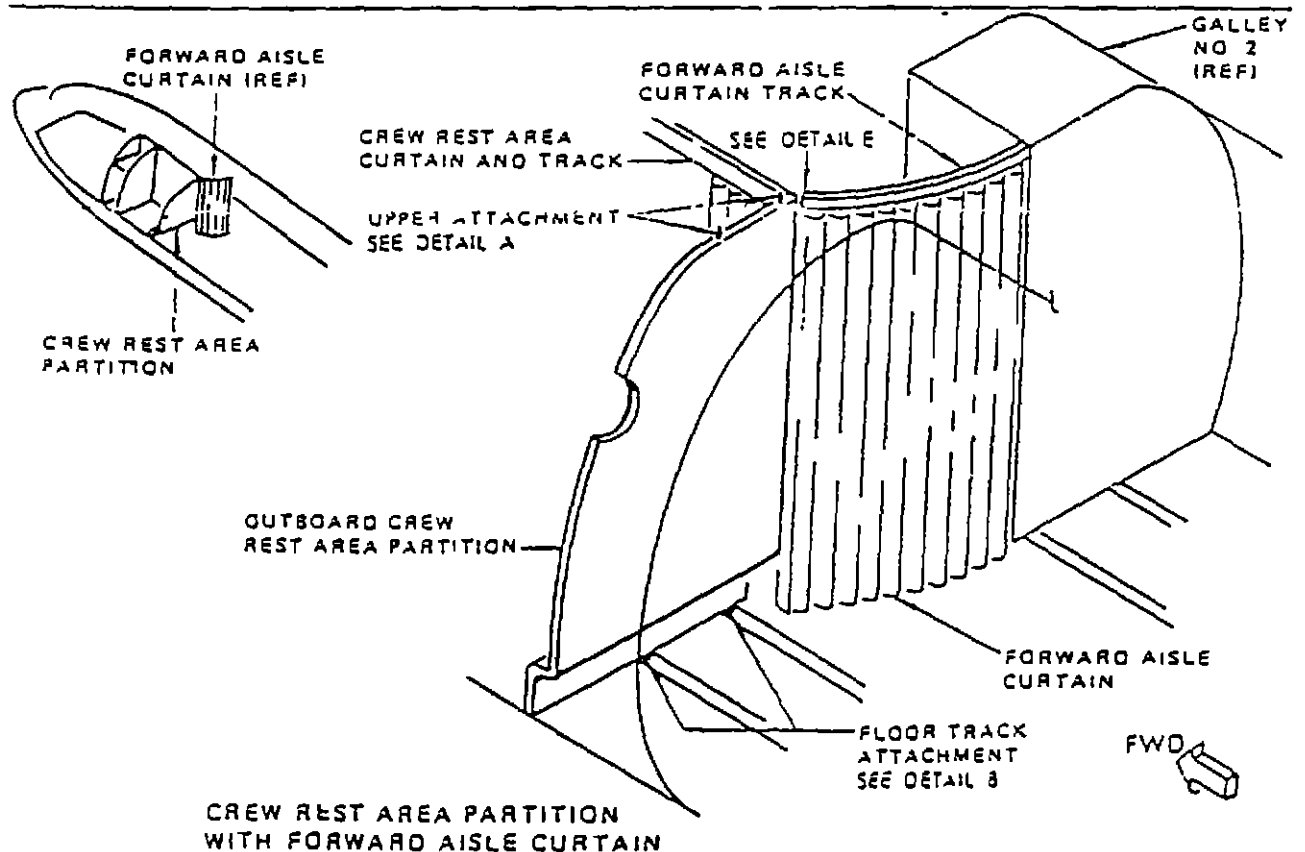
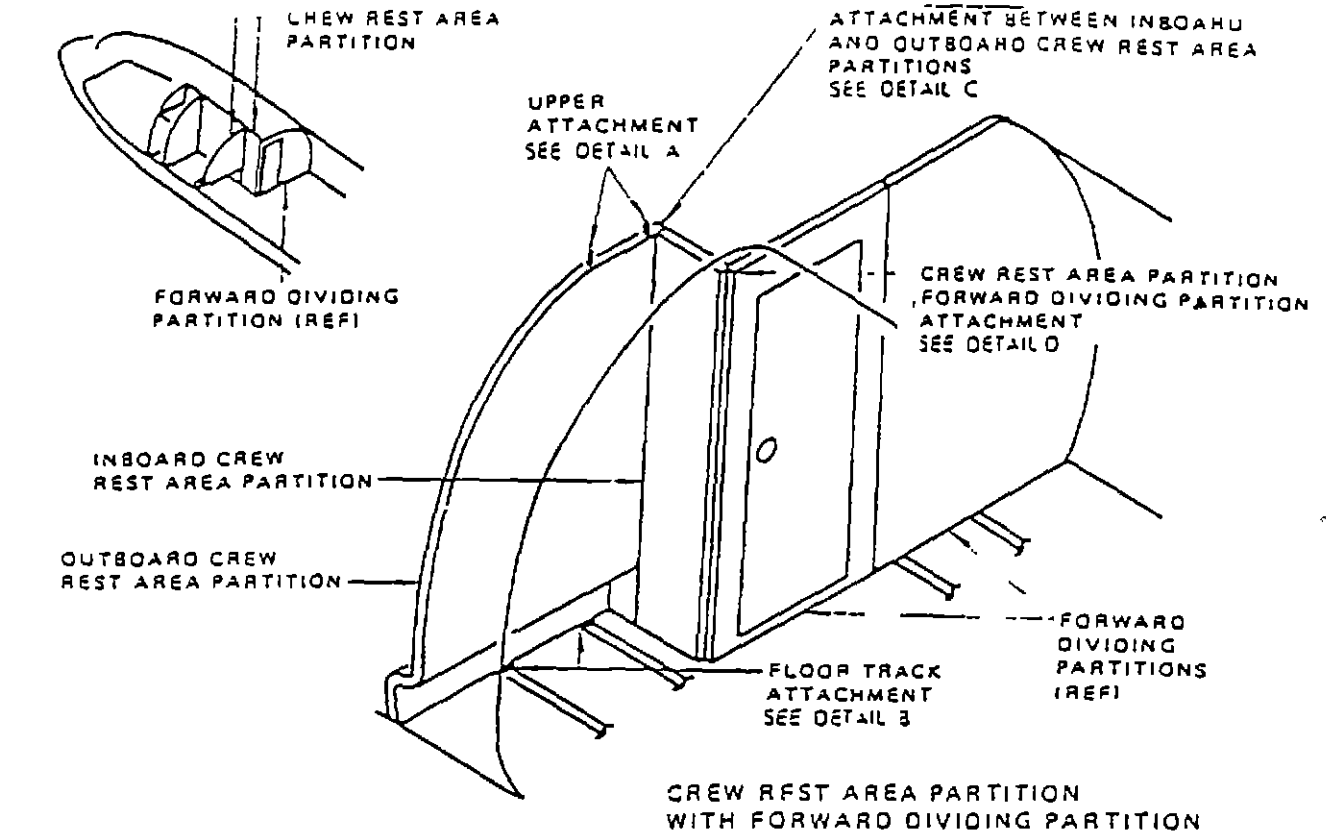
2. Prepare to Remove Crew Rest Partitions

- A. If installed, remove No. 2 forward left coat closet equipment from aft side of outboard partition. See 25-13-23, No. 2 Forward Left Coat Closet.
- B. Open COVE LIGHT circuit breaker on circuit breaker panel P1.
- C. Disconnect wiring leading to switch on aft partition by removing plug from receptacle in ceiling area.
- D. If installed remove forward aisle curtain and curtain track assembly. Insert decorative plugs in attachment screw holes in lowered ceiling (See figure 401.)
- E. If installed remove oxygen bottle from inboard forward lower face (footwell section) of the aft crew rest area partition.

3. Remove Crew Rest Area Partitions (See figure 401.)

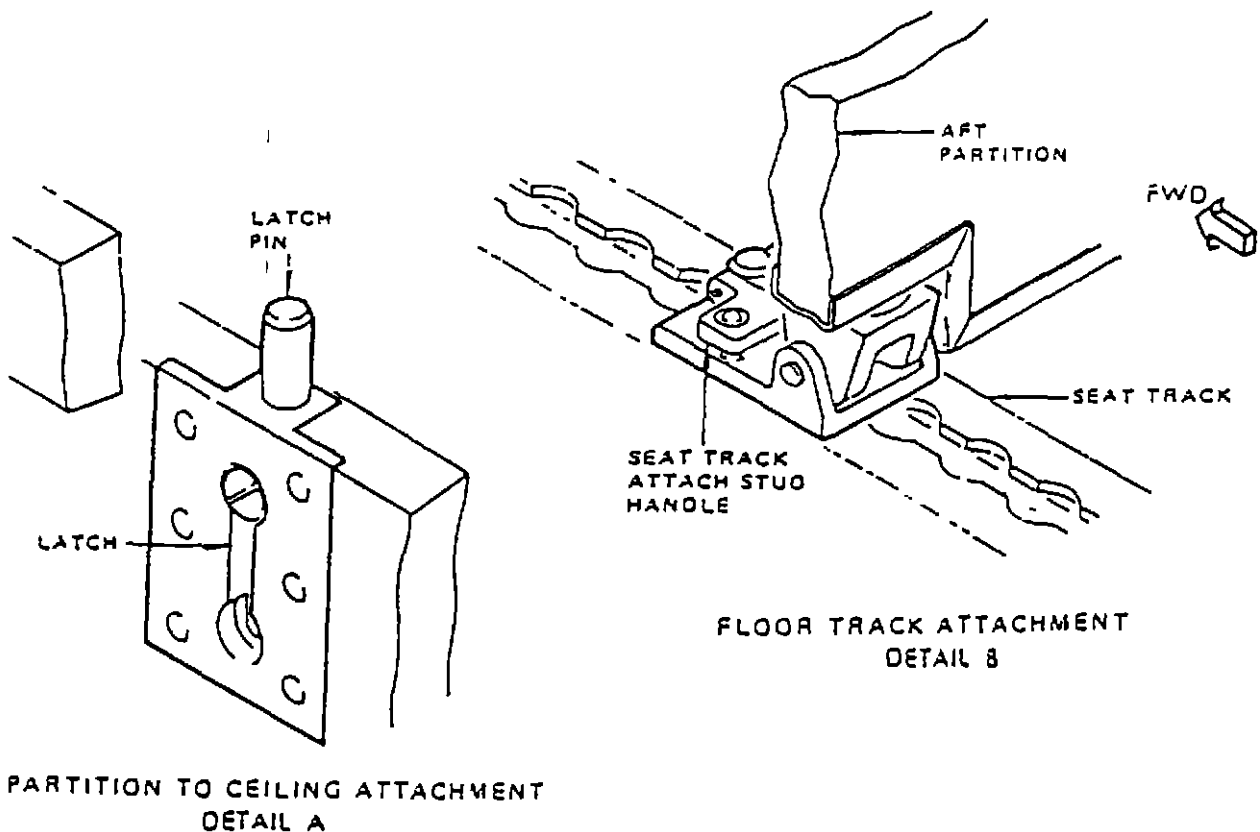
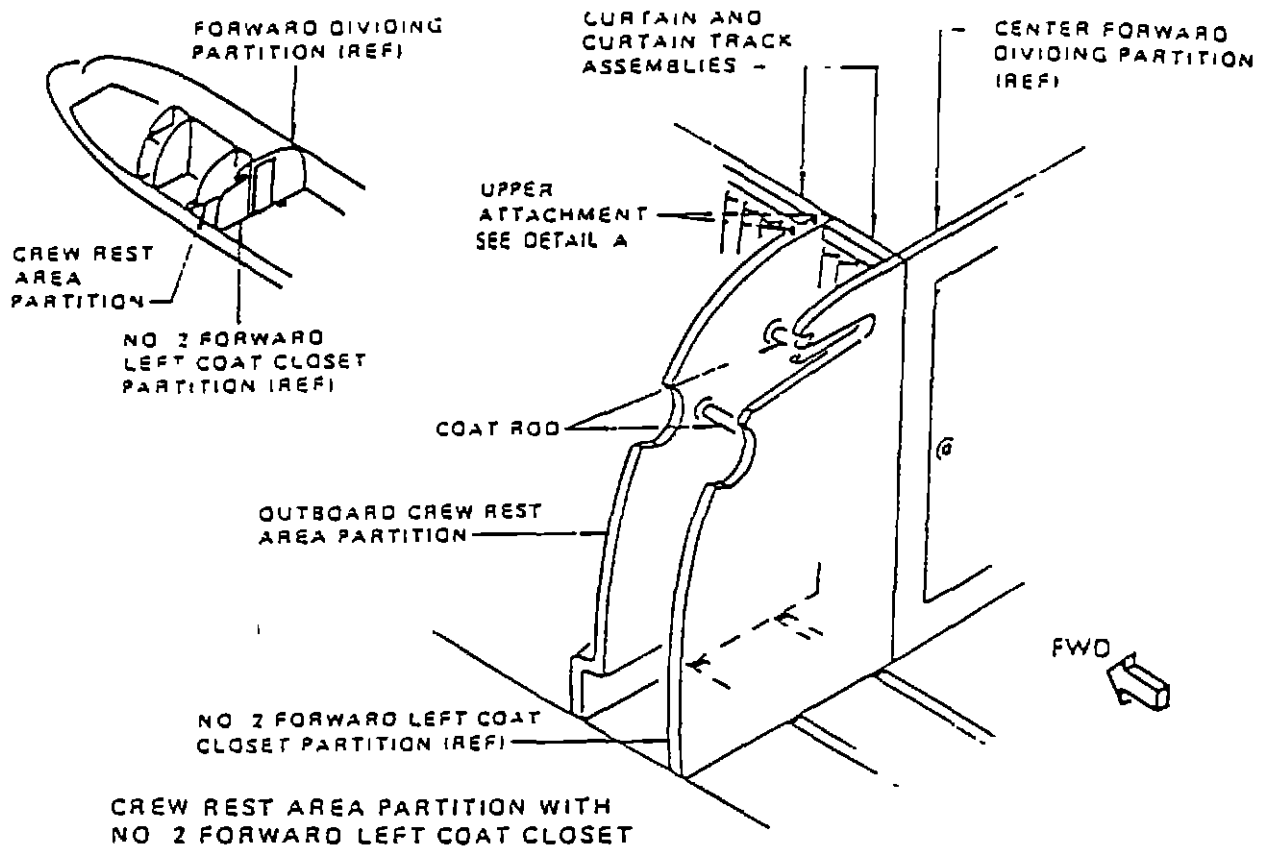
- A. If installed, remove inboard crew rest area partition.
 - (1) Remove bolts attaching partition to center forward dividing partition.
 - (2) Remove screws attaching partition to outboard crew rest area partition.
 - (3) Remove inboard crew rest area partition.

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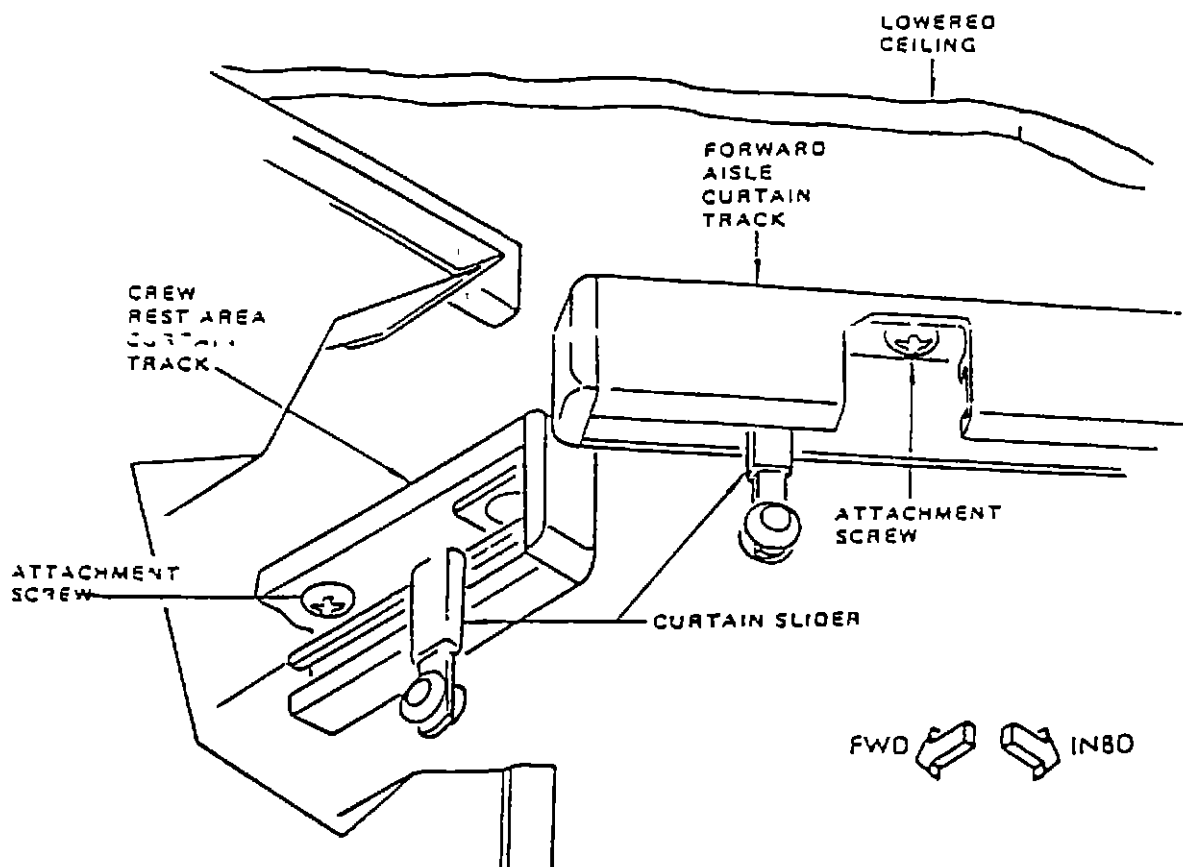
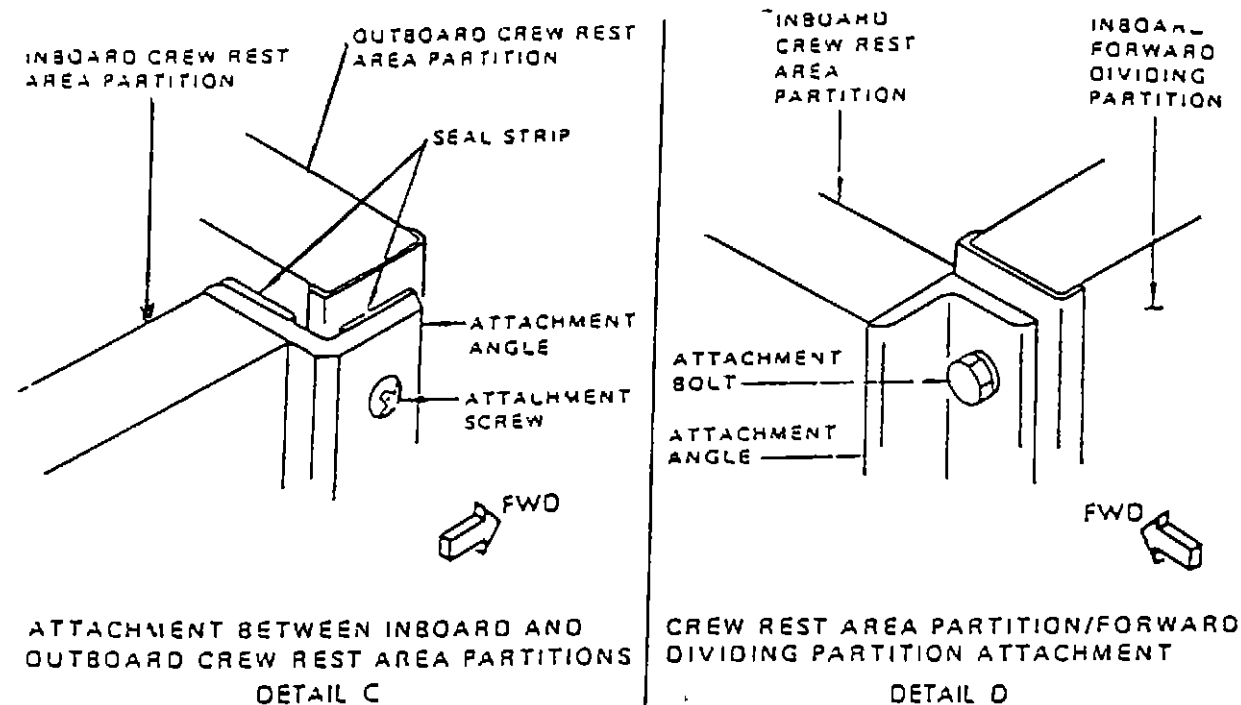


Crew Rest Area Partition Installation
Figure 401 (Sheet 1)

MAINTENANCE MANUAL



Crew Rest Area Partition Installation
Figure 401 (Sheet 2)



CURTAIN TRACK ATTACHMENT TO CEILING
DETAIL E

Crew Rest Area Partition Installation
Figure 401 (Sheet 3)

B. Remove outboard crew rest area partition.

- (1) Loosen screws securing fume-tight seals and slide seals inboard.
- (2) Remove screws attaching partition to hatrack.
- (3) Raise floor attachment handles to vertical and rotate 90 degrees.
- (4) Disengage latch pins locking partition to ceiling, by loosening retaining screw to allow the latch pin to drop clear of ceiling receptacle.
- (5) Disengage floor attachments and remove partition, by tilting bottom of partition forward or aft and sliding inboard.

4. Install Crew Rest Area Partitions

A. Install outboard crew rest area partition. (See figure 401.)

- (1) Tilting partition slightly, slide partition outboard into position and support in place.
- (2) Engage seat track attachment fittings and secure by rotating handle 90 degrees and folding it down to engage lock pin.
- (3) Raise latch pin to engage ceiling receptacle and secure by tightening retaining screw.
- (4) Install screws securing partition to hatrack.
- (5) Adjust all fume-tight seals and tighten securing screws.

B. Install inboard crew rest area partition if required. Refer to 25-15-0, Cabin Accommodation Conversions for information on cabin configurations requiring installation of this partition.

- (1) Place inboard crew rest area partition in position
- (2) Install screws securing partition to outboard crew rest area partition.
- (3) Install bolts attaching partition to center forward dividing partition.



MAINTENANCE MANUAL

5 Restore Airplane to Required Configuration

- A Connect wiring leading to switch on aft partition by engaging plug in receptacle in ceiling area.
- B. Close COVE LIGHT circuit breaker on circuit breaker panel P1.
- C If required, install forward left coat closet equipment on aft side of aft partition. See 25-13-23, No. 2 Forward Left Coat Closet
- D If installation of forward aisle curtain is required, remove decorative plugs from lowered ceiling, place curtain track in position and install screws securing track in place.

FORWARD DIVIDING PARTITION - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1. General

- A. This partition is used in conjunction with the crew area partition or the No 2 forward left coat closet to separate the crew accommodation area from the rest of the cabin. It consists of two sections, a center section (with the door), and a right partition.
- B. Remove trim and retainer from aft face of galley No. 2 prior to installation of partition to ensure snug fit. Refer to 25-17-47, Galley Units.
- C. For information on the crew area partition, refer to 25-13-50, Crew Rest Area Partition.

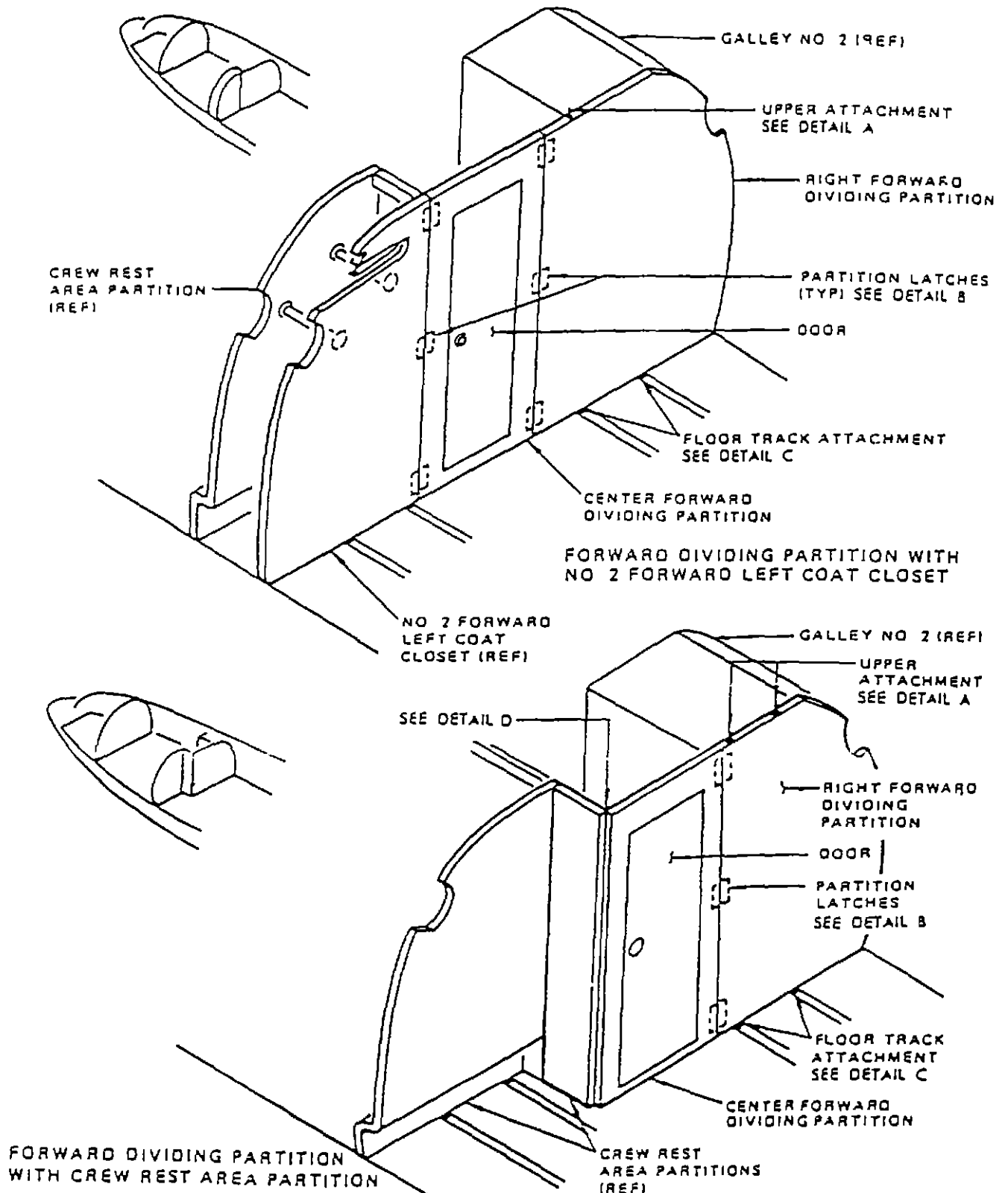
2. Remove Partition (See figure 401.)

- A. Loosen screws holding seals around edges of partitions and slide seals inboard. Tighten screws.
- B. If No 2 forward left coat closet is installed, rotate latches to disconnect center section of dividing partition from coat closet.
- C. If No. 2 forward left coat closet is not installed remove bolts attaching center section of dividing partition to longitudinal section of crew rest area partition.
- D. Rotate latches to disconnect center section from right partition; remove center section.
- E. Remove right partition by releasing its upper latch pins and disengaging it from floor tracks.

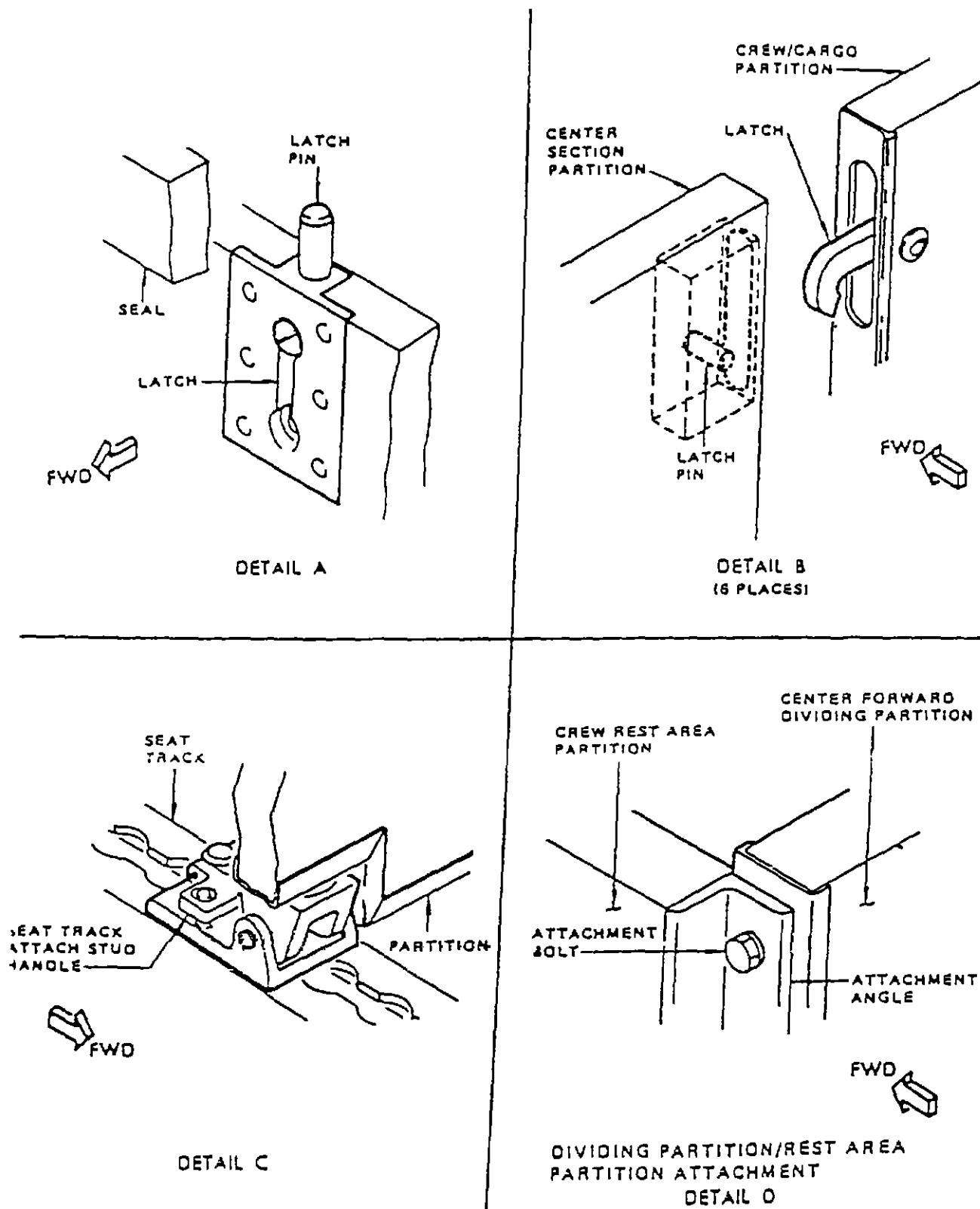
3. Install Partition

- A. Place right partition in floor tracks and secure attachments.
- B. Engage upper latch pins to structure.
- C. Visually check partition from rear for snugness. If insufficient seal exist, take measurements at different locations between partition and sidewall and adjust seal accordingly.

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Forward Dividing Partition Installation
 Figure 401 (Sheet 1)



Forward Dividing Partition Installation
Figure 401 (Sheet 2)



MAINTENANCE MANUAL

- D Place center section against inboard edge of right partition and rotate latches to connect components together.
- E If No. 2 forward left coat closet is installed, rotate latches to connect center section of dividing partition to coat closet partition.
- F If No. 2 forward left coat closet is not installed, attach center section of dividing partition to longitudinal crew rest area partition with attachment bolts.
- G Loosen screws holding seals.
- H Adjust all seals to form tight seal and secure screws



MOVABLE CARGO/PASSENGER DIVIDING PARTITION - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1. General

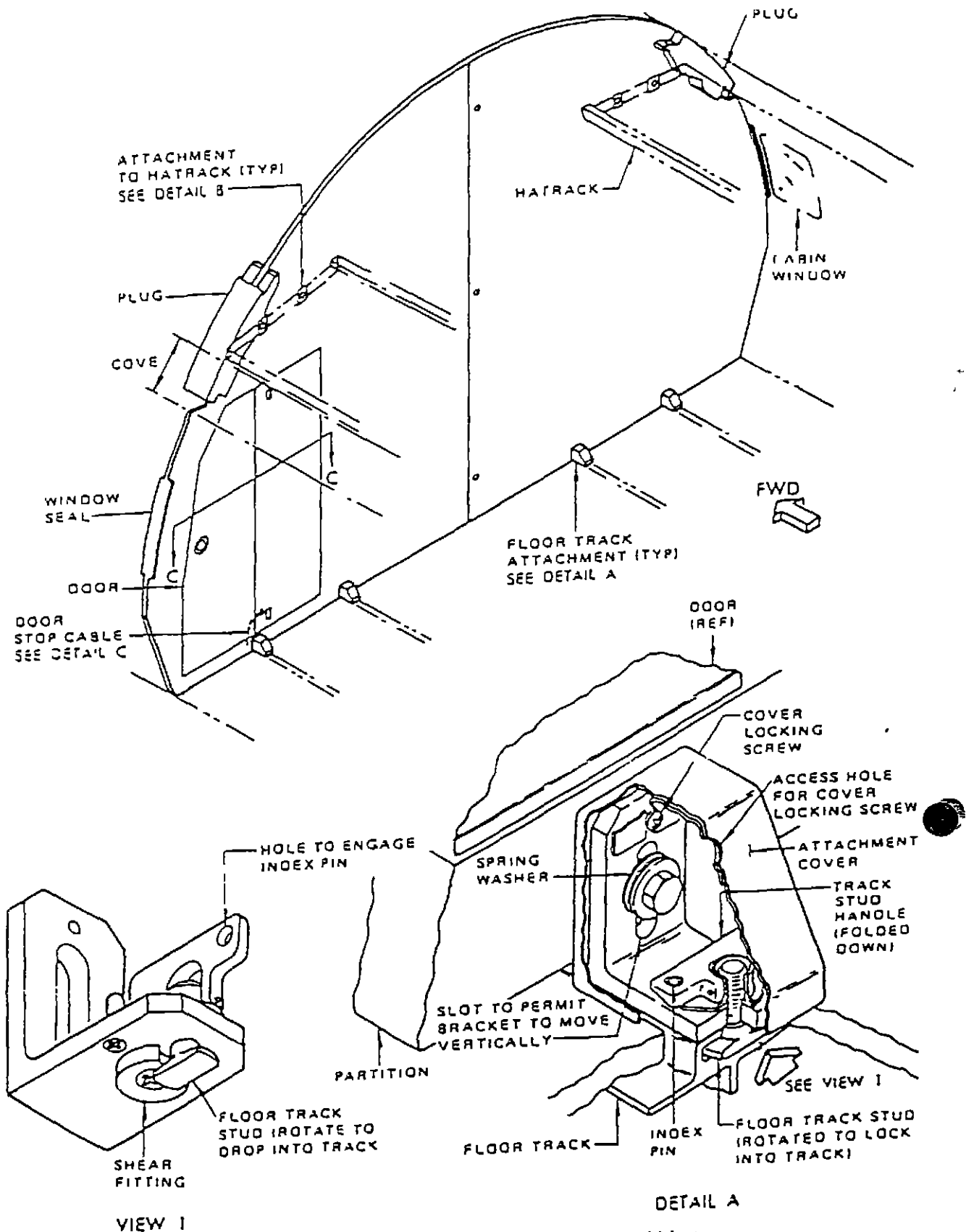
- A. This partition is used to divide the cargo from the passenger compartments in any of the combined passenger/cargo configurations.

2. Equipment and Materials

- A. Allen Wrench, 5/16 inch

3. Remove Movable Cargo/Passenger Dividing Partition

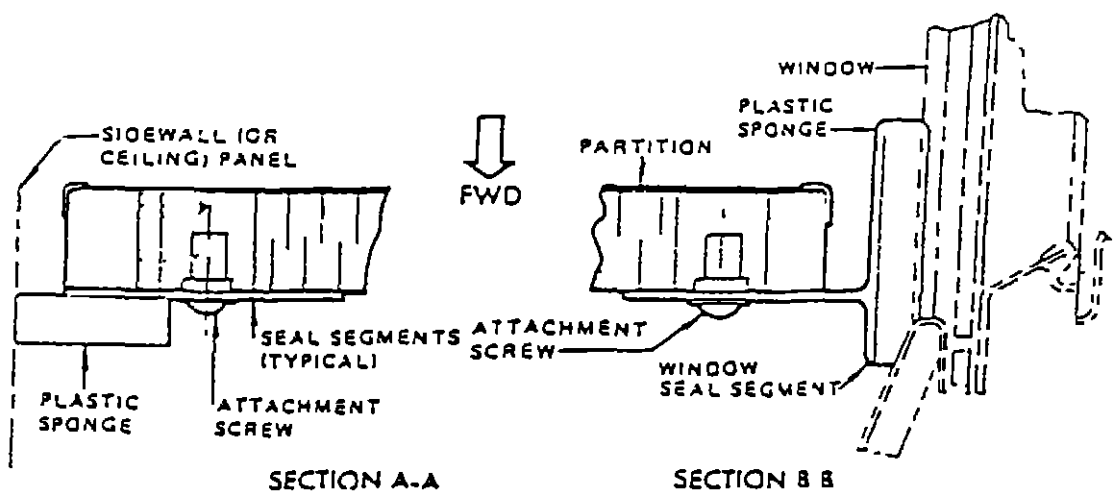
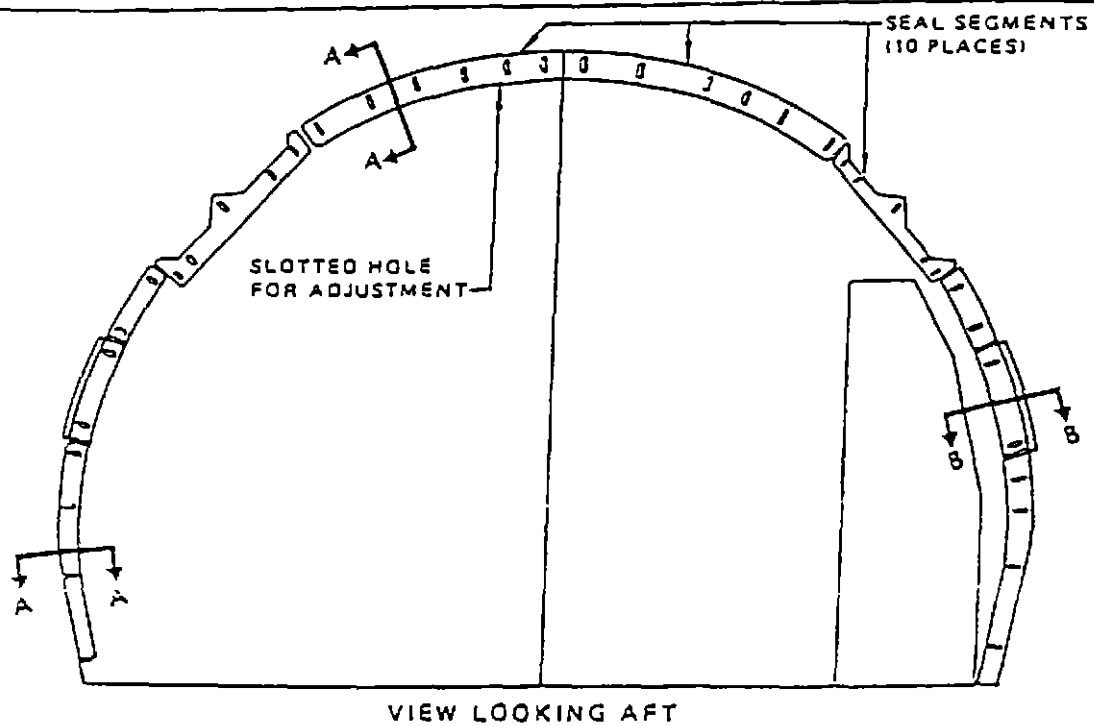
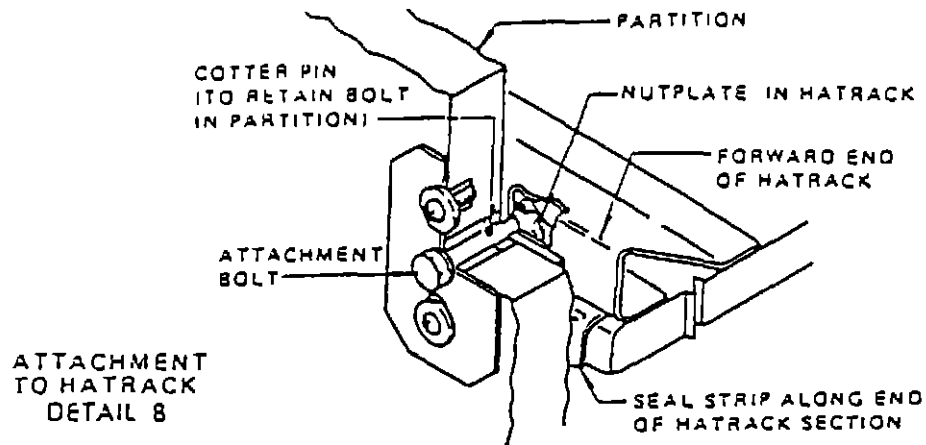
- A. Slacken screws attaching all seal segments around edge of partition and slide all seals inboard as far as their slotted holes allow. (See figure 401.)
- B. Release three dual locks connecting left and right halves of partition, using Allen wrench.
- C. Disconnect each half of partition from hatrack section on its aft face by unscrewing two bolts on forward face of each side. (Bolts are trapped to remain in partition when disconnected.)
- D. Slacken screws attaching floor attachment covers and lift covers off
- E. Raise track stud handle of each attachment to stand vertically, and rotate through 90 degrees, parallel to floor tracks. Slide whole attachment fitting upwards on its slotted hole so that its shear fitting and track stud are clear of floor track.
- F. Disengage both halves of partition by moving slightly forward or aft and sliding each half inboard. Reinstall floor attachment covers.
- G. Remove plug section from above cove on each side of cabin, extracting wiring and tubing carefully from slotted ducts provided for them within plug.



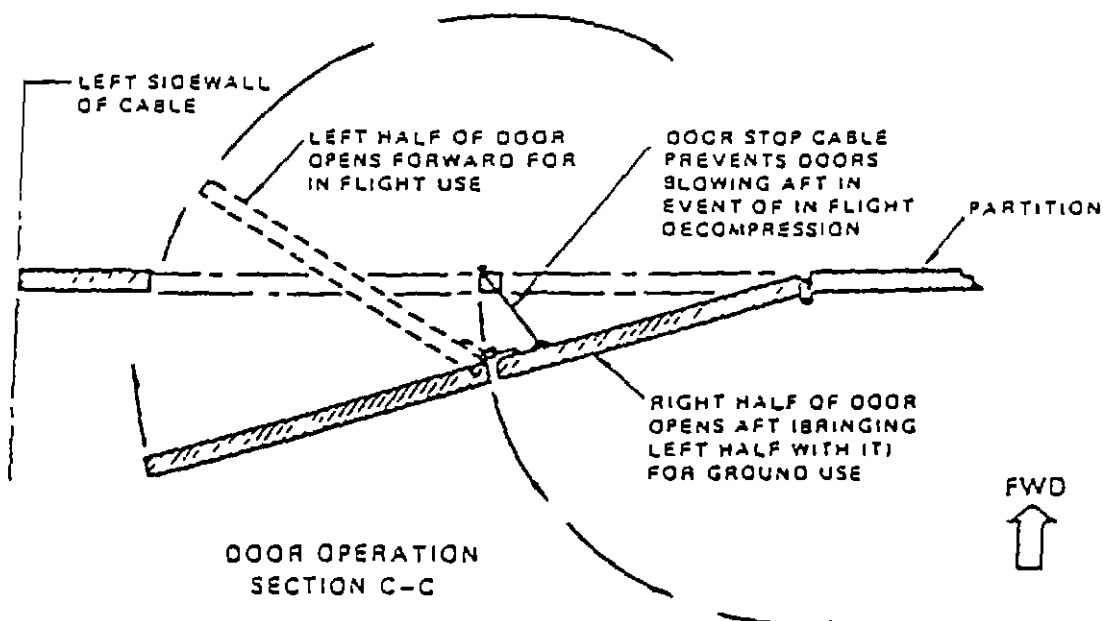
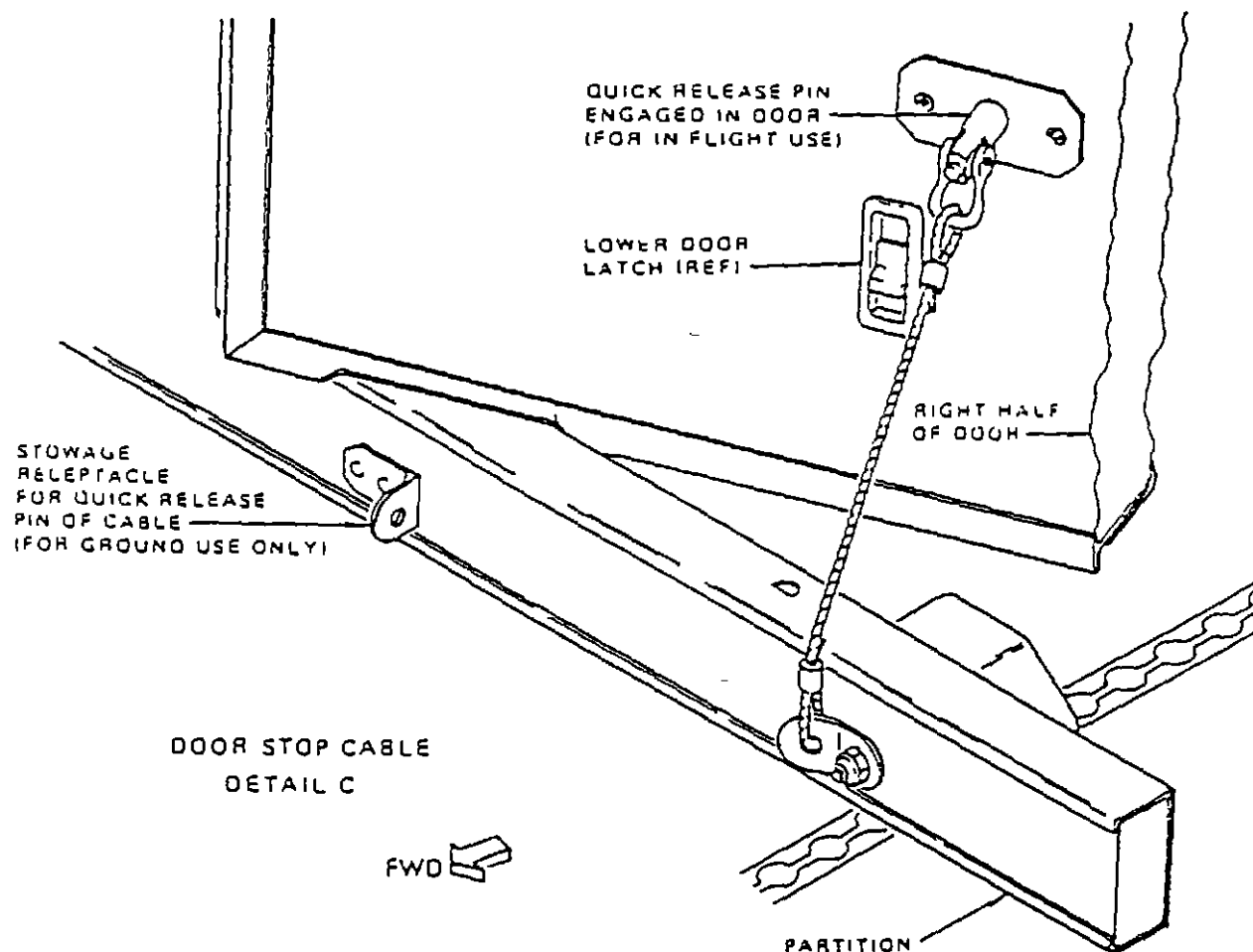
Movable Cargo/Passenger Dividing Partition
Installation
Figure 401 (Sheet 1)



MAINTENANCE MANUAL



Movable Cargo/Passenger Dividing Partition
Installation
Figure 401 (Sheet 2)



Movable Cargo/Passenger Dividing Partition
Installation
Figure 401 (Sheet 3)

4. Install Movable Cargo/Passenger Dividing Partition

- A. Install plug section above cove on each side of cabin, taking care to include wiring and tubing in proper slotted ducts provided within plug (See figure 401)
 - B. Set all seal segments as far inboard as their slotted holes will allow and temporarily tighten their attachment screws on forward face of partition
 - C. Position both halves of partition in cabin
 - D. Remove floor attachment covers, set track stud handles to stand vertically and parallel to floor tracks and slide attachment fittings down on their slotted holes to engage floor tracks. Lock fittings to track by rotating handles through 90 degrees and folding down forward to engage index pins. Reinstall covers over floor track attachments
 - E. Connect both halves of partition to ends of hatrack sections on their aft face by installing two bolts on forward face of each side.
- NOTE The seals along the forward edges of the hatracks, and along the forward edges of the lower closure panels (if these are installed), should be deflected downwards and upwards respectively to allow the partitions to contact the hatrack ends properly.
- F. Connect both halves of partition together at airplane centerline by tightening three dual locks, using Allen wrench.
 - G. Check that door stop cable is properly installed (See detail C, figure 401.)

NOTE: Both left and right doors may be open while airplane is on the ground. (See section C-C, figure 401.) In this case the quick-release pin on the end of the door stop cable should be engaged in its stowage receptacle on the forward face of the door threshold.

In preparation for flight, however, the right door must be closed and latched, so that only the left door (which then opens forward) may be used. In this case the door stop cable must be connected to the forward side of the closed right door. (The purpose of this cable is to restrain the right door from swinging too far aft in the event of an in-flight decompression)



MAINTENANCE MANUAL

INDEX NO.	ASSY AND/OR PART NO (INSTALLATION NO S REF)	NOMENCLATURE
39 	65-58642-4 65-58642-6 (2) NAS514P832-8 (4)	PLACARD INSTL EMERGENCY HATCH LH & RH (REF) PLACARD SCREW
40 	BI-91104-802	GALLEY NO 3
41 	BI-91105-802	GALLEY NO 4
42	65-42546 21950-51 66-20703-1 69-22757-6J 69-25612-1 69-26216-1 BACC19B6-60 BACW10P125C BACP18N2 M524665-309 NAS1169DDBL	GALLEY INSTL ATTACHMENT KIT (REF) TIE-DOWN FITTING SEAL SANITARY TIE-BACK ASSY RETAINER PIN PIN CHAIN ASSY WASHER LOCK-PIN PIN-COTTER WASHER
43  	65-42584-4 OR -4A	CURTAIN ASSY (GALLEY NO 3)
44  	65-42584-5 OR -5A	CURTAIN ASSY (GALLEY NO 4)
45	65-31751	AFT LOWERED CEILING COMPT INSTL (REF)
45A	65-29959-1 *ES/14/1 (2)	LIFE RAFT COMPT LIFE RAFT
45B	65-32682-1  65-54104-2   *17D22319-1  65-31217-44 	RH PANEL ASSY COMPT RETAINER ASSY ESCAPE SLIDE RH PANEL ASSY
46  	65-33600-4	HATRACK AND COVE INSTL CONVERSION KIT (REF)
47	65-3640-53 69-4797 69-6978 AN737TW58 (10) AN742D24 (3) NAS603-1 (3) BACD40A6-48-5A1 BACD40A6-57-5A1 BACD40D6-13-14 (2) BACD40D5-13-14 (2)	DUCT Y DUCT T DUCT CLAMP CLAMP SCREW DUCT FLEXIBLE DUCT FLEXIBLE DUCT FLEXIBLE DUCT FLEXIBLE

Passenger Accommodation Conversion Equipment
Figure 201 (Sheet 11)

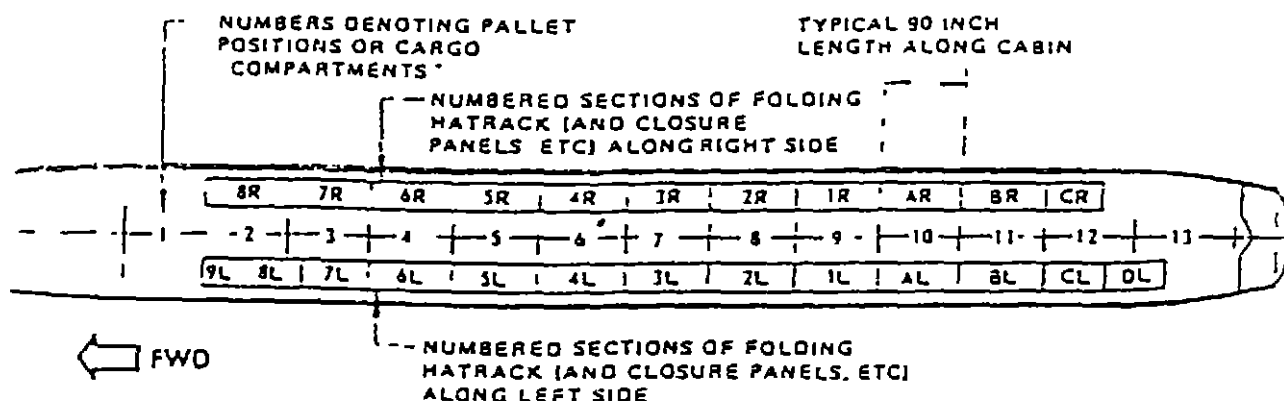


MAINTENANCE MANUAL

CABIN ACCOMMODATION CONVERSIONS - DESCRIPTION AND OPERATION

1 General

- A The interior furnishings and equipment of these airplanes are designed to allow easy and rapid convertibility between several combinations of passenger and cargo configurations. The convertibility system provides for the establishment of all-passenger configurations, a series of combined passenger/cargo configurations ranging in cargo capacity from 3 pallets to 10 pallets, all-cargo palletized configurations, and the bulk-cargo configurations.
- B This section of the Maintenance Manual describes the procedures necessary to convert the cabin accommodation from any one to any other of these configurations. For information on how cargo is secured and how much may be loaded, etc., reference should be made to the Weight and Balance Control and Loading Manual.
- C The various cargo-carrying capacities of the system are based on unit loads of palletized cargo and the cargo-carrying equipment is designed to accommodate such pallets. However by replacing this equipment with equivalent direct tie-downs, etc., bulk cargo can be carried instead.
- D In accordance with the concept of palletized cargo certain items of passenger cabin equipment (the folding hatracks, their closure panels and the floor covering) are designed in units of 90 inch lengths to simplify conversions to and from the combined configurations. (See Figure 1) The hatrack and closure panel sections are numbered according to their installation sequence, as explained in 25-10-42, Hatracks. The whole cabin is also divided into pallet positions, each 90 inches long which coincide (except at the forward and aft ends) with the divisions between the hatracks. The pallet positions are numbered from 1 through 13 from forward to aft and form the rational compartments for the computation of cargo loading distribution. (Refer to the Weight and Balance Control and Loading Document.)



Hatrack and Pallet Position Relationship
Figure 1



MAINTENANCE MANUAL

E. There are certain significant features of the Cargo Airplane which, though directly related to its convertibility, are items of basic permanent structure rather than of removable equipment. These features include the main cargo door, the emergency escape hatches at BS 690, and the additional floor tracks throughout the cabin.

- (1) The main cargo door is the large door at the forward left side of the upper fuselage. It provides the necessary access through which cargo may be loaded or unloaded and is described in detail in Chapter 52, Main Cargo Door. In any of the cargo carrying configurations this door is activated.
- (2) There are three pairs of emergency escape hatches. The two pairs of hatches at BS 690 and BS 770 may be Class III or Class I', depending upon the degree to which adjacent seats interfere with access to them. The pair of hatches at BS 990 are Class II hatches due to their greater size they open to reveal an egress area to floor level. Due to their location aft of the wing area each of the hatches at BS 990 is provided with an escape slide which is installed to the adjacent floor tracks. All three pairs of emergency escape hatches are described in detail in Chapter 52, Emergency Escape Hatches. The existence of three pairs of emergency escape hatches allows for the provision of adequate emergency exit facilities in any of the configurations in which passengers are carried.
- (3) The floor tracks comprise a total of seven tracks attached to the floor throughout the length of the cabin. Two pairs of floor tracks along each side of the cabin serve as attachments for passenger seats and there are three additional floor tracks which serve as attachments for cargo handling equipment. One of these additional tracks is along the airplane centerline and the other two are along the outboard edges of the cabin floor. In any part of the cabin which is in a cargo-carrying configuration all seven tracks are usable. In any part of the cabin which is in a passenger-carrying configuration the central track and the extreme outboard tracks are filled and covered. At the forward and aft ends of the cabin the floor tracks serve to attach certain of the removable units of passenger equipment such as galleys, lavatories and closets. Because of this the floor tracks at the ends of the cabin are augmented by additional short lengths.

F. Thirteen electrical sockets throughout the cabin provide individual 115 volt ac power supplies for the cargo pallets. These permit operation of temperature control or similar functions on any pallet within the cabin. The sockets for pallets Nos. 1, 2 and 3 are grouped together above the aft end of the lounge hatrack, and are concealed (in the all-passenger configuration) by a snap-on cover. The remaining sockets are single units spaced at pallet-length intervals above the hatracks along the left side of the cabin. These are concealed by flexible cover flaps in the hatrack upper closure panels.

2. All-Passenger Configurations

- A There are two all-passenger configurations, the 176 passenger configuration and the VIP passenger configuration

NOTE. The 176 passenger configuration is a certified FAA arrangement. The passenger capacity of the VIP passenger configuration has not been designated or confirmed. The seating arrangement and passenger capacity of these configurations are subject to change when complying with applicable government aviation agency regulations. Refer to 25-15-100, Passenger Cabin Equipment Arrangement Limitations

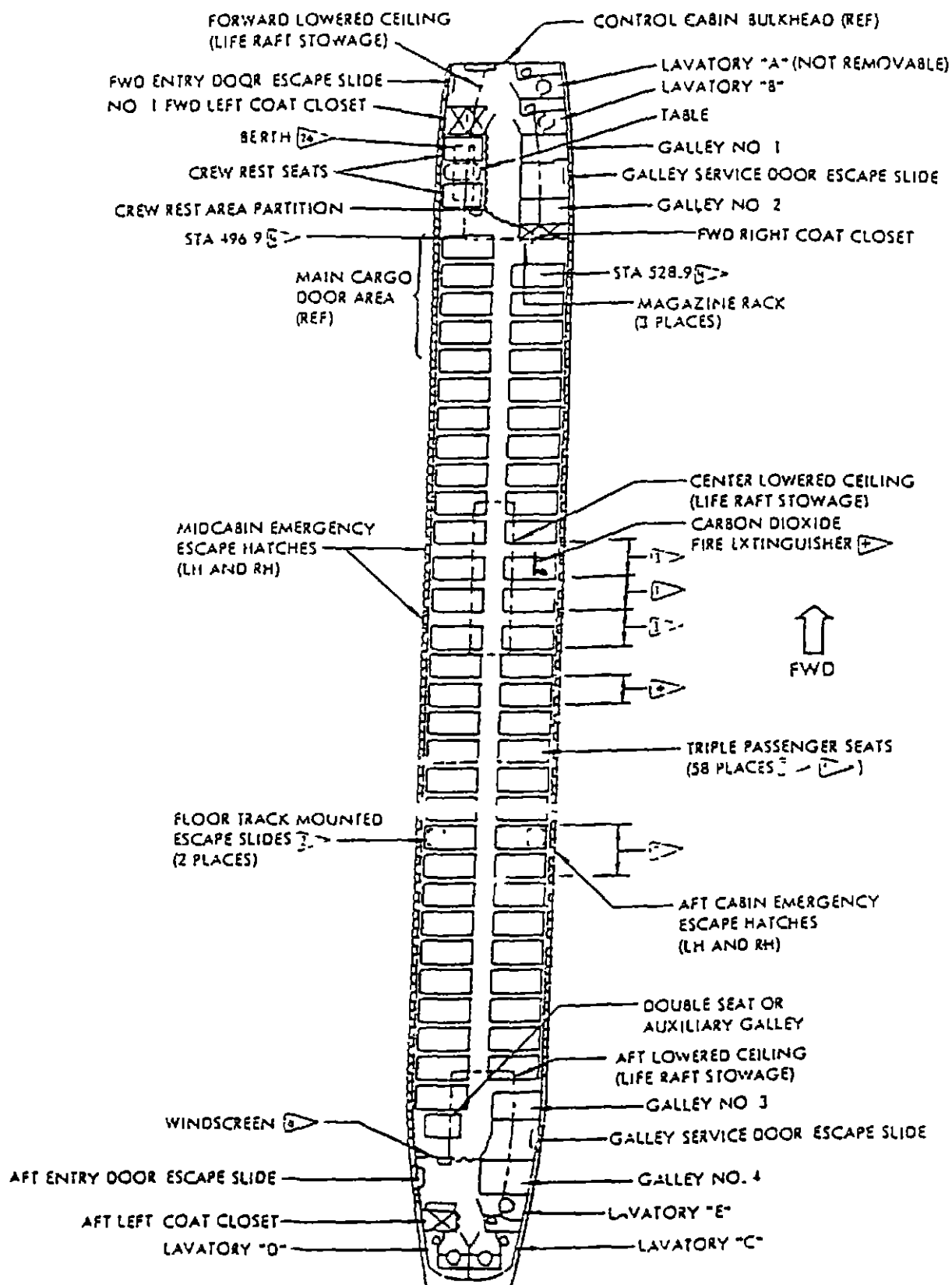
- B In any of the all-passenger configurations the main cabin cargo door is closed and deactivated.

3. Combined Passenger/Cargo Configurations (See figure 2)

- A Conversion of the cabin interior to any of the combined passenger/cargo configurations may be accomplished by varying the location of a movable partition which divides the cargo from the passenger area and forms a flame-tight barrier between the two compartments. In any of the combined configurations the main cargo door is activated and the forward portion of the cabin is converted to become the cargo carrying compartment. For information on the movable cargo/passenger partition, refer to 25-13-55, Movable Cargo/Passenger Dividing Partition.
- B If bulk cargo is to be carried, tiedown fittings are installed to the cabin floor tracks. If the cargo to be carried is palletized a system of cargo carrying equipment is installed to the cabin floor tracks.
- C The cargo carrying equipment consists of a system of rollers and guides on which pallets loaded with freight may be moved as far aft as any particular configuration allows. For further information on the cargo carrying equipment, refer to 25-30-0, Cargo Equipment.
- D In the combined passenger/cargo standard configurations, the extreme forward end of the cabin is separated from the forward end of the cargo compartment by a flame-tight curtain. For information on the flame-tight curtain, refer to 25-36-0, Cargo Equipment.
- (1) In these configurations, range in cargo capacity is from 3 pallets to 10 pallets, according to the location in which the movable cargo/passenger dividing partition is installed across the cabin. (See figure 2) Aft of the partition, accommodation is provided for as many passengers as seat spacing limitations permit.



MAINTENANCE MANUAL



176 PASSENGER CONFIGURATION

Cabin Accommodation Conversion Configurations

Figure 2 (Sheet 1)

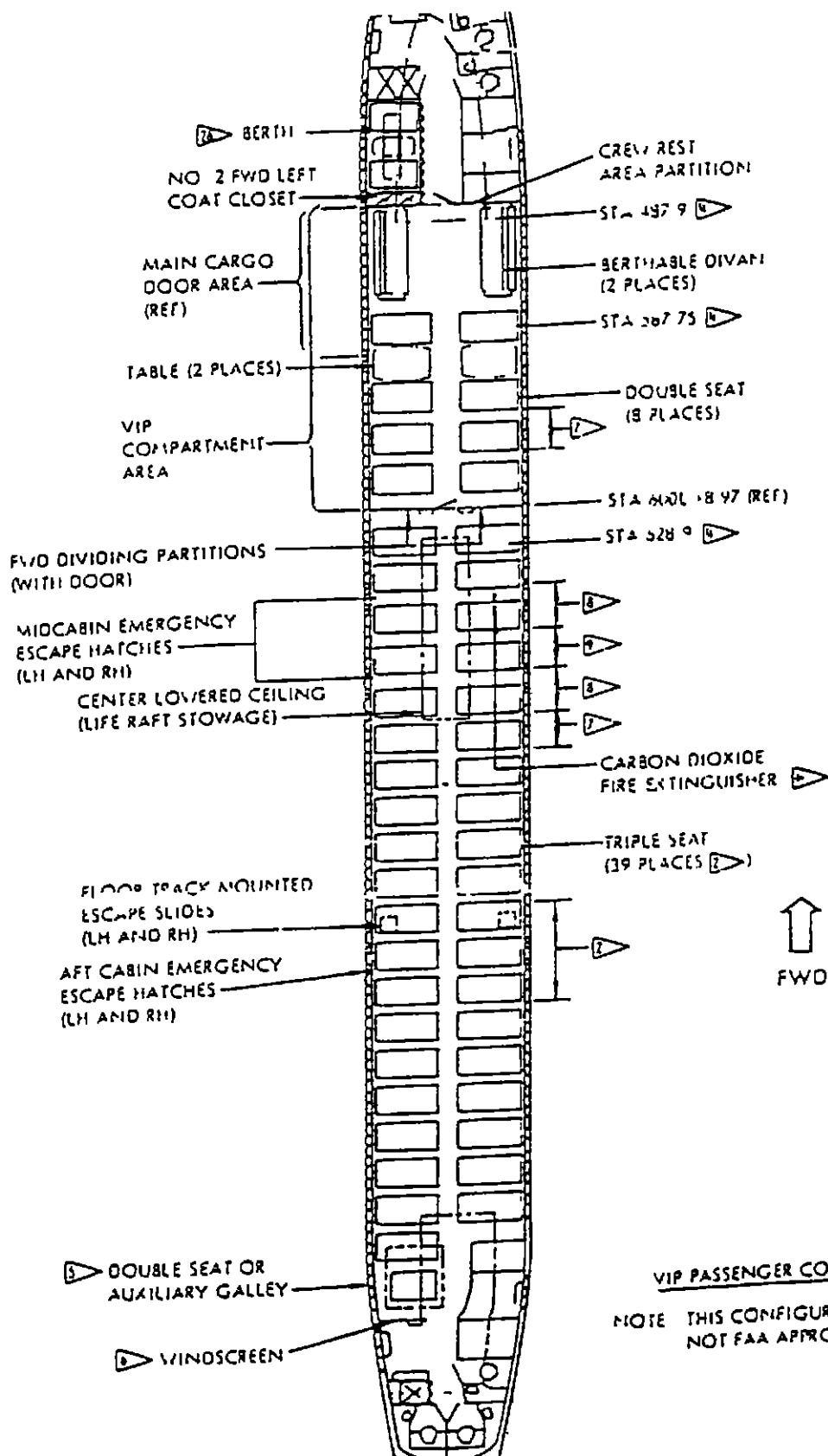


MAINTENANCE MANUAL

- ▶ PURCHASE OF THIS EQUIPMENT IS NOT CONFIRMED
- ▶ INSTALLED ON HATRACK
- ▶ SEAT SPACING IN THE 176 ALL-PASSENGER CONFIGURATION IS 32 INCHES (FROM BACK TO BACK) EXCEPT SEATS IN THE EMERGENCY ESCAPE HATCH AREAS 1 ▶ 2 ▶ 3
- 1 ▶ SEAT SPACING BETWEEN THE MIDCABIN EMERGENCY ESCAPE HATCHES IS 38 INCHES
- 2 ▶ SEAT SPACING AND CAPACITY IN AREA OF THE AFT CABIN EMERGENCY ESCAPE HATCHES IS SUBJECT TO CHANGE WHEN FLOOR MOUNTED ESCAPE SLIDES ARE INSTALLED REFER TO 25-15-100, PASSENGER CABIN EQUIPMENT ARRANGEMENT LIMITATIONS
- 3 ▶ SEAT SPACING AT THE MIDCABIN EMERGENCY ESCAPE HATCHES IS 42 INCHES
- 4 ▶ POSITION OF FRONT SEAT FRONT LEG ATTACHMENTS
- 5 ▶ AUXILIARY GALLEY MAY BE INSTALLED IN PLACE OF THE TWO AFT LEFT PASSENGER SEATS AND AFT WINDSCREEN
- 6 ▶ THE AFT WINDSCREEN INSTALLATION IS OPTIONAL WHEN THE AUXILIARY GALLEY IS INSTALLED
- 7 ▶ FORWARD DOUBLE SEAT SPACING IS 38 INCHES (FROM BACK TO BACK) THE AFT TRIPLE SEAT SPACING IS 34 INCHES (FROM BACK TO BACK) EXCEPT SEATS IN THE EMERGENCY ESCAPE HATCH AREAS 7 ▶ 8 ▶ 9
- 8 ▶ SEAT SPACING AT THE MIDCABIN EMERGENCY ESCAPE HATCHES IS 40 INCHES
- 9 ▶ SEAT SPACING BETWEEN THE MIDCABIN EMERGENCY ESCAPE HATCHES IS 36 INCHES
- 10 ▶ THIS CONFIGURATION IS CERTIFIED UNDER FAA REGULATIONS (NO OTHER CONFIGURATIONS ARE FAA CERTIFIED)
- 11 ▶ SEAT SPACING IS 32 INCHES (FROM BACK TO BACK) EXCEPT SEATS IN THE EMERGENCY ESCAPE HATCH AREAS 11 ▶ 12
- 12 ▶ SEAT SPACING AT THE AFT CABIN EMERGENCY ESCAPE HATCHES IS 57 INCHES
- 13 ▶ THIS CONFIGURATION IS DESIGNATED BY THE NUMBER OF CARGO CARRYING PALLETES ACCOMMODATED. THE PALLET NUMBERS AND POSITIONS ARE, HOWEVER, ASSIGNED BY THE CARGO SYSTEM INSTALLATION, REFER TO 25-36-101, CARGO CARRYING SYSTEM
- 14 ▶ THESE COMBINED PASSENGER/CARGO CONFIGURATIONS ARE POSSIBLE WHEN MAINTAINING FORWARD AND AFT EQUIPMENT AS INSTALLED IN THE 3 PALLET COMBINED PASSENGER/CARGO CONFIGURATION WITH CARGO ELEVATOR AND CREW REST ACCOMMODATION. THE PASSENGER CAPACITY AND SEAT SPACING HAVE NOT BEEN CONFIRMED



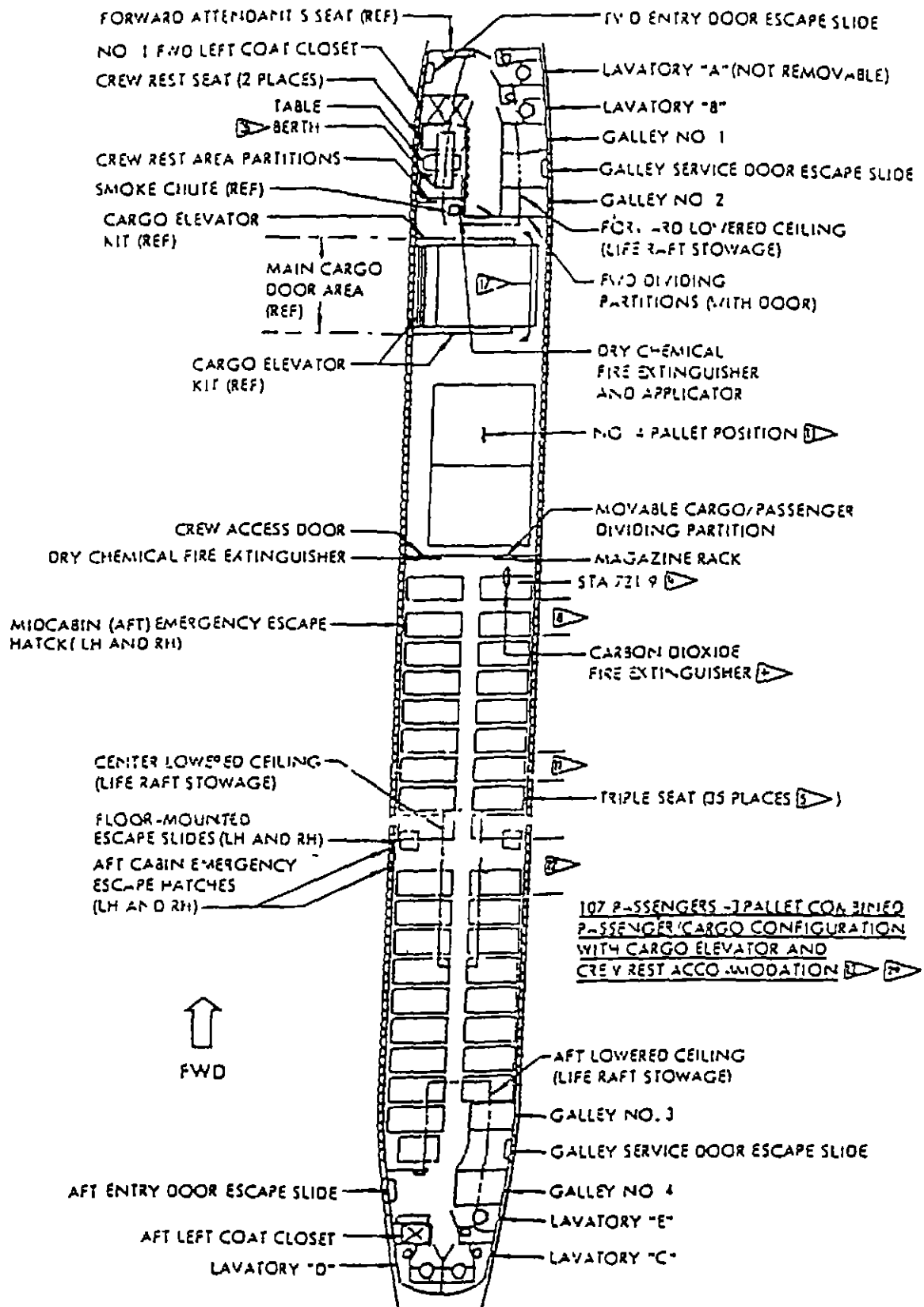
MAINTENANCE MANUAL



VIP PASSENGER CONFIGURATION

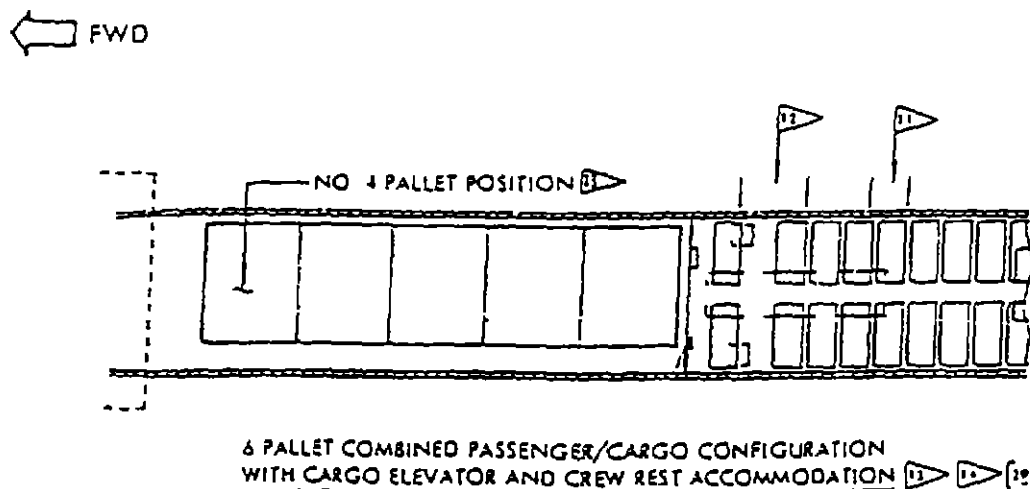
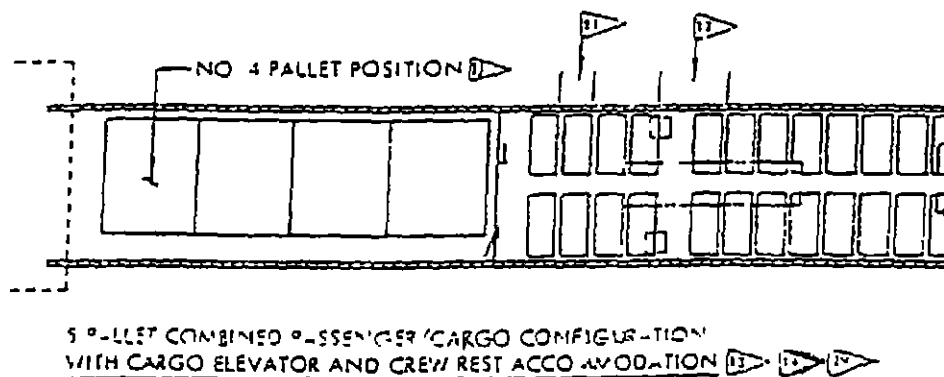
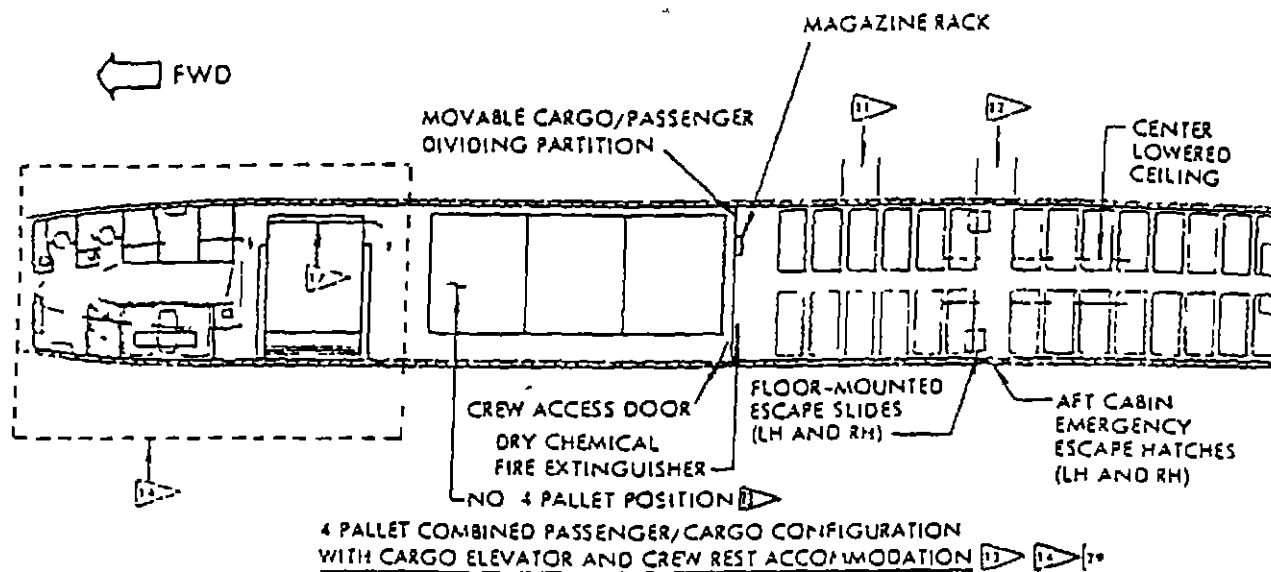
NOTE THIS CONFIGURATION IS NOT FAA APPROVED.

BOEING 777
Intercontinental
MAINTENANCE MANUAL



Cabin Accommodation Conversion Configurations
Figure 2 (Sheet 5)

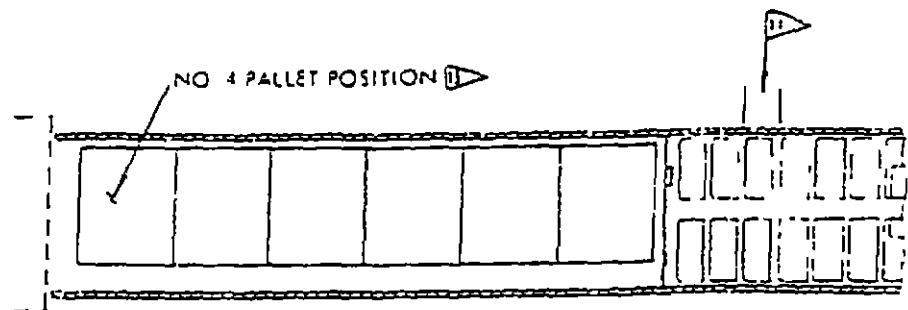
BOEING 707
Intercontinental
 MAINTENANCE MANUAL



Cabin Accommodation Conversion Configurations
 Figure 2 (Sheet 6)

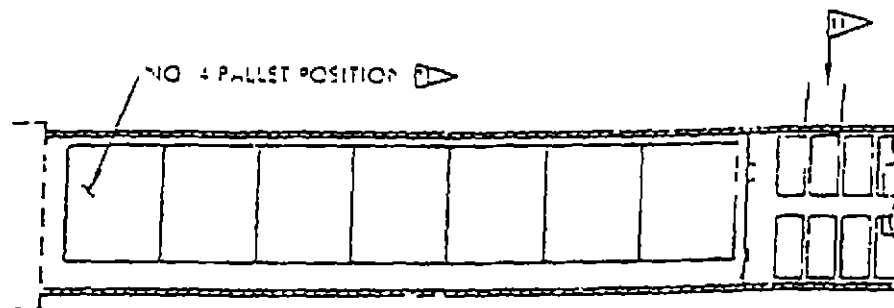
BOEING *747*
Intercontinental

MAINTENANCE MANUAL



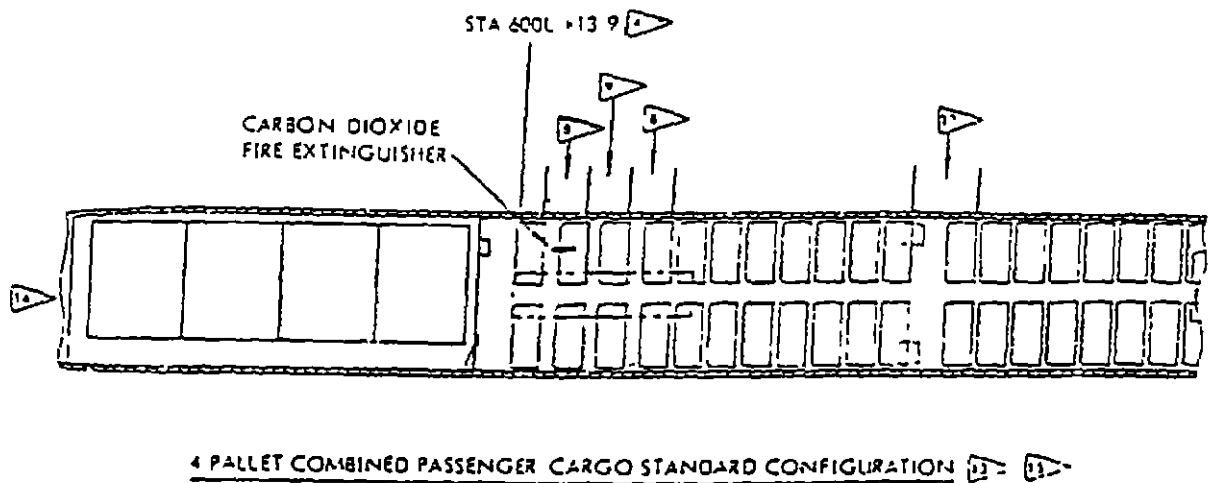
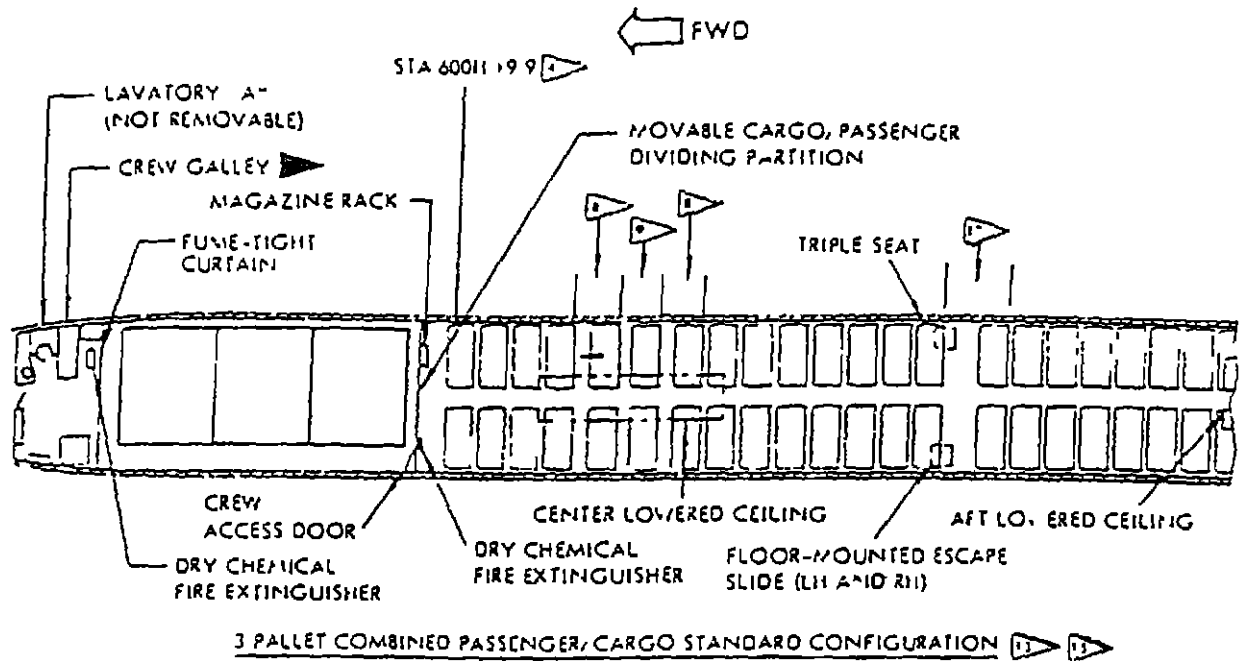
7 PALLET COMBINED PASSENGER/CARGO CONFIGURATION
WITH CARGO ELEVATOR AND CREW REST ACCOMMODATION 13 14 15

← FWD

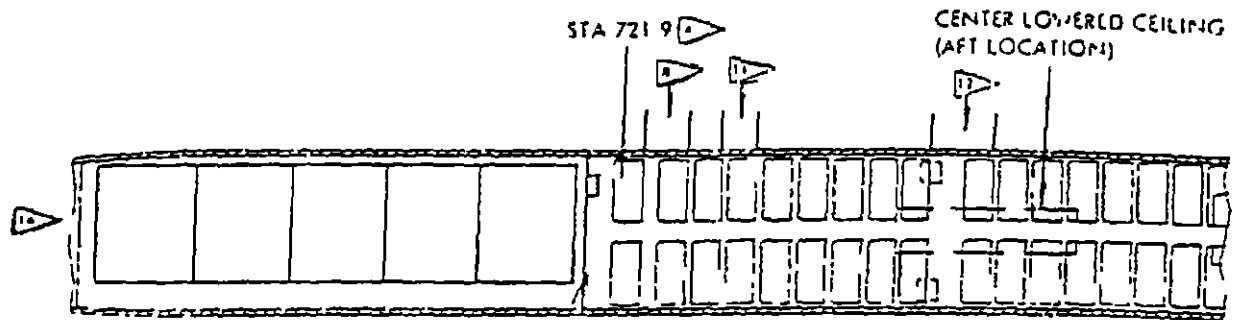


8 PALLET COMBINED PASSENGER/CARGO CONFIGURATION
WITH CARGO ELEVATOR AND CREW REST ACCOMMODATION 13 14 15

BOEING
Intercontinental
707
MAINTENANCE MANUAL

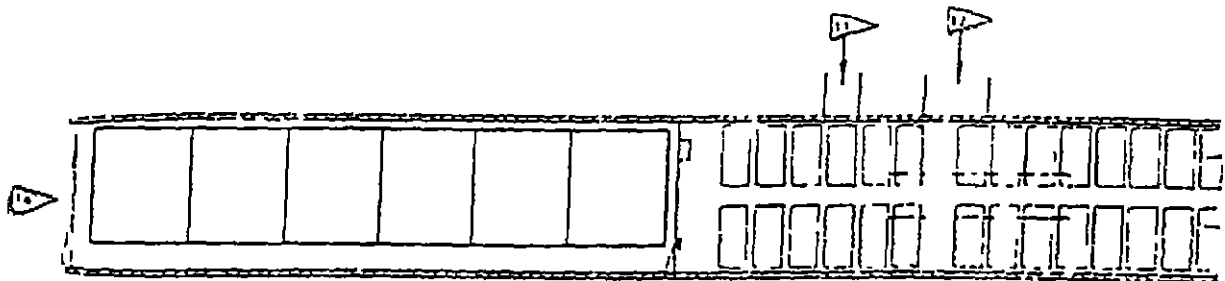


Cabin Accommodation Conversion Configurations
Figure 2 (Sheet 8)

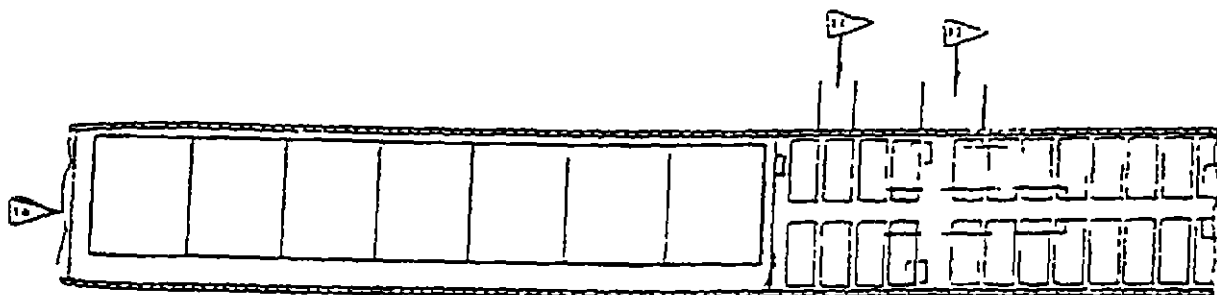


5 PALLET COMBINED PASSENGER/CARGO STANDARD CONFIGURATION  

← FWD



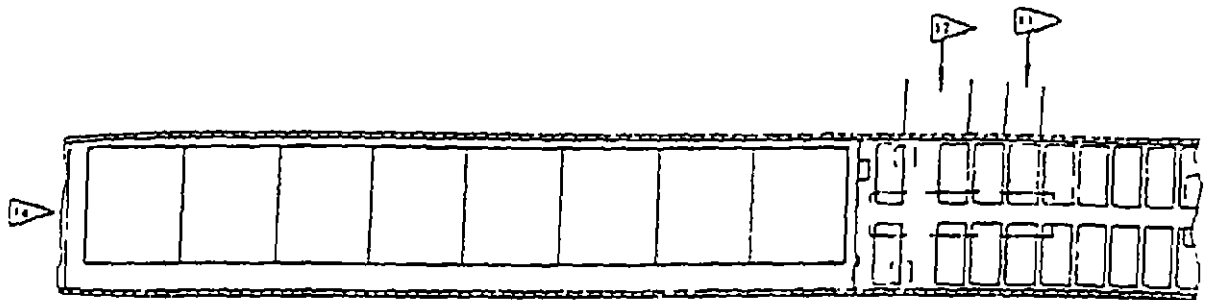
6 PALLET COMBINED PASSENGER/CARGO STANDARD CONFIGURATION  



7 PALLET COMBINED PASSENGER/CARGO STANDARD CONFIGURATION  

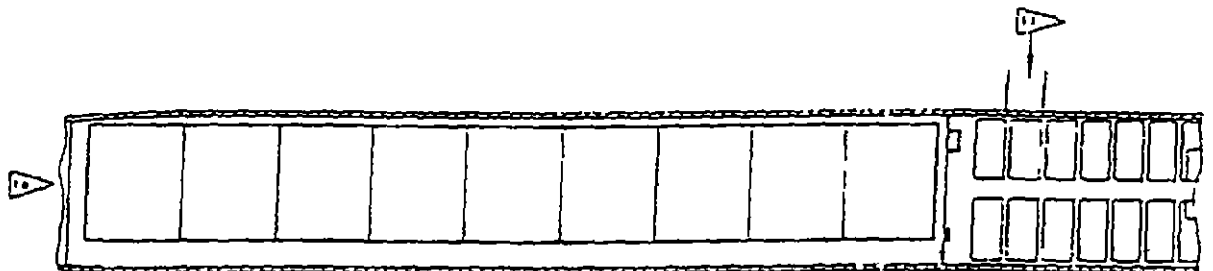
Cabin Accommodation Conversion Configuration
 Figure 2 (Sheet 9)

BOEING *707*
Intercontinental
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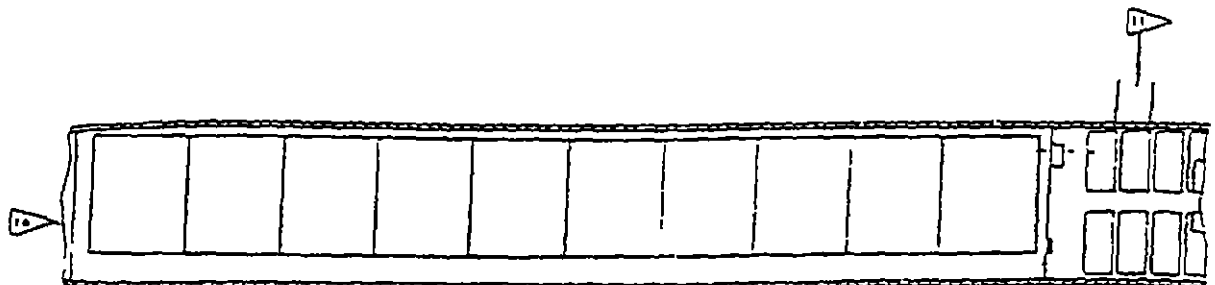


8 PALLET COMBINED PASSENGER CARGO STANDARD CONFIGURATION ➤ ➤

← FWD



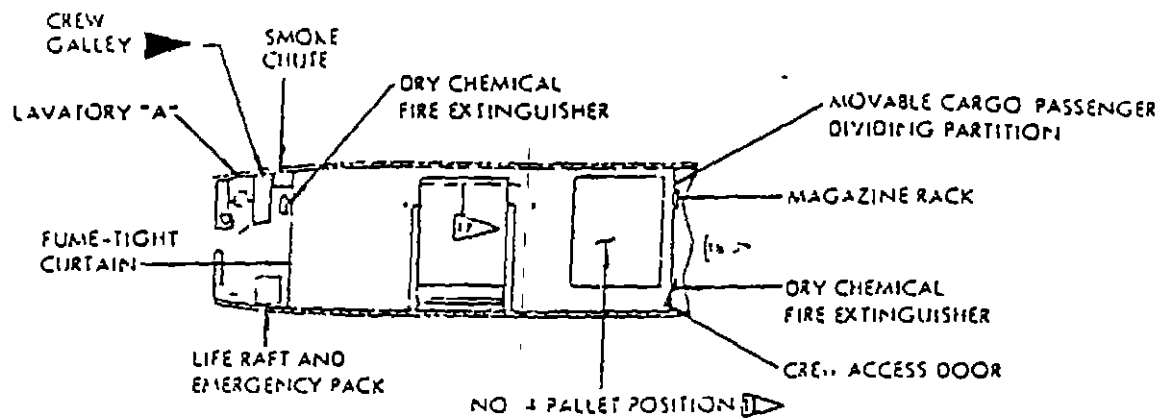
9 PALLET COMBINED PASSENGER CARGO STANDARD CONFIGURATION ➤ ➤



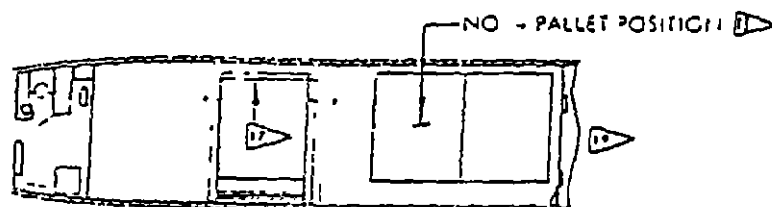
10 PALLET COMBINED PASSENGER CARGO STANDARD CONFIGURATION ➤ ➤

Cabin Accommodation Conversion Configurations
 Figure 2 (Sheet 10)

BOEING 707
Intercontinental
MAINTENANCE MANUAL

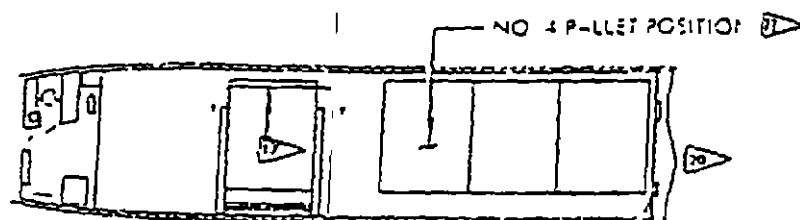


2 PALLET COMBINED PASSENGER CARGO CONFIGURATION WITH CARGO ELEVATOR (WITHOUT CREW REST AREA)



3 PALLET COMBINED PASSENGER CARGO CONFIGURATION WITH CARGO ELEVATOR (WITHOUT CREW REST AREA)

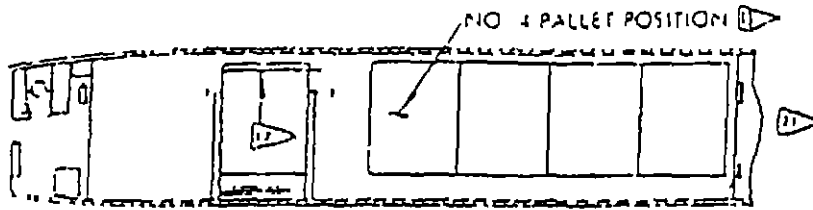
← FWD



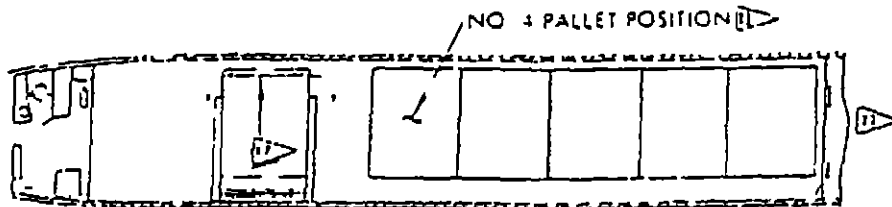
4 PALLET COMBINED PASSENGER CARGO CONFIGURATION WITH CARGO ELEVATOR (WITHOUT CREW REST AREA)

Cabin Accommodation Conversion Configurations
 Figure 2 (Sheet 11)

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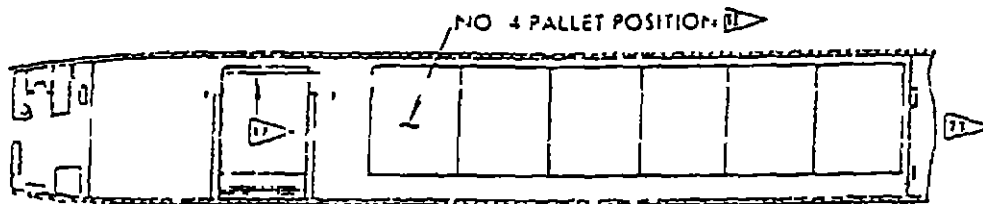


5 PALLET COMBINED PASSENGER/CARGO CONFIGURATION
WITH CARGO ELEVATOR (WITHOUT CREW REST AREA) 11 12 13 14 15

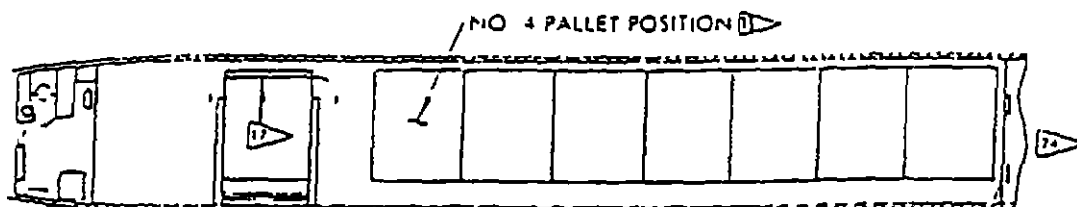


6 PALLET COMBINED PASSENGER/CARGO CONFIGURATION
WITH CARGO ELEVATOR (WITHOUT CREW REST AREA) 11 12 13 14 15 16

← FWD

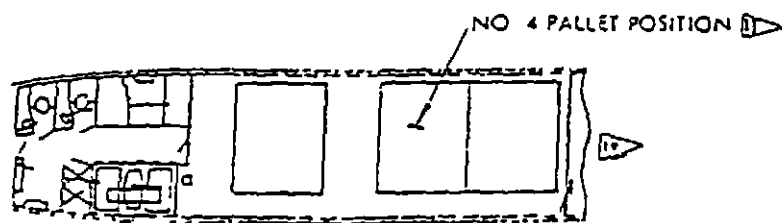
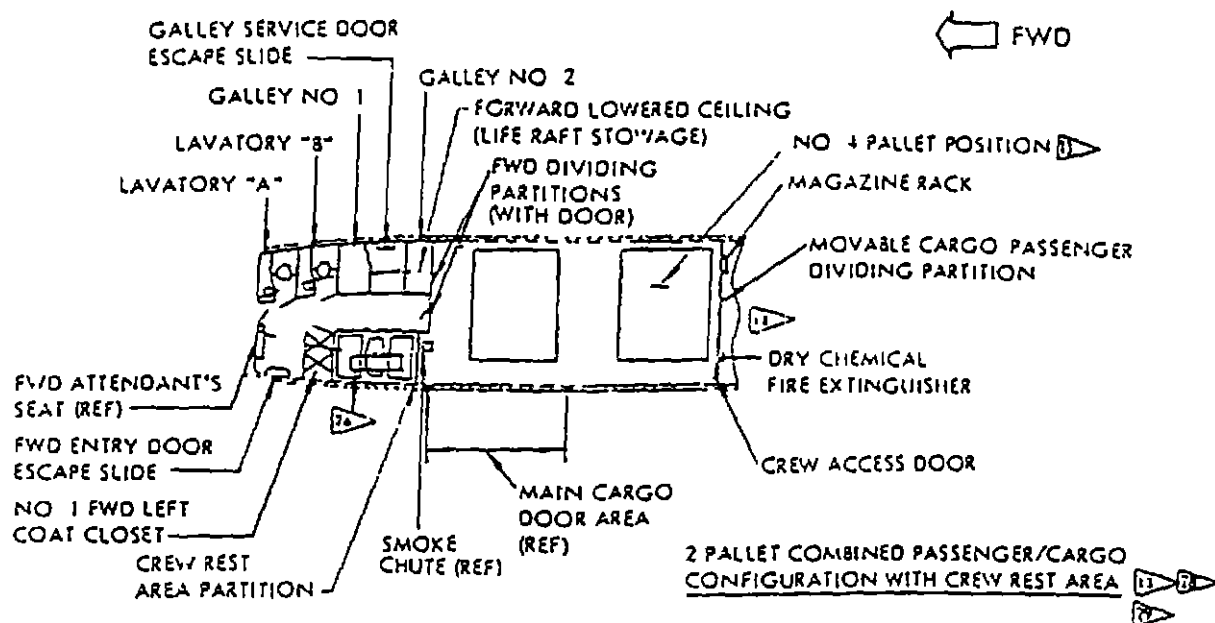


7 PALLET COMBINED PASSENGER/CARGO CONFIGURATION
WITH CARGO ELEVATOR (WITHOUT CREW REST AREA) 11 12 13 14 15 16 17

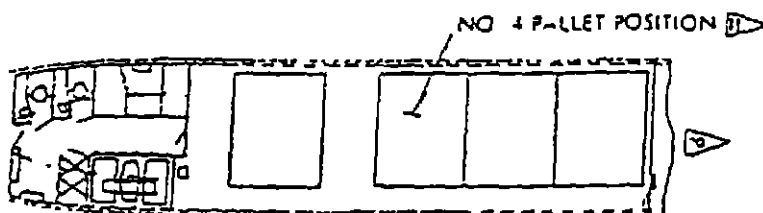


8 PALLET COMBINED PASSENGER/CARGO CONFIGURATION
WITH CARGO ELEVATOR (WITHOUT CREW REST AREA) 11 12 13 14 15 16 17 18

Cabin Accommodation Conversion Configurations
Figure 2 (Sheet 12)



2 PALLET COMBINED PASSENGER/CARGO CONFIGURATION WITH CREW REST AREA

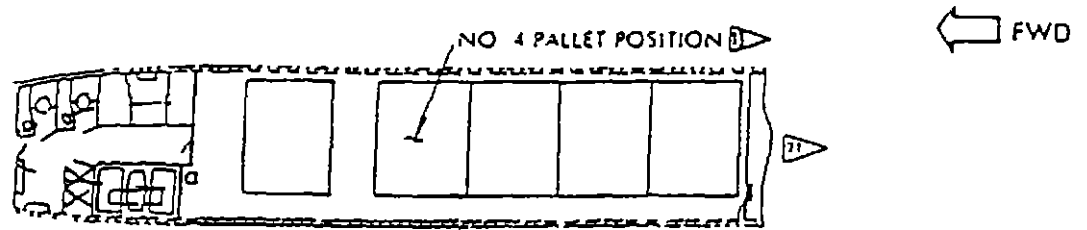


3 PALLET COMBINED PASSENGER/CARGO CONFIGURATION WITH CREW REST AREA

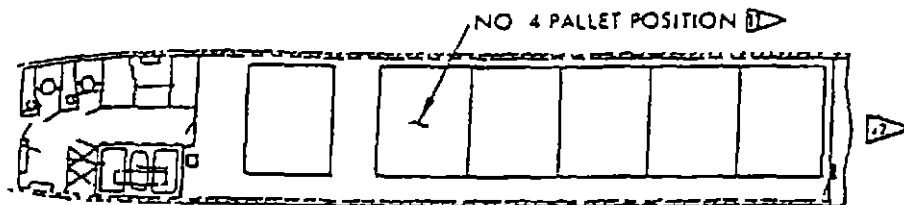


4 PALLET COMBINED PASSENGER/CARGO CONFIGURATION WITH CREW REST AREA

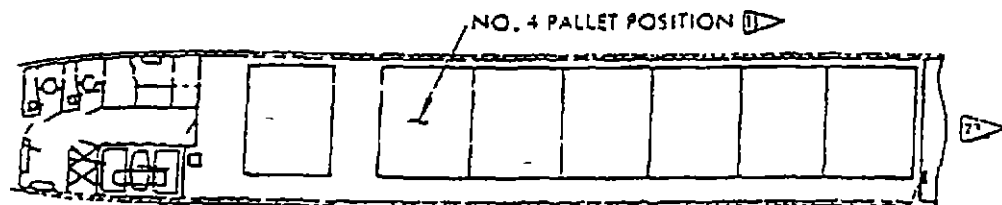
BOEING 707
Intercontinental
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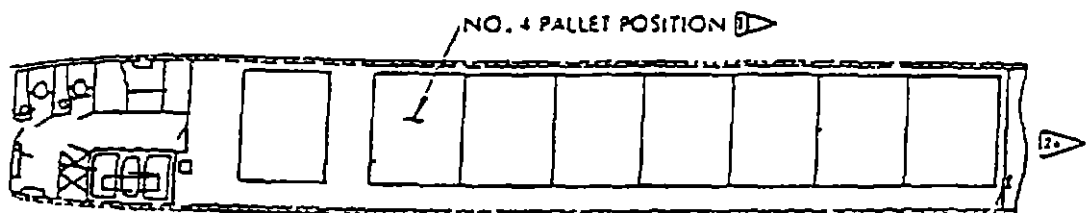
5 PALLET COMBINED PASSENGER/CARGO
 CONFIGURATION WITH CREW REST AREA



6 PALLET COMBINED PASSENGER/CARGO
 CONFIGURATION WITH CREW REST AREA



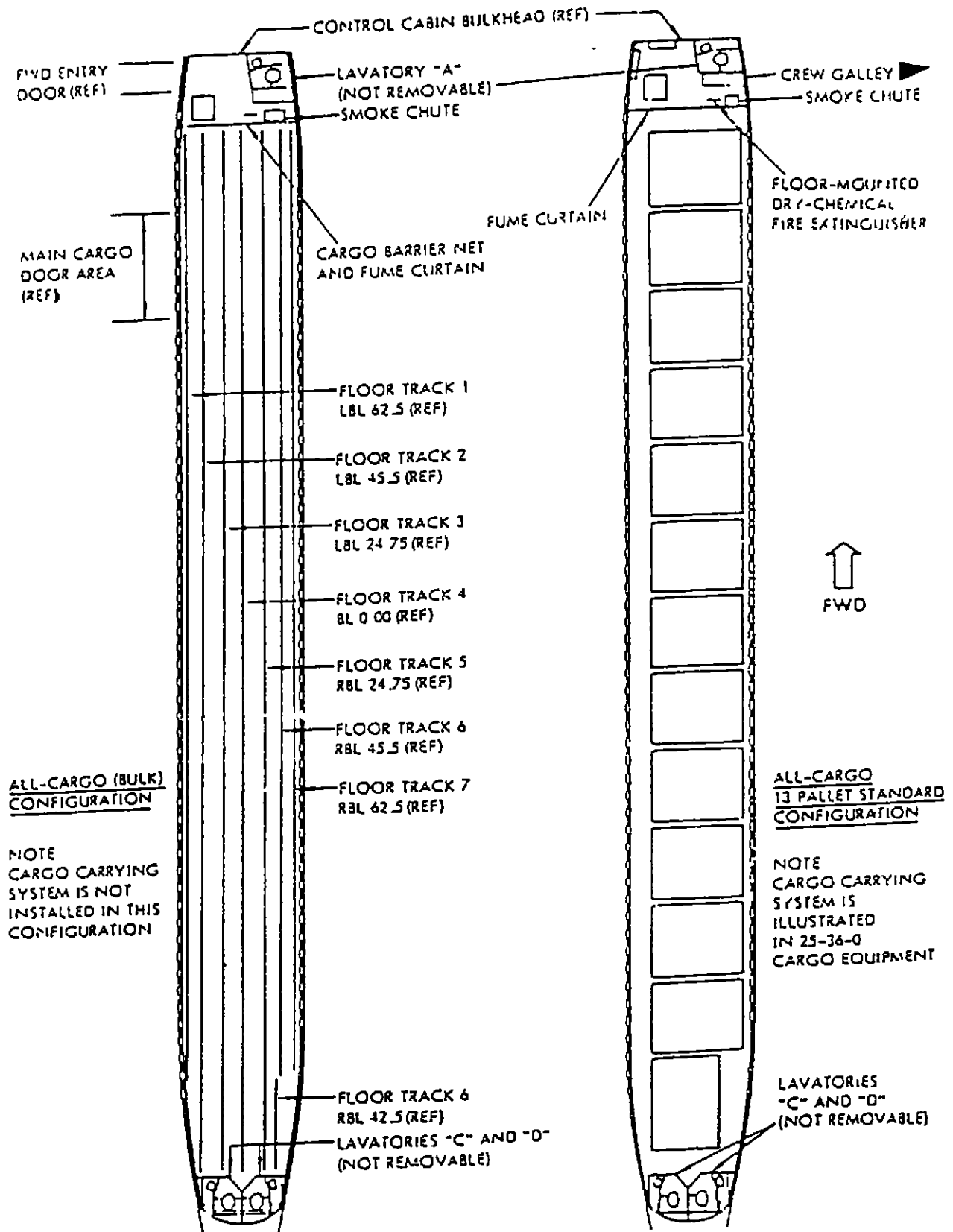
7 PALLET COMBINED PASSENGER/CARGO
 CONFIGURATION WITH CREW REST AREA



8 PALLET COMBINED PASSENGER/CARGO
 CONFIGURATION WITH CREW REST AREA

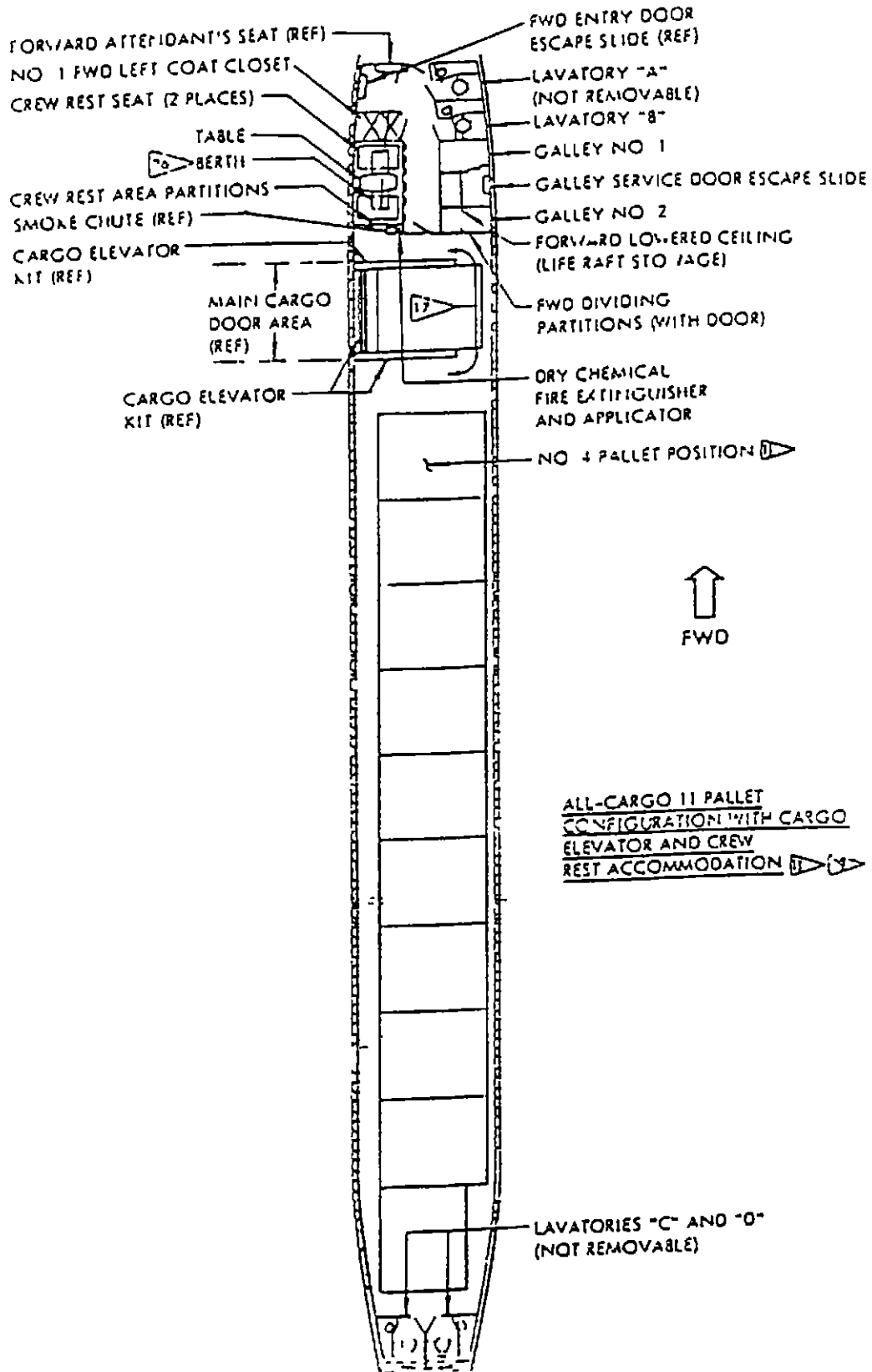
Cabin Accommodation Conversion Configurations
 Figure 2 (Sheet 14)

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Intercontinental
747
MAINTENANCE MANUAL



Cabin Accommodation Conversion Configurations
Figure 2 (Sheet 15)

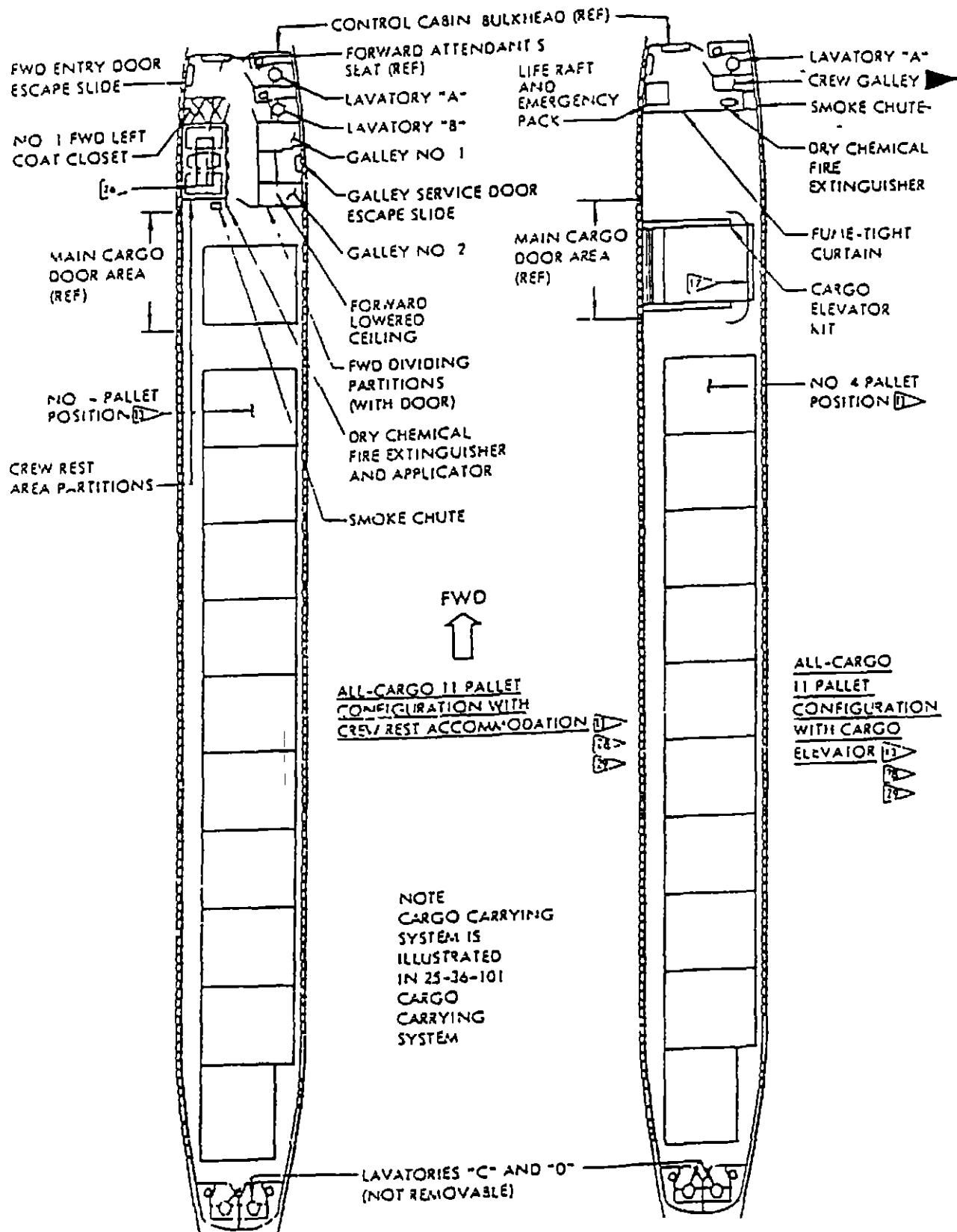
MAINTENANCE MANUAL



Cabin Accommodation Conversion Configurations
Figure 2 (Sheet 16)



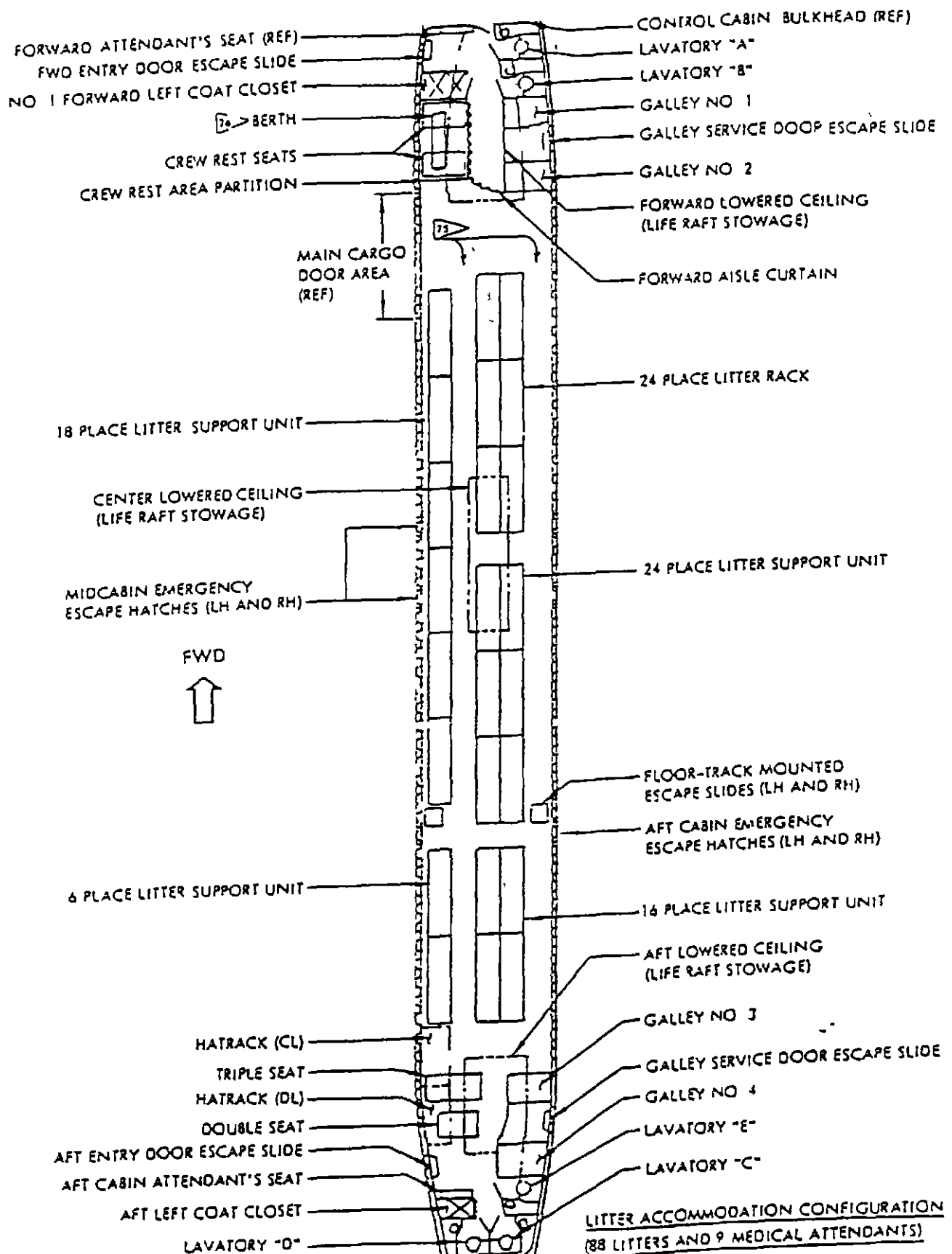
MAINTENANCE MANUAL



Cabin Accommodation Conversion Configurations
Figure 2 (Sheet 17)



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Cabin Accommodation Conversion Configurations
Figure 2 (Sheet 18)



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- E. A door in the movable cargo/passenger dividing partition permits crew access between the aft cabin passenger area and the forward cabin cargo area. The necessity for this access requires that a walkway be provided along the left side of the cabin in the cargo compartment area.

