

GROUP A 3

LOCATION OF EQUIPMENT

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Introduction

1. Reference should be made to this group when it is required to locate and obtain access to the various electrical components installed in this aircraft. The group contains a master index of all the electrical equipment, together with illustrations showing the location of the components and the panels used to gain access. This index also forms the key to the illustrations as each component is given an item number and grid reference. Illustrations giving the layout of the cable assemblies for use in conjunction with the routeing diagrams are also included.

Location of electrical equipment

2. The location of the electrical equipment in this aircraft is illustrated in fig.1 to 5 inclusive. These illustrations should be used in conjunction with the master index of electrical equipment given in Table 1, when it is required to locate any item of equipment.

Access to electrical equipment

3. The position on the aircraft of all the access panels which require opening or removing to gain access to the electrical equipment, are given in fig.6. The illustration should be used in conjunction with

Table 1 when it is required to obtain access to a particular component.

Master index of electrical equipment

4. This master index, given in Table 1, should be employed in conjunction with the location and access panel illustrations, when it is required to find the location and access to the various electrical components. The components are listed under the circuit in which they are employed and each item is referenced by a number corresponding to that given in the location and access panel illustrations. The illustration on which the components are shown are also indicated in the index and the

grid references are likewise given to assist in locating the items on the illustrations.

Cable assembly layout

5. The run of the cable assemblies between the various junction boxes,

panels, terminal blocks and the equipment is illustrated diagrammatically in fig.7 to 9. The illustrations also give the cable assembly, terminal block and earth point references and should be used in conjunction with the routeing diagrams when it is required to trace the run of the cable assemblies throughout the aircraft.

TABLE 1

MASTER INDEX OF ELECTRICAL EQUIPMENT

ITEM	EQUIPMENT	FIG.	GRID REF.	ITEM	EQUIPMENT	FIG.	GRID REF.
MAJOR COMPONENTS							
1	J.B.1	3	C.4	17	ARM J.B.6	5	H.6
2	J.B.2	1	A.5	18	ARM J.B.7	2	G.3
3				19	ARM J.B.8	2	G.3
4				20	Reconnaissance Camera JB	2	B.4
5	A.C. J.B.	2	F.2	21	Reconnaissance Camera Control Box	1	A.1
6	Supply panel	2	H.3	22			
7	Generator control panel	2	H.3	23			
8	Leg panel	1	D.4	24			
9	Tacan A.C. supply panel	2	G.3	25			
10	Cabin port shelf	1	C.4	GENERATORS AND BATTERIES			
11	Cabin starboard shelf	1	F.4	26	Generators	3	F.4
12	ARM J.B.1	3	A.3	27	Main batteries	2	H.3
13	ARM J.B.2	2	F.2	28	External supply plug	2	H.3
14	ARM J.B.3	5	C.5	29	Battery master switch..	1	D.4
15	ARM J.B.4	5	B.6	30	Power failure warning lamps	1	E.3
16	ARM J.B.5	5	G.5	31	Power failure indicators	2	On item 7
				32	Main circuit breakers	2	On item 7