NOTE: When the cargo elevator is installed and a cargo pallet carried in area between the cargo elevator arms, the cargo must allow passage on the right side of the cabin in this area.

- F. In the combined passenger/cargo configurations in which the cargo elevator is installed and with a crew rest area configuration in the forward area of the main cabin, range in cargo capacity is from 3 to 8 pallets, according to the location in which the movable cargo/passenger dividing partition is installed. (See figure 2.)

NOTE: For information on the cargo elevator, refer to 25-36-0, Cargo Equipment.

- (1) The crew rest area is formed by installing (fume-tight) partitions forward of the main cargo door across the cabin aft of galley No. 2.

NOTE: For further information on the crew rest area dividing partitions and coat closet, refer to 25-13-0, Passenger Cabin Partitions and Coat Closets.

- G. In the combined passenger/cargo configurations in which the cargo elevator is installed (and no crew rest area accommodation) the extreme forward end of the main cabin is arranged the same as in the combined passenger/cargo standard configurations. Range in cargo capacity in these configurations is from 2 to 8 pallets, according to the location in which the movable cargo/passenger dividing partition is installed. (See figure 2.)

- H. In the combined passenger/cargo configurations in which the crew rest area accommodation equipment is installed (and the cargo elevator not installed) the arrangement forward of the main cabin cargo door is the same as the combined passenger/cargo configurations with cargo elevator and crew rest area. Range in cargo capacity in these configurations is from 2 to 8 pallets, according to the location in which the movable cargo/passenger dividing partition is installed. (See figure 2.)



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4. All-Cargo Configurations (See figure 2)

A. There are five possible all-cargo configurations

- (1) The all-cargo 13 pallet standard configuration (which is the maximum number of cargo pallets which can be carried) is formed by removing, or stowing in the cargo configuration, all convertible passenger configuration accommodating equipment throughout the length of the main cabin (except lavatories A, C and D) to allow installation of the cargo carrying equipment. In this configuration the extreme forward end of the cabin is separated from the forward end of the cargo compartment by a fume-tight curtain. For information on the cargo carrying equipment and fume-tight curtain, refer to 25-36-0, Cargo Equipment.
- (2) The all-cargo bulk configuration is formed in the same manner as the 13 pallet standard configuration except that the cargo carrying equipment is not installed. Cargo is secured to tiedown fittings attached to the floor tracks.
- (3) The all-cargo 11 pallet configuration with cargo elevator and crew rest accommodation, excludes (or stows in the cargo configuration) all-passenger configuration accommodating equipment aft of the main cargo door area (except lavatories C and D). The cargo carrying equipment is installed throughout this area of the main cabin, and the cargo elevator installed in the main cargo door area. For information on the cargo carrying equipment and cargo elevator refer to 25-36-0, Cargo Equipment.
- (4) The all-cargo 11 pallet configuration with cargo elevator is formed in the same manner as the 13 pallet standard configuration, except that the cargo elevator kit is installed in the main cargo door area.
- (5) The all-cargo 11 pallet configuration with crew rest accommodation (without cargo elevator) is formed in the same manner as the 11 pallet configuration with cargo elevator and crew rest accommodation, except that the cargo elevator is not installed.

5. Litter Accommodation Configuration

- #### A. The litter accommodation configuration consist of 16 free standing litter patient support units installed in the main cabin, and seating accommodation for nine medical attendants.
- (1) This configuration is formed by removing all-passenger accommodation or cargo accommodation equipment (whichever is installed) between the aft end of galley No. 2 and the forward end of galley No. 3, and installing the litter support units by attachment to the floor tracks on the center and left side of the cabin.



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- (2) The medical attendant seating accommodation is provided by a triple and double (passenger) seat in the left side aft cabin area, and two (2 place) seats in the left side forward cabin area.
- (3) If passage for litters through the main cargo door opening is required, the passenger configuration trim and ceiling panels at the cargo door area must be removed (as is required in any cargo carrying configuration).
- (4) All folding hatracks on the left side of the cabin, except the extreme aft two sections, must be removed to allow clearance for installation of the left side litter support units. Hatrack removal on the right side is optional to folding them to the cargo configuration.

6. Passenger Equipment

- A. All the passenger equipment which must be removed when converting to an all-cargo configuration or installed when converting to an all-passenger configuration is located and listed by part or assembly number in 25-15-0, Cabin Accommodation Conversions, Maintenance Practices.
- B. Except for the extreme forward lavatory (A) and the two extreme aft lavatories (C and D), all the passenger equipment of the cabin is designed to be removed or stowed in preparation for conversion to a cargo carrying configuration.
- C. Lavatories B and E are all made as self-contained removable compartment units which consist of four walls and a floor and include the washtub and cabinets. (Refer to 25-18-0, Lavatory Compartments.) The toilet tank of each of these lavatories is not an integral part of the compartment unit, but is removable from its direct attachment to the cabin floor. (Refer to Chapter 38, Water and Waste.) The furnishing of the interior of these lavatories is similar to that of the three nonremovable ones. Each removable lavatory is attached to the cabin floor tracks by four fittings and to the overhead fuselage structure by one sliding bolt. Water, vent, drain and electrical connections are grouped into one box on the fuselage sidewall, the water and drain lines for the washtub being provided with quick disconnect fittings. The drain outlet from the toilet tank engages the conical upper end of the drain line at cabin floor level, and a plate is provided to cover the open end of this drain line when the tank is removed. The cable control leading to the toilet tank drain valve is disconnected and stowed in a covered recess in the cabin floor when the tank is removed.



- D Four galleys (numbered 1 through 4 from forward to aft) are self-contained units consisting of the normal complement of galley equipment contained within a unit including its own floor. (Refer to 5-17-0, Galleys.) Each galley unit is attached to the cabin floor tracks by four fittings and to the upper fuselage structure by two locking pins. The quick disconnect fittings in the water, drain and (where applicable) refrigerant lines are grouped with the electrical connections in a two-compartment box on the sidewall. (The water, drain and refrigerant lines are connected in the lower portion of the box, the electrical connections are in the upper portion.) A fifth galley (No. 5) forward of the aft entry door, is attached to the floor tracks but has no water and power connections. All five galleys are removable for cargo conversion purposes.
- E All partitions and coat closets are removable for conversion purposes and are described in 25-13-0, Passenger Cabin Partitions and Coat Closets.
- F. The cabin floor covering is removable for conversion purposes and is described in 25-10-0, Passenger Cabin Equipment.
- G. The cabin sidewall and cove (described in 25-10-0, Passenger Cabin Equipment) are affected by cabin accommodation conversions at the forward and aft edges of the main cargo door only. The main cargo door has a sidewall, window and cove configuration similar to the cabin, but special trim strips are applied (when in an all-passenger configuration) to cover the gaps between the cabin sidewall panels and cove and the main cargo door sidewall panels and cove. (See figure 3.)
- H. The folding hatracks throughout the cabin may be folded and stowed against the cabin sidewall or removed when converting the cabin to carry cargo. Short fixed hatracks at the forward and aft ends of the main cargo door must be removed when converting to any cargo carrying configuration. All the hatracks are described in 25-10-0, Passenger Cabin Equipment.
- I The ceiling components which must be removed for some or all of the cabin conversions consist of the forward, center and aft lowered ceilings, and two ceiling panels above the main cargo door prior to activation of the main cargo door. (See figure 3.) All these components are described in 25-10-0, Passenger Cabin Equipment.

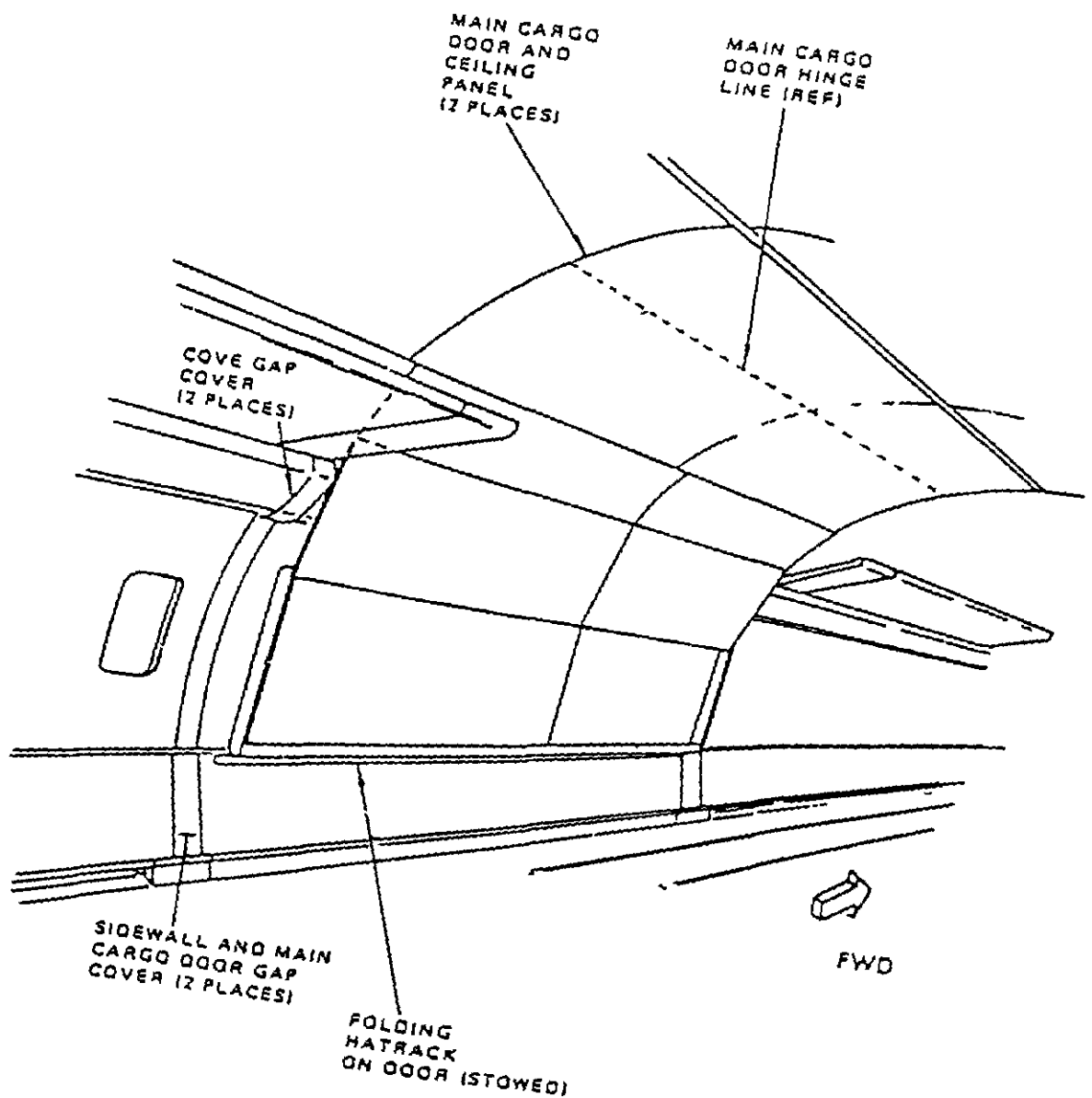


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- J VIP passenger configuration accommodation equipment in the extreme forward cabin area and the cabin area aft of the midcabin emergency escape hatches, is the same as installed in the 176 all-passenger configuration. The VIP passenger particular equipment is located between the area just forward of the main cargo door and the midcabin emergency escape hatches.
- (1) This equipment consists of dividing partitions installed at the aft end of the VIP compartment, a coat closet installed aft of the forward crew rest area compartment, eight double seats, two tables, and two berthable divans.
 - (2) The forward end of the VIP compartment is divided from the forward cabin area by the forward dividing partitions, which are part of the crew rest area accommodation equipment
 - (3) For information on the VIP aft dividing partitions, the forward dividing partitions and coat closet, refer to 25-13-0, Passenger Cabin Partitions and Coat Closets.
 - (4) For information on the VIP seats, divans, and tables, refer to 25-11-0, Passenger Seats

7. Crew Rest Area Accommodation Equipment

- A. Crew rest area accommodation equipment is installed in the all-passenger configuration, the VIP passenger configuration, and some of the combined passenger/cargo configurations. Equipment used to form the rest area compartment in each of these configurations varies in arrangement and location, but is the same equipment. (See figure 2.)
- B. Crew rest area accommodation equipment is also used to form the forward medical attendant rest area in the litter accommodation configuration (See figure 2)
- C. All partitions, seats, coat closet equipment and the overhead berth, are removable for conversion purposes.
- (1) Partitions and coat closet equipment is described in 25-13-0, Passenger Cabin Partitions and Coat Closets.
 - (2) The berth is described in 25-10-0, Passenger Cabin Equipment.
 - (3) The seats and table are described in 25-11-0, Passenger Seats.

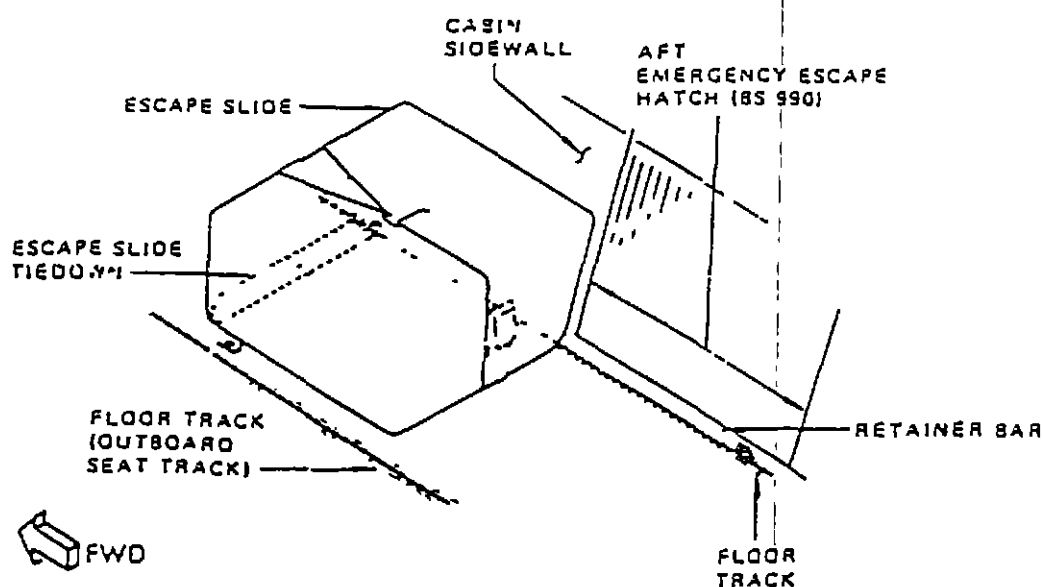




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Emergency Equipment

- A. The emergency equipment is described in 25-1-0, Emergency Equipment. Many items, however, are removed and/or relocated when the cabin is converted.
- B. Provisions for emergency escape from the airplane consists of the forward and aft entry doors, the galley service doors and three pairs of emergency escape hatches. Escape slide provisions are made for entry doors, for the galley service doors, and for the aft pair of emergency escape hatches.
 - (1) The escape slides for the forward and aft entry doors and the galley service doors are door-mounted. The escape slide floor brackets for the aft entry door and both galley service doors are removed and the aft doormats lifted when the cabin is converted to an all-cargo configuration. In all other configurations the aft entry door and aft galley service door escape slides remain usable. The forward entry door escape slide is usable in all configurations. The forward galley service door escape slide is usable only in the all-passenger configurations.
 - (2) The aft pair of emergency escape hatches provide an opening to floor level. When the aft pair of emergency escape hatches are activated, their location aft of the wing area necessitates the provision of a special escape slide stowage for each hatch. Each of these escape slide stowages is attached to the two most outboard floor tracks immediately forward of the hatch. (See figure 4.)



(RH INSTALLATION SHOWN TYPICAL FOR LH)

Floor-Mounted Escape Slide

Figure 4



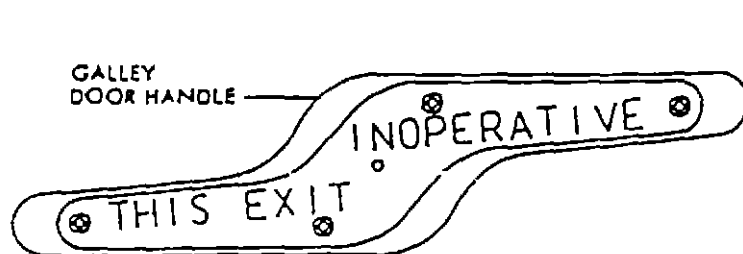
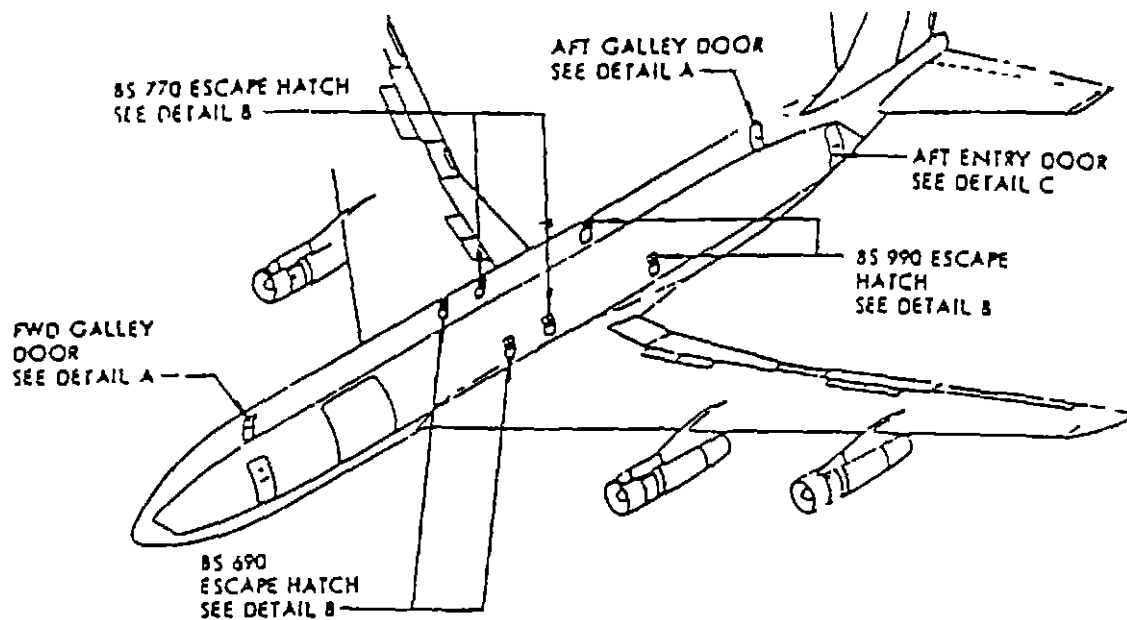
C. Exterior Door and Hatch Placards

- (1) Placards are provided for marking the exteriors of inoperative exits. In any configuration, when an entry door, galley door or escape hatch is deactivated, a placard must be installed on the outside handle indicating that the exit is inoperative. The galley doors and aft entry door placards are attached to the external door handles with four Phillips head screws. The emergency exit hatch placards are attached with two Phillips head screws. The screws should be reinstalled in the handles when the placards are removed. (See figure 5.)

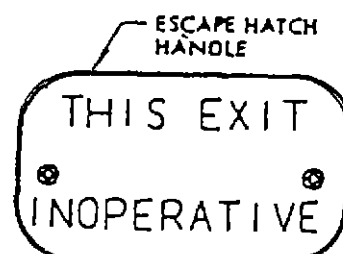
D. Life Rafts and Life Vests

- (1) The passenger life rafts are stowed in the lowered ceiling compartments: two forward, four in the center, and two aft. The lowered ceiling compartments are easily removable (as described in 25-10-0, Passenger Cabin Equipment) for conversion between various passenger and cargo configurations. The center lowered ceiling compartment can be installed in two alternative locations: its forward location is approximately opposite the two forward pairs of escape hatches and its aft location is approximately opposite the pair of escape hatches at BS 990.
- (2) The forward lowered ceiling compartment is removed in any cargo configuration, and the aft lowered ceiling compartment removed only when converting to either all-cargo configuration.
- (3) The center lowered ceiling compartment is moved from its forward location (as located in the all-passenger configurations) to its aft location whenever the movable cargo/passenger dividing partition is to be installed in the area occupied by the compartment. When the movable cargo/passenger dividing partition is to be installed in the area of the center lowered ceiling compartment's aft location, the compartment is completely removed from the cabin.
- (4) In any all-cargo configuration and the combined passenger/cargo configuration, when crew rest accommodation equipment is not installed in the forward cabin area, one (25 man) life raft and emergency pack assembly is attached to the floor tracks immediately aft of the forward entry door. The webbing straps which secure the assembly to the floor tracks are provided with quick-release buckles to allow the life raft and emergency pack to be easily separated and activated.
- (5) In addition to the permanent life vest stowage in the passenger cabin, as covered in 25-1-0, Emergency Equipment, spare life vest stowage is provided above the shelf in the extreme aft coat closet, which is removed from the airplane in any all-cargo configuration.

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DETAIL A



DETAIL B



DETAIL C

Exterior Door and Hatch Placard Installation
 Figure 5



E Fire Extinguishers

- (1) The following portable fire extinguishers are installed in the cabin in certain configurations of accommodation.
 - (a) Two carbon dioxide fire extinguishers are mounted on the forward face of lavatory D (inside the No. 2 aft left coat closet) in all the passenger carrying configurations. This extinguisher is for use on electrical fires.
 - (b) A carbon dioxide type fire extinguisher is also mounted on the right side folding-hatrack immediately aft of the forward midcabin emergency escape hatch in the all-passenger configurations, and in the combined passenger/cargo configurations when the movable cargo/passenger dividing partition is installed forward of the hatrack.
 - (c) A floor-mounted dry-chemical type fire extinguisher is installed in the forward cabin area in any cargo configuration without crew rest accommodation. The extinguisher is secured by a quick-release clamp to a baseplate, which is locked to the cabin floor tracks. Six feet of hose are integral with this extinguisher and a long rigid extension, or applicator, is stowed on the berth area cabin side-wall protective panels. This extinguisher is used by releasing it from the floor and connecting the applicator to its hose. In this condition it can be applied to a fire of any kind in any portion of the cargo compartment.
 - (d) In any cargo configuration in which the crew rest accommodation equipment is installed in the forward cabin area, a dry-chemical type fire extinguisher and extension applicator is installed on the aft face of the short (fore and aft) crew rest area partition.
 - (e) A dry-chemical type fire extinguisher is installed on the movable passenger/cargo dividing partition when installed in the combined passenger/cargo configurations. This extinguisher is for use on fires of any kind.
- (2) After use of a chemical fire extinguisher all residue, although it has no deleterious effects except for slight stripping and staining of zinc chromate primer, should be cleaned up with a vacuum cleaner or damp cloth.



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F Oxygen Bottles

- (1) In either of the all-passenger configurations portable oxygen bottles are mounted on top of the folding hatracks along both sides of the cabin and are distributed to be accessible at various intervals along the cabin.
- (2) When the hatracks in the forward part of the cabin are folded down or removed to convert that portion of the cabin into the cargo compartment, the oxygen bottles installed on these sections of hatrack must be removed. The bottles displaced, are moved aft of the movable cargo/passenger partition and installed above the hatracks in the passenger cabin. Spare receptacles are provided for this purpose. In any of the all-cargo configurations or any of the combined passenger/cargo configurations, when there are no hatracks available to accommodate the oxygen bottles, they may be installed to receptacles provided on the forward face of lavatory D at the extreme aft end of the cabin.
- (3) In any cargo configuration with crew rest accommodation equipment installed in the forward cabin area, or the litter configuration, one of the portable oxygen bottles (removed from folded hatracks) is installed on the inboard forward lower face (footwell section) of the crew rest area aft partition.
- (4) In any cargo configuration without crew rest accommodation equipment installed in the forward cabin area, one of the portable oxygen bottles (removed from folded hatracks) is installed on the aft face of lavatory A or (if installed) crew galley.

9. Litter Equipment

- A. The litter equipment which must be installed when converting to the litter accommodation configuration (or removed when converting from this configuration) consists of 16 free standing litter support units. These units are attached to the center and left side pairs of floor tracks. For further information on the litter support units, refer to 25-11-0, Passenger Seats.

10. Cargo Equipment

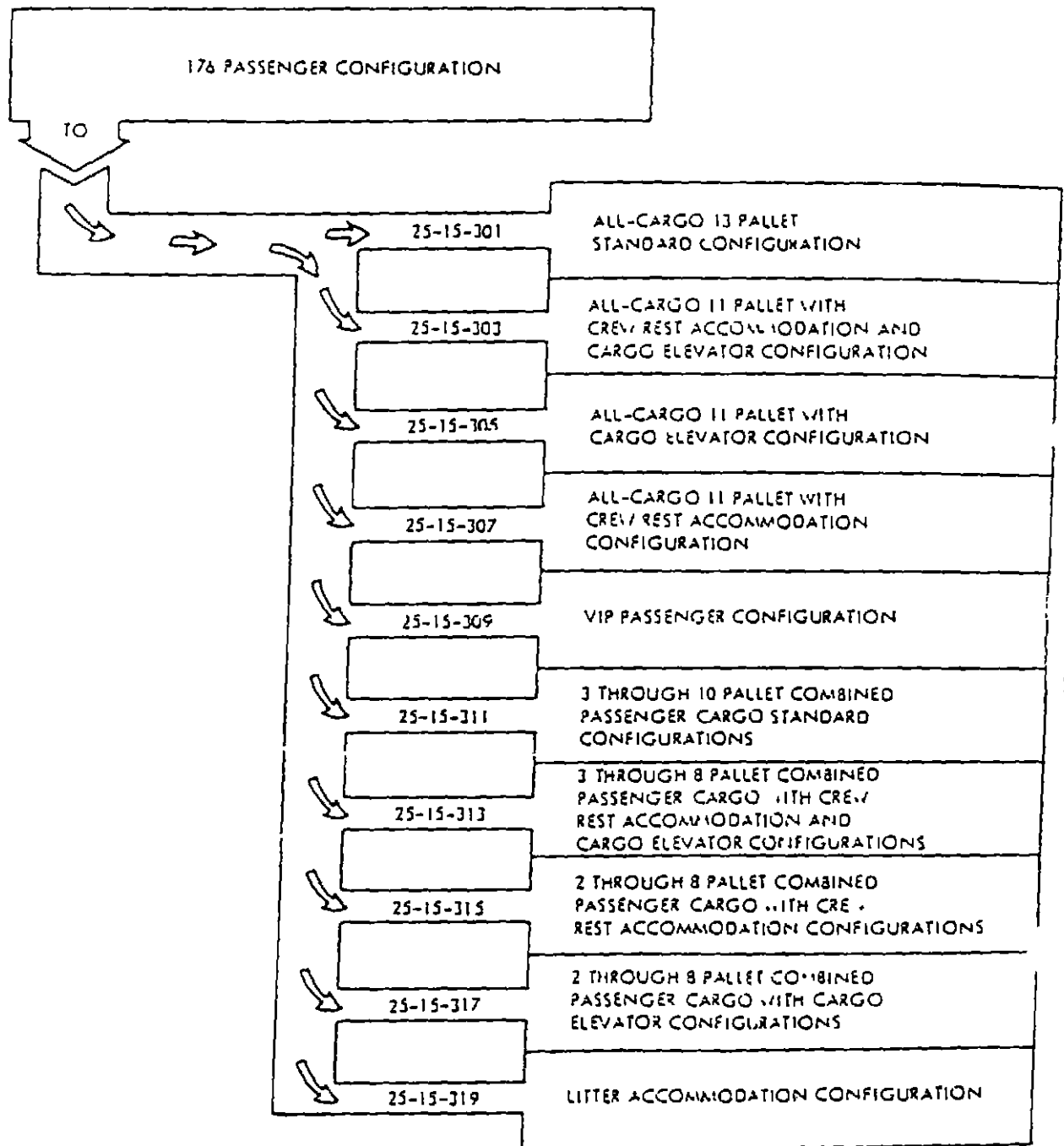
- A. The cargo equipment consists of equipment which must be installed or activated in the cabin before cargo may be loaded and carried, and the cargo elevator kit. This equipment is described in 25-36-0, Cargo Equipment.



CABIN ACCOMMODATION CONVERSIONS - MAINTENANCE PRACTICES

1 General

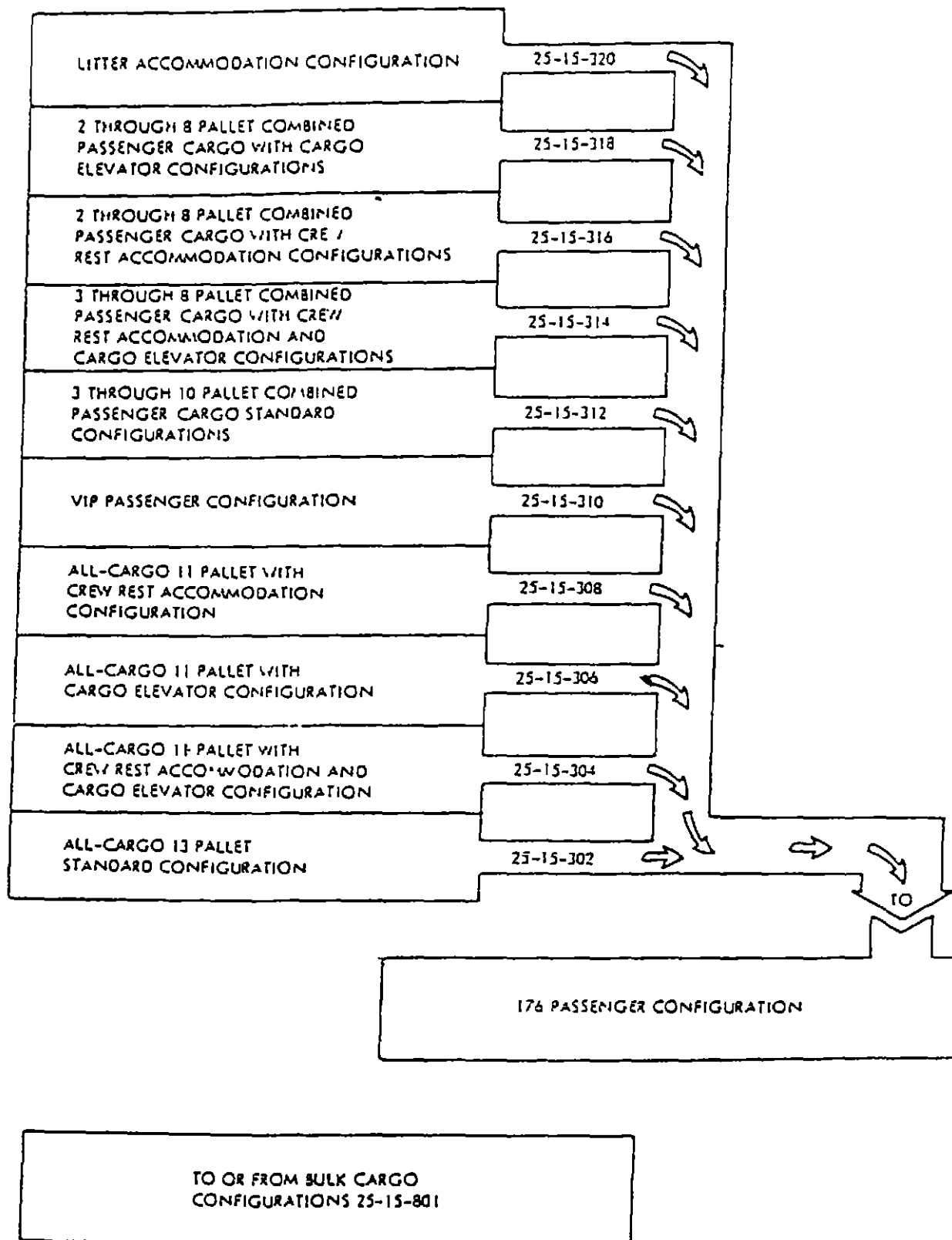
- A This section provides general information and instructions relative to performance of converting the main cabin from any one accommodation configuration to any other accommodation configuration. This information is divided by subject major paragraphs as follows:
2. Passenger Accommodation Conversion Equipment
 3. Cargo Accommodation Conversion Equipment
 4. Litter Accommodation Conversion Equipment
 - 4A. Floor Covering
 5. Seating and Berth Accommodation Equipment
 6. Hatch and Related Conversion Equipment
 7. General Conversion Operations
 8. Preconversion Requirements
 9. Postconversion Requirement
 10. Conversion Options
 11. Litter Configuration Conversion Operations/Requirements
 12. Equipment Removal/Installation
- B Illustrations to clarify equipment arrangement, location, and configuration installation or removal requirement, supported by part numbered lists, are also included in this section.
- C Step by step procedure conversion instructions from one configuration to any other, or from one of any series of configurations to one of any other series of configurations, are contained in other applicable sections (See figure 201.)



Conversion Index Chart
 Figure 201 (Sheet 1)

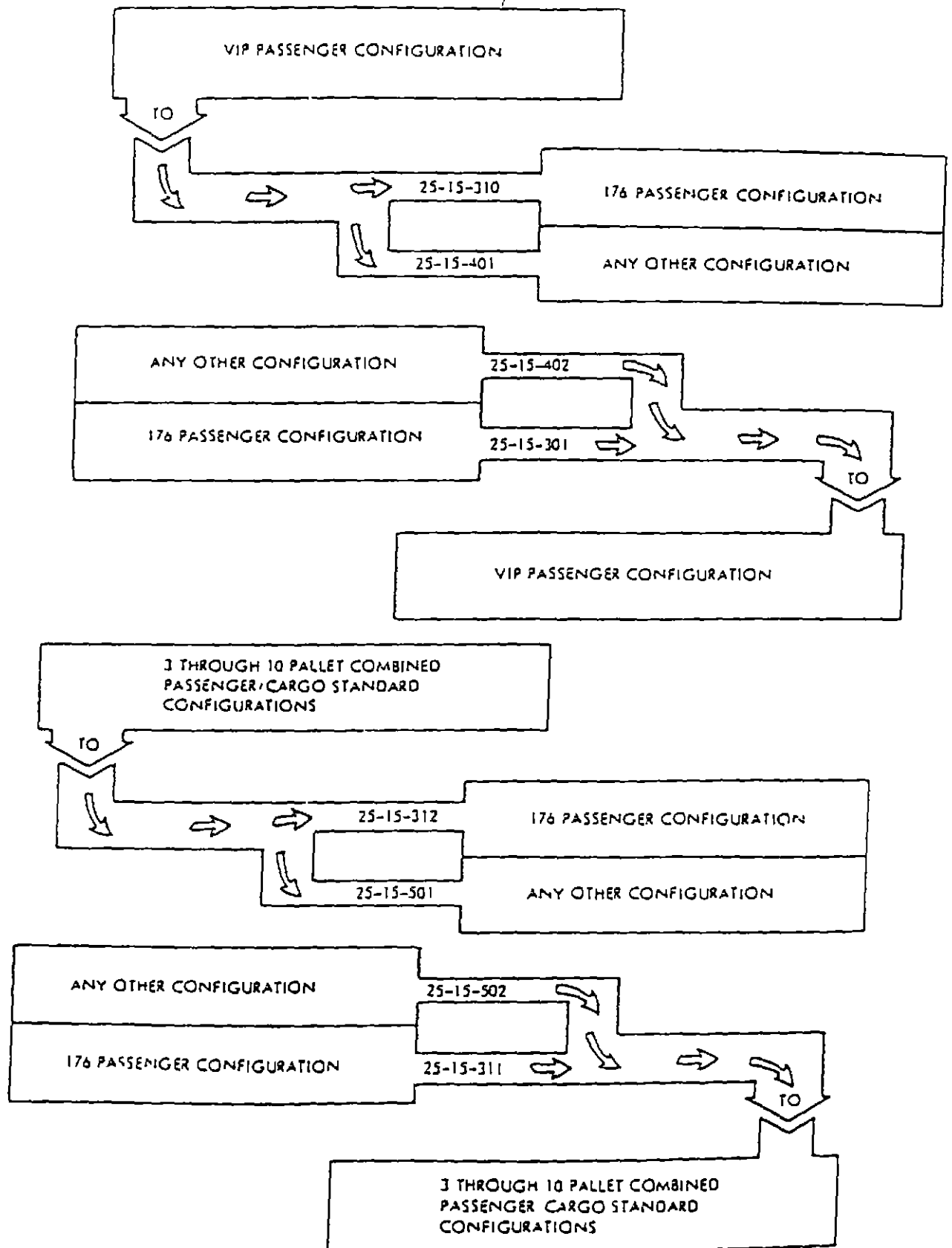
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Conversion Index Chart
Figure 201 (Sheet 2)

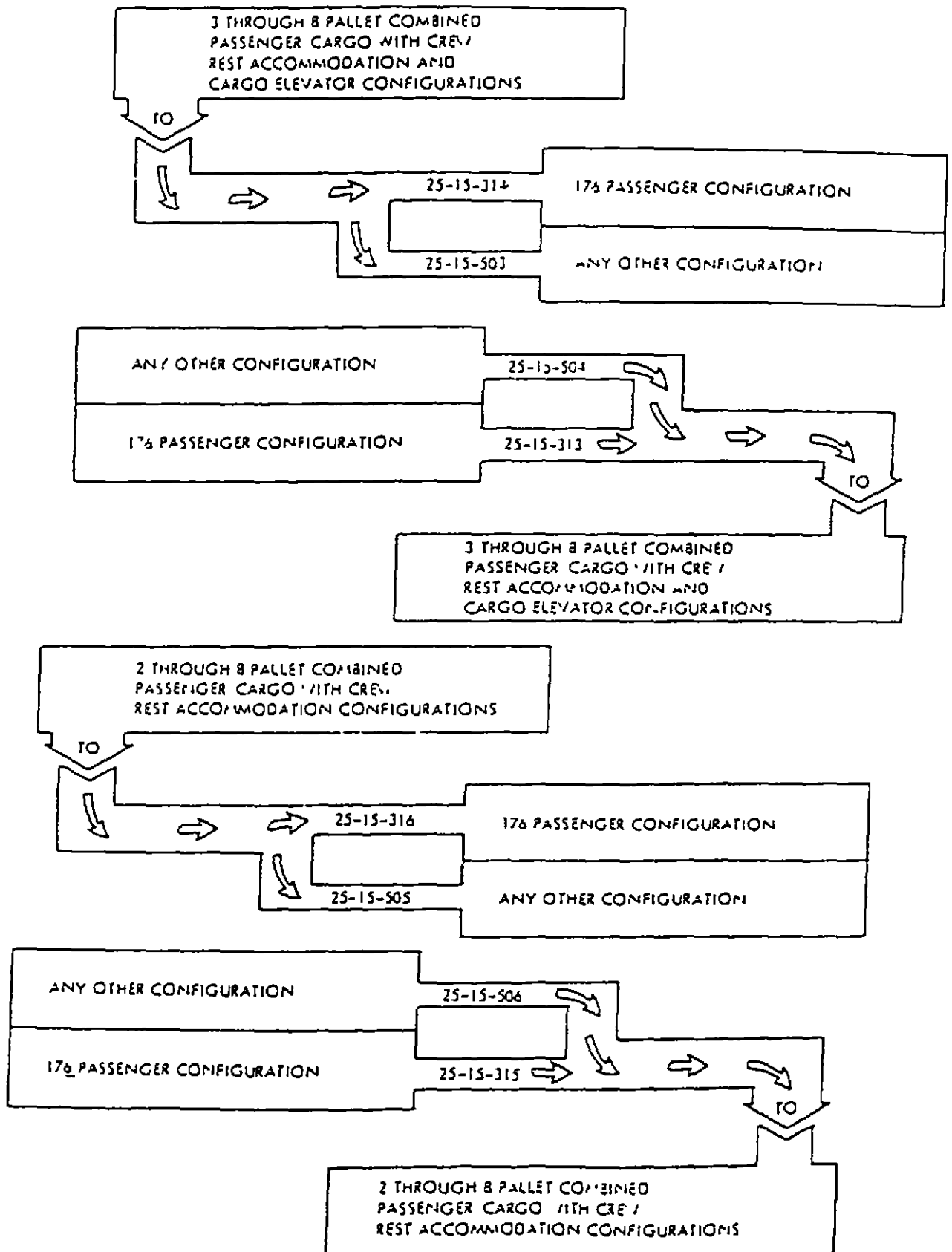
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Conversion Index Chart
Figure 201 (Sheet 3)

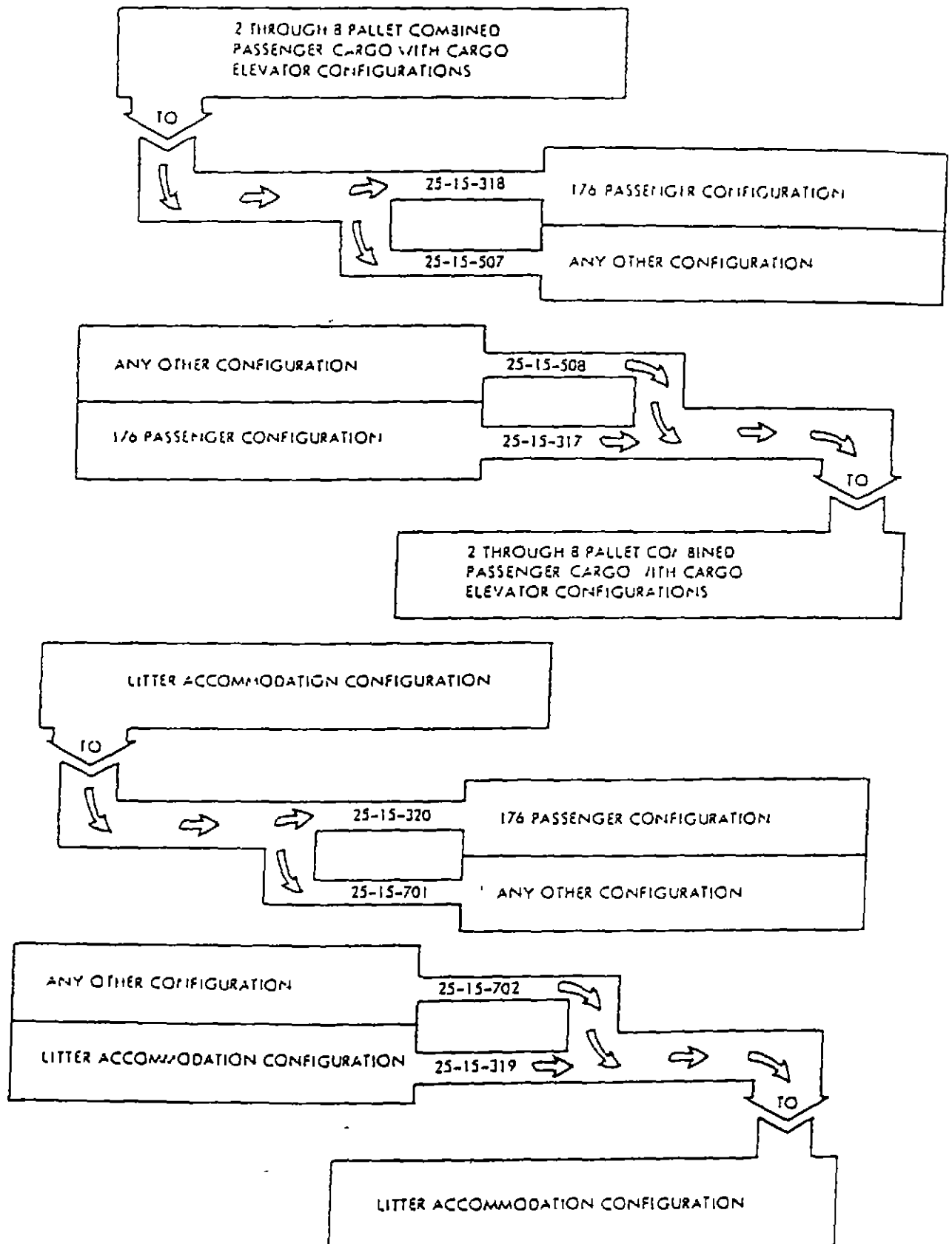


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Conversion Index Chart
Figure 201 (Sheet 4)

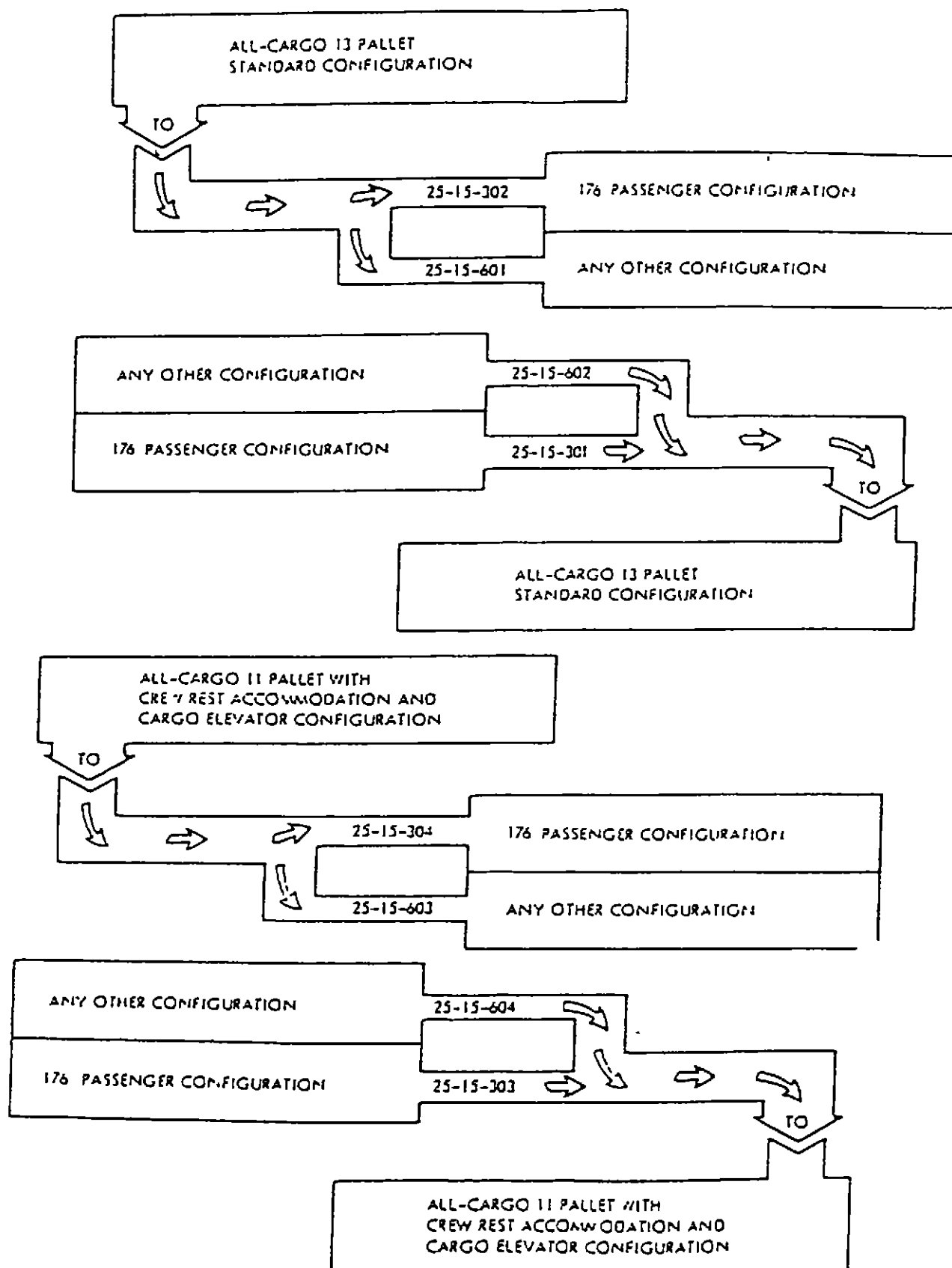
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Conversion Index Chart
Figure 201 (Sheet 5)

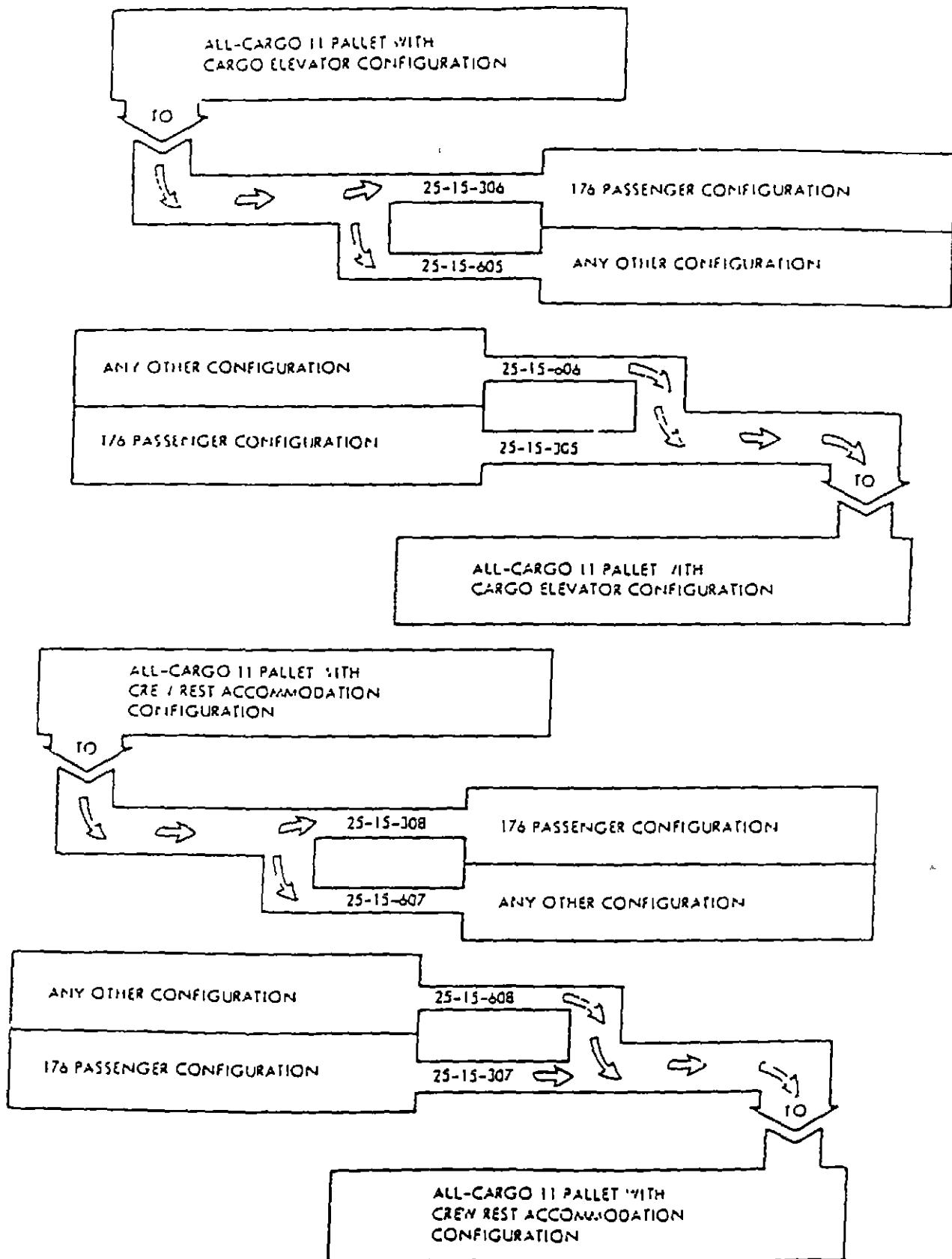


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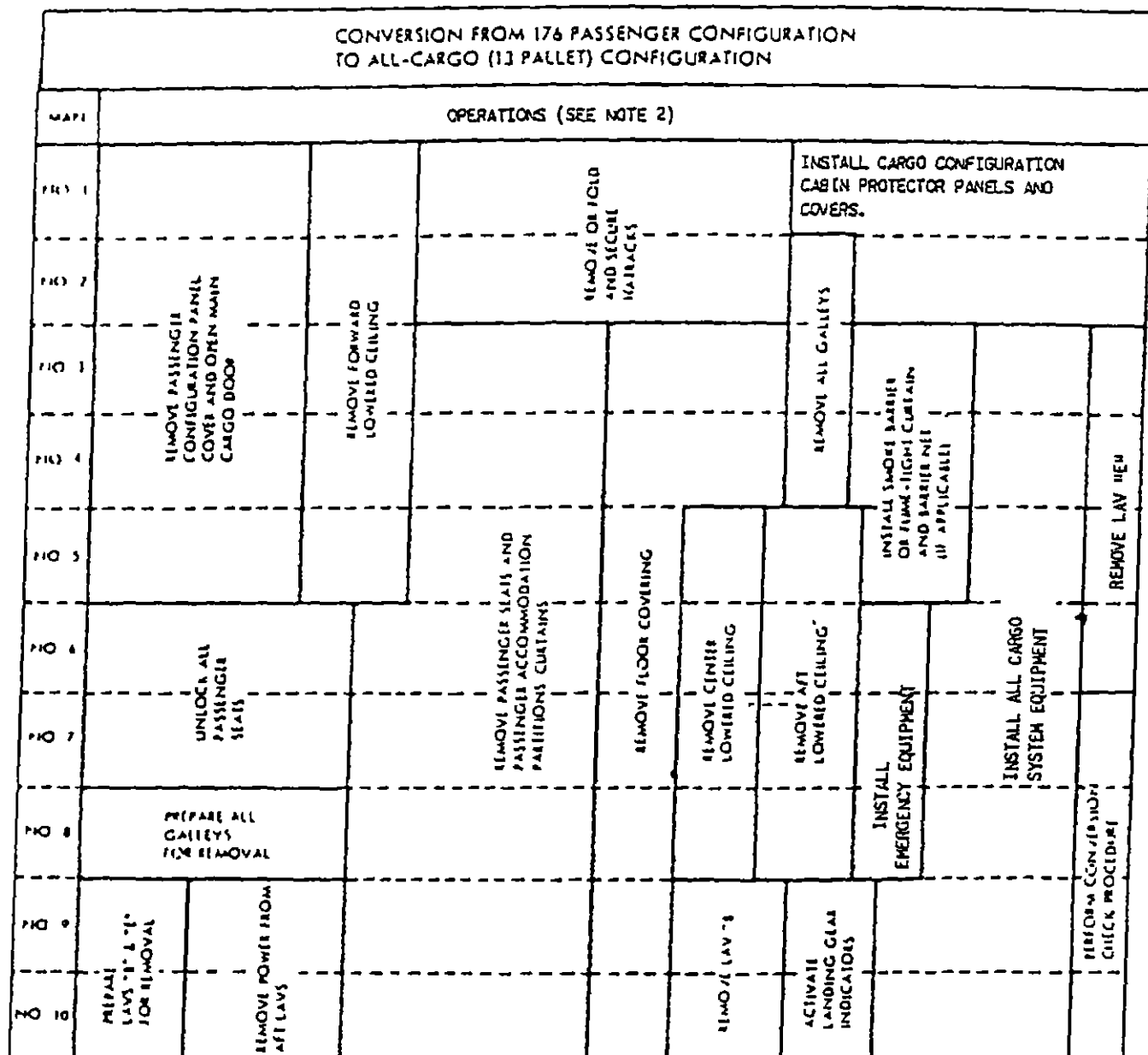
Conversion Index Chart
Figure 201 (Sheet 6)

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Conversion Index Chart
Figure 201 (Sheet 7)

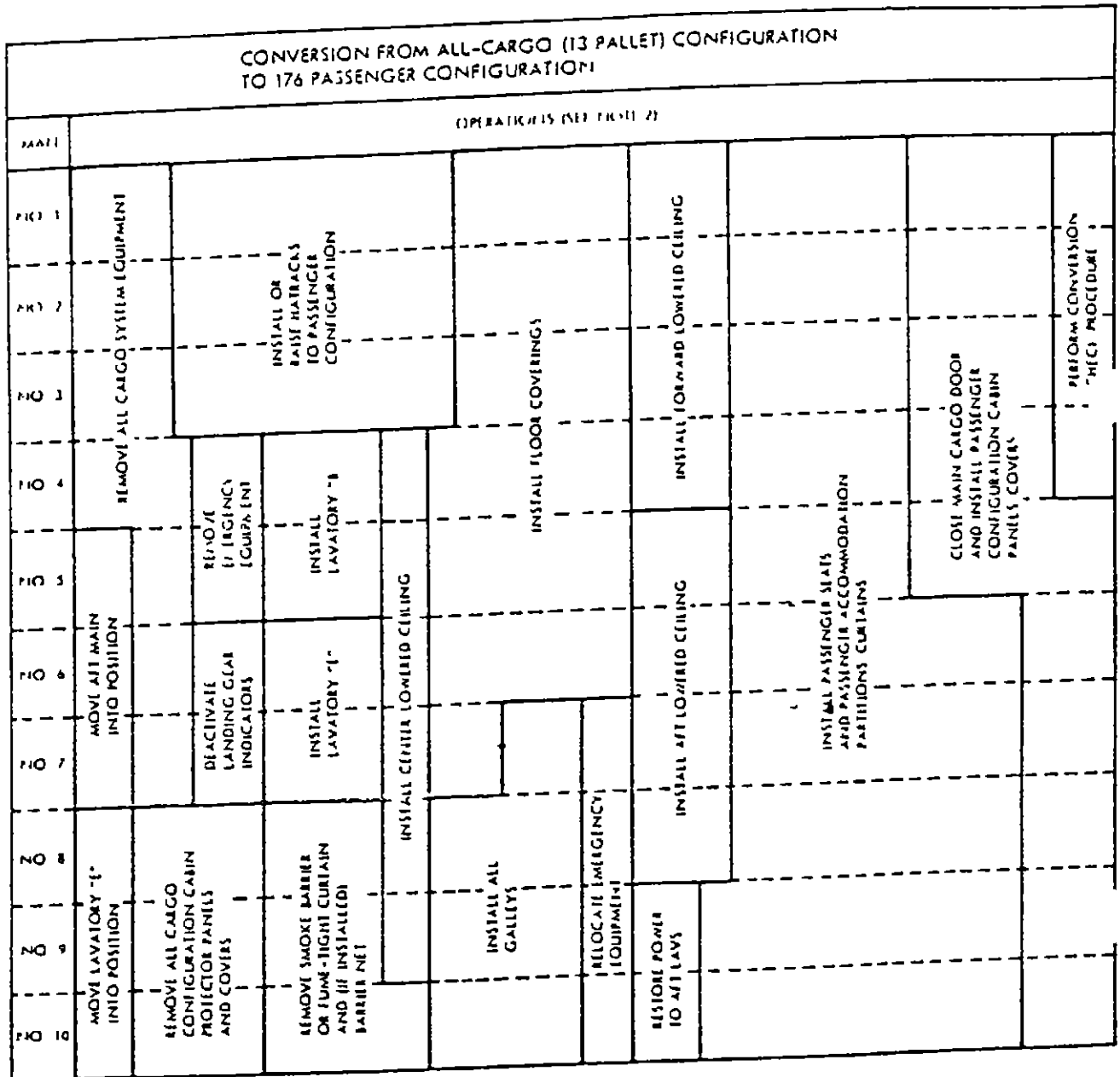
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- NOTE: 1. This chart does not represent a recommended sequence of procedures, but merely illustrates approximately how this conversion could be organized among a crew of ten men.
2. The time (horizontal) dimensions is not to any scale, being intended to show only approximate proportions of time.

Conversion Operation Organization Chart
Figure 202 (Sheet 1)

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NOTE: THIS CHART DOES NOT REPRESENT A RECOMMENDED SEQUENCE OF PROCEDURES BUT MERELY ILLUSTRATES APPROXIMATELY HOW THIS CONVERSION COULD BE ORGANIZED AMONG A CREW OF TEN MEN.

7 THE TIME (HORIZONTAL) DIMENSION IS NOT TO ANY SCALE BEING INTENDED TO SHOW ONLY APPROXIMATE PROPORTIONS OF TIME

Conversion Operation Organization Chart
Figure 202 (Sheet 2)

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D The conversion step by step instructions (as contained in following sections) are listed individually in the order in which they should be completed by a small crew, completing one operation at a time. Recognizing, however that a larger crew could be employed to enable many operations concurrently, figure 202 shows suggested conversion operation organization charts (based on the 176 passenger and all-cargo 13 pallet standard configurations) by which main groups of conversion operations may be divided among a ten man crew. The charts are intended only as suggested aids in planning conversion operations, there is no significance in the choice of ten as the size of crew which may be employed

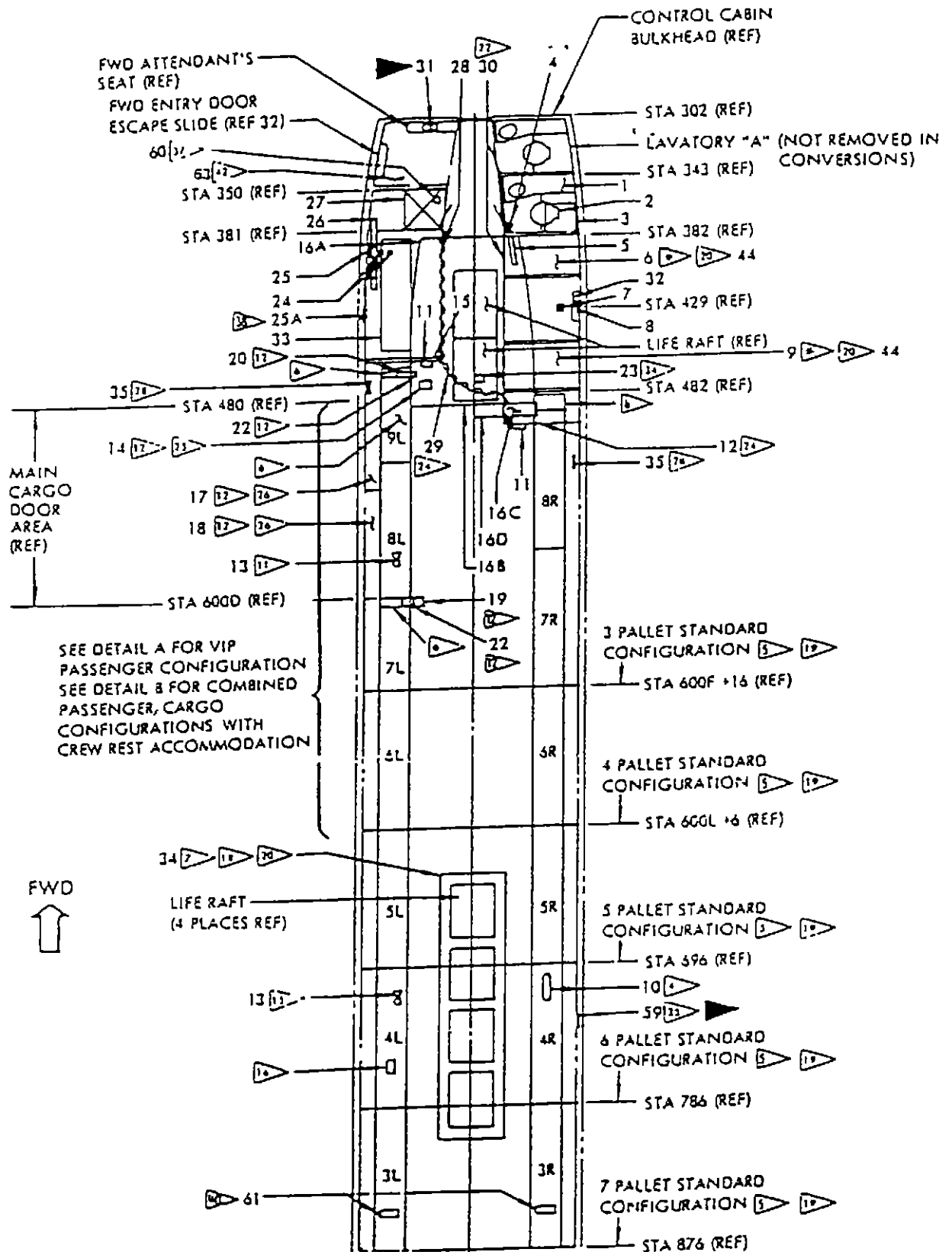
E. This section does not cover information on the loading, removal or securing of the cargo pallets or cargo. This information is contained in the Weight and Balance Control and Loading Manual

7. Passenger Accommodation Conversion Equipment

- A Passenger accommodation conversion equipment consists of equipment installed in the main cabin in all-passenger configurations or combined passenger/cargo configurations, which requires removal or conversion when any portion of the main cabin is required to accommodate cargo, or which requires installation or conversion when any cargo accommodation area is to be converted for passenger accommodation. This equipment, in addition to passenger seats, galleys, lavatories and partitions (to form coat closets and compartments) includes hatracks, ceiling panels, lowered ceiling compartments, sidewall coves, berth equipment, emergency equipment, and trim covers.
- B Figure 203 (Passenger Accommodation Conversion Equipment) shows the location and lists the assembly and/or part number of all-passenger accommodation equipment and describes any particular passenger configuration in which the equipment is installed.

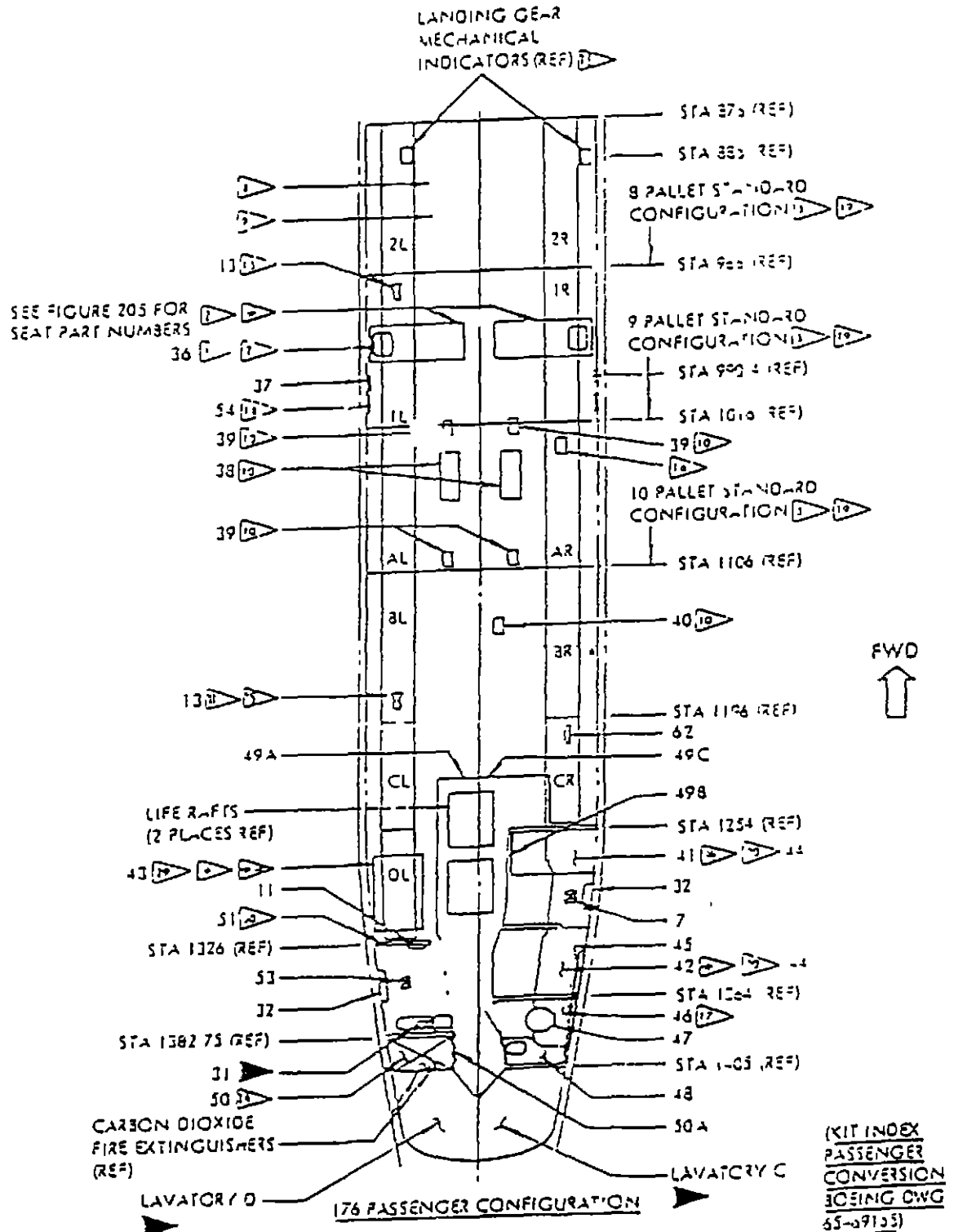
NOTE. Figure 203 does not list floor coverings, seats or hatracks. For floor covering installation identification, see figure 2064. Seats are listed in figure 206 and hatracks listed in figure 207

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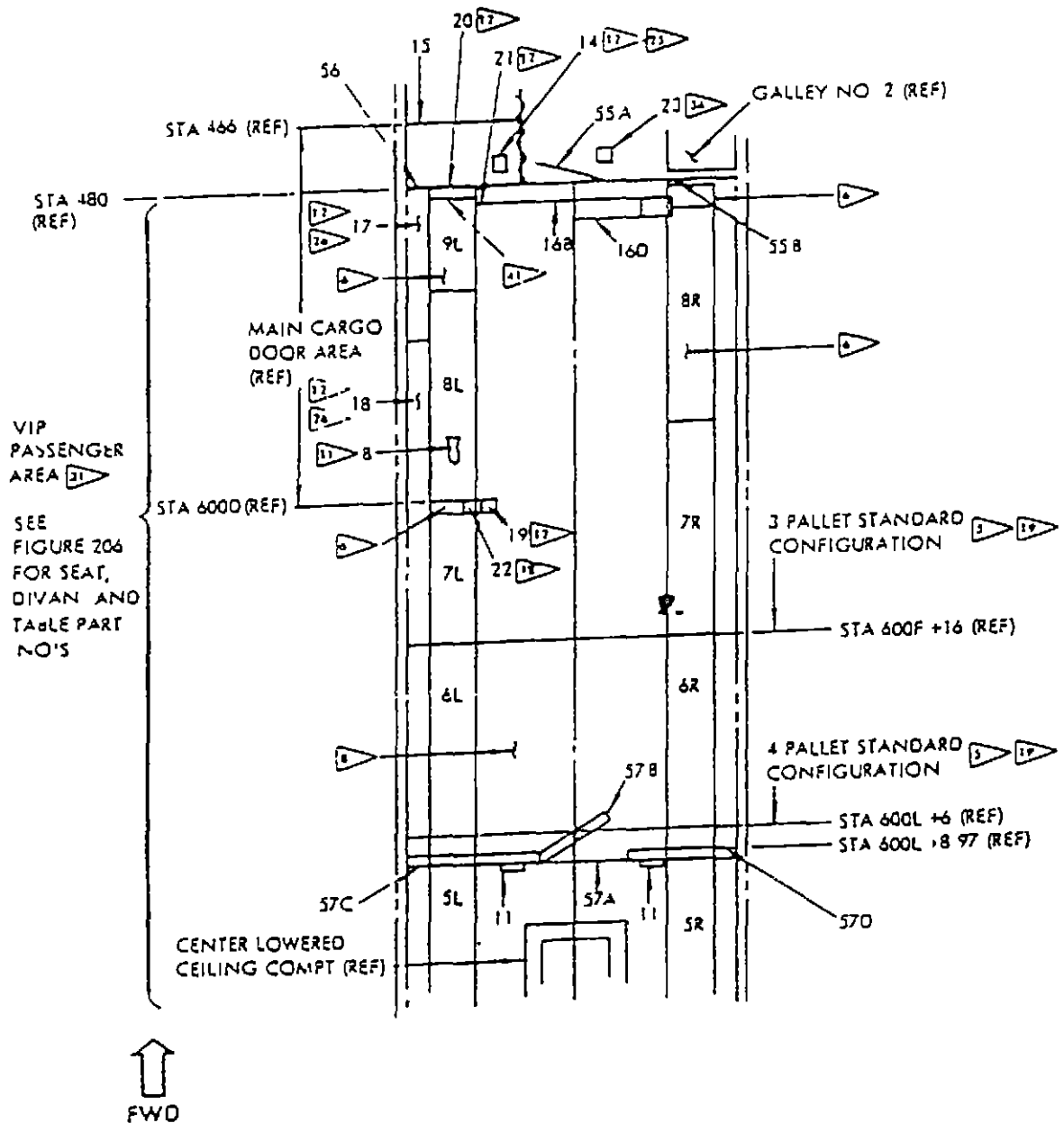
Passenger Accommodation Conversion Equipment
Figure 203 (Sheet 1)

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Passenger Accommodation Conversion Equipment
Figure 203 (Sheet 2)

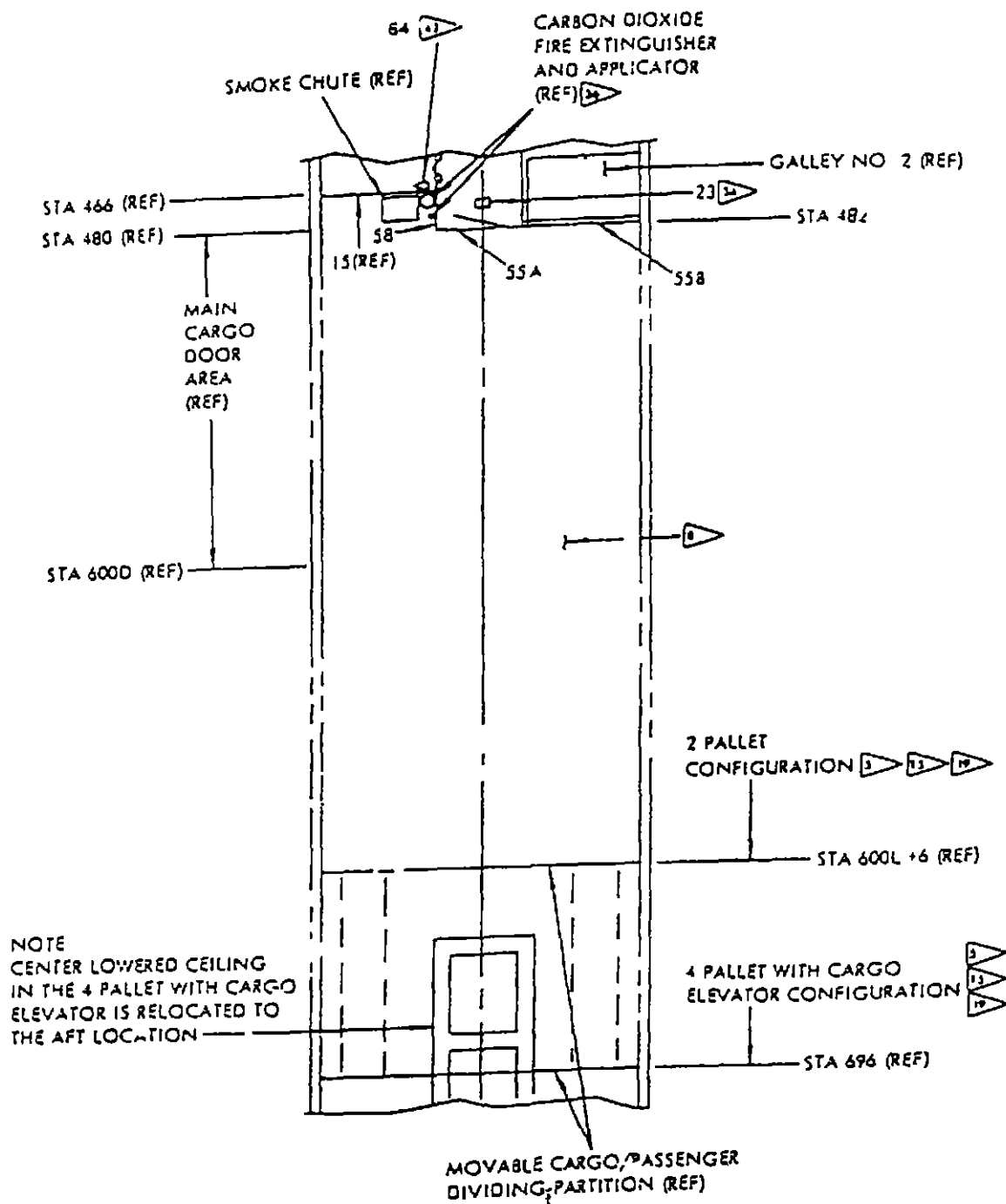
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VIP PASSENGER CONFIGURATION 
DETAIL A

Passenger Accommodation Conversion Equipment
Figure 203 (Sheet 3)

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COMBINED PASSENGER/CARGO WITH CREW
REST ACCOMMODATION CONFIGURATIONS

DETAIL 8

Passenger Accommodation Conversion Equipment
Figure 203 (Sheet 4)

25-15-200
Page 215



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NOTE 1 FOR ALL CARGO CONFIGURATION, SEE FIGURE 204

NOTE 2 THE FLAG NOTES ARE EFFECTIVE FOR THIS FIGURE ONLY

- ▶ CUSTOMER FURNISHED EQUIPMENT
- ▶ PART NO UNKNOWN AT THIS TIME
- ▶ PURCHASE OF THIS EQUIPMENT IS NOT CONFIRMED
- 1 ▶ INSTALLED WHENEVER THE AFT PAIR OF EMERGENCY ESCAPE HATCHES ARE ACTIVATED (REFER TO 25-15-100, PASSENGER CABIN EQUIPMENT ARRANGEMENT LIMITATIONS)
- 2 ▶ FOR SEAT ARRANGEMENTS AND PASSENGER ACCOMMODATION EQUIPMENT INSTALLED IN THE COMBINED PASSENGER/CARGO CONFIGURATIONS, SEE FIGURE 2, IN DESCRIPTION AND OPERATION PAGES OF THIS SECTION
- 3 ▶ WEBER AIRCRAFT CORP., BURBANK, CALIFORNIA
- 4 ▶ INSTALLED ON HATRACK WHEN IN PASSENGER CONFIGURATION
- 5 ▶ FOR PALLETIZED COMBINED PASSENGER/CARGO STANDARD CONFIGURATIONS, SEE FIGURE 2, DESCRIPTION AND OPERATION PAGES
- 6 ▶ SEE FIGURE 207 FOR FOLDING AND FIXED HATRACKS AND HATRACK HEADER INSTALLATION AND PART NOS
- 7 ▶ FOR LOCATION IN OTHER CONFIGURATIONS, SEE FIGURE 2, DESCRIPTION AND OPERATION PAGES
- 8 ▶ FOR FLOOR COVERING, SEE FIGURE 206A
- 9 ▶ FOR CARGO SYSTEM CARRYING EQUIPMENT AND CARGO ELEVATOR KIT, REFER TO 25-36-0, CARGO EQUIPMENT
- 10 ▶ INSTALLED WHEN CENTER LOWERED CEILING COMPARTMENT IS INSTALLED IN THE FORWARD LOCATION AND WHENEVER AFT CABIN AREA IS IN CARGO CONFIGURATION. THESE PANELS ARE ALSO INSTALLED IN THE FORWARD LOCATION WHEN THE CENTER LOWERED CEILING COMPARTMENT IS RELOCATED TO THE AFT AREA OR REMOVED FROM THE CABIN
- 11 ▶ INSTALLED IN THIS LOCATION WHEN AREA IS IN ANY PASSENGER CONFIGURATION
- 12 ▶ INSTALLED IN THE ALL-PASSENGER CONFIGURATIONS ONLY

Passenger Accommodation Conversion Equipment
Figure 203 (Sheet 5)

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- 13 > ACTIVATED WHENEVER AFT CABIN AREA IS IN CARGO CONFIGURATION
- 14 > AFT LEFT COAT CLOSET WITH ATTENDANT'S SEAT ATTACHED IS REMOVED IN THE ALL-CARGO CONFIGURATIONS
- 15 > INSTALLED IN THIS LOCATION WHEN AREA FORWARD IS IN CARGO CONFIGURATION AND AREA AFT IS IN PASSENGER CONFIGURATION (IN THE COMBINED PASSENGER/CARGO CONFIGURATIONS)
- 16 > FOOD TRAY STOWAGE PROVISIONS ON HATRACK ARE PERMANENT AFTER FIRST INSTALLATION
- 17 > COVER IS REVERSED WHEN LAVATORY E IS REMOVED
- 18 > INSTALLED WHENEVER HATCH IS INOPERATIVE FOR EMERGENCY EXIT
- 19 > FOR CARGO CONFIGURATION FORWARD OF BODY STATION SEE FIGURE 204
- 20 > FOR GALLEY ATTACHMENT KIT REFER TO INDEX NO 44
- 21 > FOR PACKING INSTRUCTIONS REFER TO DWG 65-43693 (SUPPLIED IN FLY-AWAY KIT)
- 22 > ATTACHED TO THE FORWARD LOWERED CEILING COMPARTMENT
- 23 > ATTACHED TO THE AFT LOWERED CEILING COMPARTMENT
- 24 > INSTALLED IN THE 176 PASSENGER AND LITTER ACCOMMODATION CONFIGURATIONS ONLY
- 25 > COVER 65-58345-2 (REPLACES FLOOR PANEL 65-28262-2) IS REMOVED IN CARGO CONFIGURATIONS WITH CREW REST ACCOMMODATION ONLY
- 26 > CEILING PANELS 65-69475 ARE INTERCHANGEABLE WITH 65-63502 AND ARE PREFERRED SPARES
- 27 > COAT CLOSET INSTL MAY BE REMOVED/INSTALLED AS A UNIT
- 28 > ATTACHED TO CABIN SIDEWALL WHEREVER PASSENGER SEAT IS INSTALLED IMMEDIATELY AFT OF A PARTITION
- 29 > THE AUXILIARY GALLEY MAY BE INSTALLED IN PLACE OF TWO AFT LEFT PASSENGER SEATS AND AFT WINDSCREEN
- 30 > THE AFT WINDSCREEN INSTALLATION IS OPTIONAL WHEN THE AUXILIARY GALLEY IS INSTALLED

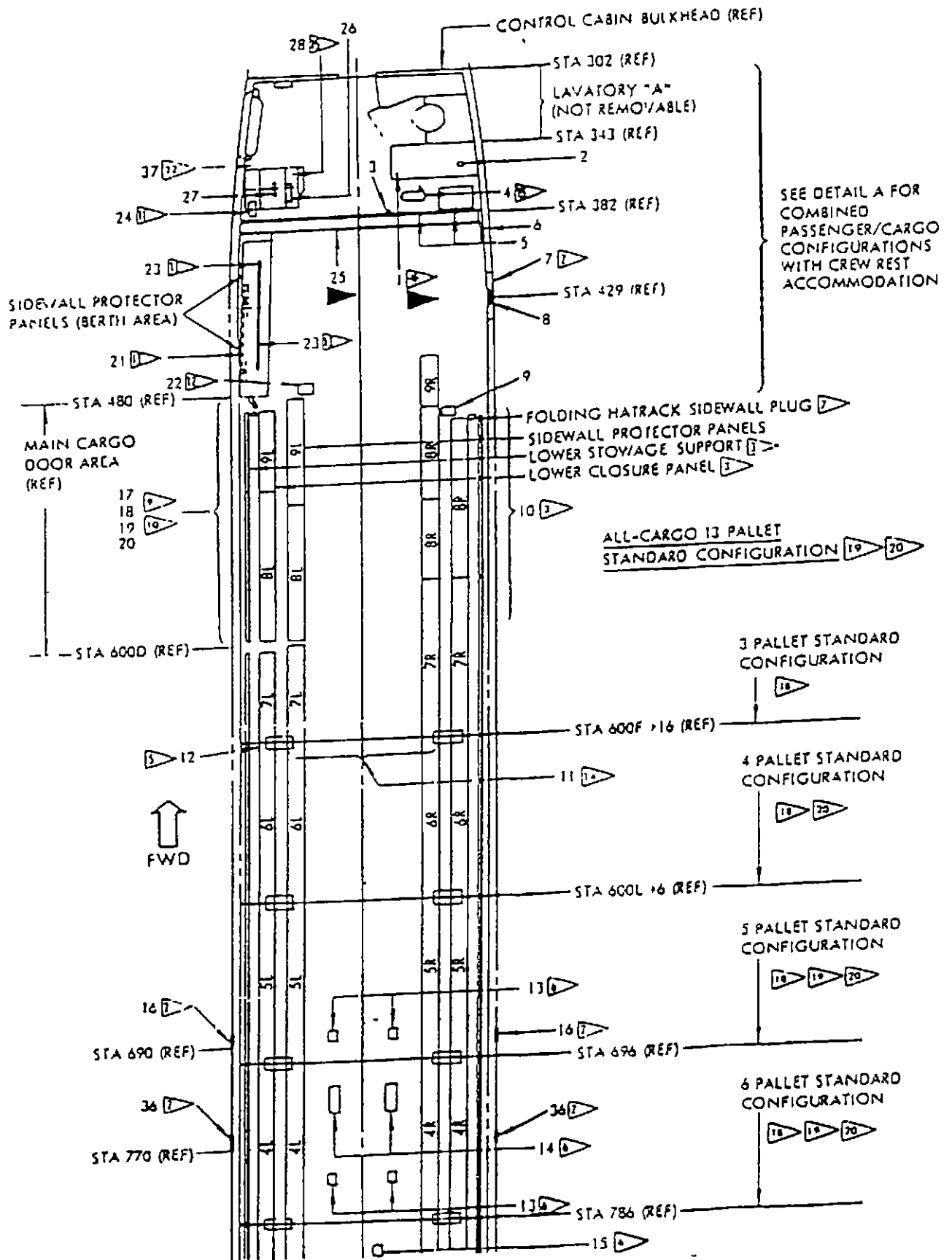
- 31 ▷ EQUIPMENT INSTALLED FORWARD AND AFT OF THE VIP AREA IS THE SAME AS INSTALLED IN THE 176 PASSENGER CONFIGURATION (SHEETS 1 AND 2)
- 32 ▷ INSTALLED IN THE VIP PASSENGER CONFIGURATION ONLY
- 33 ▷ INSTALLED IN THE COMBINED PASSENGER/CARGO CONFIGURATIONS WITH CREW REST ACCOMMODATION
- 34 ▷ BLANK SIGN IS INSTALLED ON THE FORWARD LOWERED CEILING AFT LIFE RAFT COMPT DOOR HANDLE WHENEVER THE COMPT IS NOT ACCESSIBLE (WHEN THE FORWARD DIVIDER PARTITION OR AISLE CURTAIN TRACK IS INSTALLED)
- 35 ▷ ATTACHED TO EMERGENCY ESCAPE HATCH DOOR WHEN SEAT IS INSTALLED PARALLEL WITH ESCAPE HATCH AREA
- 36 ▷ CARGO CONFIGURATION EQUIPMENT, SEE FIGURE 204
- 37 ▷ TRANSMITTER (AND SEXTANT) MOUNTING BRACKET IS ATTACHED TO FLOOR-TRACK IN THE FORWARD LH COAT CLOSET
- 38 ▷ REMOVED WHEN CONVERTING FORWARD CABIN AREA TO CARGO CONFIGURATION TO ENABLE INSTALLATION OF THE FORWARD LEFT SIDEWALL PROTECTOR PANELS
- 39 ▷ FOR SEATING INSTALLATION AND IDENTIFICATION SEE FIGURE 206
- 40 ▷ PASSENGER SERVICE UNITS ATTACHED TO CABIN FOLDING HATRACKS MAY BE REMOVED WITH HATRACKS, WHEN OPTION TO REMOVE HATRACKS IS PREFERRED DURING CONVERSION TO CARGO CARRYING CONFIGURATIONS. WHEN SEAT SPACING IS CHANGED, THE PASSENGER SERVICE UNIT SPACING MUST BE ADJUSTED TO MATCH
- 41 ▷ HATRACK HEADER ATTACHED TO THE MAIN CARGO DOOR FORWARD FOLDING HATRACK MUST BE REMOVED TO ENABLE INSTALLATION OF THE NO. 2 FWD LEFT COAT CLOSET PARTITION IN THE VIP CONFIGURATION
- 42 ▷ ASSIST HANDLE ATTACHED TO FWD PARTITION OF THE FWD LH COAT CLOSET
- 43 ▷ IN ANY CARGO CONFIGURATION WITH CREW REST ACCOMMODATION OR THE LITTER CONFIGURATION, ONE OXYGEN BOTTLE (REMOVED FROM THE FOLDING HATRACKS) MUST BE ATTACHED TO THE INBOARD FWD LOWER FACE (FOOTWELL) OF THE CREW REST AREA AFT PARTITION. INSTALL PLACARD 65-7264-78 ON THE FWD FACE OF THE AFT CREW REST AREA PARTITION, AND PLACARD 65-7264-203 ON THE INBD AFT END OF THE CREW REST AREA CURTAIN TRACK. USE DOUBLE-BACK TAPE TO SECURE PLACARDS

3. Cargo Accommodation Conversion Equipment

- A. Cargo accommodation conversion equipment consists of equipment installed in the main cabin in all-cargo configurations or combined passenger/cargo configurations, which requires removal when any portion of the main cabin is required to accommodate passengers, or which requires installation when any passenger accommodation area is to be converted for cargo accommodation. This equipment primarily consists of the fume-tight curtain, the movable cargo/passenger dividing partition, sidewall protector panels and covers, lowered ceiling compartment attachment covers, emergency equipment, safety equipment and placards.
1. Figure 204 (Cargo Accommodation Conversion Equipment) show the location and lists the assembly and/or part number of all cargo accommodation equipment and describes any particular cargo configuration in which the equipment is installed.

NOTE Figure 204 does not list the cargo pallet support system equipment or sidewall protector panels. For cargo system installation information and identification, refer to 25-36-0, Cargo Equipment. The sidewall protector panels are listed in figure 207.

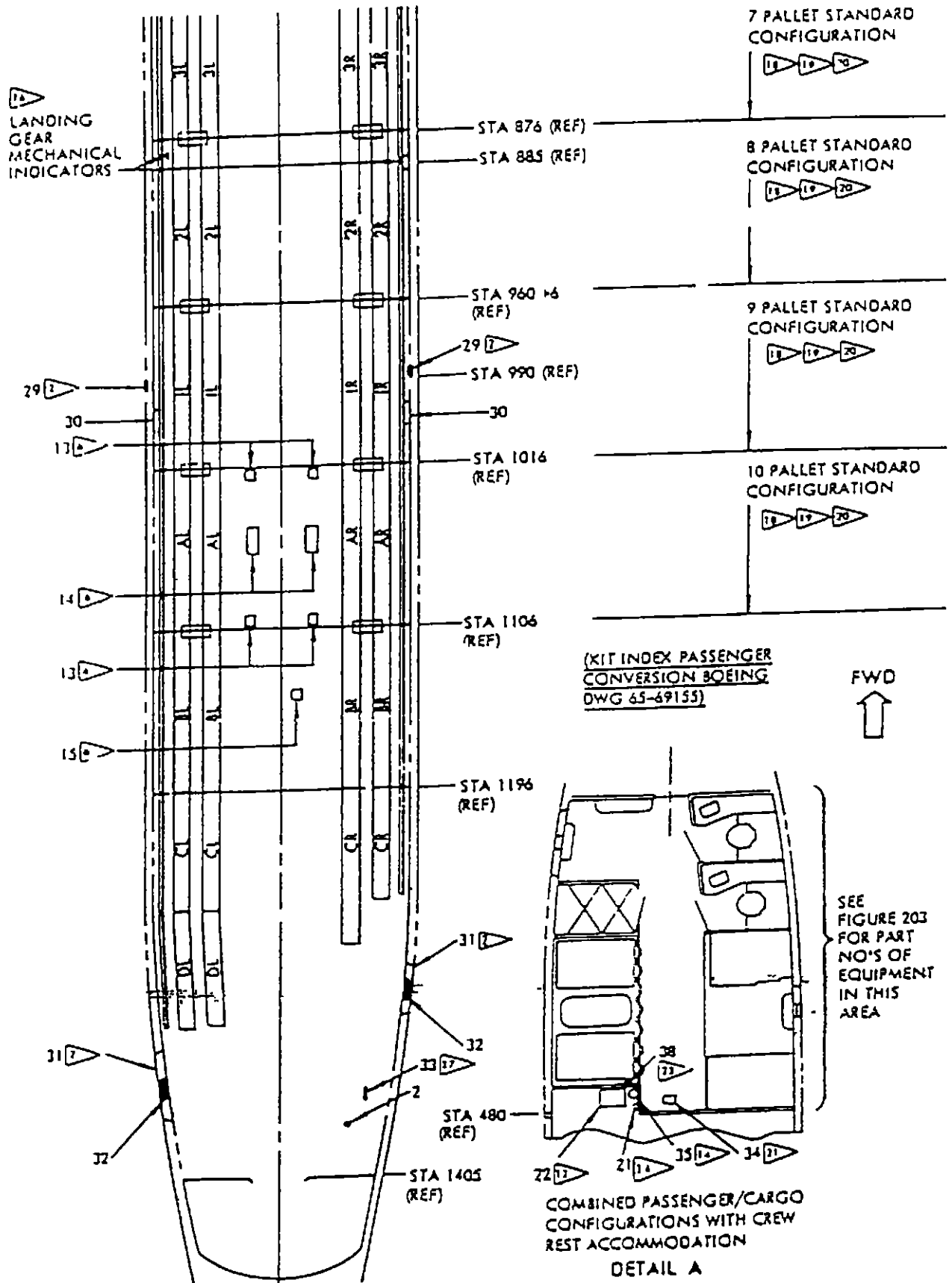
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Cargo Accommodation Conversion Equipment
Figure 204 (Sheet 1)



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Cargo Accommodation Conversion Equipment
Figure 204 (Sheet 2)

NOTE 1 FOR ALL-PASSENGER CONFIGURATIONS SEE FIGURE 203

NOTE 2 THE FLAG NOTES ARE EFFECTIVE TO THIS FIGURE ONLY

- ▶ CUSTOMER FURNISHED EQUIPMENT
- ▶ PART NO UNKNOWN
- ▶ PURCHASE OF THIS EQUIPMENT IS NOT CONFIRMED
- 1 ▶ OBTAIN FROM GALLEY ATTACHMENT KIT, SEE FIGURE 203
- 2 ▶ INSTALLED WHENEVER HATCH OR DOOR IS INOPERATIVE FOR EMERGENCY EXIT
- 3 ▶ INSTALLED WHEN SIDEWALL PROTECTOR PANELS ARE NOT INSTALLED (WHEN HATRACKS FOLDED IN CARGO POSITION)
- 4 ▶ INSTALLED IN COMBINED PASSENGER/CARGO CONFIGURATIONS
- 5 ▶ MAY REMAIN ATTACHED TO PARTITION AFTER FIRST INSTALLATION
- 6 ▶ INSTALLED IN ALL-CARGO CONFIGURATIONS AND WHEN THE CENTER LOWERED CEILING COMPARTMENT IS REMOVED IN THE COMBINED PASSENGER/CARGO CONFIGURATIONS (WHEN THE MOVABLE CARGO/PASSENGER DIVIDING PARTITION IS INSTALLED IN THE AREA OF THE LOWERED CEILING COIPT OR AFT OF THE COIPT)
- 7 ▶ SEE FIGURE 207 FOR PART NO'S
- 8 ▶ INSTALLED WHEN HATRACKS ARE REMOVED
- 9 ▶ INSTALLED WHEN NO OTHER FACILITIES ARE AVAILABLE TO ENABLE MOVEMENT OF CARGO PALLETS THROUGH THE MAIN CARGO DOOR OPENING WITHOUT POSSIBLE DAMAGE TO THE MAIN CARGO DOOR THRESHOLD
- 10 ▶ INSTALLED TO PROTECT PERSONNEL WHILE WORKING IN THE CABIN WHEN THE MAIN CARGO DOOR IS OPEN

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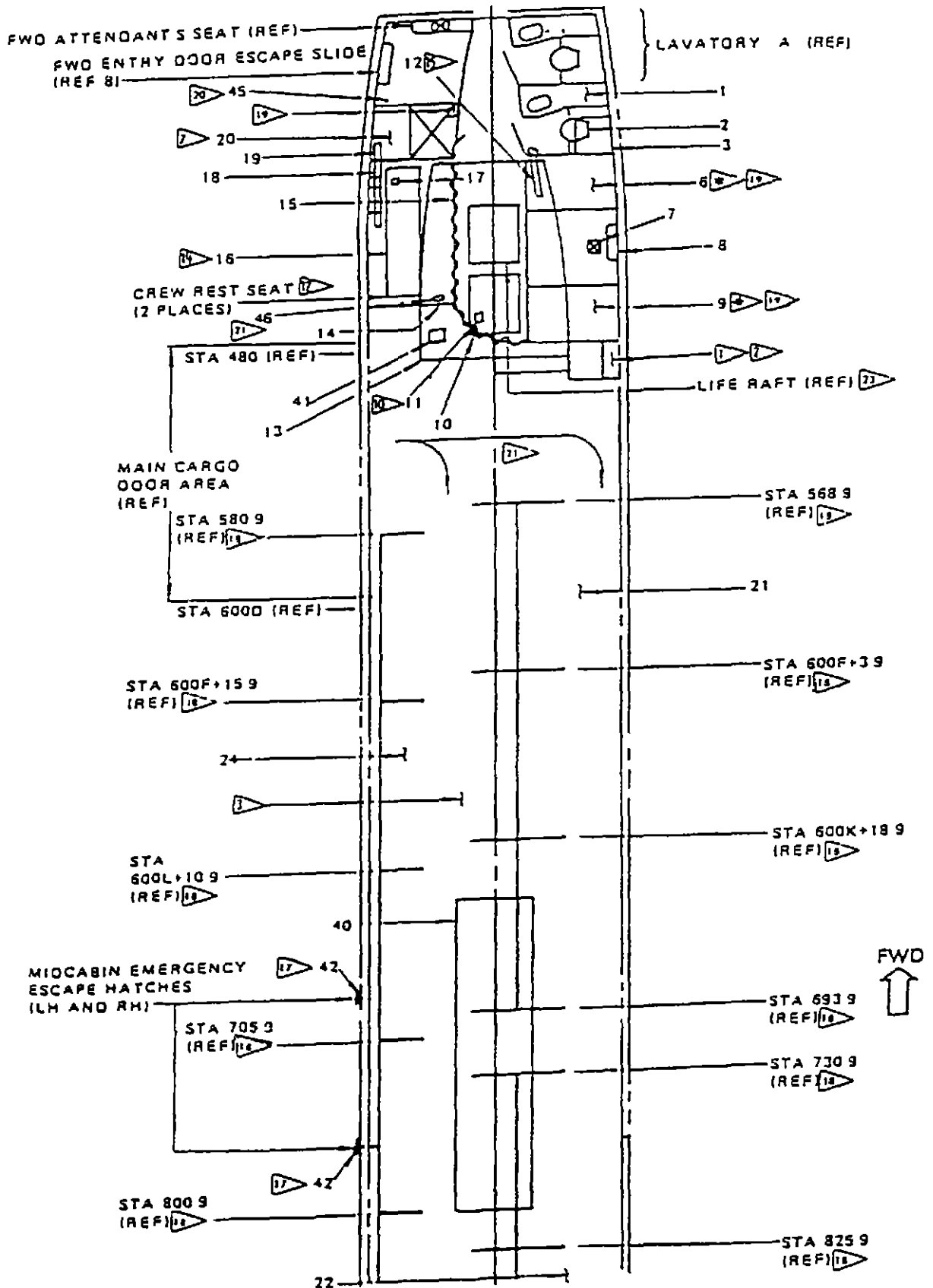
- 11 ▶ INSTALLED ONLY WHEN BARRIER NET ▶ IS INSTALLED REPLACES PASSENGER CONFIGURATION COVE ASSY
- 12 ▶ COVER IS REMOVED IN ANY CARGO CARRYING CONFIGURATION WITH CREW REST ACCOMMODATION
- 13 ▶ ATTACHED TO BERTH AREA SIDEWALL PROTECTOR PANELS IN CARGO CONFIGURATIONS OTHER THAN 14 ▶
- 14 ▶ ATTACHED TO CREW REST AREA (SHORT FORE AND AFT) PARTITION IN CARGO CARRYING CONFIGURATIONS WITH CREW REST ACCOMMODATION
- 15 ▶ ATTACHED TO FLOOR TRACKS
- 16 ▶ ACTIVATED WHEN THE MOVABLE CARGO/PASSENGER DIVIDING PARTITION IS INSTALLED AFT OF THE INDICATORS LOCATION
- 17 ▶ COVER IS REVERSED WHEN LAVATORY E IS INSTALLED
- 18 ▶ SEE FIGURE 203 FOR PASSENGER CONFIGURATION AFT OF BODY STATION. FOR CARGO SYSTEM INSTALLATION AND CARGO ELEVATOR KIT, REFER TO 25-36-0, CARGO EQUIPMENT
- 19 ▶ WHEN THE CARGO ELEVATOR AND CREW REST ACCOMMODATION EQUIPMENT IS INSTALLED, THE POSSIBLE NUMBER OF CARGO PALLETS CARRIED FORWARD IS TWO LESS THAN THE STANDARD CONFIGURATION
- 20 ▶ WHEN THE CARGO ELEVATOR OR CREW REST ACCOMMODATION EQUIPMENT IS INSTALLED, THE POSSIBLE NUMBER OF CARGO PALLETS CARRIED FORWARD IS TWO LESS THAN THE STANDARD CONFIGURATION
- 21 ▶ BLANK SIGN IS INSTALLED ON THE FORWARD LOWERED CEILING AFT LIFE RAFT COMPT DOOR HANDLE WHENEVER THE COMPT IS NOT ACCESSIBLE (WHEN THE FORWARD DIVIDER PARTITION OR AISLE CURTAIN TRACK IS INSTALLED)
- 22 ▶ ASSIST HANDLE IS INSTALLED ON THE CABIN SIDEWALL IN ANY CARGO CONFIGURATION WITHOUT CREW REST ACCOMMODATION HANDLE IS OBTAINED BY REMOVAL FROM THE FWD LH COAT CLOSET PARTITION
- 23 ▶ IN ANY CARGO CONFIGURATION WITH CREW REST ACCOMMODATION OR THE LITTER CONFIGURATION, ONE OXYGEN BOTTLE (REMOVED FROM THE FOLDING HATRACKS) MUST BE ATTACHED TO THE INBD LOWER FACE (FOOTWELL) OF THE AFT CREW REST AREA PARTITION. INSTALL PLACARD 65-7264-78 ON THE FWD FACE OF CREW REST AREA AFT PARTITION, AND PLACARD 65-7264-203 ON THE INBD AFT END OF THE CREW REST AREA CURTAIN TRACK. USE DOUBLE-BACK TAPE TO SECURE PLACARDS

4 Litter Accommodation Conversion Equipment

- A Litter accommodation conversion equipment consists of equipment installed in the main cabin which requires removal when the cabin is to be converted to any other cabin configuration or installation when converting from any other cabin configuration. This equipment consists primarily of the litter support units, the medical attendant rest and accommodation equipment (seats and rest area partitions) in the forward and aft cabin areas is acquired from the passenger configuration equipment.
- 3 Figure 205 (Litter Accommodation Conversion Equipment) shows the location and lists the assembly and/or part number of all litter accommodation equipment and references to figure 203 for medical attendant accommodation equipment.



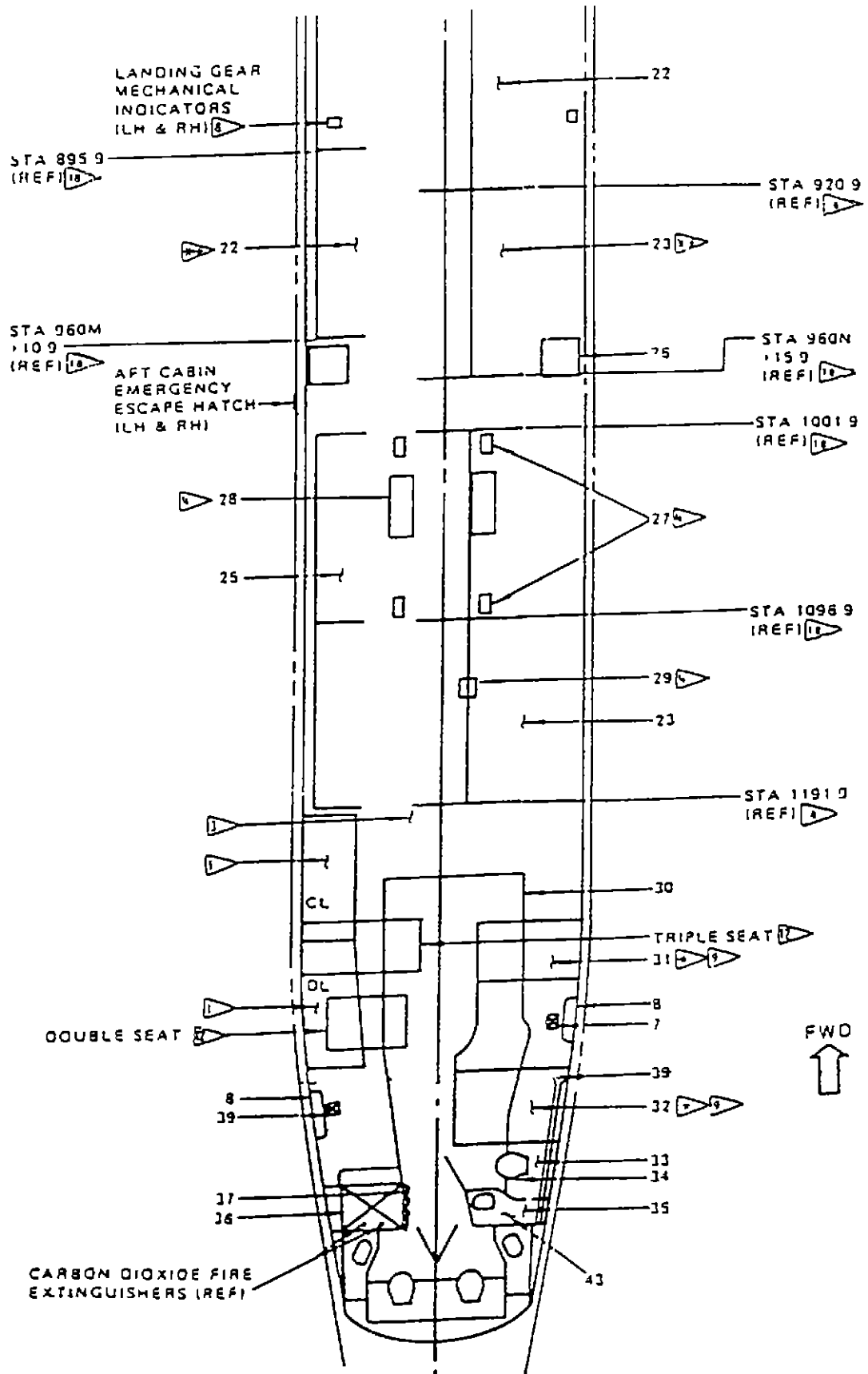
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Litter Accommodation Conversion Equipment
Figure 205 (Sheet 1)

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NOTE THE FLAG NOTES ARE APPLICABLE FOR THIS FIGURE ONLY

- * CUSTOMER FURNISHED EQUIPMENT
- ** PART NO UNKNOWN AT THIS TIME
- ▶ PURCHASE OF THIS EQUIPMENT IS NOT CONFIRMED
- 1 ▶ CONNECT LITTER PATIENT OXYGEN MASK TO OXYGEN SUPPLY OUTLETS LITTER STANCHION ASSEMBLIES MASK ARE NOT SUPPLIED WITH LITTER KIT MASK MAY BE PURCHASED FROM SIERRA ENG CO , SIERRA MADRE, CALIFORNIA, PART NO 289-90, OR FROM ARO OF CALIFORNIA, CITY OF INDUSTRY, CALIFORNIA, PART NO C7040-10 NO STOWAGE PROVISION FOR MASK ARE PROVIDED
- 2 ▶ CONNECT OXYGEN SUPPLY HOSES TO CABIN OXYGEN SYSTEM MANIFOLD AND TO TOP OF EACH LITTER STANCHION ASSY
- 3 ▶ FOR FLOOR COVERING, SEE FIGURE 206A
- 4 ▶ INSTALLED WHEN CENTER LOWERED CEILING IS INSTALLED IN THE FORWARD LOCATION, THESE PANELS ARE ALSO INSTALLED IN THE FORWARD LOCATION WHEN THE CENTER LOWERED CEILING IS RELOCATED TO THE AFT LOCATION OR REMOVED FROM THE CABIN
- 5 ▶ ATTACHED TO THE FORWARD LOWERED CEILING COMPARTMENT
- 6 ▶ ATTACHED TO THE AFT LOWERED CEILING COMPARTMENT
- 7 ▶ COAT CLOSET MAY BE REMOVED/INSTALLED AS A UNIT
- 8 ▶ LANDING GEAR MECHANICAL INDICATORS ACTIVATION OPTIMAL
- 9 ▶ FOR GALLEY ATTACHMENT KIT REFER TO FIGURE 203 INDEX NO 44
- 10 ▶ BLANK SIGN IS INSTALLED ON THE FORWARD DOOR HANDLE LOWERED CEILING AFT LIFE RAFT COMPT WHENEVER THE COMPT IS NOT ACCESSIBLE (WHEN THE FORWARD DIVEDE PARTITION OR AISLE CURTAIN TRACK IS INSTALLED)
- 11 ▶ ENTRY OF LETTER IS ASSUMED TO BE THROUGH THE MAIN CARGO DOOR OPENING WHICH REDUCES REMOVAL PASSENGER CONFIGURATION CEILING PANELS AND TRIM PANELS AT DOOR AREA
- 12 ▶ FOR SEAT PART NOS SEE FIGURE 206
- 13 ▶ REFER TO DWG 65-43693 (SUPPLIED IN FLY-AWAY KIT) ESCAPE SLIDE PACKING INSTRUCTIONS
- 14 ▶ BERTH INSTALLATION OPTINAL

Litter Accommodation Consersion Equipment
Figure 205 (Sheet 3)

BOEING
Intercontinental
767
MAINTENANCE MANUAL

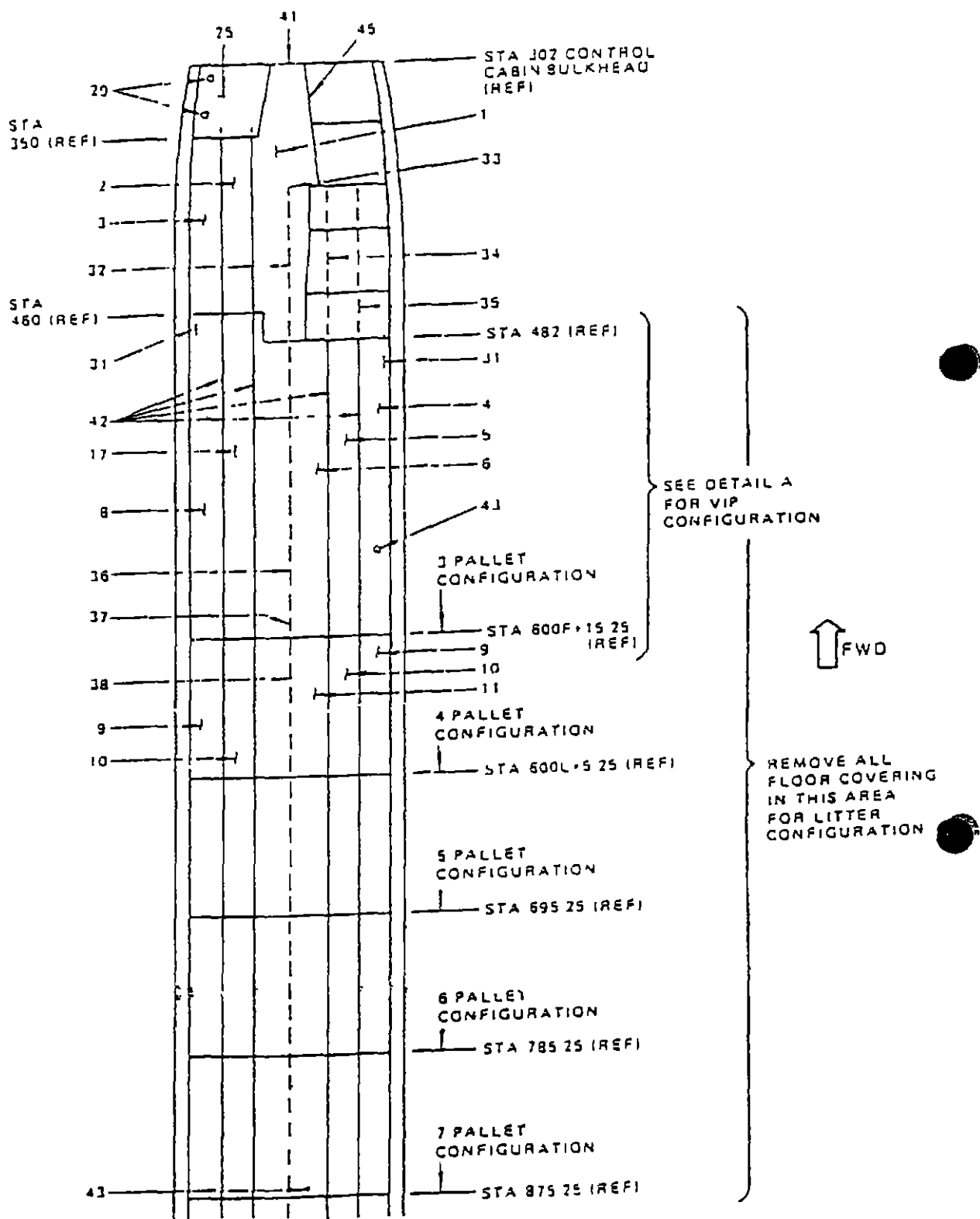
- 13 COVER 65-58345-2 (REPLACES FLOOR PANEL 65-28262-2) IS REMOVED WHEN CONVERTING TO CARGO CONFIGURATIONS WITH CREW REST ACCOMMODATIONS
- 16 INSTALLED WHENEVER HATCH OR DOOR IS INOPERATIVE FOR EMERGENCY EXIT
- 17 COVER IS REVERSED WHEN LAVATORY E IS INSTALLED
- 18 LOCATION OF STANCHION ASSY FWD FLOOR-TRACK ATTACHMENT STUD AS MARKED ON FLOOR PANELS
- 19 TRANSMITTER (AND SEXTANT) MOUNTING BRACKET IS ATTACHED TO FLOOR-TRACKS IN THE FORWARD LH COAT CLOSET
- 20 ASSIST HANDLE ATTACHED TO FWD PARTITION OF THE FWD LH COAT CLOSET
- 21 ONE OXYGEN BOTTLE (REMOVED FROM THE FOLDING HATRACKS) MUST BE ATTACHED TO THE INBD FWD LOWER FACE (FOOTWELL) OF THE AFT CREW REST AREA PARTITION. INSTALL PLACARD 65-7264-78 ON THE FWD FACE OF THE CREW REST AREA AFT PARTITION, AND PLACARD 65-7264-203 ON THE INBD AFT END OF THE CREW REST AREA CURTAIN TRACK. USE DOUBLE-BACK TAPE TO SECURE PLACARDS

Litter Accommodation Conversion Equipment
Figure 205 (Sheet 3)

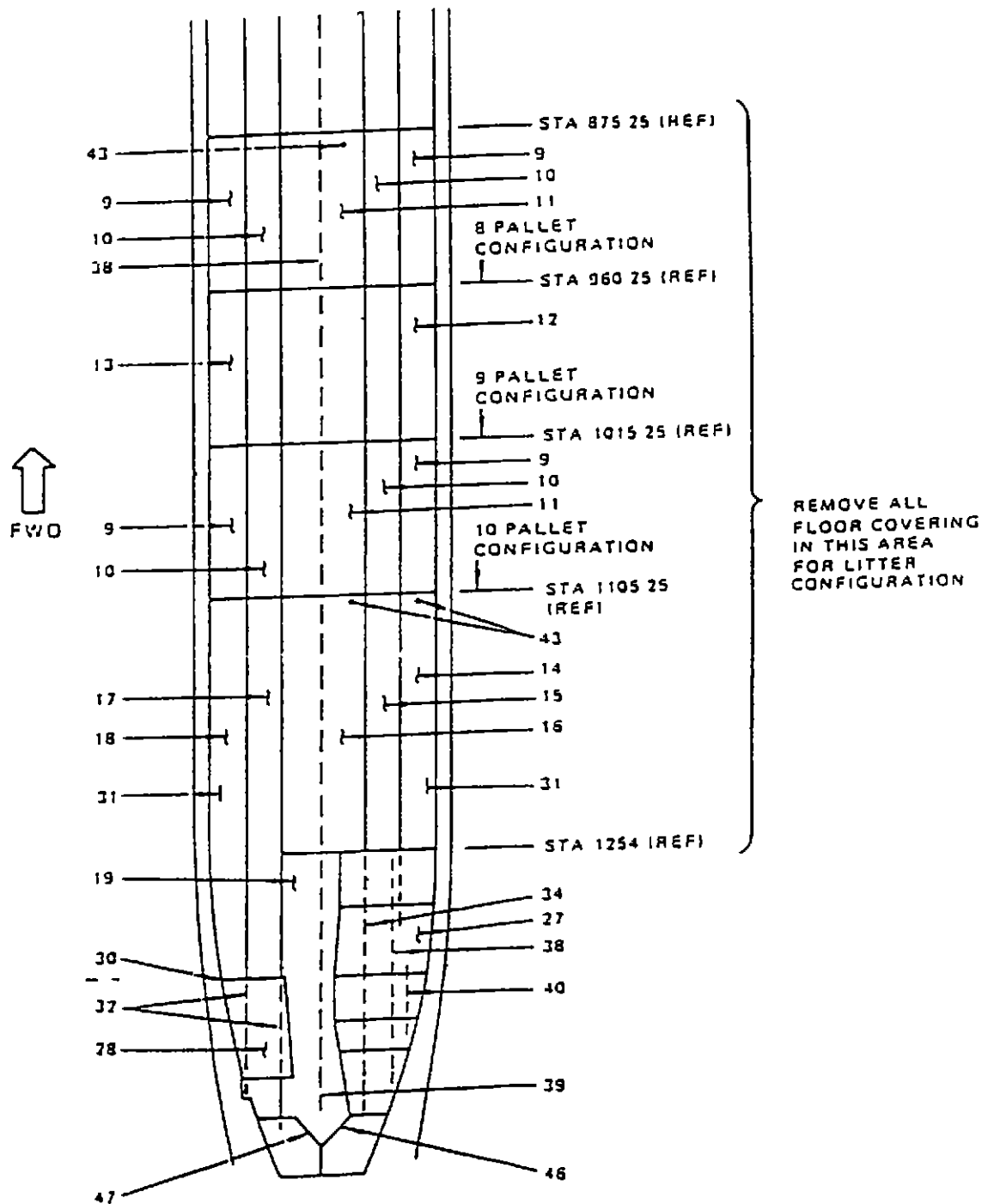


4. Floor Covering

- A Floor covering consists of the passenger cabin rugs, pads, entry door mats; galley area mats; and all floor covering miscellaneous items which are removed or installed dependent on cabin conversion from one configuration to another
3. Figure 20(A) shows the location of each item of floor covering in each cabin configuration and identifies each item by part number



Floor Cover Installation
Figure 206A (Sheet 1)



Floor Covering Installation
Figure 206A (Sheet 2)



MAINTENANCE MANUAL

NOTE 1 THE FOLLOWING ITEMS WILL BE USED AS REQUIRED IN INSTALLING FLOOR COVERINGS

VELCRO PUFF	65-41688-119	LR
VELCRO HOOKS	-119	LR
SERGING THREAD	-50	LR
BACKING THREAD	-51	LR
DOUBLE-BACK TAPE	Y-9204	LR

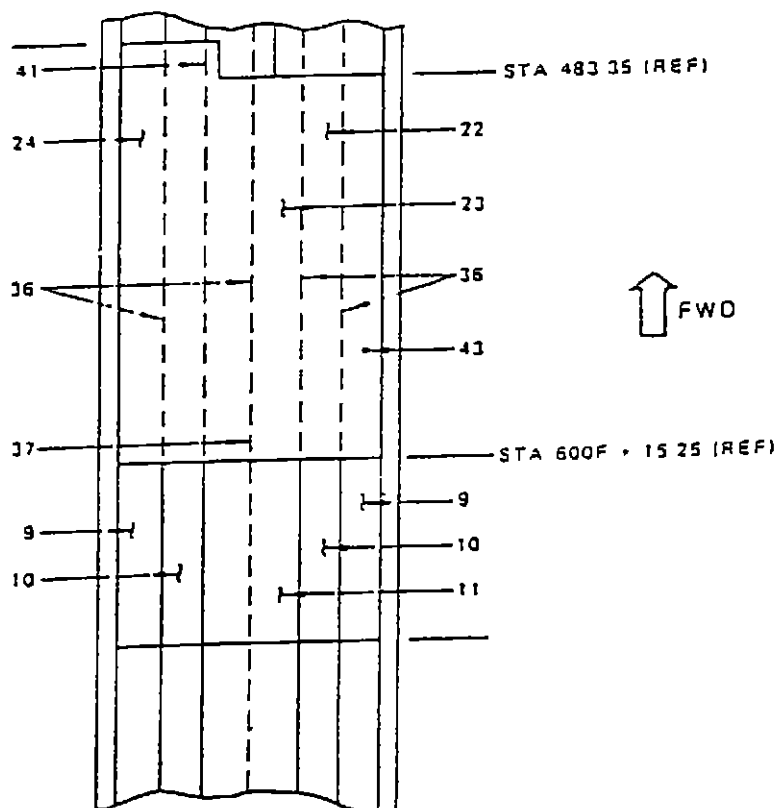
2 ATTACH RUGS TO PAD WITH DOUBLE-BACK TAPE

3 AFT ENTRY AND COLLEY MATS TAP'D TO FLOOR

4 EACH RUG AND PAD PART DASH NO IS STENCILED ON BACK AT EACH END

1 NOT AFFECTED BY CABIN CONVERSIONS

2 INSTALLED IN VIP CONFIGURATION ONLY



VIP CONFIGURATION
DETAIL A

5 Seating and Berth Accommodation Equipment

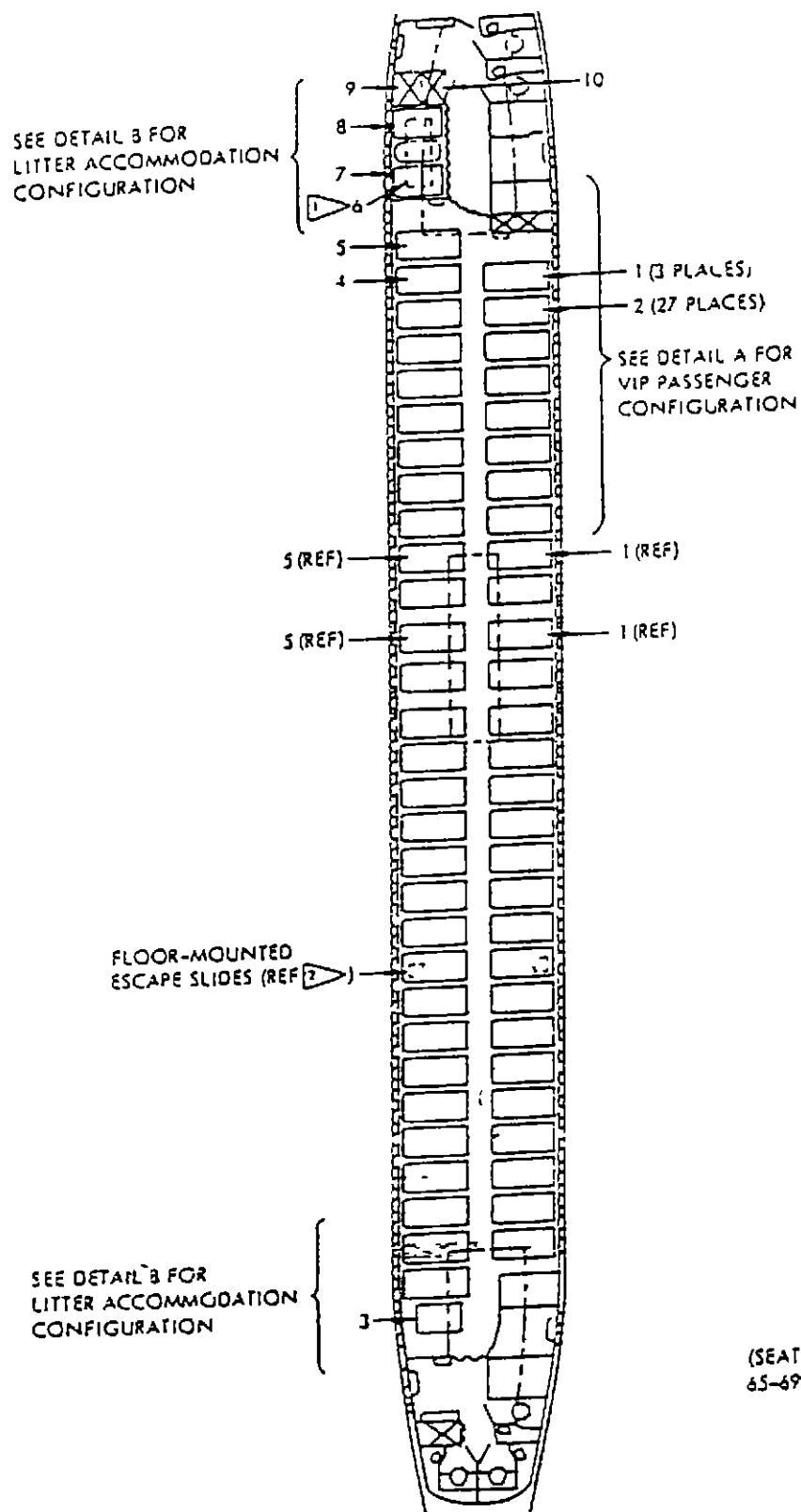
4. Seating and berth accommodation equipment consists of equipment installed in the main cabin in any passenger accommodation configuration and the litter accommodation configuration which requires removal or installation during conversions between these configurations or to any all-cargo configuration. This equipment consists primarily of passenger seats, crew accommodation seats, the crew accommodation berth, and VIP passenger accommodation tables and berth/sole divans.

NOTE One of the crew rest seats is a berth/sole type seat.

- 5 Figure 206 (Seating and Berth Accommodation Conversion Equipment) illustrates the location and lists the assembly and/or part number of all seating and berth accommodation equipment and describes any particular configurations in which the equipment is installed.

NOTE: Figure 206 supports figures 203, 204 and 205 for seating and berth equipment installed in passenger or cargo configurations, combined passenger/cargo configurations, and the litter accommodation configuration. Figure 206 does not show seat arrangement spacing. For seat spacing information, see figure 2, in the description and operation pages of this section.

MAINTENANCE MANUAL

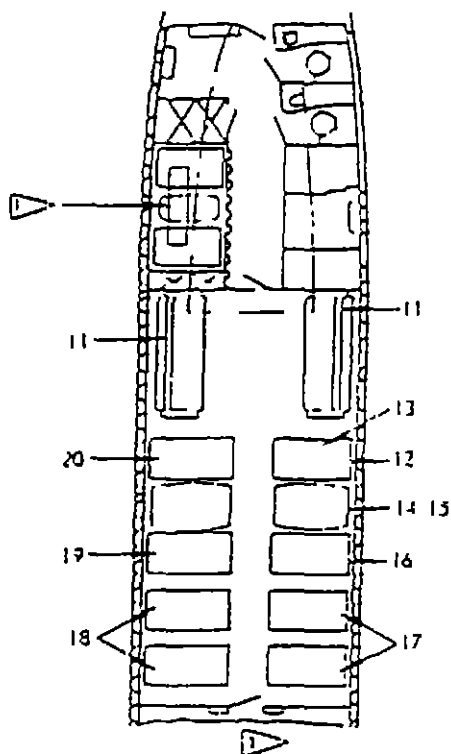


176 PASSENGER CONFIGURATION

Seating and Berth Accommodation Conversion Equipment
Figure 206.(Sheet 1)

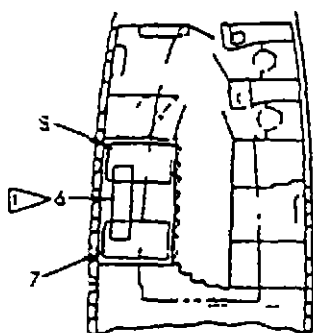
BOEING 777
Intercontinental

MAINTENANCE MANUAL



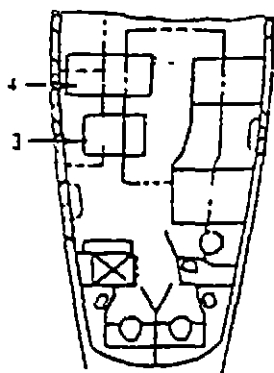
VIP PASSENGER
ACCOMMODATION
CONFIGURATION

DETAIL A



LITTER
-ACCOMMODATION
CONFIGURATION

DETAIL B



- 1 BERTH INSTALLATION IS OPTIONAL
SEE FIGURE 203 FOR ASSEMBLY
PART NO 5
- 2 SEAT CAPACITY IS SUBJECT TO CHANGE
WHEN FLOOR-MOUNTED ESCAPE SLIDES ARE
INSTALLED, WHEN COMPLYING WITH 25-15-100
PASSENGER CABIN CONVERSION LIMITATIONS
- 3 SEATING AFT IS THE SAME AS THE
175 PASSENGER CONFIGURATION
- 4 SPECIFICATION DWG CONTROL NUMBER
PARTS ARE CUSTOMER FURNISHED FROM
BURNS AERO SEAT CO INC

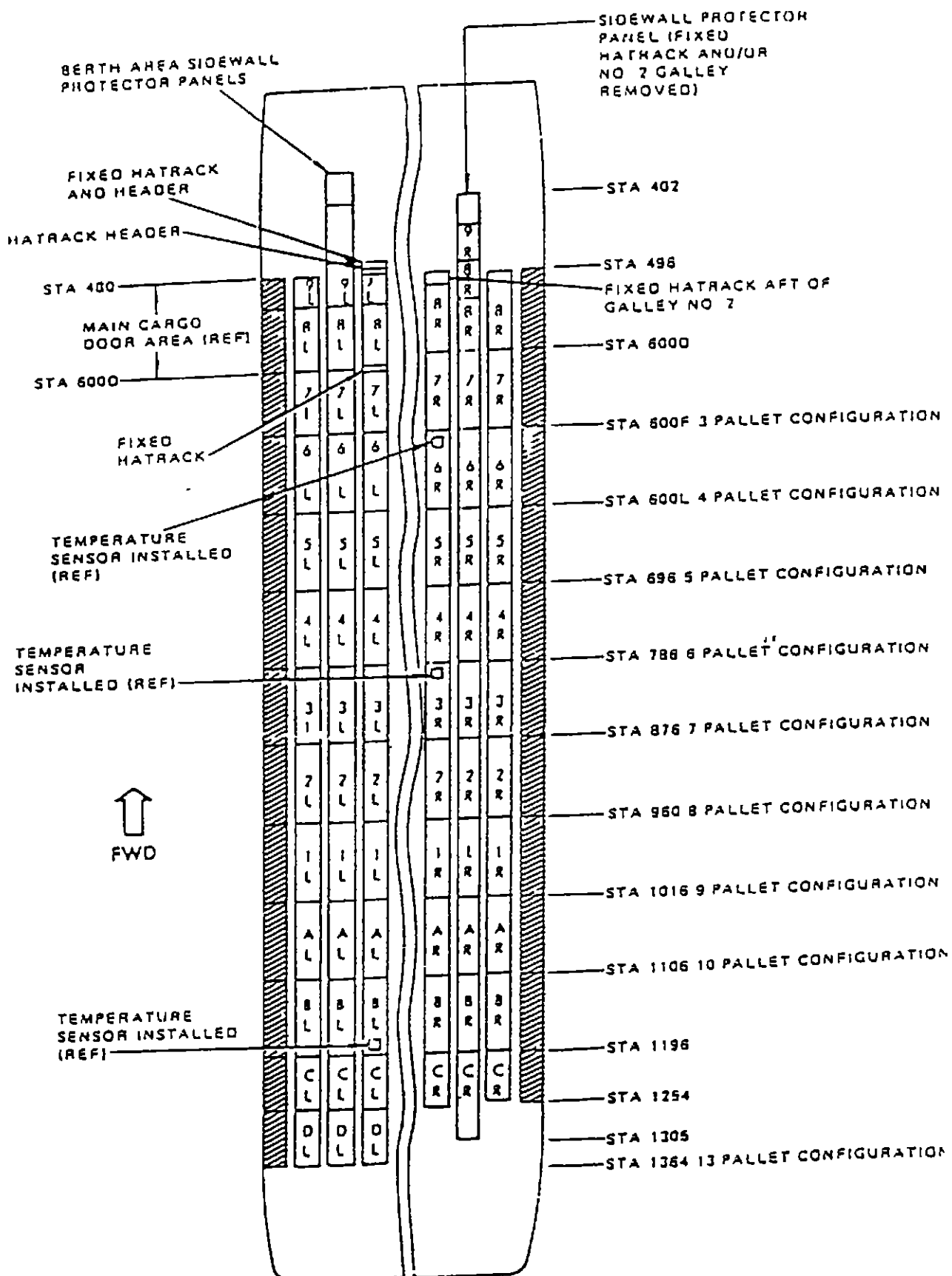
NOTE FOR SEAT SPACING AND ARRANGEMENTS
IN COMBINED PASSENGER/CARGO
CONFIGURATIONS, SEE FIGURE 2, 25-15-200
DESCRIPTION AND OPERATION

6 Hatch and Related Conversion Equipment

- A Hatch and related conversion equipment consists of the folding and fixed hatches (and their related closure panels) installed along both sides of the main cabin. Also sidewall protector panels installed in the crew rest berth area and in the folding hatch areas when the folding hatches are removed.
- B When any portion of the main cabin is to be converted to accommodate cargo, the folding hatches may be handled in either of two ways:
 - (1) The folding hatches may be folded down and stowed together with the lower closure panels against the cabin sidewall and secured by installation of lower stowage supports.
 - (2) Alternatively, the folding hatches may be removed and sidewall protector panels installed in their place.
- C The fixed hatch sections must be removed when converting the area of their location to accommodate cargo.
- D Sidewall protector panels are installed to protect the cabin sidewall below the crew rest area berth whenever the extreme forward end of the main cabin is converted for cargo accommodation.
- E Figure 207 (Hatch and Related Conversion Equipment) illustrates the location and lists the assembly and/or part number of the hatches and their related assemblies, and sidewall protector panels.

NOTE: Figure 207 supports figures 203, 204 and 205 for hatches and sidewall protector panels installed in any cabin configuration.

MAINTENANCE MANUAL



Hatrack and Related Conversion Equipment
Figure 207 (Sheet 1)

MAINTENANCE MANUAL

IF INSTALLED WHILE MATRACKS ARE REMOVED FOR CARGO ACCOMMODATION	NOTES 1 & 2	FOLDING FIXED MATRACKS IN PASSENGER POSITION OR FOLDED IN CARGO POSITION		IF INSTALLED WHILE MATRACKS ARE FOLDED TO CARGO POSITION ONLY	IF INSTALLED AFTER END OF THE FIRST FWD AND AFT MATRACK SECTIONS OR IF	
SIDEWALL PROTECTOR PANEL INSTL 65-55611 (REF)		MATRACK INSTL 65-71551, 65-37682, AND 65-54128	CLOSURE PANEL INSTL 65-71552 (REF)	1 LOWER STOWAGE SUPPORT	CLIP IDENT COVER	PLUG SIDEWALL
65-69867-27 65-69867-28 65-69867-1 65-68767-2 65-69867-3 65-69867-4 65-69867-5 65-69867-6 65-69867-7 65-69867-8 65-69867-9 65-69867-10 65-69867-11	1 9L 8L * 7L 6L 5L 4L 3L 2L 1L AL BL CL DL	65-69165-44 65-54129-1 65-69165-20 65-69165-21 65-31501-69 65-69165-22 65-69165-3 65-69165-9 65-69165-11 65-69165-1 65-69165-3 65-69165-5 65-69165-7 65-69165-23 65-69165-17 65-69165-19	65-36812-117 65-70364-20 65-70364-21 65-36812-112 65-70364-22 65-70364-19 65-70364-9 65-70364-11 65-70364-1 65-70364-3 65-70364-5 65-70364-7 65-70364-1 65-70364-13 65-36812-14	65-31525-51 65-31525-44 65-31525-46 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-48 65-31525-49	65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1	65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2
65-69867-29 65-69867-12 & 13 65-69867-14 65-69867-15 65-69867-16 65-69867-17 65-69867-18 65-69867-19 65-69867-20 65-69867-21 65-69867-22 65-69867-23	2 9R 8R 7R 6R 5R 4R 3R 2R 1R AR BR CR	65-69165-43 65-69165-15 65-69165-16 65-69165-26 65-69165-10 65-69165-12 65-69165-2 65-69165-6 65-69165-8 65-69165-24 65-69165-28	65-36812-119 65-70364-18 65-70364-2 65-70364-4 65-70364-10 65-70364-12 65-70364-2 65-70364-4 65-70364-8 65-70364-2 65-70364-17	65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44 65-31525-44	65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1 65-70255-1	65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2 65-35412-1 & 2
BIRTH AREA SIDEWALL PROTECTOR PANEL INSTL 65-23529 (REF)		SIDEWALL PROTECTOR PANEL ATTACHING SCREWS AND WASHERS				
65-69867-26 -25		AN1525-10W9(2) AP1960-C16L(4) 16H10 -10H11				

Hatrack and Related Conversion Equipment

Figure 207 (Sheet 2)

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MAINTENANCE MANUAL

- NOTE.
1. HATRACK NUMBERS ARE STENCILLED ON HATRACK, UPPER AND LOWER CLOSURE PANELS AND ON SIDEWALL PROTECTOR PANELS
 2. THE SUBLETTERS L AND R DENOTE LEFT AND RIGHT
 - 3 FOR CORRESPONDING BAC PART NOS. SEE TABLE
 4.  LOWER STOWAGE SUPPORT
 5. *FIXED HATRACK
+FIXED HATRACK (AFT OF GALLEY NO 2 AREA)
++HATRACK HEADER (ATTACHED TO MAIN CARGO DOOR FWD FOLDING HATRACK)
 6. FIXED HATRACKS ARE REMOVED IN CARGO CONFIGURATIONS.

Hatrack and Related Conversion Equipment
Figure 207 (Sheet 3)

General Conversion Operations

- A. Certain operations, conditions, and requirements which must be accomplished when converting the main cabin to accommodate cargo, or removal of cargo accommodation equipment and conditions, are standard requirements for all conversions.
- B. The following standard requirements should be reviewed before any conversion is commenced, as are referenced in the conversion instruction procedures.

NOTE For detailed removal/installation information of any equipment affected by any conversion of the main cabin, reference is made to other applicable sections of this maintenance manual chapter. A complete list of sections covering removal/installation procedures is contained in paragraph 12 of this section.

(1) Equipment and Materials

- (a) Fork lift, or equivalent assistance, outside airplane.
- (b) Adjustable wrench, vise-grip wrench, regular and Phillips-head screwdrivers.
- (c) Sheet of metal 42.0 in. by 72.0 in. (approx.) on which to stand lavatory compartments B and E while moving them to cargo door. The sheet should have two holes near one end in which cargo handling hooks may be engaged.

NOTE As an alternative method of moving lavatory E out of the main cargo door, it may be left at the aft end of the cabin until most of the cargo carrying equipment is installed and then rolled forward on an empty pallet. The reduced head room in these circumstances will require the compartment to be rested with its inboard face on the pallet, and care should be taken not to damage the door and its hardware, and not to break the mirror inside the forward face of the compartment. The aft galleys (Nos. 3 and 4) may also be carried along the cabin in this manner.

- (d) Clean rags and adhesive tape.
- (e) Allen wrench, half-inch, for entry door mat drain fitting nuts



- (2) The folding type hatracks in that part of the main cabin converted to carry cargo must be either folded down and stowed, or removed. If the hatracks are folded down, the individual air outlets on the passenger service units must be closed and the lower closure panels must be installed. If the hatracks were removed, the oxygen, electrical and individual air connections for each passenger service unit must be capped.

NOTE: It is recommended, though not mandatory, that adhesive tape be applied to secure the passenger service unit oxygen mask doors on hatracks to be folded down. Upon restoring the hatracks to the passenger position, a check should be made that the door pressure latches are engaged, after which the tape must be removed. (If tape is not applied, and if the latches should operate while the hatracks are down, oxygen masks will fall from the passenger service unit when the hatracks are raised. This would do no harm but could waste much time.)

- (a) When the cargo elevator is installed, the three forward RH folding hatracks must be removed.
- (3) Fixed hatracks and headers in any part of the main cabin converted to accommodate cargo must be removed.
- (4) In any standard cargo configuration, the fume-tight curtain must be installed across the forward cabin area (body station 382) to divide the forward cabin area from the main cabin cargo compartment area.
- (5) In any standard cargo configuration, the No. 1 galley vent must be open. This requires removal of Lavatory B and Galley No. 1.
- (6) To ensure that the smoke detection system functions properly, certain conditions shall be observed.

NOTE: For information on this system, refer to Chapter 26, Main Cabin Compartment Smoke Detection System.

- (a) When the main cabin is in any cargo configuration, the smoke detection system shall be ON, the control cabin door shall normally be closed and the individual air outlet at the lavatory B connection box shall be open, or uncapped.
- (b) When the cabin is in any all-cargo configuration, the aft end of the cabin shall be as follows:
 - 1) All equipment forward of the aft lavatories C and D (lavatories, galleys, coat closets, etc.) shall be removed.

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MAINTENANCE MANUAL

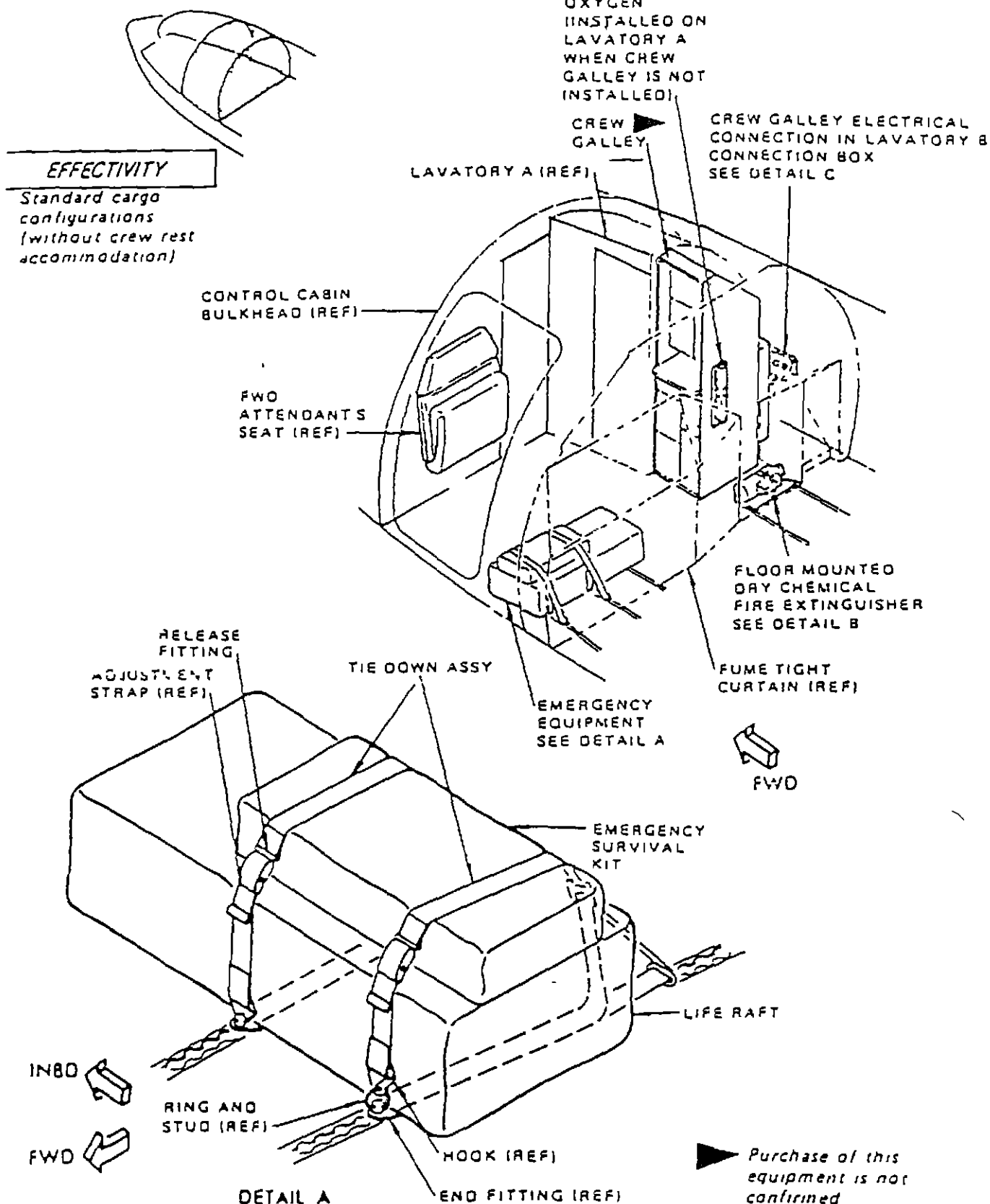
- 2) The aft galley area vents shall be closed
 - 3) Both aft C and D lavatory doors shall be closed
 - 4) The cabin air rise ducts, aft of the aft galley service door and aft of the aft entry door, shall be open.
 - 5) The anemostat air outlet damper, in the aft ceiling panel between the aft lavatories C and D, shall be closed.
- (c) The smoke detection system sensing ports, in the passenger carrying area of the main cabin, shall be closed, except that sensing port No. 4 (at body station 1327) shall be open in all of the maximum cargo pallet carrying combined passenger/cargo configurations (whenever the movable cargo/passenger dividing partition is installed aft of body station 1016) and in any of the all-cargo configurations.
- NOTE. Locations of the movable cargo/passenger dividing partition relative to installation in the various combined passenger/cargo configurations are shown and noted in figure 204.
- (d) The smoke detection system sensing ports, in the cargo carrying area of the main cabin, shall be open, except as follows:
- 1) Sensing port No. 3A (at body station 1013) shall be closed when the movable cargo/passenger dividing partition is installed across the cabin at body station 960+6.
 - 2) Sensing port No. 3 (at body station 957) shall be closed in any of the all-cargo configurations, or wherever the movable cargo/passenger dividing partition is further aft than body station 960+6.
 - 3) Sensing port No. 4 (at body station 1327) shall be closed except in all of the maximum cargo pallet carrying combined passenger/cargo configurations (whenever the movable cargo/passenger dividing partition is installed aft of body station 1016) and in any of the all-cargo configurations.



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- (7) When the cabin is in any all-passenger configuration the pyrotector main cabin smoke detector circuit must be deactivated by disconnection of wires at circuit breaker panel F6.
- (8) When the cabin is in any cargo configuration, or the litter accommodation configuration, the pyrotector main cabin smoke detector circuit must be activated by connection of wires at circuit breaker panel F6.
- (9) When the cabin is in any all-cargo configuration the passenger oxygen system should be depressurized. Refer to Chapter 35, Oxygen Systems.
- (10) When the cabin is in one of the combined passenger/cargo configurations the passenger oxygen system must remain pressurized.
- (11) When the cabin is in one of the combined passenger/cargo standard configurations, or the all-cargo 13 pallet standard configuration, (which excludes crew rest accommodation equipment and the cargo elevator) the portable dry-chemical fire extinguisher must be attached to the floor-tracks at the right side of the cabin, immediately forward of the fume-tight curtain. The extension applicator for use with the fire extinguisher is stowed on the crew rest area sidewall protector panels. In these configurations the 26-man life raft and survival kit package is attached to floor-tracks at the left side of the cabin, immediately forward of the fume-tight curtain. (See figure 208.)
- (12) When the cabin is in one of the combined passenger/cargo or all-cargo with crew rest accommodation configurations, the portable dry-chemical fire extinguisher and the extension applicator are attached to the short section of the forward dividing partitions. (See figure 203.)
- (12A) When the cabin is in any cargo configuration with crew rest accommodations, or the litter configuration, one of the oxygen bottles removed from the folding hattracks must be attached to the crew rest area aft partition. Placards to note location of the oxygen bottle must be secured to (using double-back tape) one of the forward face of the crew rest area aft partition, and one on the inboard aft end of the crew rest area curtain track.

MAINTENANCE MANUAL

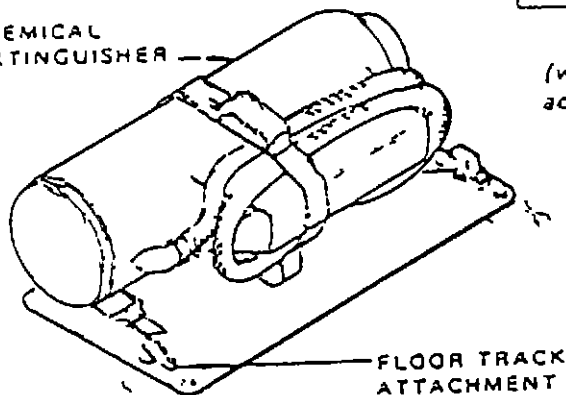


MAINTENANCE MANUAL

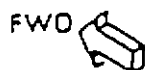
EFFECTIVITY

Standard cargo
configurations
(without crew rest
accommodation)

DRY CHEMICAL
FIRE EXTINGUISHER



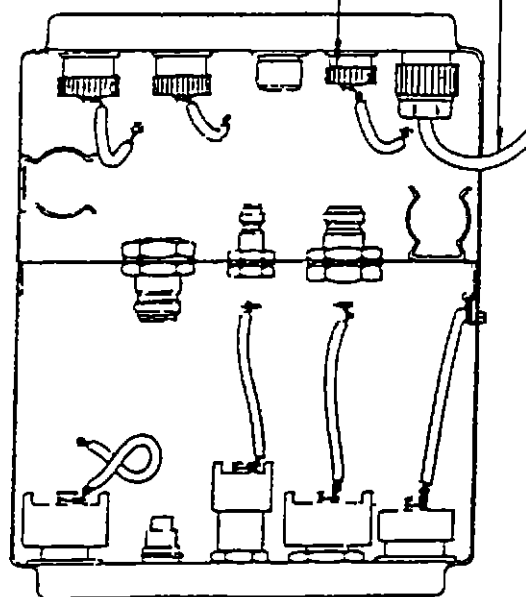
FLOOR TRACK
ATTACHMENT
(2 PLACES)
SEE DETAIL D



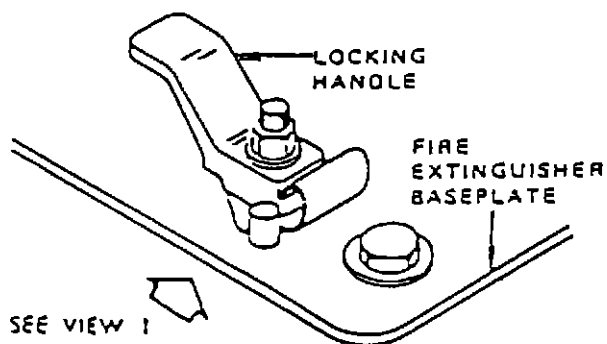
DETAIL B

ELECTRICAL CABLE
FROM CREW GALLEY

DUST CAP STORAGE
(INSTALLED TO GALLEY
SOCKET WHEN GALLEY
NOT INSTALLED)



LAV 'B' SERVICE
CONNECTION BOX
DETAIL C



LOCKING
HANDLE

FIRE
EXTINGUISHER
BASEPLATE

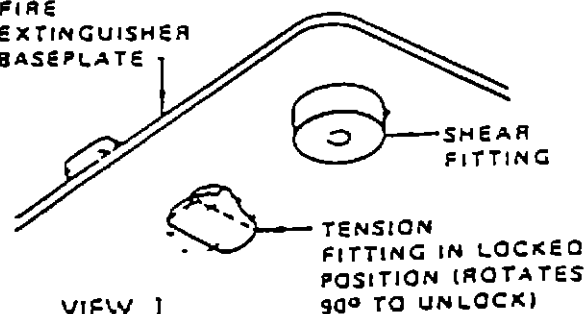
SEE VIEW 1

DETAIL D



FWD

FIRE
EXTINGUISHER
BASEPLATE



VIEW 1

TENSION
FITTING IN LOCKED
POSITION (ROTATES
90° TO UNLOCK)

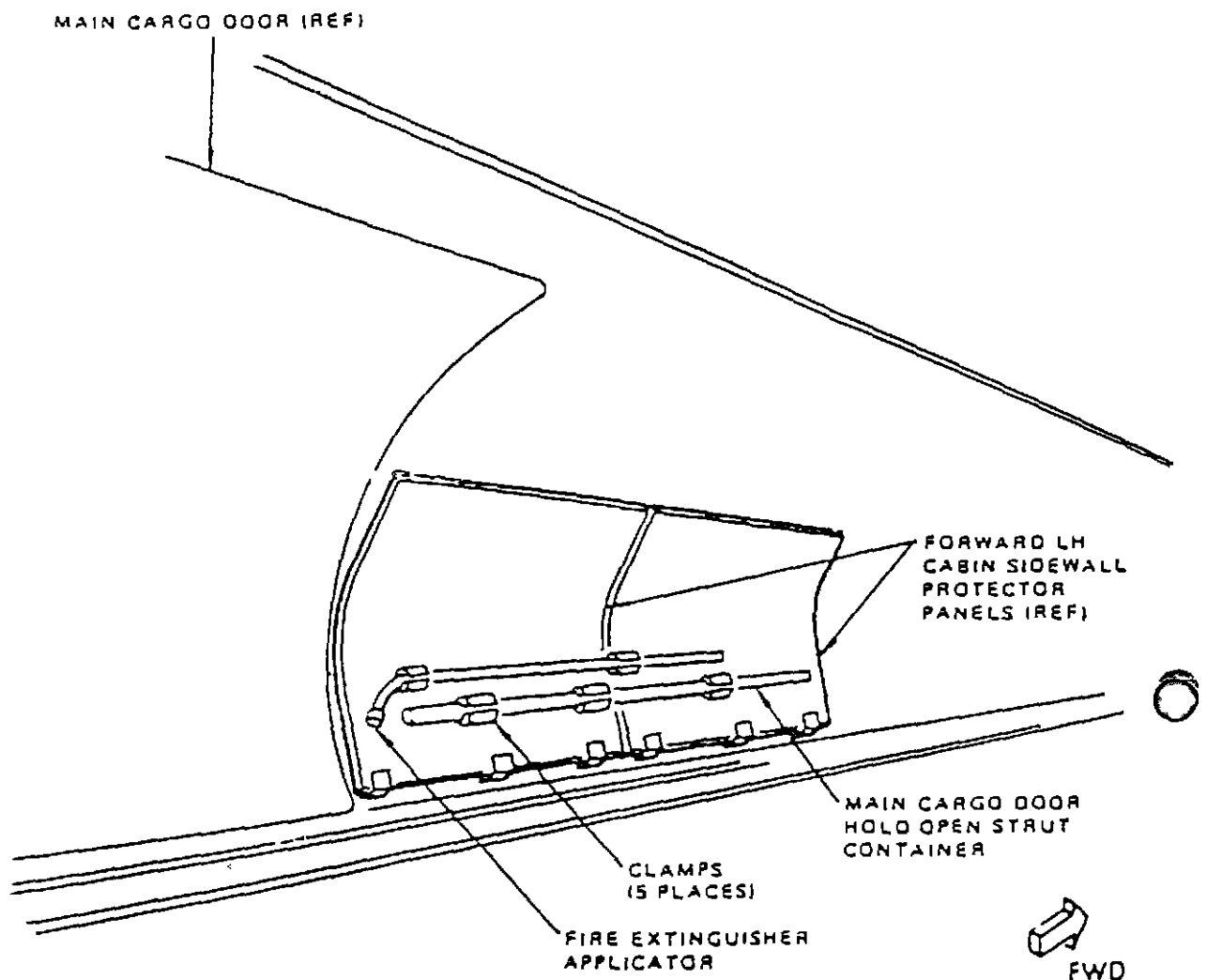
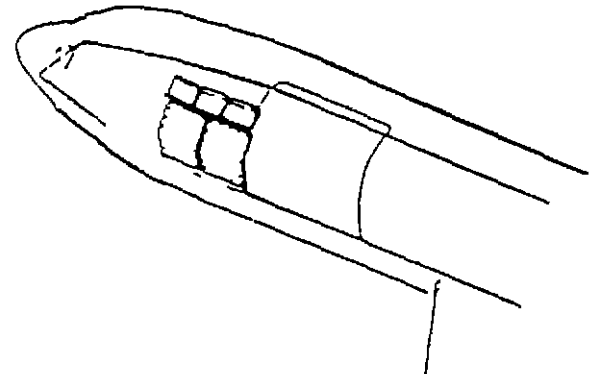


FWD

Crew Rest Accommodation and Emergency
Equipment Installation
Figure 208 (Sheet 2)

EFFECTIVITY

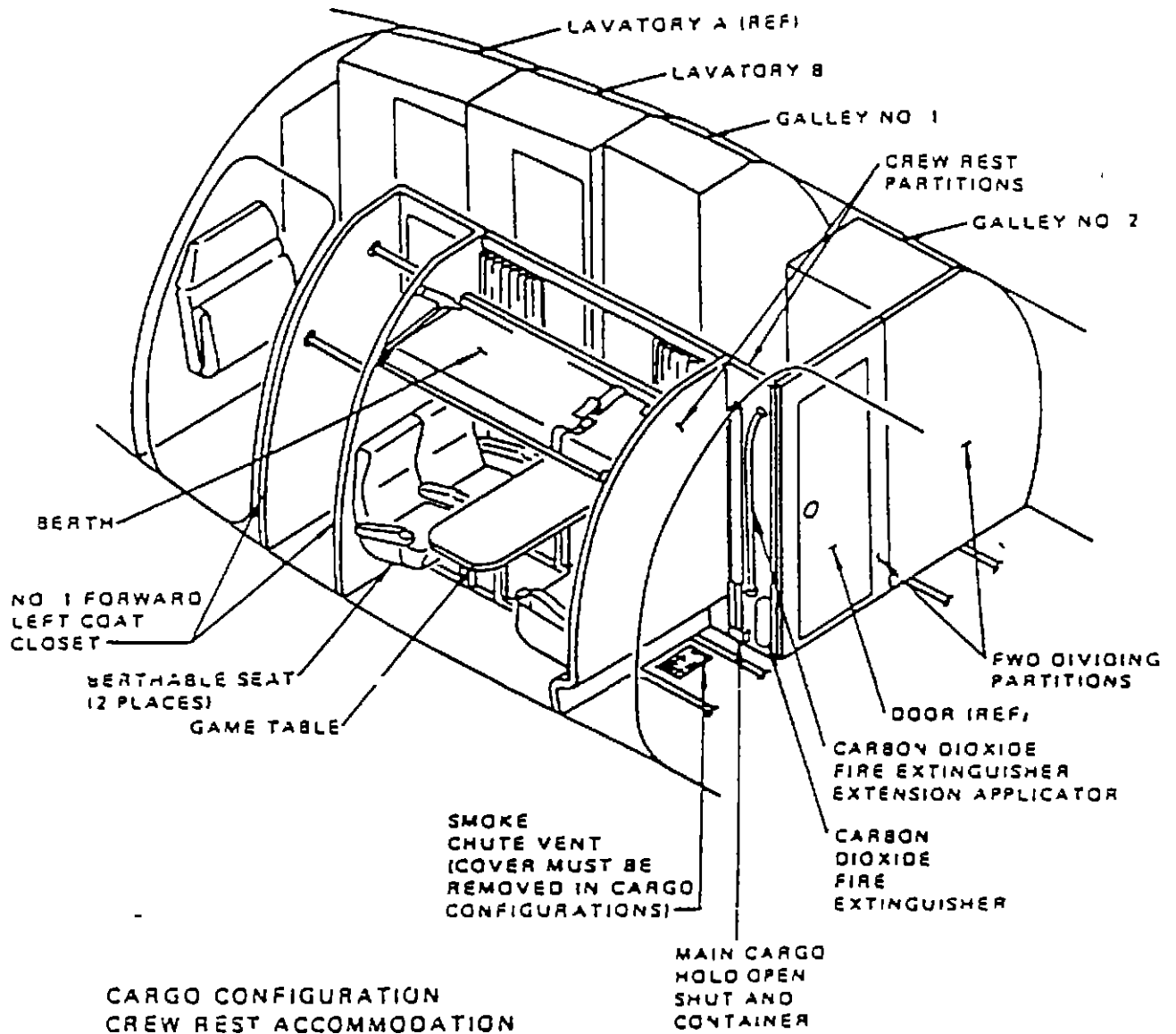
Standard cargo
 configurations
 (without crew rest
 accommodation)



FIRE EXTINGUISHER APPLICATOR AND
 MAIN CARGO DOOR HOLD OPEN STRUT STOWAGE



MAINTENANCE MANUAL



Crew Rest Accommodation and Emergency
Equipment Installation
Figure 208 (Sheet 4)

- (13) Cargo loading in any combined passenger/cargo configuration must permit crew passage on the left side of the cabin for access between the cargo and passenger compartments, also to permit use of the portable dry-chemical fire extinguisher, with extension applicator when required, to effectively reach fires in the cargo area. When the cargo elevator is installed, cargo loading on the cargo elevator pallet must allow crew passage on the right side of the cabin.
- (14) When the cabin is in any cargo configuration with crew rest accommodation, the smoke chute vent cover aft of the crew rest, partition must be removed (See figure 209.)
- (15) During the course of converting the cabin accommodation it is important that power should be removed from all circuits which are to be disconnected or reconnected. It is assumed that the external power switch will be in its ON position and it is therefore necessary that the following listed circuit breakers should be opened when removing or installing any components which have an electrical connection and should be closed again when the cabin conversion is completed. The circuit breakers should be tagged to ensure that they remain open until the main cabin conversion is completed.

NOTE: When the airplane is in any all-cargo configuration the aft lavatories should be deactivated by the opening of certain circuit breakers. Some of these are among those listed below and are marked with an asterisk (*). These circuit breakers should not be closed upon completion of a conversion to the all-cargo configuration.

- (a) On control cabin circuit breaker panels.
 - 1) Forward shaver outlets
 - 2)* Aft shaver outlets
 - 3) Forward main cargo compartment outlets
 - 4) Emergency exit lights
 - 5)* Lavatories B, C, and D toilet flush motors and water pipe heaters.
 - 6) Forward lavatories water heaters (3 places)
 - 7)* Aft lavatories water heaters (3 places)



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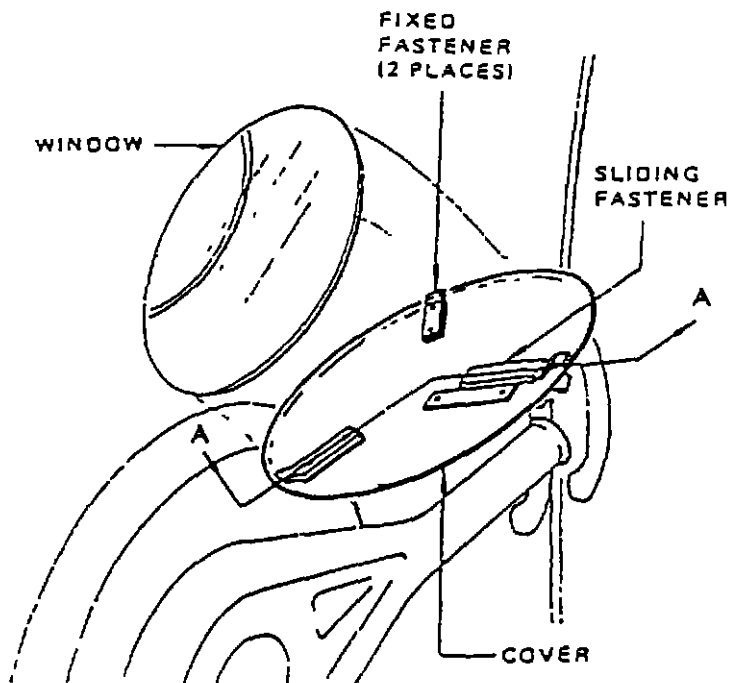
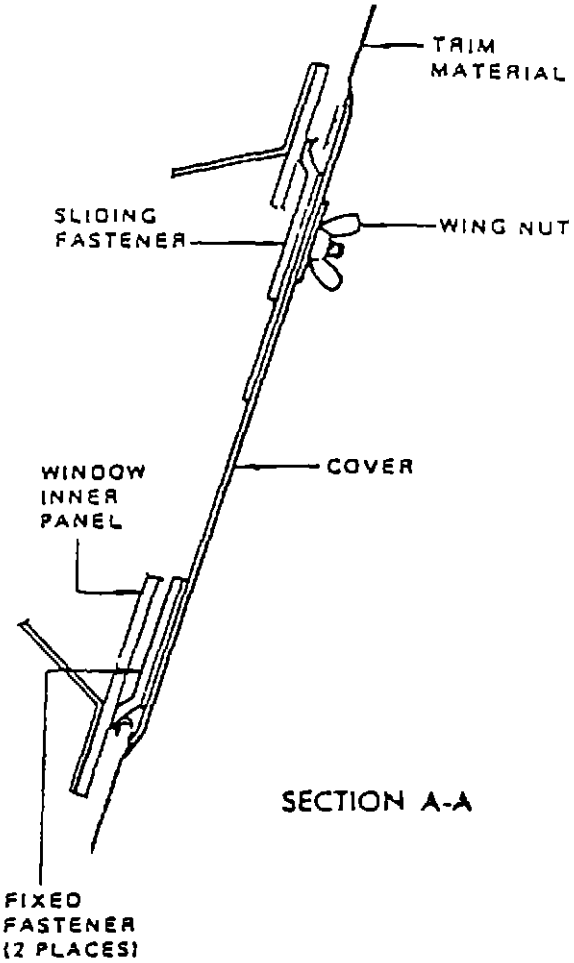
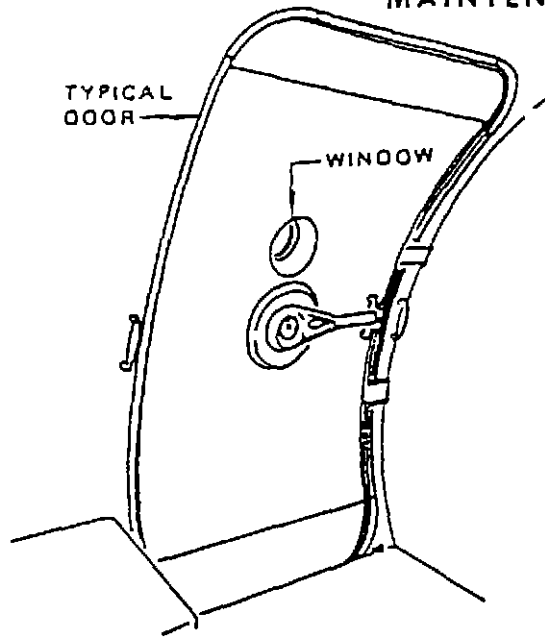
- 8) Portable water compressor and equipment cooling blower
 - 9) Lavatories A and E portable water valve heaters and toilet flush motors
 - 10) Lavatory mirror lights
 - 11) Aft main cargo compartment outlets
 - 12) Passenger and crew call
 - 13) Galley relays
 - 14) Lavatory dome lights
 - 15) No smoking (3 places)
 - 16) Return to seat (3 places)
 - 17) Fasten seat belt (3 places)
 - 18)* Attendant reading and art-boarding
 - 19)* Lavatory signs
 - 20) Passenger reading lights (Sta 1260 LH) or main cargo floodlights
- (b) On external power unit:
- 1)* Lavatory lights
- (16) A system of floodlights provide illumination of the cabin when it is in a cargo configuration. When the cabin is in a combined passenger/cargo configuration the cargo floodlights aft of the dividing partition should be switched off. Refer to Chapter 33, Passenger Cabin Lighting.
- (17) The 9G palletized cargo system does not need or include the cargo barrier net, but special forward locks may be provided to enable the barrier net to be installed in conjunction with the 9G palletized system if so desired. The cargo barrier net is required for bulk-cargo configurations (in which no cargo system is installed) and must be installed when the main cabin is converted to carry bulk cargo.
- (18) In any cargo carrying configuration a cover must be installed to the window in the forward galley service door. In all-cargo configurations similar covers must also be installed to the windows in the aft galley service door and the aft entry door.



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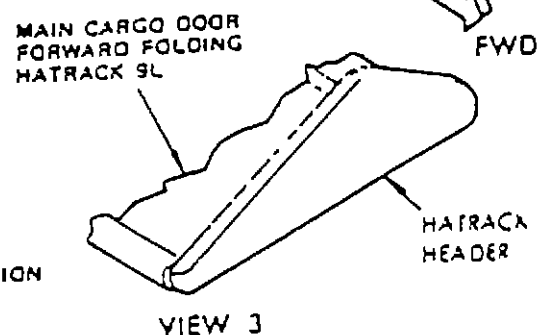
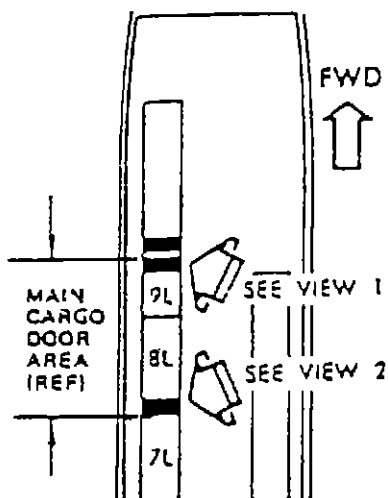
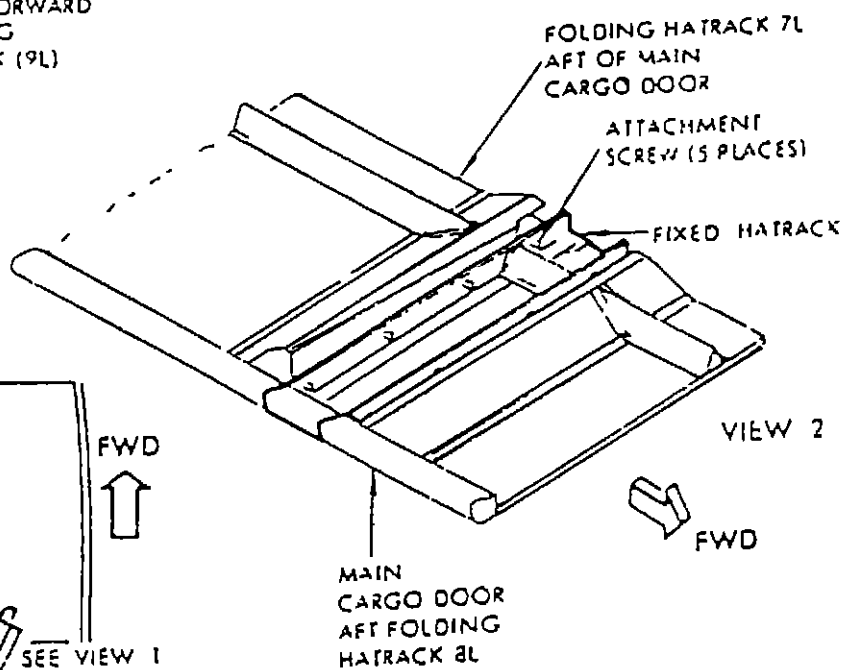
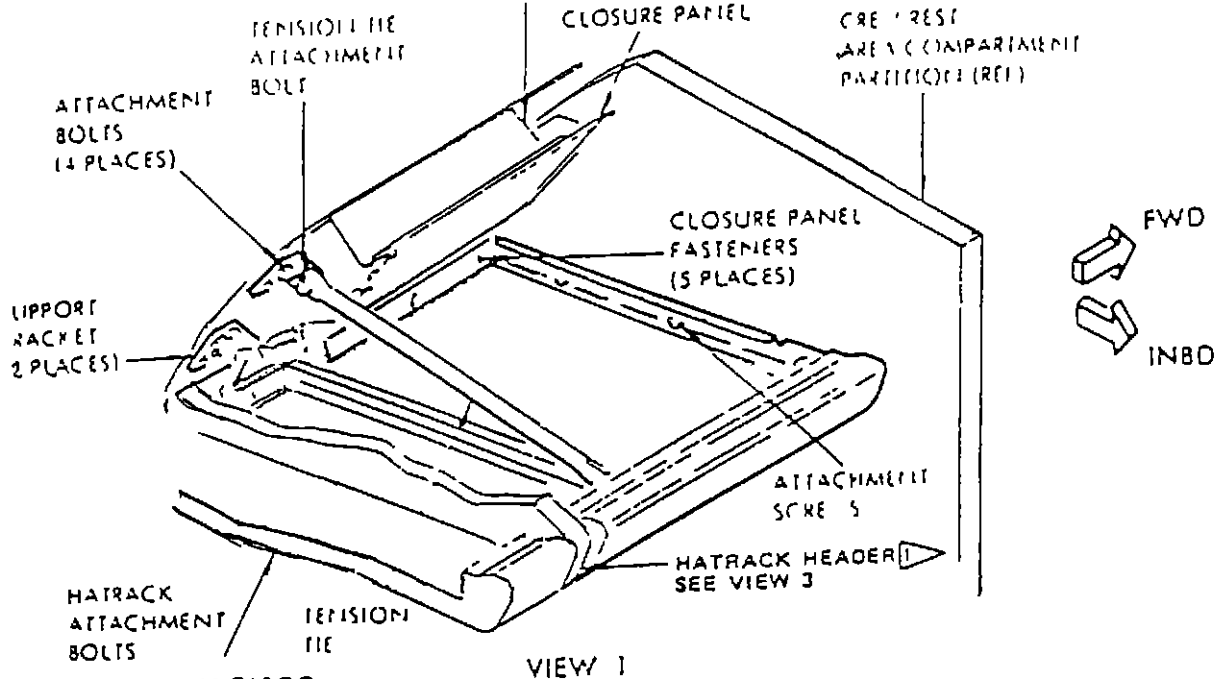
- (a) Install covers to windows on doors (See figure 209)
 - 1) Slacken wing nut and move sliding fastener as far towards center of cover as possible
 - 2) With wing nut aligned approximately vertically and uppermost, position cover over window opening so that both of its lower (fixed) fasteners engage behind edge of trim material.
 - 3) Press cover to door, move sliding fastener upwards to engage trim material and tighten wing nut
- (b) Remove covers from windows on doors. (See figure 209)
 - 1) Slacken wing nut and move sliding fastener down towards center of cover.
 - 2) Tilt top edge of cover inboard and lift cover upwards to disengage lower (fixed) fasteners from trim material around window.
- (19) When the main cargo door area is in any passenger configuration, the following operations must be performed before the door is activated and opened:
 - (a) Unlock passenger seats installed in the main cargo door area, and stand them inboard to give working space.
 - (b) When the cabin is in the VIP passenger configuration, remove the VIP table at the aft end of the cargo door, and the coat closet installation at the forward end Refer to 25-13-23, No. 2 Forward Left Coat Closet.
 - (c) Remove fairing (bullnose) across aft end of the forward lowered ceiling compartment. Refer to 25-10-23, Forward Lowered Ceiling.
 - (d) Remove fixed hatrack at aft end of aft main cargo door folding hatrack. (See figure 210 and refer to 25-10-46, Fixed Hatracks.)
 - (e) Remove hatrack header from forward end of forward main cargo door folding hatrack. (See figure 210 and refer to 25-10-48, Headers.)
 - (f) Fold (or remove) hatracks on main cargo door to cargo configuration position. Refer to 25-10-42, Folding Hatracks.

NOTE. As an optional alternative to folding down these hatracks, they may be removed and substituted by sidewall protector panels. Refer to paragraph 10, Conversion Options.



Door Window Cover Installation
Figure 209

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REMOVED IN THE VIP CONFIGURATION TO ENABLE INSTALLATION OF THE NO 2 FWD LEFT COAT CLOSET



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(g) Remove rain cargo door area gap covers. (See figure 211.)

1) Remove cove gap covers.

a) Pull cove gap cover inboard at upper end and swing downwards until lower end disengages from the cove structure.

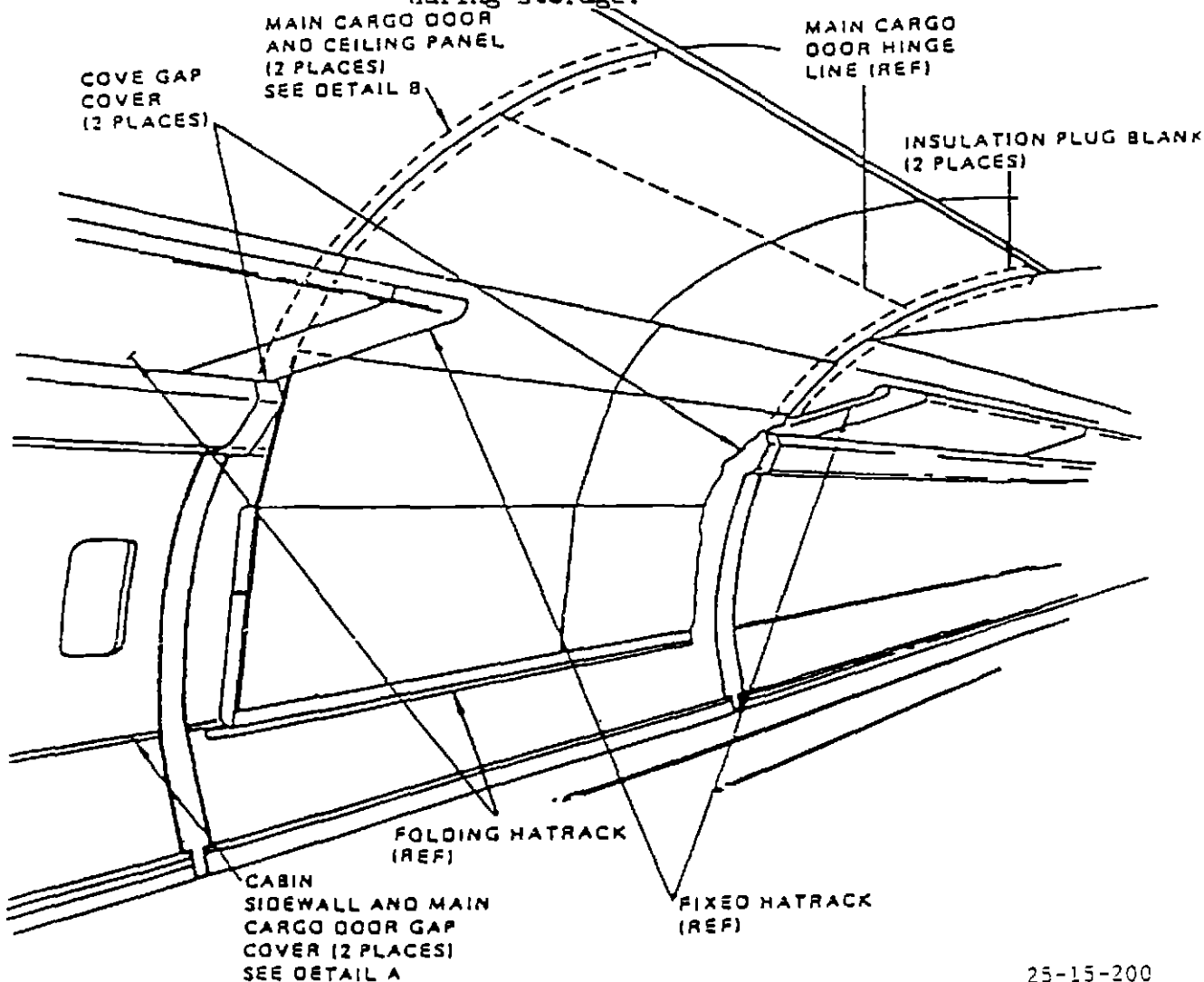
2) Remove cabin sidewall and main cargo door gap covers.

a) Open hatrack upper stowage support and remove screw attaching cover.

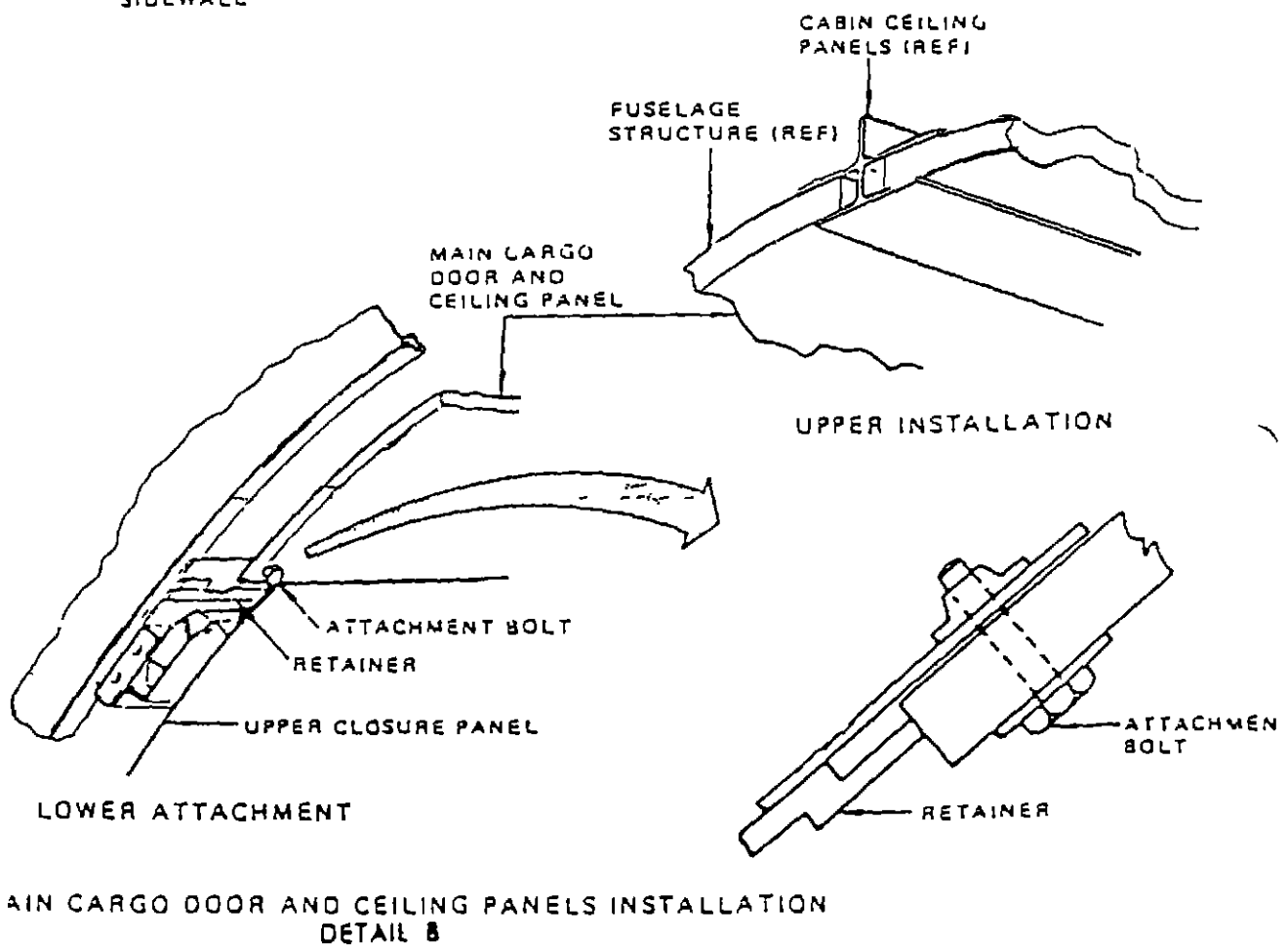
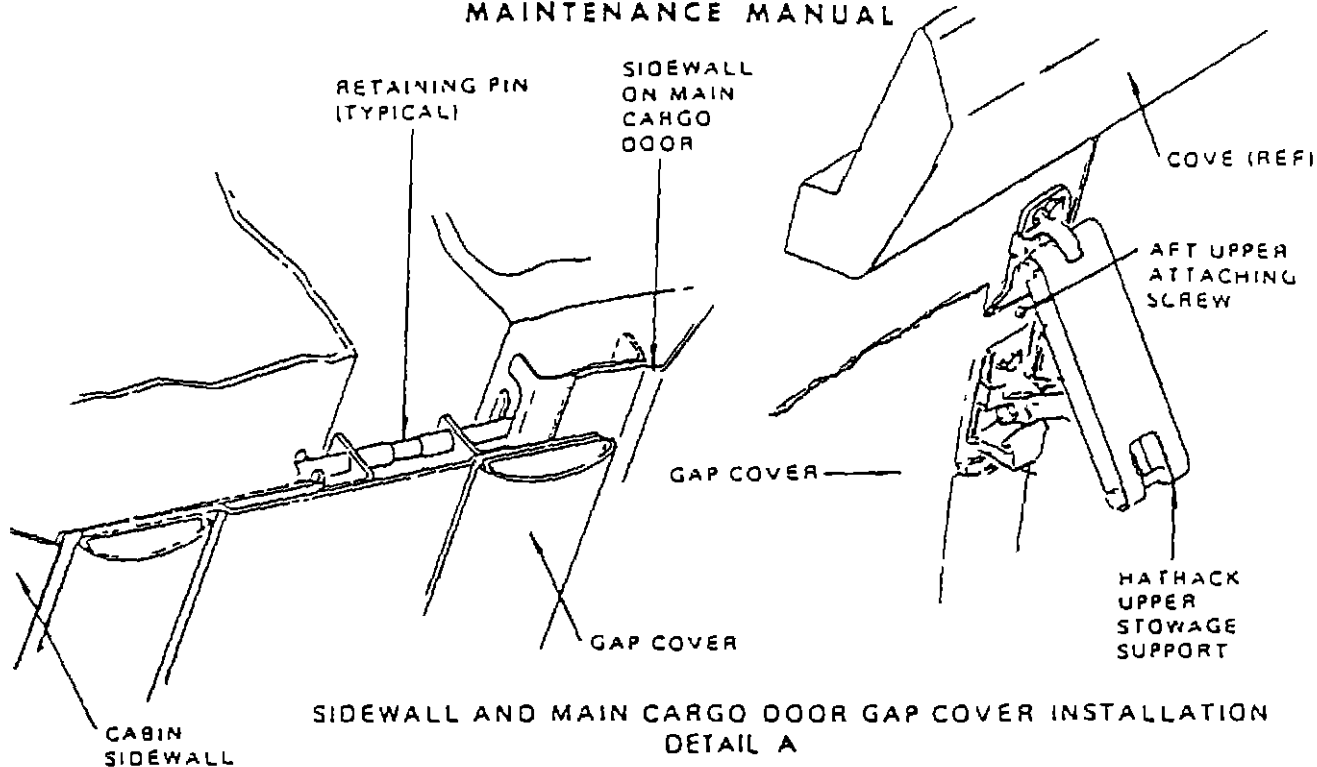
b) Push and slide cover up until retaining pins disengage from cabin sidewall and cargo door trim and cover is free.

c) Close hatrack upper stowage support.

NOTE: The covers should be wrapped to avoid damage during storage.



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- (h) Remove ceiling panels at main cargo door. (See figure 211.)
 - 1) Remove bolts attaching lower edge to main cargo door.
 - 2) Push panels up to clear lower retaining strips and allow panels to drop clear of slots in ceiling structure retaining upper edges.
 - 3) Remove insulation plugs from gaps between upper portion of main cargo door and cabin ceiling.

- (i) Install main cargo door cove end caps.

- 1) Partially open main cargo door.
 - a) Refer to Chapter 52, Main Cargo Door.

WARNING: CHECK THAT NO PERSONNEL OR EQUIPMENT IS IN DANGER OF FALLING WHEN MAIN CARGO DOOR IS OPENED. PROTECT PERSONNEL FROM POSSIBLE INJURY IN COMPLIANCE WITH THE FOLLOWING STEPS:

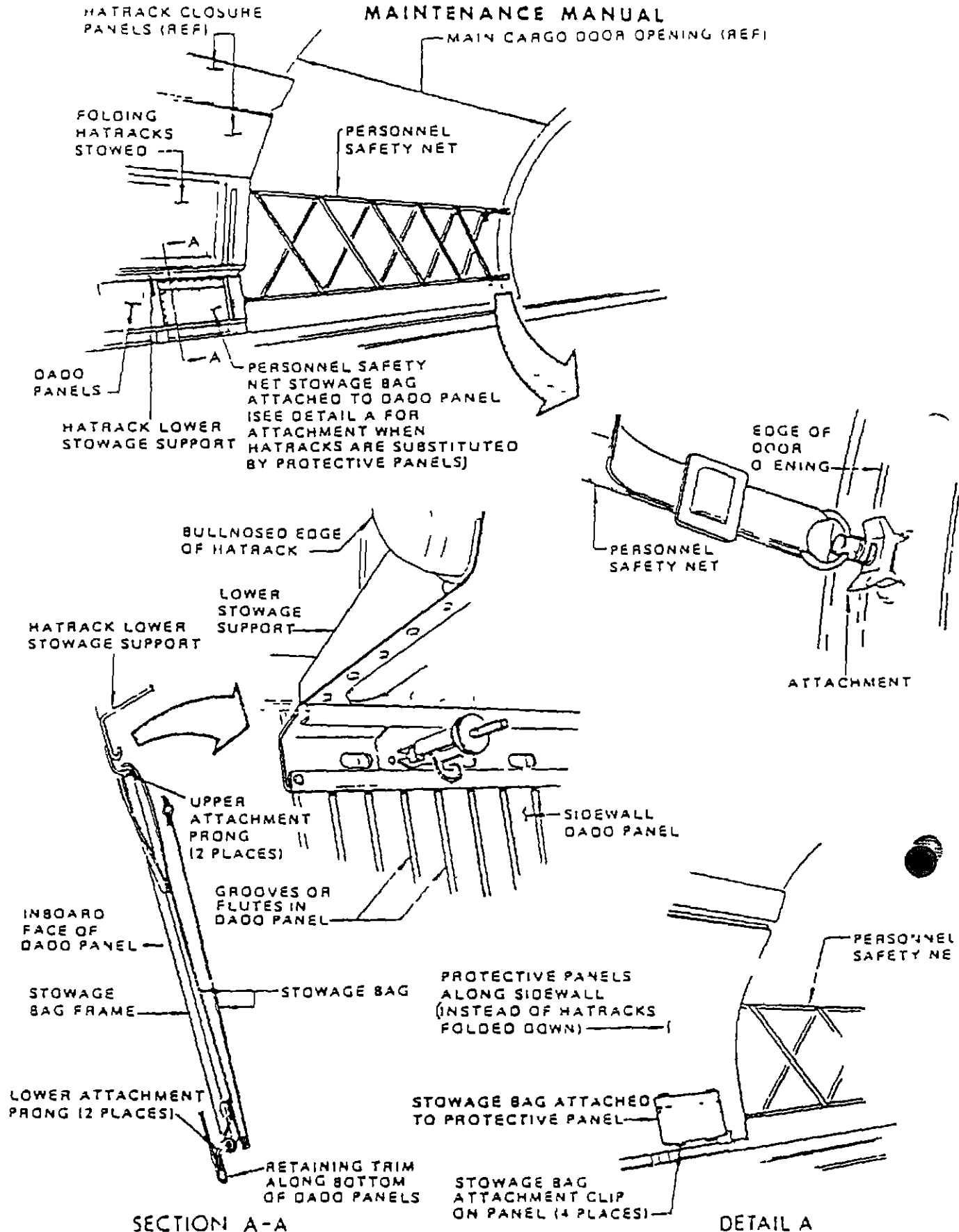
- (b) Install personnel safety net and stowage bag. (See figure 212.)

NOTE: The personnel safety net should be installed across door opening whenever door is open and not being used for loading. The net is attached by two spring-loaded clips to fittings at each end of door opening.

- 1) If folding hatracks are stowed, install stowage bag to dado panel by engaging its two upper attachment prongs under hatrack lower stowage support, aligning prongs with grooves, or flutes, in dado panel. Push upwards, engage lower attachment prongs of bag frame in retaining strip along bottom of dado panel and allow frame to drop into position.
 - 2) If folding hatracks have been removed and substituted by sidewall protective panels, engage upper and lower attachment prongs of stowage bag frame in appropriate fittings attached to panel.

- (c) Block main cargo door at its lower edge.
- (d) Install cove end caps. Refer to 25-36-33, Main Cargo Door Protective Covers.
- (e) Remove block from main cargo door.

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- (j) Open main cargo door fully and install hold-open strut. Refer to Chapter 52, Main Cargo Door.

WARNING: CHECK THAT NO PERSONNEL OR EQUIPMENT IS IN DANGER OF FALLING WHEN MAIN CARGO DOOR IS OPENED.

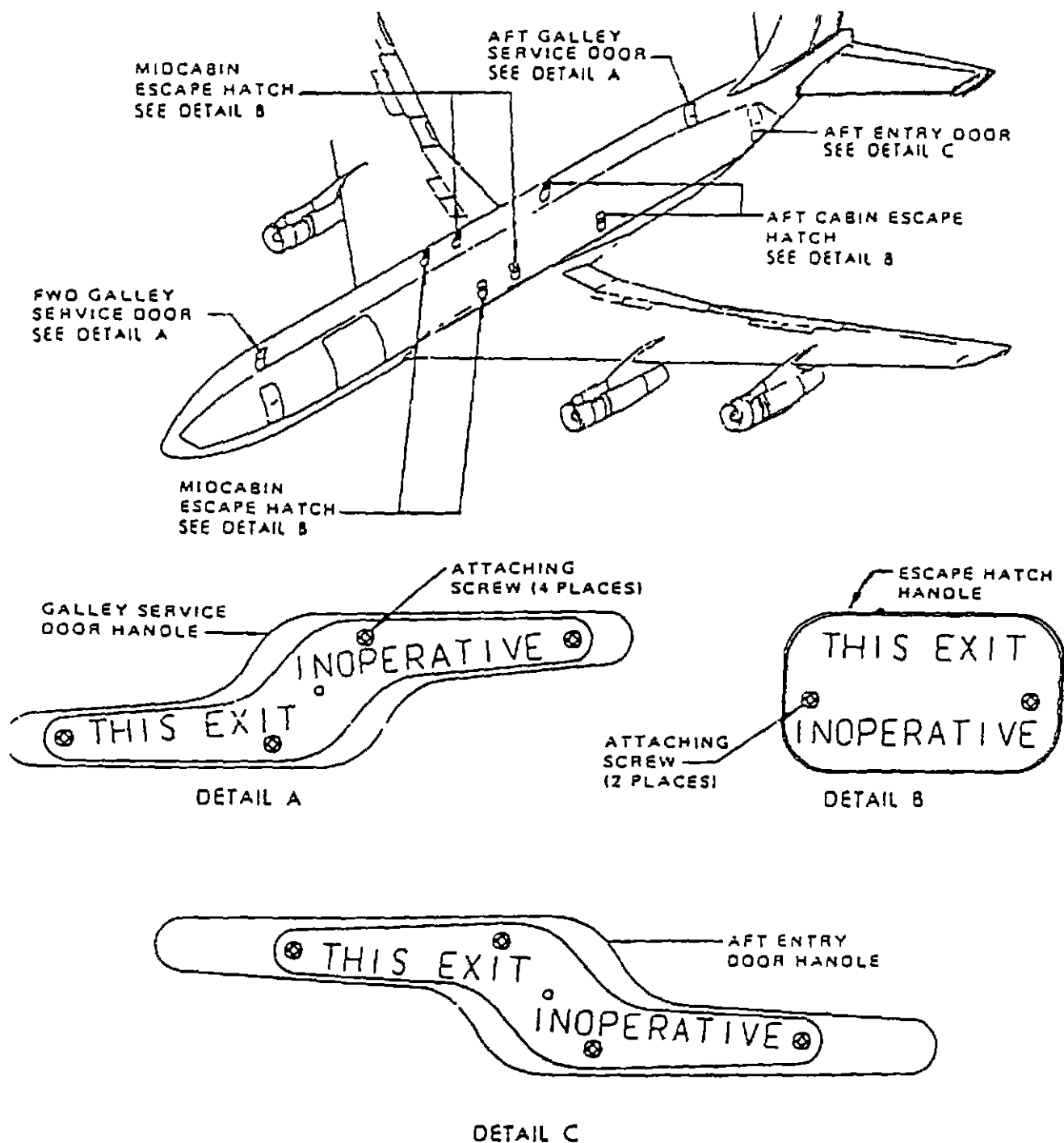
- (k) If no other facilities are available to facilitate movement of cargo pallets through the main cargo door opening without damage to the main cargo door sill, install main cargo door threshold assemblies. Refer to 25-36-191, Main Cargo Door Threshold.

CAUTION. IF INSTALLED, THE THRESHOLDS ASSEMBLIES MUST BE REMOVED BEFORE THE MAIN CARGO DOOR IS CLOSED.

- (l) After cargo is loaded, the main cargo door hold-open strut must be removed (before the main cargo door is closed) and stowed in its container attached to the forward left cabin sidewall protector panels, or to the short section of the forward dividing partitions. (See figure 208.) For main cargo door hold-open strut removal/installation information, refer to Chapter 52, Main Cargo Door.
- (20) When converting to or from cabin configurations which require removal/installation or relocation of passenger seats, refer to figure 2, in the description and operation pages of this section for seat arrangement, location and spacing. For seat installation limitations, refer to 25-15-100, Passenger Cabin Conversion Limitations. The floor track covers installed between seats should be stowed in one of the seat magazine pockets. For seat removal/installation information, refer to 25-11-0, Seats.
- (21) Escape Slides and Placards
 - (a) In the combined passenger/cargo cabin configurations (and in the all-passenger configurations, when complying with requirements in 25-15-100, Passenger Cabin Conversion Limitations) floor-mounted escape slides are installed adjacent to the aft cabin emergency escape hatches and the escape hatches activated.
 - (b) The midcabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their location.
 - 1) Activation of emergency escape hatches.
 - a) Slide blank decal plate from its holder above hatch window, reverse and slide into holder so that its lettering is legible.

- b) Unclip and remove opaque cover of hatch illumination light and install equivalent translucent cover to light.
 - c) Remove THIS EXIT INOPERATIVE placard from escape hatch external handle. (See figure 213.)
 - 1 Remove two screws attaching placard to handle.
 - 2 Remove placard.
 - 3 Reinstall screws in handle.
 - d) At the aft cabin emergency escape hatches only, install floor-mounted escape slides. Refer to 25-1-27, Floor-Mounted Escape Slides.
- 2) Deactivation of emergency escape hatches.
- a) Install THIS EXIT INOPERATIVE placard in escape hatch external handle. (See figure 213.)
 - 1 Remove screws in handle.
 - 2 Install placard.
 - 3 Reinstall screws to attach placard to handle.
 - b) Unclip and remove translucent cover from hatch illumination light and install opaque cover.
 - c) Slide decal plate from its holder above hatch window, reverse and slide plate into holder so that its blank side is shown.
 - d) At the aft cabin emergency escape hatches only, remove floor-mounted escape slides. Refer to 25-1-27, Floor-Mounted Escape Slides.

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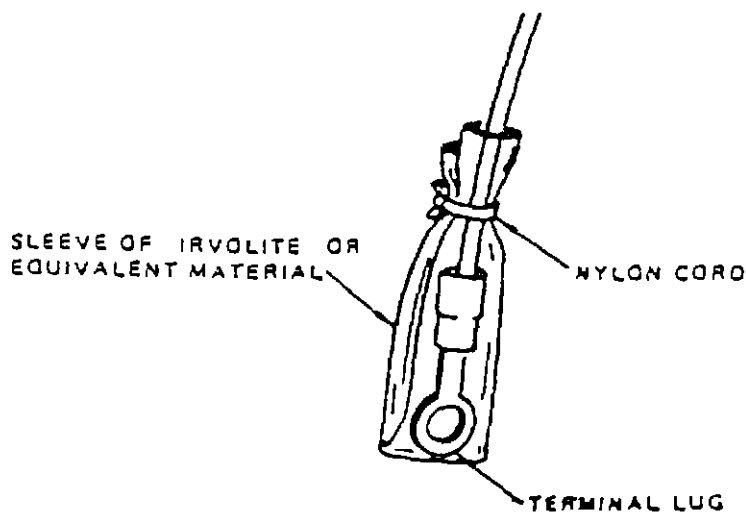


Exterior Door and Hatch Placard Installation
Figure 213



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- (e) When the main cabin is in any all-cargo configuration, a placard indicating that the aft entry door and both galley service doors are inoperative for emergency exit must be installed (See figure 213.)
- (22) When converting to any cargo configuration requiring removal of any lavatory, after toilet tanks are removed, plugs must be installed in the floor drain lines. For lavatory removal/installation information, refer to 25-18-42, Lavatory Compartments
- (23) The cover on lavatory E electrical service box must be reversed prior to each installation to expose service connections, and after each removal to cover the service connections.
- (24) When converting to any all-cargo configuration the aft lavatories C and D electrical power must be deactivated.
- (a) Open circuit breakers in accordance with paragraph (17).
- (b) Disconnect electrical wiring from equipment in sink cabinet areas of lavatories C and D.
- 1) In lavatory A terminal box (below washbasin) disconnect wire L352G18V from terminal No. 13. Insulate the end of this wire by sliding the terminal lug inside a sleeve (of Irvolute or equivalent material), then folding the sleeve back and tying with nylon cord, as shown in figure 214. When thus properly insulated the disconnected wire should be securely stowed by taping so that it will not chafe any adjacent wiring.
 - 2) On aft attendant's control panel disconnect wire H31W20 from terminal 42 of relay R47. Insulate and securely stow this wire in same manner as those in preceding paragraphs.
 - 3) On circuit breaker panel (P7) disconnect wire L30W20V from circuit breaker identified as LAV SIGNS. Insulate wire and stow per instructions in (a).





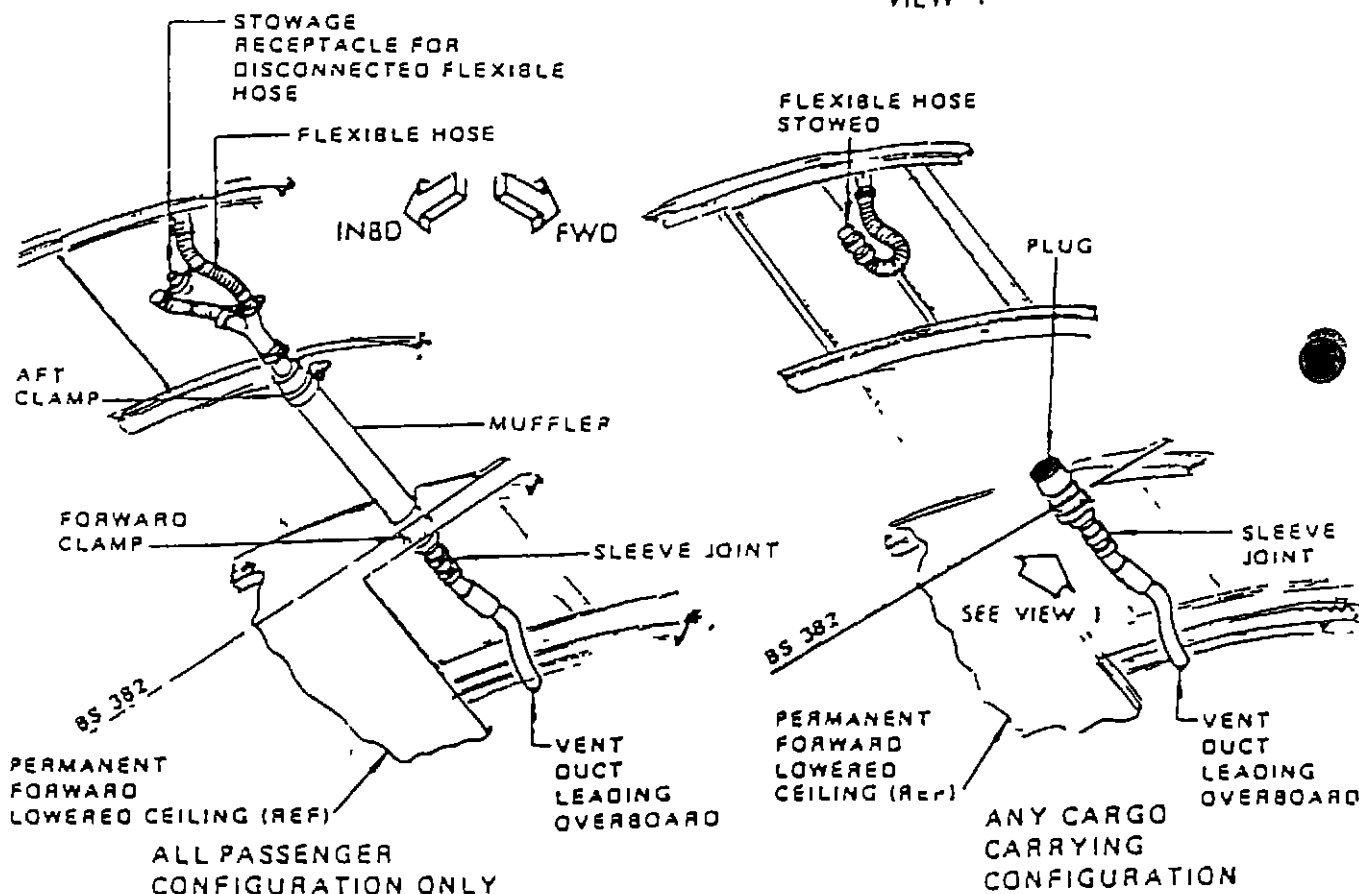
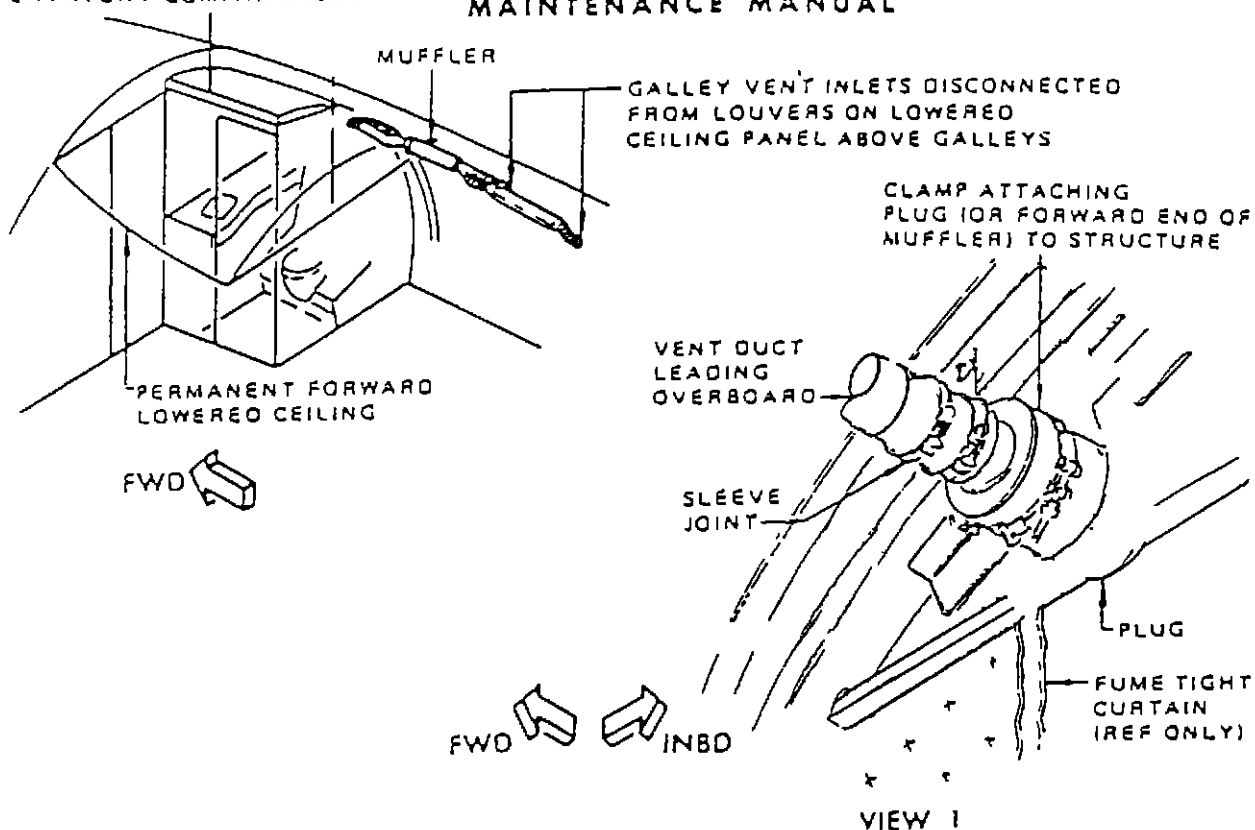
- (25) After removal of the main galleys, or prior to their installation, the galley vent systems must be converted.
- (a) After removal of the forward main galleys, convert galley/ vent system. (See figure 215.)
- 1) Remove ceiling panel from that portion of permanent forward lowered ceiling under which lavatory "B" stood before its removal.
 - 2) Remove muffler.
 - a) Disconnect No. 2 galley flexible vent duct at its connection with Y-duct aft of muffler. Install disconnected end of flexible duct to adjacent storage receptacle.
 - b) Slacken clamp securing forward end of muffler to structure.
 - c) Slacken sleeve joint connecting forward end of muffler to vent ducting.
 - d) Disconnect clamp at aft end of muffler from structure and withdraw muffler aft to disengage it from its forward clamp and sleeve joint.
- NOTE: Muffler may be removed in this manner complete with Y-duct connected to its aft end, and the flexible duct from the No. 1 galley vent still connected to its branch of this Y-duct.
- 3) Install plug.

NOTE: This "plug" is designed to admit air to the vent system and should not be substituted by any other kind of plug which would seal the vent system.

 - a) Insert forward end of plug through gap in end face of permanent forward lowered ceiling, through clamp which secured forward end of muffler, and into sleeve joint of vent ducting.
 - b) Tighten clamps of sleeve joint and tighten clamp attaching plug to structure, applying a torque of between 10 and 20 pound-inches.
 - 4) Reinstall ceiling panel.

LAVATORY COMPARTMENT A

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(b) Before installing the forward main galleys, convert forward galley vent system. (See figure 215.)

- 1) Remove ceiling panel under which lavatory "B" will be installed.
- 2) Remove plug by slackening support clamp and sleeve joint and withdrawing plug aft.
- 3) Install muffler.

NOTE. The muffler should be complete with its aft support clamp, the Y-duct connected to its aft end and the flexible duct for No. 1 galley vent connected to its branch of the Y-duct.