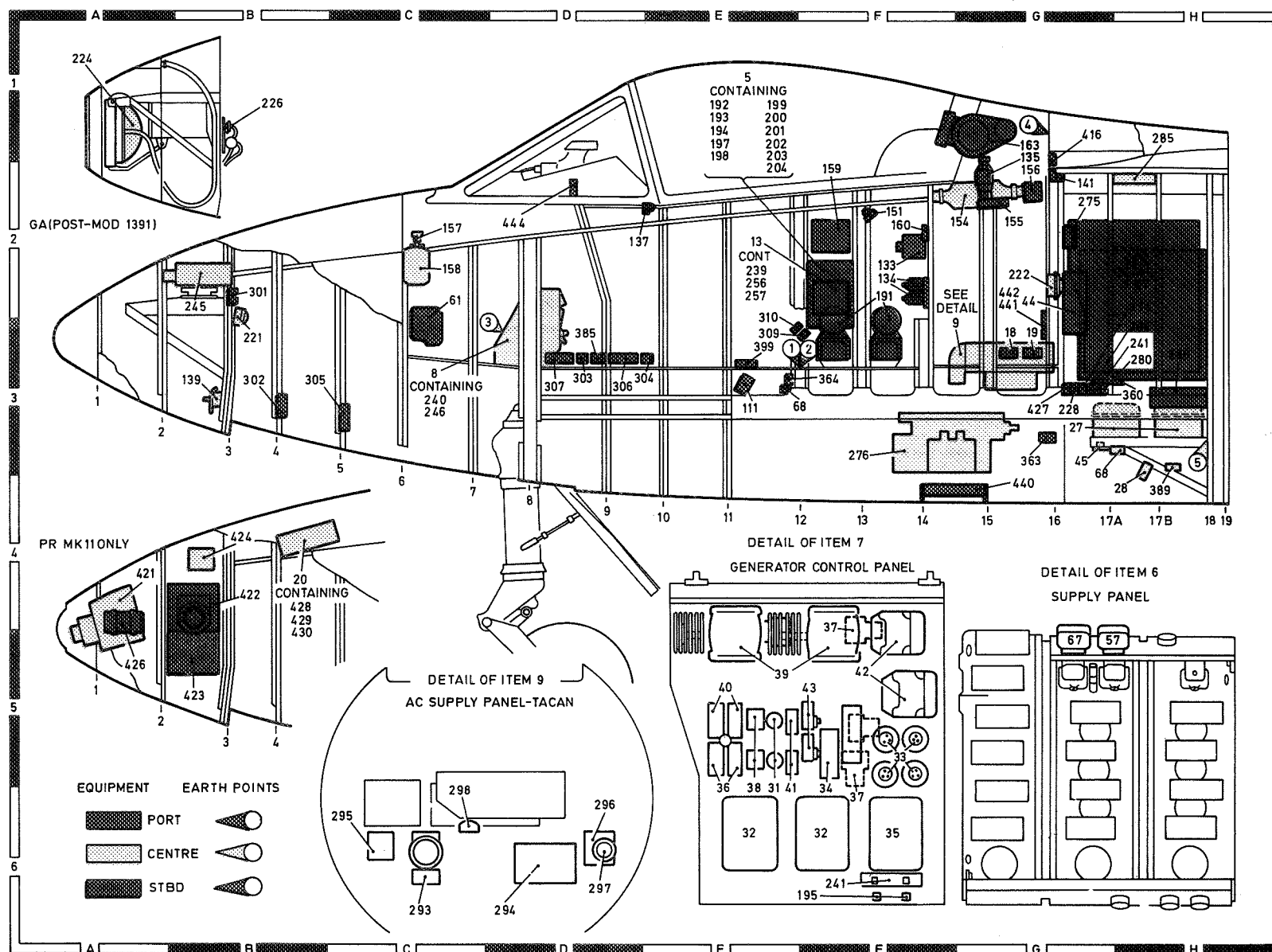


Fig. 2 Equipment location-front fuselage
(Mod 1468 added)