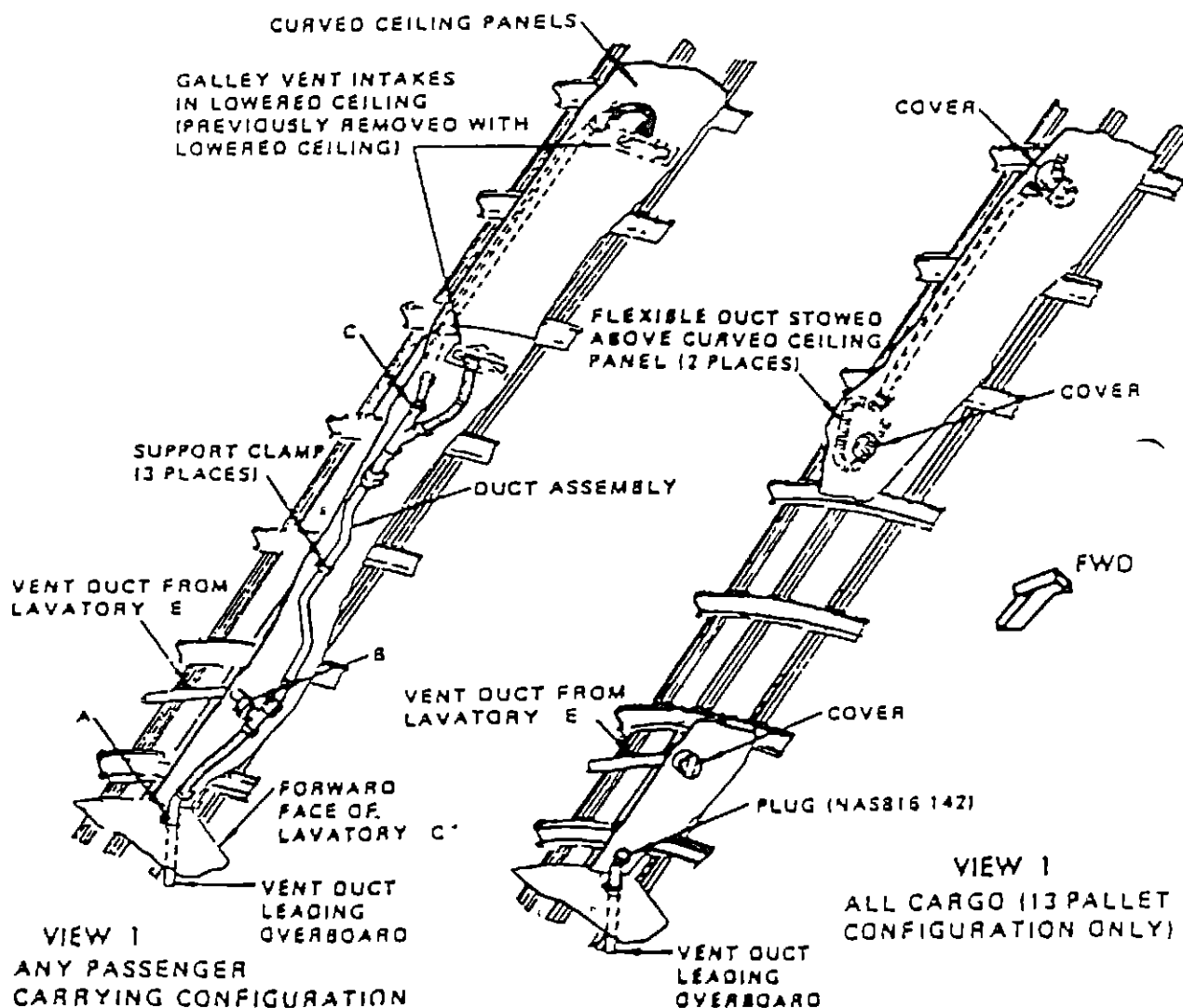
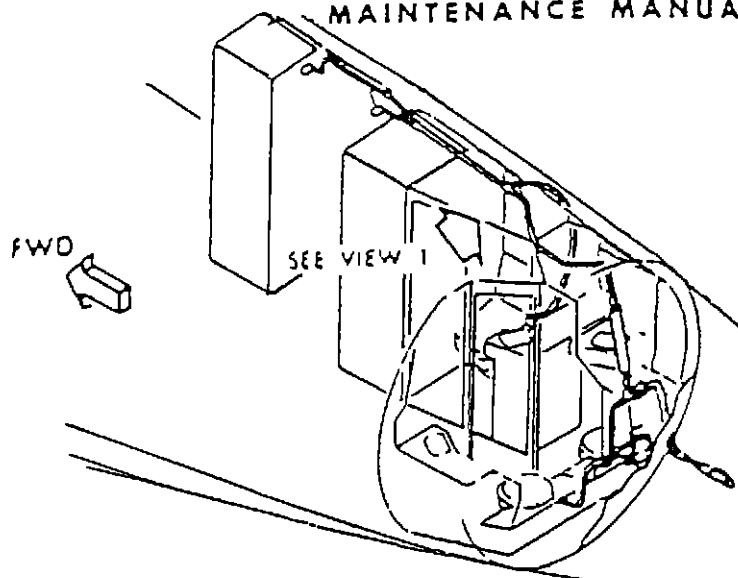
- a) Insert forward end of muffler through gap in end face of permanent forward lowered ceiling, through support clamp and into sleeve joint connecting muffler to vent ducting.
- b) Install support clamp at aft end of muffler to fuselage structure.
- c) Tighten clamps of sleeve joint and tighten forward support clamp, applying a torque of between 10 and 20 pounds-inches.
- d) Disconnect flexible duct from its stowage receptacle and connect to vacant branch of Y-duct.

4) Reinstall ceiling panel.

(c) After removal of aft main galleys, convert galley vent system.

- 1) Slacken duct clamps at points A, B and C. (See figure 216.)
- 2) Remove screws attaching support clamps to overhead structure, and remove duct assembly by disengaging from three ducts connecting to it.
- 3) Stow free ends of flexible ducts by pushing them up through holes in curved ceiling panels, and install covers to holes in ceiling.
- 4) Install cover to hole in curved ceiling panel near aft end of cabin. (Duct which protrudes will be pressed up flush with ceiling by cover.)
- 5) Install plug (NAS816-142) to end of duct protruding through forward face of lavatory C.

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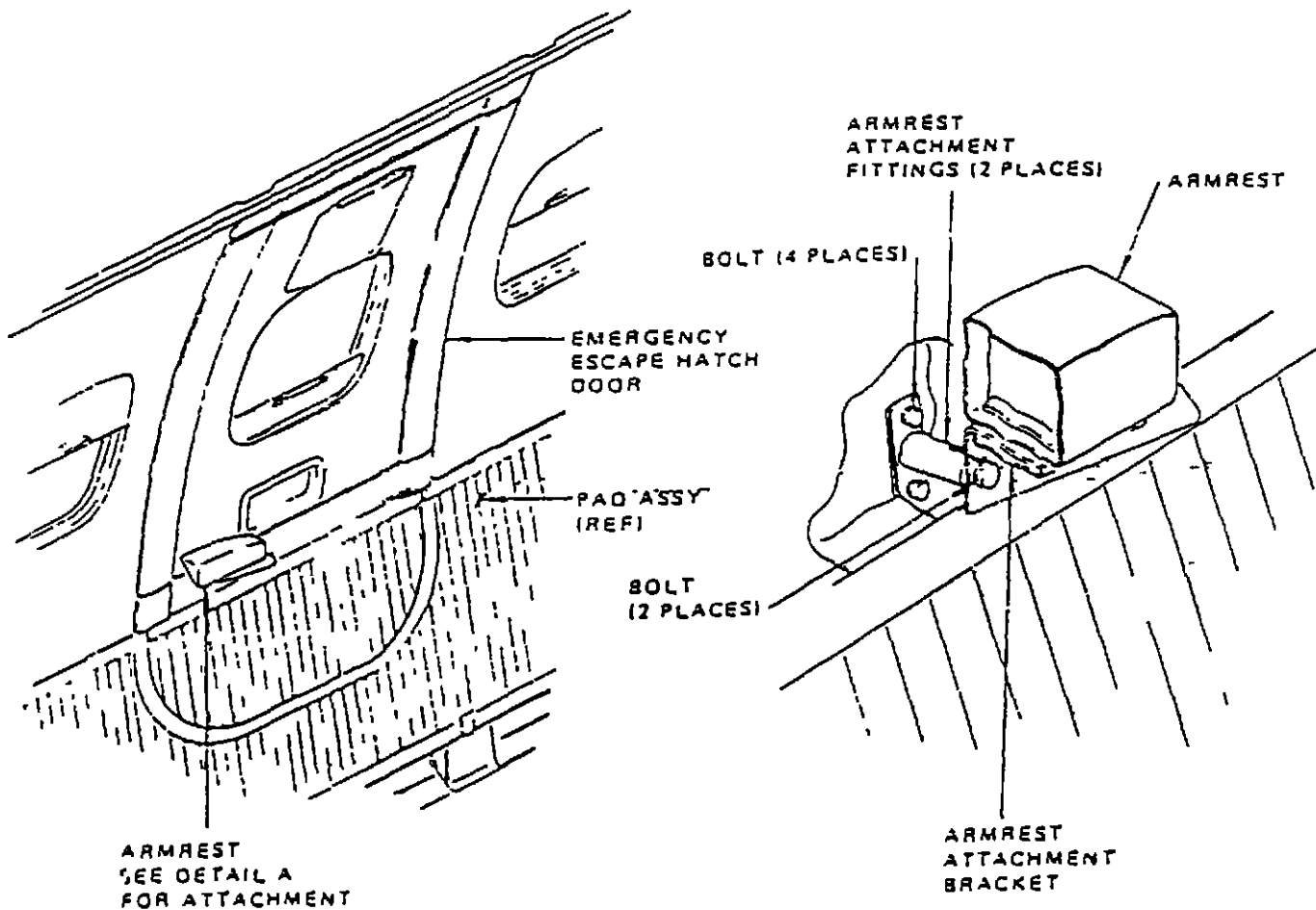
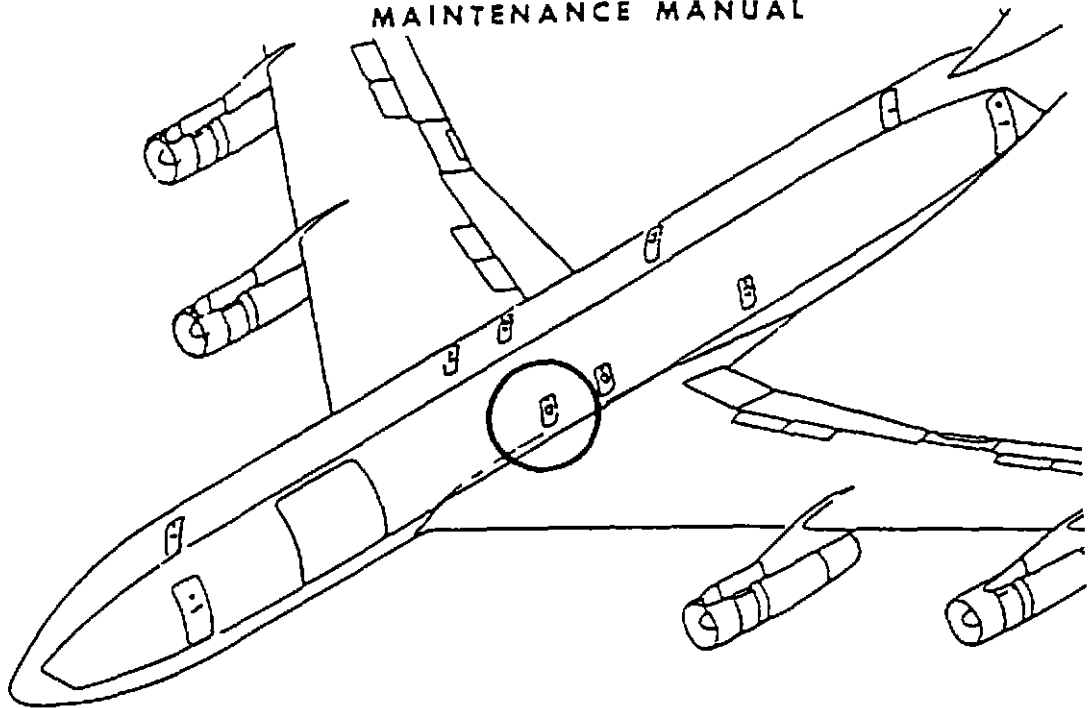
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- (d) Before installing the aft main galleys, convert galley vent system. (See figure 216.)
- 1) Remove plug (NAS816-142) from end of duct protruding through forward face of lavatory "C."
 - 2) Stow all three covers by removing one attachment screw and rotating cover around on other attachment screw until cover is in stowed position marked on curved ceiling panel. (Replace first attachment screw in ceiling, to avoid losing, after cover is stowed.)
 - 3) Withdraw ends of flexible ducts from above curved ceiling panels.
 - 4) Install duct assembly by connecting it to three ducts (A, B and C, figure 216) and installing three support clamps to attach duct assembly to overhead structure.
- (26) When converting to the all-cargo 13 pallet standard configuration, or any of the combined passenger/cargo standard configurations the electrical receptacle cover installed on the upper sidewall above the crew berth is removed by pulling away from the sidewall to release its snap fasteners.
- NOTE:** This cover conceals a group of three electrical receptacles provided to supply electrical power for temperature control (or other similar functions) for the three forward cargo pallets. Power receptacles for cargo pallets installed aft of the No. 3 pallet position are spaced at pallet position intervals above the left side folding hatracks. These are concealed by flexible cover flaps in the (hatrack) upper closure panels.
- (27) When passenger seats are installed parallel with the midcabin emergency escape hatches--special armrests for these seats must be installed to the escape hatch door.
- (a) Install armrests. (See figure 217.)

NOTE: If provisions to install the armrests have not been made, remove pad assembly at bottom of escape hatch doors, install armrest attachment fittings to existing gang-channel nuts, and reinstall pad assembly. Two holes must be provided in each pad assembly to allow installation of the armrests. Trim plugs must be provided to cover holes in the pad assembly when the armrests are not required.

- 1) Remove trim plugs from panel assembly at bottom of escape hatch doors.
 - 2) Install armrests by installing bolts in armrest attachment bracket to pick up and secure to the armrest attachment fittings.
- (b) Remove armrests. (See figure 217)
- 1) Remove bolts securing armrest attachment bracket to door, remove armrest, and install trim plugs in holes in door panel
- (28) When the aft life raft stowage compartment of the forward lowered ceiling compartment is not accessible because of the installation of the forward dividing partitions or when the aisle curtain track is installed, a blank sign must be installed to the compartment door handle.
- (29) The barrier cargo net installation is optional in the 90 palletized cargo configurations, but must be installed in bulk-cargo configurations. Portions of cabin sidewall and cove require removal to enable installation of the cargo barrier net.
- (a) Remove portions of cabin sidewall and cove.
- 1) Remove three ceiling panel covers
- NOTE: These covers are retained in the ceiling panel by spring clips.
- 2) Remove decorative trim strip from retainer at upper edge of window panel.
- NOTE: The decorative trim strip is a snap-on installation, use interior trim remover tool F70033 or equivalent to remove.
- 3) Remove screws attaching the decorative trim strip retainer and remove retainer.
 - 4) Remove cover closing cutout in upper edge of same window panel.
- NOTE: This cover is secured by a pair of serrated studs engaging spring clips behind the panel. Remove cover by pulling inboard.
- 5) Remove covers above and below window, by pulling them inboard (Same attachments as those described in step 4)

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Typical Armrest Installation on Emergency
Escape Hatch Door
Figure 217

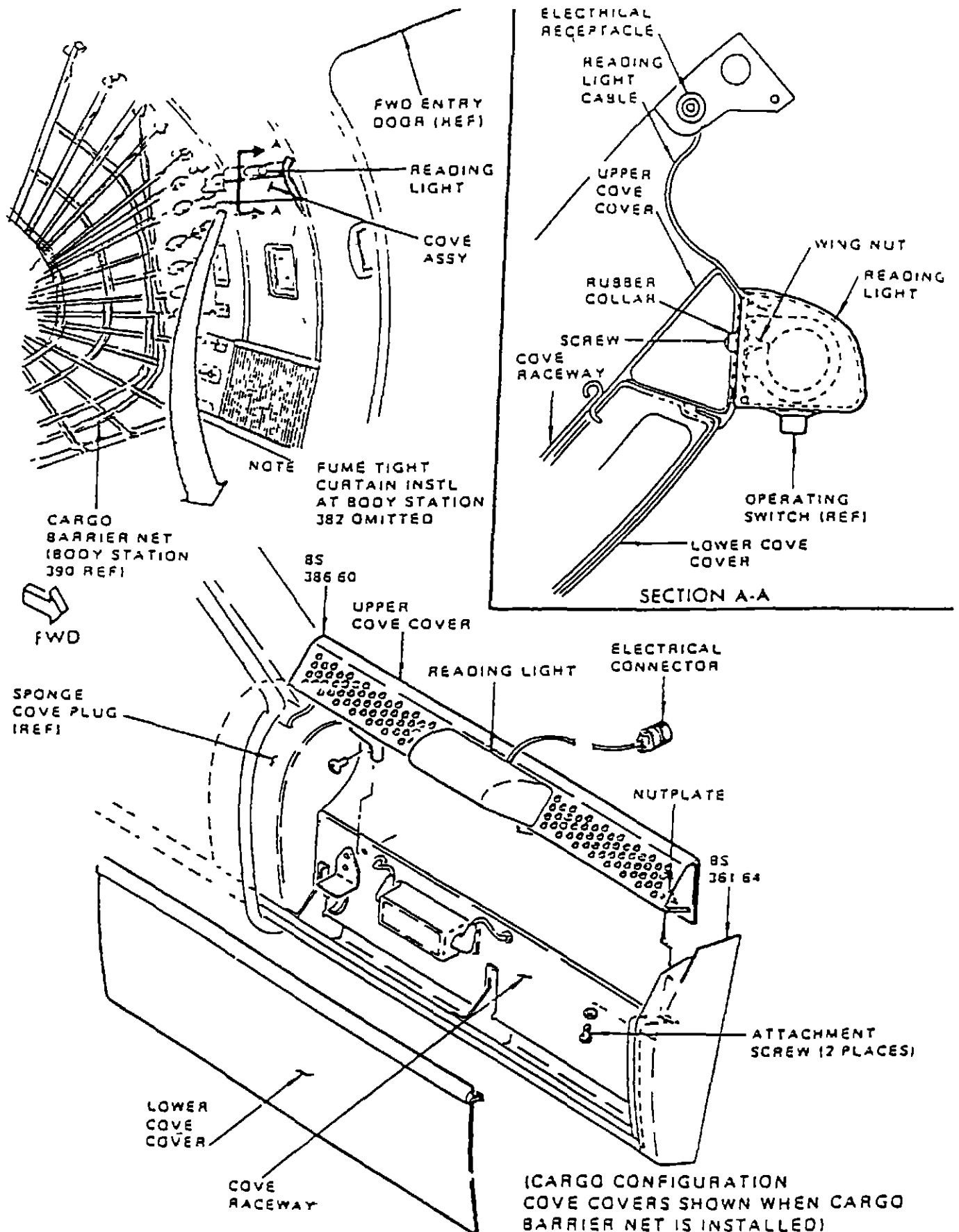
- 6) Remove portion of dado panel
 - a) Remove section of trim strip immediately below window by pulling it inboard
 - b) Pull exposed upper edge of dado panel inboard and lift panel clear of air grille stiffener which retains its lower edge
 - 7) Remove passenger configuration cove covers (See figure 218.)
 - a) Remove lower cove cover by pulling inboard at trim molding at cover until cover is free, then lift cover out of the lower support slot.
 - b) Remove fluorescent lamp to avoid possible breakage when installing the barrier net.
 - c) Remove screws attaching upper cove cover to the cove raceway and remove cover.
 - 8) Install cargo barrier net. Refer to 25-36-41, Barrier Net.
- (b) Install portions of cabin sidewall and cove.
- NOTE. These portions of cabin sidewall require installation only when converting from any cargo configuration in which the cargo barrier net was installed.
- 1) Install section of dado panel by engaging its lower edge with the air grille stiffener and securing its upper edge with section of trim strip.

NOTE The trim strip is installed by inserting the studs on its inboard surface into the holes on the lower edge of the window panel, and pushing outboard.

- 2) Install covers above and below window.

NOTE. These covers are installed by inserting serrated studs on their inboard surfaces into holes in the panels.

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- 3) Install cover to close cutout in upper edge of same window panel. (Same attachment as step 2).)
- 4) Install decorative trim strip retainer along upper edge of window panel by securing with four screws.
- 5) Install decorative trim strip on retainer.
- 6) Install three covers to voids in ceiling panel.

NOTE: These covers are retained by spring clips.

- (30) In any cargo configuration without crew rest accommodation a crew reading light is installed to the cabin sidewall cove immediately aft of the forward entry door.

- (a) Install crew reading light. (See figure 218)

NOTE. If the cargo barrier net was not installed, perform steps 2), 3), 4), and 7) only. If barrier net has been installed, perform steps 1) and 3) thru 6) only.

- 1) Install screws attaching cargo configuration upper cove cover to cove raceway. (See figure 218)
- 2) Remove lower cove cover by pulling inboard at trim molding at top of cover until cover is free, then lift cover out of the lower support slot.
- 3) Open reading light cover and attach light to upper cove cover. Use suitable perforations in cove as attachment holes, positioning light so that it will be high enough to allow its cable to lie over top of cove. Attach light to cove with two screws, each with a rubber collar, and secure with wing nuts. Close reading light cover.
- 4) Connect electrical plug of reading light to nearest convenient and unoccupied passenger service unit electrical receptacle.
- 5) Install fluorescent lamp.



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- 6) Install cargo configuration lower cove cover by inserting in lower support slot and pushing cover outboard at top until the spring clips retain cover in place.
- 7) Reinstall lower cove cover by inserting in lower support slot and pushing cover outboard at top until spring clips retain cover in place.

(b) Remove crew reading light. (See Figure 218)

NOTE If the cargo barrier net was not installed, perform steps 1) through 4) only. If cargo barrier net was installed, perform steps 1), 2) 3), 4), 5), and 6).

- 1) Remove lower cove cover by pulling inboard at trim molding at top of cover until cover is free, then lift cover out of lower support slot.
- 2) Disconnect reading light electrical plug from receptacle.
- 3) Open reading light cover, remove screws, rubber collars and wing nuts, and remove reading light from upper cove cover.
- 4) Reinstall lower cove cover.
- 5) Remove screws attaching upper cove cover to cove raceway and remove cover.
- 6) Install passenger configuration upper and lower cove covers.

(30A) In any cargo configuration without crew rest area accommodation, sidewall protector panels are installed on the sidewall forward of the main cargo door. (Refer to 25-36-35, Forward Left Sidewall Protector Panels.) Before these panels can be installed, decorative trim strips and gap covers must be removed from the upper edges of window panels forward of the main cargo door. After removing the sidewall protector panels, when converting to install crew rest area equipment, the decorative trim strips must be installed

(a) Remove two gap covers and decorative trim strips.

- 1) Slide gap covers off ends of the decorative trim strips
- 2) Remove the snap-on decorative trim strips using interior trim remover tool F70033 or equivalent

(b) Install two decorative trim strips and gap covers.

- 1) Install decorative trim strips by snapping onto retainers
- 2) Slide gap covers onto decorative strips to cover gaps.



- (31) When the forward main cabin area is in any cargo configuration or the litter accommodation configuration and is not converted to passenger accommodation, the following operations must be performed (after all passenger accommodation equipment has been brought into the cabin) to convert the main cargo door to passenger accommodation configuration

NOTE It is assumed that the main cargo door is open and the main cargo door hold-open strut installed (in accordance with Chapter 52, Main Cargo Door) the cargo removal and the personnel safety net installed. Also that the threshold assemblies may remain installed to enable movement of equipment through the main cargo door opening

- (a) Remove protective covers from edges of main cargo doorway
Refer to 25-36-33, Main Cargo Door Protective Covers



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- (b) Remove main cargo door hold-open strut. Refer to Chapter 52, Main Cargo Door.
- (c) If installed, remove the main cargo door threshold assemblies. Refer to 25-36-191, Main Cargo Door Threshold.
- (d) Remove personnel safety net. (See figure 212)
 - 1) Disconnect net from door opening by pulling attachment away from edge of door opening and lifting clear of fitting.
- (e) Remove main cargo door cove end caps.
 - 1) Partially close main cargo door. Refer to Chapter 52, Main Cargo Door.

WARNING BEFORE CLOSING DOOR IT IS ESSENTIAL TO ASCERTAIN THAT ALL PERSONNEL AND EQUIPMENT ARE CLEAR OF PATH TO BE SWEEPED BY CLOSING DOOR. BEFORE REMOVAL OF COVE END CAPS, PERSONNEL SHOULD BE PROTECTED BY BLOCKING DOOR OPEN ALONG ITS LOWER EDGE.

- 2) Install block at lower edge of main cargo door.
- 3) Remove cove end caps from both ends of door. Refer to 25-36-33, Main Cargo Doorway Protective Covers.
- 4) Remove block.
- 5) Close main cargo door fully. Refer to Chapter 52, Main Cargo Door.
- (f) If installed, remove sidewall protector panels from main cargo door. Refer to 25-36-32, Cabin Sidewall Protector Panels.
- (g) Install main cargo door and ceiling panels. (See figure 211.)
 - 1) Install insulation plugs at forward and aft end of upper portion of the main cargo door.
 - 2) Push panels into ceiling structure retaining slots and lower retaining strips.
 - 3) Install bolts in lower edge of panels and secure to main cargo door.

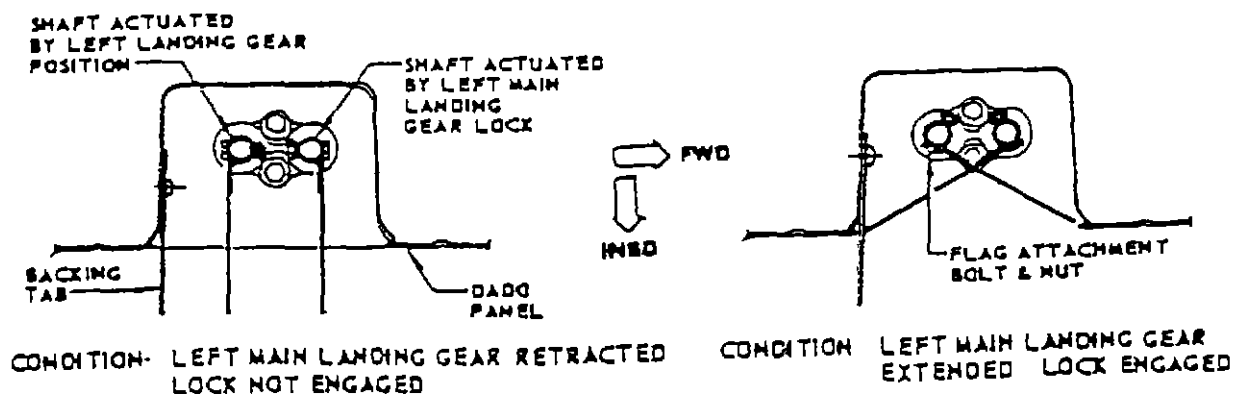
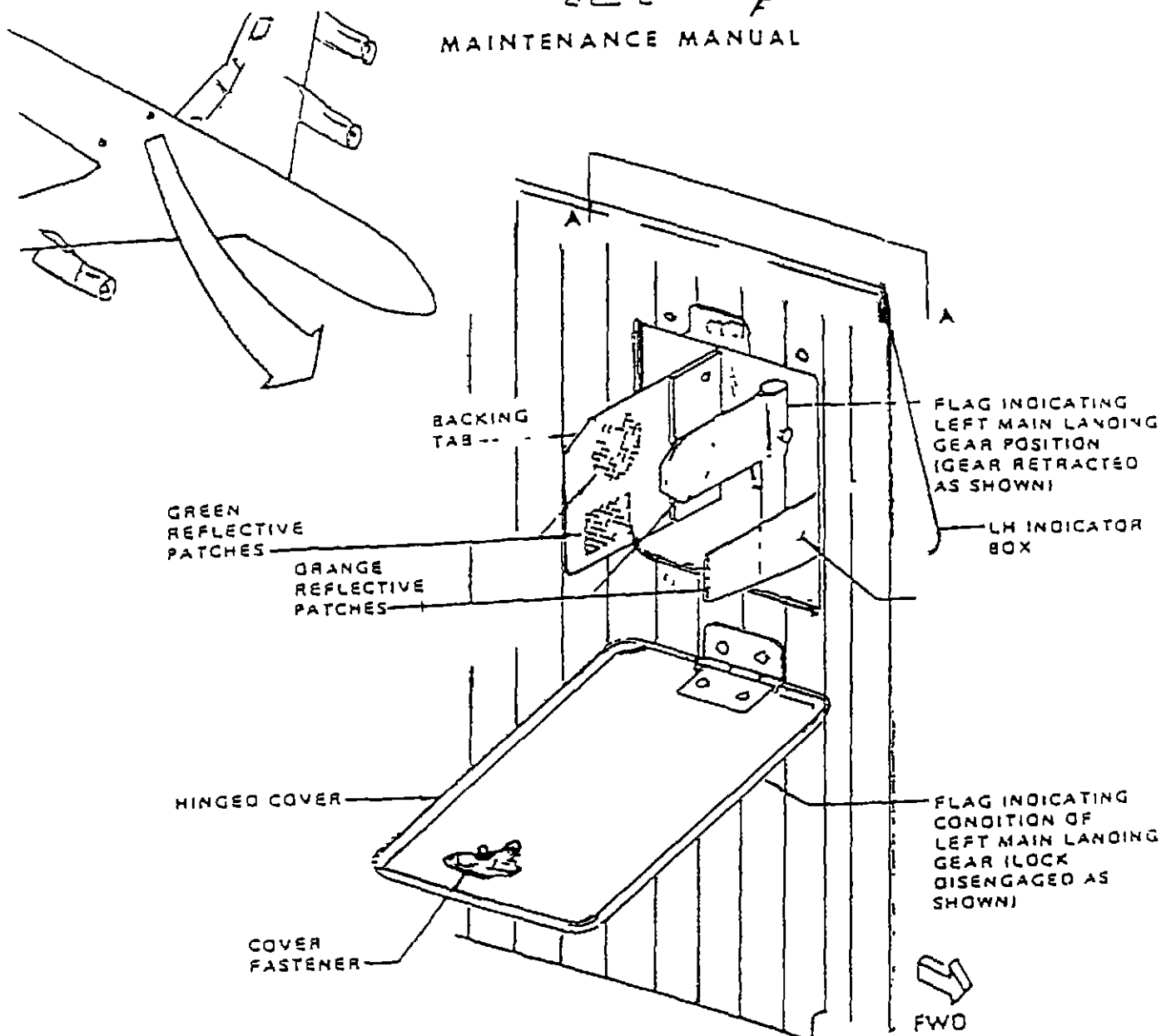
(h) Install main cargo door area gap covers (See figure 211)

- 1) Install cabin sidewall and main cargo door gap covers.
 - a) Open hatrack upper storage support
 - b) Position cover over gap and push cover down until the retaining pins enter cutouts in the cabin sidewall and cargo door trim
 - c) Ensure cover is aligned with cabin sidewall trim and install attaching screw.
 - d) Close hatrack upper storage support.
- 2) Install cove gap covers
 - a) Engage lower end of cove cover in cove structure, swing cover upward, and push into place.

(j2) Activation of the landing gear mechanical indicators is required, when converting to any all-cargo configuration, or when converting to any combined passenger/cargo configuration in which the movable cargo/passenger dividing partition is installed aft of their location.

(a) Activate landing gear mechanical indicators. (See figure 219.)

- 1) Open access covers in dado panel of sidewall on both sides of cabin (ood, station 835).
- 2) Remove adhesive tape securing cotn flags to the inside of the access cover
- 3) Remove bolt from upper end of each shaft and remove reinforcing plate screwed to aft end of box.
- 4) Install flags on shafts. (Position each flag with its reflecting surface facing forward.)



SECTIONS A-A

Landing Gear Mechanical Indicators
Figure 219

- (33) Deactivation of the landing gear mechanical indicators is required when converting from any all-cargo configuration to any all-passenger configuration; or to the litter accommodation configuration, or when converting between any of the combined passenger/cargo configurations, which will require relocation of the movable cargo/passenger dividing partition from a location aft of the indicators, to a location forward of the indicators.
- (a) Deactivate landing gear indicating system (See figure 219)
- 1) Remove bolts attaching flags to shafts, remove flags and attach them to the inside face of the access cover with adhesive tape.
 - 2) Reinstall reinforcing plate and bolts to their shafts.
 - 3) Close access cover of each indicator
- (34) When converting from any all-cargo configuration the aft lavatories C and D electrical power must be connected.
- (a) Connect electrical wiring to all equipment in sink cabinet areas of lavatories C and D.
- 1) In lavatory A terminal box (below washbasin) remove insulation from end of wire L352G18V and connect it to terminal No. 13.
 - 2) On aft attendant's control panel, remove insulation from the end of wire M31U20 and connect it to terminal A2 of relay R47.
 - 3) On circuit breaker-panel (P7) remove insulation from wire L30A20V and connect to circuit breaker identified as LAV SIGNS.
- (35) In any configuration with crew rest accommodation, a boarding assist handle must be attached to the forward face of the forward LH coat closet partition.
- (36) When converting to any configuration without crew rest accommodation, the boarding assist handle attached to the forward LH coat closet partition, must be removed and attached to the cabin sidewall immediately aft of the forward entry door.



8 Preconversion Requirements

A The following applicable preconversion requirements procedures must be performed as the first step in any conversion instruction procedure before any main cabin conversion is commenced.

- (1) Remove the personnel safety net from stowage bag on the main cargo door.

NOTE: This step is applicable only when the main cabin is in a cargo carrying configuration.

- (2) Remove the personnel safety net stowage bag from the cabin sidewall or protector panel aft of the main cargo door.

NOTE: This step is applicable only when the main cabin is to be converted from a cargo carrying configuration to any all-passenger configuration.

- (3) Remove electrical power circuits which will be effected by conversion maintenance by opening applicable circuit breakers listed in paragraph 7.B.(15).

- (4) Depressurize the passenger oxygen system. Refer to Chapter 35, Oxygen Systems

NOTE: This step is applicable only when the main cabin is in any passenger configuration.

- (5) Deactivate the pyrotector main cabin smoke-detector circuit, by disconnecting wires W629A20 and W629B20 from circuit breaker identified as MAIN CABIN and WHEEL WELL on circuit breaker panel F6. Insulate wires as shown in figure 213.

NOTE: This step is applicable only when the main cabin is in any cargo configuration, or the litter accommodation configuration, and is to be converted to any all-passenger configuration.

- (6) Activate the pyrotector main cabin smoke-detector circuit, by removing insulation and connecting wires W629A20 and W629B20 to circuit breaker identified as MAIN CABIN and WHEEL WELL on circuit breaker panel F6.

NOTE: This step is applicable only when the main cabin is in any all-passenger configuration and is to be converted to any cargo configuration, or to the litter accommodation configuration

- (7) Activate the landing gear mechanical indicators in accordance with paragraph 7 B (32).

NOTE This step is applicable only when conversion to any all-cargo configuration is to be performed, or conversion to any combined passenger/cargo configuration which requires installation of the movable cargo/passenger dividing partition aft of the landing gear mechanical indicators location

- (8) Deactivate the landing gear mechanical indicators in accordance with paragraph 7.B (32).

NOTE This is applicable only when conversion from any all-cargo configuration to any all-passenger configuration is to be performed, or conversion to any combined passenger/cargo configuration in which the movable cargo-passenger dividing partition will be installed forward of the landing gear mechanical indicators

- (9) After cargo has been removed from the main cabin (or after conversion has been completed) remove the cargo loading body support strut, and stow strut in the aft lower cargo compartment. Refer to 25-38-0, Cargo Loading Body Support Strut.

NOTE. This step is applicable when converting between cargo accommodation configurations, or when converting from a cargo accommodation configuration to any all-passenger configuration or to the litter accommodation configuration. If desired, the strut may remain installed to stabilize the airplane until the main cabin conversion has been completed

- (10) It is recommended at this time that a brief review of all general conversion operations and information in paragraph 7.B., be completed.

NOTE. These general conversion operations will be referenced for performance as applicable in the conversion instructions, but a brief review at this time will help operators to locate the referenced information more readily, and gain foresight of what the operations in the particular conversion may comprise.



9 Postconversion Requirements

A The following applicable post conversion requirements procedure must be performed as the last step in any conversion instruction procedure before any main cabin conversion is complete

- (1) Verify that all requirements as contained in paragraph 7 B , as applicable to the configuration to which the cabin has been converted to have been performed
 - (a) Smoke detector sensing ports, open or closed as applicable to cabin configuration.
 - (b) Passenger oxygen system, pressurized or depressurized as applicable to cabin configuration
 - (c) Condition of galley vents, cabin air rice ducts and anemostat air outlet damper.
 - (d) Condition of the pyrotector main cabin smoke-detector electrical circuit
 - (e) Condition of lavatories C and D wiring, connected or disconnected, as applicable to cabin configuration
 - (f) Power restored
 - (g) Smoke chute vent cover aft of the crew rest area, installed or removed as applicable to cabin configuration
- (2) Check that electrical and other systems of applicable installed equipment functions correctly
 - (a) Check that all lights, loudspeakers and signs in all lowered ceiling units function correctly
 - (b) Check that electrical services at aft attendant's panel function correctly
 - (c) Check that electrical and water sytems of galleys function correctly

- (d) Check lavatories B, C, D and E as follows
- 1) Check shaver outlets for 115 volt dc and 28 volt dc power
 - 2) Press call switch and check corresponding call lights on forward and aft attendant's control panels
 - 3) Operate toilet flush switch and check flushing operation
 - 4) Check that water heater neon lights (under washbasin) are alight
 - 5) Operate lavatory dome light switch on aft attendant's control panel and check that corresponding lights are alight.
 - 6) Operate Fasten Seat Belts switch on pilot's overhead panel and check that Return to Seat sign is alight.
 - 7) Check that water supply is functioning properly.
- (3) Check passenger service units are located to match seat spacing and adjust as necessary Refer to 25-12-2, Passenger Cabin Service Units.
- (4) Check that passenger service unit oxygen mask doors are latched shut and that no adhesive tape (or other such material) remains which may prevent these doors from opening when activated
- (5) Perform check of the cabin floodlight system as applicable for the cabin conversion and in accordance with Chapter 33, Passenger Cabin Lighting.
- (a) When the cabin has been converted to any all-passenger configuration, ensure that all cabin floodlights have been deactivated
 - (b) When the cabin has been converted to any all-cargo configuration, ensure that all cabin floodlights have been activated.
 - (c) When the cabin has been converted to a passenger/cargo combined configuration, ensure that the cabin floodlights aft of the movable passenger/cargo dividing partition are deactivated, and the forward floodlights activated.
- (6) Perform cabin check of emergency equipment requirements and location. (Refer to 25-1-0, Emergency Equipment)



- (7) In any passenger accommodation configuration in which the midcabin emergency escape hatch exits are accessible, ensure that the overwing exterior lighting emergency power batteries installed on folding hatracks (JR and LL) are properly connected
- (8) Before cargo loading is commenced, the cargo loading body support strut must be installed to stabilize the airplane during cargo movement in the main cabin. Refer to 25-38-0, Cargo Loading Body Support Strut.

NOTE This step is applicable when the main cabin has been converted to accommodate cargo

- (9) If installed, remove the cargo loading body support strut, and stow strut in the aft lower cargo compartment. Refer to 25-38-0, Cargo Loading Body Support Strut.

NOTE: This step is applicable only if the strut was allowed to remain in place to stabilize the airplane while converting between cargo accommodation configurations, or when converting from a cargo accommodation configuration to any all-passenger configuration or to the litter configuration.

10 Conversion Options

A There are several options which can be taken during conversions of the main cabin, which must be left to the customer's determination, dependent on his preferred alternate cabin arrangement. The options may be dependent on available equipment, time which can be allotted to the conversion, or both.

B Aft Cabin Passenger Accommodation Equipment Option

- (1) The aft cabin immediately forward of the aft entry door has two alternate arrangement options:

NOTE The arrangement in this area as shown in figure 2, of the description and operation pages of this section, is considered the basic (or normal) arrangement which installs a windscreen, and a double passenger seat.

- (2) The aft windscreen and the two extreme aft left side passenger seats (one double and one triple) may be removed from the cabin and an auxiliary galley installed, or the aft windscreen may be reinstalled after the auxiliary is installed.

C Folding Hatracks/Sidewall Protector Panels Option

- (1) When converting any part of the cabin to accommodate the cargo pallets or bulk cargo the folding hatrack sections may be handled in either of two ways:

NOTE One exception to this option is when the cargo elevator is installed. For cargo elevator operation clearance, the three forward RH folding hatracks and the two main cargo door folding hatracks must be removed.

- (a) The folding hatrack sections may be folded down and stowed together with the lower closure panels against the cabin sidewall and secured by installation of lower stowage supports.
- (b) Alternatively, the folding hatrack sections may be removed and sidewall protector panels installed in their place.

NOTE Hatracks and related conversion equipment are listed in figure 207. For folding or removal/installation information, refer to 25-10-42, Folding Hatracks.

For sidewall protector panel removal/installation information, refer to 25-36-32, Sidewall Protector Panels.



D Crew Berth Installation Option

- (1) Installation of the crew berth in the extreme forward main cabin area is optional in all configurations with crew rest accommodation, including the litter accommodation configuration, when this area is termed as medical attendant rest area.
- (2) The crew berth, however, must be removed whenever the extreme forward main cabin area is converted to accommodate cargo.
- (3) For crew berth removal/installation information, refer to 25-10-71, Crew Berth.

E. Main Cargo Door Threshold Assemblies Installation Option

- (1) The main cargo door threshold assemblies may be installed when no other facilities are available to facilitate movement of the cargo pallets or cabin equipment through the main cargo door opening without causing possible damage to the main cargo doorway sill (threshold).
- (2) For removal/installation information of the threshold assemblies, refer to 25-36-191, Main Cargo Door Threshold.

11 Litter Configuration Conversion Operation/Requirements

A General

- (1) Conversion to or from the litter configuration requires connection or disconnect of oxygen supply hoses between the cabin oxygen system manifold and oxygen connectors on top of each litter stanchion assembly (See figure 220.)
- (2) The oxygen supply hoses for the RH cabin litter carriers are attached to contoured supports, which are retained against the ceiling panels to keep the oxygen supply hoses clear of the top litters when installed.
- (3) Oxygen masks connectors for each litter are provided on the litter stanchion assemblies.
- (4) For removal and installation information of the litter carrier equipment, refer to 25-11-101, Litter Carriers

B Connect Oxygen Supply Hose Assemblies

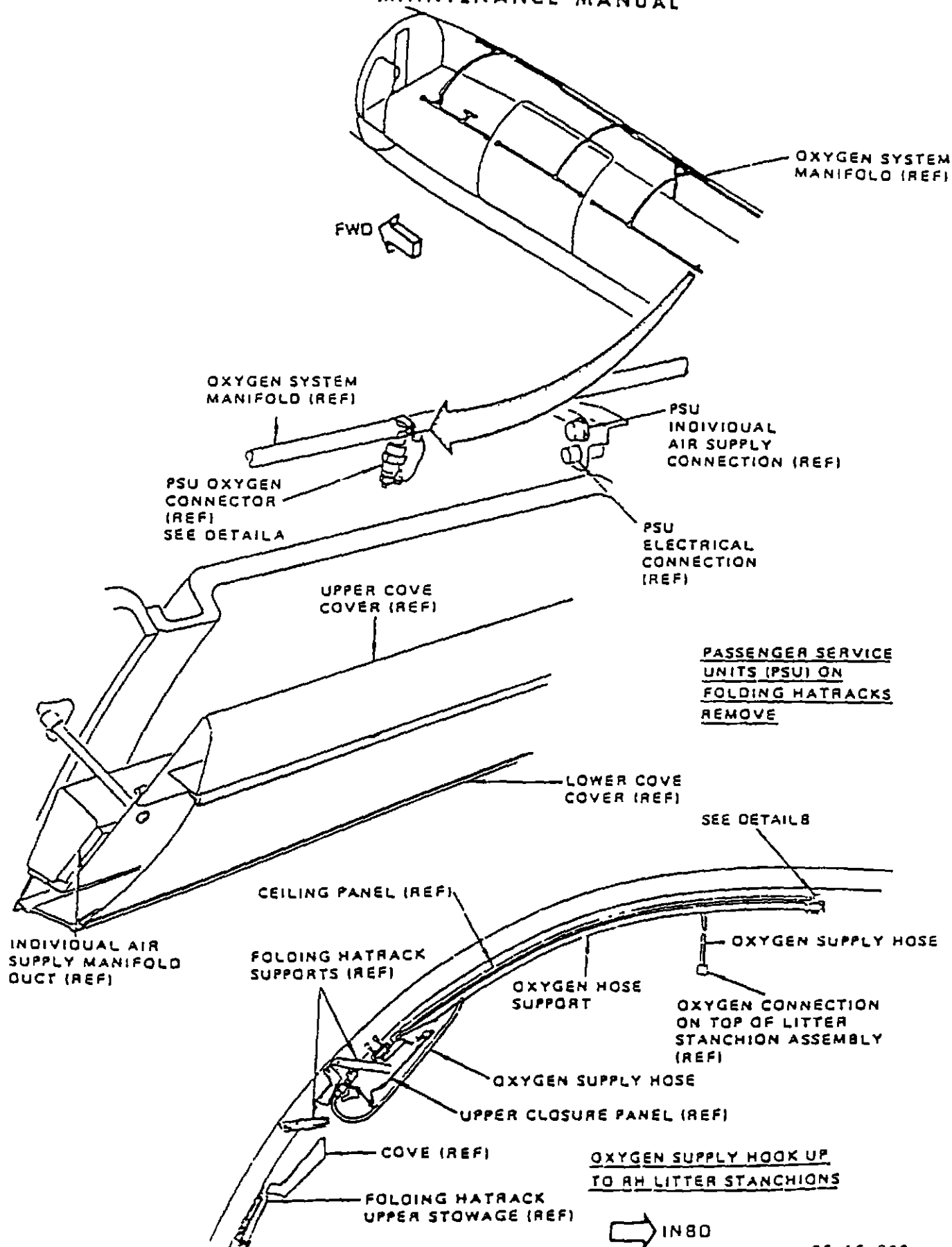
NOTE The following procedure applies primarily to the RH cabin oxygen supply hose assemblies. The LH cabin oxygen supply hoses are connected as step (3) only.

- (1) Install 65-73979-1 oxygen hose and support assemblies. (See figure 220.)

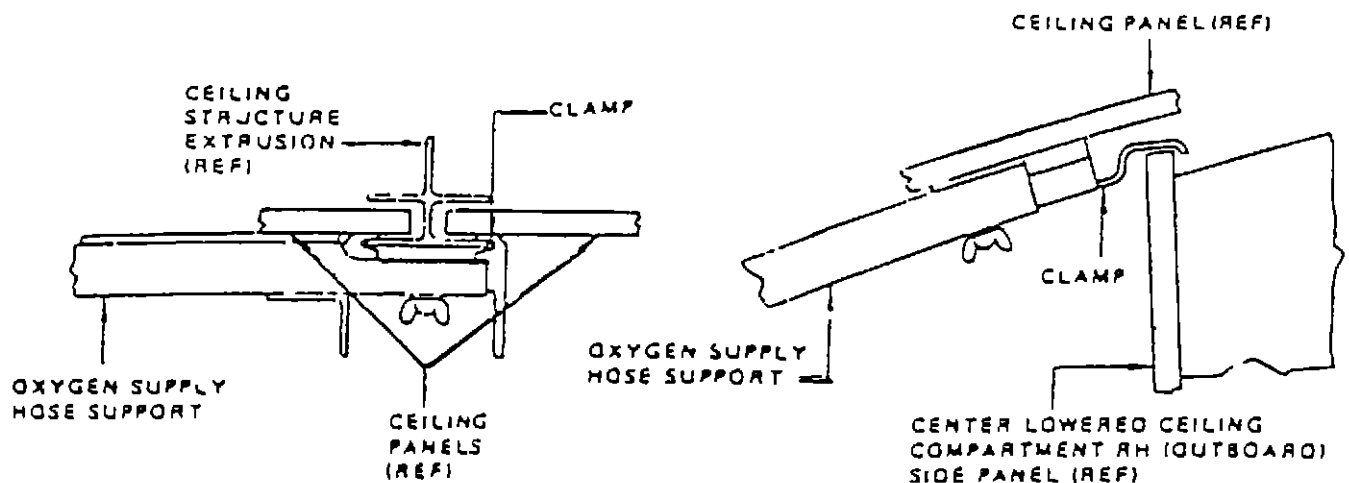
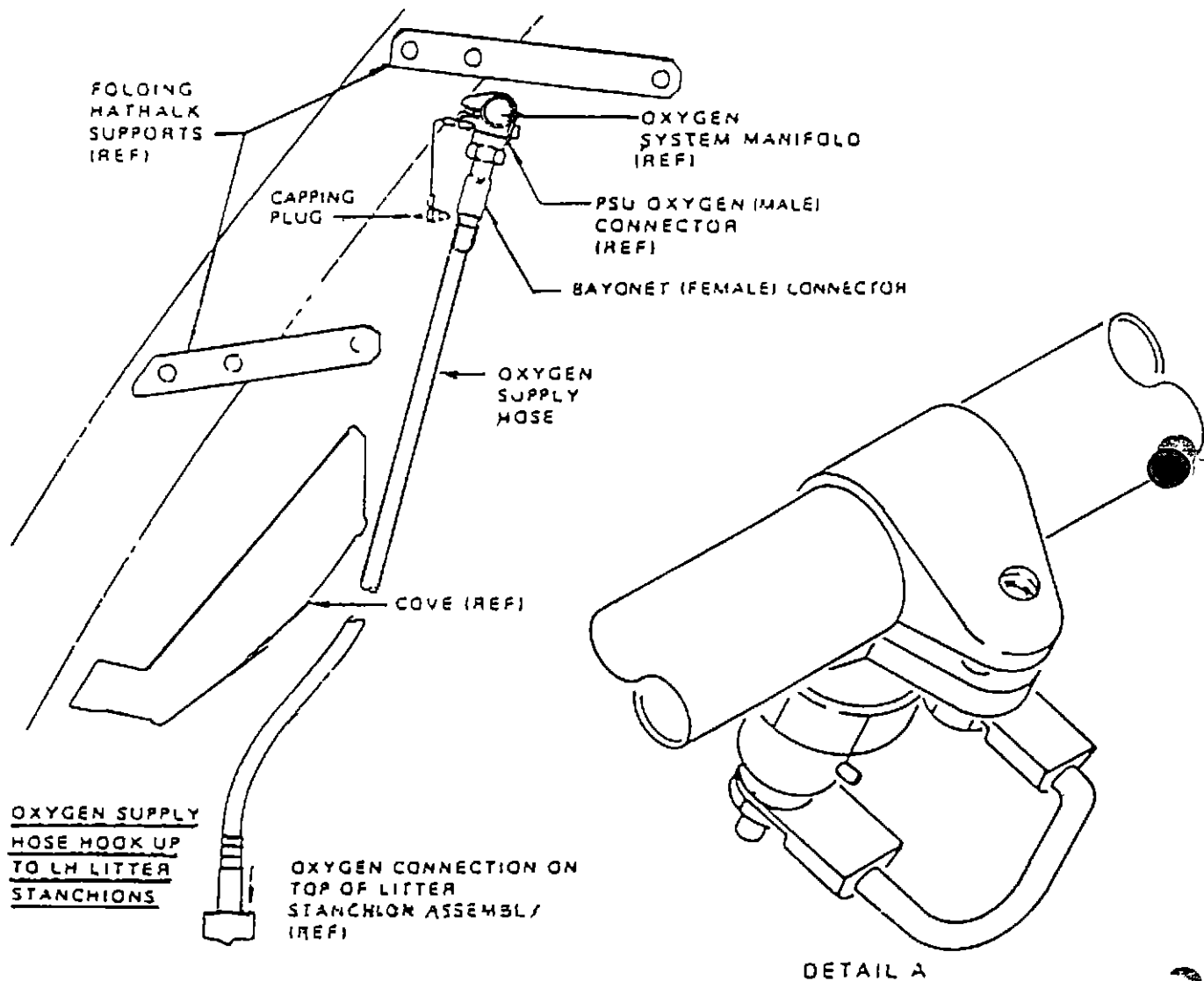
NOTE These assemblies are installed in RH cabin locations other than the center lowered ceiling area.

- (a) Position the outboard edge of the support behind the upper closure panel support bracket

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- (b) Push up on support assembly at the inboard end to raise the ceiling panel and expose the lower flanges of the ceiling structure extrusion. Connect the support assembly clamp to the lower flanges and tighten.

- (2) Install 65-73979-4 oxygen hose and support assemblies. (See figure 220.)

NOTE: These assemblies are installed on the RH side of the cabin in the center lowered ceiling area.

- (a) Slack off support tension clamp.
 - (b) Position support so that the clamp rests on the center lowered ceiling compartment RH outboard side panel and the outboard edge of the support is retained behind the upper closure panel support bracket.
 - (c) Tighten clamp.
- (3) Disconnect passenger service unit quick disconnect to oxygen system manifold connector and connect litter oxygen supply hoses. (See figure 220.)

C. Disconnect Oxygen Supply Hose Assemblies.

- (1) Disconnection of these assemblies in reverse of connection.



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12 Equipment Removal/Installation

- A The following consists of a list of other sections of this chapter containing detailed removal/installation information and procedures of equipment affected by any main cabin conversion
- (1) The primary conversion instruction procedures 25-15-301 through 25-15-320 reference to these sections. This list however, is given to support conversion instruction procedures 25-15-401 through 25-15-801, in which specific references to equipment requiring removal and/or installation cannot be made
 - (2) The section reference list is split into two categories, passenger configuration equipment, and cargo configuration equipment
- B Refer to the following sections, Chapter 25, for detailed removal/installation information of passenger configuration equipment affected by main cabin configuration conversions

25-1-27, Floor-Mounted Escape Slides
25-1-29, Door-Mounted Escape Slides
25-1-31, Life Rafts
25-1-35, Escape Slide Floor Fittings

25-10-23, Forward Lowered Ceiling
25-10-24, Center Lowered Ceiling
25-10-25, Aft Lowered Ceiling
25-10-31, Floor Covering
25-10-42, Folding Hatracks
25-10-44, Hatrack Closure Panels
25-10-46, Fixed Hatracks
25-10-48, Hatrack Headers

25-11-0, Seats
25-11-101, Litter Carriers

25-12-2, Passenger Service Units

25-13-3 VIP Dividing Partitions
25-13-13, Aft Left Windscreen
25-13-22, Forward Right Coat Closet
25-13-23, No 2 Forward Left Coat Closet
25-13-47, Aft Left Coat Closet
25-13-48, No 1 Left Coat Closet
25-13-50, Crew Rest Area Partitions (including Curtain Tracks)
25-13-52, Forward Dividing Partitions
25-13-55, Movable Cargo/Passenger Dividing Partition

25-17-43, Main Galley Units
25-17-44, Crew Galley

25-18-42, Lavatory Compartments (B and E)

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- C Refer to the following sections for detailed removal/installation information of cargo configuration equipment as affected by main cabin configuration conversions

25-36-0, Cargo Equipment (Location only)
25-36-32, Sidewall Protector Panels (aft of Main Cargo Door)
25-36-33, Main Cargo Doorway Protective Covers
25-36-34, Dado Protectors
25-36-35, Forward Left Sidewall Protector Panels
25-36-241, Cargo Barrier Net
25-36-61, Fume-Tight Curtain
25-36-101, Cargo Carrying System (Location only)
25-36-122, Roller Trays
25-36-132, Side Restraints
25-36-142, Retractable Side Restraints
25-36-151, Transfer Panels
25-36-162, Pallet Locks
25-36-172, Forward and Aft Stops
25-36-191, Main Cargo Door Threshold
25-36-200, Cargo Elevator (Description only)



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CONVERT 176 PASSENGER CONFIGURATION TO ALL-CARGO
13 PALLET STANDARD CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

A This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information

(1) Figures 203 thru 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during this conversion.

(2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.

2. Remove and/or Convert Passenger Configuration Equipment

A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.

B. Remove equipment and trim in the main cargo door area and open main cargo door. Refer to 25-15-200, paragraph 7.B.(19).

C. Remove all passenger seats, floor-track covers, and (if installed) floor-mounted escape slides.

NOTE: Stow the floor-track covers in seat back magazine pockets.

(1) Remove seats. Refer to 25-11-0, Seats.

(2) Remove floor-mounted escape slides. Refer to 25-1-27, Floor-Mounted Escape Slides.

D. Remove storage bags attached to cabin sidewall.

NOTE: These bags are located immediately aft of galley No. 2 and aft of the crew rest area.

D.1. Remove assist handle from partition immediately aft of forward entry door.

- E Remove all passenger partitions, coat closets, curtains, and curtain tracks.
- (1) Refer to the following sections.
- 25-13-13, Aft Left Windscreen
 - 25-13-22, Forward Right Coat Closet
 - 25-13-47, Aft Left Coat Closet
 - 25-13-48, No 1 Forward Left Coat Closet
 - 25-13-50, Crew Rest Area Partitions
- F If installed, remove aft auxiliary galley. Refer to 25-17-43, Galley Units.
- G. Remove door-mounted escape slides and floor fittings except at the forward entry door. Refer to 25-1-29, Door-Mounted Escape Slide, and 25-1-35, Escape Slide Floor Fittings.
- H. Remove floor covering. Refer to 25-10-31, Floor Covering.
- I. Remove crew rest seats, table, and crew berth and supports. Refer to 25-10-71, Crew Berth.
- J. Remove forward lowered ceiling compartment. Refer to 25-10-23, Forward Lowered Ceiling.
- K. Remove center lowered ceiling compartment. Refer to 25-10-24, Center Lowered Ceiling.
- L. Install covers over attachment voids in the center lowered ceiling area.
- M. Remove aft lowered ceiling compartment. Refer to 25-10-25, Aft Lowered Ceiling.
- N. Remove fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks.
- O. Remove, or fold and secure all folding hatracks in their stowed position. Refer to 25-10-42, Folding Hatracks.
- P. Remove main galleys. Refer to 25-17-43, Galley Units.



- Q Remove section of curtain track attached to the forward lowered ceiling inboard of lavatory B
- R. Remove lavatories B and E Refer to 25-18-42, Lavatory Compartments
- S Reverse cover on lavatory E electrical service box
- T Install drain plugs in lavatories B and E floor drain lines.
- U Convert the aft and forward galley vent systems Refer to 25-15-200, paragraph 7 B (25)
- V. Remove pallet electrical receptacles cover on the left side cabin sidewall, in the crew rest area

3. Install Cargo Configuration Equipment

- A If the folding hatracks were removed Install sidewall protector panels Refer to 25-36-32, Sidewall Protector Panels

NOTE. Installation of the sidewall protector panels on the main cargo door (if the folding hatracks were removed) will require temporary closing of the door For door closing/opening procedures, refer to Chapter 52 Main Cargo Door.

WARNING: BEFORE CLOSING/OPENING THE MAIN CARGO DOOR IT IS ESSENTIAL TO ASCERTAIN THAT ALL PERSONNEL AND EQUIPMENT ARE CLEAR OF PATH TO BE SWEEP BY THE DOOR. * *

- B. Attach safety net stowage bag to cabin sidewall or sidewall protector panel, aft of main cargo door. Refer to 25-15-200, paragraph 7 B (19)
- C. Install sidewall protector panels in crew rest area. Refer to 25-36-35, Forward Left Sidewall Protector Panels
- D. If required, install crew galley aft of lavatory A Refer to 25-17-44, Crew Galley
- E Install portable oxygen bottle to aft face of lavatory A, or (if installed) crew galley

NOTE This oxygen bottle is obtained from those removed from the folding hatracks

- E.1. Install assist handle to cabin sidewall immediately aft of the forward entry door



- F. Install crew reading light. Refer to 25-15-200, paragraph 7.B.(30).
- G. Install fume-tight curtain. Refer to 25-36-61, Fume-Tight Curtain.
- H. Install dry-chemical fire extinguisher, fire extinguisher extension applicator, and emergency life raft and survival kit assembly. Refer to 25-15-200, paragraph 7.B.(11).
 - (1) Position fire extinguisher in accordance with decal on cabin floor.
 - (2) Secure fire extinguisher by rotating handles to lie parallel with the fire extinguisher body.
- I. Install dado protector panels to RH cabin sidewall. Refer to 25-36 Dado Protectors.

NOTE These dado protector panels are installed only if the folding hatracks were stowed in the cargo position, and no sidewall protector panels installed.
- J. Install window covers to the aft entry door and both galley service door windows. Refer to 25-15-200, paragraph 7.B.(18).
- K. Install protective cover plates to the forward and aft main cargo door opening structure. Refer to 25-36-33, Main Cargo Doorway Protective Covers.
- L. Attach inoperative external door handle placards to the emergency escape hatches, the aft entry door, and both galley service doors. Refer to 25-15-200, paragraph 7.B.(21).
- M. Install cargo carrying system.
 - (1) Refer to 25-36-101, Cargo Carrying System, for cargo system equipment location information.
 - (2) Refer to the following sections for installation information.
 - 25-36-122, Roller Trays
 - 25-36-132, Side Restraints
 - 25-36-142, Retractable Side Restraints
 - 25-36-151, Transfer Panels
 - 25-36-162, Pallet Locks
 - 25-36-172, Forward and Aft Stops

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- N Perform Postconversion requirements Refer to 25-15-200, paragraph 9
- O After cargo is loaded, remove (if installed) main cargo door threshold assemblies and safety net before closing cargo door
- (1) Refer to 25-36-191, Main Cargo Door Threshold
 - (2) Stow safety net in stowage bag aft of main cargo door
- P After main cargo door is closed (in accordance with Chapter 52, Main Cargo Door) stow the main cargo door hold-open strut on the sidewall protector panels forward of the main cargo door

CONVERT 13 PALLET STANDARD CONFIGURATION
TO 176 PASSENGER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A. This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/Installation information.
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment -requiring removal, installation, or relocation during this conversion.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.

2. Remove Cargo Configuration Equipment

- A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.

NOTE: It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of the cargo pallets through the main cargo door opening.

- B. Remove cargo carrying system.

- (1) Refer to the following sections:

25-36-122, Roller Trays
25-36-132, Side Restraints
25-36-142, Retractable Side Restraints
25-36-151, Transfer Panels
25-36-162, Pallet Locks
25-36-172, Forward and Aft Stops

- C. Remove fume-tight curtain. Refer to 25-36-61, Fume-Tight Curtain.

- C.1. Remove assist handle attached to cabin sidewall immediately aft of forward entry door.

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- D If installed, remove dado protector panels from RH cabin sidewall
Refer to 25-36-34, Dado Protectors

NOTE These dado protectors should be found installed only if the
sidewall protector panels are not installed

- E Remove fire extinguisher extension applicator from the forward L H
sidewall protector panels

- F Remove the forward LH sidewall protector panels Refer to 25-36-35,
Forward Left Sidewall Protector Panels

- G If installed, remove sidewall protector panels along both sides of the
cabin sidewall. Refer to 25-36-32, Sidewall Protector Panels.

NOTE This applies to those panels which when the cabin was converted
to accommodate cargo, may have been optionally installed to the
main cabin and main cargo door sidewalls instead of stowing the
folding hatracks in the cargo position. The main cargo door
sidewall protector panels will be removed later, after the door
is closed

- H Remove dry-chemical fire extinguisher, and emergency life raft and
survival kit assembly Refer to 25-15-200, paragraph 7.B (11).

- I. Remove crew reading light Refer to 25-15-200, paragraph 7.B.(30).

- J Remove oxygen bottle from aft face of lavatory A, or (if installed) crew
galley

NOTE. This oxygen bottle should be retained to install on the folding
hatracks

- K If installed remove crew galley REfer to 25-17-44 Crew Galley

- L Remove window covers from the aft entry door and both galley service
door windows Refer to 25-15-200, paragraph 7 B (18)

- M Remove placards from the external door handles of the midcabin
emergency escape hatches, the aft entry door , and both galley service
doors. Refer to 25-15-200, paragraph 7 B.(21).

- N If the aft cabin emergency hatches are to be activated remove the
external hatch handle placard. Refer to 25-15-200, paragraph 7.B (21)

- O Remove covers over attachments in the forward location for the center
lowered ceiling compartment

3. Install and/or Convert Passenger Configuration Equipment

- A. Install pallet electrical receptacles cover on left side forward cabin sidewall.

NOTE: This cover should be installed by snapping into place. Before installing cover, check that dust caps are installed in the receptacles.

- B. Convert the forward and aft galley vent systems. Refer to 25-15-200, paragraph 7.B.(25).
- C. Connect electrical wiring in sink areas of lavatories C and D. Refer to 25-15-200, paragraph 7.B.(24).
- D. Reverse cover on lavatory E electrical service box.
- E. Remove drain plugs and install lavatories B and E. Refer to 25-18-42, Lavatory Compartments.
- F. Install section of curtain track to the forward lowered ceiling inboard of lavatory B.
- G. Install main galleys. Refer to 25-17-43, Galley Units.
- H. Install or raise folding hatracks to passenger accommodation position. Refer to 25-10-42, Folding Hatracks.
- NOTE: Folding hatracks on the main cargo door will be installed, or raised later, after the door is closed.
- I. Install fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks.
- J. Install floor covering. Refer to 25-10-31, Floor Covering.
- K. Install door-mounted escape slides to both galley service doors and the aft entry door. Refer to 25-1-29, Door-Mounted Escape Slide.
- L. Install floor fittings for door-mounted escape slides at both galley service doors and the aft entry door. Refer to 25-1-35, Door-Mounted Escape Slides.
- M. Install aft left coat closet. Refer to 25-13-47, Aft Left Coat Closet.

- N If required, install auxiliary galley immediately forward of the aft entry door. Refer to 25-17-43, Galley Units.

NOTE: Installation of the auxiliary galley is optional. Refer to 25-15-200, paragraph 10.

- O. If required, install aft windscreen immediately forward of the aft entry door. Refer to 25-13-13, Aft Windscreen

NOTE: Installation of the aft windscreen is optional. Refer to 25-15-200, paragraph 10.

- P. Install aft lowered ceiling compartment. Refer to 25-10-25, Aft Lowered Ceiling.

- Q. Install the center lowered ceiling compartment. Refer to 25-10-24, Center Lowered Ceiling.

- R. Install the forward lowered ceiling compartment. Refer to 25-10-23, Forward Lowered Ceiling.

NOTE: Do not install the fairing (bullnose) across the aft end of the compartment. This section will be installed later, after the main cargo door is closed.

- S. Install the crew rest area berth. Refer to 25-10-71, Crew Berth.

- T. Install the forward left coat closet. Refer to 25-13-48, No. 1 Forward Left Coat Closet.

- T.1. Install assist handle to forward partition of the No. 1 forward left coat closet.

- U. Stow crew seat berth mattress in the forward left coat closet.

- V. Install seats and floor-track covers. Refer to 25-11-0, Seats.

NOTE: Do not install seats in the main cargo door area, these seats should be placed in the cabin for installation in their proper location after the door is closed. The floor-track covers should be found stowed in the seat back magazine pockets. These floor-track covers may be used as a means of establishing the seat spacing, after each first forward seat is located. For seat spacing information, refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.



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- W If required, install floor-mounted escape slides Refer to 25-1-27, Floor-Mounted Escape Slides.

NOTE Installation of the floor-mounted escape slides are required in this configuration when complying with requirements in 25-15-100 Passenger Cabin Conversion Limitations.

- X Install crew rest area game table.

- Y Install crew rest area partition and curtain tracks. Refer to 25-13-50 Crew Rest Area Partition.

- Z Install forward right coat closet. Refer to 25-13-22, Forward Right Coat Closet.

- AA. Install stowage bags to cabin sidewall.

NOTE These bags are installed aft of the right coat closet and aft of the crew rest partition.

- AB. Remove main cargo doorway protective covers, close door and install trim in main cargo door area. Refer to 25-15-200, paragraph 7.B.(31).

- AC. Install, or raise folding hatracks on main cargo door to passenger position. Refer to 25-10-42, Folding Hatracks.

- AD. Install fixed hatrack and header in main cargo door area. Refer to 25-10-46, Fixed Hatracks and 25-10-43, Headers.

- AE. Install fairing (bullnose) across aft end of the forward lowered ceiling compartment. Refer to 25-10-23, Forward Lowered Ceiling.

- AF. Install seats in the main cargo door area. For seat spacing information, refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.

- AG. Ensure blank sign is installed on handle of the aft life raft compartment door of the forward lowered ceiling compartment.

- AH. Ensure magazine racks are installed on the aft crew rest partition, on the right coat closet partition and on the aft windscreen partition.

- AI Perform post conversion requirements. Refer to 25-15-200, paragraph 9.



CONVERT 176 PASSENGER CONFIGURATION TO ALL-CARGO 11 PALLET WITH CREW REST
ACCOMMODATION AND CARGO ELEVATOR CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

A. This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during this conversion.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration.

2. Remove and/or Convert Passenger Configuration Equipment

A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.

B. Remove equipment and trim in the main cargo door area and open main cargo door. Refer to 25-15-200, paragraph 7.B.(19). *

C. Remove all passenger seats and (if installed) floor-mounted escape slides.

- (1) Remove seats and floor-track covers. Refer to 25-11-0, Seats.

NOTE: Stow floor-track covers in seat back magazine pockets.

- (2) Remove floor-mounted escape slides. Refer to 25-1-27, Floor-Mounted Escape Slides.

D. Remove stowage bags attached to cabin sidewall.

NOTE: These bags are located aft of galley No. 2 and aft of the crew rest area.

- E Remove partitions and coat closets.
- (1) Refer to the following sections:
- 25-13-13, Aft Left Windscreen
25-13-22, Forward Right Coat Closet
25-15-47, Aft Left Coat Closet
- F Remove forward aisle curtain and track. Refer to 25-13-50, Crew Rest Area Partitions.
- G Remove magazine rack from crew rest area aft partition.
- H. If installed, remove aft auxiliary galley. Refer to 25-17-43, Galley Units.
- I. Remove door-mounted escape slides and floor fittings at the aft entry door and aft galley service door. Refer to 25-1-29, Door-Mounted Escape Slide, and 25-1-35, Escape Slide Floor Fittings.
- J. Remove floor covering. Refer to 25-10-31, Floor Covering.
- K. Remove center lowered ceiling compartment. Refer to 25-10-24, Center Lowered Ceiling.
- L. Install covers over attachment voids in center lowered ceiling area.
- M. Remove aft lowered ceiling compartment. Refer to 25-10-25, Aft Lowered Ceiling.
- N. Remove fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks.
- O. Remove, or fold and secure all folding hatracks in their stowed position. Refer to 25-10-42, Folding Hatracks.
- NOTE: The three forward RH folding hatracks must be removed for cargo elevator operation clearance. All other folding hatracks may be optionally folded or removed. (Refer to 25-15-200, paragraph 10.)
- P. Remove aft main galleys. Refer to 25-17-43, Galley Units.
- Q. Remove lavatory E. Refer to 25-18-42, Lavatory Compartments.
- R. Reverse cover on lavatory E electrical service box.
- S. Install drain plug in lavatory E floor drain line.



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- T Convert the aft galley vent system Refer to 25-15-200, paragraph 7 B (25)
- U Disconnect electrical wiring in sink cabinet areas of lavatories C and D Refer to 25-15-200, paragraph 7 B (24)
- V Remove floor smoke vent cover aft of crew rest partition

3 Install Cargo Configuration Equipment

- A If the folding hatracks were removed, install sidewall protector panels Refer to 25-36-32, sidewall Protector Panels

NOTE Installation of the sidewall protector panels on the main cargo door will require temporary closing of the door For door closing/opening procedures, refer to Chapter 52, Main Cargo Door

WARNING: BEFORE CLOSING/OPENING THE MAIN CARGO DOOR IT IS ESSENTIAL TO ASCERTAIN THAT ALL PERSONNEL AND EQUIPMENT ARE CLEAR OF THE PATH TO BE SWEEPED BY THE DOOR.

- B. Attach safety net stowage bag to cabin sidewall or sidewall protector panel aft of main cargo door. Refer to 25-15-200, paragraph 7 B.(19).
- C Attach one portable oxygen bottle to crew rest area aft partition at lower forward inboard face (footwell).

NOTE This oxygen bottle to obtained from those removed from the folding hatracks

- (1) Attach (using double-back tape) two oxygen bottle location placards, one to the forward face of the crew rest area aft partition and one to the aft inboard end of the crew rest area curtain track

- D Install three sections of fume-tight forward dividing partitions Refer to 25-13-52, Forward Dividing Partitions
- E Install dry-chemical fire extinguisher and extension applicator on short section of the forward dividing partitions
- F Install dado protector panels to RH cabin sidewall Refer to 25-36-34, Dado Protectors

NOTE These dado protector panels are installed only if the folding hatracks were stowed in the cargo position, and no sidewall protector panels installed.

- G Install window covers to the aft entry door and aft galley service door windows Refer to 25-15-200. 7.B.(18)



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- H. Install protective cover plates to the forward and aft main cargo door opening structure. Refer to 25-36-33, Main Cargo Doorway Protective Covers.
- I. Attach inoperative external door handle placards to the emergency escape hatches, the aft entry door, and the aft galley service door. Refer to 25-15-200, paragraph 7.B.(21).
- J. Install cargo carrying system.
 - (1) Refer to 25-36-101, Cargo Carrying System, for cargo system equipment location information.
 - (2) Refer to the following sections for removal/installation information:
 - 25-36-122, Roller Trays
 - 25-36-132, Side Restraints
 - 25-36-142, Retractable Side Restraints
 - 25-36-151, Transfer Panels
 - 25-36-162, Pallet Locks
 - 25-36-172, Forward and Aft Stops
- K. Install cargo elevator. Refer to 25-36-200, Cargo Elevator.
- L. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.
- M. After cargo is loaded, remove (if installed) main cargo door threshold assemblies and safety net before closing cargo door.
 - (1) Refer to 25-36-191, Main Cargo Door Threshold.
 - (2) Stow safety net in stowage bag installed aft of the main cargo door.
- N. After the main cargo door is closed (in accordance with Chapter 52, Main Cargo Door) stow the main cargo door hold-open strut in container on the short section of the forward dividing partitions.



CONVERT ALL-CARGO 11 PALLET WITH CREW REST ACCOMMODATION AND CARGO ELEVATOR
TO 176 PASSENGER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

A. This section provides step by step instructions to convert the main cabin (as titled). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation or relocation during this conversion.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.

2. Remove Cargo Configuration Equipment

NOTE: It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening.

- A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.
- B. Remove the cargo elevator. Refer to 25-36-200, Cargo Elevator.
- C. Remove cargo carrying system.

- (1) Refer to the following sections:

25-36-122, Roller Trays
25-36-132, Side Restraints
25-36-142, Retractable Side Restraints
25-36-151, Transfer Panels
25-36-162, Pallet Locks
25-36-172, Forward and Aft Stops

- D Remove inoperative external door handle placards from emergency escape hatches, the aft entry door, and the aft galley service door
- E Remove window covers from the aft entry door and the aft galley service door. Refer to 25-15-200, paragraph 7.B.(18).
- F Remove dado protector panels from RH cabin sidewall. Refer to 25-36-34, Dado Protectors.

NOTE. The dado protector panels should only be found installed if sidewall protector panels are not installed.

- G If installed, remove sidewall protector panels. Refer to 25-36-32, Sidewall Protector Panels.

NOTE: The sidewall protector panels attached to the main cargo door will be removed later, after the door is closed.

- H. Remove dry-chemical fire extinguisher and extension applicator from the short section of the forward dividing partitions.
- I. Remove the three sections of forward dividing partitions. Refer to 25-13-52, Forward Dividing Partitions.
- J. Remove portable oxygen bottle attached to the crew rest area aft partition.

NOTE: This oxygen bottle will be installed on one of the folding hattracks.

- K. Remove oxygen bottle location placards, one attached to the crew rest area aft partition and one attached to the curtain track.

3. Install and/or Convert Passenger Configuration Equipment

- A. Install smoke vent cover over grille in floor aft of crew rest area.
- B. Connect electrical wiring in sink areas of lavatories C and D. Refer to 25-15-200, paragraph 7.B.(24).
- C. Convert the aft galley vent system. Refer to 25-15-200, paragraph 7.B.(25).
- D. Remove lavatory E drain line plug.
- E. Reverse cover on lavatory E electrical service box.
- F. Install lavatory E. Refer to 25-18-42, Lavatory Compartments.
- G. Install aft main galleys. Refer to 25-17-42, Galley Units.

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- H. Install aft left coat closet. Refer to 25-13-47, Aft Left Coat Closet.
- I. Install aft lowered ceiling compartment. Refer to 25-10-25, Aft Lowered Ceiling.
- J. Remove covers from the forward center lowered ceiling location area and install the center lowered ceiling. Refer to 25-10-24, Center Lowered Ceiling.
- K. Install, or raise folding hatracks to passenger position. Refer to 25-10-42, Folding Hatracks.

NOTE: Folding hatracks on the main cargo door will be installed or raised later, after door is closed.
- L. Install fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks.
- M. Install floor covering. Refer to 25-10-31, Floor Covering.
- N. Install door-mounted escape slides and floor fittings for the aft entry door and aft galley service door. Refer to 25-1-29, Door-Mounted Escape Slides, and 25-1-35, Escape Slide Floor Fitting.
- O. Install aft auxiliary galley. Refer to 25-17-13, Galley Units.

NOTE: Installation of the aft auxiliary galley^s is optional. Refer to 25-15-200, paragraph 10.
- P. Install aft windscreen immediately forward of the aft entry door. Refer to 25-13-13, Aft Left Windscreen.

NOTE: Installation of the aft windscreen is optional when the aft auxiliary galley is installed.
- Q. Install forward right coat closet aft of galley No. 2. Refer to 25-13-22, Forward Right Coat Closet.
- R. Install forward aisle curtain and track. Refer to 25-13-50, Crew Rest Area Partitions.
- S. Install magazine rack to crew rest area aft partition, right coat closet partition, and aft windscreen partition.



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T Install stowage bags to cabin sidewall aft of crew rest area partition and aft of the right coat closet partition

U Install passenger seats and floor-track covers.

NOTE Seats to be located in the main cargo door area will be installed later, after the door is closed. The floor-track covers should be found in the seat magazine pockets. These covers may be used as a means of establishing seat spacing after each first forward seat is located. For seat spacing, refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2

V. If required, install floor-mounted escape slides adjacent to the aft cabin emergency escape hatches. Refer to 25-1-27, Floor-Mounted Escape Slides.

NOTE The floor-mounted escape slides are required in this configuration when complying with requirements in 25-15-100, Passenger Cabin Conversion Limitations.

W. Close main cargo door and install passenger configuration ceiling panels and door trim. Refer to 25-15-200, paragraph 7.B.(31).

X. Install, or raise folding hatracks on main cargo door to passenger position. Refer to 25-10-42, Folding Hatracks.

Y. Install fixed hatrack and header in main cargo door area.

(1) Refer to the following sections:

25-10-46, Fixed Hatracks
25-10-48, Headers

Z. Install fairing (bullnose) across aft end of the forward lowered ceiling compartment. Refer to 25-10-23, Forward Lowered Ceiling.

4A Perform postconversion requirements Refer to 25-15-200, paragraph 9



CONVERT 176 PASSENGER CONFIGURATION TO ALL-CARGO
11 PALLET WITH CARGO ELEVATOR CONFIGURATION -
CONVERSION INSTRUCTIONS

1. General

- A. Conversion from the 176 passenger configuration to the all-cargo 11 pallet with cargo elevator configuration is the same as conversion to the all-cargo 13 pallet standard configuration, except installation of the cargo carrying system to accommodate the cargo elevator and installation of the cargo elevator.
- B. Perform instructions of 25-15-301, Convert 176 Passenger Configuration to All-Cargo 13 Pallet Standard Configuration.
 - (1) Install cargo elevator immediately after cargo carrying system installation. Refer to 25-36-200, Cargo Elevator.

NOTE Location of the cargo system equipment when the cargo elevator is to be installed is described in 25-36-101, Cargo Carrying System.

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CONVERT ALL-CARGO 11 PALLET WITH CARGO ELEVATOR
CONFIGURATION TO 176 PASSENGER CONFIGURATION -
CONVERSION INSTRUCTIONS

1. General

- A Conversion from the all-cargo 11 pallet with cargo elevator configuration to the 176 passenger configuration is the same as conversion from the all-cargo 13 pallet standard configuration, except removal of the cargo elevator.
- B. Perform instructions of 25-15-302, Convert All-Cargo 13 Pallet Standard Configuration to 176 Passenger Configuration.
 - (1) Remove cargo elevator immediately after the main cargo door is open. Refer to 25-36-200, Cargo Elevator.



CONVERT 176 PASSENGER CONFIGURATION TO ALL-CARGO
11 PALLET WITH CREW REST ACCOMMODATION
CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A Conversion from the 176 passenger configuration to the all-cargo 11 pallet with crew rest accommodation configuration is the same as instructions in 25-15-303, Convert 176 Passenger Configuration to All-Cargo 11 Pallet with Crew Rest Accommodation and Cargo Elevator Configuration, except installation of the cargo elevator.

NOTE Location of the cargo carrying system equipment when the cargo elevator is installed is described in 25-36-101, Cargo Carrying System.

- B. Perform conversion instructions of 25-15-303, Convert 176 Passenger Configuration to All-Cargo 11 Pallet with Crew Rest Accommodation and Cargo Elevator Configuration.

(1) Disregard instructions to install cargo elevator.





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CONVERT ALL-CARGO 11 PALLET WITH CREW REST ACCOMMODATION CONFIGURATION TO 176 PASSENGER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A Conversion to the all-cargo 11 pallet with crew rest accommodation configuration to the 176 passenger configuration is the same as instructions in 25-15-304, Convert All-Cargo 11 Pallet with Crew Rest Accommodation and Cargo Elevator Configuration, except removal of the cargo elevator.
- B Perform conversion instructions of 25-15-304, Convert All-Cargo 11 Pallet with Crew Rest Accommodation and Cargo Elevator Configuration to 176 Passenger Configuration.
 - (1) Disregard instruction to removed cargo elevator.



CONVERT 176 PASSENGER CONFIGURATION TO VIP PASSENGER CONFIGURATION -
CONVERSION INSTRUCTIONS

1. General

- A. This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during this conversion.
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration.
 - (3) The area affected by this conversion is in the area aft of the crew rest area and forward of the midcabin emergency escape hatches.
 - (a) Accommodation equipment aft of galley No. 3 (in the extreme aft cabin area) is not affected by this conversion.
 - (b) Accommodation equipment forward of ^Agalley No. 2 (in the extreme forward cabin area) is not affected by this conversion.
 - (c) Passenger seating aft of the midcabin emergency escape hatches is affected only by seat spacing change.
 - (4) There are two options for means of removing and installing equipment affected in this conversion. The largest items of equipment to be handled are the two berthable divans, installed in the VIP configuration.
 - (a) The forward triple seats requiring removal may be carried to the aft end of the cabin and removed through the aft entry door. To provide space, all seat backs may be folded down (forward). The berthable divans may be carried into the cabin over the aft folded seats in the same manner. To allow more space at the aft entry door area, the aft windscreen may be temporarily removed.

- (b) Alternatively, the main cargo door may be opened and equipment removed through the cargo door opening. Opening the main cargo door requires removal of a fixed hatrack, cargo doorway trim and ceiling panels, the forward lowered ceiling fairing, stowing of the folding hattracks, and reinstallation of these items after the main cargo door is closed.
- (c) The following conversion instructions assume option (a) is chosen, if option (b) method is chosen, instructions for opening the main cargo door are described in 25-15-200, paragraph 7.B.(19), and closing instructions in paragraph 7 B.(31).

2. Remove 176 Passenger Configuration Equipment

- A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8
- B. Fold backs of all seats to the forward (storing) position.
- C. Remove aft windscreen. Refer to 25-13-13, Aft Left Windscreen.

NOTE: Do not remove the windscreen from the cabin, removal is to provide space and prevent possible damage while performing the following step.

- D. Remove 10 LH and 9 RH seats from the forward cabin area, and remove floor-track covers in this area.

NOTE: Removal of seats should be made by lifting and carrying over the aft seats and through the aft entry door. Stow floor-track covers in seat back magazine pockets.

- E. Remove magazine rack from the crew rest area aft partition.
- F. Remove aisle curtain and track. Refer to 25-13-50, Crew Rest Partition.
- G. Remove coat closet aft of galley No. 2. Refer to 25-13-22, Forward Right Coat Closet.
- H. If required, install floor-mounted escape slides adjacent to aftcabin emergency escape hatches. Refer to 25-1-27, Floor-Mounted Escape Slides.

NOTE: The floor-mounted escape slides are required in this configuration when complying with requirements in 25-15-100, Passenger Cabin Conversion Limitations.

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- I. Revise seat spacing of the remaining triple seats. Refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.
- J. Remove storage bags from cabin sidewall.

NOTE: These storage bags are located aft of galley No. 2 and aft of the crew rest area.
- K. Remove hatrack header from main cargo door forward folding hatrack (Refer to 25-10-48, Hatrack Headers.)

NOTE: Header must be removed to enable installation of the No. 2 forward left coat closet partition.

3. Install VIP Passenger Configuration Equipment

- A. Revise floor covering. Refer to 25-10-31, Floor Covering.
- B. Install two sections of forward dividing partitions. Refer to 25-13-52, Forward Dividing Partitions.
- C. Install coat closet aft of the crew rest area. Refer to 25-13-23, No. 2 Forward Left Coat Closet.
- D. Install eight double seats, two tables, and two convertible divans. Refer to 25-11-0, Seats.

NOTE: This equipment should be brought into the cabin through the aft entry door and carried over the aft passenger seats to the forward cabin area. For seat location, refer to 25-15-0, Cabin Accommodation Conversions - Description and Operation, figure 2.
- E. Install aft dividing partitions. Refer to 25-13-3, VIP Dividing Partitions.
- F. Relocate passenger service units throughout the cabin to match seat spacing. Refer to 25-12-2, Passenger Cabin Service Units.

NOTE: Units in excess to seating requirements in the forward cabin area may be removed.
- G. Install the aft windscreen. Refer to 25-13-13, Aft Left Windscreen.
- H. Install storage bags to cabin sidewalls aft of the aft dividing partitions.
- I. Install magazine racks to aft face of the aft dividing partitions.
- J. Place backs of seats in normal position.
- K. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.





CONVERT VIP PASSENGER CONFIGURATION TO 176 PASSENGER CONFIGURATION -
CONVERSION INSTRUCTIONS

1. General

- A. This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion, operations and to other applicable sections for detailed removal/installation information.
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation or relocation during this conversion.
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, show a plan view of each configuration.
 - (3) The area affected by this conversion is the area aft of the crew rest area and forward of the midcabin emergency escape hatches.
 - (a) Accommodation equipment aft of galley No. 3 (in the extreme aft cabin area) is not affected by this conversion.
 - (b) Accommodation equipment forward of galley No. 2 (in the extreme forward cabin area) is not affected by this conversion.
 - (c) Passenger seating aft of the midcabin emergency escape hatches is affected only by seat spacing change.
 - (4) There are two options for means of removing and installing equipment affected in this conversion. The largest items of equipment to be handled are the two berthable divans, installed in the VIP configuration.
 - (a) The VIP berthable divans and seats may be carried to the aft end of the cabin and removed through the aft entry door. To provide space, all seat backs may be folded down (forward). The triple passenger seats requiring installation may be carried into the cabin over the folded aft seats in the same manner. To allow more space at the aft entry door area, the aft windscreen may be temporarily removed.

- (b) Alternatively, the main cargo door may be opened and equipment removed through the cargo door openings. Opening the main cargo door requires removal of the coat closet, a fixed hatrack, cargo doorway trim and ceiling panels, the forward lowered ceiling fairing, stowing of the folding hatracks, and reinstallation of these items after the main cargo door is closed.
- (c) The following conversion instructions assume option (a) is chosen, if option (b) method is chosen, instructions for opening the main cargo door are described in 25-15-200, paragraph 7 B (19), and closing instructions in 7.B.(31). For removal information of the coat closet installed at the forward end of the main cargo door, refer to 25-13-23, No. 2 Forward Left Coat Closet.

2. Remove VIP Passenger Configuration Equipment

- A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.
- B. Fold backs of all seats and the berthable divans to the forward (storing) position.
- C. Remove the aft dividing partitions. Refer to 25-13-3, VIP Dividing Partitions.
- D. Remove aft windscreen. Refer to 25-13-13, Aft Left Windscreen.

NOTE. Do not remove the windscreen from the cabin, removal is to provide space and prevent possible damage while performing the following step.
- E. Remove the eight VIP double seats, two tables, two berthable divans, and floor-track covers in this area.

NOTE. Removal of these items should be made by lifting and carrying over the aft seats and through the aft entry door. Stow floor-track covers in seat back magazine pockets.
- F. Remove coat closet aft of the crew rest area. Refer to 25-13-23, No. 2 Left Forward Coat Closet.
- G. Remove the forward dividing partitions. Refer to 25-13-52, Forward Dividing Partitions.



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3. Install 176 Passenger Configuration Equipment

- A Revise floor covering. Refer to 25-10-31, Floor Covering.
- B Install coat closet aft of galley No 2. Refer to 25-13-22, Forward Right Coat Closet.
- C Install forward aisle curtain and track. Refer to 25-15-50, Crew Rest Partitions.
- D. Install magazine rack to aft crew rest area partition.
- E. Remove stowage bags from cabin sidewall aft of the VIP aft dividing partitions location, and install one aft of the right coat closet and one aft of the crew rest area partition
- F. If required, install floor-mounted escape slides adjacent to the aft cabin emergency escape hatches. Refer to 25-1-27, Floor-Mounted Escape Slides.

NOTE: The floor-mounted escape slides are required in this configuration when complying with requirements in 25-15-100, Passenger Cabin Conversion Limitations.

- G Install 10 RH and 9 LH triple passenger seats, revise seat spacing throughout entire length of the cabin, and install floor-track covers.

NOTE: The seats should be brought into the cabin through the aft entry and carried over the aft passenger seats to the forward cabin area. The floor-track covers should be found in the seat back magazine pockets. These covers may be used as a means of establishing seat spacing after the each forward seat is located. For seat location and spacing information, refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.

- H. Place backs of seats in normal position.
- I. Relocate passenger service units throughout the cabin to match seat spacing. Refer to 25-12-2, Passenger Cabin Service Units.
- NOTE: This may require installation of additional units.
- J. Install aft left windscreen. Refer to 25-13-13, Aft Left Windscreen.
- K. Install hatrack header on forward end of the forward main cargo door folding hatrack.

NOTE: Header is installed to fill gap vacated by removal of the No. 2 forward coat closet partition.

- L. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.





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CONVERT 176 PASSENGER CONFIGURATION TO 3 TROUGH 10 PALLET COMBINED PASSENGER/CARGO STANDARD CONFIGURATIONS - CONVERSION INSTRUCTIONS

1 General

A. This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration
- (3) The cabin area affected by these conversions is from the aft wall of lavatory A to the forward wall of galley No. 3. Accommodation equipment in the extreme aft cabin area is not affected.
- (4) In these combined passenger/cargo configurations, the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin.
 - (a) The movable cargo/passenger dividing partition must be installed at any of the following positions, each of which corresponds to one of the 3 through 10 pallet combined passenger/cargo standard configurations.

Body Station 600F+16.	3 pallet configuration
Body Station 600L+6	4 pallet configuration
Body Station 696.	5 pallet configuration
Body Station 786.	6 pallet configuration
Body Station 876.	7 pallet configuration
Body Station 960+6.	8 pallet configuration
Body Station 1016	9 pallet configuration
Body Station 1106	10 pallet configuration



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- (b) For removal and installation instructions, refer to 25-13-55, Movable Cargo/Passenger Dividing Partition

NOTE A dry-chemical fire extinguisher must be installed on the aft side of the moveable cargo/passenger dividing partition above the door

- (5) In these 5, 6, 7, and 8 pallet standard configurations, the center lowered ceiling compartment (in which the center life rafts are housed) is removed from its normal, or forward, locations, (where it is located in the all-passenger and the 3 and 4 pallet standard configurations) and installed further aft, approximately opposite the aftcabin emergency hatches. Both locations are provided with identical facilities for installation of the center lowered ceiling compartment, and the procedure for removal and installation is the same for either location. Cover plates are provided to conceal the holes in the cabin ceiling at the location not being used. In these 9 and 10 standard pallet configurations, the center lowered ceiling compartment is completely removed from the cabin. (Refer to 25-10-24, Center Lowered Ceiling.)
- (6) The midcabin and aftcabin emergency escape hatches are deactivated whenever the moveable cargo/passenger dividing partition is installed at or aft of their locations.
- (7) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 25, Oxygen systems
- (8) The seat spacing for the combined passenger/cargo configurations varies. These seat spacing variations are shown in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.

2 Remove and/or Convert Passenger Configuration Equipment

- A Perform preconversion requirements. Refer to 25-15-200, paragraph 8
- B Remove equipment and trim in the main cargo door area. Refer to 25-15-200, paragraph 7.B.(19).
- C Remove passenger seats and floor-track covers.

NOTE Remove only the quantity of seats to reduce seats to the number which is required in accordance to the combined configuration the cabin is being converted to. Stow the floor-track covers in the seat back magazine pockets.



- O. Remove floor-mounted escape slides. Refer to 25-1-27, Floor-Mounted Escape Slides

NOTE: This step is applicable only if the escape slides are installed and conversion is being made to the 9 or 10 pallet standard configuration.

- E. Remove stowage bags from cabin sidewall.

NOTE: These bags are located immediately aft of the right coat closet and aft to the crew rest area partition.

- E.1. Remove assist handle from partition installed immediately aft of the forward entry door.

- F. Remove all forward passenger partitions, coat closets, curtains, and curtain tracks.

(1) Refer to the following sections:

25-13-22, Forward Right Coat Closet
25-13-48, No. 1 Forward Left Coat Closet
25-13-50, Crew Rest Area Partitions

- G. Remove floor covering. Refer to 25-10-31, Floor Covering

NOTE: Remove only that portion of floor covering forward of the location in which the movable cargo/passenger dividing partition will be installed.

- H. Remove crew rest seats, table, and crew berth and supports. Refer to 25-10-71, Crew Berth.

- I. Remove forward lowered ceiling compartment. Refer to 25-10-23, Forward Lowered Ceiling.

- J. Remove or relocate the center lowered ceiling compartment. Refer to 25-10-24, Center Lowered Ceiling.

NOTE: This step is applicable only when converting to any of the 5 through 10 pallet configurations.

- K. If the center lowered was removed, or relocated to the aft position, install covers over attachment voids in the forward location.

- L. Remove fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks.



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- M Remove main galleys No 1 and No 2. Refer to 25-17-43, Galley Units
- N Remove section of curtain track attached to forward lowered ceiling inboard of lavatory B.
- O Remove lavatory B Refer to 25-18-42, Lavatory Compartments.
- P Install drain plug in lavatory B floor drain line
- Q Convert the forward galley vent system Refer to 25-15-200, paragraph 7 B (25)
- R Remove pallet electrical receptacles cover on the left side cabin sidewall in crew rest area.
- S Remove, or fold and secure folding hatracks Refer to 25-10-42, Folding Hatracks

NOTE This applies only to those folding hatracks forward of the location in which the movable cargo/passenger dividing partition will be installed.

- T Remove door-mounted escape slide and floor fitting from the forward galley service door. Refer to 25-1-29, Door-Mounted Escape Slide, and 25-1-35, Escape Slide Floor Fitting
- U Revise seat spacing

NOTE Refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2

- V Relocate passenger service units to match seat spacing Refer to 25-12-2, Passenger Service Units.

- W Install floor-mounted escape slides adjacent to the aftcabin emergency escape hatches and remove inoperative placards from the hatch external door handles. Refer to 25-1-27, Floor-Mounted Escape Slides.

NOTE This step does not apply for the 9 and 10 pallet configurations

3. Install Cargo Configuration Equipment

- A. Install sidewall protector panels in crew rest area. Refer to 25-36-35, Forward Left Sidewall Protector Panels.



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- B If the folding hatracks were removed, install sidewall protector panels. Refer to 25-36-32, Sidewall Protector Panels.

NOTE Installation of the sidewall protector panels on the main cargo door will require temporary closing of the door. For door closing/opening procedures, refer to Chapter 52, Main Cargo Door.

WARNING BEFORE CLOSING/OPENING THE MAIN CARGO DOOR IT IS ESSENTIAL TO ASCERTAIN THAT ALL PERSONNEL AND EQUIPMENT ARE CLEAR OF PATH TO BE SWEEPED BY THE DOOR.

- C. Attach safety net stowage bag to cabin sidewall or sidewall protector panel aft of main cargo door. Refer to 25-15-200, paragraph 7.B.(19).
- D If required, install crew galley aft of lavatory A. Refer to 25-17-44, Crew Galley.
- E. Install portable oxygen bottle to aft face of lavatory A, or (if installed) crew galley.

NOTE This oxygen bottle is obtained from those removed from the folding hatracks.

- F. Install crew reading light. Refer to 25-15-200, paragraph 7.B.(30).
- G. Install fume-tight curtain. Refer to 25-36-61, Fume-Tight Curtain.
- H. Install dry-chemical fire extinguisher, fire extinguisher extension applicator, and emergency life raft and survival kit assembly. Refer to 25-15-200, paragraph 7.B.(11).
- (1) Position fire extinguisher in accordance with decal on cabin floor.
- (2) Secure fire extinguisher by rotating handles to lie parallel with fire extinguisher body.
- I Install dado protector panels to RH cabin sidewall. Refer to 25-36-34, Dado Protectors.

NOTE. These dado protector panels are installed only if the folding hatracks were stowed in the cargo position, and no sidewall protector panels installed.

- J. Install window cover to the forward galley service door. Refer to 25-15-200, paragraph 7.B.(18).



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- K Install protective cover plates to the forward and aft main cargo door opening structure. Refer to 25-36-33, Main Cargo Doorway Protective Covers
- L Install the movable cargo/passenger dividing partition. Refer to 25-13-55, Movable Cargo/Passenger Dividing Partition.

NOTE. Ensure that a dry-chemical fire extinguisher is installed on the aft face of the partition
- M Attach an inoperative external door handle placard to the forward galley service door, and any emergency escape hatch located forward of the movable cargo/passenger dividing partition. Refer to 25-15-200, paragraph 7 B.(21)
- M 1 Install assist handle to cabin sidewall immediately aft of the forward entry door
- O Install cargo carrying system.
 - (1) Refer to 25-36-101, Cargo Carrying System for cargo system location information.
 - (2) Refer to the following sections for installation information:
 - 25-36-122, Roller Trays
 - 25-36-132, Side Restraints
 - 25-36-142 Retractable Side Restraints
 - 25-36-151, Transfer Panels
 - 25-36-162, Pallet Locks
 - 25-36-172, Forward and Aft Stops
- P Perform postconversion requirements. Refer to 25-15-200, paragraph 9.
- Q After cargo is loaded, remove (if installed) main cargo door threshold assemblies and safety net before closing cargo door.
 - (1) Refer to 25-36-191, Main Cargo Door Threshold.
 - (2) Stow safety net in stowage bag aft of main cargo door.
- R After main cargo door is closed (in accordance with Chapter 52, Main Cargo Door) stow the main cargo door hold-open strut on the sidewall protector panels forward of the main cargo door.



CONVERT 3 THROUGH 10 PALLET COMBINED PASSENGER/CARGO STANDARD CONFIGURATIONS
TO 176 PASSENGER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

- A. This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information
- (1) Figures 203 through 207 in 25-15-200 Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
 - (3) The cabin area affected by these conversions is from the aft wall of lavatory A to the forward wall of galley No. 3. Accommodation equipment in the extreme aft cabin area is not affected.

2 Remove Cargo Configuration Equipment

- A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.

NOTE: It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of the cargo pallets through the main cargo door opening.

- B Remove cargo carrying system.

- (1) Refer to the following sections:

- 25-36-122, Foller Trays
- 25-36-132, Side Restraints
- 25-36-142, Retractable Side Restraints
- 25-36-151, Transfer Panels
- 25-36-162, Pallet Locks
- 25-36-172, Forward and Aft Stops



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- C Remove the movable cargo/passenger dividing partition Refer to 25-13-55, Movable Cargo/Passenger Dividing Partition
- D Remove fume-tight curtain. Refer to 25-36-61, Fume-Tight Curtain
- E If installed, remove dado protector panels from RH cabin sidewall Refer to 25-36-34, Dado Protectors

NOTE These dado protectors should be found installed only if the sidewall protector panels are not installed

- F Remove fire extinguisher extension applicator from the forward LH sidewall protector panels
- G Remove the forward LH sidewall protector panels Refer to 25-36-35, Forward Left Sidewall Protector Panels.
- H If installed, remove sidewall protector panels. Refer to 25-36-32, Sidewall Protector Panels.

NOTE This applies to those panels which when the cabin was converted to accommodate cargo, may have been optionally installed to the main cabin and cargo door sidewalls instead of stowing the folding hatracks in the cargo position. The main cargo door sidewall protector panels will be removed later after the door is closed.

- I Remove dry-chemical fire extinguisher, and emergency life raft and survival kit assembly Refer to 25-15-200, paragraph 7 B.(11).
- J. Remove crew reading light. Refer to 25-15-200 paragraph 7.B (30)
- K. Remove oxygen bottle from aft face of lavatory A, or (if installed) crew galley.

NOTE This oxygen bottle should be retained to install on the fold' hatracks

- L If installed, remove crew galley Refer to 25-17-44, Crew Galley
- M. Remove window cover from the forward galley service door Refer to 25-15-200, paragraph 7.B.(18).
- N. Remove placards from the external door handle of the forward galley service door, and from any emergency escape hatch which was located forward of the movable cargo/passenger dividing partition Refer to 25-15-200, paragraph 7.B.(21).
- O If installed, remove covers over attachments in the forward location for the center lowered ceiling compartment

- P Remove assist handle attached to cabin sidewall immediately aft of the forward entry door.

3. Install and/or Convert Passenger Configuration Equipment

- A. Remove or install floor-mounted escape slides and external door handle inoperativelacards. Refer to 25-1-27, Floor-Mounted Escape Slides.

NOTE: Removal or installation of these escape slides is dependent on which combined configuration conversion is from, and installation in the 176 passenger configuration as determined with requirements of 25-15-100, Passenger Cabin Conversion Limitations.

- B. Install pallet electrical receptacles cover on left side forward cabin sidewall.

NOTE: This cover should be installed by snapping into place. Before installing cover, check that dust caps are installed on the receptacles.

- C. Convert the forward galley vent systems. Refer to 25-15-200, paragraph 7.8.(25).

- D. Remove drain line plug and install lavatory 8. Refer to 25-18-42, Lavatory Compartments.

- E. Install section of curtain to forward lowered ceiling inboard of lavatory 8.

- F. Install galleys No. 1 and No. 2. Refer to 25-17-43, Galley Units.

- G. Install, or raise folding hatracks to passenger accommodation position. Refer to 25-10-42, Folding Hatracks.

NOTE: Folding hatracks on the main cargo door will be installed or raised later, after door is closed.

- H. Install fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks.

- I. Install floor covering. Refer to 25-10-31, Floor Covering.

- J. Install door-mounted escape slide to forward galley service door. Refer to 25-1-29, Door-Mounted Escape Slide.

- K. Install floor fitting for door-mounted escape slide at forward galley service door. Refer to 25-1-35, Escape Slide Floor Fitting.



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- L Install center lowered ceiling compartment Refer to 25-10-24, Center Lowered Ceiling
- M Install forward lowered ceiling compartment. Refer to 25-10-24, Forward Lowered Ceiling

NOTE Do not install fairing (bullnose) across the aft end of the compartment. This section will be installed later, after the main cargo door is closed.

- N Install the crew rest area berth. Refer to 25-10-71, Crew Berth
- O Install the forward left coat closet Refer to 25-13-48, No 1 Forward Left Coat Closet.
- O 1 Install assist handle to the forward partition of the No 1 forward left coat closet.
- P Stow crew rest seat berth mattress in forward left coat closet.
- Q Install seats and floor-track covers. Refer to 25-11-0, Seats

NOTE Do not install seats in the main cargo door area, these seats should be placed in the cabin for installation in their proper location after the door is closed. The floor-track covers should be found stowed in the seat back magazine pockets. These covers may be used as a means of establishing the seat spacing after each first forward seat is located. Seats presently installed will require seat spacing adjustment. For seat spacing information, refer to 25-15-200, Cabin Accommodation Conversions Description and Operation, figure 2.

- R Relocate passenger service units to match seat spacing. Refer to 25-12-2, Passenger Service Units.
- S Install crew rest area game table.
- T Install crew rest area partition and curtain tracks Refer to 25-13-50, Crew Rest Area Partitions.
- J Install forward right coat closet. Refer to 25-13-22, Forward Right Coat Closet
- V Install storage bags to cabin sidewall.

NOTE. These bags are installed one aft of the right coat closet and one aft of the crew rest partition.

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- W Remove main cargo doorway protective covers, close door and install trim in main cargo door area Refer to 25-15-200, paragraph 7 B (31)
- X Install, or raise folding hatracks on main cargo door to passenger position Refer to 25-10-42, Folding Hatracks
- Y Install fixed hatrack and header in main cargo door area Refer to 25-10-46, Fixed Hatracks and 25-10-48, Headers
- Z Install fairing (bullnose) across aft end of the forward lowered ceiling compartment Refer to 25-10-23, Forward Lowered Ceiling
- AA Install seats in the main cargo door area
- AB Ensure blank sign is installed on handle of the aft life raft compartment door of the forward lowered ceiling compartment
- AC Ensure magazine racks are installed on the right coat closet partition and on the crew rest area partition
- AD Perform postconversion requirements Refer to 25-10-200, paragraph 9





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CONVERT 176 PASSENGER CONFIGURATION TO 3 THRU 8 PALLET COMBINED PASSENGER/CARGO WITH CREW REST ACCOMMODATION AND CARGO ELEVATOR CONFIGURATIONS : CONVERSION INSTRUCTIONS

1. General

A. This section provides step by step instructions to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

- (1) Figures 203 thru 207 in 25-15-200, Cabin Accommodation Conversions Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration.
- (3) The cabin area affected by these conversions is from aft of the crew rest area to the forward wall of galley No. 3. Accommodation equipment in the extreme aft cabin and forward cabin areas is not affected.
- (4) In these combined passenger/cargo configurations the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin.
 - (a) The movable cargo/passenger dividing partition may be installed at any of the following positions, each of which corresponds to one of the 3 through 8 pallet combined passenger/cargo configurations:

Body Station 696.	3 pallet configuration
Body Station 786.	4 pallet configuration
Body Station 876.	5 pallet configuration
Body Station 960+6.	6 pallet configuration
Body Station 1016	7 pallet configuration
Body Station 1106	8 pallet configuration

- (b) For removal and installation instructions, refer to 25-13-55, Movable Cargo/Passenger Dividing Partition.

NOTE: A dry-chemical fire extinguisher must be installed on the aft side of the movable cargo/passenger dividing partition above the door.

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- (5) In these 3, 4, 5, and 6 pallet configurations, the center lowered ceiling compartment (in which the center life rafts are housed) is removed from its normal, or forward, location (where it is located in the all-passenger and the 3 and 4 pallet standard configurations), and installed further aft, approximately opposite the aft cabin emergency hatches. Both locations are provided with identical facilities for installation of the center lowered compartment, and the procedure for removal and installation is the same for either location. Coverplates are provided to conceal the holes in the cabin ceiling at the location not being used. In these 7 and 8 pallet configurations, the center lowered ceiling compartment is completely removed from the cabin. (Refer to 25-10-24, Center Lowered Ceiling.)
- (6) The midcabin and aft cabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations.
- (7) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 25, Oxygen Systems.
- (8) The seat spacing for the combined passenger/cargo configurations varies. These seat spacing variations are shown in 25-15-200, Cabin Accommodations Conversions - Description and Operation, figure 2.

2 Remove and/or Convert Passenger Configuration Equipment

- A Perform conversion requirements. Refer to 25-15-200, paragraph 8.
- B Remove equipment and trim in the main cargo door area. Refer to 25-15-200, paragraph 7 B (19).
- C Remove passenger seats and floor-track covers.

NOTE Remove only the quantity of seats to reduce seats to the number which is required in accordance to the combined configuration the cabin is being converted to. Stow the floor-track covers in the seat back magazine pockets.

- D Remove stowage bags from cabin sidewall.

NOTE These bags are located immediately aft of the right coat closet and crew rest area partition.



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- E Remove the forward right coat closet Refer to 25-13-22, Forward Right Coat Closet
- F Remove forward aisle curtain and track Refer to 25-13-50, Crew Rest Area Partitions
- G Remove magazine rack from the crew rest area aft partition
- H Remove floor covering Refer to 25-10-31, Floor Covering
- I Relocate, or remove the center lowered ceiling compartment and install covers to attachment voids in the forward location Refer to 25-10-243 Center Lowered Ceiling
- J Remove floor smoke vent cover aft of crew rest area
- K Remove fixed hatrack aft of galley No 2 Refer to 25-10-46, Fixed Hatracks
- L Remove, or fold and secure folding hatracks Refer to 25-10-42, Folding Hatracks

NOTE This applies only to those folding hatracks forward of the location in which the movable cargo/passenger dividing partition will be installed. The three forward RH folding hatracks must be removed for cargo elevator operation clearance. All other folding hatracks may be optionally folded or removed. (Refer to 25-15-200, paragraph 10.)

- M Install or remove, floor-mounted escape slides adjacent to the aft cabin emergency escape hatches and remove or install, inoperative placards from the hatch external door handles Refer to 25-1-27, Floor-Mounted Escape Slides, and 25-15-200, paragraph 7 B (21)

NOTE Installation is applicable for the 3 through 6 pallet configurations, if the escape slides are not presently installed. If conversion is to the 7 or 8 pallet configuration and the escape slides are presently installed, remove them and install placard

- N Revise seat spacing in aft cabin area Refer to 25-15-200, Cabin Accommodation Conversions Description and Operation,, figure 2
- O Relocated passenger service units to match seat spacing Refer to 25-12-2, Passenger Service Units



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3 Install Cargo Configuration Equipment

- A If the folding hatracks were removed, install sidewall protector panels. Refer to 25-36-32, Sidewall Protector Panels.

NOTE: Installation of the sidewall protector panels on the main cargo door (if the folding hatracks were removed) will require temporary closing of the door. For door closing/opening procedures, refer to Chapter 52, Main Cargo Door.

WARNING BEFORE CLOSING/OPENING THE MAIN CARGO DOOR IT IS ESSENTIAL TO ASCERTAIN THAT ALL PERSONNEL AND EQUIPMENT ARE CLEAR OF PATH TO BE SWEEP BY THE DOOR.

- B Attach safety net stowage bag to cabin sidewall or protector panel aft of the main cargo door. Refer to 25-15-200, paragraph 7.8 (19).
- C Install three sections of the forward dividing partitions. Refer to 25-13-52, Forward Dividing Partitions.
- D Install dry-chemical fire extinguisher, fire extinguisher extension applicator and main cargo door hold-open strut container to short section of the forward dividing partitions. Refer to 25-18-200 paragraph 7.8 (12).
- E Attach one portable oxygen bottle to the crew rest area aft partition at lower inboard face (footwell).

NOTE This oxygen bottle is obtained from those removed from the folding hatracks.

- (1) Attach (using double-back tape) two oxygen bottle location placards, one to the forward face of the crew rest area aft partition and one to the aft inboard end of the crew rest area curtain track.

- F Install dado protector panels to RH cabin sidewall. Refer to 25-36-31 Dado Protectors.

NOTE These dado protector panels are installed only if the folding hatracks were stowed in the cargo position and no sidewall protector panels installed.

- G Install protective cover plates to the forward and aft main cargo door opening structure. Refer to 25-36-33, Main Cargo Doorway Protective Covers.
- H Install the movable cargo/passenger dividing partition. Refer to 25-13-55, Movable Cargo/Passenger Dividing Partition.

NOTE: Ensure that a dry-chemical fire extinguisher is installed on the aft face of the partition.

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- I Attach an inoperative external door handle placard to any emergency escape hatch located forward of the movable cargo/passenger dividing partition Refer to 25-15-200, paragraph 7 B (21)
- J Install cargo carrying system and cargo elevator
 - (1) Refer to 25-36-101, Cargo Carrying System for cargo system equipment location information
 - (2) Refer to the following sections for Installation information
 - 25-36-122, Roller Trays
 - 25-36-132, Side Restraints
 - 25-36-142, Retractable Side Restraints
 - 25-36-151, Transfer Panels
 - 25-36-162, Pallet Locks
 - 25-36-172, Forward and Aft Stops
 - 25-36-200, Cargo Elevator
- K Perform postconversion requirements Refer to 25-15-200, paragraph 9
- L After cargo is loaded, remove (if installed) main cargo door threshold assemblies and safety net before closing cargo door.
 - (1) Refer to 25-36-191, Main Cargo Door Threshold
 - (2) Stow safety net in stowage bag aft of main cargo door
- M After main cargo door is closed (in accordance with Chapter 52, Main Cargo Door) stow the main cargo door hold-open strut in container on the forward dividing partition



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CONVERT 3 THRU 8 PALLET COMBINED PASSENGER/CARGO WITH CREW REST
ACCOMMODATION AND CARGO ELEVATOR CONFIGURATIONS TO 176 PASSENGER
CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

A. This section provides step by step instructions to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information

- (1) Figures 203 thru 207 in 25-15-200, Cabin Accommodation Conversions Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
- (3) The cabin area affected by these conversions is from the crew rest area to the forward wall of galley No. 3. Accommodation equipment in the extreme aft cabin and forward cabin areas is not affected.

2. Remove Cargo Configuration Equipment

A. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.

NOTE. It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of the cargo pallets through the main cargo door opening.

B Remove cargo elevator and cargo carrying system.

- (1) Refer to the following sections.

25-36-122, Foller Trays
25-36-132, Side Restraints
25-36-142, Retractable Side Restraints
25-36-151, Transfer Panels
25-36-162, Pallet Locks
25-36-172, Forward and Aft Stops
25-36-200, Cargo Elevator



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- C Remove the movable cargo/passenger dividing partition. Refer to 25-13-55, Movable Cargo/Passenger Dividing Partition.
- D Remove inoperative placards attached to external emergency escape hatch door handles. Refer to 25-15-200, paragraph 7.8 (21).
- E If installed, remove dado protector panels from RH cabin sidewall. Refer to 25-36-34, Dado Protectors.

NOTE The dado protectors should be found installed only if the sidewall protector panels are not installed.

- F Remove dry-chemical fire extinguisher, fire extinguisher extension applicator and main cargo door hold-open strut container from short section of forward dividing partitions.
- G Remove three sections of forward dividing partitions. Refer to 25-13-Forward Dividing Partitions
- H. Remove portable oxygen bottle attached to the crew rest area aft partition.

NOTE This oxygen bottle will be installed on one of the folding hatracks

- I Remove oxygen bottle location placards, one attached to the crew rest area aft partition and one attached to the curtain track.
- J If installed, remove sidewall protector panels. Refer to 25-36-32, Sidewall Protector Panels.

NOTE. This applies to those panels, which when the cabin was converted to accommodate cargo, may have been optionally installed to the main cabin and cargo-door sidewalls instead of stowing the folding hatracks in the cargo position. The main cargo door sidewall protector panels will be removed later, after the door is closed.

3 Install and/or Convert Passenger Configuration Equipment

- A Remove or install floor-mounted escape slides and external door handle inoperative placards. Refer to 25-1-27, Floor-Mounted Escape Slides, and 25-15-200, paragraph 7.8.(21).

NOTE: Removal or installation of these escape slides is dependant on which combined configuration conversion is from, and on installation in the 176 passenger configuration, as determined with requirements of 25-15-100, Passenger Cabin Conversion Limitations

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- B Install smoke vent cover aft of the crew rest area partition
- C Install magazine rack to crew rest area partition.
- D Relocate, or install center lowered ceiling in forward location Refer to 25-10-24, Center Lowered Ceiling

NOTE If the center lowered was relocated from the aft to the forward location, ensure that attachment void covers are installed in the aft location.

- A Install, or raise folding hatracks to passenger accommodation position Refer to 25-10-42, Folding Hatracks.

NOTE The folding hatracks on the main cargo door will be installed or raised later, after the door is closed.

- F Install fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks
- G Install floor covering. Refer to 25-10-31, Floor Covering
- H Install right forward coat closet. Refer to 25-13-22, Forward Right Coat Closet.
- I Install forward aisle curtain track and curtain. Refer to 25-15-50, Crew Rest Area Partitions.
- J. Install stowage bags to cabin side-wall.

NOTE. These bags are installed one aft of the forward right coat closet and one aft of the crew rest area partition.

- K Install passenger seats and floor-track covers. Refer to 25-11-0, Seats

NOTE Do not install seats in the main cargo door area, these seats should be placed in the cabin for installation in their proper location after the door is closed. The floor-track covers should be found stowed in the seat back magazine pockets. These covers may be used as a means of establishing the seat spacing after each first forward seat is located. Seats presently installed will require seat spacing adjustment. For seat spacing information, refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.



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- L Relocate passenger service units to match seat spacing. Refer to 25-12-2, Passenger Service Units
- M Remove main cargo doorway protective covers, close door and install trim in main cargo door area. Refer to 25-15-200, paragraph 7 B (31).
- N Install, or raise folding hatracks on main cargo door to passenger position. Refer to 25-10-42, Folding Hatracks
- O Install fixed hatrack and header in main cargo door area. Refer to 25-10-46, Fixed Hatrack and 25-10-48, Headers
- P Install fairing (bullnose) across aft end of the forward lowered ceiling compartment. Refer to 25-10-23, Forward Lowered Ceiling.
- Q Install seats in main cargo door area.
- R Perform postconversion requirements. Refer to 25-15-200, paragraph 9.



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CONVERT 176 PASSENGER CONFIGURATION TO 2 THRU 8 PALLET COMBINED PASSENGER/CARGO WITH CREW REST ACCOMMODATION CONFIGURATIONS - CONVERSION INSTRUCTIONS

1. General

- A. Conversion from the 176 passenger configuration to any one of the 2 through 8 combined passenger/cargo with crew rest accommodation configurations, is the same as conversion to the 3 through 8 pallet combined passenger/cargo with crew rest accommodation and cargo elevator configurations (Section 25-15-313) except installation of the cargo elevator, and the cargo carrying system installation

NOTE: The cargo carrying system installation is the same as installed in the standard cargo configurations. Refer to 25-36-101, Cargo Carrying System

- (1) The installation positions for the movable cargo/passenger dividing partition, seating capacities, and seat spacing, and center lowered ceiling location for these configurations are compatible with the 4 through 10 pallet standard configurations. Refer to 25-15-311, Convert 176 Passenger Configuration to 3 thru 10 Pallet Combined Passenger/Cargo Standard Configurations.

2. Convert Main Cabin

- A. Perform conversion instructions of 25-15-313, Convert 176 Passenger Configuration to 3 thru 8 Pallet Combined Passenger/Cargo with Crew Rest Accommodation and Cargo Elevator Configurations.

- (1) Disregard instructions to install cargo elevator





CONVERT 2 THRU 8 PALLET COMBINED PASSENGER/CARGO WITH CREW REST
ACCOMMODATION CONFIGURATIONS TO 176 PASSENGER CONFIGURATION -
CONVERSION INSTRUCTIONS

1 General

1. Conversion from any one of the 2 through 8 pallet combined passenger/cargo with crew rest accommodation configurations to the 176 passenger configuration, is the same as converting from the 3 through 8 pallet combined passenger/cargo with crew rest accommodation and cargo elevator configurations (Section 25-15-314) except there is no cargo elevator installed

2 Convert Main Cabin

- A Perform conversion instructions of 25-15-314, Convert 3 thru 8 Pallet Combined Passenger/Cargo with Crew Rest Accommodation and Cargo Elevator Configurations to 176 Passenger Configuration

- (1) Disregard reference to cargo elevator



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CONVERT 176 PASSENGER CONFIGURATION TO 2 THRU 8 PALLET COMBINED PASSENGER/CARGO WITH CARGO ELEVATOR CONFIGURATIONS - CONVERSION INSTRUCTIONS

1. General

- A Conversion from the 176 passenger configuration to any one of the 2 through 8 pallet combined passenger/cargo with cargo elevator configurations (which do not have crew rest accommodation) is the same as conversion to the 4 through 10 pallet combined passenger/cargo standard configurations (Section 25-15-311), except that the cargo elevator is installed.

NOTE Installation of the cargo carrying system to accommodate the cargo elevator, differs from the standard cargo configuration installation. Refer to 25-36-101, Cargo Carrying System.

- (1) The installation positions for the movable cargo/passenger dividing partitions, seating capacities, seat spacing, and center lowered ceiling location for these configurations are compatible with the 4 through 10 pallet standard configurations. Refer to 25-15-311, Convert 176 Passenger Configuration to 3 thru 10 Pallet Combined Passenger/Cargo Standard Configurations.

2. Convert Main Cabin

- A. Perform conversion instructions of 25-15-311, Convert 176 Passenger Configuration to 3 thru 10 Pallet Combined Passenger/Cargo Standard Configurations.

- (1) Install cargo elevator. Refer to 25-36-200, Cargo Elevator.

NOTE Installation of the cargo elevator should be completed immediately after cargo system is installed.



CONVERT 2 THRU 8 PALLET COMBINED PASSENGER/CARGO WITH CARGO ELEVATOR
CONFIGURATIONS TO 176 PASSENGER CONFIGURATION .
CONVERSION INSTRUCTIONS

1 General

- A Conversion from any one of the 2 through 8 pallet combined passenger/cargo with cargo elevator configurations to the 176 passenger configuration is the same as converting from the 4 through 10 pallet combined passenger/cargo standard configurations (Section 25-15-312), except removal of the elevator

2 Convert Main Cabin

- A. Perform instructions of 25-15-312, Convert 3 thru 10 Pallet Combined Passenger/Cargo Standard Configurations to 176 Passenger Configuration

(1) Remove cargo elevator Refer to 25-36-200, Cargo Elevator

NOTE Remove cargo elevator prior to removal of cargo carrying system.





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CONVERT 176 PASSENGER CONFIGURATION TO LITTER ACCOMMODATION CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

- A This section provides step by step instructions to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during this conversion
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation shows a plan view of each configuration
 - (3) The cabin area affected by this conversion is from the crew rest area to the forward wall of galley No. 3. Accommodation equipment in the extreme aft cabin and forward cabin areas is not affected
 - (4) It is assumed in the following instructions that the litters will be brought into the main cabin through the main cargo door opening, which necessitates removal of the passenger configuration trim and ceiling panels in the cargo door area
 - (5) Removal of the right-side folding hatracks is optional to stowing in the cargo accommodation position, the left-side folding hatracks, however, except the two extreme aft sections, must be removed to allow installation of the left-side litter carrier units

2 Remove and/or Convert Passenger Configuration-Equipment

- A Perform conversion requirements Refer to 25-15-200, paragraph 8
- B Remove equipment and trim in the main cargo door area Refer to 25-15-200, paragraph 7 B (19).
- C Remove passenger seats and floor-track covers

NOTE Stow floor-track covers in the seat back magazine pockets The two extreme aft left seats are not removed

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- D Remove magazine rack from the crew rest area aft partition
- E Remove stowage bags from cabin sidewall

NOTE These bags are located immediately aft of the right coat closet and crew rest area partition

- F Remove the right coat closet Refer to 25-13-22, Forward Right Coat Closet
- G Remove the aft windscreen Refer to 25-13-13, Aft Left Windscreen
- H Remove table from crew rest area
- I Remove floor covering Refer to 25-10-31, Floor Covering
- J Remove fixed hatrack aft of galley No 2 Refer to 25-10-46, Fixed Hatracks
- K Remove RH folding hatracks Refer to 25-10-42, Folding Hatracks.
- L Remove LH folding hatracks, except the two extreme aft hatracks Refer to 25-10-42, Folding Hatracks

NOTE The two aft folding hatracks remain in the passenger accommodation position

- M Install floor-mounted escape slides, adjacent to the aft cabin emergency escape hatches Refer to 25-1-27, Floor-Mounted Escape Slides Remove inoperative placards from the hatch external door handles Refer to 25-15-200, paragraph 7 B (21)

NOTE This step applies only if escape slides were not installed in the 176 passenger configuration

3 Install Litter Configuration Equipment

- A Attach safety net stowage bag to the sidewall protector panel immediately aft of the main cargo door. Refer to 25-15-200, paragraph 7.8 (12)
- B Install dado protector panels to RH cabin sidewall. Refer to 25-36-34, Dado Protectors
- C Install protective coverplates to the forward and aft main cargo door opening structure. Refer to 25-36-33, Main Cargo Doorway Protective Covers.
- D Install litter carrier. Refer to 25-11-101, Litter Carriers
- E Connect oxygen supply hoses to cabin oxygen system manifold and litter stanchion assemblies, and oxygen masks to oxygen outlets on stanchions. Refer to 25-15-200, paragraph 11.
- F Close main cargo door. Refer to Chapter 52, Main Cargo Door.
- G Stow main cargo door hold-open strut.

NOTE Stowing provision instructions for the strut will be supplied when available.

- H Attach one portable oxygen bottle to the crew rest area aft partition at the lower inboard face (footwell).

NOTE. This oxygen bottle is obtained from those removed from the folding hatracks

- I Attach (using double-back tape) two oxygen bottle location placards, one to the forward face of the crew rest area aft partition and one to the aft inboard end of the crew rest area curtain track.
- J Perform postconversion requirements. Refer to 25-15-200, paragraph 9



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CONVERT LITTER ACCOMMODATION CONFIGURATION TO 176 PASSENGER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

A This section provides step by step instructions to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during this conversion.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration.
- (3) The cabin area affected by this conversion is from the aft wall of galley No. 2 to the forward wall of galley No. 3. Accommodation equipment in the extreme aft cabin and forward cabin areas is not affected

2. Remove Litter Configuration Equipment

A Perform preconversion requirements. Refer to 25-15-200, paragraph 8.

NOTE It is assumed that the cargo door is open, the hold-open strut installed, and the safety net installed.

B. Disconnect oxygen supply hoses from litter stanchion assemblies and cabin oxygen system manifold. Refer to 25-15-200, paragraph 11.

NOTE. It is assumed that the oxygen masks were disconnected and removed when the litters were removed.

C. Remove litter carriers. Refer to 25-11-101, Litter Carriers.

D. Remove dado protector panels from RH cabin sidewall. Refer to 25-36-34, Dado Protectors.

E. Remove portable oxygen bottle attached to the crew rest area aft partition.

NOTE. This oxygen bottle will be installed on one of the folding hatracks.

F. Remove oxygen bottle location placards, one attached to the crew rest area aft partition and one attached to the curtain track



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3 Install and/or Convert Passenger Configuration Equipment

- A Remove floor-mounted escape slides. Refer to 25-1-27, Floor-Mounted Escape Slides. Install inoperative placards to hatch external door handles. Refer to 25-15-200, paragraph 7 B (21)

NOTE: This step applies only if the floor-mounted escape slides are not required in the 176 passenger configuration

- B Install RH folding hatracks. Refer to 25-10-42, Folding Hatracks

- C Install LH folding hatracks. Refer to 25-10-42, Folding Hatracks

NOTE: The folding hatracks on the main cargo door will be installed or raised later, after the door is closed.

- D Install fixed hatrack aft of galley No. 2. Refer to 25-10-46, Fixed Hatracks

- E Install floor covering. Refer to 25-10-31, Floor Covering

- F Install crew rest ~~game~~ table.

- G Install magazine rack on crew rest area aft partition.

- H Install aft windscreen. Refer to 25-13-13, Aft Left Windscreen.

- I. Install forward right coat closet. Refer to 25-13-22, Forward Right Coat Closet

- J Install storage bags to cabin sidewall

NOTE: These bags are installed, one aft of the forward right coat closet and one aft of the crew rest area partition.

- K Install passenger seats and floor-track covers. Refer to 25-11-0, Seats

NOTE: Do not install seats in the main cargo door area. These seats should be placed in the cabin for installation in their proper location after the door is closed. The floor-tracks should be found stowed in the seat back magazine pockets. These covers may be used as a means of establishing the seat spacing after each first forward seat is located. For seat spacing information, refer to 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.

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- L Remove main cargo doorway protective covers, close door and install trim in main cargo door area Refer to 25-15-200, paragraph 7 B (31)
- M Install, or raise folding hatracks on main cargo door to passenger position Refer to 25-10-42, Folding Hatracks
- N Install fixed hatrack and header in main cargo door area Refer to 25-10-46, Fixed Hatracks and 25-10-48, Headers
- O Install fair (bullrose) across aft end of the forward lowered ceiling compartment Refer to 25-10-23, Forward Lowered Ceiling
- P Install seats in main cargo door area
- Q Perform postconversion requirements Refer to 25-15-200, paragraph 9



CONVERT VIP PASSENGER CONFIGURATION TO ANY OTHER CONFIGURATION -
CONVERSION INSTRUCTIONS

1. General

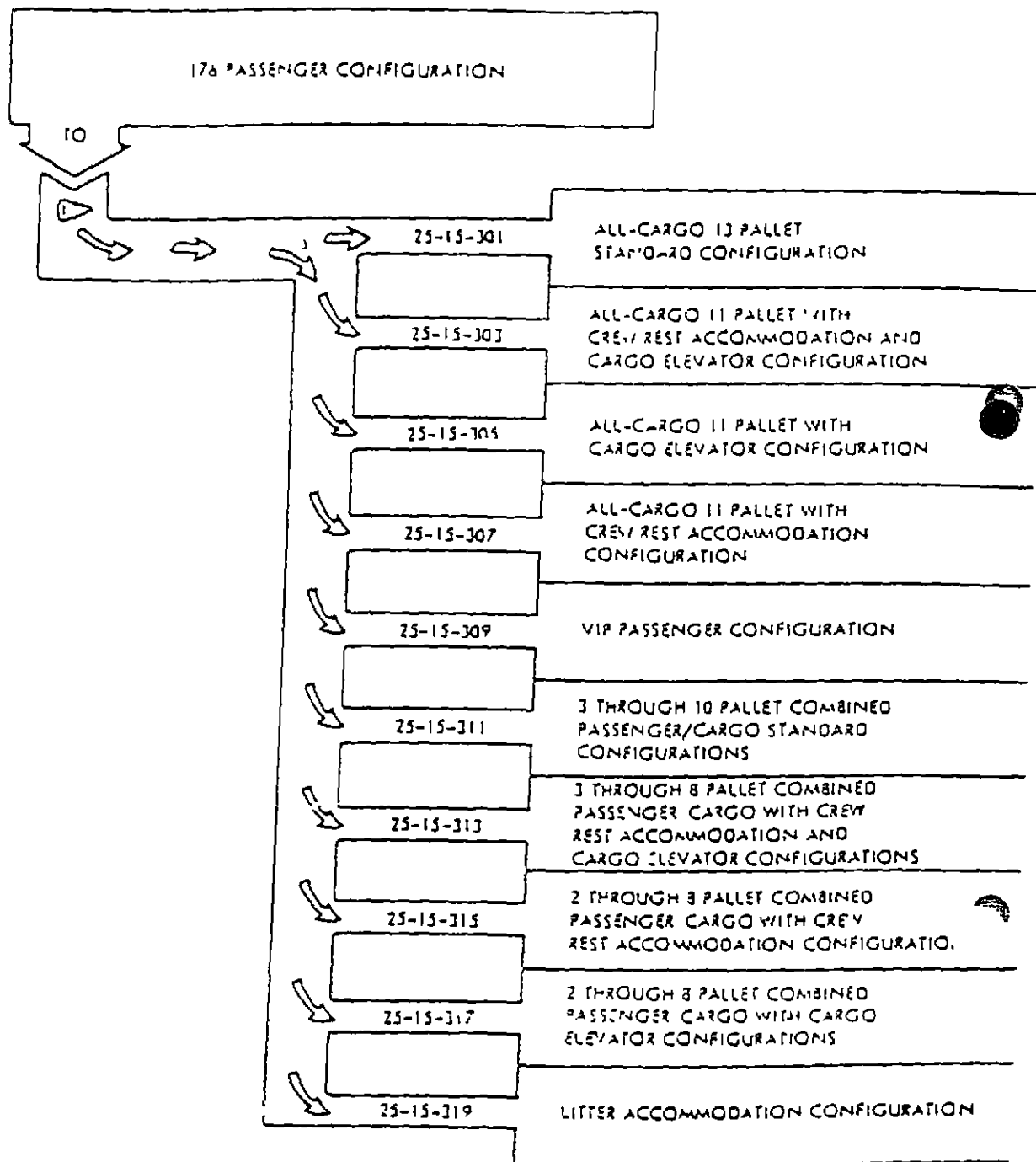
- A Conversion from the VIP passenger configuration to any of one of the various combined passenger/cargo configurations, all-cargo configurations, or the litter accommodation configuration is basically the same as conversion from the 176 passenger configuration, to these configurations except removal of the VIP particular accommodation equipment

NOTE Conversions from the 176 passenger configuration to the various, combined passenger/cargo configurations, all-cargo configurations, or the litter accommodation configuration, and to the VIP passenger configuration are covered in the odd numbered conversion instruction sections 25-15-301 through 25-15-319.

- (1) Instructions for removal of the VIP particular accommodation equipment are contained in 25-15-310, Convert VIP Passenger Configuration to 176 Passenger Configuration - Conversion Instructions.
- (2) Figures 203 through 207 in 25-15-200 Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during any of these conversions.
- (3) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.

2. Convert Main Cabin

4. Convert from the VIP passenger configuration, to any other configuration by performing the applicable Instructions in odd numbered sections 25-15-301 through 25-15-319, and removing VIP passenger equipment in accordance with instructions in 25-15-310. (See figure 201.)



 REFER TO GENERAL INFORMATION (PLUS VIP PASSENGER EQUIPMENT REMOVAL INSTRUCTIONS IN 25-15-310)



CONVERT TO VIP PASSENGER-CONFIGURATION FROM ANY OTHER CONFIGURATION

1 General

- A Conversion to the VIP passenger configuration from any one of the various combined passenger/cargo configurations, all-cargo configurations, or the litter accommodation configuration, is basically the same as conversion from these configurations to the 176 passenger configuration, except installation of the VIP particular accommodation equipment

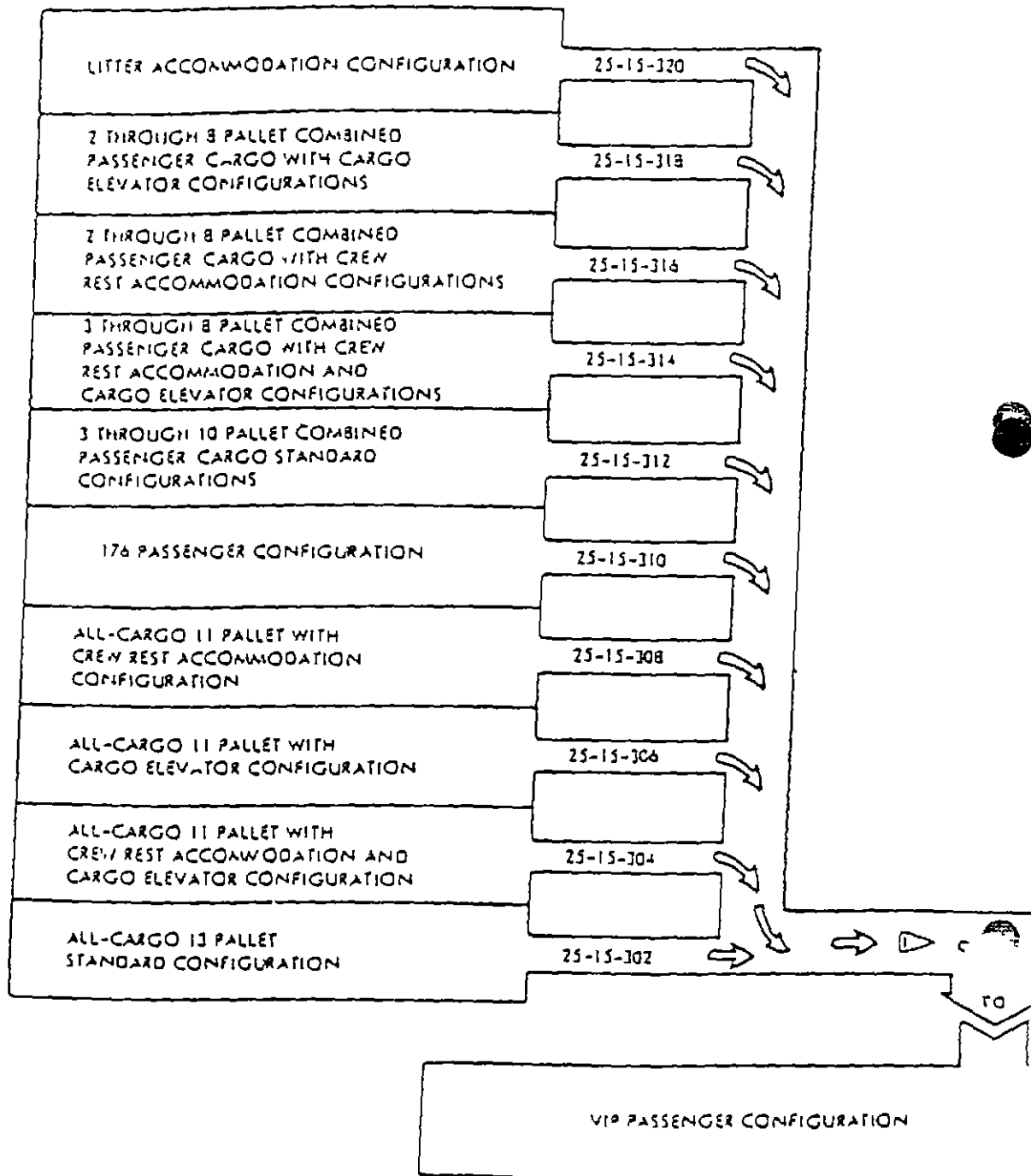
NOTE Conversions to the 176 passenger configurations from any one of the various combined passenger/cargo configurations, all-cargo configurations, or the litter accommodation configuration, and from the VIP passenger configuration are covered in the even numbered conversion instruction sections 25-15-302 through 25-15-320

- (1) Instructions for installation of the VIP particular accommodation equipment are contained in 25-15-309, Convert 176 Passenger Configuration to VIP Passenger Configuration - Conversion Instructions
- (2) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during any of these conversions.
- (3) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration

2 Convert Main Cabin

- A Convert to the VIP passenger configuration from any other configuration by performing the applicable instructions in even number sections 25-15-302 through 25-15-320, and installing VIP passenger equipment in accordance with instructions in 25-15-309 (See figure 201)

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REFER TO GENERAL INFORMATION PLUS VIP PASSENGER EQUIPMENT INSTALLATION INSTRUCTIONS IN 25-15-309



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CONVERT BETWEEN 3 THROUGH 10 PALLET COMBINED PASSENGER/CARGO STANDARD CONFIGURATIONS OR TO ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

A This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion information and operations, and to other applicable sections for detailed removal/installation information

- (1) Figures 203 through 207 In 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration
- (3) Conversion between these configurations or to any other configuration, affects the movable cargo/passenger dividing, partition, passenger seats, cargo carry system equipment, the folding hatracks, emergency escape hatches, floor covering, and location of the center lowered ceiling compartment
 - a) The movable cargo/passenger dividing partition divides the passenger and cargo portions of the main cabin Any conversion between these configurations necessitates relocation of the partition
 - 1) The movable cargo/Passenger dividing partition must be installed at any of the following positions, each of which corresponds to one of the 3 through 10 pallet combined passenger/cargo standard configurations

Body station 600F+16	3 pallet configuration
Body Station 600L+6	4 pallet configuration
Body Station 696	5 pallet configuration
Body Station 786	6 pallet configuration
Body station 876	7 pallet configuration
Body Station 960+6	8 pallet configuration
Body Station 1016 .	9 pallet configuration
Body station 1106 . .	10 pallet configuration

- 2) For removal and installation instructions, refer to 25-13-55, Movable Cargo/Passenger Dividing Partition.

NOTE A dry-chemical fire extinguisher must be installed on the aft side of the movable cargo/passenger dividing partition above the door

- 3) For location of the partition in other combined passenger/cargo configurations, refer to 25-15-200, figure 204
- (4) The seat spacing for the combined passenger/cargo configurations varies. These and other configuration seat spacing variations are shown in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.
- (5) The cargo carrying system equipment supporting the cargo pallets requires removal or installation dependent on conversion to a lower or higher pallet configuration, or when converting to a cargo elevator installed configuration. For information of cargo system location, refer to 25-36-101, Cargo Carrying System
- (6) The folding nitracks must be raised to the passenger position or stowed in the cargo position (or installed or removed) dependent on conversion. Refer to 25-15-200, paragraph 10, for option of stowing folding nitracks in cargo configurations.
- (7) In these 5, 6, 7, and 8 pallet configurations, the center lowered ceiling compartment (in which the center life rafts are housed) is removed from its normal, or forward, locations, (where it is located in the all-passenger and the 3 and 4 pallet standard configurations) and installed further aft, approximately opposite the aft cabin emergency hatches. Both locations are provided with identical facilities for installation of the center lowered ceiling compartment, and the procedure for removal and installation is the same for either location. Cover plates are provided to conceal the holes in the cabin ceiling at the location not being used. In these 9 and 10 standard pallet configurations, the center lowered ceiling compartment is completely removed from the cabin. (Refer to 25-10-24, Center Lowered Ceiling.)
- (8) The midcabin and aftcabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations.

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- (9) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 25, Oxygen Systems
- (10) The floor covering must be removed or installed dependent on conversion. Refer to 25-10-31, Floor Covering
- (11) Conversion between these configurations or to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10.

NOTE. Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201. It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening.

2. Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7.B., and conversion options in paragraph 10.
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207.

NOTE: Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12.

- C Perform preconversion requirements. Refer to 25-15-200, paragraph 8.
- D. Perform removal and/or installation, or conversion, of equipment as affected.
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.



CONVERT TO 3 THROUGH 10 PALLET COMBINED PASSENGER/CARGO STANDARD
CONFIGURATION FROM ANY OTHER CONFIGURATION CONVERSION INSTRUCTIONS

1 General

4. This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
 - (3) In these combined passenger/cargo configurations, the moveable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. If conversion is to any one of the other series of combined passenger/cargo configurations, this partition may require relocation. For location of this partition, refer to 25-15-200, figure 204
 - (4) When converting from any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator was installed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
 - (5) When converting from any other cargo carrying configuration, the folding hatracks in the cargo carrying cabin area may be ascent or stowed in the cargo position. The options of removal or stowing the folding hatracks still apply. Refer to 25-15-200, paragraph 13
 - (6) The midcabin and aftcabin emergency escape hatches are deactivated whenever the moveable cargo/passenger dividing partition is installed at or aft of their locations.

- (7) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 25, Oxygen Systems.
- (8) The seat spacing for the combined passenger/cargo configurations varies. These and other configuration seat spacing variations are shown in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.
- (9) Conversion to any one of these configurations from any other configurations necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraph 7 through 10.

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201.

2. Convert Main Cabin

- A. Review general conversion operations in 25-15-200, paragraph 7 B, and conversion options in paragraph 10.
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207.

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12.

- C. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.
- D. Perform removal and/or installation, or conversion, of equipment as affected.
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.



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CONVERT BETWEEN 3 THROUGH 8 PALLET COMBINED PASSENGER/CARGO WITH CREW REST ACCOMMODATION AND CARGO ELEVATOR CONFIGURATIONS OR ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

A This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion information and operation, and to other applicable sections for detailed removal/installation information

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration
- (3) Conversion between these configurations or to any other configuration, affects the movable cargo/passenger dividing partition, passenger seats, cargo carrying system equipment, the folding hatracks, emergency escape hatches, floor covering, and location of the center lowered ceiling compartment.
 - (a) The movable cargo/passenger dividing partition divides the passenger and cargo positions of the main cabin Any conversion between these configurations necessitates relocation of the partition
 - 1) The movable cargo/passenger dividing partition may be installed at any of the following positions, each of which corresponds to one of the 3 through 8 pallet combined passenger/cargo configurations

Body station 696	. .	3 Pallet Configuration
Body station 786	.	4 Pallet Configuration
Body station 876	.	5 Pallet Configuration
Body station 960+6		6 Pallet Configuration
Body station 1016	.	7 Pallet Configuration
Body station 1106		8 Pallet Configuration

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- 2) For removal and installation instructions, refer to 25-13-55, Movable Cargo/Passenger Dividing partition

NOTE A dry-chemical fire extinguisher must be installed on the aft side of the movable cargo/passenger dividing partition above the door

- 3) For location of this partition in other passenger/cargo configurations, refer to 25-15-200, figure 204
- (4) The seat spacing for these configurations varies. These and other configuration seat spacing variations as shown in 25-15-0, Cabin Accommodation Conversions - Description and Operation, figure 2
- (5) The cargo carrying system equipment supporting the cargo pallets requires removal or installation dependent on conversion to a lower or higher pallet configuration, or when converting to a cargo configuration without the cargo elevator. For information of cargo system location, refer to 25-36-101, Cargo Carrying System
- (6) The folding hatracks must be raised to the passenger position or stowed in the cargo position (or installed or removal) dependent on conversion. Refer to 25-15-200, paragraph 10, for Option of stowing folding hatracks in cargo configurations
- (7) In these 3, 4, 5, and 6 pallet configurations, the center lowered ceiling compartment (in which the center life rafts are housed) is removed from its normal, or forward, location, (where it is located in the all-passenger and the 3 and 4 pallet standard configurations) and installed further aft, approximately opposite the aft cabin emergency hatches. Both locations are provided with identical facilities for installation of the center lowered compartment, and the procedure for removal and installation is the same for either location. Cover plates are provided to conceal the holes in the cabin ceiling at the location not being used. In these 7 and 8 configurations, the center lowered ceiling compartment is completely removed from the cabin. (Refer to 25-10-24, Center lowered Ceiling)
- (8) The midcabin and aft cabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations



- (9) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 52, Oxygen Systems.
- (10) The floor covering must be removed or installed dependent on conversion. Refer to 25-10-31, Floor Covering
- (11) Conversion between these configurations or to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7. through 10.

NOTE Before commencing any conversion it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 2. It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening.

2. Convert Main Cabin

- A. Review conversion operations in 25-15-200, paragraph 7.3., and conversion options in paragraph 10.
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207.

NOTE: Removal/Installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.
- D. Perform removal and/or installation, or conversion, of equipment as affected.
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.

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CONVERT TO 3 THROUGH 8 PALLET COMBINED PASSENGER/CARGO WITH CREW REST ACCOMMODATION AND CARGO ELEVATOR CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

- A This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information
- (1) Figures 203 thru 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration
 - (3) In these combined passenger/Cargo configurations the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. If conversion is from any one of the other series of combined passenger/cargo configurations this partition may require relocation. For location of this partition, refer to 25-15-200, figure 204
 - (4) When converting from any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator was not installed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System
 - (5) When converting from any other cargo carrying configuration, the folding hatracks in the cargo carrying cabin area may be absent or stowed in the cargo position. The options of removal or stowing the folding hatracks still apply. Refer to 25-15-200, paragraph 10
 - (6) The midcabin and aft cabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at/cr aft of their locations

- (7) In all combined passenger/cargo' configurations the passenger oxygen system must remain pressurized Refer to Chapter 25, Oxygen Systems
- (8) The seat spacing for these combined passenger/cargo configurations varies These and other configuration seat spacing variations as shown in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2
- (9) Conversion to any one of these configurations from any other configuration, necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320 Refer to 25-15-200, conversion Index chart, figure 201

2 Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7 B, and conversion options in paragraph 10
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/Installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C Perform preconversion requirements Refer to 25-15-200, paragraph 8
- D Perform removal and/or installation, or conversion of equipment as affected
- E Perform postconversion requirements Refer to 25-15-200, paragraph 9



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CONVERT BETWEEN 2 THROUGH 8 PALLET COMBINED PASSENGER/CARGO WITH CREW REST ACCOMMODATION CONFIGURATION OR TO ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

- A This section Provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information

NOTE These 2 through 8 pallet configurations do not include the cargo elevator

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration
- (3) Conversion between these configurations or to any other configuration affects the movable cargo/passenger dividing partition, passenger seats, cargo carrying system equipment, the folding hatracks, emergency escape hatches, floor covering, and location of the center lowered ceiling compartment
 - (a) The movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin Any conversion between these configurations necessitates relocation of the partition.
 - 1) The movable cargo/passenger dividing partition may be installed at any of the following positions, each of which corresponds to one of the 2 through 8 pallet combined passenger/cargo configurations

Body Station 600L+6	.	2 Pallet Configuration
Body station 696	.	3 Pallet Configuration
Body Station 786	.	4 Pallet Configuration
Body Station 816	.	5 Pallet Configuration
Body Station 960	.	6 Pallet Configuration
Body Station 1016	.	7 Pallet Configuration
Body Station 1106	.	8 Pallet Configuration



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- 2) For removal and installation-instructions, refer to 25-13-55, Movable Cargo/Passenger Dividing Partition

NOTE A dry-chemical fire extinguisher must be installed on the aft side of the movable cargo/passenger dividing partition above the door

- 3) For location of this partition in other combined passenger/cargo, configurations, refer to 25-15-200, figure 204
- (4) The seat spacing for these configurations varies. These and other configuration seat spacing variations are shown in 25-15-200, Cabin Accommodations Conversions - Description and Operation, figure 2
- (5) The cargo carrying system equipment supporting the cargo pallets requires removal or installation dependent on conversion to a lower or higher pallet configuration, or when converting to a cargo configuration with the cargo elevator. For information of cargo systems location, refer to 25-36-101, Cargo Carrying System
- (6) The folding hatracks must be raised to the passenger position or stowed in the cargo position (or installed or removed) dependent on conversion. Refer to 25-15-200, paragraph 10, for option of stowing folding hatracks in cargo configurations
- (7) In these 2, 3, 4, 5, and 6 pallet configurations, the center lowered ceiling compartment (in which the center life rafts are housed) is removed from its normal, or forward, location, (where it is located in the all-passenger and the 3 and 4 pallet standard configurations) and installed further aft, approximately opposite the aft cabin emergency hatches. Both locations are provided with identical facilities for installation of the center lowered compartment, and the procedure for removal and installation is the same for either location. Cover plates are provided to conceal the holes in the cabin ceiling at the location not being used. In these 7 and 8 pallet configurations, the center lowered ceiling compartment is completely removed from the cabin. (Refer to 25-10-24, Center Lowered Ceiling)
- (8) The midcabin and aftcabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations
- (9) In all combined passenger/cargo configurations the passenger Oxygen system must remain pressurized. Refer to Chapter 25, Oxygen Systems



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- (10) The floor covering must be removed or installed, dependent on conversion Refer to 25-10-31, Floor Covering
- (11) Conversion between these configurations or to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment most of which are described in 25-15-200, paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320 Refer to 25-15-200, conversion index chart, figure 2 It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening

2 Convert Main Cabin

- A Review conversion operations in 25-15-200, paragraph 7 B , and conversion options in paragraph 10
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C Perform preconversion requirements Refer to 25-15-200, paragraph 8
- D Perform removal and/or installation, or conversion of equipment as affected
- E Perform postconversion requirements Refer to 25-15-200, paragraph 9





CONVERT TO 2 THROUGH 8 PALLET COMBINED PASSENGER/CARGO
WITH CREW REST ACCOMMODATION CONFIGURATIONS FROM
ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

NOTE. These 2 through 8 pallet configurations do not include the cargo elevator.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration
- (3) In these combined passenger/cargo configurations the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. If conversion is from any of the other series of combined passenger/cargo configurations, this partition may require relocation. For location of this partition, refer to 25-15-200, figure 204.
- (4) When converting from any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator was installed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
- (5) When converting from any other cargo carrying configuration, the folding hattracks in the cargo carrying cabin area may be absent or stowed in the cargo position. The options of removal or stowing the folding hattracks still apply. Refer to 25-15-200, paragraph 10.
- (6) The midcabin and aft cabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations.



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- (7) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 25, Oxygen Systems.
- (8) The seat spacing for these combined passenger/cargo configurations varies. These and other configuration seat spacing variations are shown in 25-15-200, Cabin Accommodations Conversions - Description and Operation, figure 2.
- (9) Conversion to any one of these configurations from any other configuration, necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10.

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 2.

2 Convert Main Cabin

- A. Review general conversion operations in 25-15-200, paragraph 7.B., and conversion options in paragraph 10.
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207.

NOTE Removal/Installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12.

- C. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.
- D. Perform removal and/or installation, or conversion of equipment as affected.
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.

CONVERT BETWEEN 2 THROUGH 8 PALLET COMBINED PASSENGER/CARGO WITH
CARGO ELEVATOR CONFIGURATIONS OR TO ANY OTHER CONFIGURATION -
CONVERSION INSTRUCTIONS

1 General

A. This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

NOTE These 2 through 8 pallet configurations do not include crew rest accommodation.

- (1) Figures 203 thru 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration
- (3) Conversion between these configurations or to any other configuration affects the movable cargo/passenger dividing partition, passenger seats, cargo carrying system equipment, the folding nitracks, emergency escape hatches, floor covering, and location of the center lowered ceiling compartment.
 - (a) The movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. Any conversion between these configurations necessitates relocation of the partition.
 - 1) The movable cargo/passenger dividing partition may be installed at any of the following positions, each of which corresponds to one of the 2 through 8 pallet combined passenger/cargo configurations:

Body Station 600L+6	2 Pallet Configuration
Body Station 696	3 Pallet Configuration
Body Station 786	4 Pallet Configuration
Body Station 876	5 Pallet Configuration
Body Station 960+6	6 Pallet Configuration
Body Station 1016	7 Pallet Configuration
Body Station 1106	8 Pallet Configuration

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- 2) For removal and installation instructions, refer to 25-13-55, Movable Cargo/Passenger Dividing Partition

NOTE A dry-chemical fire extinguisher must be installed on the aft side of the movable cargo/passenger dividing partition above the door

- 3) For location of this partition in other combined passenger/cargo configurations, refer to 25-15-200, figure 204
- (4) The seat spacing for these configurations varies. These and other configuration seat spacing variations are shown in 25-15-200, Cabin Accommodations Conversions - Description and Operation, figure 2
- (5) The cargo carrying system equipment supporting the cargo pallets requires removal or installation dependent on conversion to a lower or higher pallet configuration, or when converting to a cargo configuration without the cargo elevator. For information of cargo system location, refer to 25-36-101, Cargo Carrying System
- (6) The folding hatracks must be raised to the passenger position or stowed in the cargo-position (or installed or removed) dependent on conversion. Refer to 25-15-200, paragraph 10, for option of stowing folding hatracks in cargo configurations
- (7) In these 2, 3, 4, 5 and 6 pallet configurations, the center lowered ceiling compartment (in which the center life rafts are housed) is removed from its normal, or forward, location, (where it is located in the all-passenger and the 3 and 4 pallet standard configurations) and installed further aft, approximately opposite the aft cabin emergency hatches. Both locations are provided with identical facilities for installation of the center lowered compartment, and the procedure for removal and installation is the same for either location. Cover plates are provided to conceal the holes in the cabin ceiling at the location not being used. In these 7 and 8 pallet configurations, the center lowered ceiling compartment is completely removed from the cabin. (Refer to 25-10-24, Center Lowered Ceiling)
- (8) The midcabin and aftcabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations
- (9) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 25 Oxygen Systems



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- (10) The floor covering must be removed or installed dependent on conversion Refer to 25-10-31, Floor Covering
- (11) Conversion between these configurations or to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200 paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320 Refer to 25-15-200, conversion index chart, figure 2 It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening

2 Convert Main Cabin

- A Review conversion operations in 25-15-200 paragraph 7 B , and conversion options in paragraph 10
- B Review conversion equipment which will be affected as located and listed in 25-15-200 figures 203 through 207

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C Perform preconversion requirements Refer to 25-15-200 paragraph 8.
- D Perform removal and/or installation, or conversion of equipment as affected
- E Perform postconversion requirements Refer to 25-15-200, paragraph 9



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CONVERT TO 2 THROUGH 8 PALLET COMBINED PASSENGER/CARGO WITH CARGO ELEVATOR CONFIGURATIONS FROM ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

- A This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information

NOTE These 2 through 8 pallet configurations do not include crew rest accommodation

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each configuration
- (3) In these combined passenger/cargo configurations the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. If conversion is from any of the other series of combined passenger/cargo configurations, this partition may require relocation. For location of this partition, refer to 25-15-200, figure 204
- (4) When converting from any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration especially if the cargo elevator was not installed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System
- (5) When converting from any other cargo carrying configuration, the folding hatracks in the cargo carrying cabin area may be absent or stowed in the cargo position. The options of removal or stowing the folding hatracks still apply. Refer to 25-15-200, paragraph 10
- (6) The midcabin and aft cabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations

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- (7) In all combined passenger/cargo configurations the passenger oxygen system must remain pressurized. Refer to Chapter 25, Oxygen Systems.
- (8) The seat spacing for these combined passenger/cargo configurations varies. These and other configuration seat spacing variations are shown in 25-15-200, Cabin Accommodations Conversions - Description and Operation, figure 2.
- (9) Conversion to any one of these configurations from any other configuration, necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10.

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion procedure in sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 2.

2. Convert Main Cabin

- A. Review general conversion operations in 25-15-200, paragraph 7 B. and conversion options in paragraph 10.
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207.

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12.

- C. Perform preconversion requirements. Refer to 25-15-200, paragraph 8.
- D. Perform removal and/or installation, or conversion of equipment as affected.
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.



CONVERT ALL-CARGO 13 PALLET STANDARD CONFIGURATION TO ANY
OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
 - (3) When converting to any combined passenger/cargo configuration, the movable cargo/passenger dividing partition must be installed to divide the passenger and cargo portions of the main cabin. For location of this partition, refer to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, figure 204.
 - (4) When converting to any other cargo carrying configuration, removal or relocation of some items of the cargo carrying system equipment may be required to conform to the new configuration, especially if the cargo elevator is to be installed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
 - (5) When converting to any other cargo carrying configuration, the options of removal or stowing the folding nstracks still apply. Refer to 25-15-200, paragraph 10.
 - (6) When converting to any passenger carrying configuration, arrange and space seats as shown in applicable configuration in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.



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- (7) Conversion from this configuration to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201. It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening.

2 Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7 B , and conversion options in paragraph 10
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200 paragraph 12

- C Perform preconversion requirement Refer to 25-15-200, paragraph 8
- D Perform removal and/or installation, or conversion of equipment as affected
- E Perform postconversion requirements Refer to 25-15-200, paragraph 9



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CONVERT TO ALL-CARGO 13 PALLET STANDARD CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

A. This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
- (3) When converting from any other cargo carrying configuration, relocation or installation of some items of the cargo carrying system equipment will be required, especially when converting from a cargo elevator installed configuration. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
- (4) When converting from any other cargo carrying configuration, the folding hatracks in the cargo carrying cabin area, may be absent or stowed in the cargo position. The options of removal or stowing the folding hatracks still apply. Refer to 25-15-200, paragraph 10.
- (5) Conversion to this configuration from any other configuration, necessitates certain conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10.

NOTE: Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201.

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2 Convert Main Cabin

- A. Review general conversion operations in 25-15-200, paragraph 7 B , and conversion options in paragraph 10
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections in this maintenance manual chapter, and are listed in 25-15-200, paragraph 12.

- C. Perform preconversion requirements Refer to 25-15-200, paragraph 8.
- D. Perform removal and/or installation, or conversion, of equipment as affected
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9



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CONVERT ALL CARGO 11 PALLET WITH CREW REST ACCOMMODATION AND CARGO ELEVATOR CONFIGURATION TO ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A. This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, show, locate and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
 - (3) When converting to any combined passenger/cargo configuration the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. For location of this partition in other configurations, refer to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, figure 204.
 - (4) When converting to any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator is removed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
 - (5) When converting to any other cargo carrying configuration, the options of removal or stowing the folding natches still apply. Refer to 25-15-200, paragraph 10.
 - (6) When converting to any passenger carrying configuration, arrange and space seats as shown in applicable configuration in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.

- (7) Conversion from this configuration to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200 paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201. It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening.

2 Convert Main Cabin

- A. Review general conversion operations in 25-15-200, paragraph 7 B., and conversion options in paragraph 10.
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207.

NOTE. Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C. Perform preconversion requirements. Refer to 25-15-200, paragraph 8
- D. Perform removal and/or installation, or conversion, of equipment as affected
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9



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CONVERT TO ALL-CARGO 11 PALLET WITH CREW REST ACCOMMODATION AND CARGO ELEVATOR CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A. This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.
- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
 - (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
 - (3) When converting from any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator was not installed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
 - (4) When converting from any other cargo carrying configuration, the folding hatracks in the cargo carrying cabin area, may be absent or stowed in the cargo position. The options of removal or stowing the folding hatracks still apply. Refer to 25-15-200, paragraph 10.
 - (5) Conversion to this configuration from any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7. through 10.

NOTE. Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201.

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2 Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7 B., and conversion options in paragraph 10
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/Installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12.

- C. Perform preconversion requirements Refer to 25-15-200, paragraph 8
- D Perform removal and/or installation, or conversion, of equipment as affected
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.



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CONVERT ALL-CARGO 11 PALLET WITH CARGO ELEVATOR CONFIGURATION TO ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

- A. This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

NOTE: This 11 pallet configuration does not include crew rest accommodation.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
- (3) When converting to any combined passenger/cargo configuration the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. For location of this partition in other configurations, refer to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, figure 204.
- (4) When converting to any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator is removed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
- (5) When converting to any other cargo carrying configuration, the options of removal or stowing the folding catwalks still apply. Refer to 25-15-200, paragraph 10.
- (6) When converting to any passenger carrying configuration, arrange and space seats as shown in applicable configuration in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.



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- (7) Conversion from this configuration to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201. It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety net installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening.

2 Convert Main Cabin

4. Review general conversion operations in 25-15-200, paragraph 7.3, and conversion options in paragraph 10
3. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE. Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C. Perform preconversion requirements. Refer to 25-15-200, paragraph 8
- D. Perform removal and/or installation, or conversion, of equipment as affected.
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9.



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CONVERT TO ALL-CARGO 11 PALLET WITH CARGO ELEVATOR CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION DISTinctions

1 General

- 4 This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

NOTE. This 11 pallet configuration does not include crew rest accommodation.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly, and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
- (3) When converting to any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator was not installed. For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System.
- (4) When converting from any other cargo carrying configuration, the folding hatches in the cargo carrying cabin area may be absent or stowed in the cargo position. The options of removal or stowing the folding hatches still apply. Refer to 25-15-200, paragraph 10.
- (5) Conversion to this configuration from any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7. through 10.

NOTE: Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201.

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2 Convert Main Cabin

- A. Review general conversion operations in 25-15-200, paragraph 7 B, and conversion options in paragraph 10
- B. Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/Installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C. Perform praconversion requirements Refer to 25-15-200, paragraph 8
- D. Perform removal and/or installation, or conversion, of equipment as affected.
- E. Perform postconversion requirements Refer to 25-15-200, paragraph 9.



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CONVERT ALL-CARGO 11 PALLET WITH CREW REST ACCOMMODATION CONFIGURATION TO ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1. General

- A. This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information.

NOTE. This 11 pallet configuration does not include the cargo elevator.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
- (3) When converting to any combined passenger/cargo configuration, the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. For location of this partition in other configurations, refer to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, figure 204.
- (4) When converting to any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator is to be installed. For cargo carrying system equipment location information refer to 25-36-101, Cargo Carrying System.
- (5) When converting to any other cargo carrying configuration, the options of removal or stowing the folding hatches still apply. Refer to 25-15-200, paragraph 10.
- (6) When converting to any passenger carrying configuration, arrange and space seats as shown in applicable configuration in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2.

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- (7) Conversion from this configuration to any other configuration necessitates certain general conversion requirements and removal or installation of certain items or equipment, most of which are described in 25-15-200, paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. It is assumed that the main cargo door is open and the hold-open strut installed, the cargo removed, and the personnel safety not installed. Also that the main cargo door threshold assemblies may have been installed (in accordance with 25-36-191, Main Cargo Door Threshold) to aid movement of cargo pallets through the main cargo door opening.

2 Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7 B , and conversion options in paragraph 10
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C Perform preconversion requirements Refer to 25-15-200, paragraph 8
- D Perform removal and/or installation, or conversion, of equipment as affected
- E Perform postconversion requirements Refer to 25-15-200, paragraph 9



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CONVERT TO ALL CARGO 11 PALLET WITH CREW REST ACCOMMODATION CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

- A This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information

NOTE. This 11 pallet configuration does not include the cargo elevator

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration
- (3) When converting from any other cargo carrying configuration, removal or installation of the cargo carrying system equipment will be required to conform to the new configuration, especially if the cargo elevator was installed For cargo carrying system equipment location information, refer to 25-36-101, Cargo Carrying System
- (4) When converting from any other cargo carrying configuration, the folding hatracks in the cargo carrying cabin area may be absent or stowed in the cargo position The options of removal or stowing the folding hatracks still apply Refer to 25-15-200, paragraph 10
- (5) Conversion to this configuration from any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320 Refer to 25-15-200, conversion index chart, figure 201

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2 Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7 B , and conversion options in paragraph 10.
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/Installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12.

- C Perform preconversion requirements Refer to 25-15-200, paragraph 8
- D. Perform removal and/or installation, or conversion, of equipment as affected
- E. Perform postconversion requirements. Refer to 25-15-200, paragraph 9



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CONVERT LITTER ACCOMMODATION CONFIGURATION TO ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

A. This section provides general information to convert the main cabin (as title). References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations or to other applicable sections for detailed removal/installation information.

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions.
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration.
- (3) When converting to any combined passenger/cargo configuration, the movable cargo/passenger dividing partition is installed to divide the passenger and cargo portions of the main cabin. For location of this partition in other configurations, refer to 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, figure 204.
- (4) The midcabin and aftcabin emergency escape hatches are deactivated whenever the movable cargo/passenger dividing partition is installed at or aft of their locations.
- (5) When converting to any cargo carrying configuration, installation of the cargo carrying system equipment will be required. For cargo carrying system equipment location information refer to 24-36-101, Cargo Carrying System.
- (6) In all combined passenger/cargo configuration the passenger oxygen system must remain pressurized. Refer to Chapter 25, Oxygen Systems.
- (7) The RH folding hatracks may be absent or stowed in the cargo position. When converting to any cargo carrying configuration, the options of removal or stowing the folding hatracks still apply. Refer to 25-15-200, paragraph 10.
- (8) When converting to any passenger carrying configuration, arrange and space seats as shown in applicable configuration in 25-15-200, Cabin Accommodation Conversions - Description and Operation, figure 2

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- (9) Conversion from this configuration to any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7 through 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201. It is assumed that the main cargo door in this configuration is in the cargo configuration (passenger configuration ceiling panels and trim removed). Also that the main cargo door is open and the hold-open strut installed.

2 Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7 B, and conversion options in paragraph 10
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C Perform preconversion requirements. Refer to 25-15-200, paragraph 8
- D Perform removal and/or installation, or conversion, of equipment as affected
- E Perform postconversion requirements. Refer to paragraph 9



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CONVERT TO LITTER ACCOMMODATION CONFIGURATION FROM ANY OTHER CONFIGURATION - CONVERSION INSTRUCTIONS

1 General

A This section provides general information to convert the main cabin (as title) References are made to 25-15-200, Cabin Accommodation Conversion - Maintenance Practices, for general conversion operations and to other applicable sections for detailed removal/installation information

- (1) Figures 203 through 207 in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices, locates and lists the assembly and/or part number of all items of equipment requiring removal, installation, or relocation during these conversions
- (2) Figure 2 in 25-15-200, Cabin Accommodation Conversions - Description and Operation, shows a plan view of each cabin configuration
- (3) When converting from any cargo configuration, the folding hatracks in the cargo carrying cabin area may be absent or stowed in the cargo position. The options of removing or stowing the RH folding hatracks still apply. Refer to 25-15-200, paragraph 10. The LH folding hatracks, however, except the two aft sections, must be removed to allow installation of the LH litter support units
- (4) Conversion to this configuration from any other configuration necessitates certain general conversion requirements and removal or installation of certain items of equipment, most of which are described in 25-15-200, paragraphs 7. and 10

NOTE Before commencing any conversion, it is recommended that review be made to consider use of the opposite configuration conversion instruction procedure, or a similar conversion instruction procedure in Sections 25-15-301 through 25-15-320. Refer to 25-15-200, conversion index chart, figure 201. It is assumed that litters will be brought into the main cabin through the main cargo door opening, which necessitates removal of the passenger configuration trim and ceiling panels in the main cargo door area. Refer to 25-15-200, paragraph 7 B (19)

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2 Convert Main Cabin

- A Review general conversion operations in 25-15-200, paragraph 7 B., and conversion options in paragraph 10.
- B Review conversion equipment which will be affected as located and listed in 25-15-200, figures 203 through 207

NOTE Removal/installation information for equipment affected by conversions is covered in other applicable sections of this maintenance manual chapter, and are listed in 25-15-200, paragraph 12

- C. Perform preconversion requirements. Refer to 25-15-200, paragraph 8
- D Perform removal and/or installation, or conversion, of equipment as affected
- E Perform postconversion requirements Refer to 25-15-200, paragraph 9.



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CONVERT TO OR FROM BULK CARGO CONFIGURATIONS - CONVERSION INSTRUCTIONS

1 General

- A This section provides general information to convert the main cabin (as title)
- B The bulk cargo configurations are similar to the palletized cargo configurations except for the following differences
- (1) In the bulk cargo configurations no cargo carrying system is installed to the floor, the cargo being secured directly to the floor tracks, using individual tiedown fittings as described in the Weight and Balance Control and Loading Manual
 - (2) To restrain bulk cargo against possible forward accelerations of up to 9G, the cargo barrier net must be installed at the forward end of the cabin, aft of the fume-tight curtain. Installation of the barrier net affects adjacent equipment as follows
 - (a) The extreme forward main cabin area for the all-cargo bulk configuration requires the installation of a crew emergency package consisting of, a 26-man life raft, and emergency survival pack, and the dry-chemical fire extinguisher on the cabin floor, forward of the fume-tight curtain (See figure 207)
 - (3) Any of the cargo carrying configurations can be arranged to accommodate bulk cargo instead of palletized cargo by applying the differences described above. Thus conversions between any configuration and a bulk cargo configuration can be accomplished by performing the procedures in capatable all-cargo or combined passenger/cargo palletized conversions, but omitting the cargo carrying system, and adding the cargo barrier net

NOTE Installation of the cargo barrier net requires removal of certain portions of the crew rest area cabin sidewall trim panels and barrier net hookup access covers. Also replacement of the passenger configuration cove assembly cover in the same general area, with cargo configuration cove assembly covers. These requirements are noted in the general conversion operations, Section 25-15-200, paragraph 7

- (4) The following sections provide removal and installation procedures for equipment associated with the bulk cargo configurations
 - (a) 25-36-41, Barrier Net





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CABIN ATTENDANTS' SEAT - REMOVAL/INSTALLATION

1 General

- A There are two attendants' seat assemblies installed in the main cabin, the forward one on the aft face of the control cabin bulkhead near the forward entry door, and the aft one installed on the forward partition of the aft coat closet, aft of the aft entry door. The removal/installation procedures in this section are typical for both seat assemblies.
- B The attendants' seat assembly consists primarily of the seat (consisting of the seat base, the seat backrest and two seat support fittings), the headrest (bolster), and the auxiliary panel inside the headrest. Both the seat and headrest may be removed separately, but the seat base and backrest should not be separated from the seat support fittings. These are production fitted and adjusted as a unit. The seat base and backrest cushions, however, may be removed for repair or replacement. They are installed with screws and/or velcro tape.

2 Removal/Installation Cabin Attendants Seat

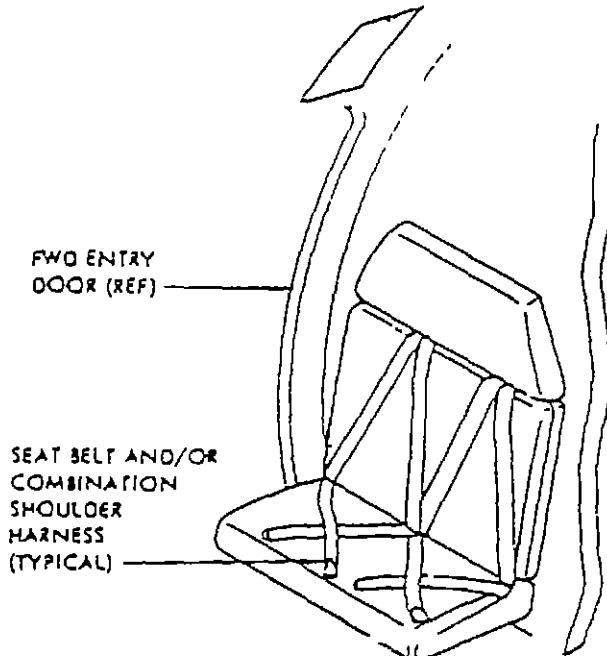
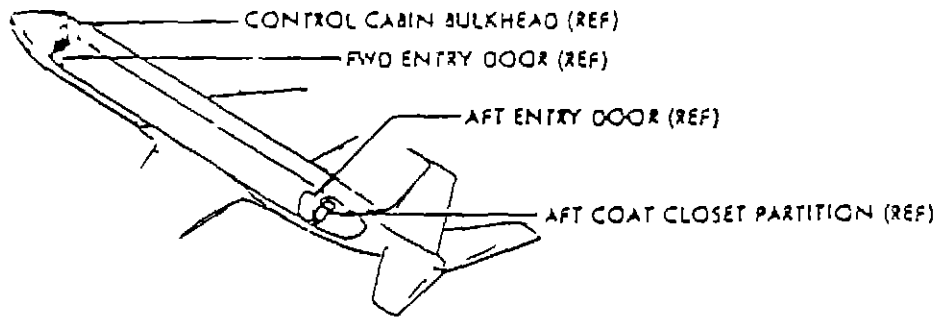
A Remove Attendants' Seat

- (1) Detach and remove seat belts and/or shoulder harnesses. Retain for installation on new seat.
- (2) If installed, remove shoulder harness brackets and filler blocks by removing bolts. (See figure 401.) Retain brackets and blocks for installation on new seat assembly.
- (3) Remove bolts securing seat backrest hinge (and filler block when installed) to bulkhead or partition.
- (4) Remove bolts and nuts attaching each seat support to bulkhead or partition.
- (5) Remove seat assembly with support fittings attached.

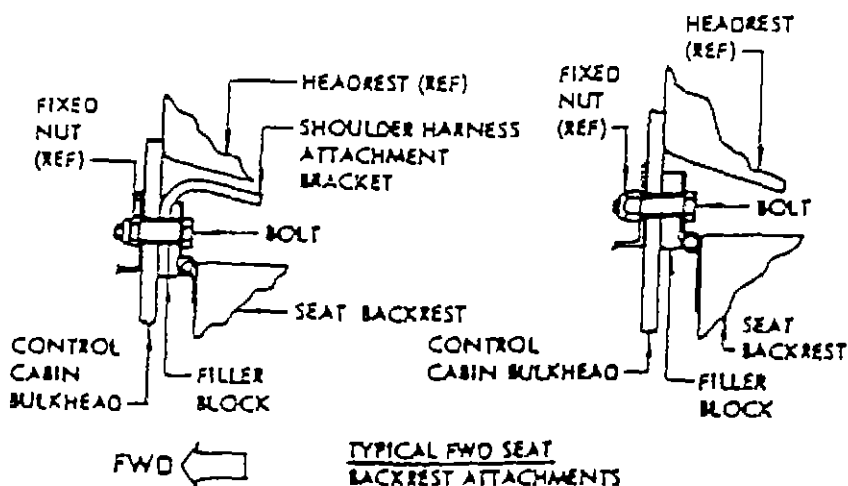
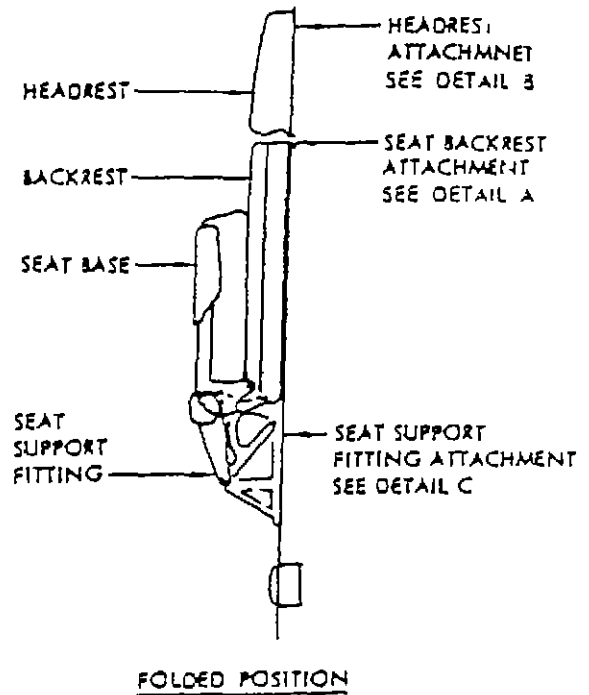
B Install Attendants' Seat

- (1) Align seat support fittings with holes in bulkhead or partition and secure with bolts and nuts. (See figure 401.)
- (2) Install bolts and secure seat backrest hinge (and filler block when required) to bulkhead or partition.
- (3) If required, install shoulder harness bracket and filler blocks and secure to bulkhead or partition with bolts.

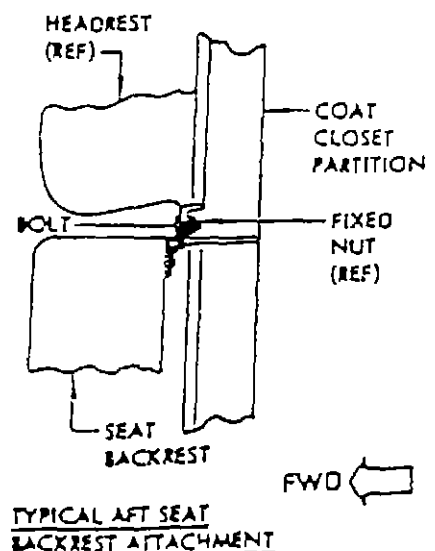
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FWD ATTENDANTS SEAT ASSY (TYPICAL)
(NORMAL SEATING POSITION)

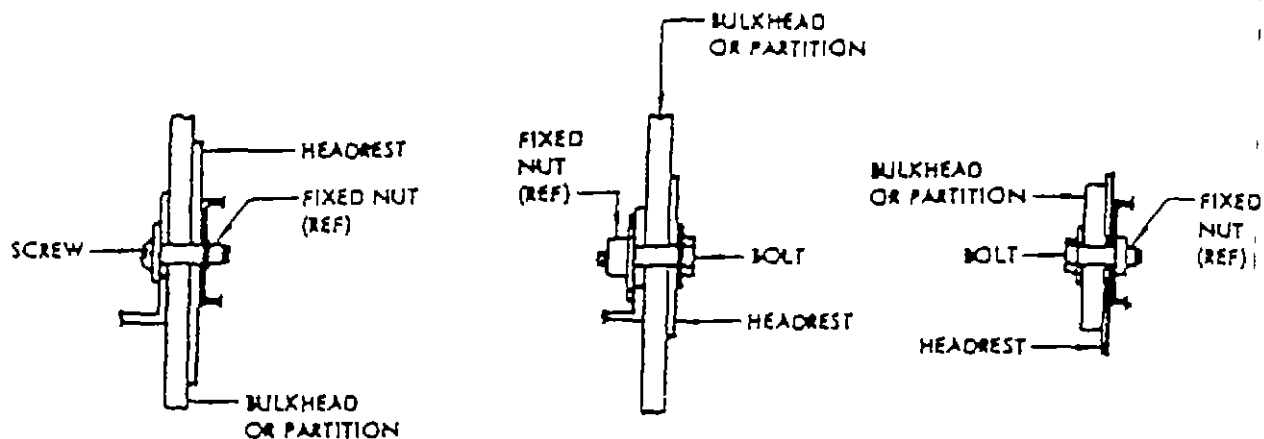


DETAIL A



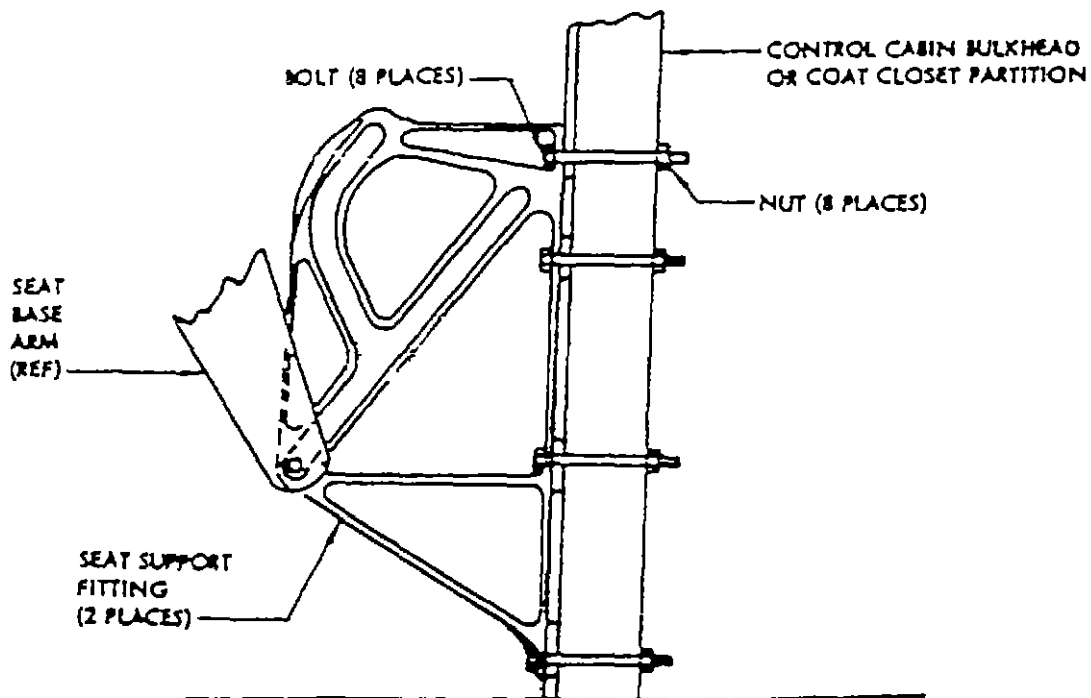


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TYPICAL HEADREST ATTACHMENTS

DETAIL B



TYPICAL SEAT SUPPORT FITTING ATTACHMENT

DETAIL C

Typical Attendants' Seat Installation
Figure 401 (Sheet 2)

- (4) Install seat belts and (if required) shoulder harnesses
- (5) Check operation of seat. Refer to Cabin Attendants' Seat Inspection/Check.

3. Removal/Installation Cabin Attendants' Seat Headrest

A. Remove Seat Headrest

- (1) Disconnect auxiliary panel wiring, if applicable.
- (2) Remove bolts and/or screws securing the headrest at top and bottom to the bulkhead or partition. (See figure 401.)

NOTE When an auxiliary panel is installed, the top bolts (or screws) are accessible by opening the auxiliary panel access door.

- (3) Remove headrest assembly.

B. Install Seat Headrest.

- (1) Install bolts and/or screws and secure headrest to bulkhead or partition. (See figure 401.)

NOTE When an auxiliary panel is installed the top bolts and/or screws are accessible by opening the auxiliary access door.

- (2) Connect auxiliary panel wiring, if applicable.

4. Removal/Installation Cabin Attendants' Auxiliary Panel

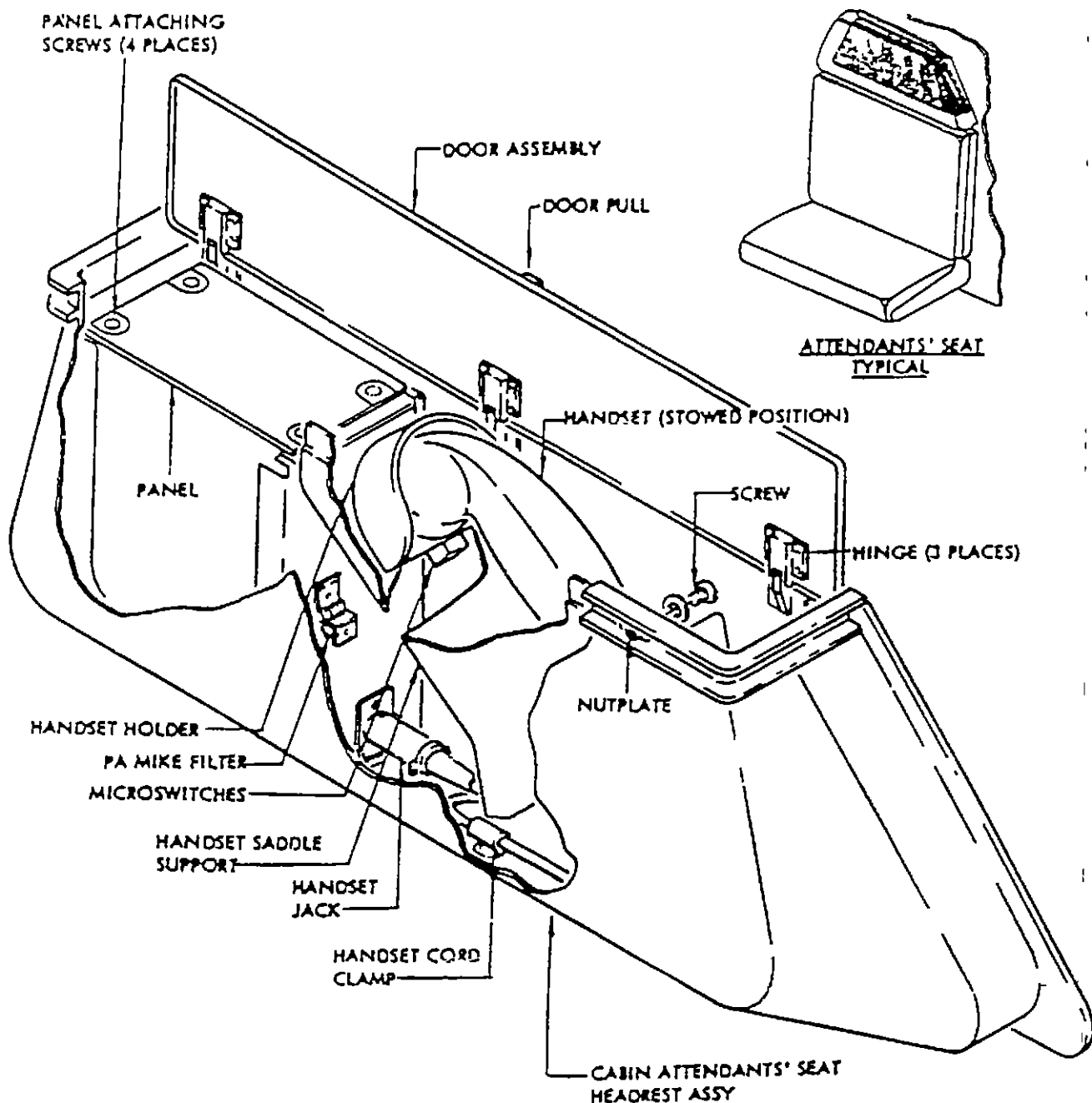
A. Remove Cabin Attendants' Auxiliary Panel

- (1) Remove screws attaching saddle support to headrest (bolster) structure. (See figure 402.)
- (2) Lift saddle support out and disconnect lead wires at microswitch
- (3) Remove screw attaching handset cord clamp to headrest (bolster) structure and disconnect handset jack

B. Install Cabin Attendants' Auxiliary Panel

- (1) Connect handset jack and insert screw attaching handset clamp to bolster structure. Position clamp to prevent handset cord from binding. (See figure 402.)
- (2) Connect lead wires to microswitch and position saddle support in headrest (bolster) structure.
- (3) Insert screws attaching saddle support to headrest (bolster) structure

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Typical Cabin Attendants' Auxiliary Panel Installation
Figure 402



CABIN ATTENDANTS' SEAT - ADJUSTMENT/TEST

1 General

- A The adjustment procedures in this section are typical for the forward attendants' seat installed on the control cabin bulkhead near the forward entry door, and the aft attendants' seat installed on the coat closet partition aft of the aft entry door

2 Cabin Attendants' Seat Adjustment

A Prepare Seat for Adjustment

- (1) Remove screws and/or velcro tape and remove seat backrest cushion
- (2) Remove lockwire from jamnuts and rod ends (See figure 501)

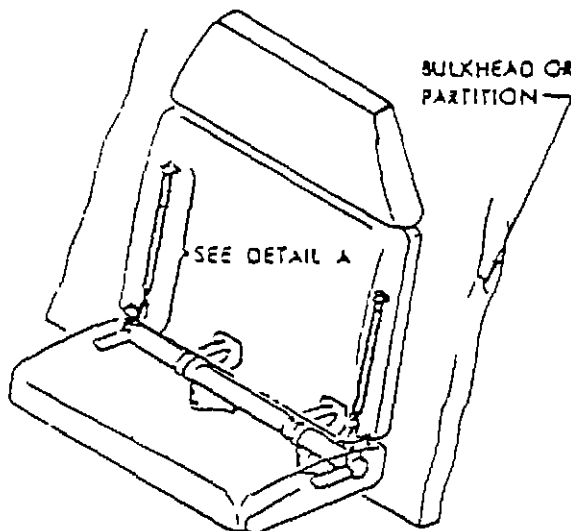
B Adjust Cabin Attendants' Seat

- (1) Apply downward pressure on seat base to place seat in "normal seating position "
- (2) Release pressure on seat base and check that seat returns to folded position without assistance

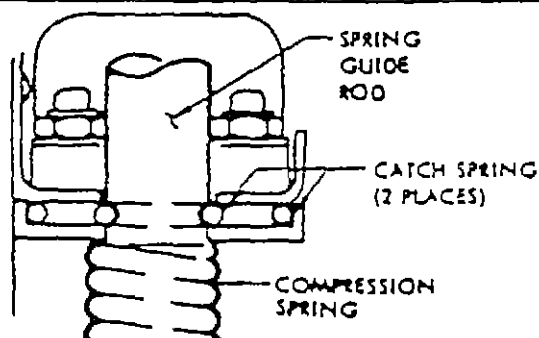
NOTE If seat returns to "folded position" too rapidly (indicated by seat base slapping or jarring) adjust to decrease seat tension per step (3) If seat base fails to rise, increase seat tension per step (4) If seat remains in normal position after tension has been adjusted, check seat support fitting track for damage or excessive wear, check rubber bumper in seat support fitting track for damage or deterioration, check track lubrication, and check for spring guide rods engagement in the catch assemblies (For inspection information, refer to Cabin Attendants' Seat Inspection/Check)

(3) Adjust seat to decrease tension

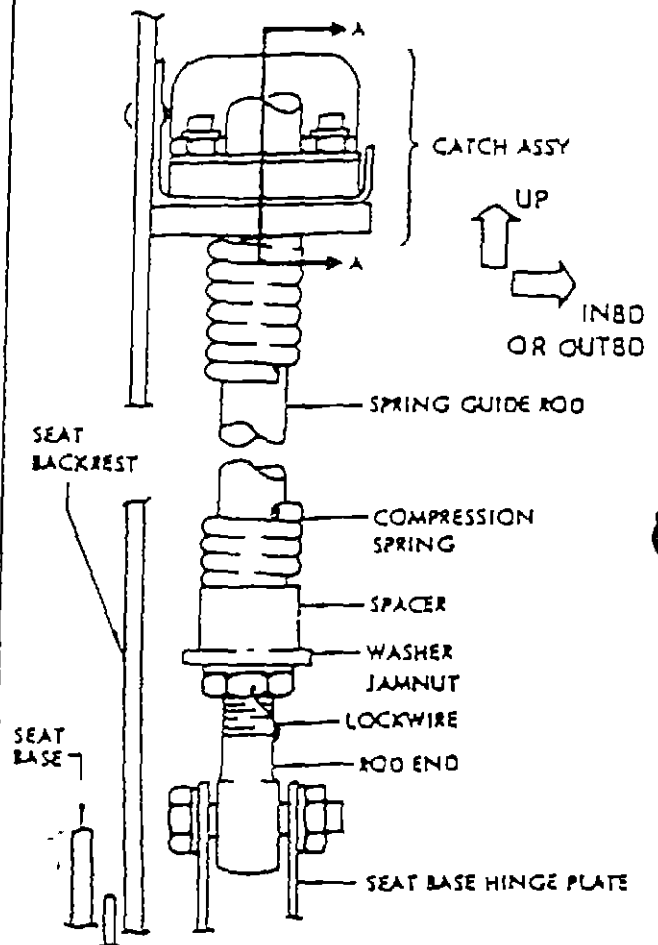
- (a) Slacken off Jamnuts (See figure 501)



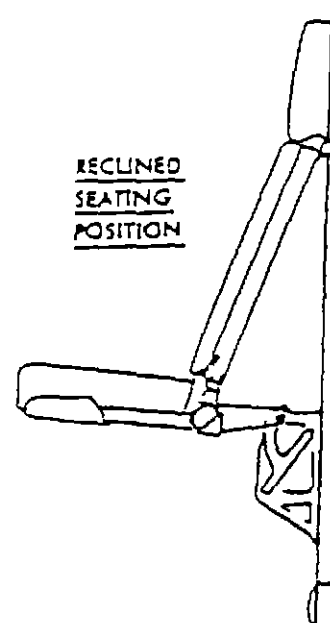
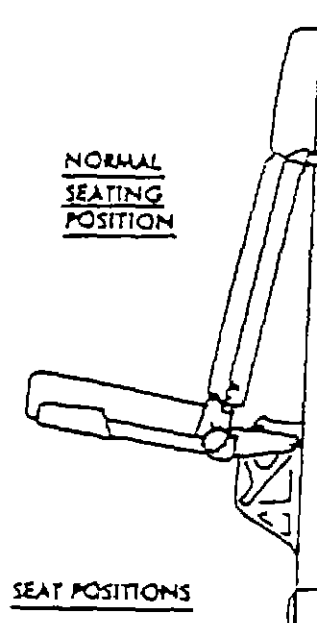
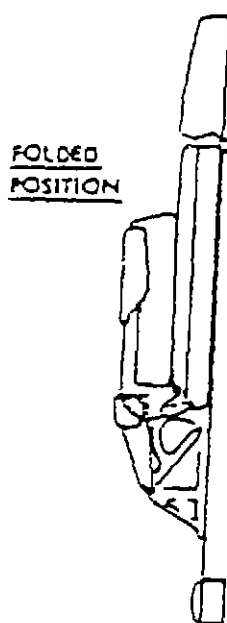
ATTENDANTS' SEAT TYPICAL
(SEAT BASE IN NORMAL SEATING POSITION)



CATCH ASSEMBLY
SECTION A-A



SEAT BASE TENSION MECHANISM
DETAIL A



SEAT POSITIONS

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- (b) Turn each spring guide rod to decrease threads visible on rod ends

NOTE There must be a minimum of 0.50 inch thread engagement of the spring guide rods in the rod ends. Ensure that the visible threads are equal on each rod end, and that the spring guide rods are engaged correctly in the catch assemblies.

- (c) Tighten jamnuts and test operation per steps (5) and (6)

- (4) Adjust seat to increase tension

- (a) Slacken off jamnuts (See figure 501)

- (b) Turn each spring guide rod to increase threads visible on rod ends

NOTE There must be a minimum of 0.50 inch thread engagement of spring guide rods in the rod ends. Ensure that the visible threads are equal on each rod end, and that the spring guide rods are engaged correctly in the catch assemblies.

- (c) Tighten jamnuts and test seat operation per steps (5) and (6)

- (5) Apply downward pressure on seat base to place seat in "normal seating position"

- (6) Release pressure and check that seat rises to "folded position" properly and without assistance

- (7) Repeat steps (2) through (6) if necessary

C Restore Airplane to Normal Configuration

- (1) Install lockwire on jamnuts and rod ends

- (2) Install seat bulkhead cushion with screws and/or velcro tape



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CABIN ATTENDANTS' SEAT INSPECTION/CHECK

1 General

- A The inspection/check procedures in this section are typical for the forward attendants' seat installed on the control cabin bulkhead near the forward entry door, and the aft attendants' seat installed on the coat closet partition aft of the aft entry door

2 Cabin Attendants' Seat Inspection

A Examine Cabin Attendants' Seat

- (1) Examine seat cushions for excessive wear, damage and proper attachment
- (2) Examine seat structure, track, and rollers for excessive wear, damage, paint and lubricant deterioration and proper attachment
- (3) Examine seat belts and (when installed) shoulder harnesses for excessive wear, proper attachment and locking when fastened
- (4) Bear down on seat base until the seat base arm is centrally positioned as shown in figure 601. Examine rubber bumpers in each seat support fitting track for damage, wear or deterioration

3 Cabin Attendants' Seat Check

A Check Cabin Attendants' Seat

- (1) Bear down on seat base to place seat in "normal seating position" (See figure 601)
- (2) Release pressure on seat base

NOTE The seat base should return to the full "folded position" without assistance. If seat base does not return, or returns too rapidly (indicated by seat base slapping and jarring) to the full "folded position" adjust seat tension accordingly. If seat base remains in the "normal seating position" after appropriate adjustment, check seat support fitting track for damage or excessive wear, check rubber bumper for damage or deterioration, check track lubricant, and check for spring guide rods engagement in catch assemblies (for adjustment and spring guide rod information, refer to Cabin Attendants' Seat-Adjustment/Test)

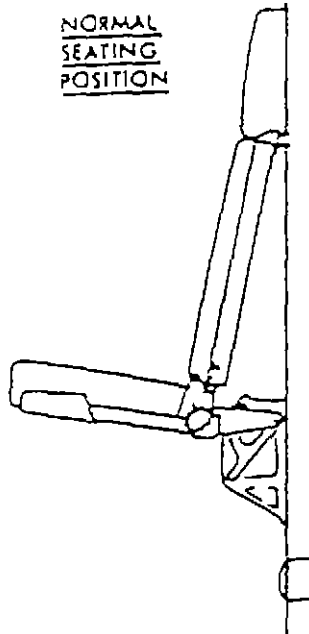
- (3) Bear down and pull out seat base to place seat in "reclined seating position," and repeat step 2

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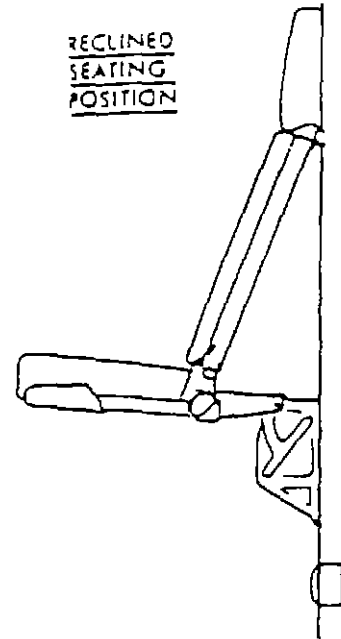
FOLDED
POSITION



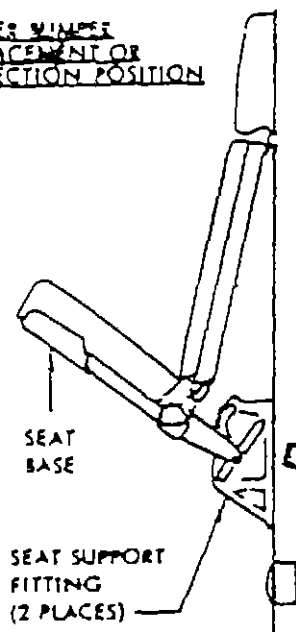
NORMAL
SEATING
POSITION



RECLINED
SEATING
POSITION



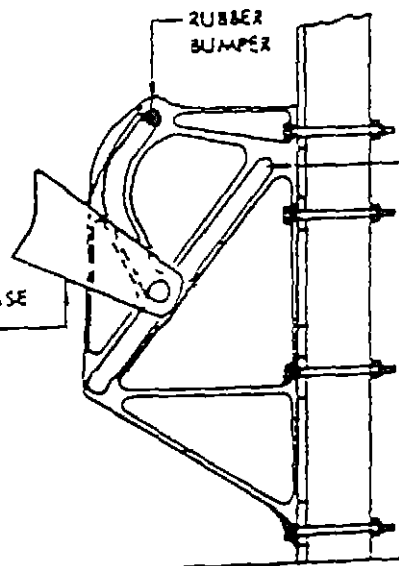
RUBBER BUMPER
REPLACEMENT OR
INSPECTION POSITION



SEAT BASE
ARM



RUBBER
BUMPER



SEAT SUPPORT
FITTING TRACK

Cabin Attendants' Seat Inspection Check
Figure 601

CABIN ATTENDANTS' SEAT - CLEANING/PAINTING

1 Cabin Attendants' Seat Cleaning

A Equipment and Materials

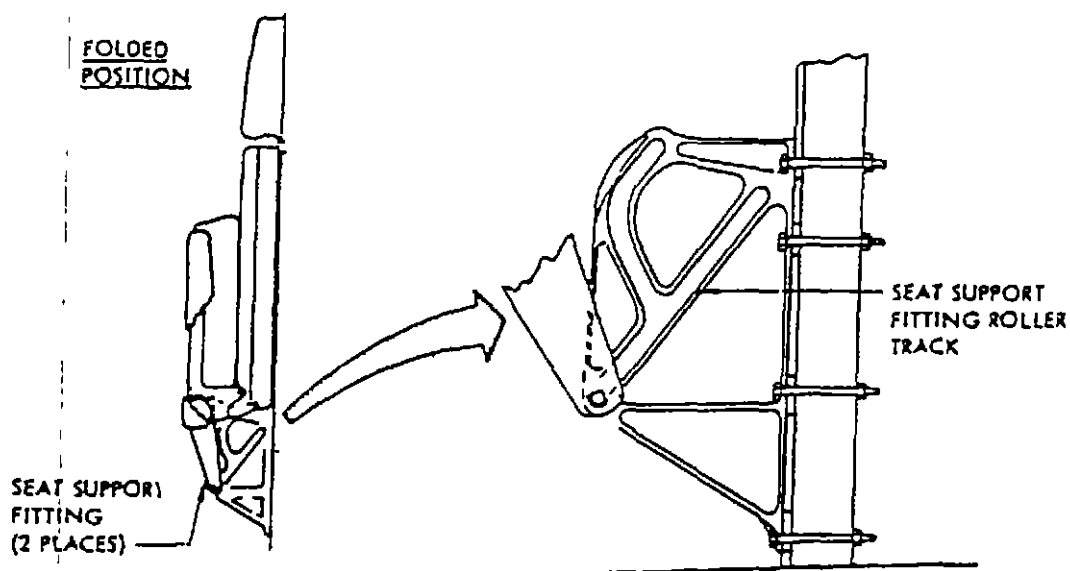
- (1) Methyl Ethyl Ketone Solvent or equivalent
- (2) Lubricant, Molykote M-8800

B Clean Cabin Attendant's Seat Roller Track (See figure 701)

- (1) Remove dust and dirt from roller track with a lint-free cloth dampened with solvent

NOTE Solvent must not remove any of the dry film lubricant. The lubricant will appear as a shiny black.

- (2) If the lubricant has been removed from any of the roller track, these areas may be touched up with an air drying dry film lubricant.



Typical Cabin Attendants' Seat
Figure 701



CABIN ATTENDANTS' SEAT - APPROVED REPAIRS

1 General

- A The approved repair of the cabin attendants' seat consists of instructions for the replacement of the rubber bumpers which are installed in the seat support tracks. (See figure 801)

2 Equipment and Materials

- A Solvent, Methyl Ethyl Ketone
- B Adhesive, EC-1300L

3. Repair Cabin Attendants' Seat

A Replace Rubber Bumper

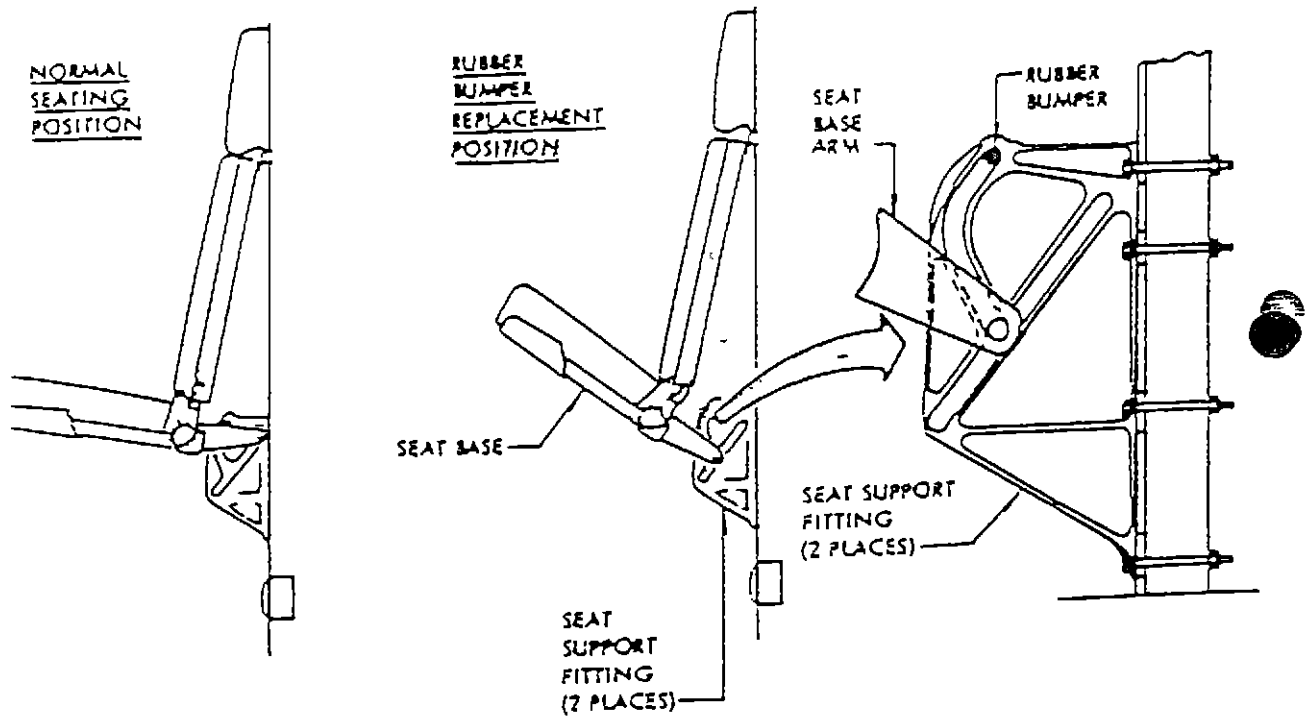
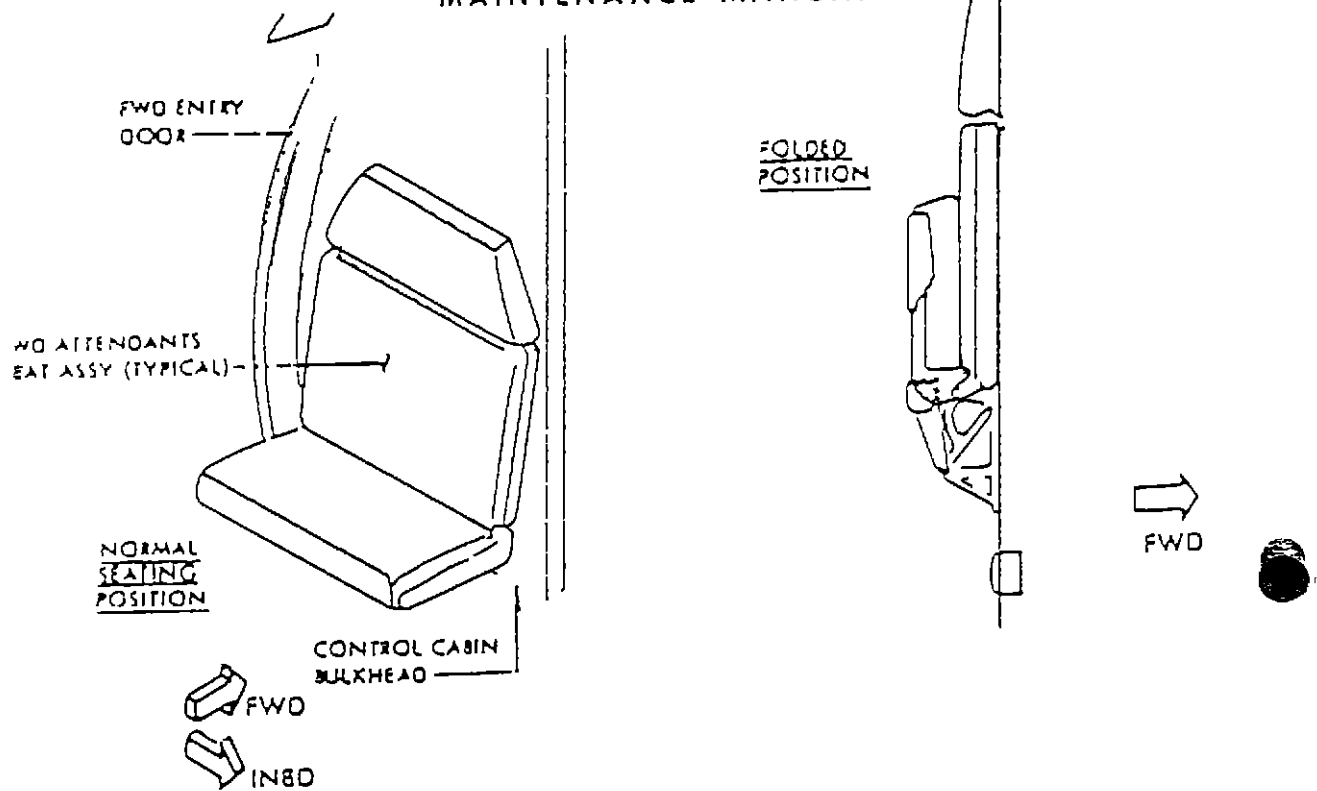
- (1) Apply downward pressure on seat base until the seat base arm is centrally positioned as shown in figure 801. Block seat in this position.
- (2) Using suitable tool, pry rubber bumper out of seat support fitting track.

NOTE Tool used to pry out rubber bumper should be a pointed not blunt device to avoid damage to the support fitting.

- (3) Using solvent, remove old adhesive from rubber bumper installation area.
- (4) Check fit of rubber bumper in the seat support fitting track and apply thin uniform coat of adhesive to surface of bumper and track.
- (5) Insert bumper in track and apply pressure to ensure complete contact.

NOTE Avoid placing the seat in the reclined position for at least 24 hours to allow the adhesive to cure sufficiently.

MAINTENANCE MANUAL





MAINTENANCE MANUAL

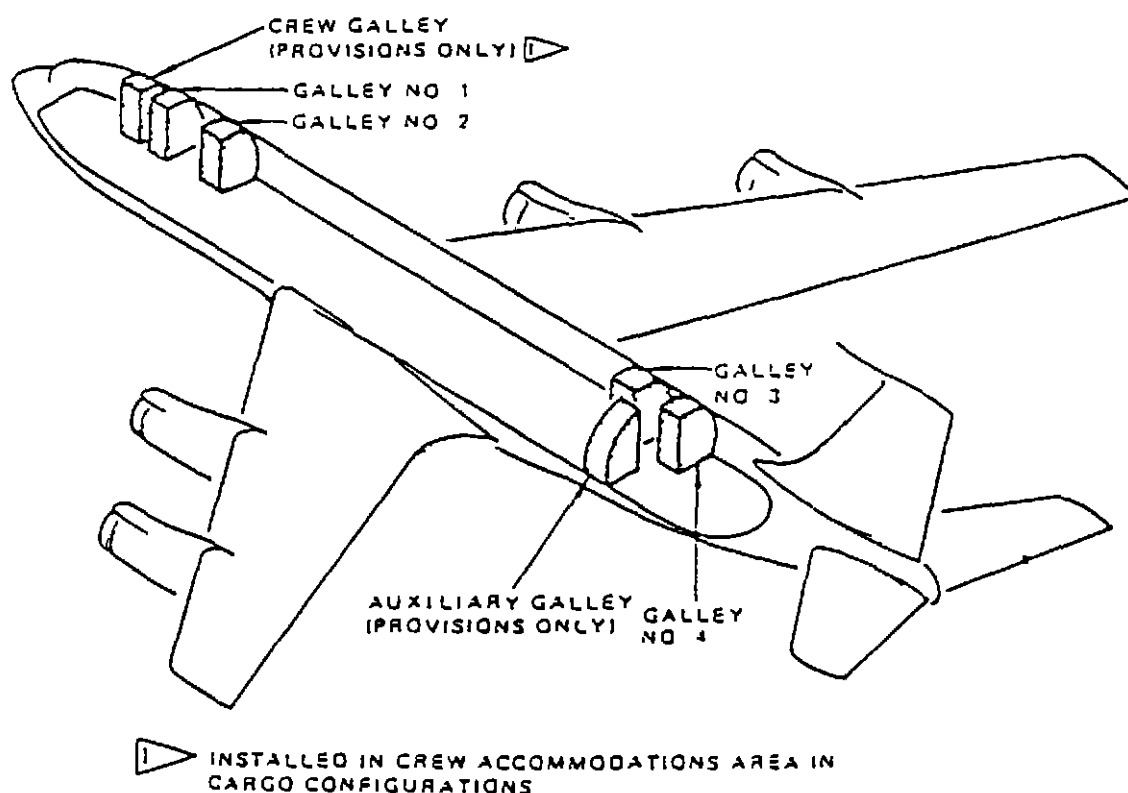
GALLEYS - DESCRIPTION AND OPERATION

1. General

- A. The airplane is equipped with four main galley units (Nos. 1 through 4). Units 1 and 2 are located in the forward main cabin on the right side, units 3 and 4 are located in the aft main cabin on the right side. (See figure 1.)
- B. In cargo configurations, a crew galley may be installed aft of lavatory A in the crew accommodations area.
- C. In the all-passenger (mixed class) configuration only, an auxiliary galley may be installed just forward of the aft entry door.

2. Galley Service Outlets

- A. Connections for the electrical supply and water supply on the main galleys are on the outboard side of the galley unit.
- B. The crew galley is supplied with electrical power by connection to lavatory B service connection box out has no water connection.
- C. The auxiliary galley has no water or electrical connection provisions.





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3 Galley Floor Covering

- A The galley floor covering is a molded rubber mat. It extends under the galley units, and is sealed to galley units with sealing compound. At the galley threshold the mat is sealed and secured by the galley threshold trim strip. For further information of galley floor covering, refer to 25-10-31, Passenger Cabin Floor Covering.



MAINTENANCE MANUAL

GALLEY UNITS - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1 General

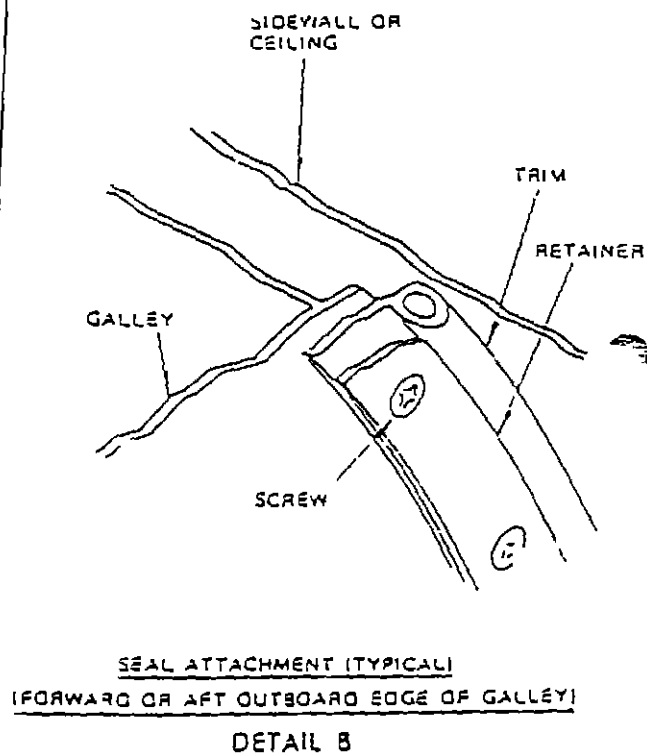
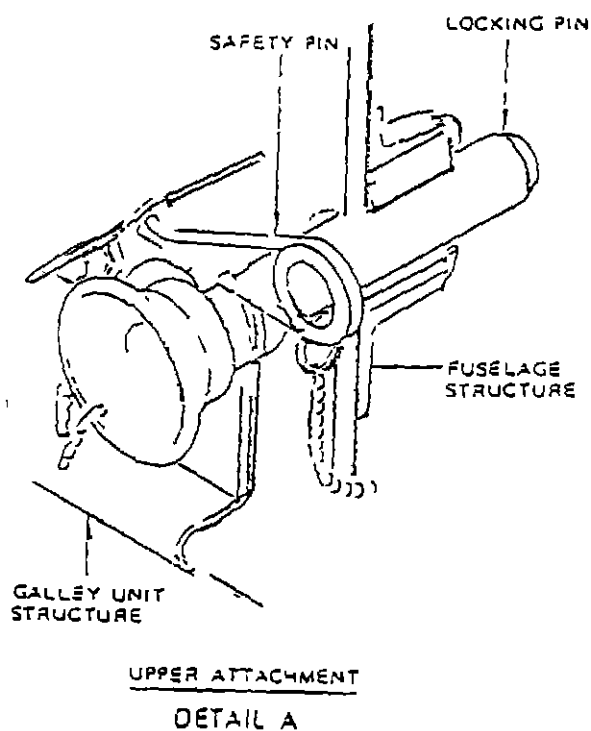
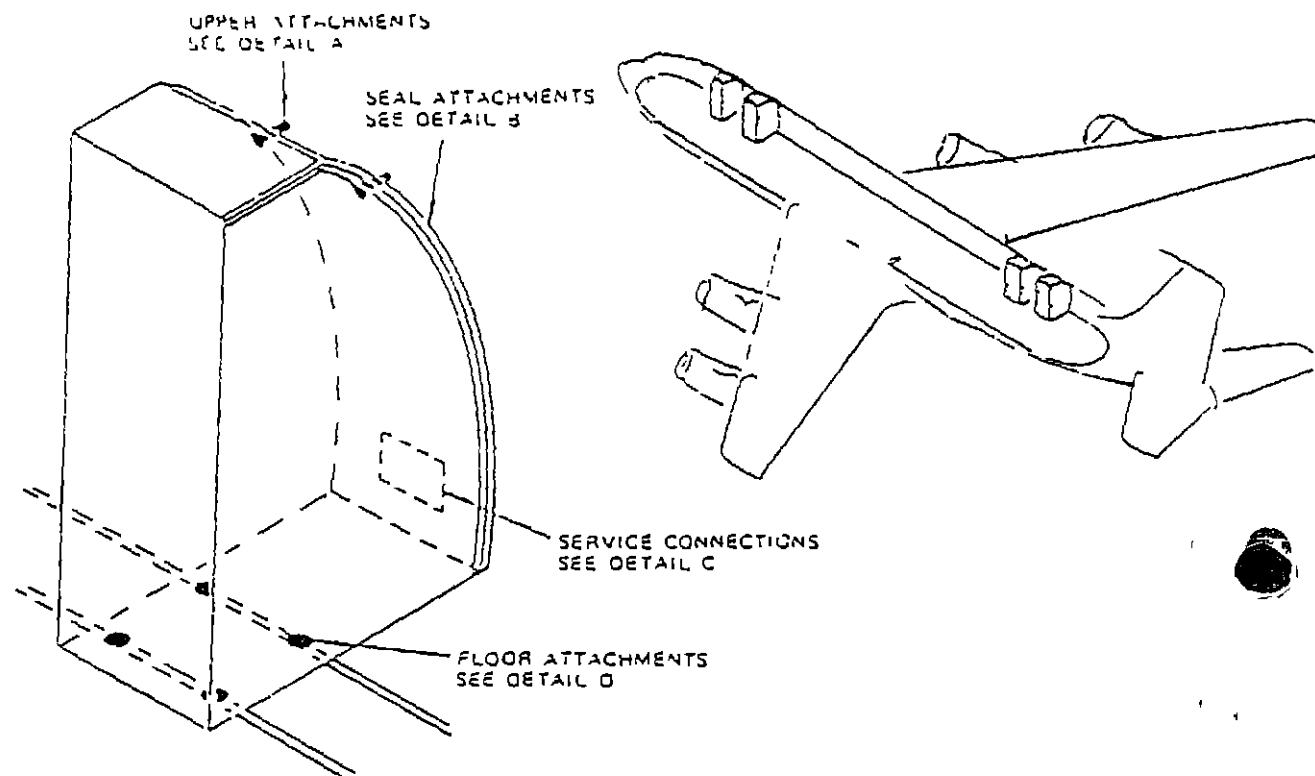
- A Removal and installation procedures for all four galley units are similar. The following paragraphs describe the procedures for a typical galley with special references where applicable.
- B If enough of the cargo carrying system is installed to the cabin floor, the aft Galleys (Nos 3 and 4) can be conveyed to and from the main cargo door on a pallet. If this is not possible, the galleys should be dragged on a large sheet of metal or fiberglass in order to protect the floor.

2 Remove Galley Unit

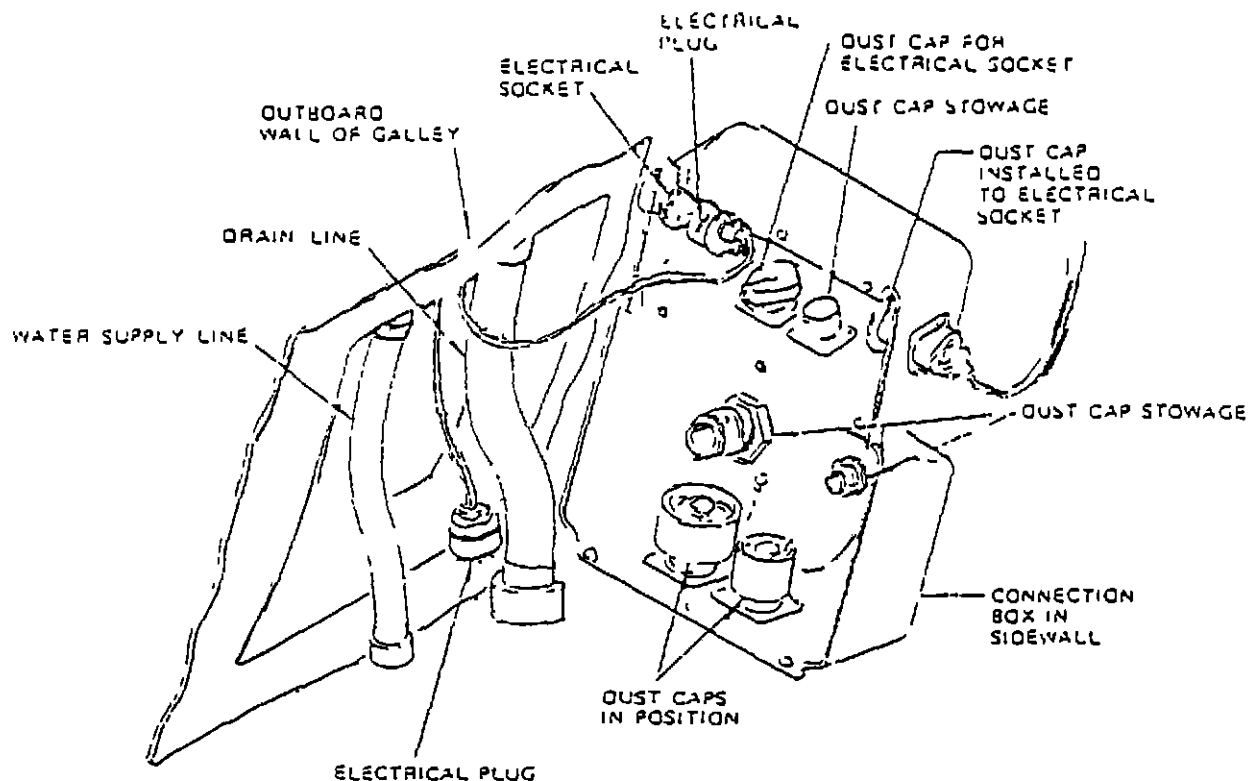
- A Open all circuit breakers affecting galleys and potable water system, as listed in 25-15-200, Cabin Accommodation Conversions - Maintenance Practices. (During a cabin conversion these should have been opened at the outset.)
- B Open water system fill-valve long enough to relieve pressure, then close it. Refer to Chapter 38, Passenger Water System.
- C Uncouple quick-disconnect tubing fittings in galley connection box at sidewall. (See figure 401)
- D Disconnect electrical plugs at same connection box.
- E Disconnect galley floor from floor tracks by lifting locking cap from each of four floor track attachment fittings, and rotating handles until they are parallel to each other. Lift whole floor track attachment fitting clear of recess in galley floor.
- F Withdraw galley inboard to disengage two locking pins in upper part of Galley from fuselage structure.