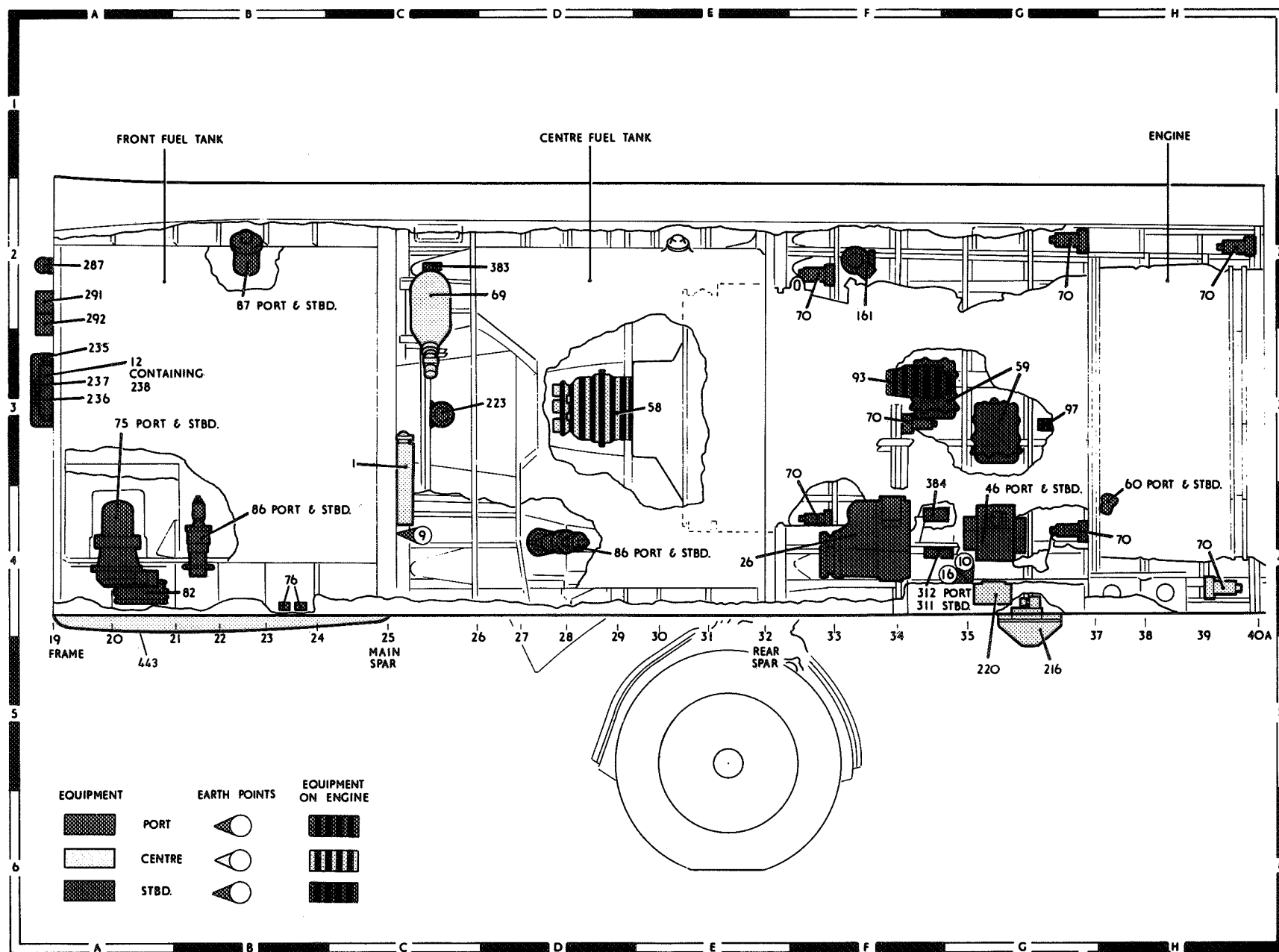


Fig. 3 Equipment location - centre fuselage
(Mod 1468 added)

TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.
33	Ammeter and voltmeter test sockets..	2	On item 7
34	Ammeter shunts	2	On item 7
35	Battery relay	2	On item 7
36	Hold off relays	2	On item 7
37	Regulator relays	2	On item 7
38	Reset switches	2	On item 7
39	Voltage regulators	2	On item 7
40	Crash relays... ..	2	On item 7
41	Field circuit breakers	2	On item 7
42	Differential cut-outs	2	On item 7
43	Remote voltage trimmers	2	On item 7
44	Standby batteries	2	G.2
45	Battery volt test socket	2	H.3
46	Suppressors... ..	3	G.4
47			
48			
49			
50			
51			