NOTE If difficulty is experienced both these locking pins may be removed individually, after their retaining safety pins have been removed.

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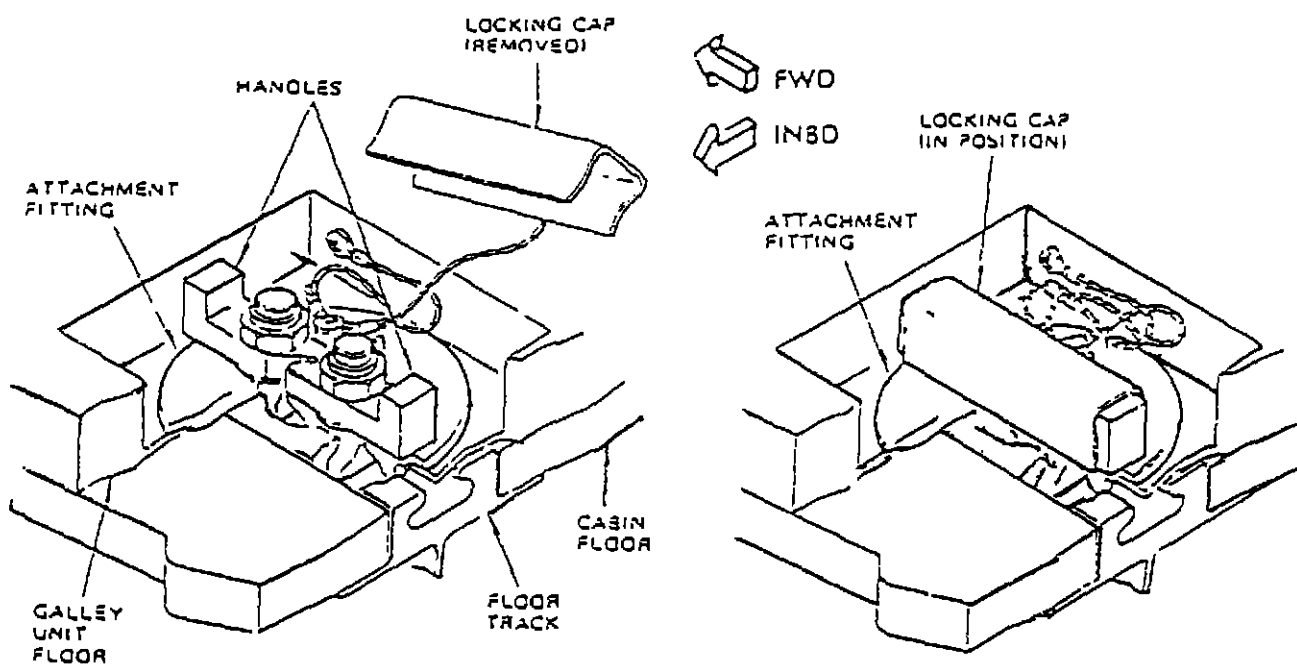


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SERVICE CONNECTIONS
DETAIL C

FWD  INBD 



FLOOR TRACK ATTACHMENTS

DETAIL D

Galley Installation (Typical)

Figure 401 (Sheet 2)

G If necessary, remove seal assembly on the forward or aft outboard edge of galley

(1) Remove screws

(2) Remove retainers and trims from galley

H Remove Galley from airplane

3 Install Galley Unit

A Carry galley unit into airplane and prepare to move it into position as follows

Galley No 1 Hard against aft face of lavatory "B "

Galley No 2 Aft of forward galley service door

Galley No 3 Forward of aft Galley service door

Galley No 4 Hard against forward face of lavatory "E "

B If previously removed, install seal assembly on the outboard edge of galley

(1) Place trims and retainers in proper position and secure with screws

C With both locking pins installed in upper part of galley, move galley in outboard direction to engage pins in their receptacles in fuselage structure

NOTE If difficulty is experienced, check that the cutout in the sidewall panelling is not interfering with the galley. The panels may be trimmed slightly as necessary to relieve such interference. If engagement is still difficult both locking pins can be removed and reinstalled individually after the galley is positioned against the sidewall. Be sure that each locking pin is retained by its safety pin after installation.

D Place all four floor track attachments of each galley in their locations and loosely engage seat tracks (See figure 401)

E Tighten floor track attachments by rotating both handles of each fitting until they are in line with one another. Install locking cap to handles of each fitting.

F Connect electrical plugs and quick-disconnect tubing couplings in each galley connection box at sidewall.

G Close circuit breakers and check galley for correct function. Check that there are no leaks at water connections.



MAIN GALLEY UNITS - INSPECTION/CHECK

1 General

- A The inspection/check procedures in this section are typical for all galleys installed in the main cabin
- B Galley units should be examined for water leaks and hazardous electrical connections
- C All equipment should be examined for excessive damage and wear

2 Galley Unit Inspection

- A Examine electrical connections for water entrapment
 - (1) Open all circuit breakers affecting galleys and potable water system
 - (2) Examine electrical wiring at sidewall connection box for possible water entrapment and contamination
 - (3) Close circuit breakers
- B Examine water line connections for water leaks
 - (1) Open water faucet
 - (2) Check water supply and drain line connections for possible leaks
 - (3) Close water faucet



MAINTENANCE MANUAL

MAIN GALLEY UNITS - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1 General

- A The crew galley may be installed aft of lavatory A in the crew accommodation area whenever the forward end of the passenger cabin is converted to carry cargo

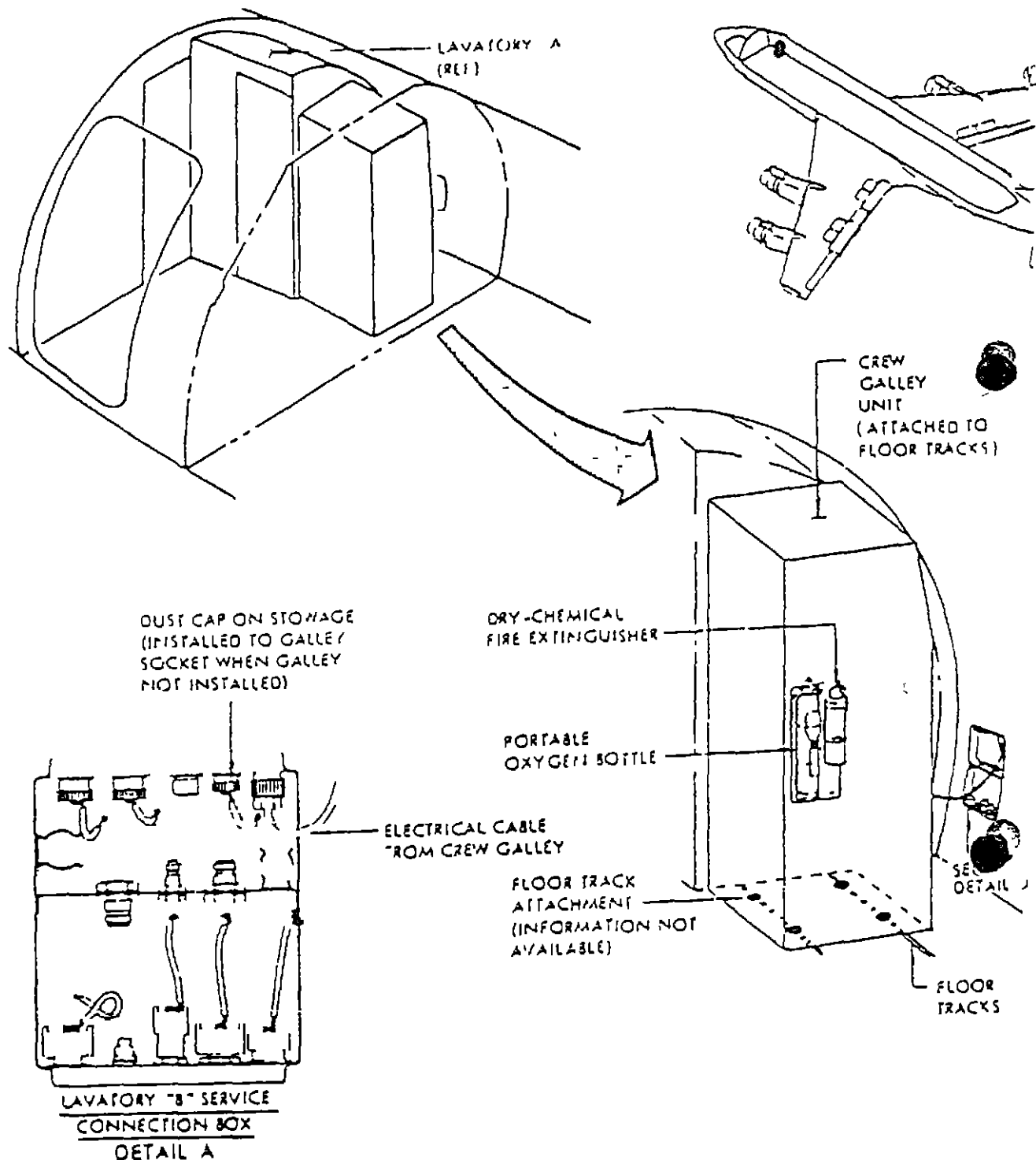
2 Remove Galley Unit (See figure 401)

- A Open three CREW GALLEY circuit breakers on main ac power shield (J6)
- B Disconnect electrical plug from its receptacle in connection box on sidewall. Install cap to receptacle
- C Disengage base of galley unit from floor tracks and remove unit from the airplane
- D Close CREW GALLEY circuit breakers

3 Install Galley Unit (See figure 401)

- A Open three CREW GALLEY circuit breakers on main ac power shield (J6)
- B Engage galley unit in floor tracks, adjacent to aft face of lavatory A, and lock floor track attachments
- C Couple electrical plug of galley unit to specially provided receptacle in connection box on sidewall
- D Close CREW GALLEY circuit breakers

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Crew Galley Installation

Figure 101



MAINTENANCE MANUAL

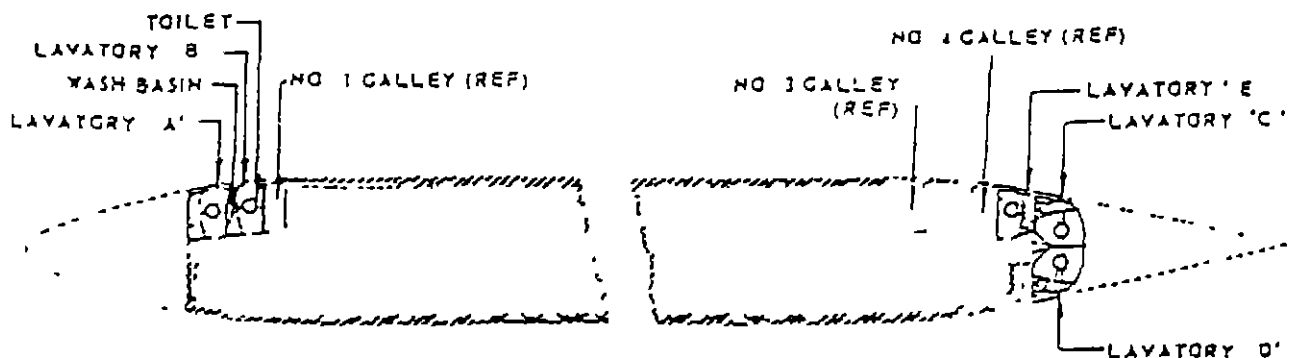
LAVATORY COMPARTMENTS - DESCRIPTION AND OPERATION

1 General

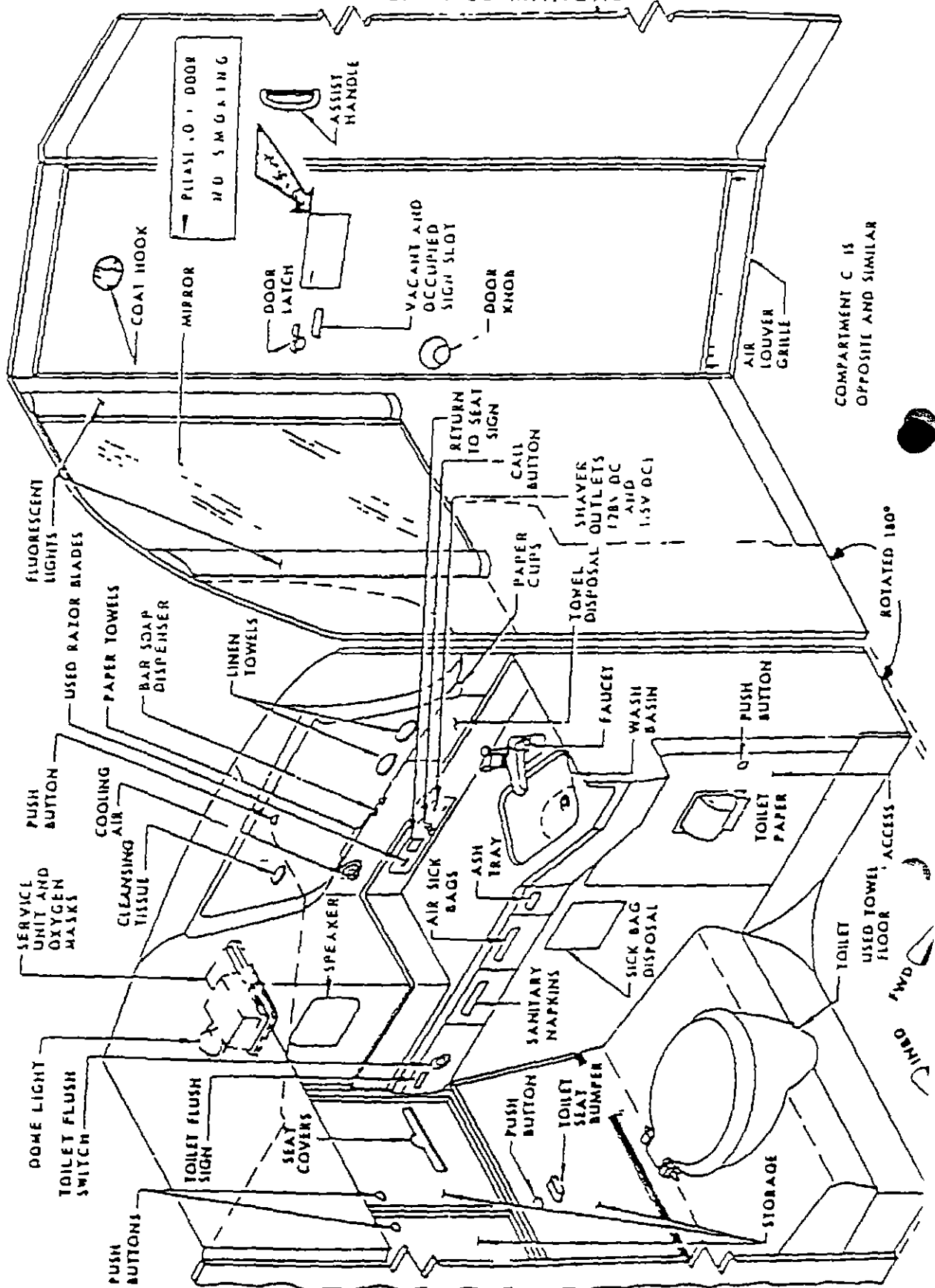
- A The airplane is equipped with five lavatories, each with the same equipment. Two are located in the forward main cabin on the right side and three are located in the aft main cabin. (See figure 1.)
- B The two forward lavatories (see figure 1) are identical. The two aft lavatories (C and D) are similarly equipped but arranged oppositely. Lavatory E is similarly equipped to A and B, but arranged oppositely. The toilets, washbasins, and faucets are covered in Chapter 38.

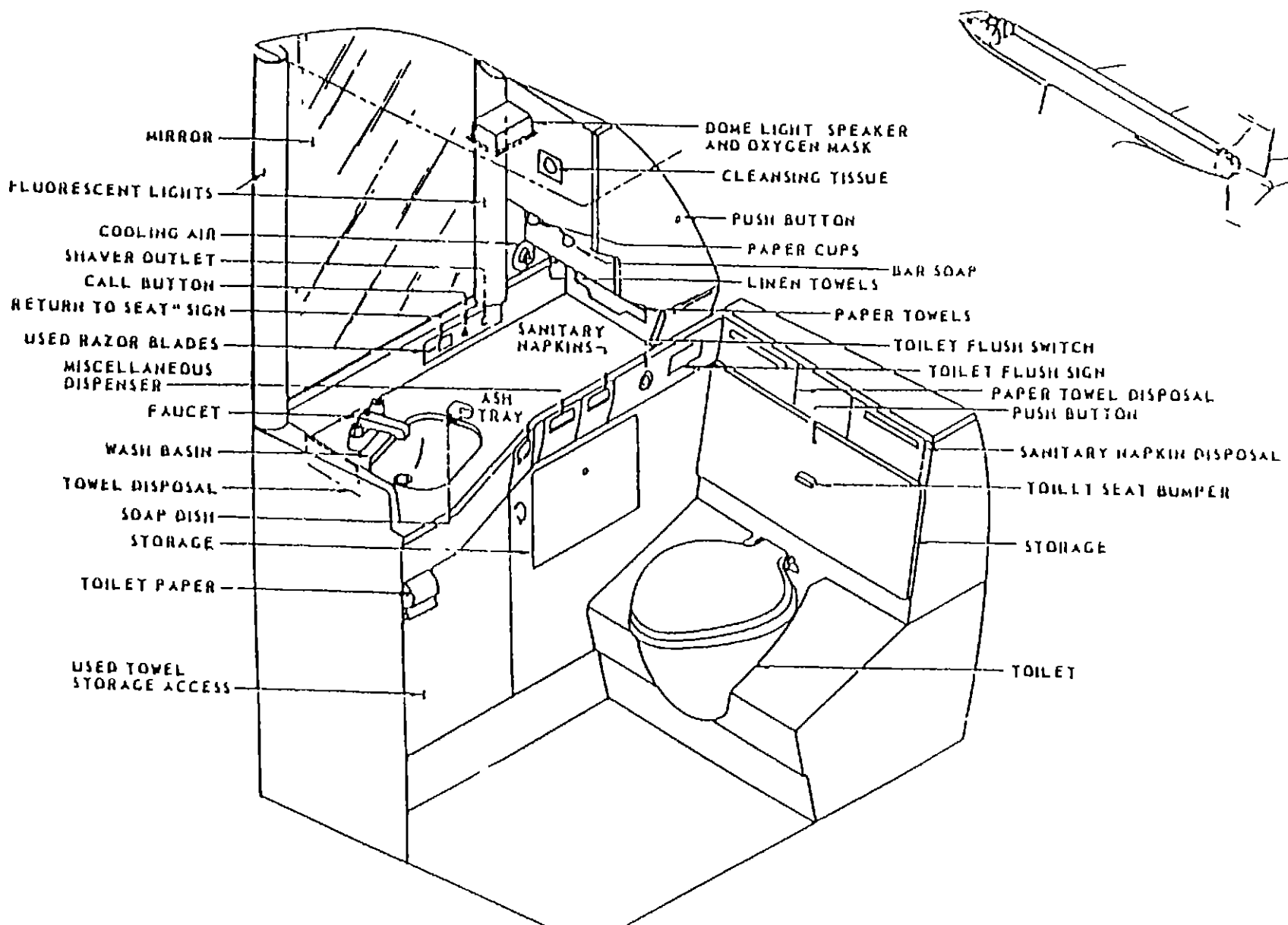
NOTE Lavatories 'B' and 'E' are removable for conversion to certain cargo-carrying configurations. These lavatory compartments are integral units, complete with their own floors and walls, and in the case of lavatory "E" the ceiling. The type and layout of their interior equipment is not affected and remain the same as in all the other lavatories.

- C The lavatory equipment is of three types: miscellaneous, dispenser and disposal.
- D The miscellaneous equipment includes the following: Royalite floor covering, mirror, coat hook, assist handle, electric razor outlet, accessory shelf, ash tray.
- E The dispenser equipment includes dispensers for the following items:



Lavatory Compartments Locations
Figure 1







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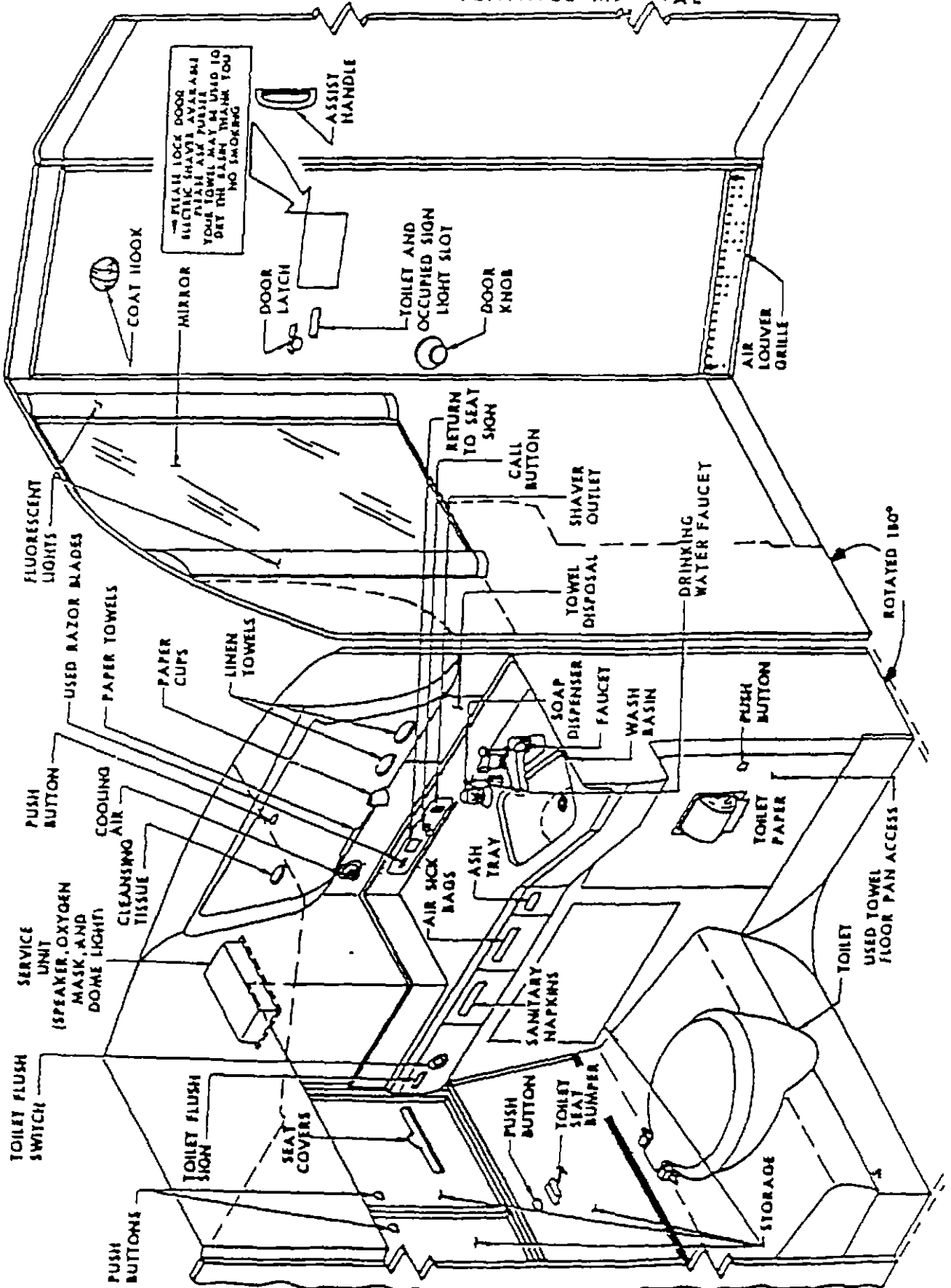
2 Lavatory Sidewall Panels (Lavatories A, C and D)

- A Sidewall panels, of vinyl-aluminum laminate, make up the lavatory sidewall lining. A mat of fiberglass insulating material with a vapor permeable fabric covering is cemented to the outboard surface of each panel. Each lavatory compartment has an upper and lower panel assembly.

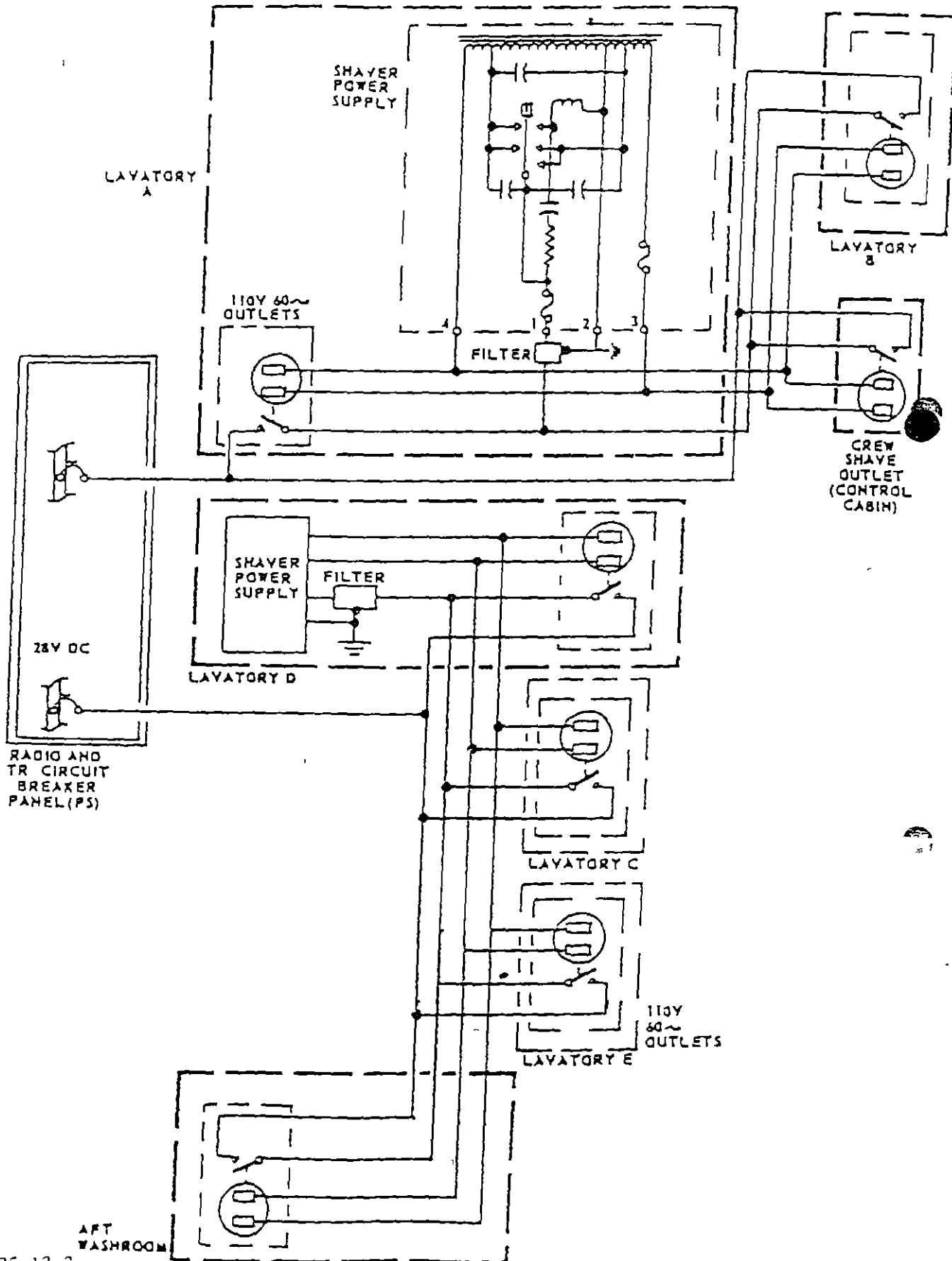
3 Lavatory Ceiling Panels (Lavatories A, C and D)

- A Ceiling panels are made of 1/4-inch plywood, with an insulating blanket cemented to the upper surface, and vinyl cemented to the lower surface for decorative purposes. A service unit is recessed in each lavatory ceiling panel.

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LAVATORY COMPARTMENT - INSPECTION/CHECK

1 General

A The inspection/check procedures in this section are typical for all lavatories installed in the airplane

2 Lavatory Waste Compartment Inspection

A Check all lavatory paper and linen waste receptacle enclosure access doors and disposal doors for damage and deformation and for proper operation, fit, sealing and latching

NOTE Properly fitting doors restrict movement of air into cabinets or receptacles, thereby assisting in the containment of any possible trash fires

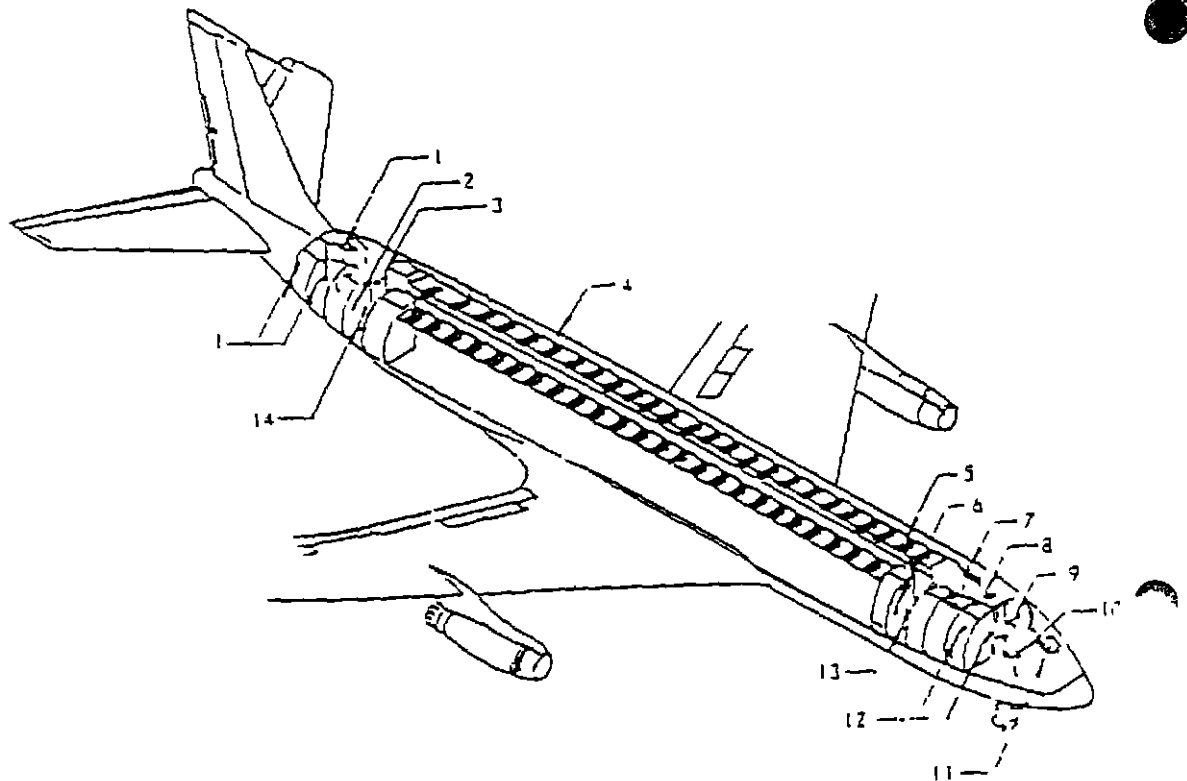
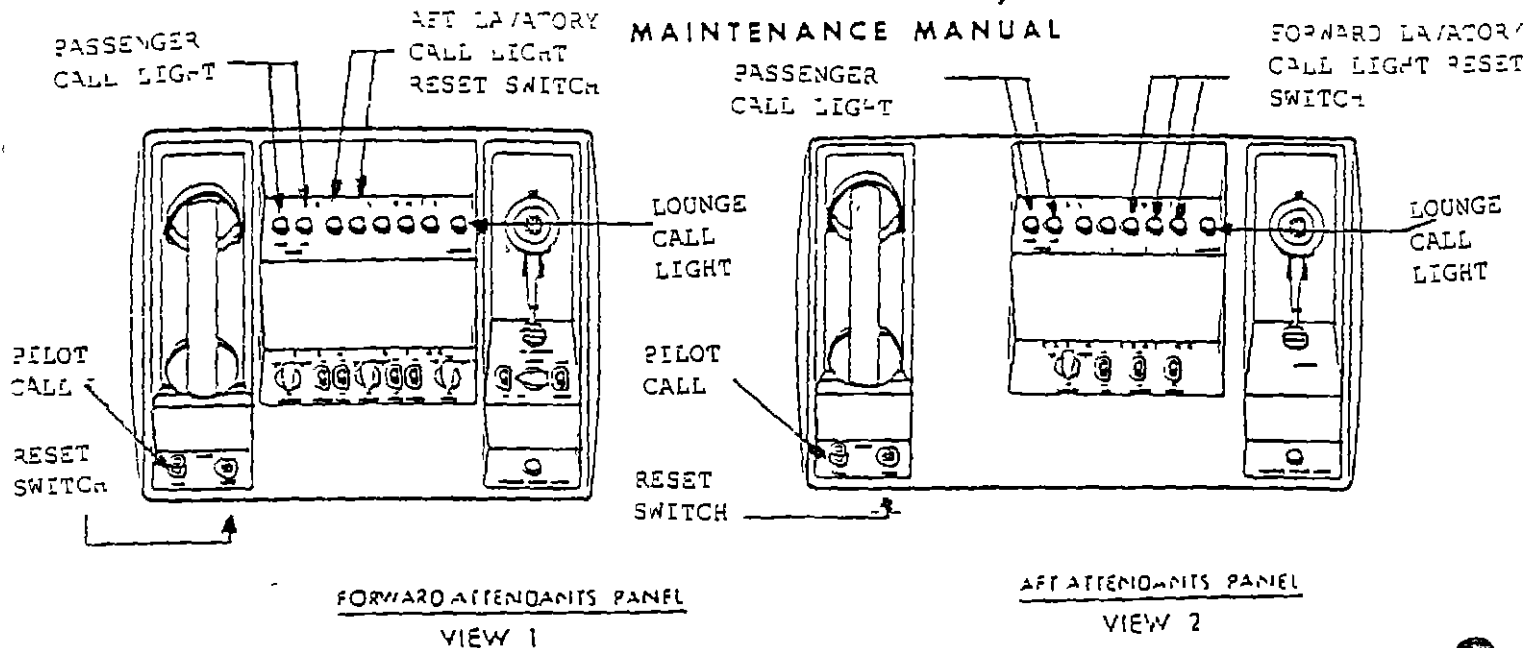
B Check wiring, terminal boxes, switches, and water heaters for evidence of overheating, loose terminals, and corrosion



CREW AND PASSENGER CALL SYSTEMS - DESCRIPTION AND OPERATION

1 General

- A The crew and passenger call systems are electrical communication systems which provide visual and audible signals for calling the attention of attendants and crew
- B The systems utilize push button controls and call lights located on the pilots' overhead panel, the attendants' panel and the passenger service unites. Push button controls are also located in the lavatories. Chimes are located in the control cabin, the forward and aft lowered ceiling area of the passenger cabin and in the personnel accommodations area. Master call lights are also located in the passenger cabin lowered ceiling areas. A horn, for the purpose of calling the attention of ground crew is located on the nose wheel strut. Relays which are used to hold in light circuits are located behind the attendant panels and on the J2 panel. (See figure 1)
- C The systems are divided into three circuits
 - (1) Crew Call System (captain to attendants and reverse)
 - (2) Ground Crew Call System (captain to ground crew and reverse)
 - (3) Passenger Call System (passengers to attendants)
- D The two passenger cabin chimes are utilized by both the crew call and passenger call systems. The passenger cabin chimes can be silenced individually by positioning the "CHIME ON-OFF" switch to "OFF". The forward chime switch is located on the forward attendant galley panel and the aft chime switch on the aft attendant galley panel. The personnel accommodations area chime is utilized by the crew call system.
- E The systems are operated by 28-volt d-c power from the T-R bus No. 2. (See figure 2)
- F Circuit protection is provided by a "CREW & PASS CALL" 5 amp circuit, breaker mounted on the "28V D C T R BUSSES" circuit breaker panel (P5).

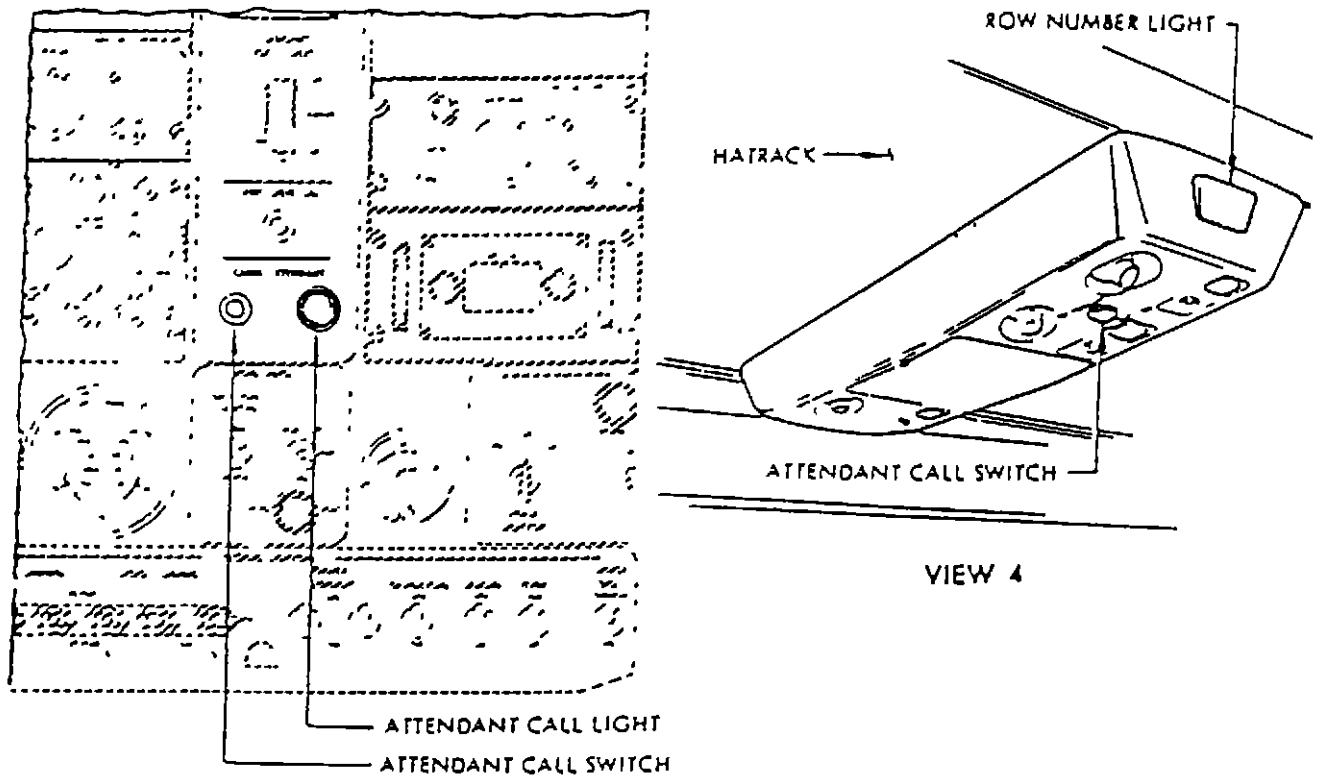


- 1 AFT LAVATORY ATTENDANT CALL SWITCH (3 PLACES)
- 2 AFT PASSENGER CABIN CHIME
- 3 AFT MASTER LIGHTS
- 4 PASS SERVICE UNIT (TYPICAL) (SEE VIEW 4)
- 5 FWD MASTER CALL LIGHTS
- 6 FWD PASSENGER CABIN CHIME

- 7 FORWARD LOUNGE SERVICE PANEL
- 8 PERSONNEL ACCOMMODATIONS AREA CHIME
- 9 FWD ATTENDANTS SEAT CONTROL PANEL (SEE DETAIL A)
- 10 CONTROL CABIN CHIME
- 11 PILOTS OVERHEAD PANEL (SEE VIEW 3)
- 12 FWD LAVATORY ATTENDANT CALL SWITCH (3 PLACES)
- 13 FWD ATTENDANTS GALLEY CONTROL PANEL (SEE VIEW 1)
- 14 AFT ATTENDANTS GALLEY CONTROL PANEL (SEE VIEW 2)



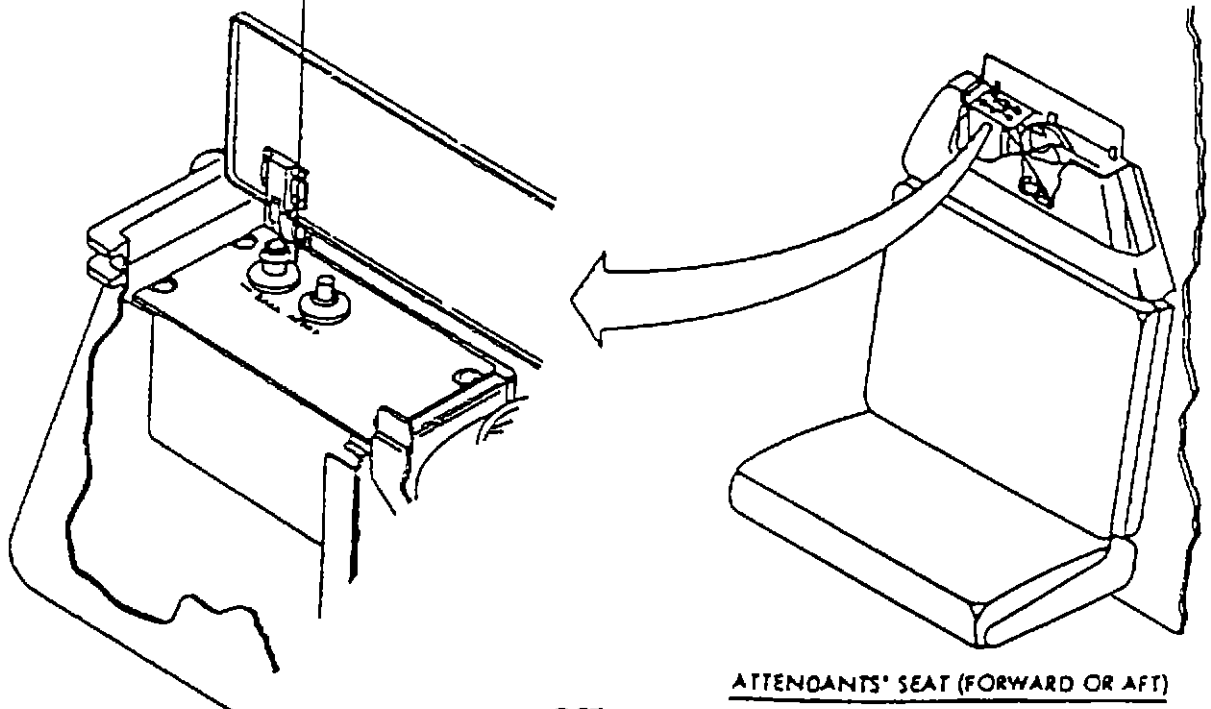
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PILOTS' OVERHEAD PANEL

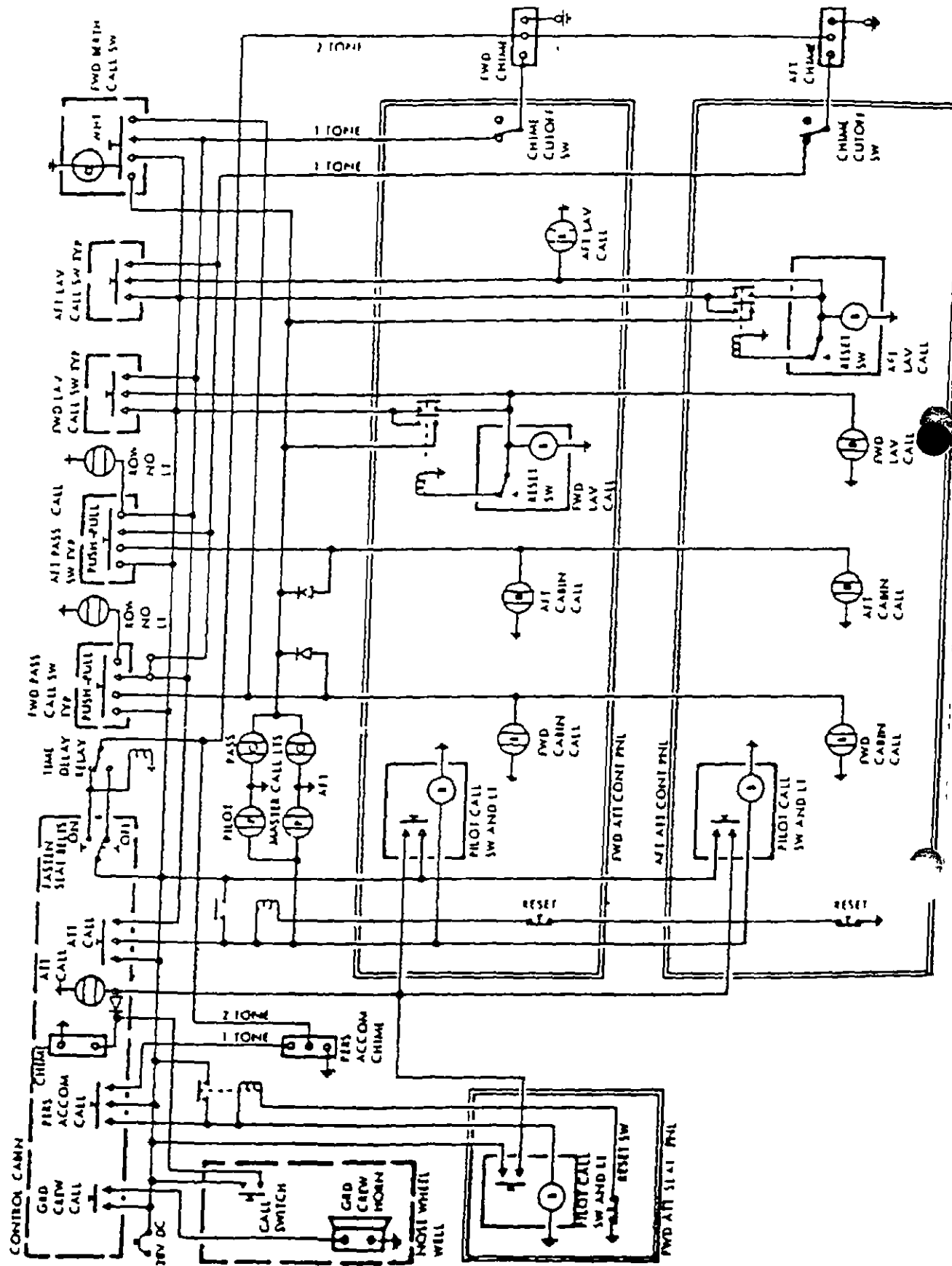
VIEW 3

ATTENDANT TO PILOT CALL SWITCH



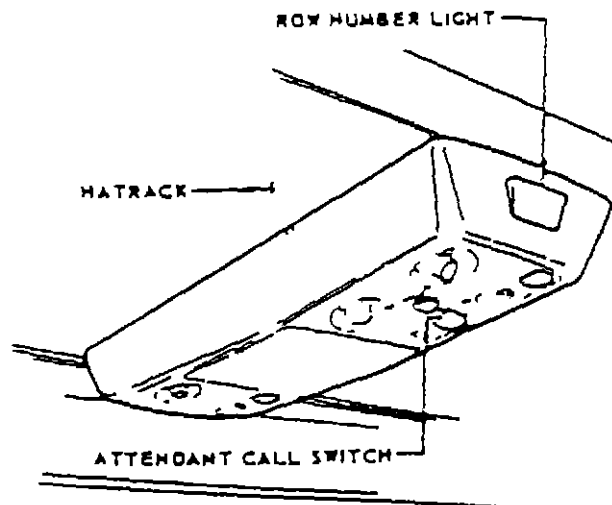
DETAIL A

Crew and Passenger Call System Component Location
Figure 1 (Sheet 2)



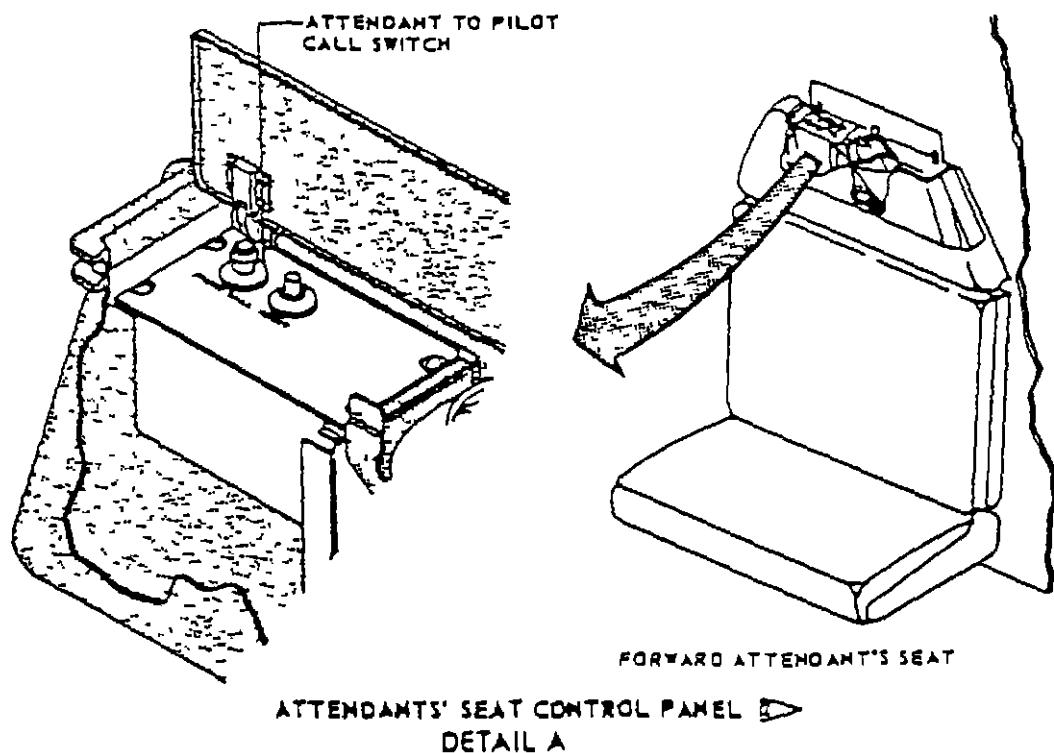
Crew and Passenger Call System Circuit
Figure 2

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 747
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PASSENGER SERVICE UNIT (TYPICAL)

VIEW A





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2 Crew Call System

- A Pressing the CABIN ATTENDANT pushbutton switch on the pilots' overhead panel will sound a single stroke of the passenger cabin chimes, and illuminate a "PILOT CALL" light on each of the attendant's panels. A pink master-call light in the ceiling at each end of the passenger cabin will also illuminate, and all lights will be held on by a relay on the J2 panel. Pressing the PILOT RESET pushbutton switch on any attendant panel will de-energize the circuit. (For location of equipment see figure 1.)
- B An attendant can call the captain by pressing the pilot call button on any attendants panel. This will actuate the attendant call light on the overhead panel and sound a single one-tone stroke on the control cabin chime. The light and chime will remain energized as long as the captain's call switch is held in. (For location of equipment see figure 1.)
- C Pressing the PERS ACCOM CALL pushbutton switch on the pilot's overhead panel will sound a single stroke of the chime and illuminate a blue call light in the personnel accommodations area. The light will remain on until the reset switch is pressed. (For location of equipment see figure 1.)

3 Ground Crew Call System

- A Pressing the GRND CREW CALL pushbutton switch on the pilots' overhead panel will complete a circuit, sounding a horn on the nose wheel strut. (For location of equipment see figure 1.)
- B Pressing the CAPTAIN CALL pushbutton switch on the external power connection box will sound one stroke on the control cabin chime.

4 Passenger Call System

- A Pressing the "ATTENDANT CALL BUTTON" push-pull switch on any passenger service unit will sound a single stroke of the passenger cabin chimes and illuminate a green master-call light located in the ceiling at each end of the passenger cabin. A blue area-call light on each attendant's panel will also illuminate indicating the area from which the call originates. A light behind the seat row number of the passenger service unit identifies the individual unit from which the call originates. The lights will remain on until the circuit is broken by pulling the "ATTENDANT CALL BUTTON" out. (For location of equipment see figure 1.)
- B Pressing the "ATTENDANT CALL BUTTON" push-button switch in any lavatory will sound a single stroke of the passenger cabin chimes and illuminate a green master-call light in the ceiling at each end of the passenger cabin. A blue "LAV" call light will illuminate on each attendant's galley panel identifying the lavatory from which the call originates. The light will remain on until the illuminated, blue, combination call light/push-button reset switch is pressed. The forward lavatory call reset switch is on the forward attendant's panel and the aft lavatory call reset switch is on the aft attendant's panel.
- C Pressing the "ATTENDANT CALL BUTTON" push-pull switch in forward passenger lounge will sound a single stroke of the passenger cabin chimes and illuminate a green master-call light located in the ceiling at each end of the passenger cabin. A blue area-call light on each attendant's panel will also illuminate indicating the area from which the call originates. A light at the passenger lounge switch identifies the individual switch from which the call originates. The lights will remain on until the circuit is broken by pulling the "ATTENDANT CALL BUTTON" out.
- D Turning on the "FASTEN SEAT BELTS" switch will illuminate the respective passenger signs and operate the passenger cabin and personnel accommodations area two stroke chimes. Returning the switch to the off position will shut off the signs and operate the chimes.

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CREW AND PASSENGER CALL SYSTEMS - TROUBLE SHOOTING

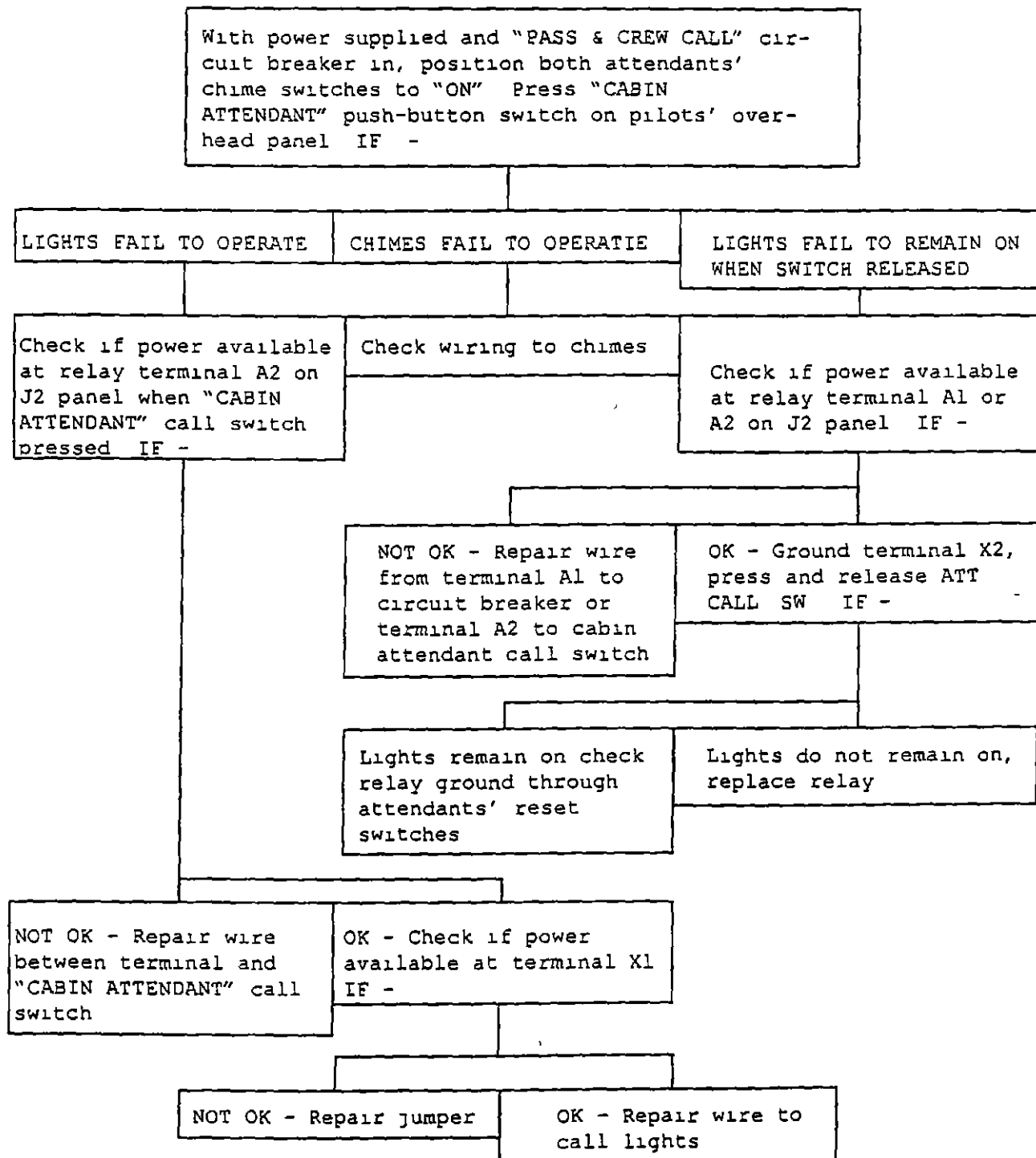
1 General

- A The trouble shooting charts on the following pages will assist in isolating faults which may occur in the course of operating the equipment
- B Simple faults such as single light failures are not covered by the charts as these can readily be corrected by replacement of the bulb, or repairing the wire
- C Total failure of the systems can be corrected by checking the power supply
- D Failure of the horn can be corrected by checking wiring continuity or replacing horn

2 Trouble Shooting Procedure

- A Trouble shooting the systems will generally require the services of more than one person in order to operate the switches and observe lights in different parts of the airplane at the same time
- B The passenger call system trouble shooting chart details trouble shooting for single components only and must be repeated for other components as necessary

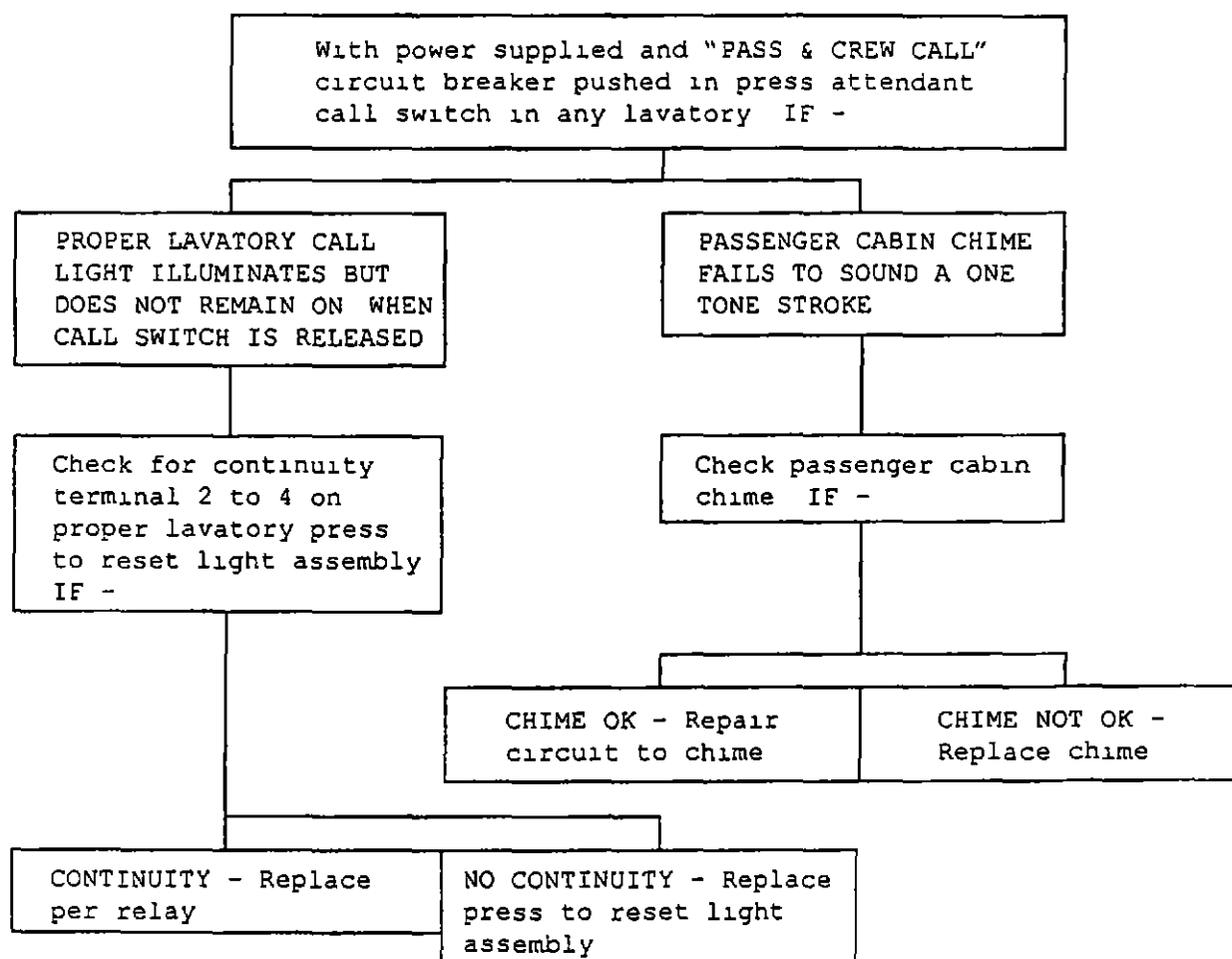
3 Crew Call System Trouble Shooting Chart





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4 Passenger Call System Trouble Chart



END





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CREW CALL SYSTEMS - MAINTENANCE PRACTICES

1 Adjustment/Test Crew Call Systems

A General

- (1) In order to test these systems it, is necessary to station an observer at strategic points to observe function of the individual system components

B Test Crew Call Systems

- (1) Press and release the "PERS ACCOM CALL" push-button switch on the pilots' overhead panel and check
 - (a) One personnel accommodations area chime sounds one stroke
 - (b) The "CAPT CALL" light on the attendant's seat control panel illuminates
- (2) Press the "CAPT CALL RESET" button on the attendants' panel, and check light extinguishes
- (3) Press "CAPT CALL push-button switch on the attendant's seat control panel and check
 - (a) Control cabin chime sounds a single stroke
 - (b) "CABIN ATTENDANT" call light on pilots' overhead panel illuminates
- (4) Turn the sign switch on the overhead panel to "FASTEN SEAT BELTS "
 - (a) The proper signs should illuminate
 - (b) The personnel accommodations area chime should sound two one-tone strokes
- (5) Turn the sign switch to "OFF "
 - (a) The proper signs should shut off
 - (b) The chime should sound two-one-tone strokes

C Test Ground Crew Call System

- (1) Press "GRND CREW CALL" push-button switch on pilots' overhead panel, check that horn in nose well wheel functions
- (2) Press "CAPT CALL push-button switch at external power receptacle box and check control cabin chime sounds a single stroke



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D Test Passenger Call System

- (1) Switch "CHIME ON-OFF" switch on both attendants' panels to "ON "
- (2) Press and release "ATTENDANT CALL,BUTTON push-button switch in lavatory A and check
 - (a) Both chimes in the passenger cabin sound one stroke
 - (b) Both green master call lights illuminate
 - (c) Blue "LAV A " light on both attendants' panels illuminates
- (3) On forward attendants' panel, press "LAV A " call light/reset switch and check lights extinguish
- (4) Repeat steps (2) and (3) for lavatories B, C, D and E

NOTE Lavatory C, D and E circuits are reset by pressing "LAV C ,"
"LAV D " and "LAV E " combination call light/reset switches
on the aft attendant's panel (See figure 1)

- (5) Push in "ATTENDANT CALL BUTTON" push-pull switch on passenger service unit and check
 - (a) Seat row number on passenger service unit illuminates
 - (b) Both passenger cabin chimes sound one stroke
 - (c) Both green master call lights illuminate
 - (d) Blue cabin area call lights on both attendants' panels illuminate
 - (e) Pull out "ATTENDANT, CALL BUTTON" on passenger service unit and check lights extinguish
- (6) Repeat step (5) for each passenger service unit
- (7) Push in "ATTENDANT CALL BUTTON" push-pull switch in passenger lounge and check
 - (a) Light at switch in lounge area illuminates
 - (b) Both passenger cabin chimes sound one stroke
 - (c) Both green master call lights illuminate
 - (d) Blue forward cabin area call lights on both attendants' panel illuminate
 - (e) Pull out ATTENDANT CALL BUTTON" on passenger service unit and check lights extinguish



MAIN CABIN CARGO EQUIPMENT - DESCRIPTION AND OPERATION

1 General

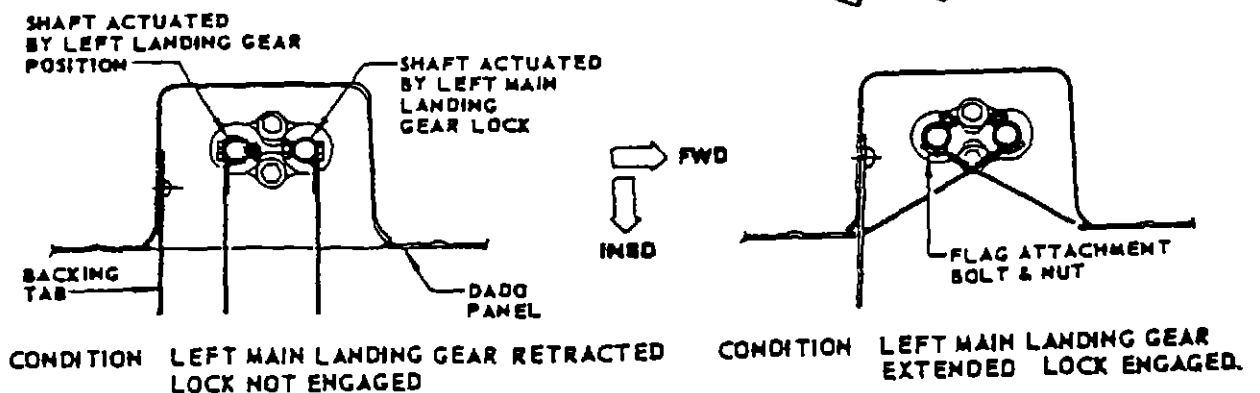
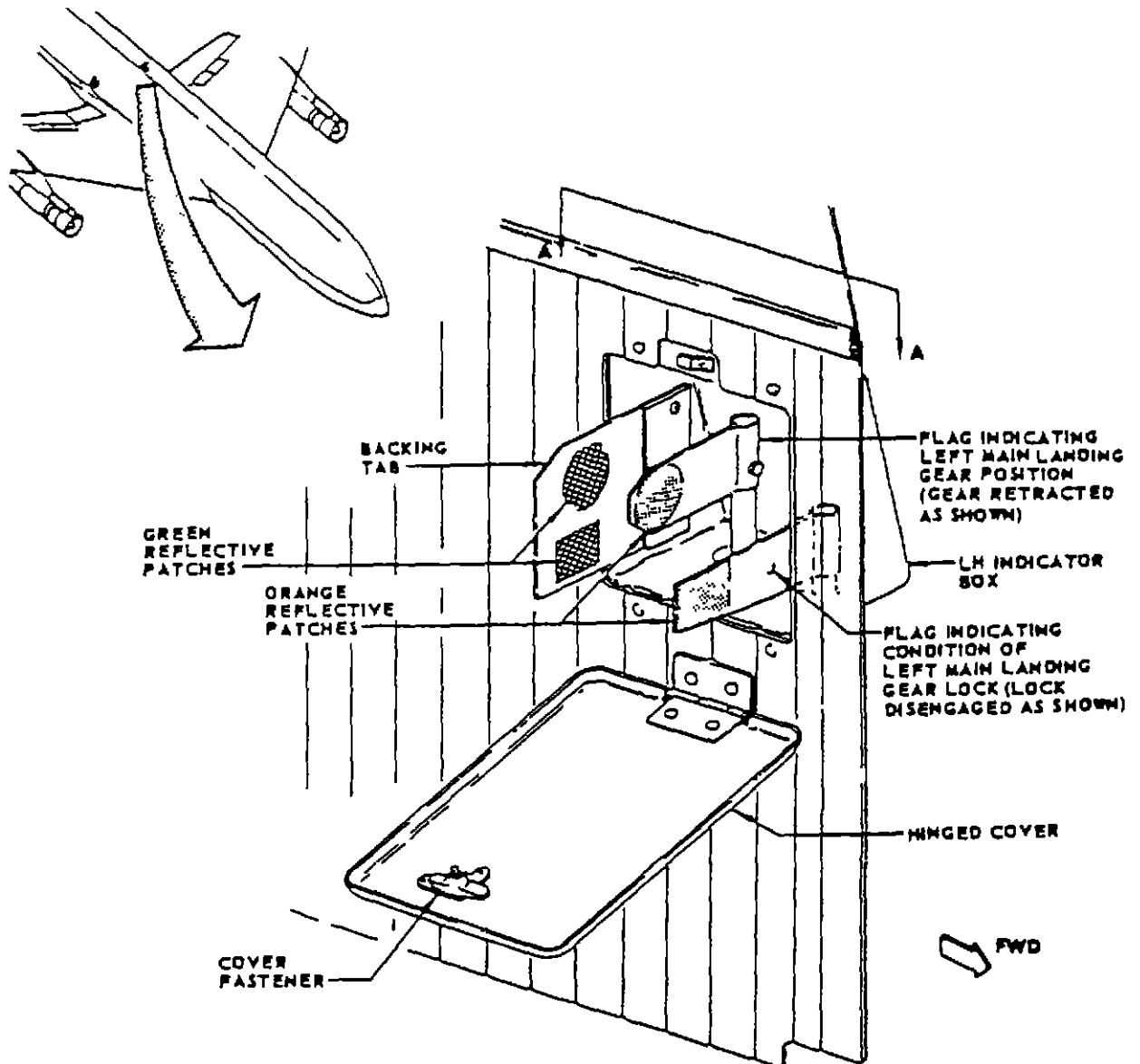
- A The cargo equipment consists of all the equipment which must be installed or activated in the cabin before cargo may be loaded and carried
- B This section describes the major components of the cargo equipment except for the cargo carrying system and the on-board cargo elevator. These systems are covered as follows:
 - (1) 25-36-101, Cargo Carrying System
 - (2) 25-36-200, Cargo Elevator
- C Components described in this section include such items as the landing gear mechanical indicators, and the protective covers and panels which prevent damage to the cabin interior
- D The hatrack lower closure panels and lower stowage supports may be defined as cargo equipment, but because of their close relationship with the hatracks they are described in 25-10-0, Passenger Cabin Equipment, and 25-10-42, Hatracks
- E Other miscellaneous items of cargo equipment, such as small plugs and caps etc , are described in the appropriate portions of 25-15-200, Cabin Accommodation Conversions



MAINTENANCE MANUAL

2 Landing Gear Mechanical Indicating System

- A The landing gear mechanical indicating system consists of a pair of mechanically actuated flag signals which provide a colored visual indication of the condition of each main landing gear and its lock when a load of cargo prevents the use of the landing gear inspection windows in the cabin floor (Applicable to the 8, 9 and 10 Pallet and the all-cargo configurations only) (See Figure 1)
- B Two pairs of shafts, each pair actuated by the landing gear mechanism on one side of the airplane, extend upwards into the lower sidewall on each side of the fuselage at approximately BS 885. The upper ends of each pair of shafts terminate in a box set into the sidewall dado panel about 15 inches above floor level and concealed by a hinged cover plate. When the indication system is activated the cover plate of each indicator box is hinged down, a metal flag installed to the top of each shaft and a sheet rubber tab installed on the aft face of the indicator box so that it projects inboard of the dado panel. The two flags of each indicator are provided with patches of orange reflective tape on the side which faces forward when the flags rotate inboard. The upper flag has a round orange patch and the lower flag has a square one. The upper flag of each indicator is actuated by the position of its landing gear and is rotated inboard when the landing gear is retracted. The lower flag is actuated by the landing gear lock and is rotated inboard when the lock is disengaged. The forward face of the rubber backing tab of each indicator is provided with two patches of green reflective tape, one round patch above one square patch. These green patches are so positioned that they are obscured by the corresponding orange ones when the flags are rotated. Both indicators are designed to be viewed from the forward end of the cabin. When the cabin is loaded with cargo, and therefore in darkness, inspection is made by shining a flashlight aft along each side of the cabin, and observing the colored signals reflected by each indicator.



SECTIONS A-A
Landing Gear Mechanical Indicators
Figure 1



MAINTENANCE MANUAL

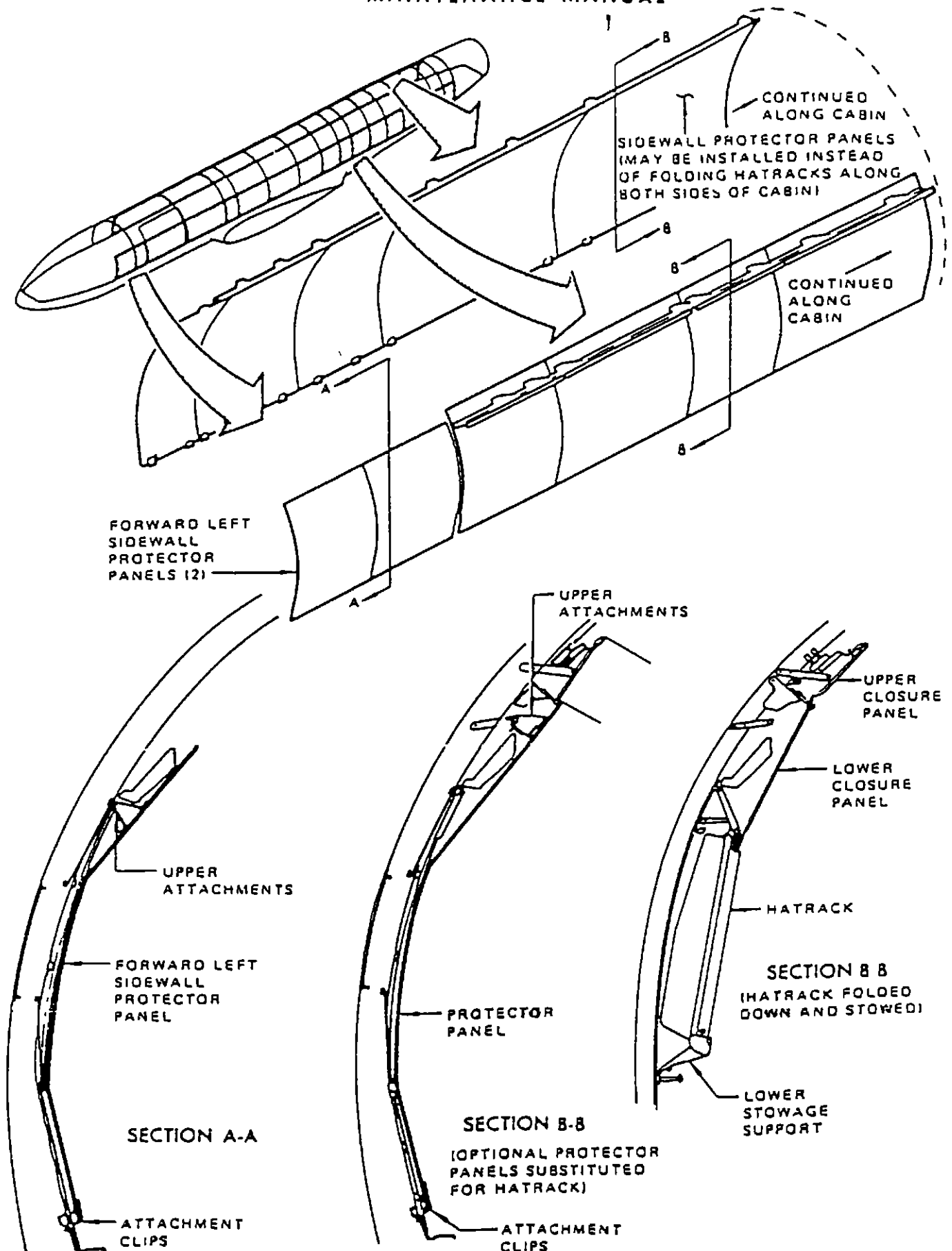
- C. When the indicators are activated, and the airplane on the ground, the visible signal from both indicators should consist of the two green patches (a round spot above a square one) of the backing tab. This is because the landing gear is extended and locked down and both flags of each indicator are retracted within the box.
- D. During flight, with the landing gear retracted and locked up, the signal will consist of a round orange spot above a green square. This is because the upper flag is rotated inboard by the retracted position of the landing gear, while the lower flag is within the box showing that the landing gear is locked.
- E. When the airplane is about to land both indicators should show a double green signal, indicating that both main landing gears are extended and locked down. Any orange signal at this time would indicate that the appropriate main landing gear is not extended, not locked down, or neither, according to the orange signal (or signals) displayed.

3. Protective Covers and Panels

- A. Protective covers are provided in certain areas to prevent the cabin interior furnishings being damaged by cargo. The left sidewall forward of the main cargo door and the dado panel opposite the main cargo door are provided with protective covers. The sidewalls along both sides of the cabin are protected by the folding hatracks when these (and their lower closure panels) are stowed down against the sidewall. If, when converting the cabin to accommodate cargo, it is desired to save weight by removing the folding hatracks, they may be substituted by a series of comparatively lightweight cabin sidewall protection panels.

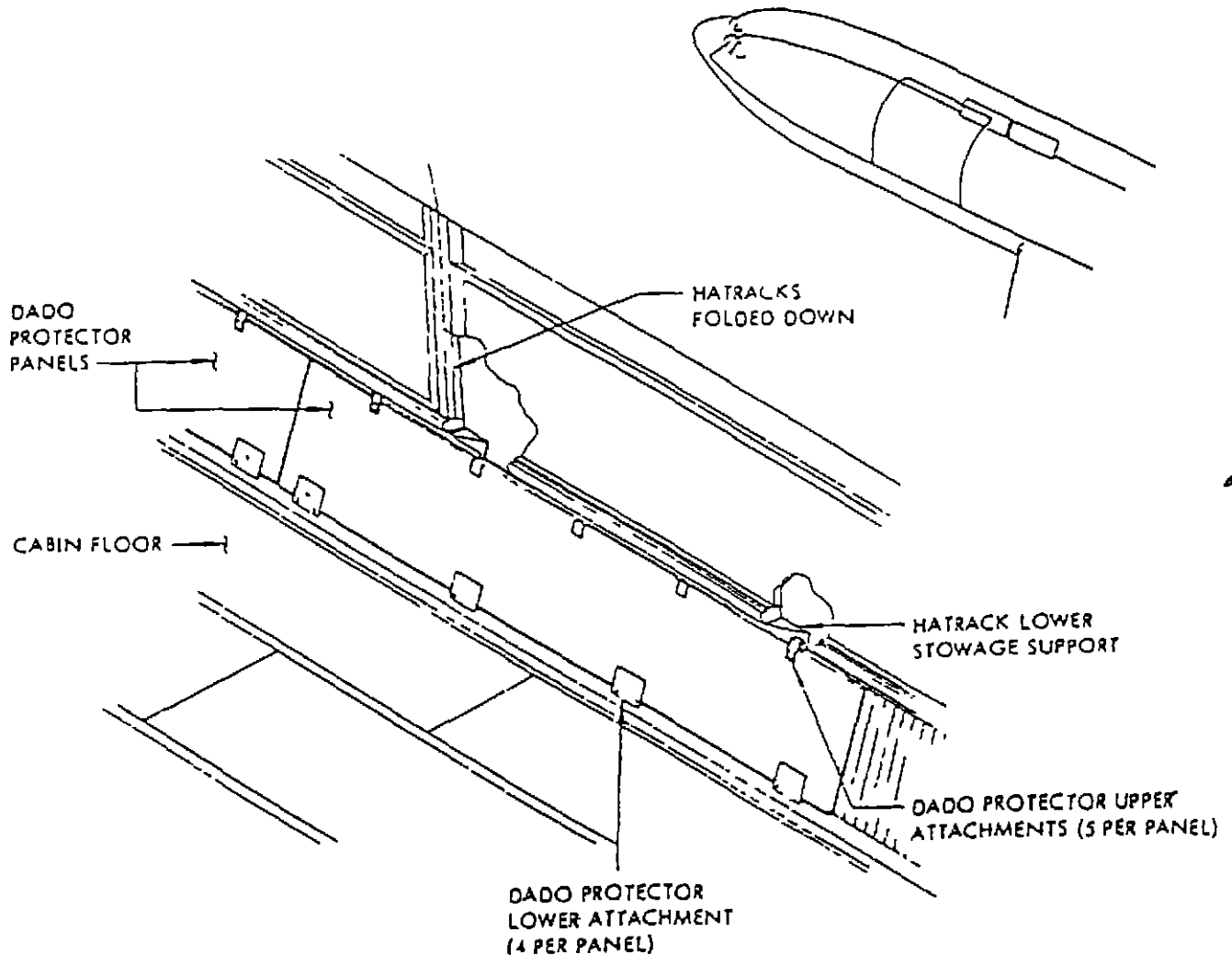
(1) Deleted

- (2) The forward left sidewall is protected by two panels (one forward, one aft) each of which covers the sidewall from the cove down to the lower edge of the dado panel. The panels are shaped to follow the contour of the sidewall and are constructed of fiberglass honeycomb. Each panel is attached to the sidewall by two fasteners just below the cove and by two clips which engage the lower edge of the dado panel. (See figure 2.)



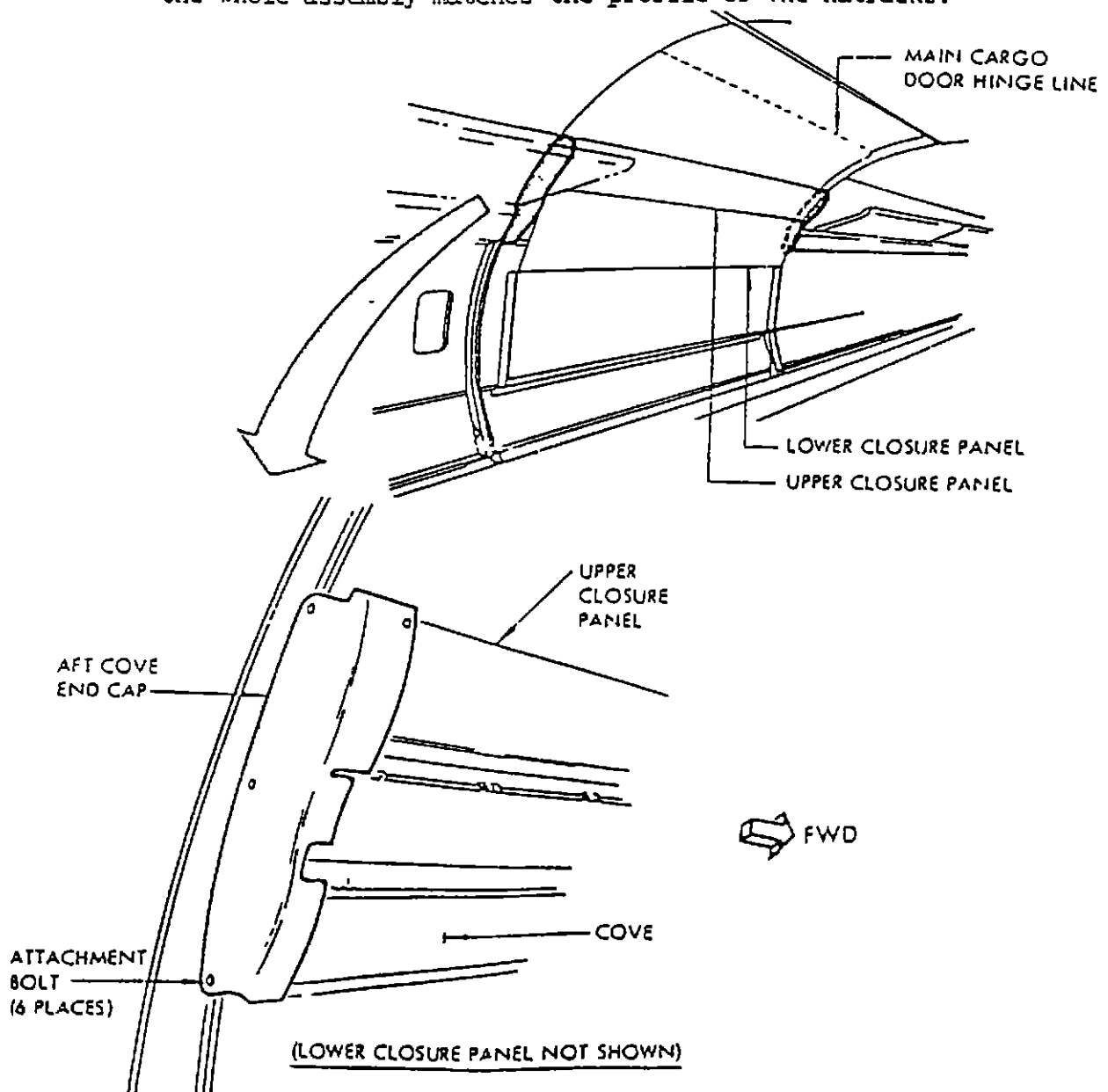
Sidewall Protector Panels
Figure 2

- (3) The cabin sidewall protector panels, which may be installed along both sides of the cabin instead of the folding hatracks, consist of a series of fiberglass honeycomb panels which cover the sidewall from the lower edge of the upper closure panels to the lower edge of the dado panels. The lengths of the panels correspond to the lengths of the folding hatrack sections, most of which are 90 inches long. Each panel is hung from the hatrack attachment brackets on the upper fuselage structure, and is also clipped to the lower edge of the dado panel.
- (4) The dado protectors consist of two flat, aluminum-faced, fiberglass honeycomb panels (one forward, one aft) which cover the dado panel of the right sidewall immediately opposite the main cargo door. (See figure 3.) The panels are attached at their upper edges to the lower stowage supports of the folded-down hatrack and at their lower edges to the lower edge of the dado panels along the sidewall.
- (5) Protective covers are provided for installation over the small windows on the galley doors and the aft entry door, to minimize fire risk.

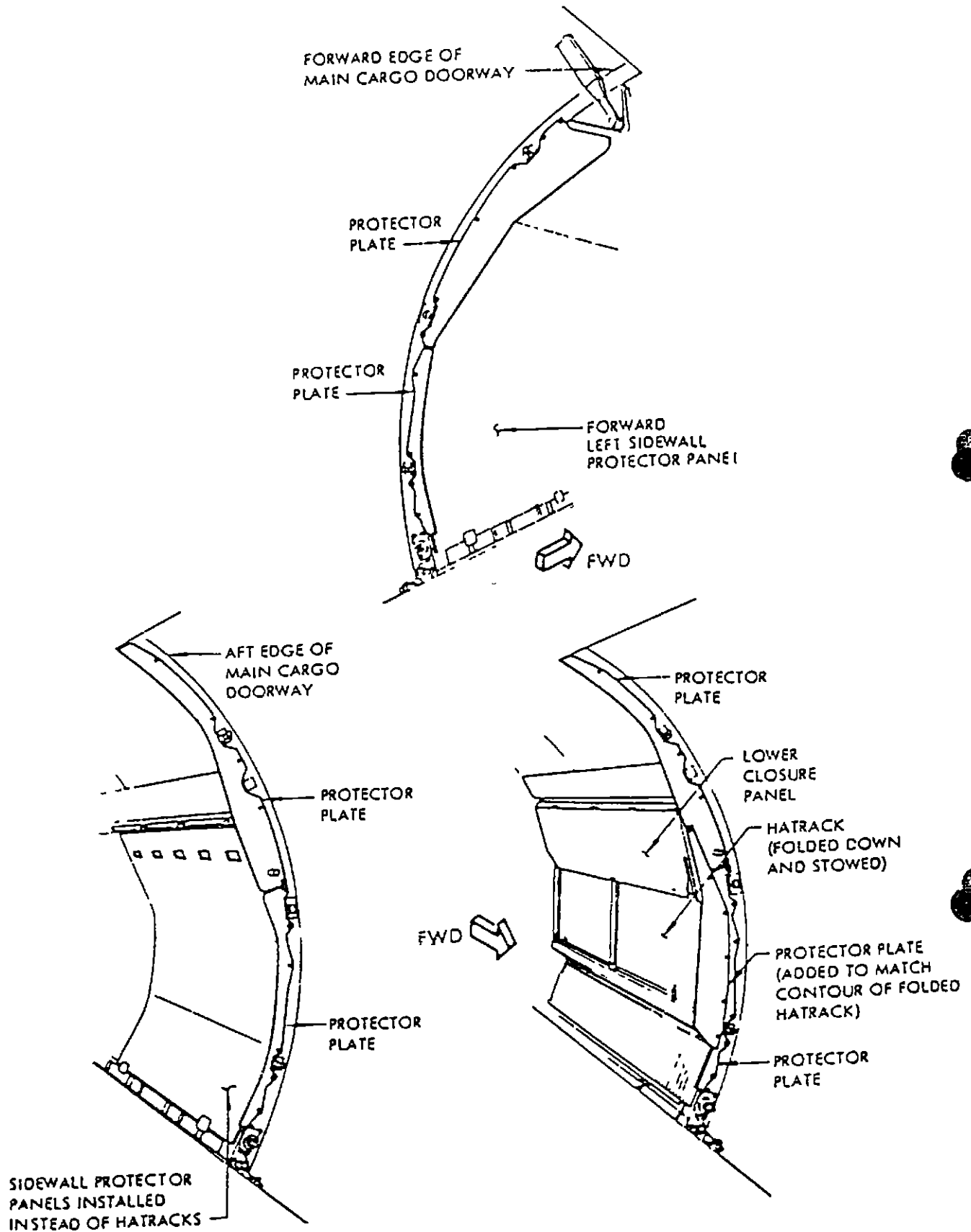


Dado Protectors
Figure 3

- 8 Protective covers are installed to the main cargo door and its surrounding opening to prevent damage by cargo passing through the door. (See figure 4.)
- (1) Cove end caps are attached to the forward and aft ends of the cove on the main cargo door.
 - (2) Protector plates are bolted to the forward and aft edges of the main cargo door opening. Each set of plates consists of an upper and lower plate which together conform to the profile of the adjacent sidewall protector panels. For configurations in which the hatracks aft of the door have been left connected but folded down and stowed, a third plate may be added to the aft set so that the whole assembly matches the profile of the hatracks.



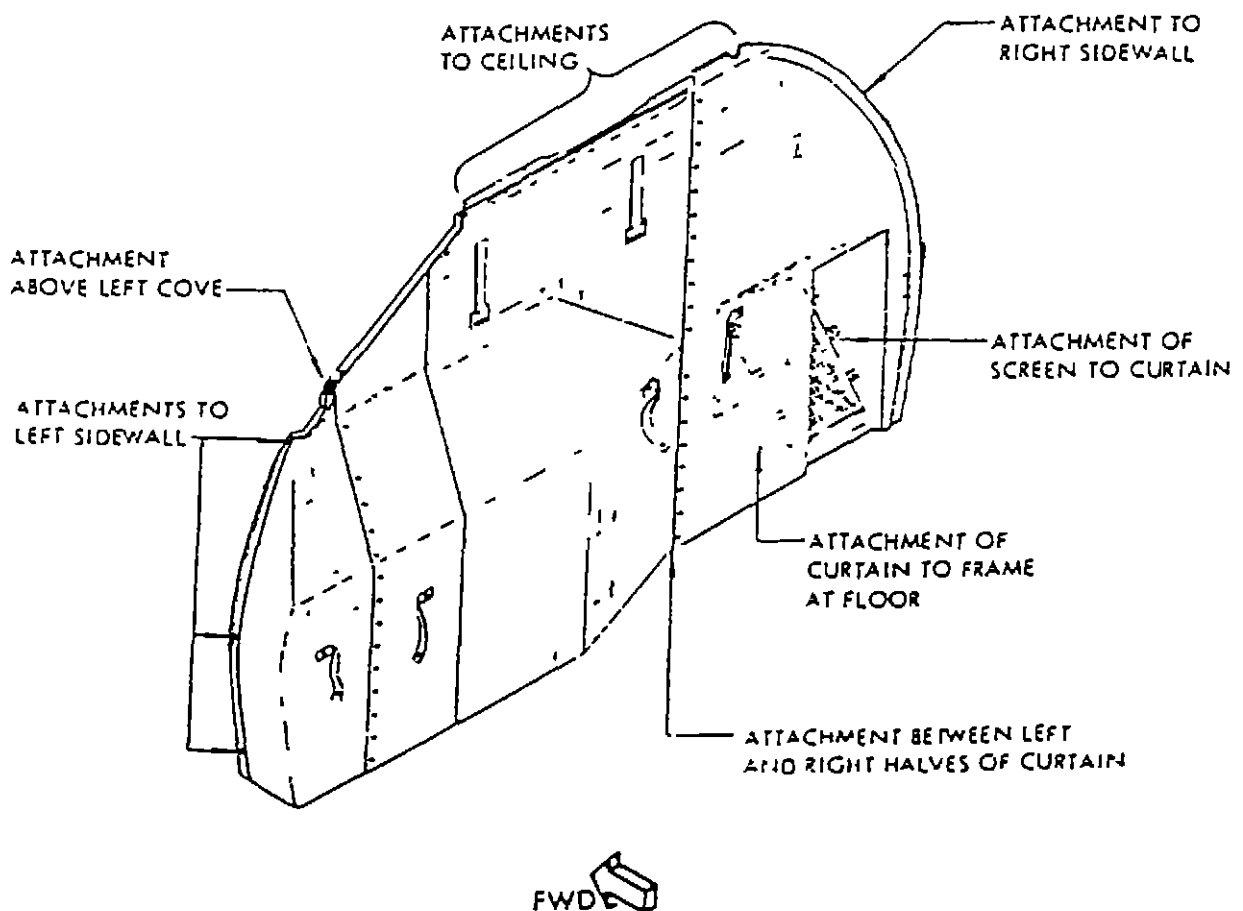
Main Cargo Door Protective Covers
Figure 4 (Sheet 1)



Main Cargo Door Protective Covers
Figure 4 (Sheet 2)

4 Fume-Tight Curtain

- A. The fume-tight curtain (figure 5) is installed across the cabin at AS 382, and forms the aft wall of the crew accommodation area. The curtain is attached across the aft end of the permanent portion of the forward lowered ceiling and around both sidewalls, and forms a barrier against the forward penetration of smoke and other fumes originating in the cargo compartment. The crew may pass through the curtain to obtain access to the cargo compartment by unfastening press-stud fasteners which join two vertical divisions in the curtain. One of these divisions is near the center of the curtain and is the joint between left and right halves of the curtain. The other division is in the left half of the curtain, immediately forward of the barrier net strap fittings which permit passage through the net.
- 3 At the lower right corner of the curtain a pocket, or recess, extends forward to surround a hole in the cabin floor. The purpose of this feature is to allow air from the cargo compartment, which could include smoke and fumes, to pass through the floor and to the outflow valves via the electronics compartment, thus minimizing any tendency for this air to penetrate forward of the curtain. A gauze screen across the mouth of the curtain pocket prevents foreign objects from falling into the electronic compartment.



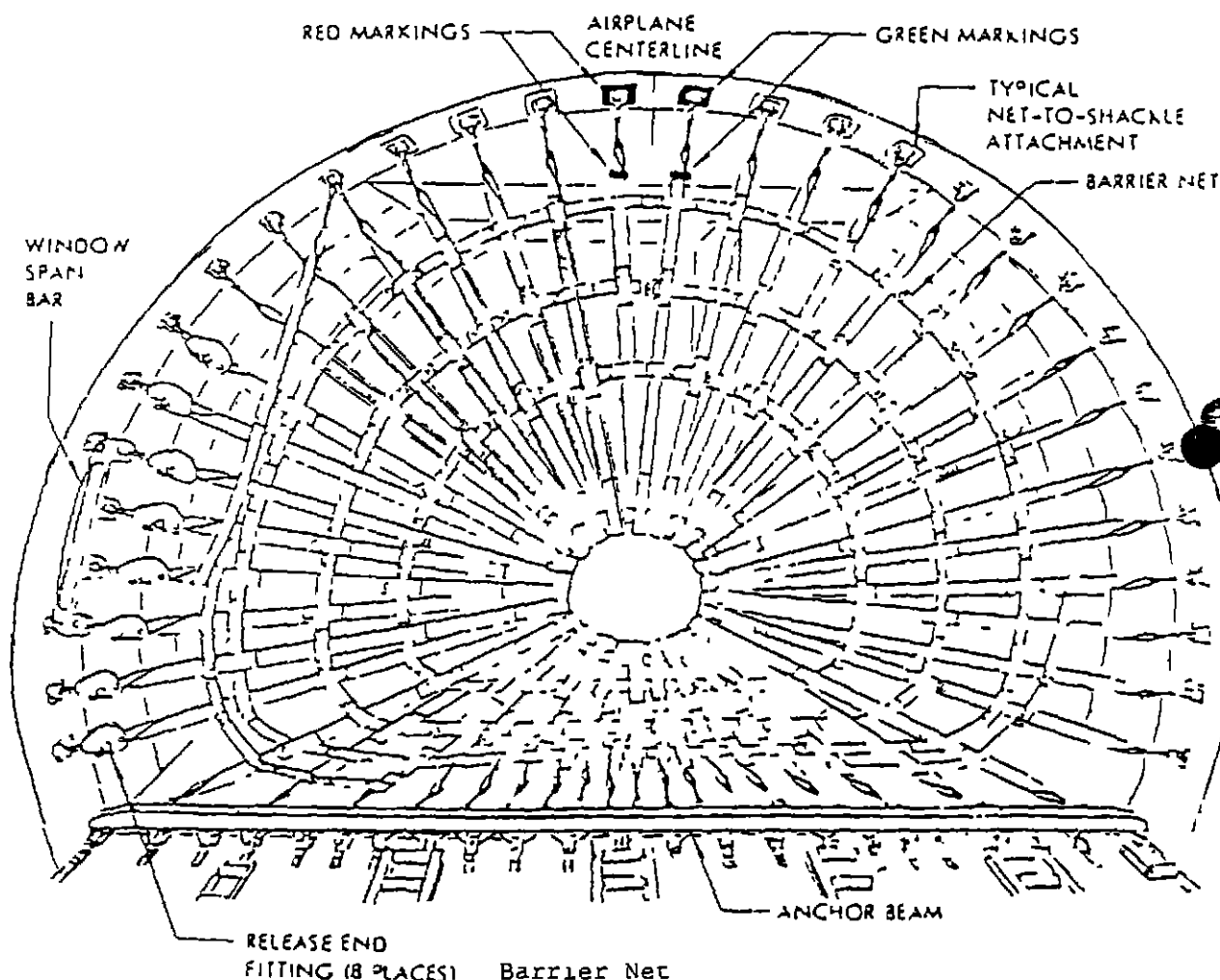
Fume-Tight Curtain
Figure 5

MAINTENANCE MANUAL

- C The lower edge of the curtain rests on the cabin floor, except around the hole in the floor, to which the lower edge of the curtain pocket is attached by press-stud fasteners. The hole in the floor is surrounded by a frame which carries the fasteners for the curtain. When the curtain is removed this frame is removed from the floor and a floor panel is installed in its place.

5 Barrier Net

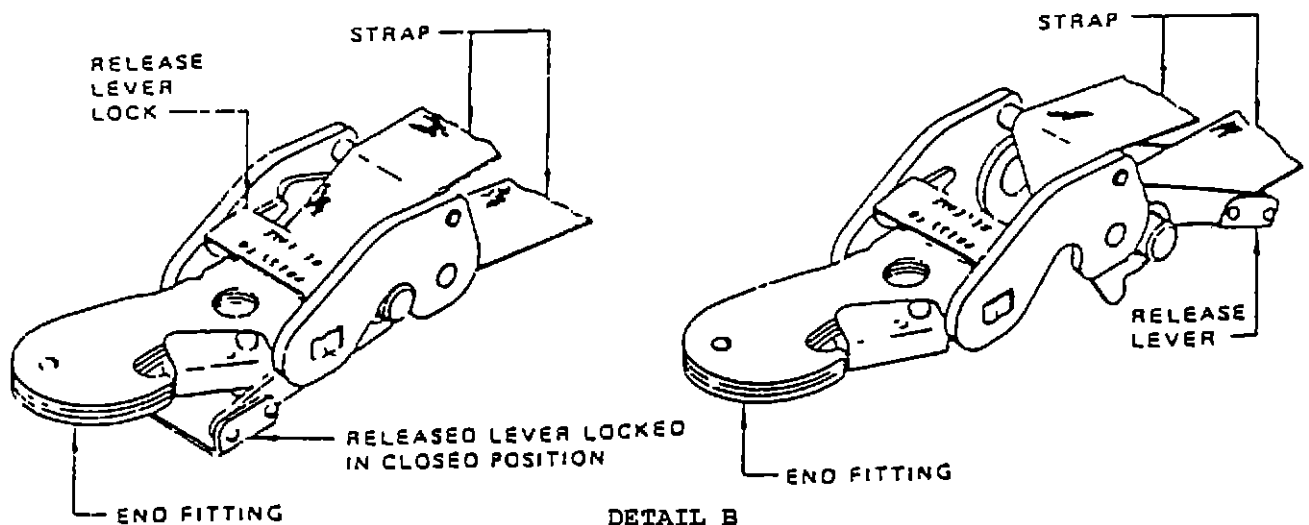
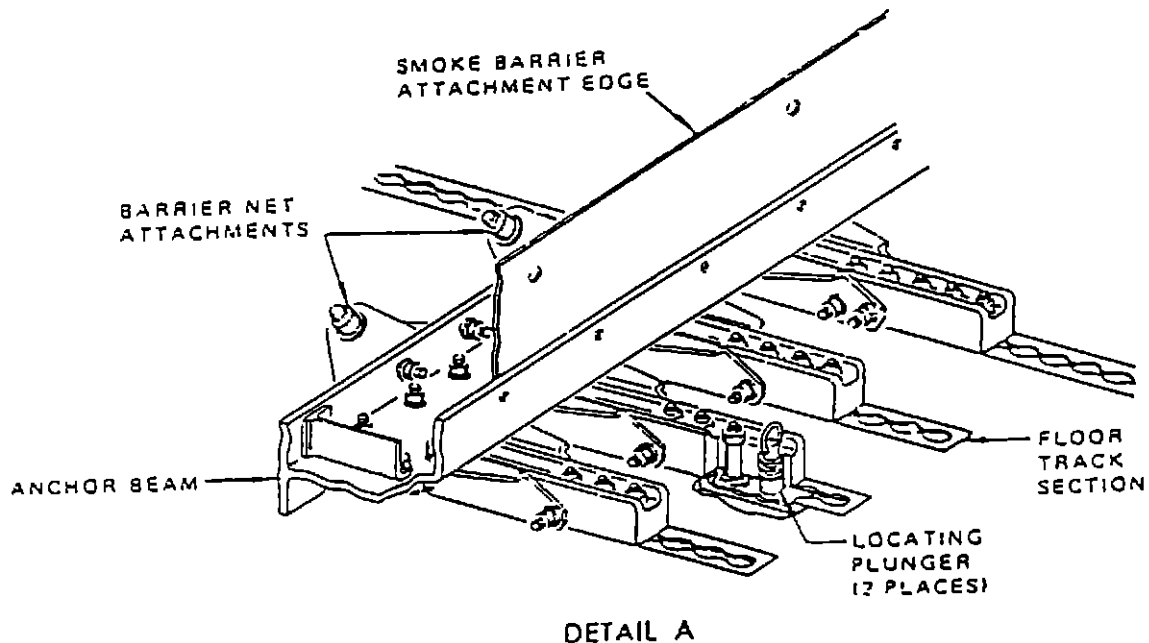
- A The barrier net is an assembly of radial and circumferential straps which is installed across the cabin at BS 390 and which is designed to resist the impact of the entire cargo at a load factor of up to 9G (See Figure 6).
- B The net is attached to the fuselage structure by fittings at the ends of its radial straps. These fittings engage shackles attached between the stringers around the upper lobe of the fuselage structure. Across the floor the straps are attached to an anchor beam which is installed to the floor. The anchor beam is attached to the floor tracks and to short intermediate sections of floor track. A window span bar is installed across the window at the left side of the cabin, to provide connections for the net straps at that level.



Barrier Net
Figure 6 (Sheet 1)

MAINTENANCE MANUAL

- C Eight of the strap ends on the left side of the net are provided with over-center latching fittings, by means of which personnel may temporarily disconnect these straps in order to gain access through the net into the cargo compartment
- D The 9G palletized cargo system does not need or include the cargo barrier net, but special forward locks may be provided to enable the barrier net to be installed in conjunction with the 9G palletized system if so desired. The barrier net is also furnished and required for bulk cargo configurations (in which no cargo system is installed) and must be installed when the main cabin is converted to carry bulk cargo



Barrier Net
Figure 6 (Sheet 2)





MAINTENANCE MANUAL

MAIN CARGO DOORWAY PROTECTIVE COVERS - REMOVAL/INSTALLATION

1 General

- A The main cargo doorway protective covers consist of the forward and aft cove end caps on the door itself, and the sets of protector plates which attach to the forward and aft edges of the door opening
- B The procedures for removing and installing the cove end caps include instructions to have the main cargo door open or closed for certain steps This is only for the sake of affording easier access, and has no other significance

2 Remove Main Cargo Doorway Protective Covers (See figure 401)

A Remove Protector Plates

- (1) With main cargo door open, remove bolts attaching protector plates to edges of doorway

B Remove Cove End Caps

- (1) With main cargo door open, remove six screws attaching end caps to ends of cove on door
- (2) With main cargo door closed, remove remaining two screws attaching end caps to aft and forward ends of cove on door

3 Install Main Cargo Doorway Protective Covers (See figure 401)

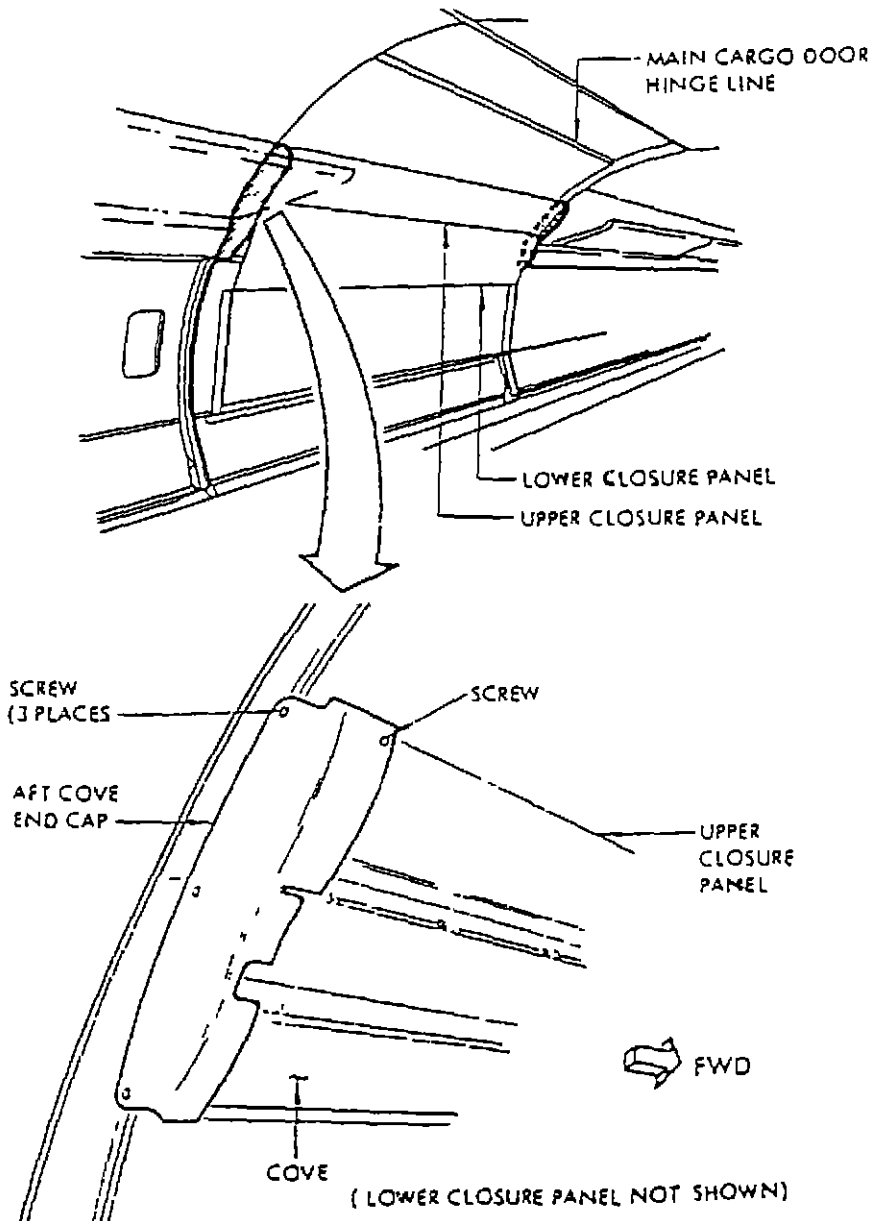
A Install Cove End Caps

- (1) With main cargo door closed, position each cap to forward and aft ends of cove and install two attachment screws
- (2) With main cargo door open, install remaining six screws attaching end caps to aft and forward end of cove

8 Install Protector Plates

- (1) With main cargo door open, position each protector plate and install its attachment bolts. Adjust plates on their slotted holes so that their inboard edges match the contour of the adjacent cabin interior.

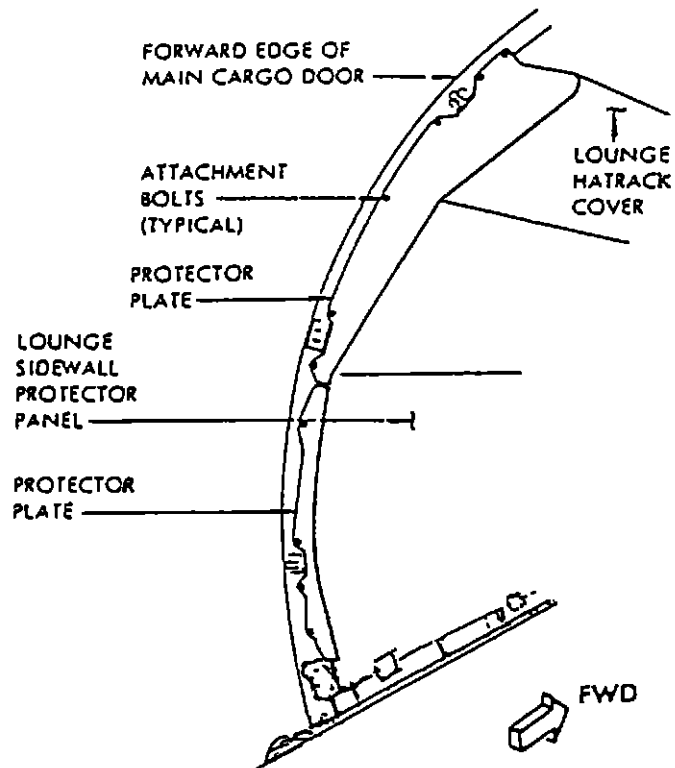
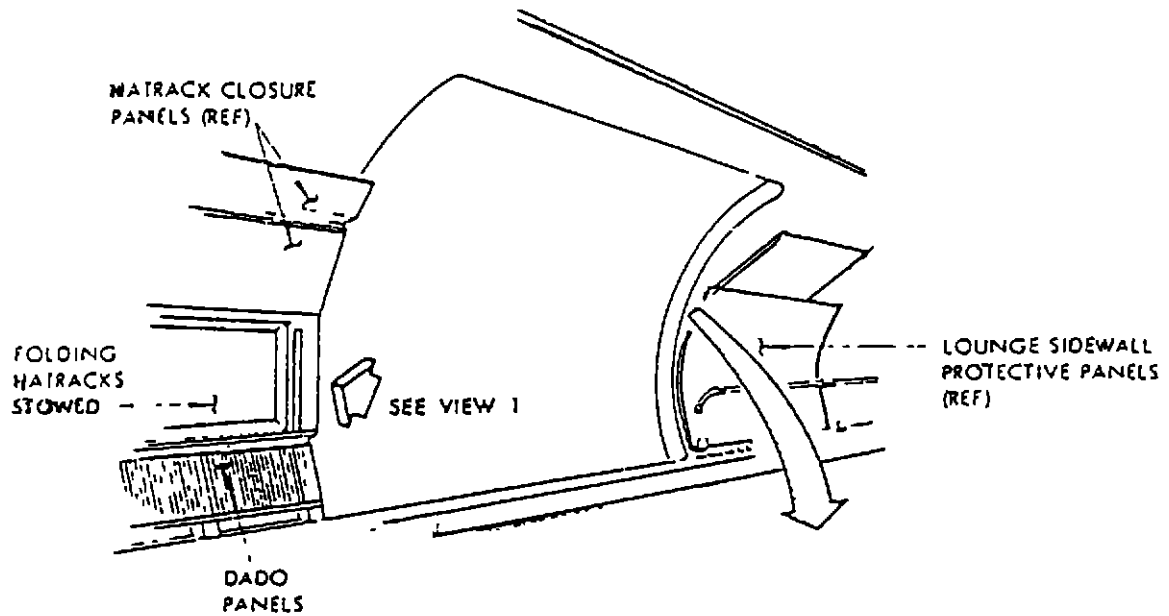
NOTE A third plate is required at the aft end if the hatracks have been folded down along the left side of the cabin aft of the door.



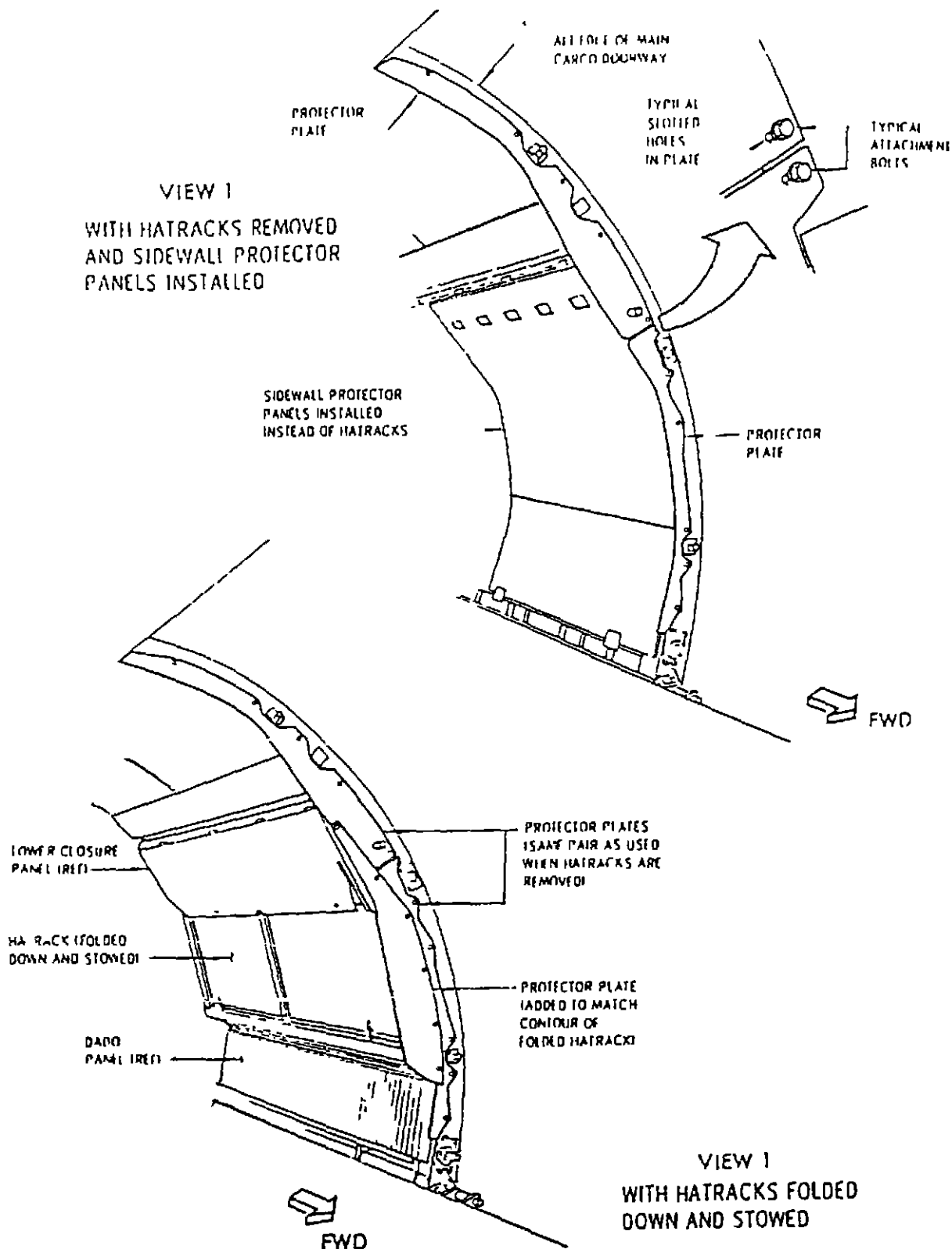
TYPICAL COVE END CAP

Main Cargo Doorway Protective Covers Installation
Figure 401 (Sheet 1)

SN REV Jul 31/99



Main Cargo Doorway Protective Covers Installation
 Figure 401 (Sheet 2)



Main Cargo Doorway Protective Covers Installation
 Figure 401 (Sheet 3)



MAINTENANCE MANUAL

FORWARD LEFT SIDEWALL PROTECTOR PANELS - REMOVAL/INSTALLATION

1. General

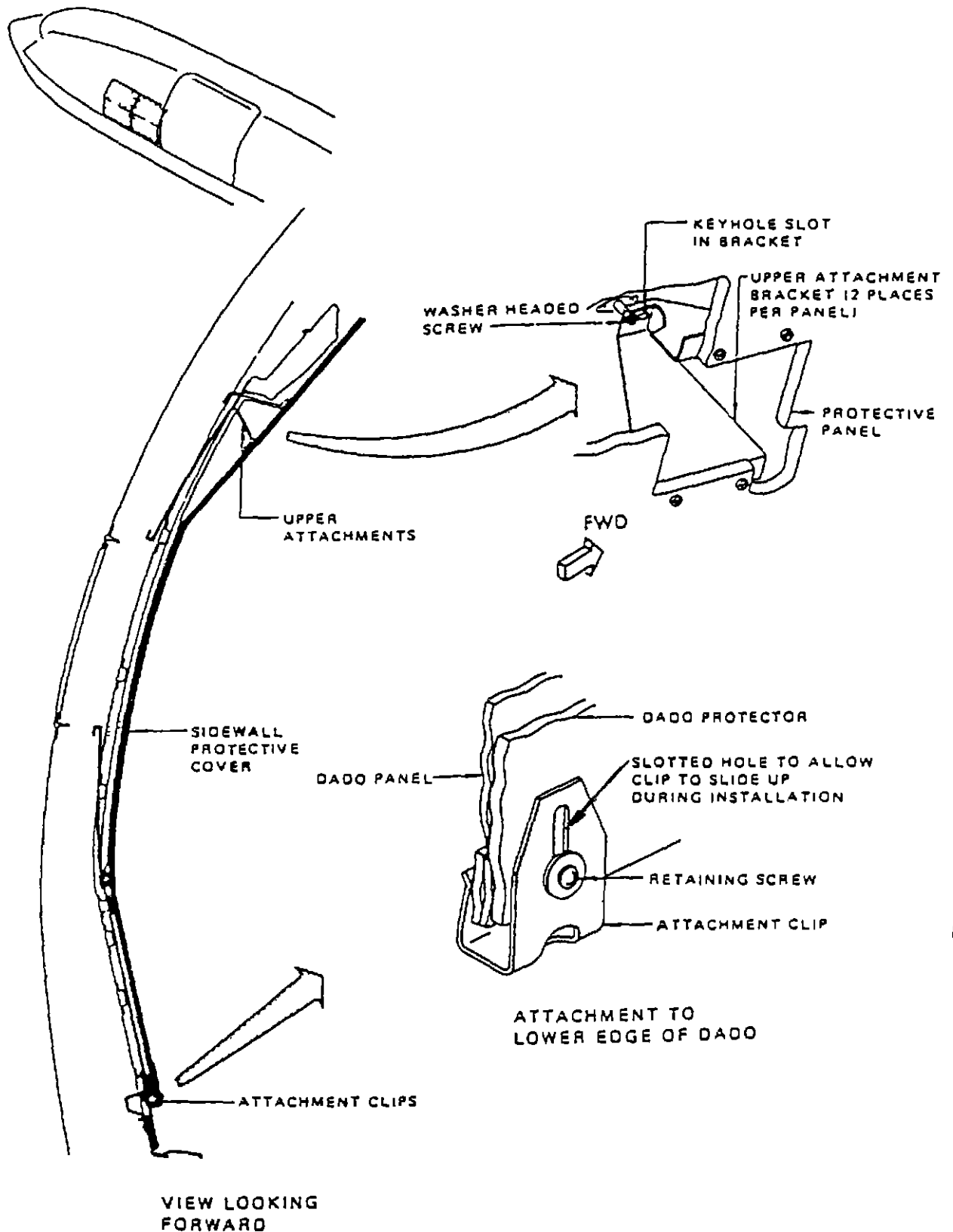
- A The components described in this section are the protector panels which are installed to the sidewall on left side of the cabin, forward of the main cargo door, in cargo-carrying configurations.

2. Remove Forward Left Sidewall Protector Panels

- A. Slacken retaining screws securing lower attachment clips of both sidewall protective panels. Slide all clips down to disengage lower edge of dado panel. (See figure 401.)
- B. Slacken all upper attachment screws.
- C. Slide aft protective panel aft until keyhole slot on its upper attachment brackets allows it to be disengaged and removed.
- D. Remove forward protective panel in similar manner, and remove screws and washers from all four upper attachment fittings on sidewall.
- E. Install center and aft top trim moldings along upper edges of window panels. (Refer to 25-10-21, Sidewall Lining and Insulation.)

3. Install Forward Left Sidewall Protector Panels

- A. Install washer-headed screw (AN525-10R10) with flat washer (AN960C10L) to each of four attachment fittings just below cove, which have been exposed by removal of top trim moldings. Do not tighten screws.
- B. Slacken retaining screws securing each lower attachment clip at lower edge of sidewall protective panels, and allow clips to slide down as far as their slotted holes allow.
- C. Position forward sidewall protective panel engaging keyhole slots of both its upper mounting brackets with forward pair of loosely installed attachment screws on sidewall. (Each panel bracket should be between washer and underside of screw head.) Slide panel forward to limit of slots in its brackets and tighten both attachment screws.
- D. Slide all three lower attachment clips up to engage lower edge of dado panel, and tighten screws securing each clip in position.
- E. Install aft sidewall protective panel in similar manner, using aft pair of sidewall attachment screws.



Forward Left Sidewall Protector Panels Installation
 Figure 401



MAINTENANCE MANUAL

FUME-TIGHT CURTAIN - REMOVAL/INSTALLATION

EFFECTIVITY

Passenger/Cargo Convertible Airplanes

1 Remove Fume-Tight Curtain

- A. Remove sponge rubber plugs from above forward end of lounge hatrack and from between cove and edge of curtain.
- B. Disconnect all press stud fasteners (and one stud, washer and nut assembly) connecting left and right halves of curtain to each other, and all fasteners joining both portions of left half of curtain. (See figure 401.)
- C. Remove screws attaching left half of curtain to sidewall and above cove.
- D. Remove six screws attaching left half of curtain along aft face of permanent forward lowered ceiling and disengage from ceiling by lowering its right side and sliding its attachment plate clear of retaining stud.
- E. Remove screen from pocket in lower end of right half of curtain by disconnecting nine press stud fasteners attaching screen to curtain and three machine screws attaching screen to aft edge of frame around hole in floor.
- F. Disengage press stud fasteners attaching curtain to frame around hole in floor.
- G. Disconnect six screws attaching right half of curtain to sidewall and three screws attaching curtain to aft end of forward lowered ceiling.
- H. Remove 29 flush head screws attaching frame around hole in floor to floor structure.
- I. Lift frame from hole in floor and replace floor panel in hole. Install and tighten same 29 screws used to attach frame.

NOTE. The gasket around the hole in the floor, from which the curtain attachment frame has been removed, must remain in position to seal the floor panel.

MAINTENANCE MANUAL

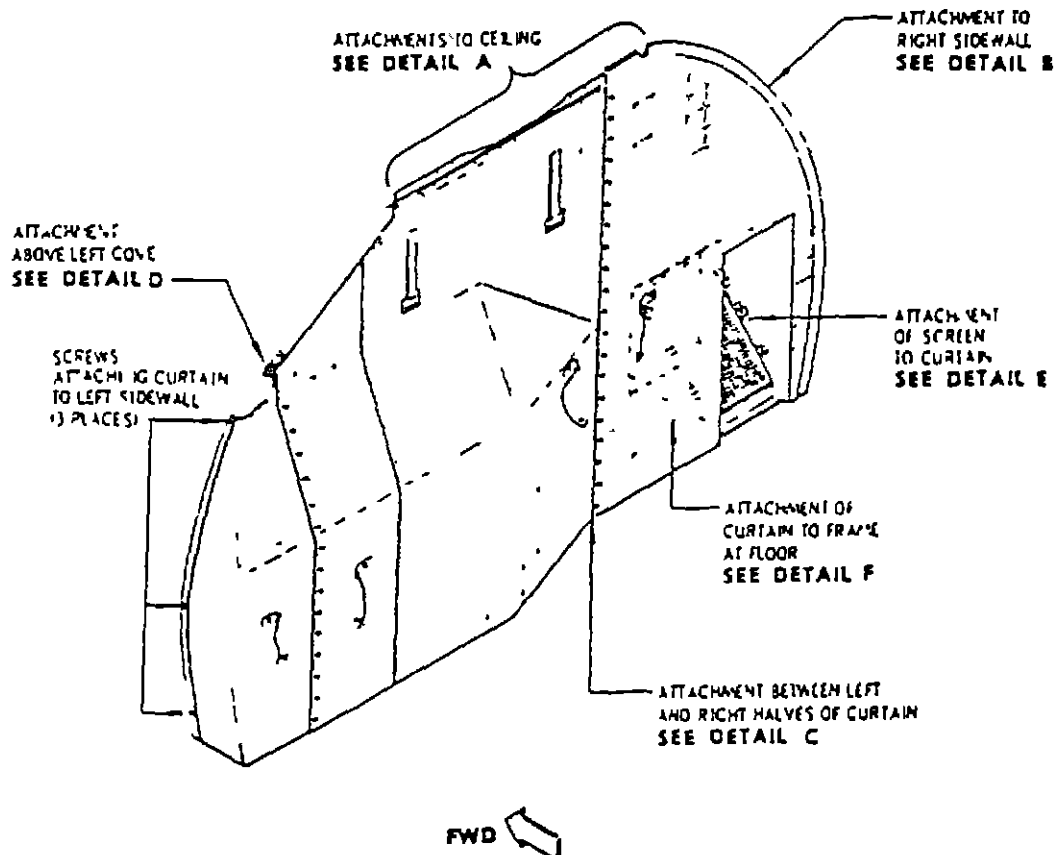
2 Install Fume-Tight Curtain

- A Remove 29 flush-head screws securing removable floor panel, forward of BS 380 on extreme right side of cabin (See figure 401)
- B Remove floor panel from airplane and install curtain attachment frame in its place on floor, using same 29 attachment screws

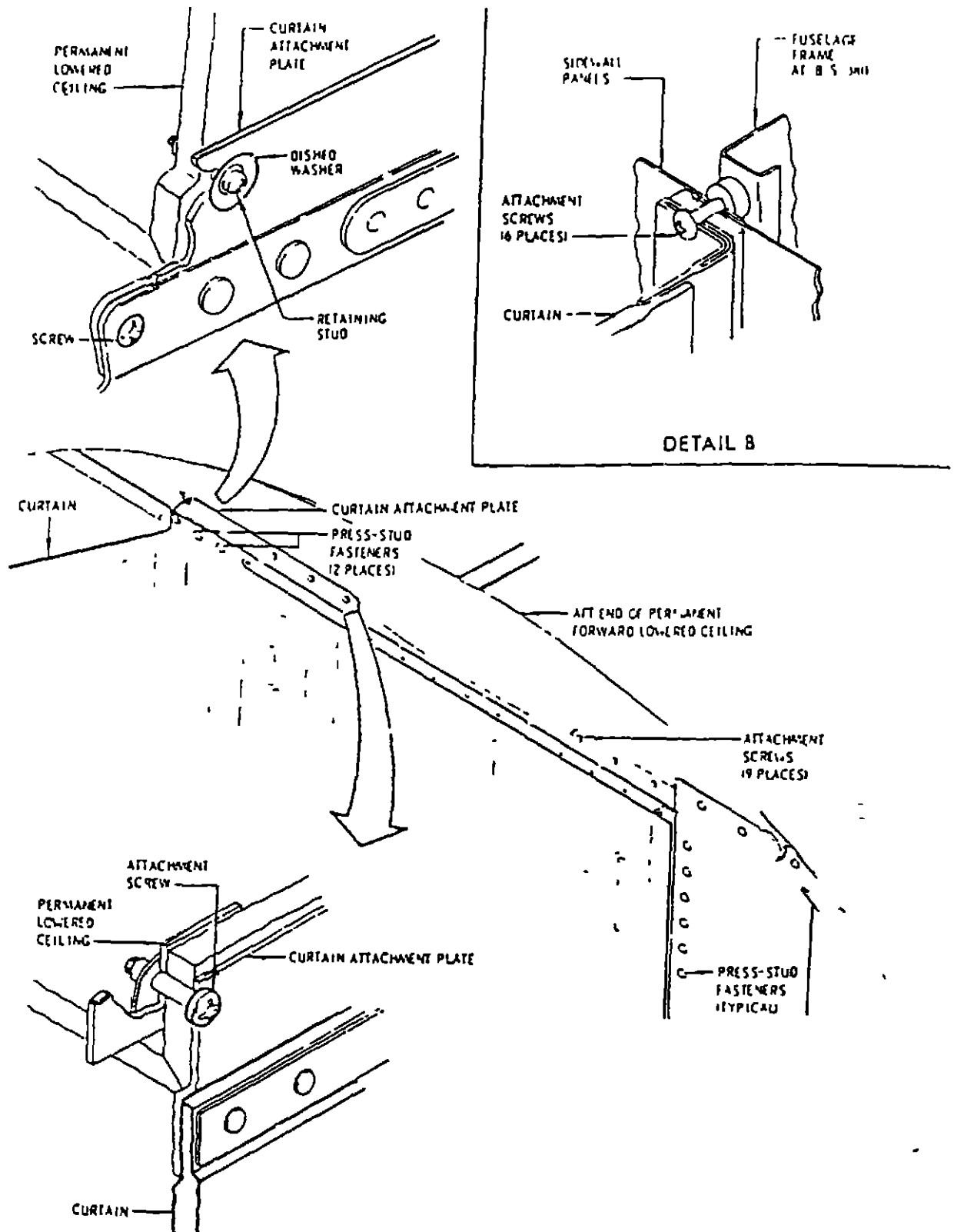
CAUTION

THE GASKET AROUND THE HOLE IN THE FLOOR, FROM WHICH THE FLOOR PANEL HAS BEEN REMOVED, MUST REMAIN IN POSITION TO SEAL THE UNDERSIDE OF THE CURTAIN ATTACHMENT FRAME. ABSENCE OF THIS GASKET COULD ALLOW WATER TO ENTER THE ELECTRONIC EQUIPMENT COMPARTMENT WHEN THE CABIN FLOOR IS WASHED

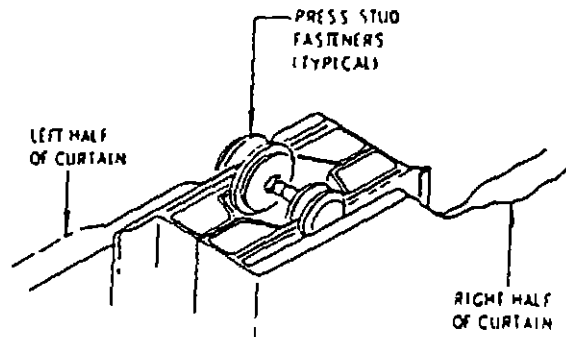
- C Install six screws attaching right half of curtain to sidewall and three screws attaching curtain to aft end of forward lowered ceiling



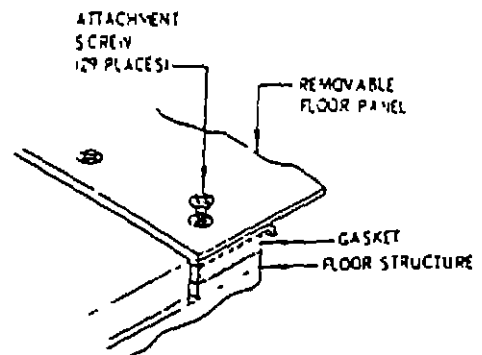
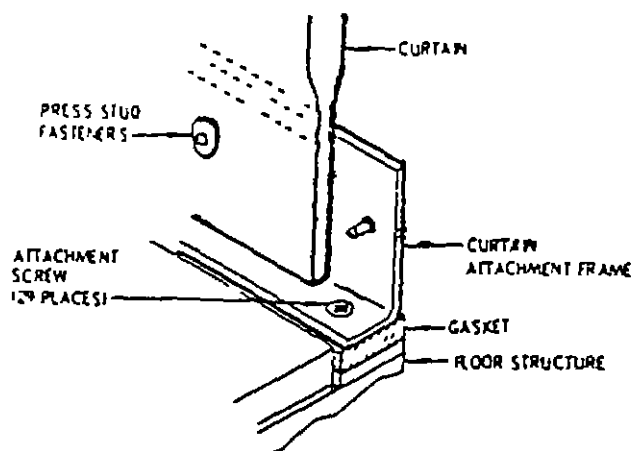
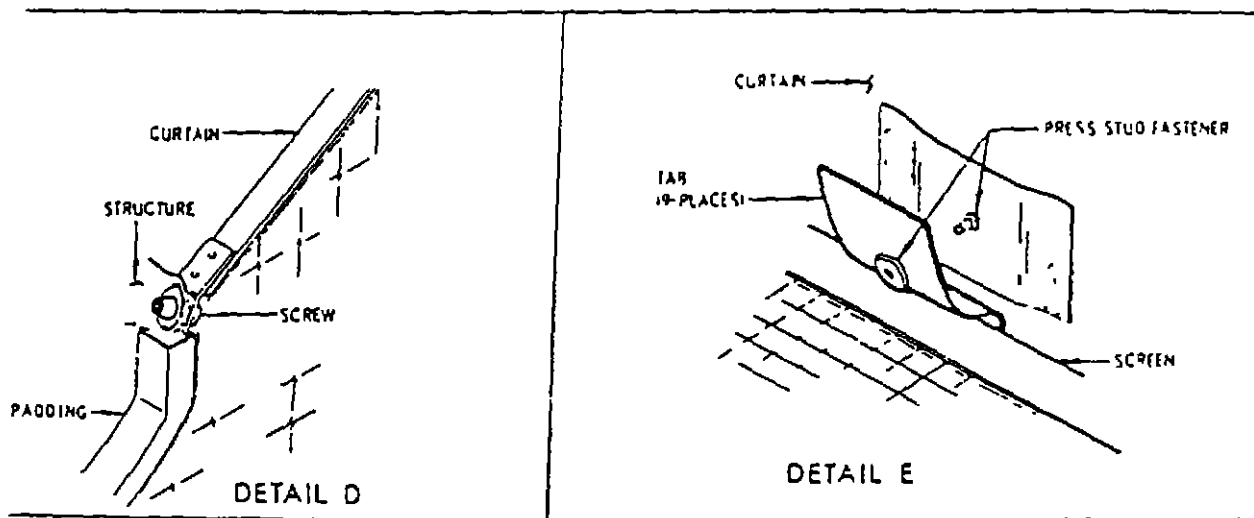
Fume-Tight Curtain Installation
Figure 401 (Sheet 1)



Fume-Tight Curtain Installation
Figure 401 (Sheet 2)



DETAIL C



DETAIL F

Fume-Tight Curtain Installation
 Figure 401 (Sheet 3)



MAINTENANCE MANUAL

- D Engage press stud fasteners attaching pocket of right half of curtain to frame around hole in floor
- E Attach screen to aft edge of frame around hole in floor, using three machine scrws
- F Connect other three sides of screen to aft side of curtain pocket, attaching nine flexible tabs on edges of screen to mating press studs on curtain
- G Raise upper edge of left half of curtain to ceiling and engage slot at left end of curtain attachment plate with retaining stud on aft end of ceiling
- H Attach curtain to ceiling by installing six screws along aft face of ceiling
- I Disconnect line of press studs which attach outboard portion of left half of curtain to its main area
- J Install screw attaching left side of curtain above cove, and three screws attaching it to left sidewall
- K Engage press studs connecting both portions of left half of curtain to each other, and those connecting the left and right halves of the whole curtain to each other

NOTE One of the connections between the left and right halves of the curtain consists of a threaded stud to which a washer and nut should be installed





MAINTENANCE MANUAL

FUME-TIGHT CURTAIN - APPROVED REPAIRS

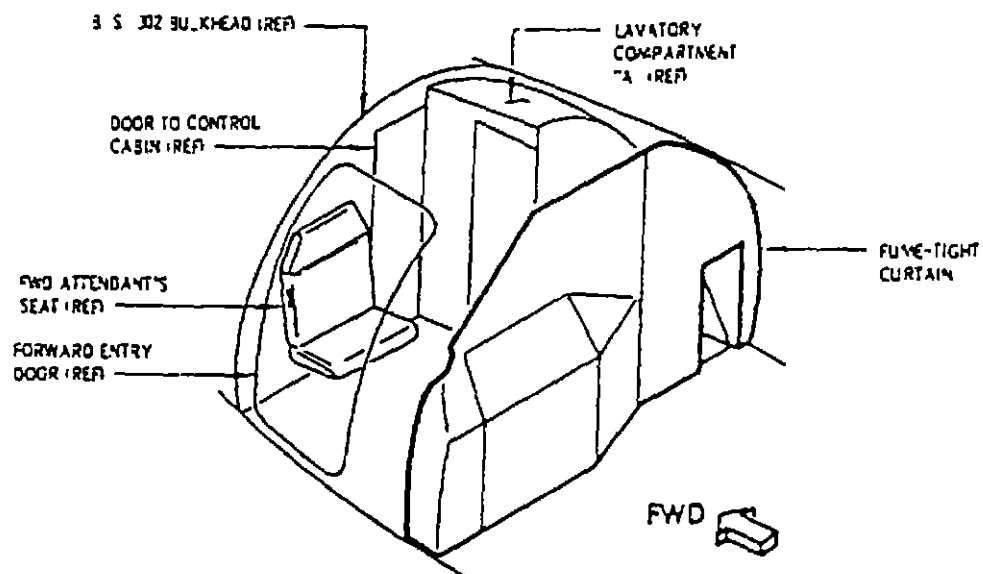
1 Equipment and Materials

- A. Adhesive, Epocast 571, Furane Plastics Co , Los Angeles, California
- B Hardener 973, Furane Plastics Co., Los Angeles, California
- C. Adhesive (BMS 5-30), EC 1458, Minnesota Mining and Manufacturing Co , St. Paul, Minnesota
- D. Adhesive, Bostik 9040, B.B Chemical Co , 784 Memorial Drive, Cambridge 39, Massachusetts
- E Solvent, Methyl Ethyl Ketone
- F Clean muslin and brushes, etc
- G. Sewing thread, nylon (V-T-295), Type I, Class I, Size E, Color grey, American Thread Co., 322 Main Street, Willimantic, Connecticut
- H Sewing thread, teflon coated glass fiber, El8 Natural, Warren Wire Co., Pownal 5, Vermont
- I. "Duracote" vinyl coated fiberglass fabric, Style No. T2525, Color No. 979, Duracote Corporation, Ravenna, Ohio
- J. Upholsterer's needle and suitable sewing machine
- K Sealant, Tereco 165, Technical Research Co., 13535 Monster Road, Seattle, Washington
- L "Shelter-Lite" coated nylon, #3, 14 oz per sq yard, Color grey, Domestic Film Products Corporation, Millersburg, Ohio, or equivalent

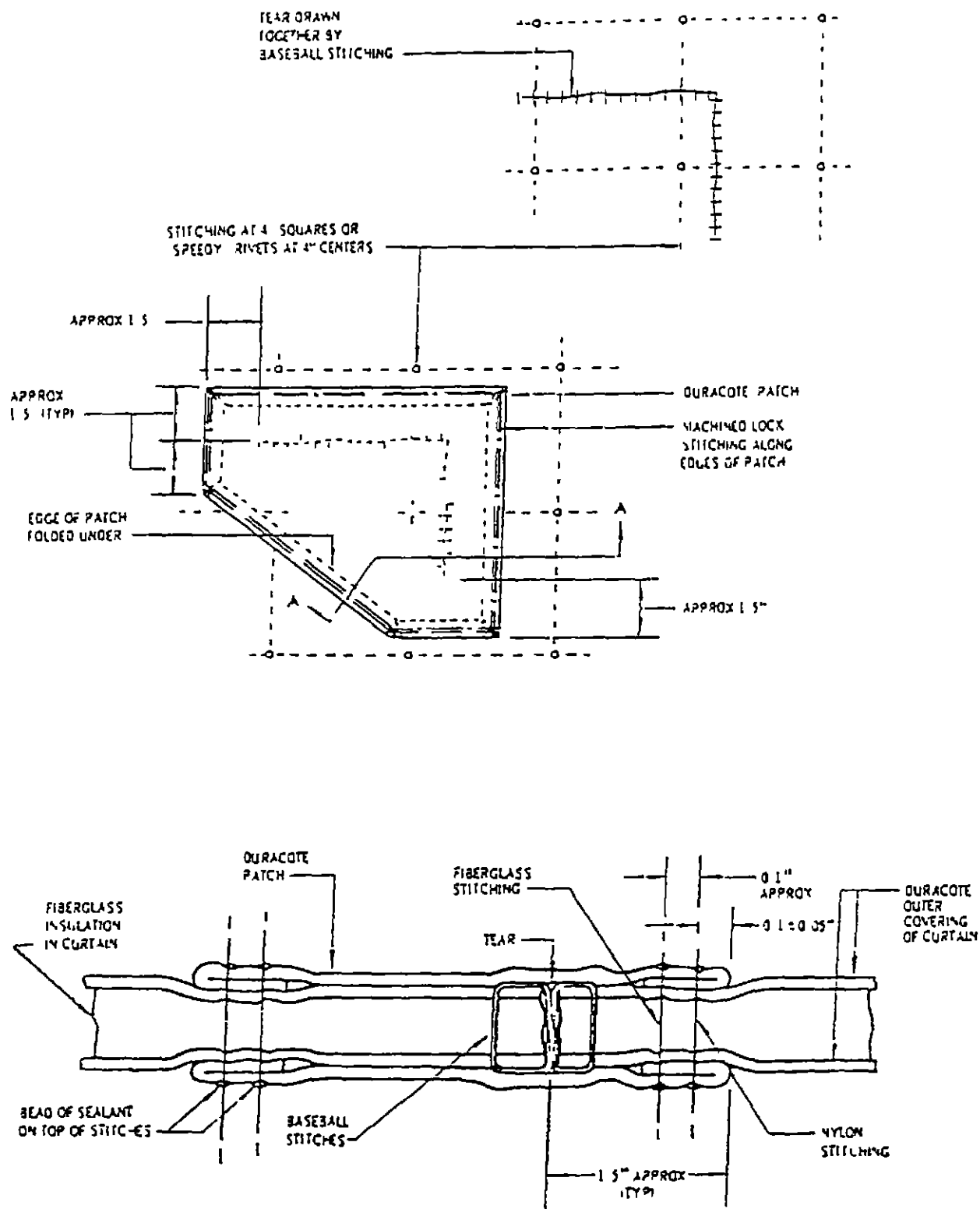
MAINTENANCE MANUAL

2 Repair Tear in Curtain

- A Join torn edges together using nylon thread and upholsterer's needle and applying a "baseball" stitch
- B Cut patch from duracote fabric allowing approximately 1.5 inches beyond any part of the tear, plus approximately 0.5 inch all around to allow for that much to be folded under the edge (See figure 801)
- C Clean faying surfaces of curtain and patch with clean cloth dampened in methyl ethyl ketone
- D Prepare S&S 5-30 adhesive Thoroughly stir EC 1458 adhesive, thin with an equal volume of methyl ethyl ketone and thoroughly blend the mixture
- E Brush on one coat of prepared adhesive to faying surfaces of curtain and patch, and to an approximately half-inch wide band around the edge of the outside surface of the patch, to provide an adhesive surface when the edge is folded under
- F When adhesive is tacky, fold edges of patch over and apply patch to curtain Wipe excess adhesive away with clean cloth dampened in methyl ethyl ketone.
- G Apply nylon and fiberglass threads along edges of patch in parallel machined rows of lock stitch, through whole thickness of curtain.
- H Apply bead of sealant (Tereco 165) along each row of stitches on both sides of curtain.



Repair of Tear in Curtain
Figure 801 (Sheet 1)



SECTION A-A

Repair of Tear in Curtain
Figure 801 (Sheet 2)

3. Repair Damage to Curtain Edge

NOTE. This covers a circumstance in which the curtain has become detached from any of the sections of metal around its edge. Such damage might take several different forms and for the sake of simplicity the following repair procedure assumes that a typical edge portion of the curtain is to be completely reassembled.

- A. Cut piece of duracote fabric wide enough to wrap around metal angle and to overlap curtain as shown in figure 802 (Length of this material depends on total length of repair being made)
- B. Clean faying surfaces of metal and duracote material. (Any old pieces of duracote or sponge padding may be cleaned from the metal with methyl ethyl ketone.) Metal should be sanded smooth and then its surface, and the faying surface of the duracote fabric, should be wiped clean using a clean cloth soaked in methyl ethyl ketone.

- C. Prime faying surface of duracote fabric.

- (1) Thoroughly mix 10 parts (by weight) of Epocast 571 primer with one part of Hardener 973.

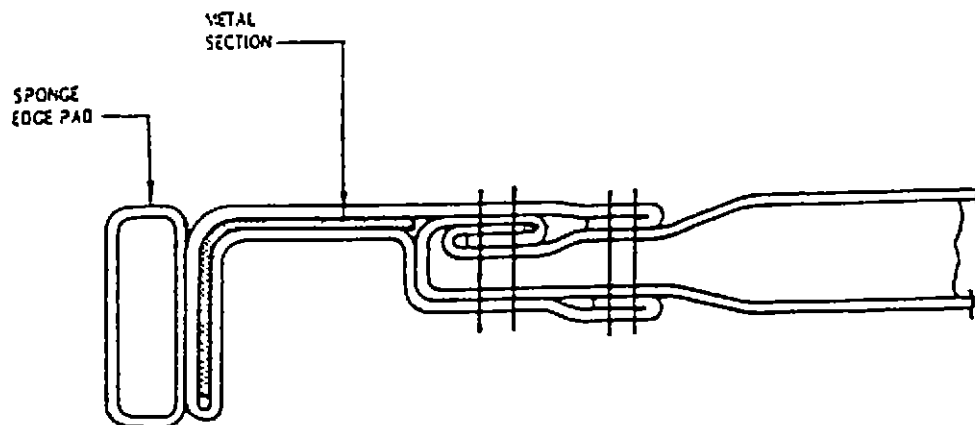
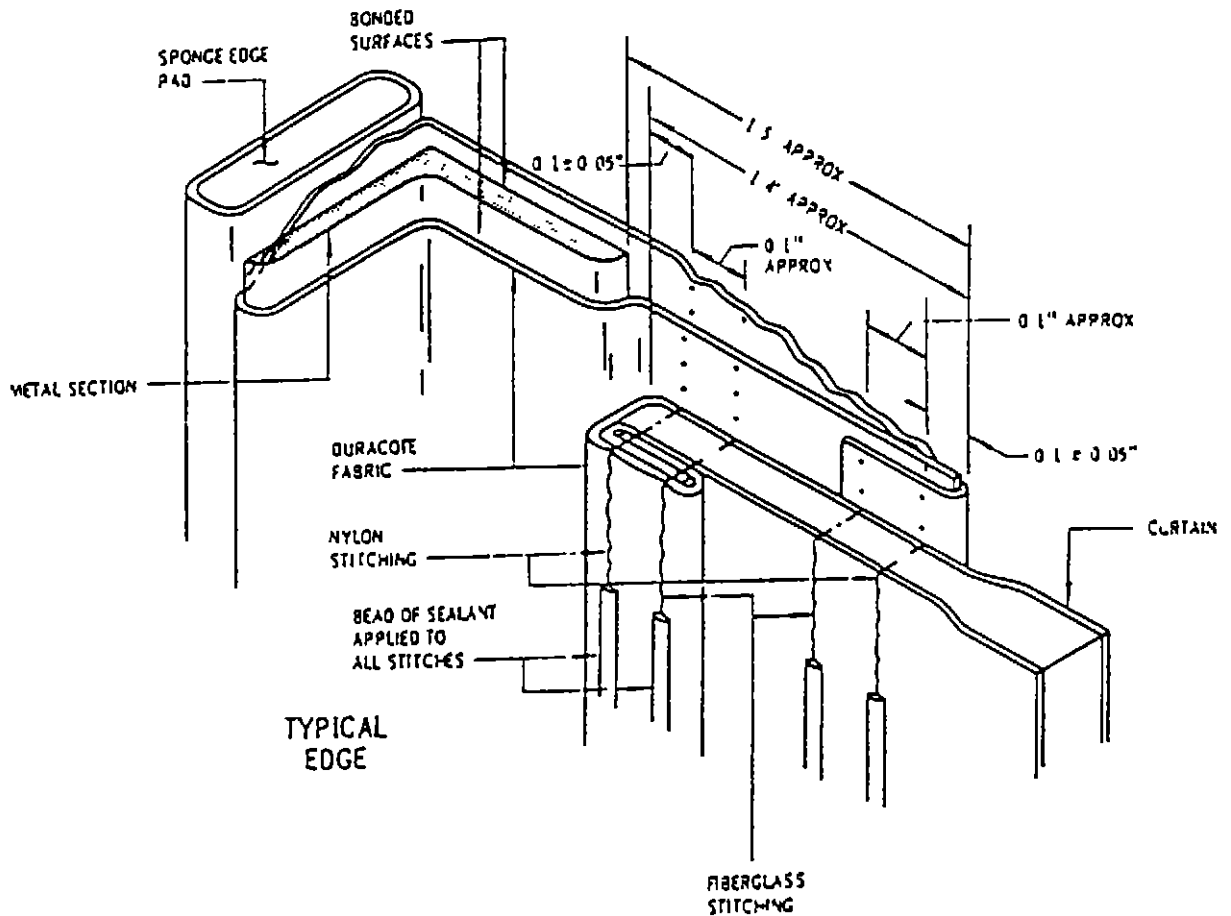
NOTE: This mixture has a pot life of three or four hours at 70°F.

- (2) Apply one brush coat of mixed primer to faying surface of duracote fabric.

NOTE. This should be allowed to dry "tack-free" before further work is done. Drying may take from 30 minutes to 2 hours at room temperature, but this time may be reduced by applying heat (120°F reduces drying time to 20 minutes, 160°F reduces it to five or eight minutes.)

- D. Prepare adhesive. Thoroughly stir EC 1458 adhesive (BMS 5-30), or Bostik 9040 adhesive, and thin with an equal volume of methyl ethyl ketone. Thoroughly blend the mixture.
- E. Brush one coat of mixed adhesive onto surface of metal and primed faying surface of fabric. Allow to dry until tacky.
- F. Apply fabric to metal, taking care to position fabric correctly and avoiding dry air entrapment.

NOTE: The edges of the fabric should be so positioned that one edge will fold over the other, as shown in figure 802.



SECTION THROUGH SIMILAR
PORTION AT COVE ON LEFT
SIDE OF CABIN

Repair of Damaged Edge Section
Figure 802



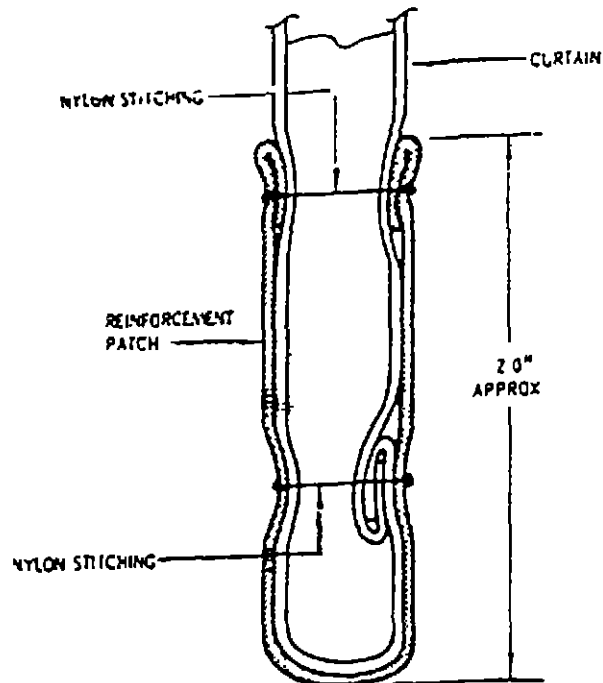
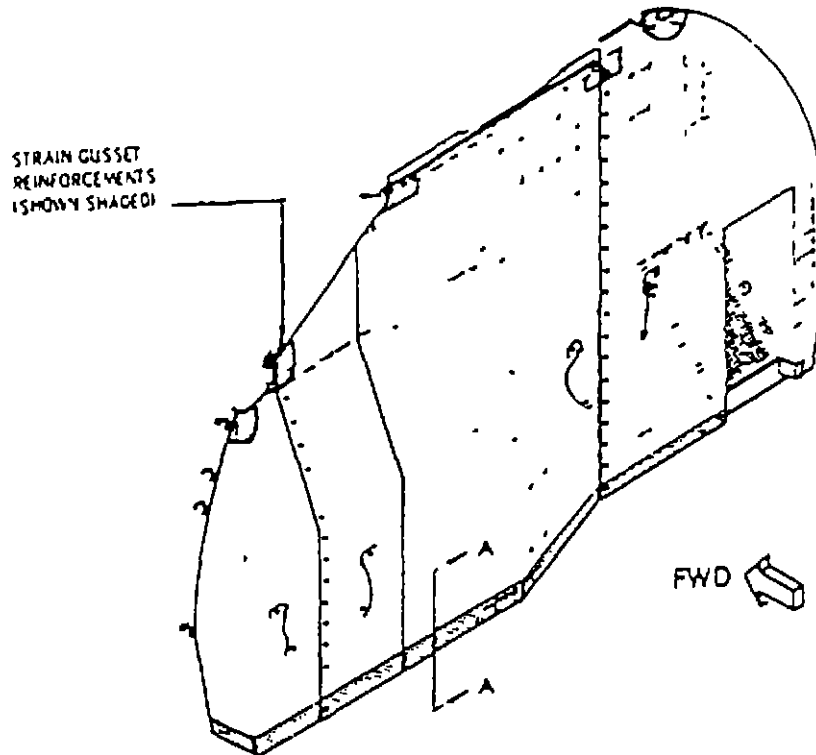
MAINTENANCE MANUAL

- G Apply clamps or some means of exerting pressure to portions of fabric adhered to metal and allow adhesive to dry for about two hours at room temperature (Drying time can be reduced to 30 minutes or 1 hour by applying temperature of 120°F. In this case, allow temperature to cool to room temperature before removing clamps.)
- H. Apply mixed adhesive as necessary to fold protruding edge of fabric.
- I Stitch bonded assembly of angle wrapped in duracote fabric to edge of curtain.
 - (1) Apply mixed adhesive as necessary to fold over edges of duracote fabric of curtain.
 - (2) Wipe faying surfaces of both portions of duracote fabric with a clean cloth dampened in methyl ethyl ketone.
 - (3) Brush one coat of mixed adhesive to both faying surfaces and allow to dry until tacky
 - (4) Join surfaces together and apply pressure until adhesive is dry (About two hours at room temperature or 30 minutes to one hour at 120°F.) Wipe away excess adhesive with clean cloth dampened in methyl ethyl ketone.
 - (5) Apply nylon and fiberglass threads in two pairs of parallel machined rows of lock stitch, as shown in figure 802.
 - (6) Apply bead of sealant (Tereco 165) along each row of stitches on both sides of curtain
 - (7) Attach sponge edge pad with adhesive.

4. Repair Torn Edge

NOTE. This cover a circumstance in which the edge of the curtain has torn along its lower edge or at one of the corners between lengths of metal reinforcement sections. On all 707-320C airplanes except PAA N765PA through N767PA, WAI N373WA through N375WA, and TWA n789TW and N790TW, these areas of the curtain have been reinforced by the addition of a strain gusset. (See figure 803.)

- A. Repair tear as described in paragraph 2.
- B. Cut patch of "shelter-lite" (or equivalent) coated nylon of suitable shape and size. Allow for edges to be folded over and, at applicable locations, for patch to enclose metal reinforcement sections at edge of curtain.



SECTION A-A

Repair of Torn Edge
Figure 803

C. Bond "shelter-lite" patch to "duracote" fabric of curtain, including (where applicable) duracote fabric bonded around metal reinforcement sections

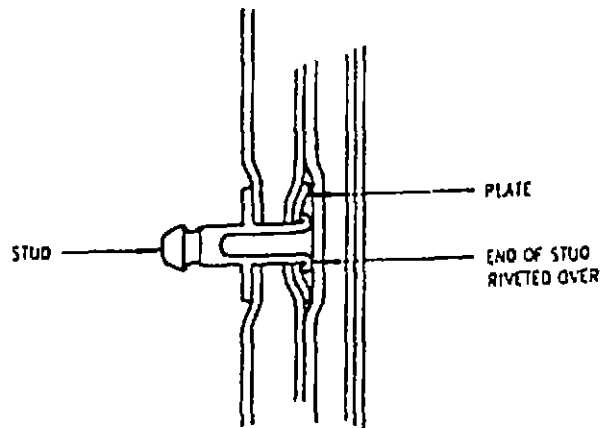
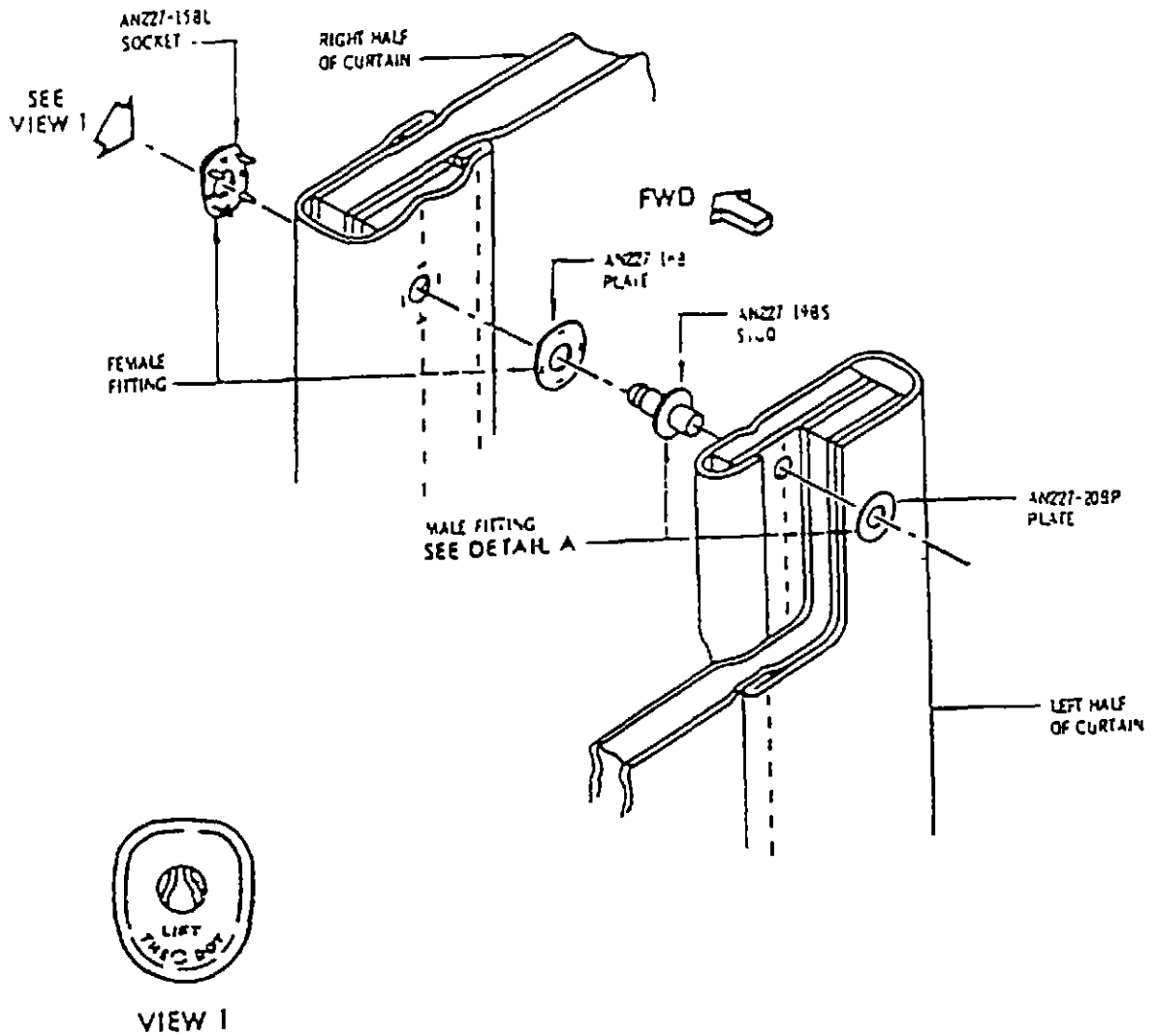
- (1) Clean faying surfaces with clean cloth soaked in methyl ethyl ketone.
- (2) Prepare EMS 5-30 adhesive Thoroughly stir EC 1458 adhesive and this with an equal volume of methyl ethyl ketone. Thoroughly blend the mixture
- (3) Brush one coat of mixed EMS 5-30 adhesive on each faying surface, including an approximately half-inch wide band around edges of opposite side of shelter-lite patch to provide adhesive surface when these edges are folded under. Allow adhesive to dry until tacky.
- (4) When adhesive is tacky, fold over edges of shelter-lite patch and apply patch to curtain, taking care to make a good joint with all faying surfaces and avoiding any air entrapment.
- (5) Apply pressure to patch until adhesive is dry. (About two hours at room temperature or 30 minutes to one hour at 120°F.) Wipe away excess adhesive with clean cloth dampened in methyl ethyl ketone.
- (6) Apply nylon thread around edges of shelter-lite patch in two parallel machined rows of lock stitch.
- (7) Apply bead of sealant (Tereco 165) along each row of stitches on both sides of curtain.

5. Repair Damaged Snap-Fasteners

- A. Remove damaged fastener(s) and install replacements as indicated by attachment details in figure 804.

NOTE: Care should be taken when riveting over the end of the male fitting (AN227-19BS) that the whole rim is adequately and uniformly rolled over. It is recommended that the proper tools are obtained from the manufacturer of the fasteners.

The female fitting (AN227-15BL) should be installed so that the curtain joint must be opened progressively from the lowest fastener upwards. (The words "LIFT--etc" on each fitting should read the right way up.)



DETAIL A

Snap-Fastener Installation
Figure 804

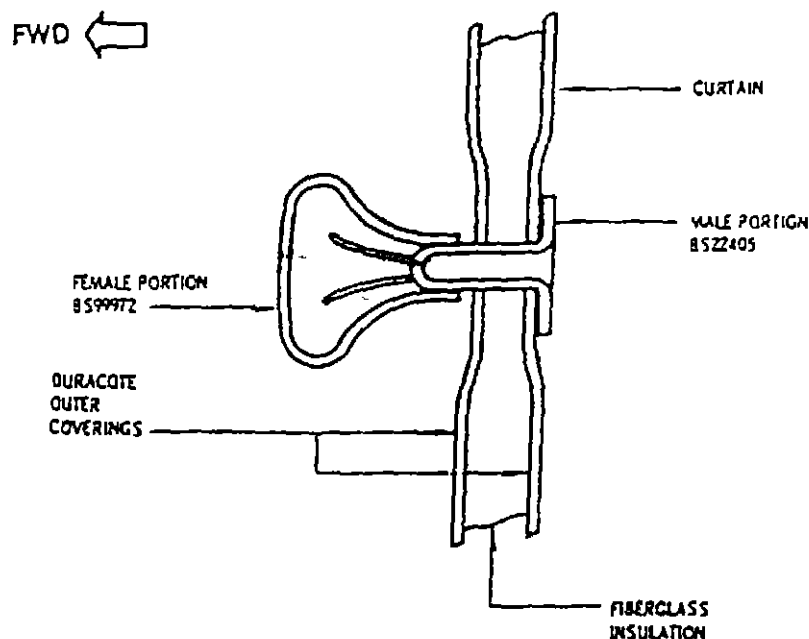
6 Repair Separated Outer Coverings of Curtain

A General

- (1) On PAA airplanes N765PA through N767PA, VAI airplanes N373WA through N375WA and TWA airplanes N789TW and N790TW, the duracote (vinyl coated fiberglass) fabric which forms the outer covering on the forward and aft faces of the curtain is stitched together in four-inch squares over the whole area of the curtain
- (2) On all other airplanes these stitches are substituted by "speedy" rivets at four inch centers throughout the curtain
- (3) On all airplanes separation caused by failed stitching or pulled rivets should be repaired by installing new rivets (If a rivet has been torn out, the damaged curtain fabric should be properly patched before the new rivet is installed)

B. Install New "Speedy" Rivet

- (1) Insert male portion (BS22405) through aft side of curtain. (See figure 805)
- (2) Engage female portion (BS99972) from forward side and hammer both parts together



Repair of Separated Outer Coverings

Figure 805

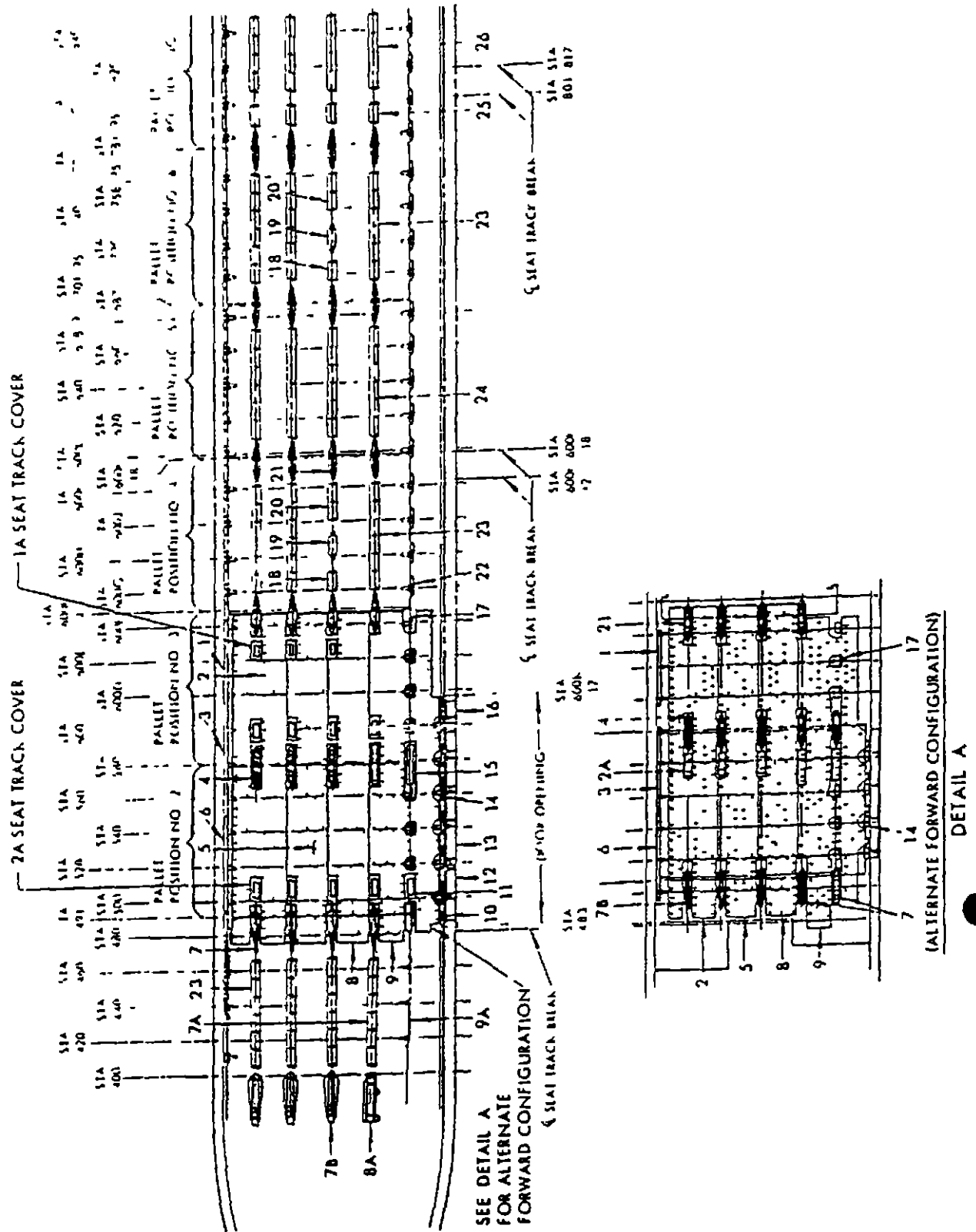


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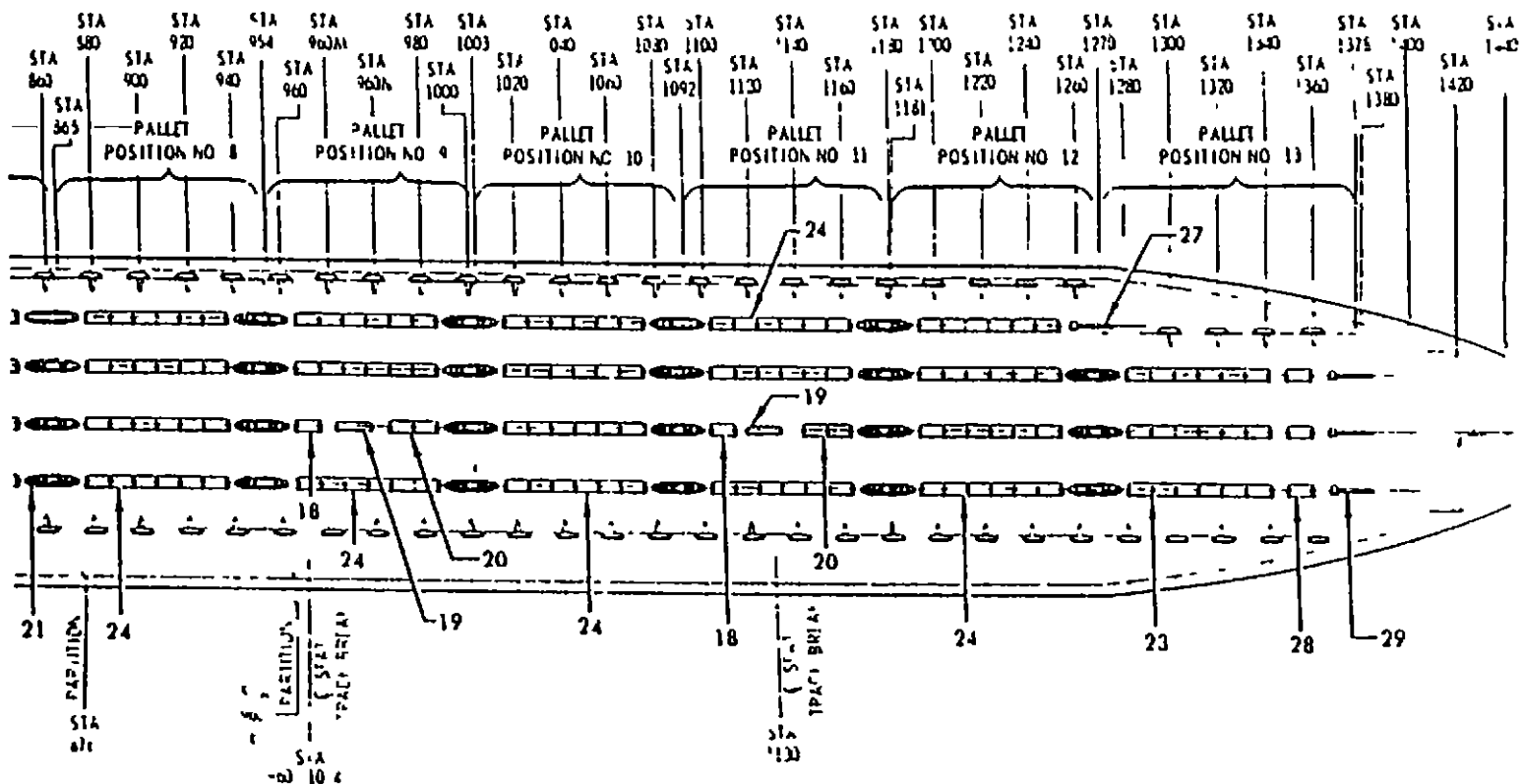
CARGO CARRYING SYSTEM - DESCRIPTION AND OPERATION

1. General

- A. The cargo carrying system is the system on which palletized cargo is supported in, and moved along, the cabin. It is quite independent of the cargo elevator which is covered in 25-36-200.
- B. The cargo carrying system is a kit of equipment which attaches to the cabin floor tracks and supports cargo pallets. It is referred to as a "9G 108 inch" system to indicate that each pallet is individually restrained by a lock designed to withstand a forward acceleration of 9G, and that the pallets are 108 inches wide. The complete system accommodates 13 pallets (88 inches long x 108 inches wide) in positions numbered 1 through 13 from forward to aft. (See figure 1.) For combined cargo/passenger configurations, the system can be varied to accommodate any number of pallets between 3 and 10 by terminating its aft end at the appropriate pallet position.
- C. The equipment consists primarily of a series of roller trays which are attached to the cabin floor tracks, and on which loaded cargo pallets may be moved forward and aft from the main cargo door. A series of side restraints along the left and right sides of the system prevent the pallets from moving laterally and striking the cabin sidewalls. Opposite the main cargo door the roller trays are replaced by a series of transfer panels, or ball mats, on which the pallets may be moved both laterally into the cabin and longitudinally towards the forward or aft roller trays. Retractable pallet locks are installed between each pallet position, and stops are installed at the forward and aft ends of the system. Pallet brakes are installed at four places in the system to retard any pallet which may be moving too fast along the rollers.
- D. All the equipment is provided with manually operated fasteners which attach it to the cabin floor tracks, and no tools are required to install, operate or remove any component. All the equipment is clearly marked by part number and corresponding markings are provided on the floor to ensure proper location of each item. The floor tracks are at BL62.5 (left and right), BL45.5 (left and right), BL24.75 (left and right) and at BLO. For convenience these tracks are referred to in this description by the numbers 1 through 7, from left to right across the whole floor.
- E. All equipment used to secure the cargo to the pallets, is described in the Weight and Balance Control and Loading Manual.

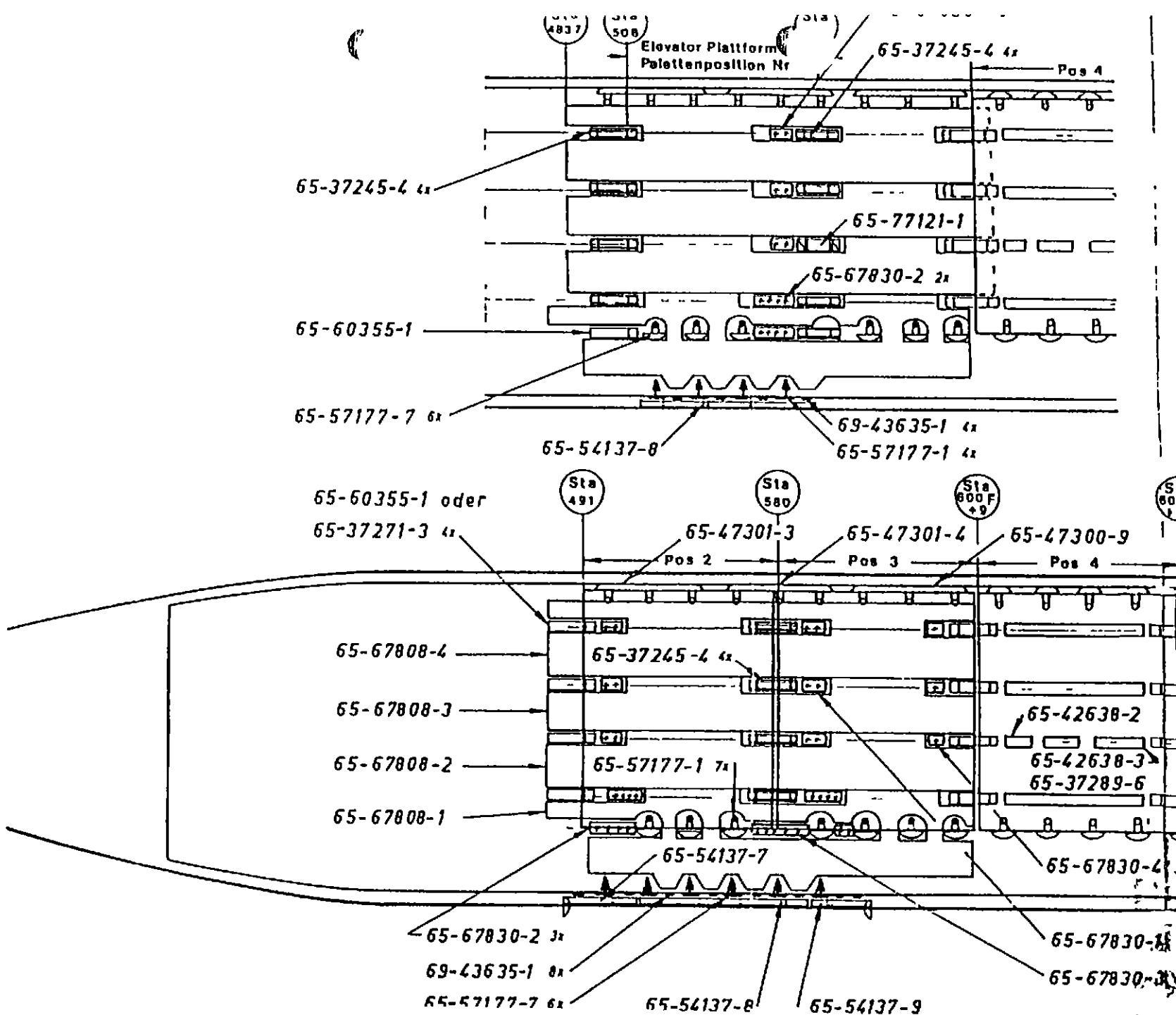


Cargo Carrying System
Figure 1 (Sheet 1)



- 1 GUIDE RAIL ASSEMBLY
- 1A SEAT TRACK COVER
- 2 TRANSFER PANEL ASSEMBLY
- 2A SEAT TRACK COVER
- 3 GUIDE RAIL ASSEMBLY
- 4 PALLET LOCK ASSEMBLY
- 5 TRANSFER PANEL ASSEMBLY
- 6 GUIDE RAIL ASSEMBLY
- 7 DOUBLE PALLET LOCK ASSEMBLY
- 7A ROLLER TRAY
- 7B PALLET LOCK
- 8 TRANSFER PANEL ASSEMBLY
- 8A FORWARD LOCK
- 9 TRANSFER PANEL ASSEMBLY
- 9A GUIDE RAIL ASSEMBLY
- 10 ATTACH FITTING ASSEMBLY
- 11 SEAT TRACK COVER

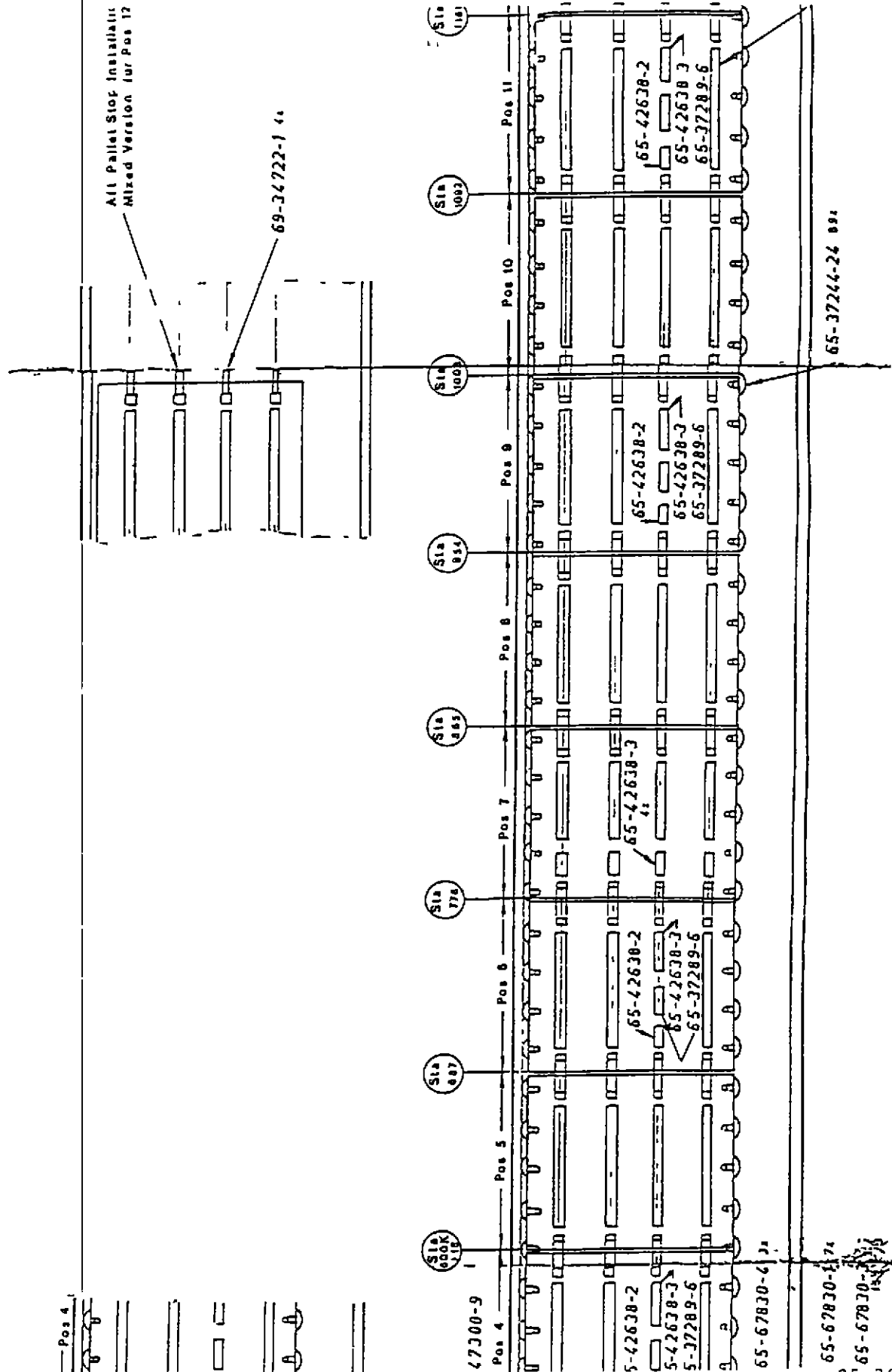
- 12 THRESHOLD ASSEMBLY
- 13 THRESHOLD ASSEMBLY
- 14 RETRACTABLE SIDE RESTRAINT ASSEMBLY
- 15 SEAT TRACK COVER
- 16 THRESHOLD ASSEMBLY
- 17 RETRACTABLE SIDE RESTRAINT ASSEMBLY
- 18 ROLLER TRAY ASSEMBLY
- 19 PALLET BRAKE ASSEMBLY
- 20 ROLLER TRAY ASSEMBLY
- 21 PALLET LOCK ASSEMBLY
- 22 SIDE GUIDE RESTRAINT ASSEMBLY
- 23 ROLLER TRAY ASSEMBLY
- 24 ROLLER TRAY ASSEMBLY
- 25 ROLLER TRAY ASSEMBLY
- 26 ROLLER TRAY ASSEMBLY
- 27 AFT STOP ASSEMBLY
- 28 ROLLER TRAY ASSEMBLY
- 29 AFT STOP ASSEMBLY

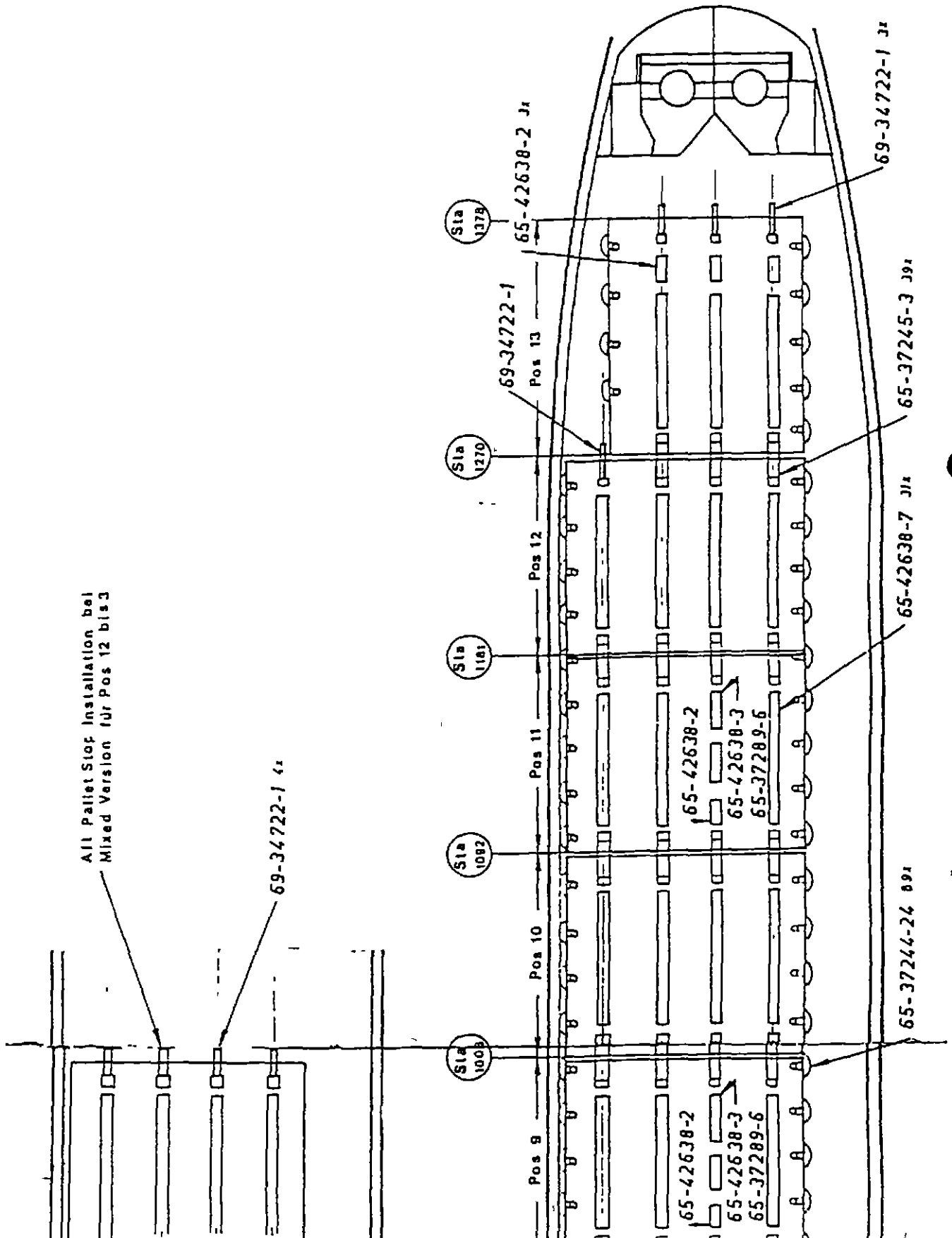


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Cargo Carrying System
Figure 1 (Sheet 3)

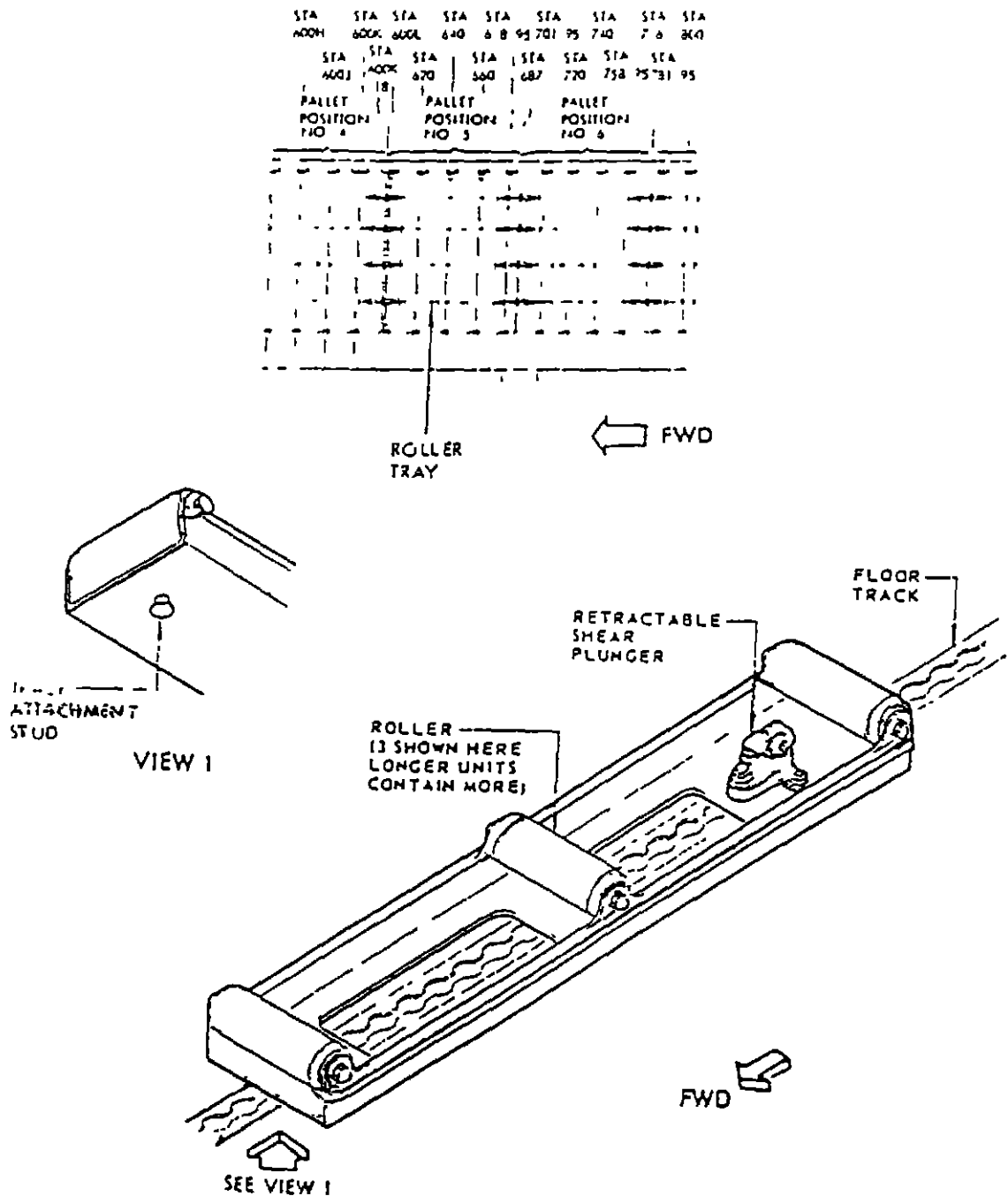
MAINTENANCE MANUAL





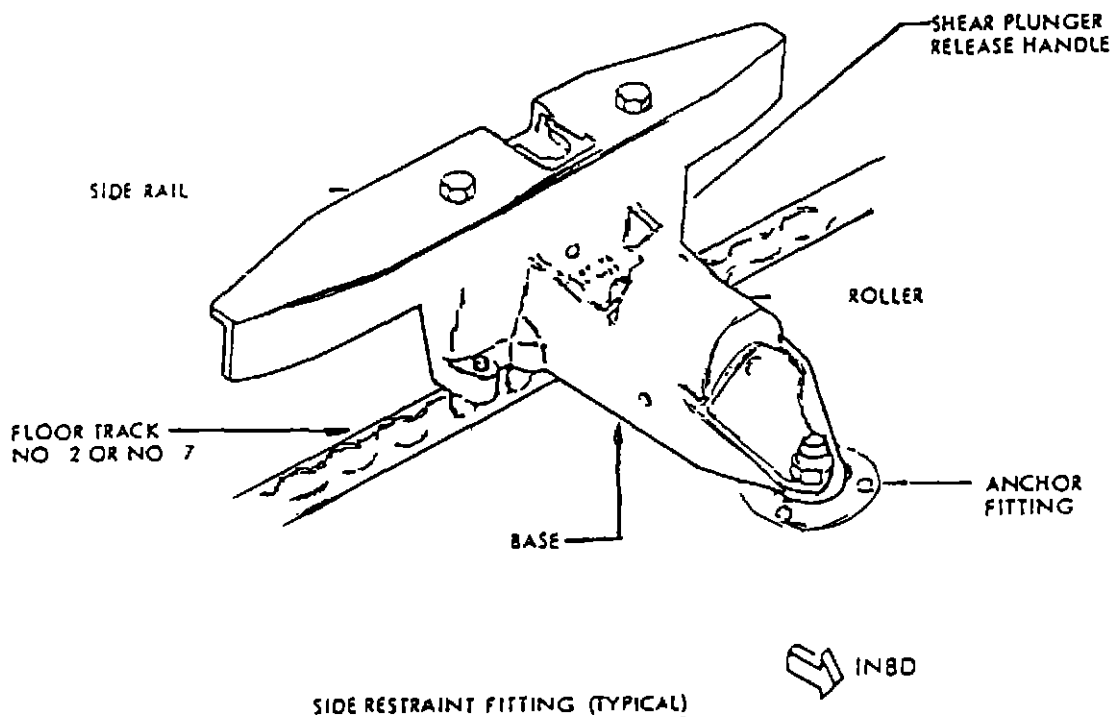
2 Roller Trays

- A The roller trays consist of groups of rollers mounted in channel section, which are attached to the floor tracks (See figure 2) All the roller trays are similar in detail and method of attachment, but their lengths vary according to the number of rollers included on each tray The roller trays are installed to floor tracks Nos 3, 4, 5 and 6 throughout the cabin, except opposite the main cargo door

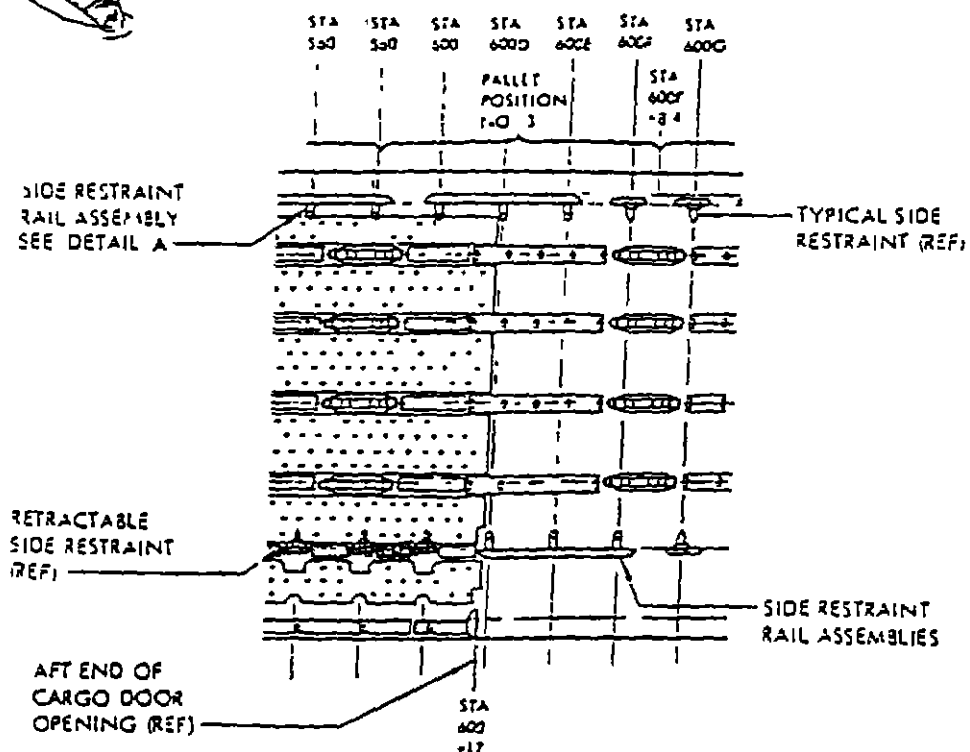
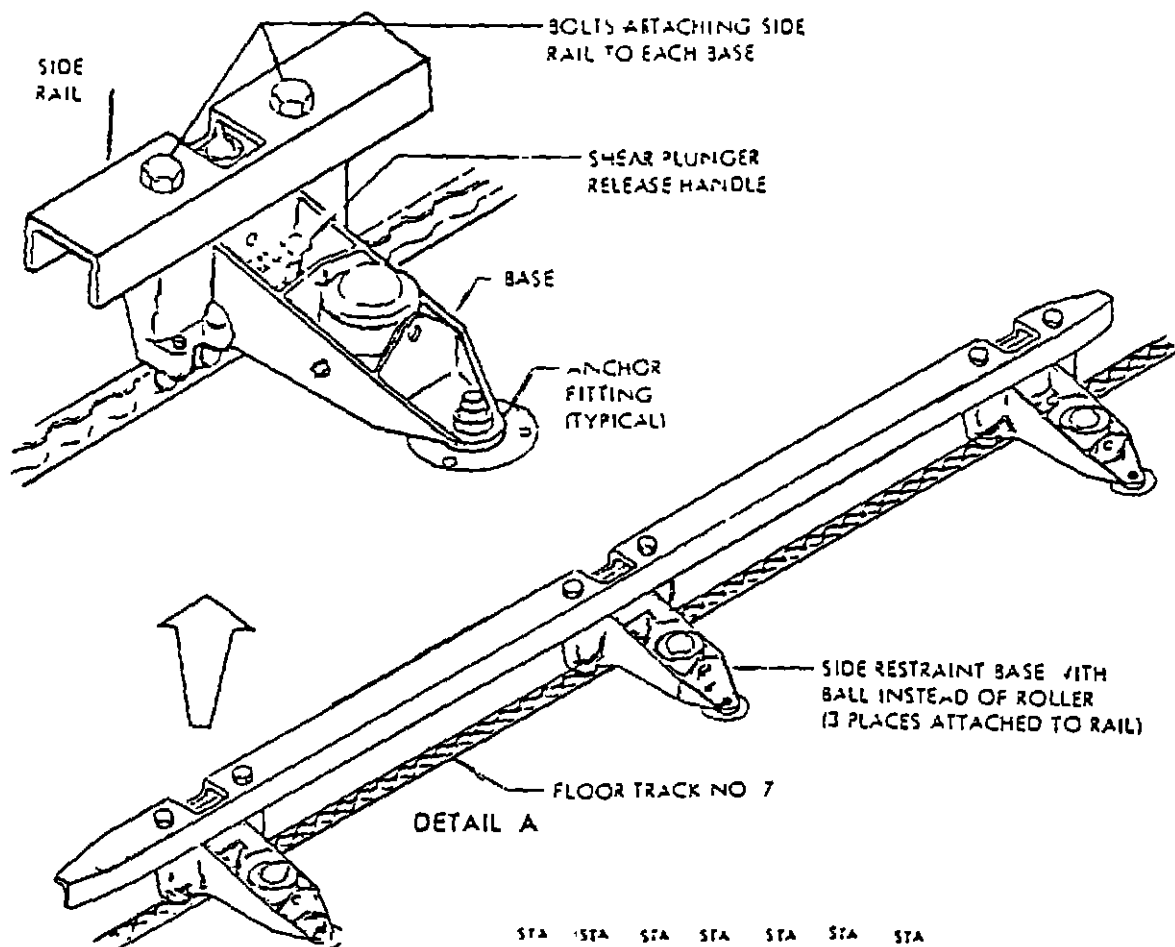


3 Side Restraint

- A Individual side restraint fittings are installed along both sides of the cabin to floor tracks Nos 2 and 7 (except in the ball mat area) and are also secured by single studs engaging the keyhole-slotted anchor plates which are spaced at 20-inch intervals along the cabin floor inboard of the floor tracks. Each side restraint fitting incorporates a roller and a side rail (see figure 3). The complete cargo system includes 90 of these side restraints.
- B In the forward three pallet positions the side restraints are grouped into a series of side restraint rail assemblies. Each of these assemblies consists of three individual side restraint bases connected to one common side rail. The three bases are similar to those of the typical side restraints except that in the case of those immediately opposite the main cargo door they include a ball instead of a roller. (See figure 4)

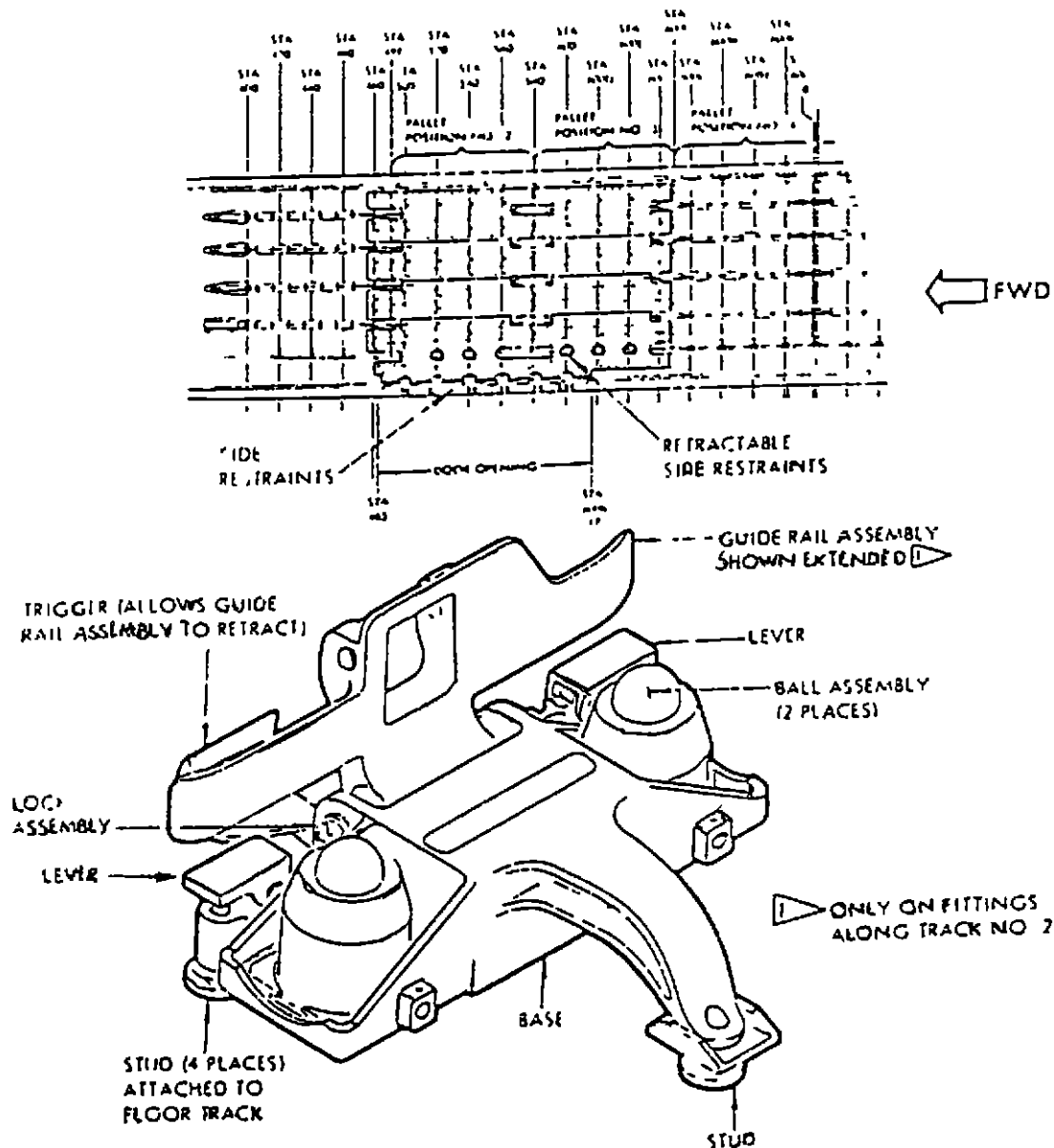


MAINTENANCE MANUAL



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- C Retractable side restraints are installed to floor track N° 2 across the main cargo door opening. These fittings can be lowered to allow cargo pallets to pass over them to or from the transfer panels, and can be raised to serve as standard side restraints for the pallets which stand on the transfer panel area when loading is completed (See figure 5). Across the main cargo door opening along floor track N° 1, a series of side restraint fittings are installed to secure the transfer panels in place. These fittings are similar to the retractable units but have no guide rail assembly.



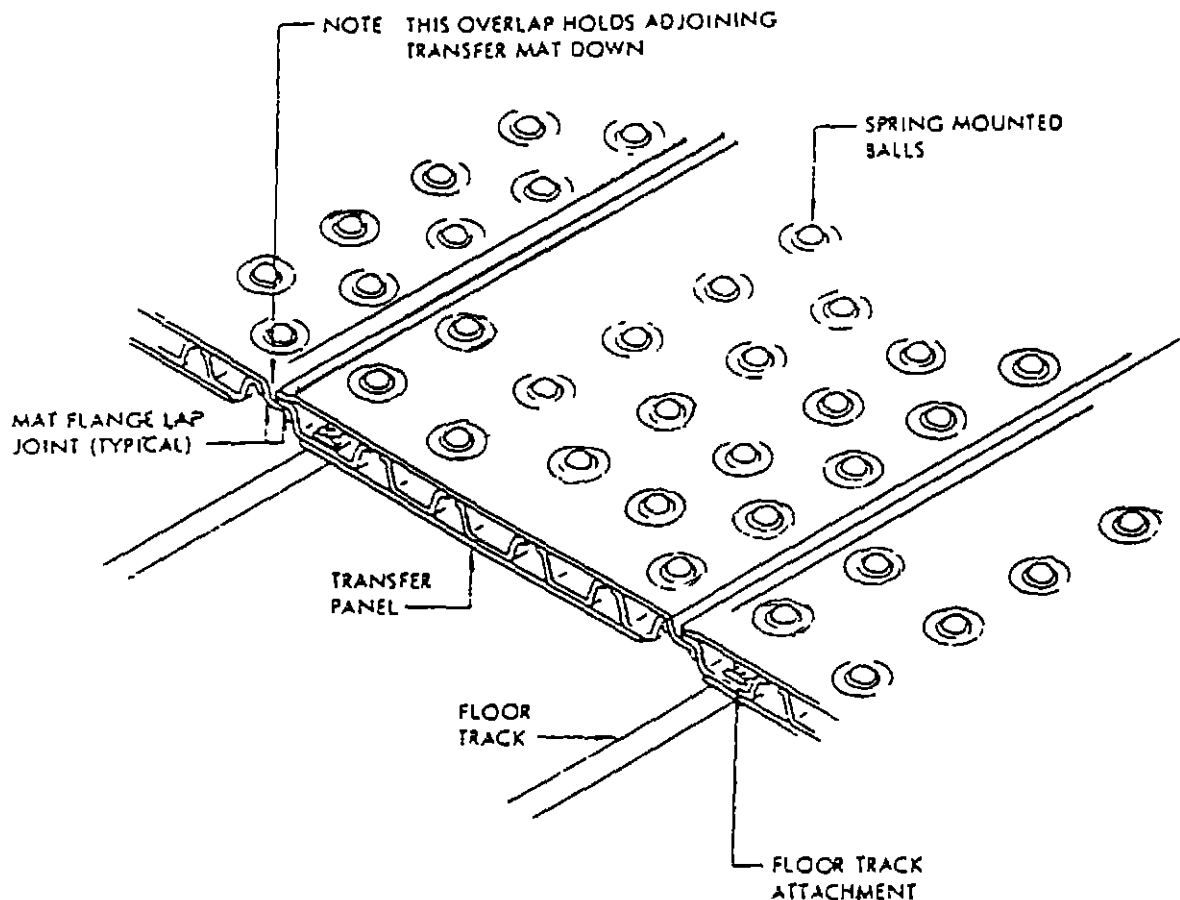
MAINTENANCE MANUAL

4 Transfer Panels, or Ball Mats

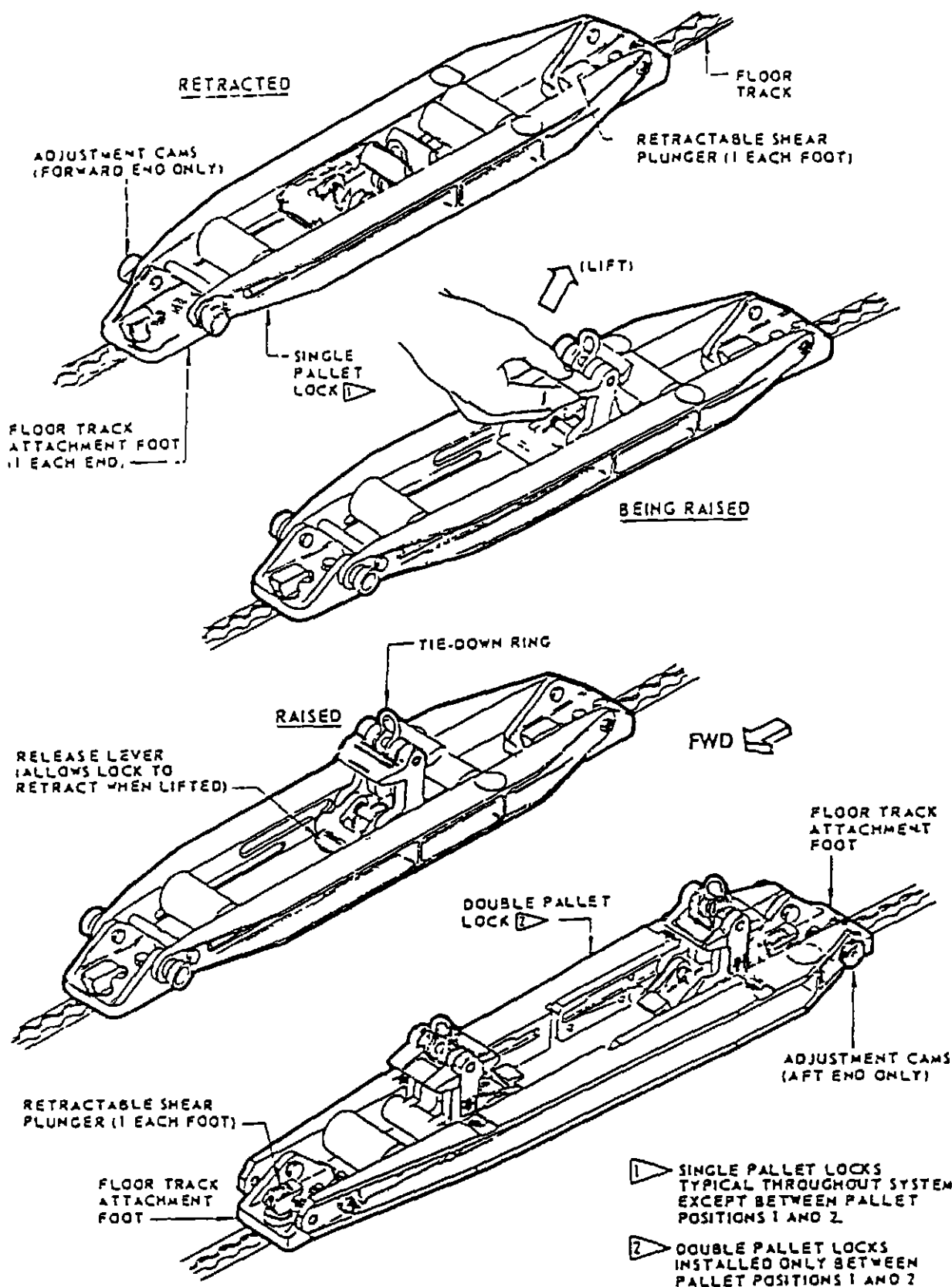
- A The transfer panels, or ball mats, are installed to the floor tracks opposite the main cargo door (See figure 6). Each panel is provided with a series of balls which allow a pallet to be moved in any direction across the surface of the ball mat area. For personnel safety, the balls are spring-mounted so that if a man treads on any individual ball it will depress and allow his foot to contact the panel surface.

5 Pallet Locks

- A Pallet locks are installed between each pallet position throughout the system. Each lock includes a retractable mechanism which may be raised manually to engage the forward and aft edges of the pallets, or retracted to clear the pallets while loading or unloading. The locks are attached directly to the floor tracks (See figure 7).



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Intercontinental
 707
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6 Pallet Brakes

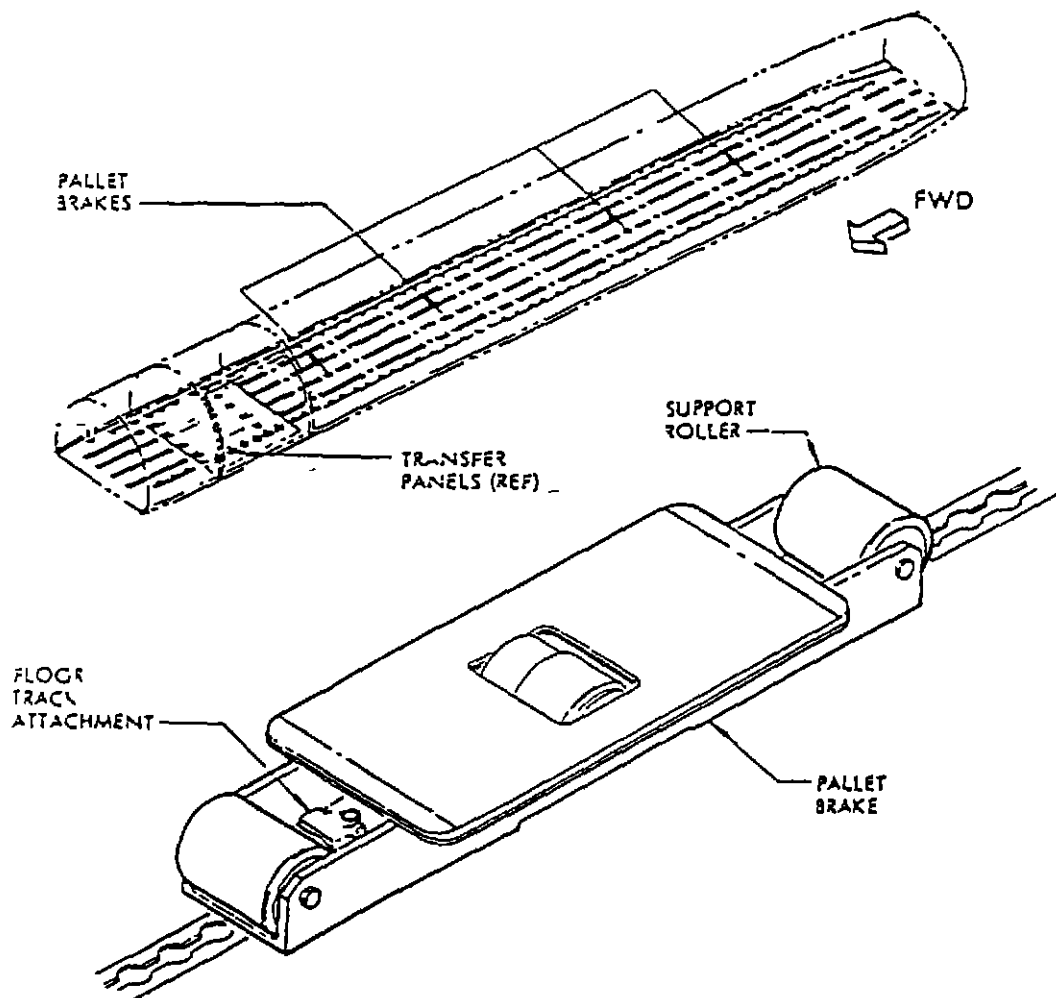
- A Pallet brakes are installed at four places along floor track No. 4 (the center of the floor) to retard any pallet which may be moving too fast along the rollers. (See figure 8.)

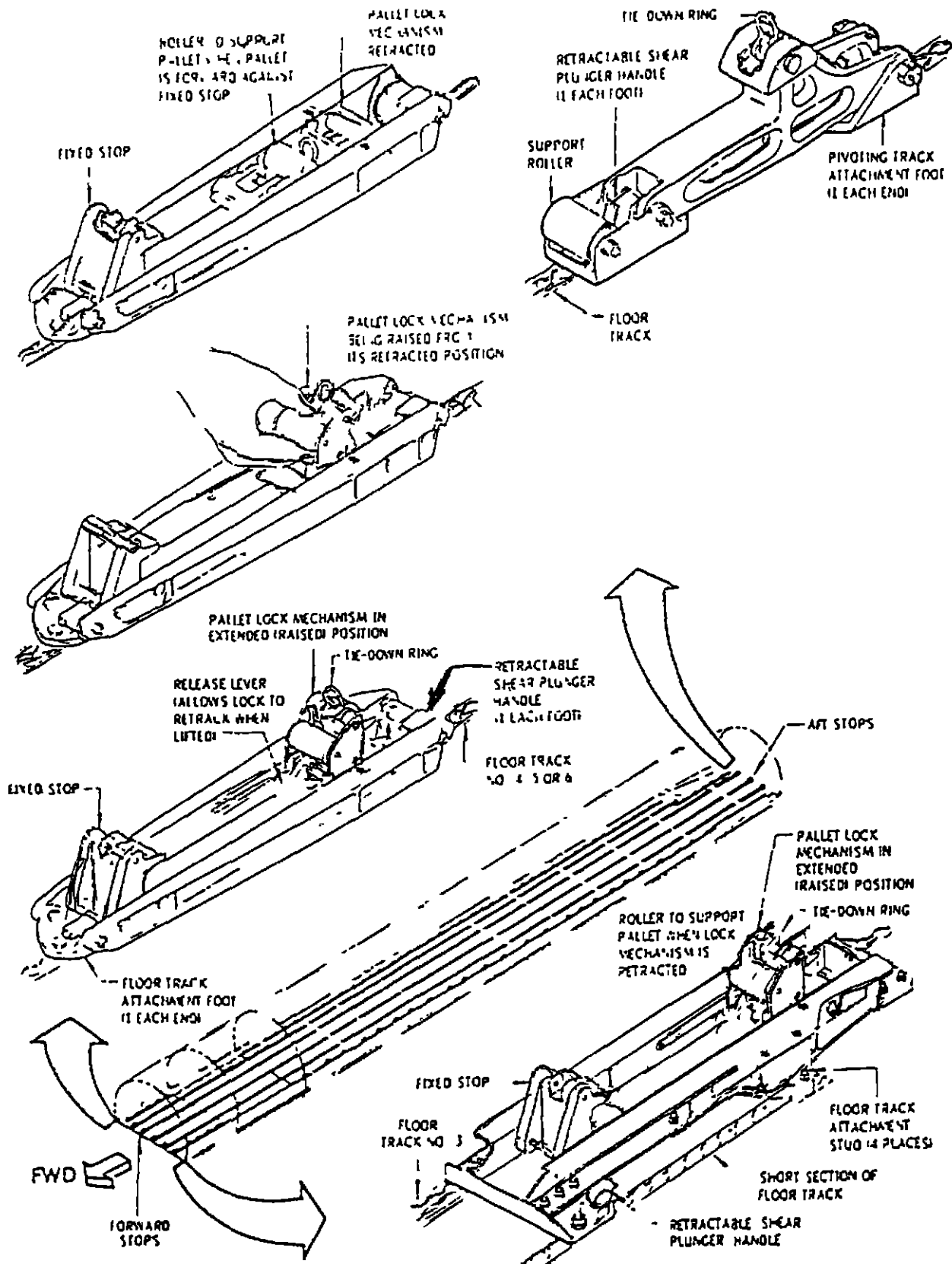
7 Forward Stops

- A Forward stops are installed to the floor tracks at the forward end of the system. (See figure 9.) They incorporate a retractable pallet lock mechanism, which includes a support roller, to permit the forward (No. 1) pallet to be stood clear of the ball mat area while loading the other pallets.

8 Aft Stops

- A Aft stops are installed to the cabin floor tracks at the extreme aft end of the series of roller trays. (See figure 9) They form the aft end of the system in all of its various configurations of length.