ENGINE STARTING

52	Starter selector switch	1	E.4
53	Ignition isolating switch	1	E.4
54	Master switch	1	E.4
55	Re-light switch	1	C.5

ITEM	EQUIPMENT	FIG.	GRID REF.
56	Starter circuit breaker..	1	H.5
57	Ignition relay	2	In item 6
58	Starter	3	D.3
59	High-energy ignition units	3	G.3
60	Ignition plugs	3	H.4
61	Time switch... ..	2	C.2
62			
63			
64			
65			

FIRE WARNING AND EXTINGUISHER

66	Fire warning lamp and extinguisher switch	1	F.2
67	Relay X	2	In item 6
68	Inertia switches	2	H.3
69	Extinguisher bottle	3	C.2
70	Flame switches	3 & 4	H.2, H.4, G.2, G.4, F.2, F.3, F.4, B.4, B.5.
71	Test switch	1	F.2
72			
73			
74			

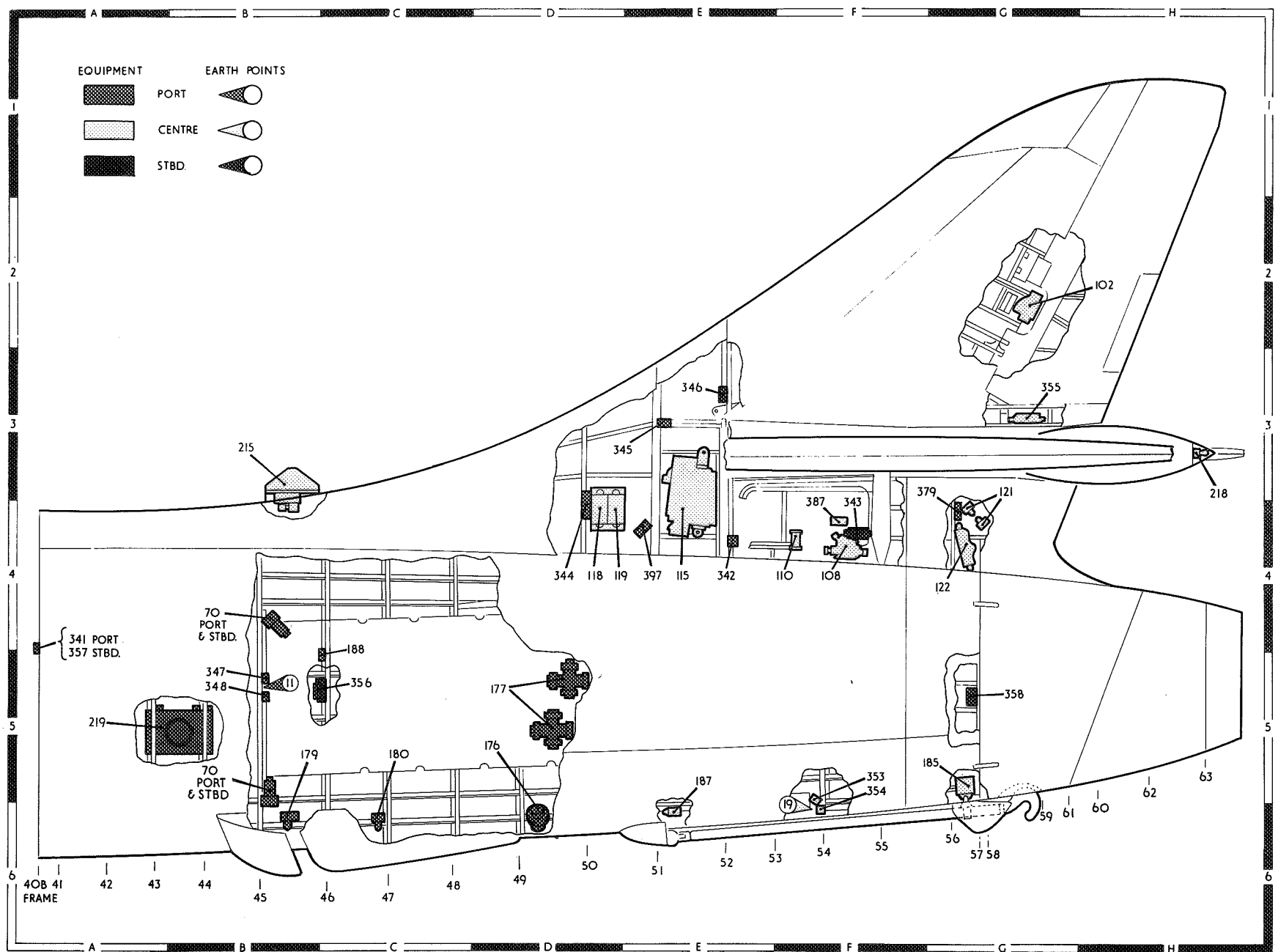


Fig.4 Equipment location — rear fuselage
▶ (Mod 1443 added) ◀

TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.
TANK PUMPS AND FAILURE WARNING			
75	Pumps	3	A.4
76	Fuel pressure switches	3	B.4
77	Circuit breakers	1	H.5
78	Control switches	1	G.4
79	Ammeter test socket	1	H.5