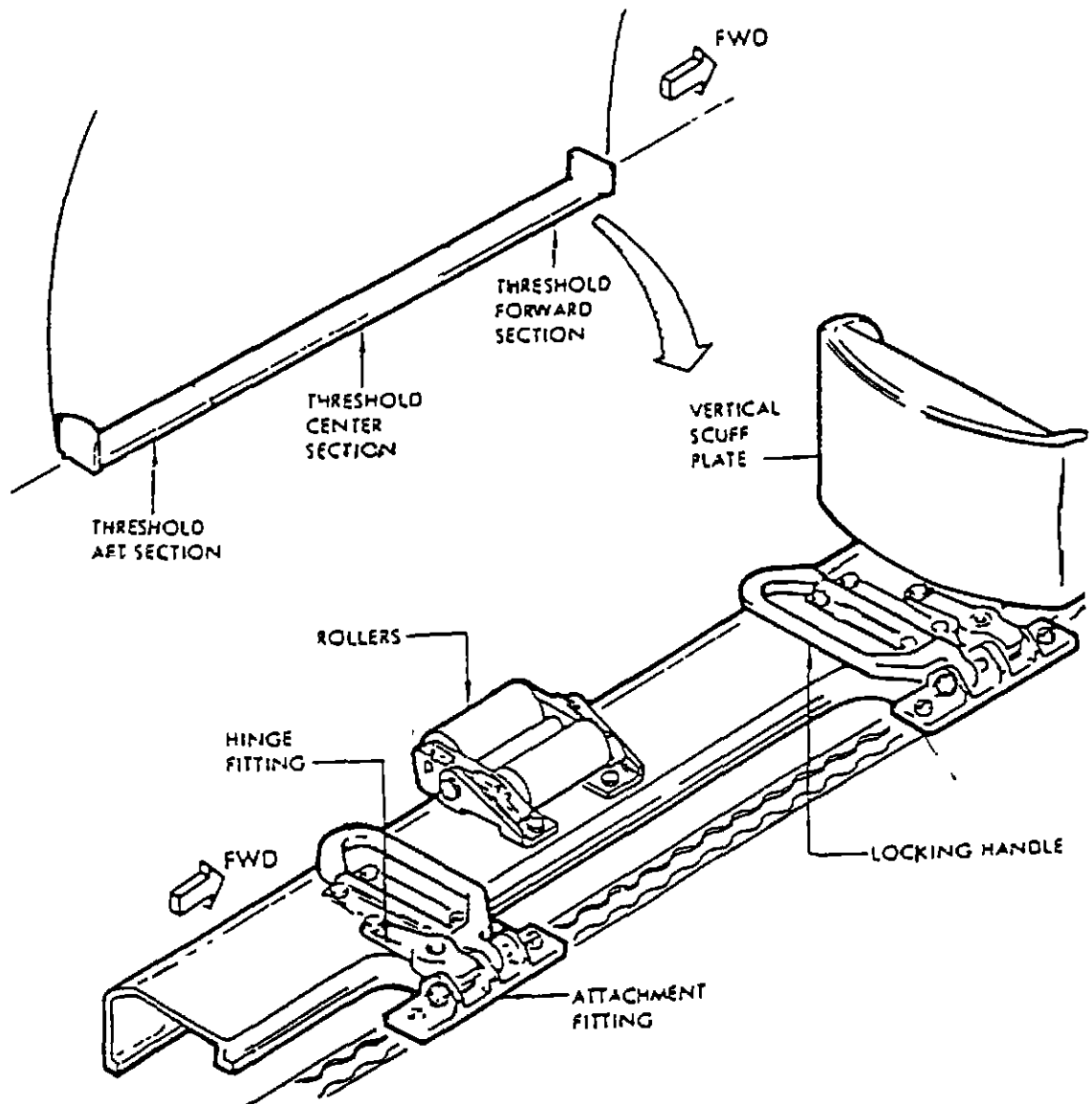


Forward and Aft Stops
Figure 9

MAINTENANCE MANUAL

9 Main Cargo Door Threshold

- A The main cargo door threshold is a beam assembly installed along the main cargo door sill to protect the door sill and provide support for the cargo pallets as they are rolled through the cargo door opening (See figure 10). The threshold is installed in three sections and remains in place only during loading and unloading cargo. The three must be removed before the cargo door is closed. The forward and aft sections of the threshold are equipped with vertical scuff plates to protect the sides of the cargo door opening and guide the pallets through the opening. Each threshold section is equipped with rollers which provide the support for the pallets. The threshold is locked floor track N° 1 by floor track attachments installed on the inboard side of the threshold.



Main Cargo Door Threshold
Figure 10



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ROLLER TRAYS - REMOVAL/INSTALLATION

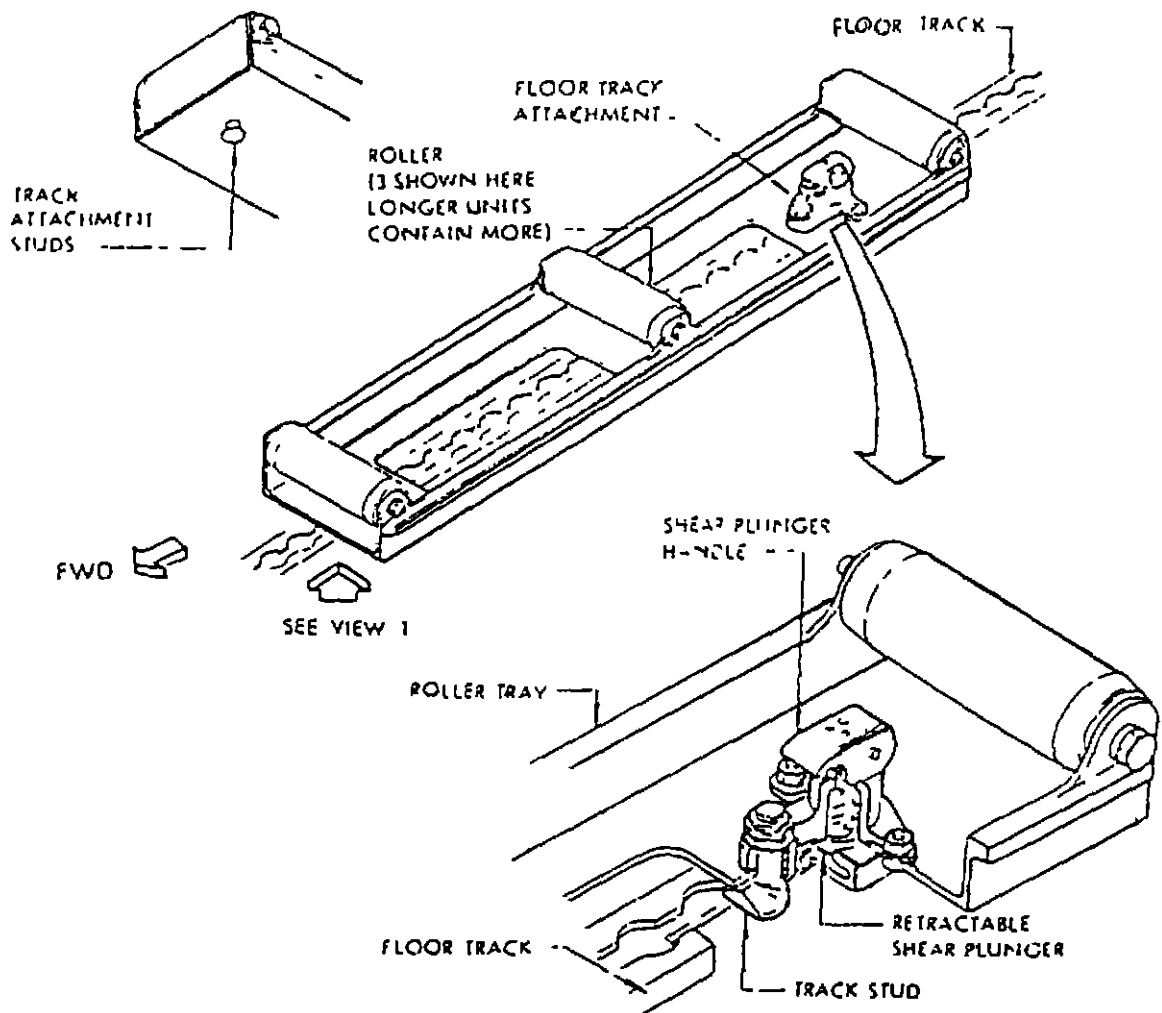
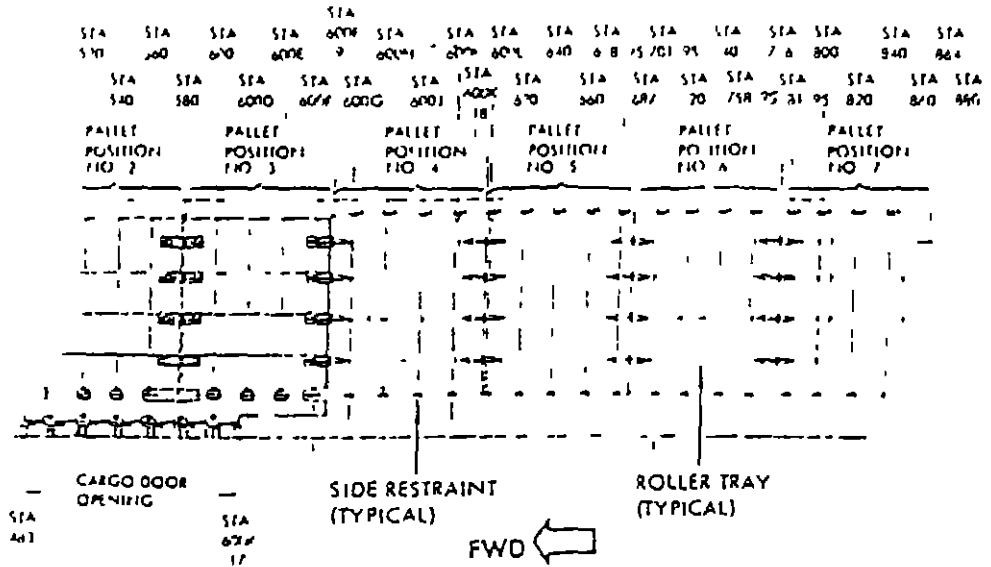
1. Remove Roller Tray (See figure 401.)

- A. Lift shear plunger handle to its vertical position, slide tray one-half inch aft and lift clear of floor track.

2. Install Roller Tray (See figure 401.)

- A. Retract shear plunger by raising its handle to upright position.
- B. Place roller tray in position, locating its studs in floor track adjacent to appropriate marking on floor
- C. Slide tray forward approximately one-half inch until its studs are stopped by edges of floor track holes.
- D. Flip shear plunger handle down to allow shear plunger to snap into engagement with floor track
- E. Check that tray is properly engaged in track by attempting to remove it without lifting shear plunger handle. Check also that shear plunger handle is lying down flat.

NOTE: Shear plunger handle is spring-loaded to raise and will be tilted up at about 45 degrees if plunger is not completely extended into track.



Roller Tray
Figure 401 (Sheet 1)



MAINTENANCE MANUAL

SIDE RESTRAINTS - REMOVAL/INSTALLATION

1 General

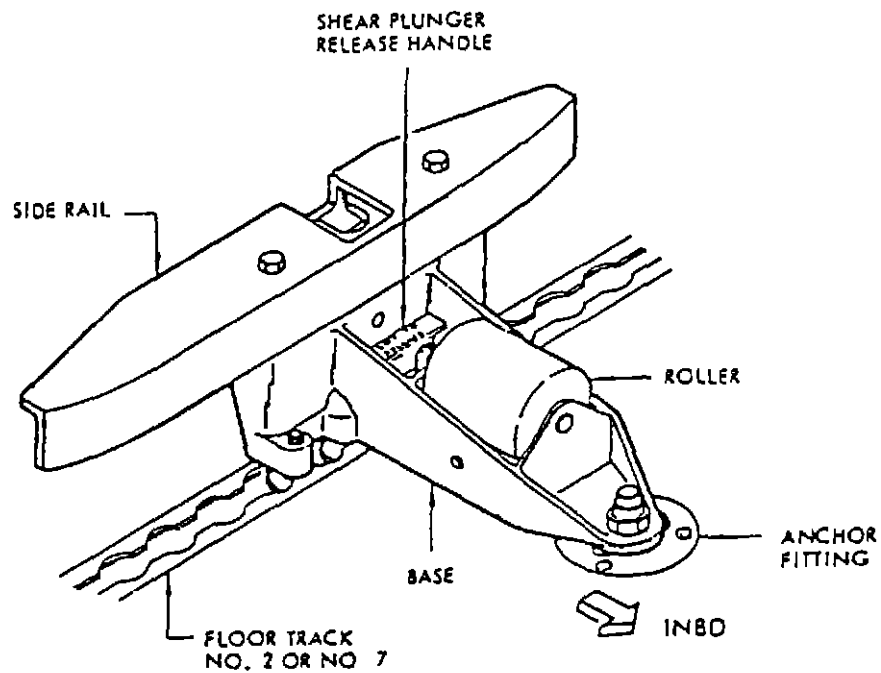
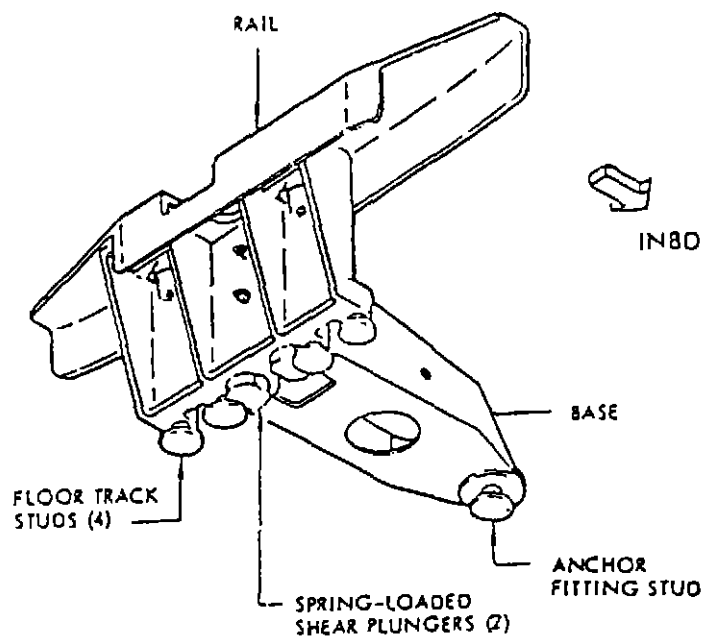
- A These procedure apply to the standard side restraints installed along both sides of the system at 20-inch intervals, and to these assembled in groups of three or six to rails in the area of the main cargo door. In the case of these assemblies the rail and bases should be removed and installed as a unit.

2 Remove Side Restraint (See figure 401)

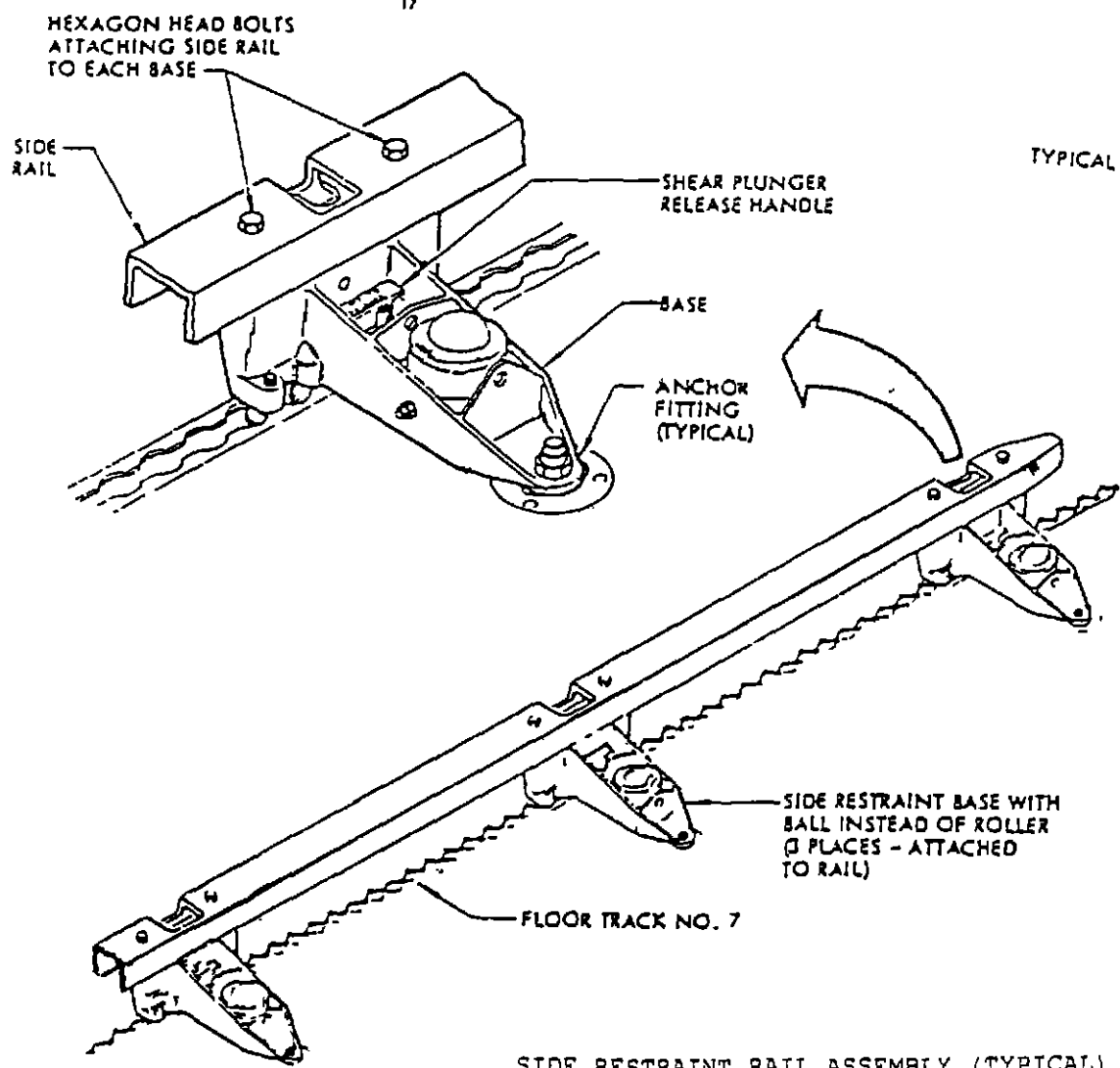
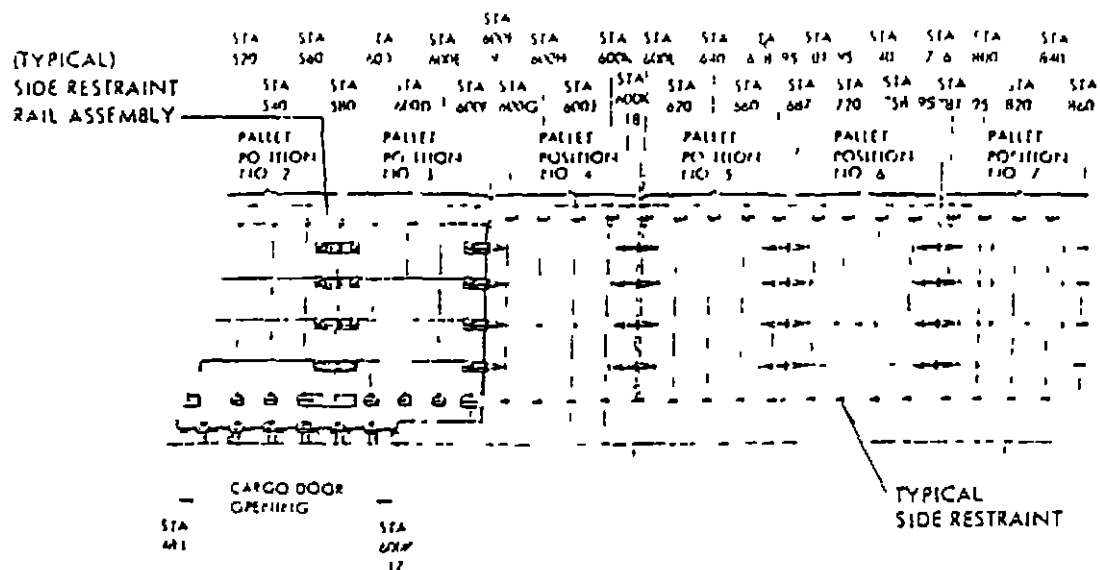
- A Lift shear plunger release handle, slide whole fitting one-half inch aft and disengage from floor track and keyhole slotted anchor fitting on floor.

3 Install Side Restraint (See figure 401)

- A Engage single stud on inboard end of side restraint base in large end of keyhole-slotted anchor plate inboard of floor track. At the same time locate four studs under base of side restraint in corresponding holes of floor track.
- B Press down (depressing springs of shear plungers) and slide forward one-half inch until shear plungers snap into engagement with track.
- C Check that side restraint is locked to track by attempting to remove it without lifting shear plunger handle.



SIDE RESTRAINT (TYPICAL)



SIDE RESTRAINT RAIL ASSEMBLY (TYPICAL)





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SIDE RESTRAINTS - CLEANING/PAINTING

1 General

- A The side restraint rail assemblies installed opposite the main cargo door are provided with ball assemblies instead of rollers. Each of these ball assemblies should be removed from its side restraint base and cleaned as described in the following procedure. The ball assemblies should not be lubricated.

2 Equipment and Materials

- A General purpose cleaning solvent, EMS 3-2, Type II
- B Source of clean, dry compressed air

3 Clean Ball Assembly

- A Remove ball assembly from side restraint base

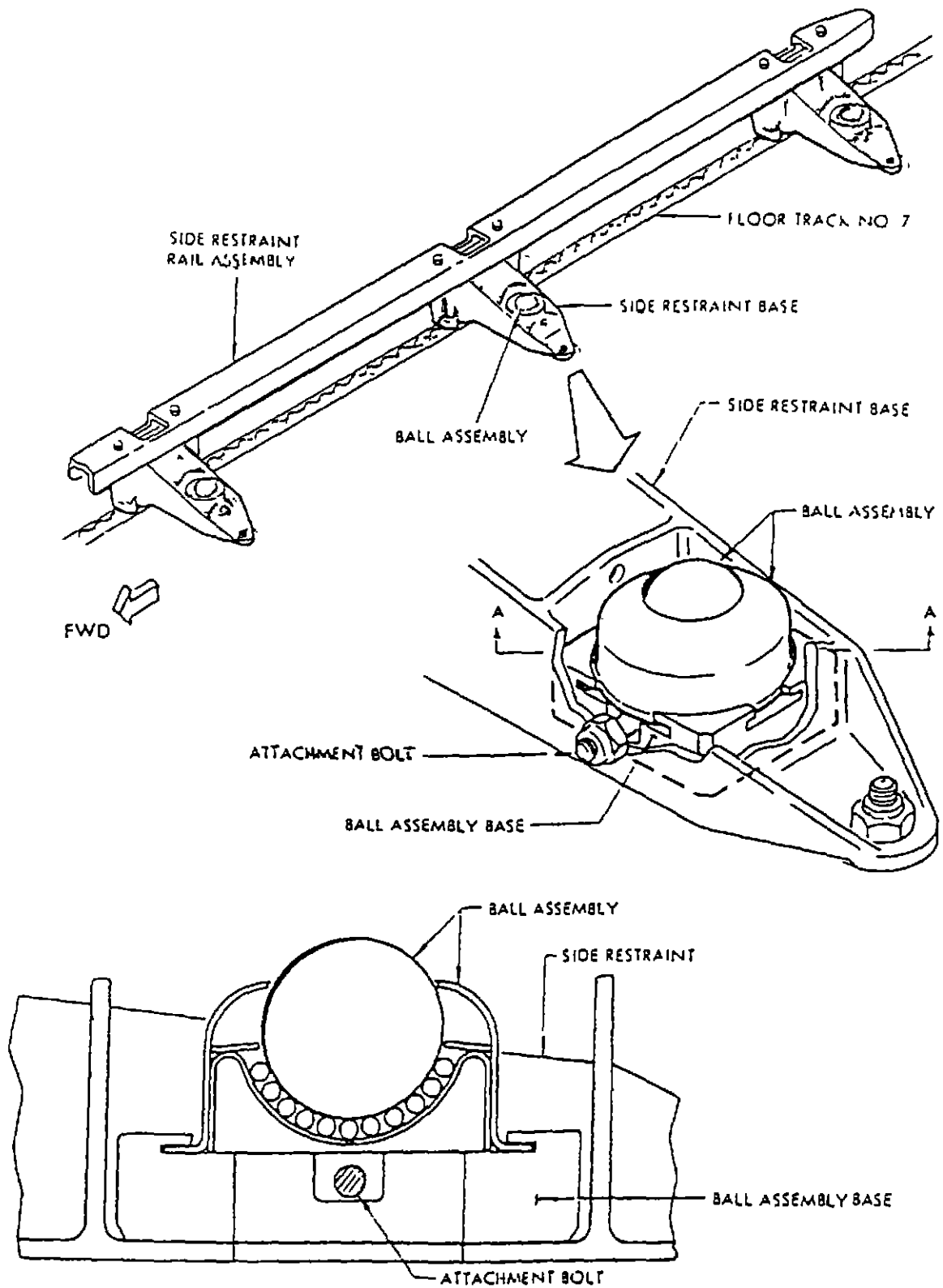
- (1) Remove attachment bolt
- (2) Lift ball assembly and its base from side restraint base, and disengage ball assembly from its base by rotating in either direction

- E Clean ball assembly in solvent and dry thoroughly with jet of compressed air. Do not apply any lubricant.

NOTE Care should be taken to ensure that the drain hole in the base of the ball assembly is clean and free of obstruction.

- C Install ball assembly to side restraint base

- (1) Engage tongues around lower edge of ball assembly in corresponding grooves of ball assembly base
- (2) Drop ball assembly, with its base, into recess in side restraint base and install attachment bolt



SECTION A-A

RETRACTABLE SIDE RESTRAINTS - REMOVAL/INSTALLATION

1. Remove Retractable Side Restraint (See figure 401.)

- A. Lift shear plunger release handles, slide whole fitting one-half inch and disengage from floor track and keyhole-slotted anchor fitting on floor.

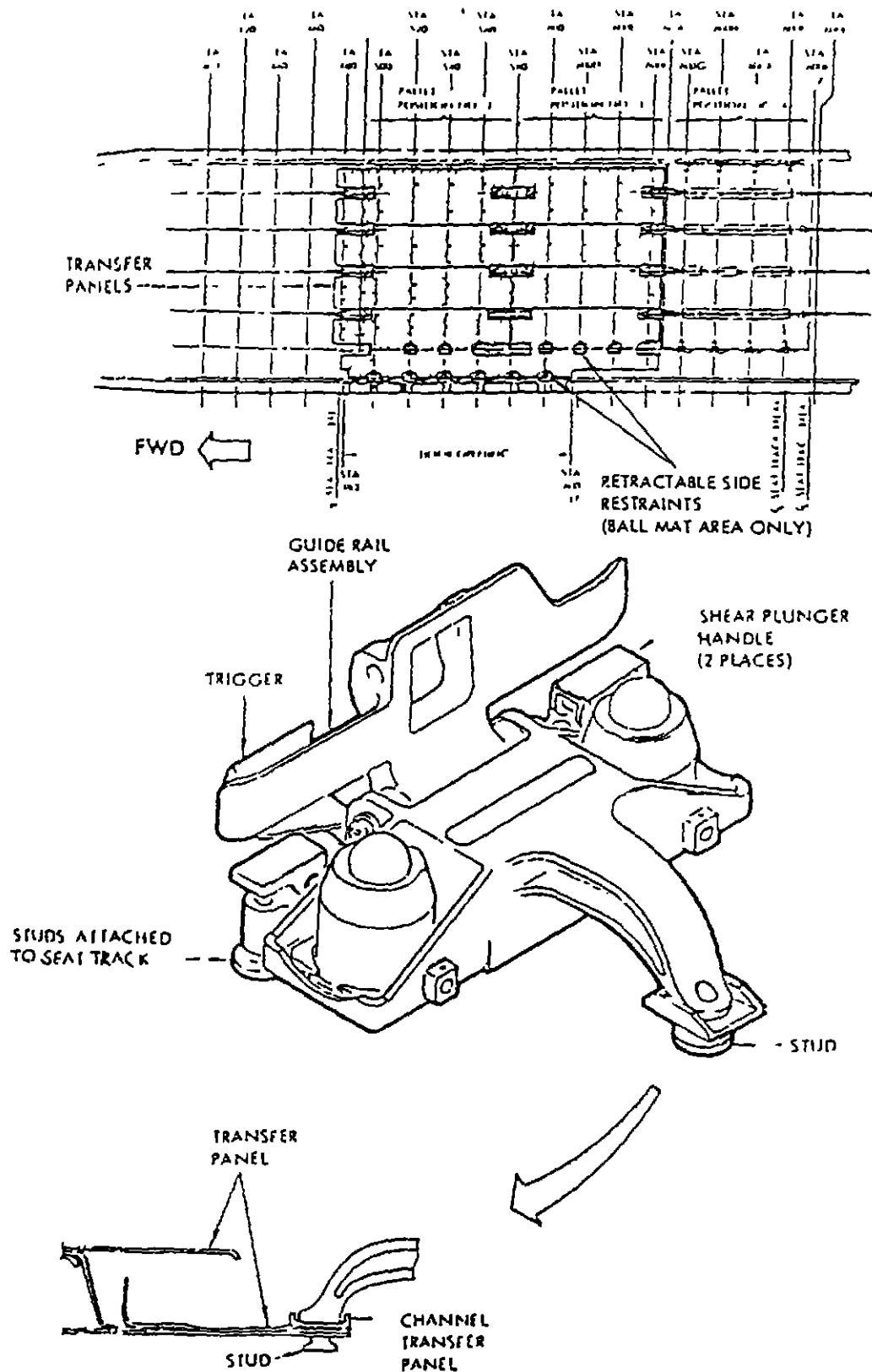
2. Install Retractable Side Restraint Fittings (See figure 401.)

- A. Place fitting in position, locating its studs in floor track No. 2 and in adjacent keyhole-slotted anchor plates, in positions marked across main cargo door opening.
- B. Press whole fitting downwards (depressing springs of its shear plungers) and slide it forward one-half inch until shear plungers snap into engagement with the floor track.

NOTE: Side restraint should be in its retracted position. To retract any fitting that is raised, depress its trigger.

- C. Check that fitting is locked to track by attempting to remove it without lifting shear plunger handles. Check also that shear plunger handles are lying down flat.

NOTE: Shear plunger handles are spring-loaded to raise and will be tilted up at about 45 degrees if plunger is not completely extended into track.



Retractable Side Restraint Installation
Figure 401



MAINTENANCE MANUAL

TRANSFER PANELS - REMOVAL/INSTALLATION

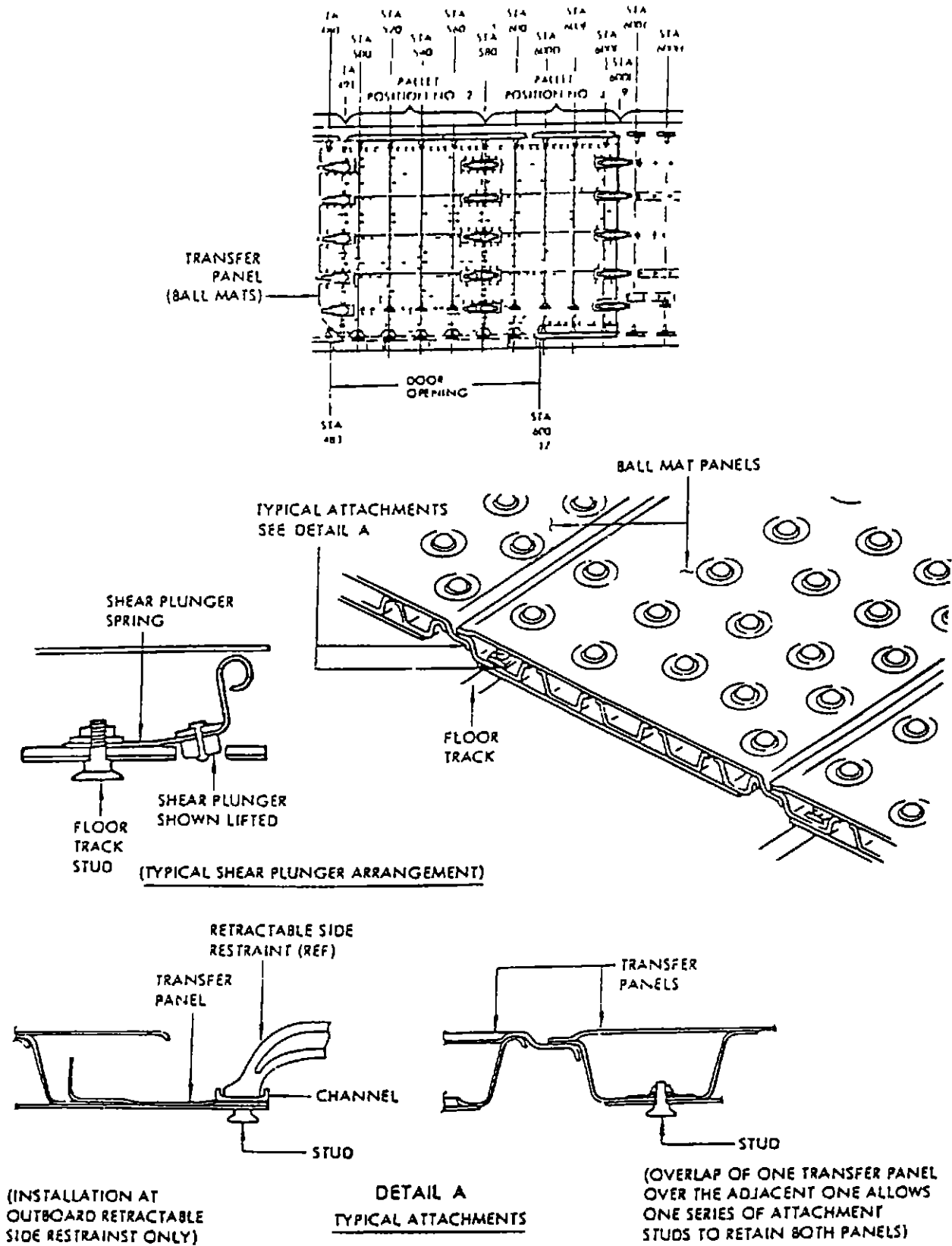
1 Remove Transfer Panels (Ball Mats)

- A Release shear plunger by lifting up on spring until plunger clears hole in track (See figure 401)
- B Slide panel aft approximately one-half inch and remove panel
- C Remove retractable side restraints and guide rail assemblies

2 Install Transfer Panel (Ball Mats)

- A Lower panel on to seat track so that floor track stud engages hole in track (See figure 401)
- B Slide panel forward (approximately one-half inch) until shear plunger engages hole in track
- C Install retractable side restraints and guide rail assemblies

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TRANSFER PANELS - CLEANING/PAINTING

1. General

- A. Cleaning of the transfer panels consists primarily of cleaning the ball assemblies. Each of these should be removed individually from its panel and cleared as described in the following procedure. The ball assemblies should not be lubricated.

2. Equipment and Materials

- A. General purpose cleaning solvent, EMS 3-2, type II
- B. Source of clean, dry compressed air

3. Clean Ball Assembly

- A. Remove ball assembly from transfer panel.

- (1) Remove antirotation screw.
- (2) Rotate retainer counterclockwise through 90 degrees to disengage it from transfer panel. (An easy and safe method is to tread down on the assembly and rotate it by foot.)

WARNING: TAKE CARE TO CONTROL UPWARD THRUST OF SPRING WHEN RETAINER IS DISENGAGED.

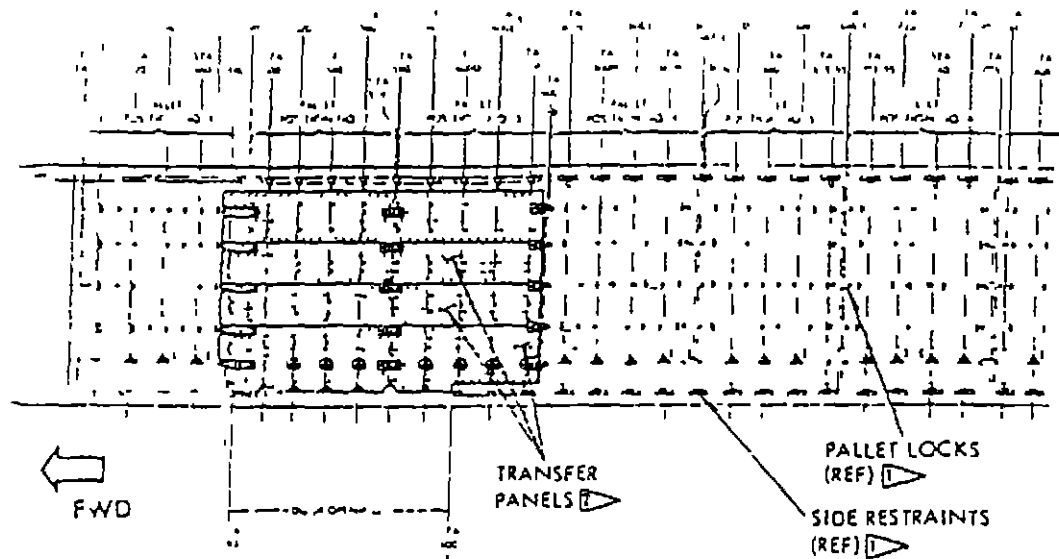
- (3) Remove ball assembly.

- B. Clean ball assembly in solvent and dry thoroughly with jet of compressed air. Do not apply any lubricant.

NOTE: Care should be taken to ensure that the drain hole in the base of the ball assembly is clean and free of obstruction.

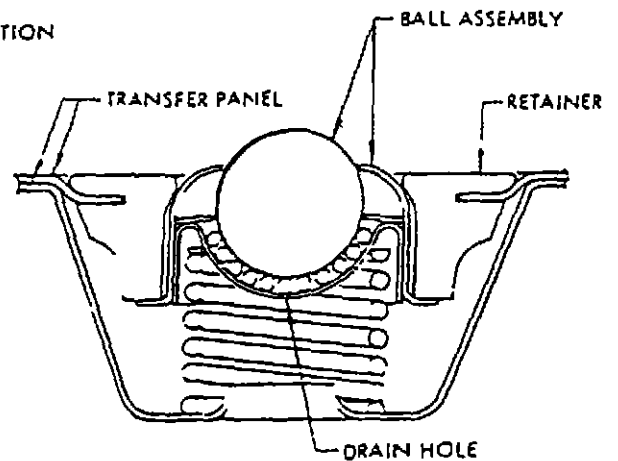
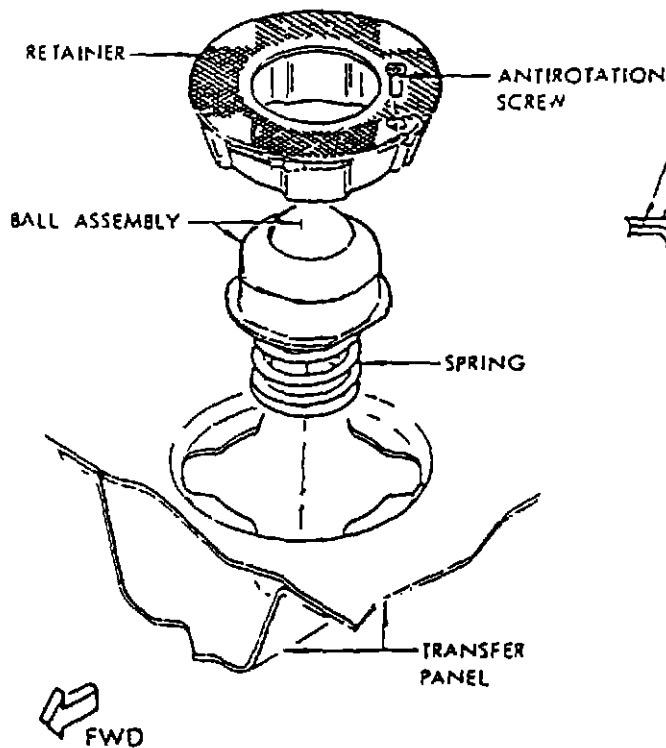
- C. Install ball assembly in panel.

- (1) Place spring, ball assembly and retainer in transfer panel.
- (2) Press retainer down against spring to engage hole in transfer panel and rotate it clockwise through 90 degrees until stop is contacted. (Foot action is suggested for this.)
- (3) Install antirotation screw.



1 NOTE CARGO SYSTEM SHOWN HAPPENS TO BE 36 X 125 INCH TRANSFER PANELS ARE SAME ON ANY SYSTEM

2 NOTE TRANSFER PANELS SHOWN IN THIS VIEW ARE OF LATER CONFIGURATION BALL ASSEMBLIES REMAIN IDENTICAL HOWEVER.



SECTION THROUGH
TYPICAL ASSEMBLY

Ball Assembly Installation

Figure 701

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PALLET LOCKS - REMOVAL/INSTALLATION

1 Remove Pallet Lock (See figure 401.)

- A. Remove pallet lock by raising their shear plunger handles, sliding lock one-half inch aft and lifting clear of track.

2 Install Pallet Locks (See figure 401.)

- A. Retract shear plungers by raising their handles to upright position.
B. Place pallet lock in position, locating its studs in floor track adjacent to appropriate mark.

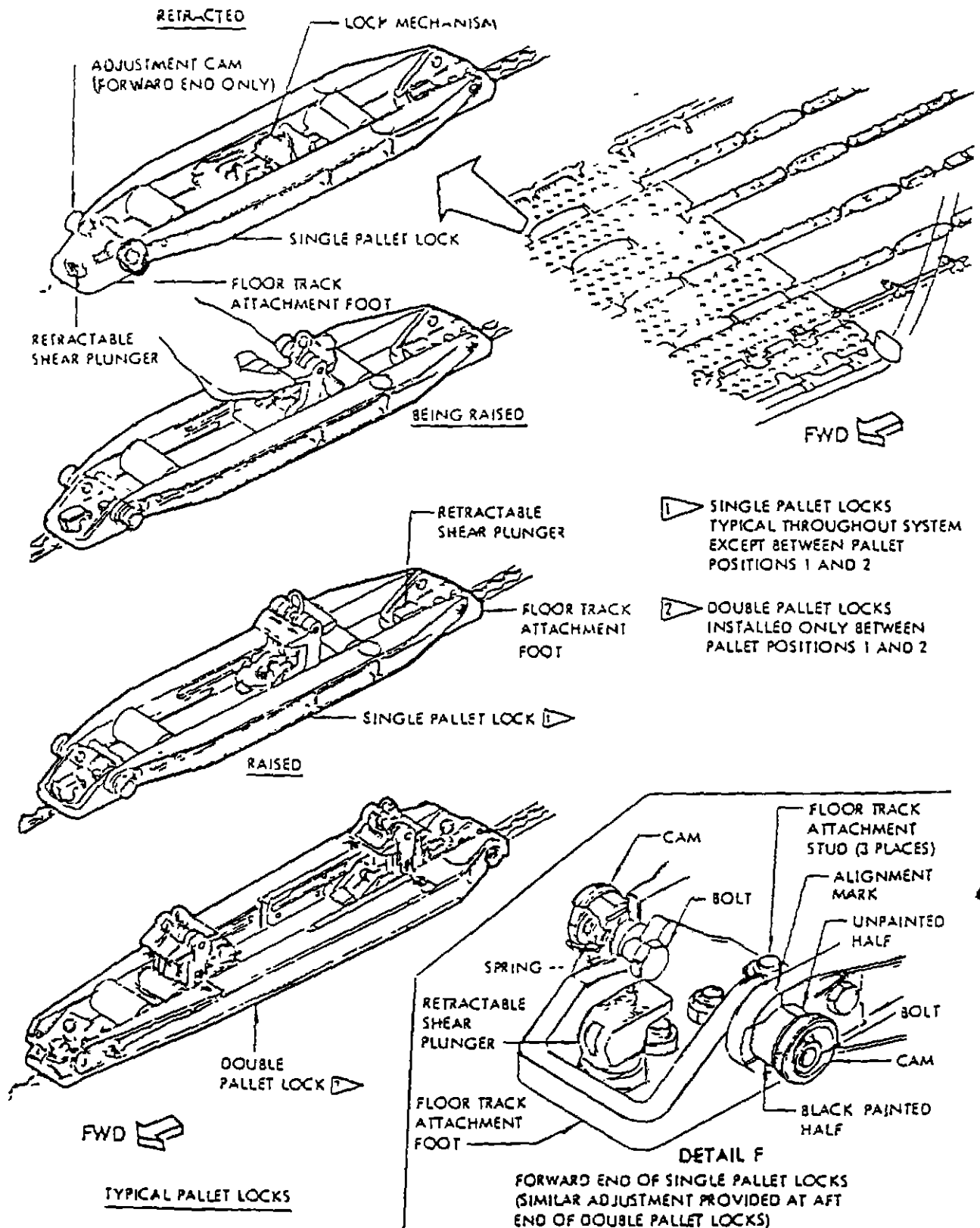
NOTE. If necessary the distance between the forward and aft floor track attachment feet may be adjusted by an increment of 0.1-inch to accommodate tolerances in the floor track. Both cams should be grasped, pulled away from the fitting and rotated simultaneously through 180 degrees in whichever direction is desired. Cams should then snap back into slots in the side rail of the fitting. (Half of each cam is painted black and the edge of the black portion lines up with a mark on the side rail when the cam is seated in either of its two positions.)

- C. Slide lock forward approximately one-half inch until its studs are stopped by edges of floor track holes.
D. Flip shear plunger handles down to allow shear plungers to snap into engagement with floor track.

NOTE. Pallet lock mechanism should be in its retracted position. To retract any lock that is raised, lift its release lever and allow the mechanism to retract.

- E. Check that pallet lock is properly engaged in track by attempting to remove it without lifting shear plunger handles. Check also that shear plunger handles are lying down flat.

NOTE Shear plunger handles are spring-loaded to raise and will be tilted up at about 45 degrees if plunger is not completely extended into track. Forward shear plunger handle should be oriented as shown in figure 401 to prevent it being inadvertently kicked up.



FORWARD AND AFT STOPS - REMOVAL/INSTALLATION

1. Remove Stops (See figure 401.)

- A. Remove forward stop by raising shear plunger handles, sliding stop one-half inch aft and lifting clear of track.
- B. Remove aft stop in same manner but slide forward to disengage from track.

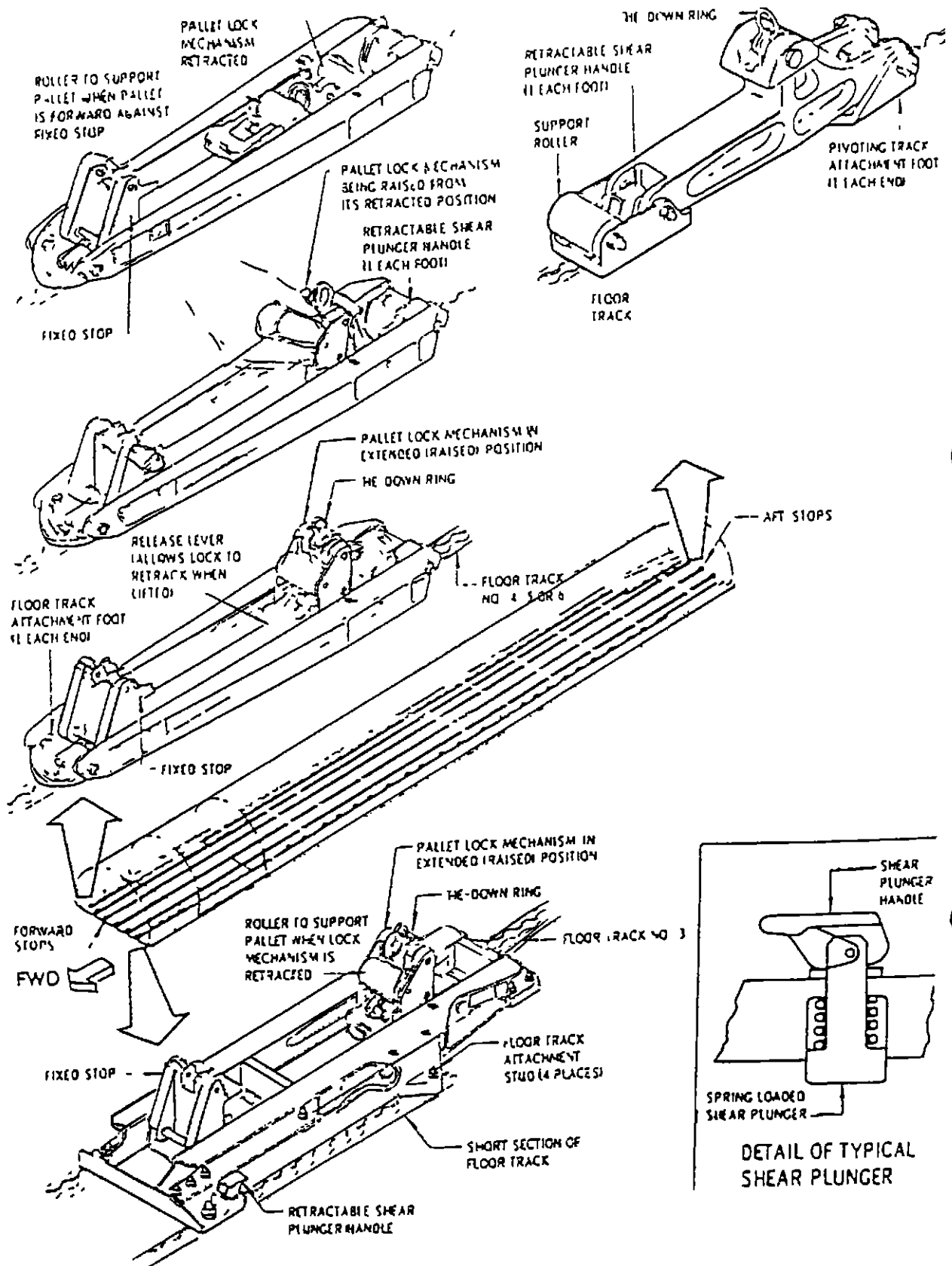
2. Install Stops (See figure 401.)

- A. Retract shear plungers by raising their handles to upright position.
- B. Place stop in position, locating its studs in floor track adjacent to appropriate mark.
- C. Slide stop approximately one-half inch in appropriate direction until its studs are stopped by edges of floor track holes. (Forward stops engage by moving forward, aft stops move aft.)
- D. Flip shear plunger handles down to allow shear plungers to snap into engagement with floor track.

NOTE On forward stops, pallet lock mechanism should be in its retracted position. To retract any lock that is raised, lift its release lever and allow the mechanism to retract.

- E Check that stop is properly engaged in track by attempting to remove it without lifting shear plunger handles. Check also that shear plunger handles are lying down flat.

NOTE: Shear plunger handles are spring-loaded to raise and will be tilted up at about 45 degrees if plunger is not completely extended into track.





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MAIN CARGO DOOR THRESHOLD - REMOVAL/INSTALLATION

1. Remove Main Cargo Door Threshold
 - A. Lift two lock handles on each threshold section to the unlocked position (See figure 401.)
 - B. Move each threshold section outboard to disengage hinge fittings from pins on attachment fittings and remove threshold section
2. Install Main Cargo Door Threshold
 - A. Place each threshold section in mounting position with hinge fittings engaging pins on attachment fittings. (See figure 401.)
 - B. Move two lock handles on each threshold section to the locked position.





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AUTOMATIC FLOW CONTROL VALVE - REMOVAL/INSTALLATION

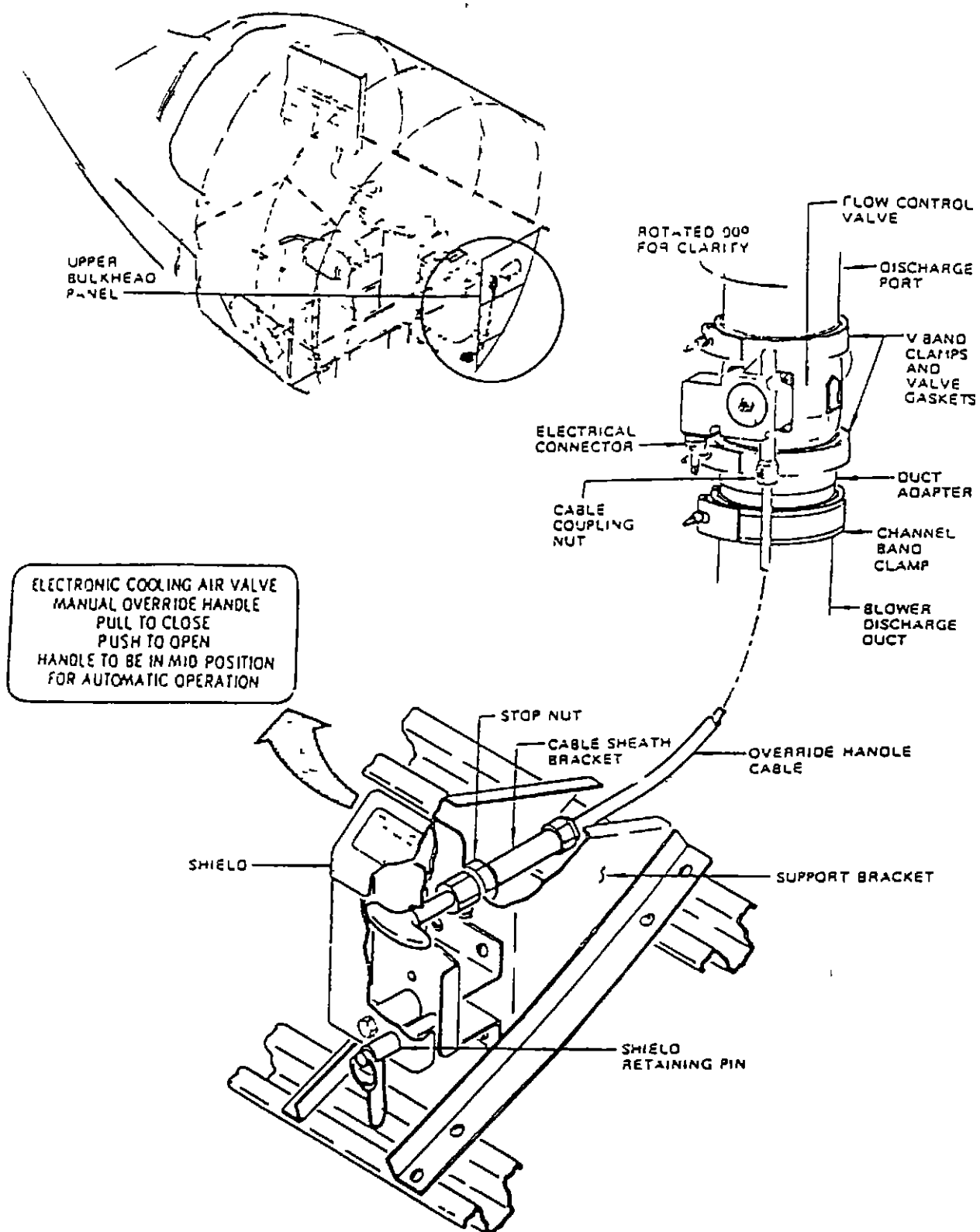
- 1 Remove Automatic Flow Control Valve (See figure 401)
 - A Remove the upper bulkhead panel from the right side of the cargo compartment forward bulkhead
 - B Remove lower V-clamp which secures the valve to the duct adapter
 - C Remove blower discharge duct support bracket
 - D Remove large duct clamp from the blower discharge duct at the blower
 - E Remove manual override handle shield retaining pin and rotate shield forward
 - F Loosen manual override handle stop nut, remove control handle and cable from support bracket
 - G Remove manual override handle support bracket mounting bolts and remove support bracket from airplane
 - H Remove blower discharge duct
 - I Loosen manual override handle cable clamps
 - J Disconnect valve electrical connector
 - K Remove upper V-clamp which secures the valve to the discharge port
 - L Remove valve along the same path blower discharge duct was removed
- 2 Install Automatic Flow Control Valve (See figure 401)
 - A Slide valve beneath the shelves into position
 - B Position valve to discharge port with replaced new gaskets and install V-clamp
 - C Orientate override cable sheath bracket

NOTE Top of sheath bracket should be in up position If down moisture may collect and cause the valve to be inoperable



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- (1) If necessary break lockwire and loosen control cable coupling nut at the valve
 - (2) Position manual override handle in correct position and check that sheath bracket is in the up position
 - (3) Remove any twist in the cable casing Tighten and lockwire the control cable nut
- D Connect valve electrical connector
- E Install manual override handle cable clamps
- F Slide blower discharge duct into position and install support bracket loosely to permit movement of duct
- G Install manual override handle support bracket
- H Install manual override handle in the correct position and tighten stop mat
- I Slide blower discharge duct into flexible duct at blower Check position and tighten duct clamp
- J Position blower discharge duct with duct adapter to valve and install V-clamp
- K Tighten blower discharge duct support bracket mounting bolts
- L Install lockwire between upper and lower V-clamps
- M Move manual override handle to neutral position, move handle shield down over manual override handle and insert retaining pin
- N Install bulkhead panel



Automatic Flow Control Valve Installation
Figure 401





EQUIPMENT COOLING ORIFICE COVERS - ADJUSTMENT/TEST

1 Equipment Cooling Orifice Cover Adjustment

A General

- (1) Orifices control air circulation around rack-mounted electronic equipment to maintain proper operating temperatures. The orifices are adjusted when equipment is relocated or new items mounted on the racks.
- (2) Figures 501, 502, and 503 provide all information required for obtaining proper orifice settings for cooling of equipment. Figure 501 locates equipment in the equipment cooling racks, figure 502 shows different locations of orifices with respect to tray type, tray figure arrangement, and method of measuring orifice opening. Figure 503 gives the orifice settings for each item of equipment. Figure 504 provides the above information for additional equipment in the auxiliary Electronic Rack, RJ28.

B Equipment and Materials

- (1) Pro-Seal 719 B-1 or equivalent
- (2) Aliphatic Naphtha or suitable cleaning agent

C Adjust Cooling Orifice Cover

- (1) Remove orifice cover requiring adjustment by prying with a suitable tool.
- (2) Clean old cement from cover and rack.
- (3) Apply cement to orifice cover, following instructions on container.
- (4) Position orifice cover. See figures 501, 502, and 503.

HF 2 T R	SPACE	HF 2 CONTR	HF 1 CONTR	HF 1 T R

SHELF NO 1

LORAN RECEIVER	CAB PRESS CNTLR	SPACE	P/A AMPL	TAPE MACHINE

SHELF NO 2

MACH TRIM CONTROL UNIT	AUTOPILOT P	AUTOPILOT AMPL	SPACE

SHELF NO 3

ADF R2	ADF R1	SPACE	MARKER RECEIVER	VOR/ILS RECEIVER NO 2	VOR/ILS RECEIVER NO 1	VHF COMM R-T2	VHF COMM R-T1

SHELF NO 4

LH SIDE
FWD

DOPPLER TRACK NO 1 PROVISIONS	DOPPLER COMPUTER NO 1 PROVISIONS

SHELF NO 1

SHELF NO 2

POLAR PATH COUPLER 1	POLAR PATH COUPLER 2		ATC TRANSP NO 1	ATC TRANSP NO 2	OME 1	OME 2

SHELF NO 3

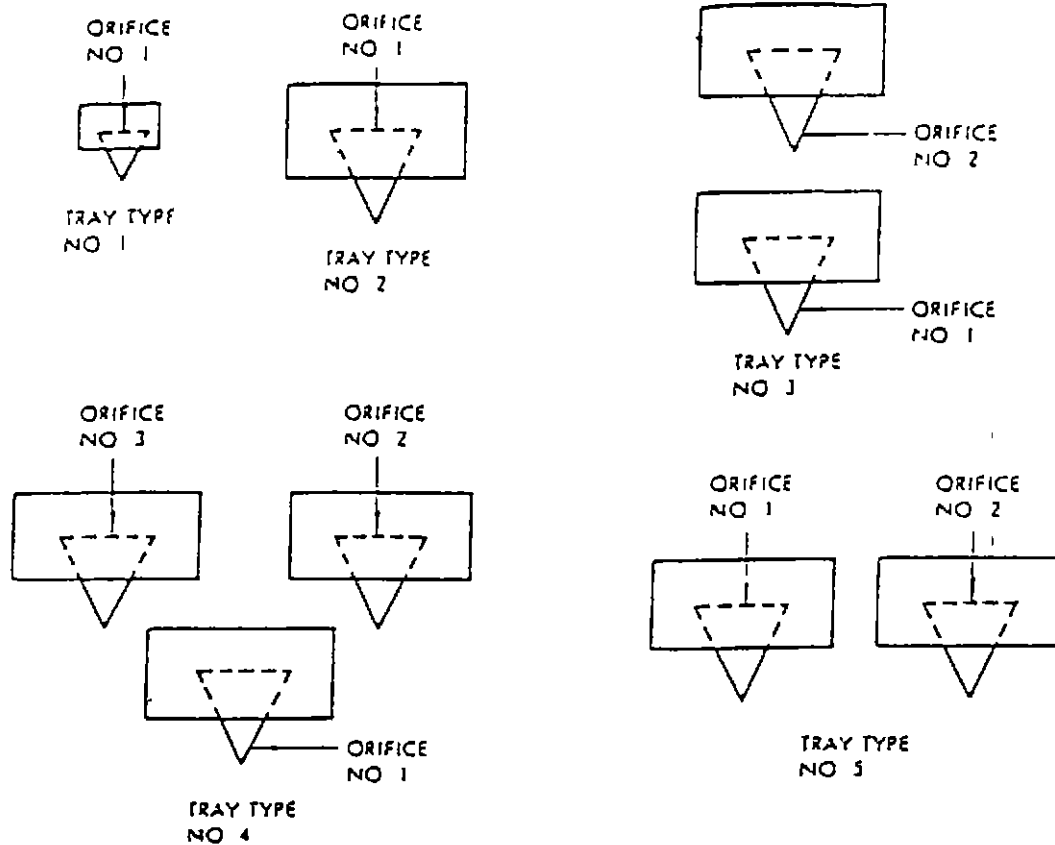
KIFIS CONTROL		FLT DIR ROLL NO 1	FLT DIR PITCH NO 1	FLT INST AMPL NO 1	TURN RATE RACK	FLT DIR ROLL NO 2	FLT DIR PITCH NO 2	FLT INST AMPL NO 2	NAV WARN

SHELF NO 4

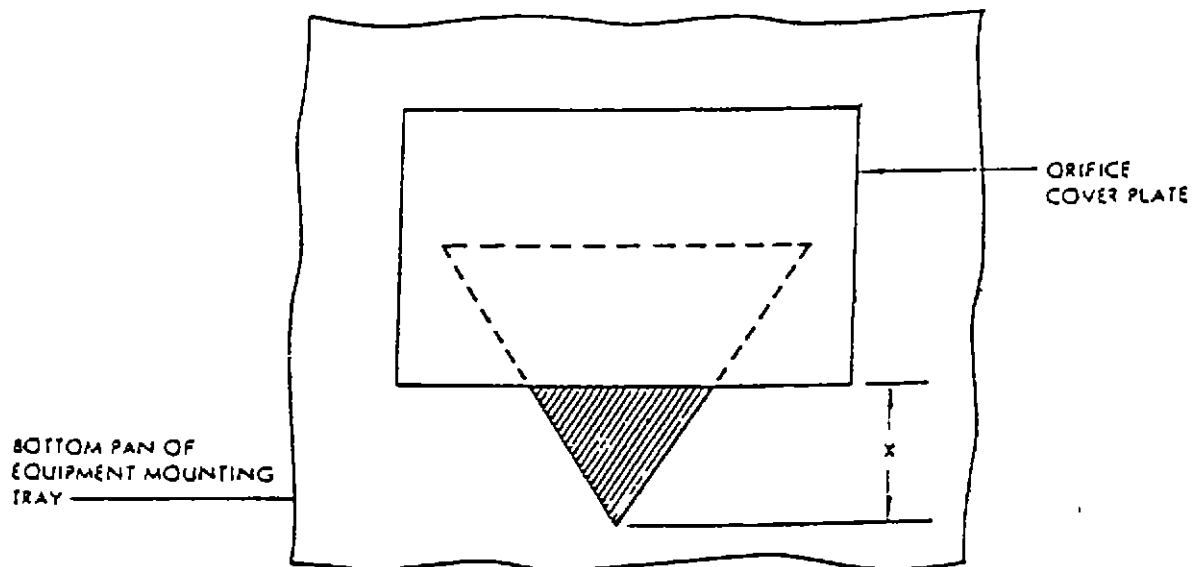
RH SIDE
FWD

Electronic Equipment Location
Figure 501

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ORIFICE AND TRAY TYPE IDENTIFICATION

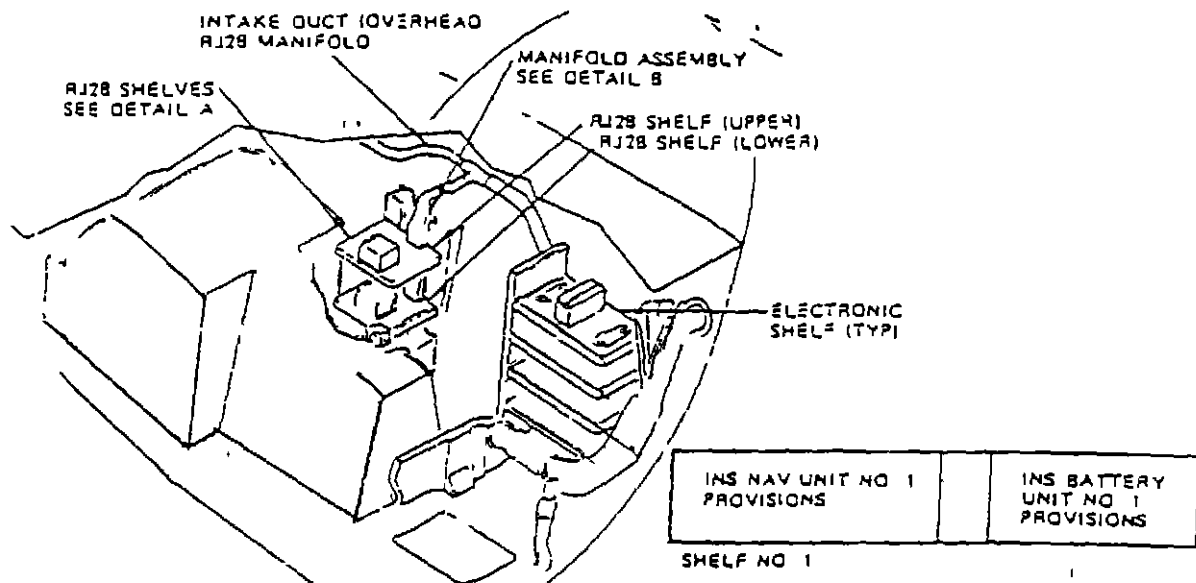


TYPICAL ORIFICE ADJUSTMENT COVERS

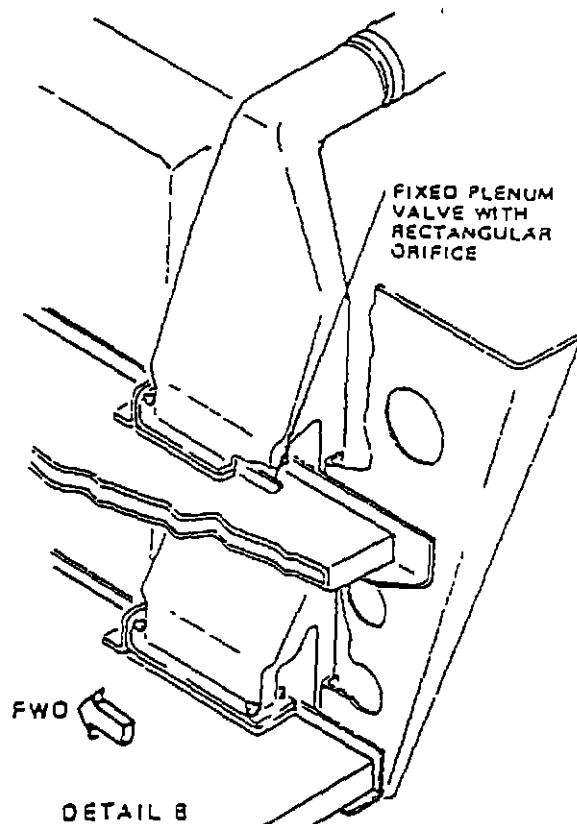
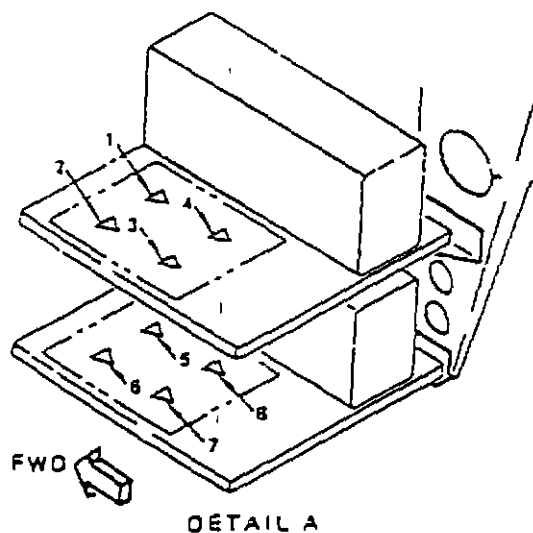
Equipment Cooling Orifice Cover Adjustment
Figure 502

EQUIPMENT NOMENCLATURE	TRAY TYPE	"X" IN INCHES FOR ORIFICE NO. 1	"X" IN INCHES FOR ORIFICE NO. 2	"X" IN INCHES FOR ORIFICE NO. 3
ADF-R1 and -R2	1	0.42	NONE	NONE
AUTOPILOT P	2	0.65	NONE	NONE
ATC TRANSP NO. 1 and NO. 2	3	0.55	CLOSED	NONE
AUTOPILOT AMPL	4	1.18	CLOSED	CLOSED
CAB PRESS CONTROL	2	CLOSED	NONE	NONE
COLAR PATH COUPLER 1 and 2	3	0.47	CLOSED	NONE
CME NO. 1 and NO. 2	3	0.75	CLOSED	NONE
DOPPLER COMPUTER (PROVISIONS)	3	0.90	CLOSED	NONE
DOPP TRACK (PROVISIONS)	3	0.99	CLOSED	NONE
FLT DIR PITCH NO. 1 and NO. 2	1	0.41	NONE	NONE
FLT DIR ROLL NO. 1 and NO. 2	1	0.42	NONE	NONE
FLT INSTR AMPL NO. 1 and NO. 2	1	0.22	NONE	NONE
HF-1 and HF-2 CONTR	2	0.30	NONE	NONE
HF-1 T-R and -2	4	FULL OPEN	CLOSED	CLOSED
IFFIS CONTROL	3	0.62	CLOSED	NONE
LORAN RECEIVER	3	0.66	CLOSED	NONE
MACH TRIM CONTROL UNIT	3	0.36	CLOSED	NONE
MARKER RCVR	1	0.19	NONE	NONE
NAV WARN	2	0.53	NONE	NONE
P/A AMPLIFIER	2	FULL OPEN	NONE	NONE
TURN RATE RACK	1	CLOSED	NONE	NONE
TAPE MACHINE	3	0.66	CLOSED	NONE
VHF COM(R-T1 and R-T2	2	0.66	NONE	NONE
VOR/ILS RECEIVER NO. 1 and NO. 2	2	0.42	NONE	NONE

Equipment Cooling Orifice Cover Setting
Figure 503



ORIFICE NO (SEE DETAIL A) TRAY TYPE	ORIFICE SETTING "X" (SEE FIGURE 502) IN INCHES
1	OPEN
2	OPEN
3	OPEN
4	0.22
5	OPEN
6	OPEN
7	OPEN
8	0.22



RJ28 Auxiliary Electronic Rack Equipment Location
and Cooling Orifice Setting
Figure 504 (Sheet 1)

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1 DESCRIPTION

A General

- (1) Each Air Cruisers Evacuation System consists of a Type 88 aircraft inflatable slide assembly, a gas reservoir, and a slide container. The following paragraphs provide a detailed description of these components and assemblies.
- (2) The slides and their inflation equipment conform to FAA TSO C-69.

B Inflatable Slide Assembly (See Figure 1)

- (1) The slide assembly consists basically of a gas inflatable rectangular framework over which is placed a sliding surface (floor) of coated fabric. The floor is non-inflatable, and is of a type that dissipates static electricity, generated by the sliding evacuees. Rail tubes are attached to the framework to direct the proper movement of the evacuees down the slide.
- (2) Each slide assembly is provided with "no-fail" handles, which make the slide useable as an uninflated hand-held unit in case of pressure loss, re-entry handles for use in reboarding the aircraft, and flotation handles to permit the slide to serve as a flotation unit in case of a water ditching.
- (3) The slide is attached to the aircraft during use by means of a girt and girt bar.

C Inflation System

- (1) The inflation system assembly consists of a gas storage reservoir, a gas discharge valve, one or two jet air pumps (to augment the stored compressed air by introduction of ambient air during inflation), and a relief valve (to prevent overpressurization).
- (2) The gas storage reservoir used in this system is an ICC 3HT series metal cylinder, normally charged to 3000 PSIG of dry air (or dry nitrogen) at 70°F.
- (3) The relief valve (see Figure 2) is essentially a spring-loaded piston, sealed by an "O" ring.
- (4) The Air Cruisers jet pump (see Figure 3) consists, basically, of a fixed nozzle through which flows compressed gas from the gas cylinder. The vacuum in the mixing chamber, caused by the high velocity flow of the gas from the nozzle, opens the flapper doors of the jet pump, allowing the influx of outside ambient air.



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- (5) The flexible hose between the discharge valve and the slide jet pump is a tetrafluoroethylene oxygen hose assembly, equal to MIL-H-26626, with an anti-chafing sleeve
- (6) The discharge valve (see figure 4) is a variable pull angle, lanyard operated, ball type. It does not require any rework or disassembly of parts after actuation to recharge
- (7) The pressure gage, installed on the discharge valve, is of the bourdon helix type

D Inflatable Slide Container

- (1) The inflatable slide container consists of a fabric pack that opens automatically when the gas release cable is operated



2 OPERATION

A Normal Operation (See Figure 1)

- (1) Initiation of the slide inflation is accomplished by a strong pull on the gas release cable
- (2) It is important to note that the slide falls from its pack in a double-up configuration, the folded halves being retained by a slide release mechanism. This configuration is necessary to prevent the slide from touching the ground during the inflation period, and the possibility that it would inflate under the fuselage
- (3) When the pressure buildup in the slide is adequate, the slide release mechanism separates, allowing the slide to project itself out and away from the aircraft fuselage, thus assuming its operational attitude
- (4) Eight seconds after the valve discharge cable has been actuated, the slide is ready to receive its first occupant. The evacuation of personnel now proceeds as rapidly as they can enter the slide

NOTE No attendance by personnel is necessary

B Operation with Collapsed Nose Gear

- (1) On the aircraft employing these slides, no special modification of the slides is required to enable them to be used when the aircraft is in a nose-down configuration

C Ditching Operation

- (1) During a ditching operation, the procedures given in Paragraph A (1) above must be observed, with the exception that the slide must be disconnected from the aircraft

WARNING IF THE SLIDE IS NOT DISCONNECTED FROM THE AIRCRAFT,
IT WILL BLOCK THE EXIT AS THE AIRCRAFT SINKS

D Operating Details (See Figure 1)

- (1) With the slide prepared for launching in accordance with the established procedure (refer to your aircraft manual for details), the initiation of the inflation sequence is accomplished by a strong pull on the gas release cable. This pulling action opens the container and activates the discharge valve attached to the stored gas reservoir



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- (2) Compressed gas flows into the jet pump through a flexible hose and nozzle. A partial vacuum is created by the high-velocity gas as it leaves the nozzle directly inboard of the flapper valve, and ambient air is introduced through these flapper valves, combining with the high velocity gas. This increases the total gas input and provides rapid inflation with a minimum of stored gas capacity required.
- (3) As the inflation continues, the slide back pressure reaches a point at which the jet pump flapper valves close automatically. During this portion of the inflation, the balance of stored gas continues to flow through the jet pump nozzle directly into the slide to "top it off" to its terminal pressure. The slide distends and assumes its designed shape.
- (4) To preclude the over-inflation of the slide, a relief valve is incorporated (see Figure 2).



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3 SPECIAL HANDLING PRECAUTIONS

- A With proper handling, the escape slide and all major components should have a useful service life of at least three years
- B While the coated fabric used in the construction of the escape slide is of the highest quality consistent with the emergency nature of the equipment, it is susceptible to cutting, chafing, puncturing, and similar damage. Therefore, the following necessary precautions must be observed in handling this equipment
- C DO NOT DROP AN ESCAPE SLIDE, PACKED OR UNPACKED
In the event this occurs, follow inspection procedures outlined in Section 4
- D STORE IN A COOL, DRY LOCATION, AVOIDING MOISTURE
- E WHEN WASHING FABRIC WITH SOLVENT FOR PURPOSES OF REPAIR, DO NOT ALLOW EXCESS SOLVENT TO COLLECT AT EDGES OF SEAMS
Excess solvent could weaken the cement in the seams and reduce the seam strength
- F ALWAYS REPACK PRECISELY AS DIRECTED IN THE PACKING PROCEDURES PROVIDED FOR THE PARTICULAR SLIDE BEING HANDLED
This will insure complete launching reliability
- G DO NOT WALK ON THE ESCAPE SLIDE
- H THE USE OF THE SLIDE BY EVACUEES WEARING HIGH HEELED SHOES OR HAVING PROTUBERANCES ABOUT THEIR CLOTHING WHICH WILL TEAR, PUNCTURE, OR OTHERWISE DAMAGE THE SLIDE SHOULD BE PROHIBITED
- I THE STORED GAS RESERVOIR CONTAINING THE COMPRESSED GAS TO INFLATE THE SLIDE IS CHARGED TO 3000 PSIG OF DRY AIR AT A CORRECTED TEMPERATURE OF 70°F



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4 PERIODIC INSPECTION

A General

- (1) In the following paragraphs the time between inspection checks are recommended periods only. Experience will dictate actual inspection periods to be used.
- (2) It is also recommended that a record be kept by date and serial number of all inspections and tests, of repairs made or rework affected, and all other pertinent data regarding these periodic inspections.

B Gas Reservoir Pressure - Check the gas reservoir pressure weekly

- (1) Gage readings should be within ± 3 percent of the tabulated value at the ambient temperature specified below.

<u>PRESSURE (psig)</u>	<u>TEMPERATURE (°F)</u>
3790	165
3475	125
3250	100
3000	70
2700	32
2425	0
2270	-20
2100	-40
1875	-65

- (2) If gage pressure is more than ± 3 percent from the above values, follow the procedure described in Section 5, paragraph E.

C Escape Slide Pressure Test - Pressure test Escape Slide Assembly every 9-12 months

CAUTION THE INSPECTION AREA MUST BE CLEAN AND COVERED WITH A TARPAULIN, CARPETING, OR OTHER PROTECTIVE COVERING

- (1) Disconnect the gas reservoir from escape slide and plug the hose with an AN 806-4 or AN 806-6 as applicable.

WARNING THE INFLATION CYLINDER, WHEN CHARGED, CONTAINS HIGH PRESSURE GAS. AVOID ITS UNCONTROLLED RELEASE.

- (2) Make a visual inspection of the slide for cuts, abrasion areas, frayed cordage, bare wires, damaged grommets, etc.
- (3) Make all repairs in accordance with Section 5 of this manual.



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- (4) Inflate the slide to 2 psig Use a home-type vacuum cleaner or filtered air from a compressor Measure pressure with a mercury manometer or gage calibrated to increments not greater than 0.1 pounds

CAUTION DO NOT WALK THE ESCAPE SLIDE

- (5) Wait one hour, then check pressure If the pressure is below 2 psig, bring it up to 2 psig
 - (6) Allow the escape slide to stand at this pressure for 4 hours
 - (7) After 4 hours, test pressure
 - (a) The permissible drop in pressure is 0.5 psig corrected for temperature and barometric pressure
 - (b) Air pressure in an escape slide will be affected by changes in temperature and barometric pressure Record the temperature and pressure at the beginning and end of the pressure test
 - (c) Correct for barometric conditions by adding 0.1 psig to the final gage reading for every 0.2 inches of mercury that the barometric pressure has increased, or subtracting 0.1 psig from the final reading for every 0.2 inches of mercury that the barometer has fallen
 - (d) Correct for temperature variations by subtracting 0.1 psig for every 3°F rise in temperature or by adding 0.1 psig for every 3°F drop
 - (e) If the corrected pressure falls below 1.5 psig, inflate the slide to relief valve pressure and test for leaks by applying soapy water to the tube and jet pump with a small brush
- NOTE See paragraph E, Method of Checking Jet Pumps for Leakage
- (f) Mark leaking areas with chalk
 - (g) Wash off soaped areas and valves thoroughly with clear water after locating leakage.
 - (h) Deflate escape slide and make all repairs in accordance with Section 5, paragraphs B, C and D
 - (i) Repeat pressure test after repairing the slide
- (8) After successfully accomplishing the pressure test in paragraph (7), reconnect the gas reservoir and discharge valve assembly



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D Relief Valve (Checked as part of Escape Slide Assembly Pressure Test)

- (1) The relief valve should open at 2 70 psig, plus 30 minus 00 psig, and seal tightly at 2 70 psig, plus 20 minus 15 psig
- (2) If the relief valve does not operate as above, adjust the piston guide (Figure 2, Item 2) per Section 5, C, paragraph (10) and (12)
- (3) If the relief valve still does not operate as above, replace the unit per Section 5, paragraph C

E Jet Pump - Method of Checking Jet Pump for Leakage (Checked as part of Escape Slide Assembly Pressure Test)

- (1) With the inflatable unit at working pressure, apply soapy water, with a small brush, to the outer surfaces of the flapper valves. Watch for bubbles which will indicate a poor seal.
- (2) Repeat above operation on screw heads and around edges of top plate assembly. Bubbles will indicate a poor seal.
- (3) Minor leaks which do not result in a pressure drop greater than that specified for the inflatable item are acceptable.

NOTE Leaks can be caused by improper tightening of screws. See Jet Pump Procedure, Section 5, D, paragraph (C) (111)

- (4) If inspection proves flapper valves of jet pump to be faulty, replace them as described in Section 5, paragraph D, (1)
- (5) If inspection indicates improper tightening of screws, backout all screws to relieve pressure on the joint, but do not remove any screws. Then proceed according to Section 5 paragraph D, (C), (111) and (1v)
- (6) Thoroughly remove all soap with a wet sponge

F Trial Inflation - Perform a trial inflation every 9-12 months

- (1) The slide should inflate within eight seconds to a pressure of at least 1 50 psig
- (2) Terminal slide pressure should exceed 2 5 psig at 70 +/- 10°F
- (3) If the above requirements are not met, the equipment is not functioning properly. The escape slide pressure test, paragraph C, should be performed to determine the causes of improper functioning

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G Discharge Valve

- (1) The test in Paragraph F above should be repeated if repairs are performed on the discharge valve or if it is replaced, providing it has not been system tested during the preceding 9-12 month period

H Lubrication - No lubrication is required for any slide component



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5 MAINTENANCE, REPAIR, AND OVERHAUL

A Troubleshooting

- (1) Troubleshooting procedures are intended to locate faulty components in the equipment. Location of the faulty component is accomplished by isolating the trouble to a particular assembly, and then to the defective part. Suspected faulty components should be tested for correct performance before being replaced.
- (2) The following are the most frequent troubles:

(a) Escape slide will not maintain inflated pressure

<u>PROBABLE CAUSE</u>	<u>METHOD OF OBSERVATION</u>	<u>REMEDY</u>	<u>PARA</u>
Hole in escape slide fabric	Visual or soapy water per para 4 C(7) (e)	Patch hole	B (3)
Tear in escape slide fabric	Visual	Patch tear	B (4)
Open seam in escape slide	Visual	Repair seam	B (5)
Faulty relief valve seal	Soapy water	Replace relief valve	C
Jet pump flap-per valve not closing properly	Soapy water per para 4 E valve	Replace frapper	D (1)

(b) Escape slide inflates too slowly

Clogged screen in jet pump inlet	Visual	Remove and clean screen	D (1)
Klink in gas line	Visual	Remove klink from gas line	
Insufficient pressure in gas cylinder	Visual observation of pressure gage	Recharge gas cylinder	F (2)
Faulty discharge valve	Visual and water immersion valve	Replace discharge	F (3) thru F(11)

(c) Gas cylinder does not retain pressure

Faulty seal between cylinder and discharge valve	Visual and water immersion	Discharge gas, unscrew, and replace seal	



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B Slide Fabric

(1) Repair Materials

- (a) Cement - per Air Cruisers Specification M-11055, Style R
- (b) Patching Fabric - same as that of which the escape slide is made, Air Cruisers Specification M-11297 (yellow) or M-11287 (white)
- (c) Toluol - for washing fabric only
- (d) Solvent - ethyl acetate or methyl ethyl ketone
- (e) Paint - aluminum neoprene, per Air Cruisers Specification M-11105

(2) Repair Equipment (Air Cruisers Drawing 19A12213)

- (a) Scissors, five-inch blunt nose, plated
- (b) Caster wheel or other roller devise
- (c) Two clean cloths, 12 x 12 inches, for washing
- (d) Brush, one-inch, for applying cement
- (e) Clean can for mixing cement

(3) Patching Holes

- (a) Thoroughly wash off all of the aluminum coating around the hole with toluol. Do not damage the fabric

CAUTION DO NOT ALLOW EXCESS TOLUOL TO COLLECT AT EDGES
OF SEAMS

- (b) Use a round patch, on the outer surface only of tubes and the underside surface only of the floor
- (c) Cut patch to allow two-inch overlap beyond hole edges
- (d) Apply three coats of cement around the hole, covering an area equal to the size of the patch

NOTE Apply the cement in thin, even coats, allowing each coat to dry before applying the next coat. Test for proper drying of cement by lightly pressing fingerknuckle against the cemented surface. If the knuckle, when pulled away, makes a snap, the surface is ready for another coat. This snap is a measure of tack.



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- (e) Prepare one side of the patch in the same manner as the tube was prepared

- 1) Wash with toluol
- 2) Apply three coats of cement per paragraph (3) (d) above

- (f) "Bring up" tack of cemented surface

- 1) Dampen a clean cloth in solvent
- 2) Wipe cemented surface with a solvent dampened cloth

NOTE This "bring up" the tack and makes the surface ready for joining

- (g) Join cemented surface of the patch to the cemented surface of the tube

NOTE The patch should be laid on gradually, one slide to the other, or from the center to the edges, to minimize the possibility of entrapped air

- (h) Squeeze out all air bubbles between joined surfaces

- (i) Press the joined surfaces together using a roller

NOTE Pressure is important for a good bond

- (j) Touch up the area with aluminum-neoprene paint after cement has cured for a minimum of 12 hours

(4) Patching Tears

- (a) Trim off loose threads with scissors

- (b) Patch inside of tube wall

- 1) Thoroughly wash off all of the aluminum coating around the tear with toluol Do not damage the fabric

CAUTION DO NOT ALLOW EXCESS TOLUOL TO COLLECT AT EDGES OF SEAMS

- 2) Cut patch large enough to allow a two-inch overlap beyond tear edges

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- 3) Apply three coats of cement to the inside of tube wall per paragraph (3) (d) above and prepare the patch per paragraph (3) (e) and (f) above
- 4) Wipe with a solvent dampened cloth to "bring up" the tack
- 5) Pass the patch through the tear and lay it, cement side up, on the tube wall directly opposite the tear
- 6) Press the torn section down on the patch
- 7) Squeeze all air bubbles out from between the cemented surfaces and roll with pressure to bond the patch to the inside of tube wall

(c) Patch outside of tube wall

- 1) Thoroughly wash off all of the aluminum coating around the tear area with toluol. Do not damage the fabric

NOTE This should be done before patch is applied to the inside of tube wall. The area should be washed again before cement is applied to the outside of tube wall

CAUTION DO NOT ALLOW EXCESS TOLUOL TO COLLECT AT EDGES OF SEAMS

- 2) Cut patch large enough to allow a four-inch overlap beyond tear edges
- 3) Apply three coats of cement to the outside of tube wall per paragraph (3) (d) above and prepare the patch per paragraph (3) (e) and (f) above
- 4) Wipe with a solvent dampened cloth to "bring up" the tack
- 5) Join cemented surface of the patch to the tube wall
- 6) Squeeze all air bubbles out from between the cemented surfaces and roll with pressure to bond the patch to the outside of tube wall
- 7) Touch up the area with aluminum-neoprene paint after cement has cured for a minimum of 12 hours

(d) Patch the underside surface only of slide floors according to paragraphs (a) and (c)



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(5) Repairing Seams

- (a) Roll back loosened seams for a reasonable distance so they may be cemented properly
- (b) Thoroughly wash all of the aluminum coating off the tube and tape with toluol, in the area to be repaired. Do not damage the fabric

CAUTION

DO NOT ALLOW EXCESS TOLUOL TO COLLECT AT EDGES
OF SEAMS NOT TO BE CEMENTED

- (c) Apply three coats of cement to the surfaces to be joined per paragraph (3) (d) above
- (d) Wipe with a solvent dampened cloth to "bring up" the tack
- (e) Lay seam and tape in place
- (f) Squeeze all air bubbles out from between the cemented surfaces and roll with pressure to bond them together
- (g) Touch up the area with aluminum-neoprene paint after cement has cured for a minimum of 12 hours



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C Relief Valve Procedure (Refer to Figure 2)

- (1) With proper handling, the relief valve should have a useful service life of at least three years
- (2) Remove four screws (8), keeping manual pressure on clamp plate (4)
- (3) Lift off clamp plate, spider (12) with piston guide (2), springs (5 and 7), and piston (1) Do not disassemble piston guide from spider
- (4) Examine piston for scratches or foreign material, particularly the shaft and the surface where the rubber sealing rings seals
- (5) Examine the sealing ring for nicks or flat spots If there is any evidence of damage, replace housing assembly (3)
- (6) Center the piston (1) on the sealing ring housing assembly (3)
- (7) Place small spring (5) inside large spring (7) and position both into retaining groove in piston
- (8) Place spider (12) with piston guide (2) over piston shaft, noting that springs are held in retaining groove of piston guide Line up protrusions of spider fingers with screw holes in housing
- (9) Place clamp plate over spider fingers, noting that holes in clamp plate are in line with holes in spider fingers and housing While keeping manual pressure on piston guide, replace four screws and tighten evenly
- (10) If adjustment of the piston guide position is required, heat carefully to approximately 350°F, this will break down the sealant holding the guide in position Adjust piston with a screw driver clockwise to raise sealing pressure or counter clockwise to lower sealing pressure
- (11) Apply two large drops of Air Cruisers M-11055 Style P adhesive between the threads of the housing (3) and the piston guide (2), on either side of the slot in the piston guide to lock the guide at its proper position Allow four hours for sealant to harden and recheck per (12)

CAUTION DO NOT ALLOW ADHESIVE TO FLOW INTO THE PISTON GUIDE SLOT OR HOLE, OR THE PISTON SHAFT MAY BIND

- (12) Check relief valve operation, four hours after application of sealant, by performing an escape slide pressure test according to Section 4, paragraphs C and D



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D Jet Pump Procedures

With proper handling, the jet pump should have a useful service life of at least three years

(1) Flapper Valve Replacement (Refer to Figure 3)

(a) Disassembly

- (1) Disconnect air line fitting from adapter fitting entering top plate (6), then remove adapter fitting from top plate
- (11) Remove screen (10) and blow clean with compressed air (in reverse direction of normal air flow)
- (111) Remove 14 mounting screws (8) and washers (7)
- (1v) Remove top plate and flapper valve (5), being careful not to distort positioning of jet pump housing (4) and mounting plate (1)

(b) Inspection, cleaning and replacement

- (1) Inspect mounting face of housing (4) for cracks around bolt holes and general condition of entire part. Replace entire pump if body is damaged, paragraph D (2)
- (11) Inspect top plate (6) for cracks around bolt holes and inspect inlet threads for cross threading or stripping and replace if damaged. Replace if bolt hole cracks appear or if inlet threads are damaged
- (111) Inspect screen (10) and replace if damaged
- (1v) Clean all metal parts in cleaning solvent in accordance with Federal Spec P-S-661B, Type II and dry with clean compressed air
- (v) Inspect flapper valve (5) for damage on all sealing areas and on sealing lip. Replace flapper valve if damaged

(c) Assembly

- (1) Hold new valve (bead side out) and top plate in place, so hinges will be vertical when item is in inflated position. Align top plate web so it is parallel to hinges of valve

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- (11) Apply Plastikon #169 (B F Goodrich) A C Spec M-11430, to threads of mounting screws (8) to a depth of 1/4 inch. Insert all 14 screws (8) and washers (7).
 - (111) Proceeding around the top plate in the same direction, tighten all screws evenly, one after another, a little at a time, so as not to distort top plate assembly.
 - (1v) Check that flapper valves open and close freely and do not bind inside the jet pump housing (4). If necessary, loosen screws and shift top plate (6) and flapper valve (5) in relation to pump body to insure free motion. Tighten screws again, as in (111) above, and recheck flapper valve movement.
 - (v) Place screen (10) in top plate (6) with screen facing the jet pump housing.
 - (vi) Replace new "O" ring on adapter fitting. Install adapter in top plate and tighten securely.
- NOTE Be careful not to distort web in top plate (6) when tightening fitting.
- (vii) Reinstall air line, using holding wrench on adapter fitting when tightening swivel nuts of air line to fitting. Use torque values of AND 10064.
 - (viii) Check the operation of the jet pump by performing an escape slide pressure test according to Section 4, paragraphs C and E.

(2) Jet Pump Replacement (Refer to Figure 3)

(a) Disassembly of Jet Pump

- (1) Refer to para (1) (1) thru (111).
- (11) Remove housing (4), inside gasket 2 and outside gasket (3) and mounting plate (1) from inside of raft.

(b) Assembly

- (1) Apply a coat of rubber cement (M-11055 Style "D") and the mating surface of the mounting plate (1). When slightly tacky press together, lining up screw holes.
- (11) Insert the mounting plate and the inside gasket (2) through mounting hole in inflatable unit by holding at 45° angle and elongating mounting hole diagonally.



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- (iii) Assemble the balance of jet pump parts outside gasget (3), housing (4), valve (5) and top plate (6)
- (iv) Repeat paragraph (1) (c) (1) through (viii) above



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E Storage Reservoir - 36 months maximum between examination and retesting

(1) Description

(a) The reservoir is an ICC 3HT-3000 cylinder and valve assembly

(2) Cylinder Pressure check

(a) Cylinder pressure corrected to 70°F should be between 2900 AND 3100 psig (see Section 4, paragraph B)

(b) If the corrected pressure is between 2700 and 2900 psig add gas to raise the pressure to 3000 +/- 100 psig, at 70°F (see paragraph F (2) below)

(c) If the corrected pressure is below 2700 psig, remove the assembly and examine for leaks. Make necessary repairs and recharge to 3000 +/- 100 psig

(3) Disassembly

(a) Remove valve assembly from cylinder (see paragraph F (4) (b) for detailed instructions)

WARNING MAKE SURE CYLINDER IS UNCHARGED BEFORE REMOVING VALVE ASSEMBLY (See paragraph F (3) for instructions)

(4) Cleaning

(a) Clean cylinder in dry cleaning solvent, Federal Specification P-S-661, and dry with compressed air. Blow interior of cylinder dry with compressed air

CAUTION USE A COMPRESSOR EQUIPED WITH A 20 MICRON FILTER AND A MOISTURE AND OIL SEPARATOR

(5) Inspection

(a) Inspect date stamp. If more than three years old the cylinder should be retested and re-dated (see paragraphs (6) and (7))

(b) Inspect threads for cross-threads and stripping

(c) Inspect interior surface for excessive corrosion. Superficial corrosion which is deposited on the surface by rusty water or shallow pit type corrosion is not cause for rejection,



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but steps should be taken to determine the cause and to prevent progressive corrosion. Gross general corrosion or severe corrosion of .005 inches in one area is cause for rejection.

(d) Inspect exterior surface for the following

- (i) Bulging - Bulging of the cylinder is cause for rejection.
- (ii) Dents - Dents are cause for rejection. Judgment should be relied upon to determine what constitutes a dent and what constitutes safe wear as a result of normal usage.
- (iii) Corrosion - The same limits for corrosion apply to the exterior surfaces as stated for the interior surfaces per paragraph (c).
- (iv) Fire Damage - Any evidence of exposure to fire, such as charring or burning of paint, distortion of the cylinder, or burning or melting of the valve, shall be cause for rejection.
- (v) Mechanical Defects - Scratches, cuts, digs, or gouges are causes for rejection, provided they are not just superficial in nature and such that they reduce the wall thickness by more than .005 inches.

(6) Testing

- (a) 3HT cylinders shall be subjected to a hydrostatic test of $1 \frac{2}{3}$ operating pressure for the determination of the expansion of the cylinder at least once every three years. The cylinder must be condemned if the permanent expansion exceeds 10 % of the total expansion or if the elastic expansion on retest exceeds the original elastic expansion by more than 5 %. The original elastic expansion, in cubic centimeters, is stamped on the cylinder near the date of test.

(7) Service Life Limitation

- (a) 3HT cylinders must be removed from service and condemned at the termination of a 12 year period following the date of the original test marked on the cylinder. The cylinder must also be condemned after 4,380 pressurizations.



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F Discharge Valve - 18 months maximum between examinations and retesting

(1) General

- (a) The discharge valve (see Figure 4) is a variable pull angle, lanyard operated, ball type. To recharge the cylinder after discharge actuation, no rework or disassembly of valve parts is required.

(2) Charging Instruction

CAUTION DO NOT CHARGE THROUGH INLET PORT AS THE SEAL MAY BE DISLOCATED AND CAUSE THE VALVE TO LEAK

- (a) Insert the ball end of the discharge cable through the cable port. Using a 3/16-inch allen wrench, in the center of the pulley, turn counterclockwise until pin aligns with align mark on top plate. As the pulley is turned to this position, a sharply audible click will be heard and felt as the detent engages the pulley.
- (b) Attach the charging line to the filler valve, loosen the nut 2 1/4 turns, and pressurize the reservoir to 3000 psig at 70°F. Tighten the nut 2 1/4 turns and remove the charging lines.

CAUTION USE A COMPRESSOR EQUIPPED WITH A LO-MICRON FILTER AND A MOISTURE AND OIL SEPARATOR

(3) Discharge Instructions

- (a) A load of 6 to 15 pounds is required to activate the valve on a charged reservoir.
- (b) A cable travel of 1/2 inch will open the valve to full flow conditions and will permit it to disengage from the pulley.
- (c) The angle of activation is from 60 degrees clockwise to 30 degrees counterclockwise from the point of tangency of the activating cable and pulley.

(4) Disassembly Procedure (Refer to Figure 5)

- (a) Special Tools - No special service tools are required, although overhaul of the discharge valve is materially assisted through the use of the following tools:

Waldes Kohinoor #7 Truarc pliers - 1 pair
16B19080 Tool, "O" ring assembly



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- (b) Remove valve from the uncharged gas reservoir, using 1-5/8 inch open end wrench. See discharge instructions paragraph F (3)
 - (c) Activating Mechanism - Using a small screwdriver, spring the retainer ring (18) from the body (1). Turn valve over so top plate (4), pulley (3), detent stop pin (6) and spring (25) fall out of the cavity
 - (d) Outlet Fitting - Using a 13/16 inch open end wrench, remove the outlet fitting (13) from the body (1). The Teflon seat (21) will be with the outlet fitting
 - (e) Gage Protector Fitting Assembly - Using Waldes Kohinoor #7 pliers, remove retainer ring (19) and lift shell (10) from the body (1). Remove the pressure gage, using a 9/16 inch open end wrench on the gage and 1-3/4 inch open end wrench on the gage protector fitting (9). Use the 1-3/4 inch wrench to remove the gage protector fitting from the body. Also remove ball guide (5), spring (24) and flow ball (12)
 - (f) Bottle Fitting Assembly - Place a 1-5/8 inch open end wrench on the bottle fitting (8) and remove from body (1)
 - (g) Relief Device Assembly - Using a 3/4 inch open end wrench, remove relief device (14) from the body (1)
 - (h) Filler Valve Assembly - Using a 3/4 inch open end wrench, remove the filler valve (17) from the body (1). Turn the body so the pulley side is up. Push gently downward on the shaft (2) and it will disengage from the body and fall free
 - (i) "O" rings and Teflon Parts - Remove all rubber "O" rings (20) from each sub assembly. Also remove Teflon backup ring (22) and seat (21)
- (5) Inspection for Overhaul (Refer to Figure 5)
- (a) Threads - Inspect all parts visibly for damage which would impair their use (such as cross threading or stripping)
 - (b) Coating - Examine for chipping, marring, or removal of coating. If necessary, strip coating and iridite or anodize
 - (c) Ball (12) and Outlet Fitting (13) - These parts are critical with regards to leakage. Inspect ball surfaces and the seat (21) groove for scratches. If scratched, discard and replace with new parts



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- (d) Rubber and Plastic Parts - Discard all rubber "O" rings and the Teflon back-up ring
- (e) Top Plate (4) - Check for damage and legibility Replace if required
- (f) Pulley (3) - Remove and discard the spring pin (27) from pulley Examine actuating cable ball recess for brinelling or wear
- (g) Shaft (2) - Inspect slot in shaft for spreading and "O" ring grooves for scratches
- (h) Cleaning - Degrease and clean all steel parts
- (6) Sub-Assembly Procedure (Refer to Figure 5)

NOTE It is recommended that all sub-assemblies be completed prior to final assembly

- (a) "O" Rings - Coat all "O" rings (20) with a thin film of MIL-H-5606 oil There must be no excess Install one "O" ring on bottle fitting (8), gage protector fitting (9), outlet fitting (13), and relief device (14)
- (b) Outlet Fitting - Place the Teflon seal (21) into its mating groove in the outlet fitting (13) and press firmly into place After assembly, examine the Teflon seat for damage
- (c) Top Plate - Snap bearing (26) into the center hole of the top plate (4) The bearing will be retained in place by its design
- (d) Pulley - Press and bottom detent stop in (27) into the proper groove of the pulley (3) (see Detail on Figure 5) Examine to insure that the detent counterbore is clear
- (e) Shaft - Install the thrust bearing (7) on the shaft (2) and install "O" ring (22) and Teflon back-up ring (23) into their grooves on the shaft
- (f) Lubrication - Fill detent cavity in body (1) and lubricate all threads with grease (MoS -1195, McGee Chemical Company, Upper Darby, Pennsylvania)
- (g) Assembly Drawing Check - Check the assembled components against the proper dash numbers, to insure that the parts of the valve are properly installed



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(7) Assembly Procedure for Model 18D15167-1-3-1 Valve - Final Assemblies (Refer to Figure 5)

- (a) The dash numbers after the model number define the way the valve is assembled to permit its use in a specific application. The first number after the dash defines the position of the cable port, the second number defines the position of the outlet port, and the third number defines the position of the pressure gage. The filler port is located 180 degrees from the activating mechanism. The relief device is then located in the remaining port.
- (b) To determine the location of a particular port, hold the valve so the activating mechanism faces towards you and the bottle fitting port containing the rigid tube is pointing towards the ground. When held in this manner, the bottle fitting port is called position four. The porting and cable positions are then identified as 1, 2, 3 and 4 reading clockwise from the bottle fitting port.
- (c) For the Model 18D18167-1-3-1 valve, the cable port and gage fitting port are in Position 1, the relief device port is in Position 2, the outlet port is in Position 3, and the bottle fitting port is in Position 4. The filler port is in Position 5, 180° from the activating mechanism.



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- (d) Activating Mechanism - Place the spring (25) and the detent stop pin (6) in the counterbore of pulley (3) and depress detent stop in until its small diameter extends through the other side of the pulley. Hold this extended small diameter of the pin to prevent loss of the spring, and place the pulley in the body (1) cavity. While holding the pulley in this position, place the top plate (4) in place and install the retainer ring (18). Using 3/16-inch allen wrench, actuate the pulley to insure that it turns freely and to check the response of the detent. The detent should be audible and felt during this operation. Leave the pulley in the detent position for further assembly.
- (e) Shaft - Insert the shaft (2) through the filler valve port pushing and rotating gently until the slotted end engages the detent stop in (27) in the pulley (3) and the shaft bearing (7) is bottomed in the body counterbore.
- (f) Outlet Fitting - Locate the position of the outlet port by using the cable port as a reference. Insert the outlet fitting (13) and tighten securely using a 13/16-inch open end wrench.
- (g) Ball - Engage the flow ball (12) on the tang of the shaft (2) carefully so that the external ball surfaces are not scratched or damaged.
- (h) Ball Retaining Parts - These retaining parts are installed with the gage assembly, which is opposite the outlet fitting. Place the ball guide (5) against the ball (12) and the spring (24) on the guide.
- (i) Gage Protector Fitting - Insert the gage protector fitting (9) into the gage fitting port and tighten securely using a 1-3/4-inch open end wrench.
- (j) Pressure gage - Tighten the pressure gage into the gage protector fitting (9) using a 9/16-inch open end wrench on the gage and a 1-3/4-inch open end wrench on the fitting. Lubricate threads with Bakerseal (Baker Oil Tools, Inc., Los Angeles, California) or equivalent. Slip shell (10) over the gage and install retainer ring (19). Actuate the ball by means of the allen wrench in the pulley. There must be no binding of parts, the outlet fitting port must be closed, and the hole through the flow ball must be 90 degrees to the outlet fitting when the pulley is in the detented position.

NOTE A proof pressure test, paragraph (9) must be run after assembly of the valve before the relief device is installed and before the pressure gage is installed if the pressure gage is not rated to 5000 psig.



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Immediately after this test, install the pressure gage as in (j) above the relief valve as in (k) below

- (k) **Relief Device** - The relief device (14) is installed in the relief device assembly port, however, before installing it in the valve, plug the port and run the proof pressure test defined in paragraph (8). Immediately after running the proof pressure test, install the relief device and tighten securely to 40 +/- 10 inch-pounds
 - (l) **Bottle Fitting** - If the water eliminator tube (11) was removed or replaced, install it in its special port in the bottle fitting (8) using an appropriate strap wrench. Insert the bottle fitting and tighten securely using a 1-5/8-inch open end wrench
 - (m) **Filler Valve** - Install the filler valve (17) in the filler valve assembly port using a 3/4-inch open end wrench
 - (8) **Proof Pressure Test** - Remove the relief device and pressure gage (if not rated for 5000 psig service) and plug these ports. Apply 5000 psig hydrostatic pressure to the closed valve using rust inhibited water. The unit must not leak or rupture during a two-minute test period. Remove pressure and test plugs, blow out moisture in the valve, and reinstall the relief device and pressure gage as above
- NOTE** This test need not be performed more than once every three years unless a new valve body is installed
- (9) **Leak Test** - Apply 3000 psig gas pressure to the closed valve. Immerse in rust inhibited water for three minutes and check for bubbles indicating a leak. No visible leakage is permitted
- CAUTION** DO NOT SUBMERGE THE PRESSURE GAGE LENS. IF WATER ENTERS THE CASE, IT IS VERY DIFFICULT TO REMOVE
- (10) **Activating Force** - Discharge the 3000 psig gas by pulling on the release cable in the direction that the cable leaves the cable port without rubbing on the sides of the port. When tested in this manner, the pull force shall not exceed 15 pounds

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6 PREPARATION FOR USE, STORAGE, OR SHIPMENT

A Uncrating

- (1) Use normal precautions when uncrating to prevent damage to the components of the inflatable escape slide assembly. Remove all packaging materials and protective coverings.

CAUTION DO NOT DROP THE ESCAPE SLIDE OR DAMAGE THE FABRIC

- (2) Check that all components, connections, and fittings are secure. Check that the gas cylinder is filled to the correct pressure.

B Storage

- (1) Store the escape slide in a cool, dry location (avoid moisture). Keep temperature constant, allowing only for normal variations due to seasonal weather changes. If the escape slide is stored in a warm, damp climate, it should be inspected as often as good maintenance practice allows.

- (2) Should the slide show signs of dampness, lay it out until dry.

- (3) During storage, the escape slide should be handled with extreme care so as not to chafe, cut, or otherwise damage the fabric surface.

CAUTION NEVER AN ESCAPE SLIDE, WHETHER PACKED OR UNPACKED

C Packing (Refer to Figure 6)

NOTE Read entire procedure before attempting to pack the evacuation system.

CAUTION THE PACKING AREA MUST BE CLEAN AND COVERED WITH A TARPAULIN, CARPETING, OR OTHER PROTECTIVE COVERING. DO NOT WALK ON THE ESCAPE SLIDE.

- (1) Inflate the slide to relief valve operating pressure, while the slide is in an upside down position.
 - (a) Check that the pressure in the gas reservoir is 3000 +/- 100 psig.
 - (b) Install the gas reservoir with the gage facing away from the girt. Snap the retaining strap around the end of the cylinder. Make hose connection, insuring that the hose has no forced bends or kinks.



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D Shipping

- (1) For domestic shipment, pack the inflatable escape slide assembly in the original container or equivalent

CAUTION SPECIAL CARE MUST BE TAKEN NOT TO DROP THE ESCAPE SLIDE OR DAMAGE THE FABRIC

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7 ILLUSTRATED PARTS CATALOG

A Introduction

- (1) This illustrated parts catalog lists the replaceable parts for Air Cruisers slides of part numbers 20D22483-7 and -8

Although slightly damaged areas in the fabric can be repaired in the field, replacement of a full part, such as a tube, the floor etc , should not be done in the field, since the operating integrity of the slide could not be guaranteed by the manufacturer if this were done. This same rule applies to any part cemented to the fabric, such as handles, tapes, Velcro, and girt, since in their removal from their original position, they may have damaged the fabric to which they had been attached. Large areas on the floor (holes larger than two inches or tears longer than three inches) should not be replaced in the field, since the sliding efficiency or dissipation of static electricity might be impaired.

The hardware on a slide is replaceable. This includes such items as the relief valve, jet pumps, gas reservoir system, the container and their various subassemblies and associated equipment.

Replacement instructions, where needed, may be found in the Evacuation System Manual, Section 5, Maintenance, Repair and Overhaul.

- (2) The 225-inch slide, Air Cruisers part numbers 20D22483-7 and -8 are referred to in the Numerical Index and Detailed Parts List as slides A and B respectively.
- (3) The escape slides are used in Boeing 707/720 series aircraft as follows:

<u>Floor Mount</u>	<u>Slide P/N</u>	<u>Designation</u>	<u>Type of Inflation</u>
L H Sta 990	20D22483-7	A	Manual
R H Sta 990	20D22483-8	B	Manual

- (4) Many of the parts listed in the Detailed Parts list and the Numerical Index can be used interchangeably. All slides are called out under the "Effectivity" column in the Detailed Parts List (and the "Slide Number" column in the Numerical Index).
- (5) Items are listed in the Numerical Index, in sequence, by AN, MS, or Air Cruisers part number. The sequence is by the three or four digit AN number, and the five digit MS number, or four or five digit Air Cruisers number.



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The Detailed Parts List begins with the two applicable slide part numbers and the major replaceable items on each. Figures 2, 3, 5 and 7, for the Relief Valve, Jet Pump, Discharge Valve and Reservoir Assembly respectively are included and their sub-parts are listed.

The "Total Required" column in the Numerical Index and the "Units per Assembly" column in the Detailed Parts List refer to the number of each particular sub-part repaired for use in the major heading above, and not to the number of units per aircraft. For example, a slide may have two identical jet pumps, and each jet pump has 14 mounting screws and washers.

- (6) All parts listed in the Numerical Index and Detailed Parts List are standard AN or MS parts, or are available under an Air Cruisers part number.

Other materials which might be required are Air Cruisers fabric, codes M-11287 or M-11297; commercial solvents toluol and ethyl acetate or methyl ethyl ketone; cement per Air Cruisers Specification M-11055 Style R, aluminum paint per Air Cruisers Specification M-11105; Air Cruisers M-11055 Style P sealant for sealing the relief valve piston guide; molybdenum disulfide grease, MoS₂-1195 from McGee Chemical Company, Upper Draby, Pennsylvania, for filling the detent cavity in the discharge valve; and Bakerseal, from Baker Oil Tools, Inc., Los Angeles, California, or equivalent, for lubricating threads on the gas reservoir pressure gage and other pipe threads; and nylon-coated 1/16-inch cable per Air Cruisers Specification M-11241-1, for the gas release cable.

- B. The Numerical Index is identified as Figure 8 to maintain sequence of figures numbers in the entire Evacuation Systems Manual.
- C. The Detailed Parts List is identified as Figure 9 for the same reason.