80	Test switch	1	H.6
81	Transfer failure warning indicators ...	1	F.4 & G.4
82	Suppressors	3	A.4
83	Pump failure warning lamps	1	G.4
84			
PRESSURE REFUELLING			
85	Time switch..	5	D.4
86	Solenoid valves	3	D.4
87	Fluid level switches	3 & 5	B.2; C.4; D.4 F.4, G.4
88			
89			
90			
ENGINE ANTI-ICING			
91	Switch	1	F.3
92	Magnetic indicator	1	F.3
93	Gate valve actuator	3	F.3

ITEM	EQUIPMENT	FIG.	GRID REF.
94			
95			
EMERGENCY FUEL PUMP			
96	Switch	1	C.4
97	Engine fuel pump solenoid	3	G.3
98	Warning lamp	1	C.4
99			
100			
RUDDER AND AILERON TRIM CONTROLS			
101	Trim switch	1	C.4
102	Rudder tab actuator	4	G.2
103	Aileron tab actuator	5	B.6
104			
105			
ELEVATOR AND AILERON POWER CONTROLS			
106	Selector switches	1	C.2
107	Magnetic indicators	1	C.2
108	Elevator solenoid valve	4	F.4
109	Aileron solenoid valve	5	F.4
110	Hydraulic pressure switches	4 & 5	F.4 - F.5
111	Power controls junction box.. ...	2	E.3
112			
113			

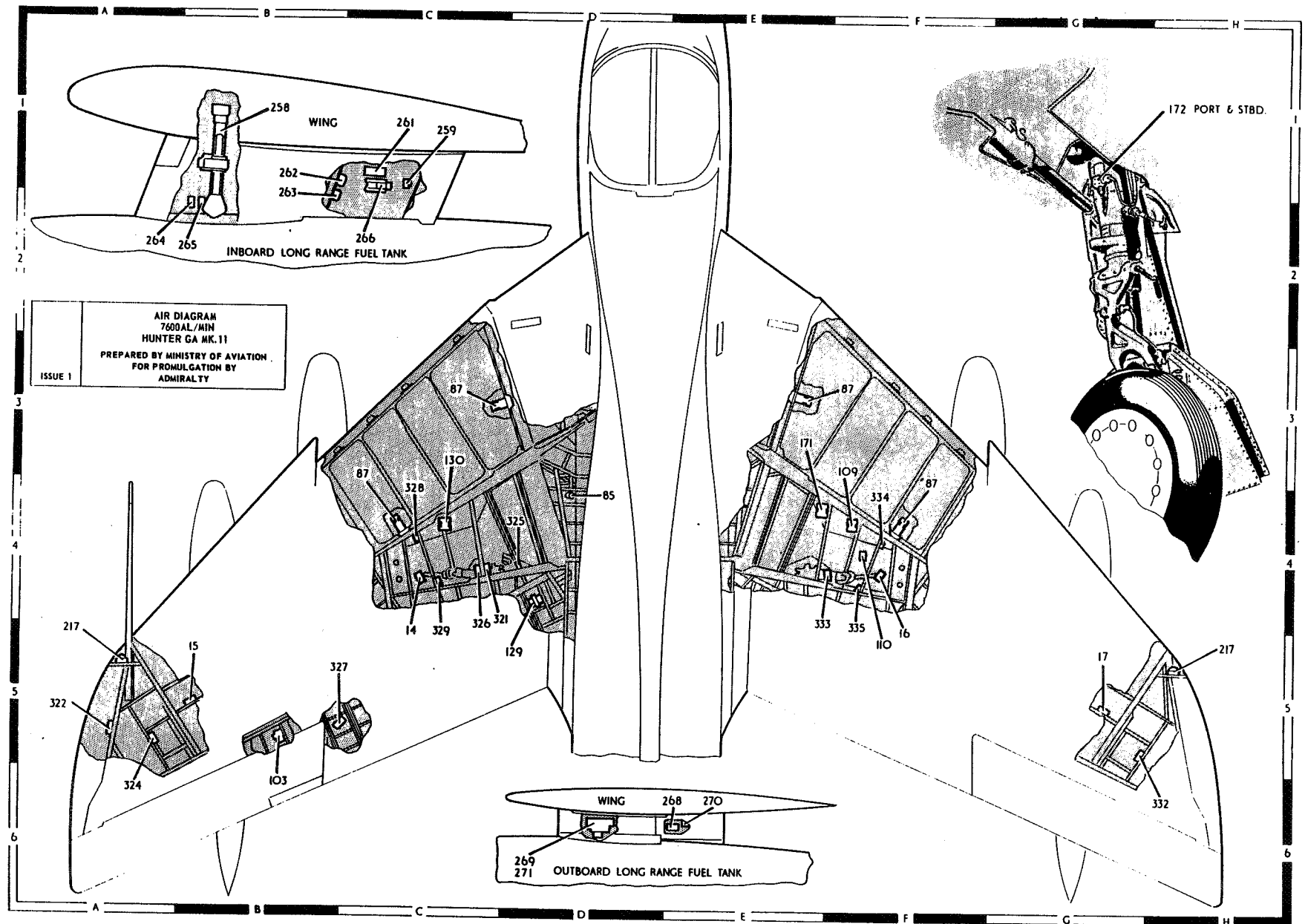


Fig.5 Equipment location — main plane

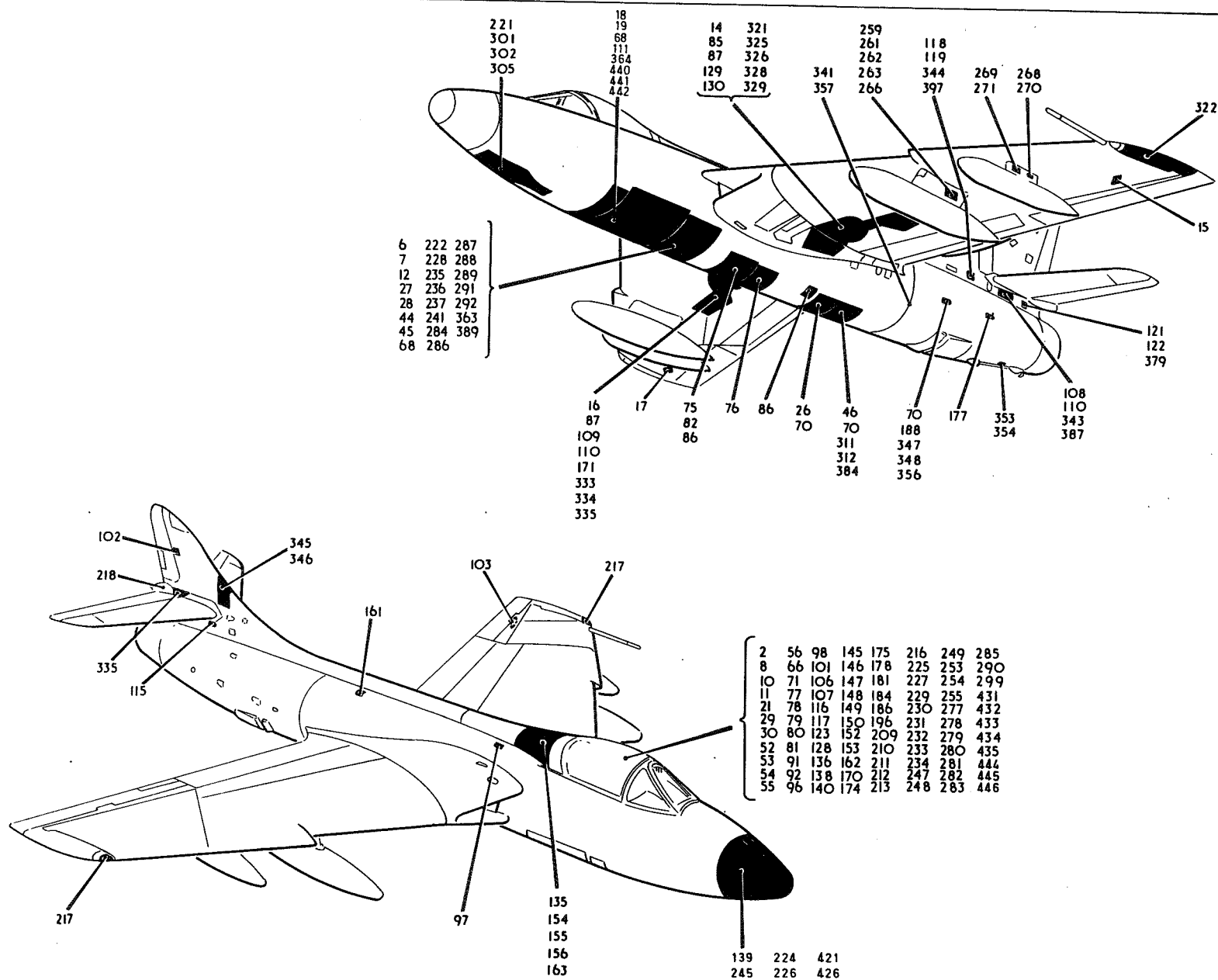


Fig. 6 Access panels
(general amendment)

TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.	ITEM	EQUIPMENT	FIG.	GRID REF.
114				135	Hood seal valve	2	G.2
TAIL PLANE CONTROL				136	Control switch	1	B.2
115	Tail plane actuator	4	E.3	137	Close limit switch.. ...	2	F.2
▶ 116	Normal control switch... ..	1	E.3 ◀	138	Circuit breaker	1	A.6
117	Standby control switch	1	C.4	139	External control switch. ...	2	B.3
118	Main contactor	4	D.3	140	Selector plugs	1	B.4
119	Standby contactor	4	D.3	141	Open limit switch... ..	2	G.2
120	Tail plane selector switch ...	1	C.4	142			
121	Flying tail micro-switches ...	4	F.3	143			
122	Datum actuator	4	F.4	144			
123	Circuit breaker	1	C.4	CABIN PRESSURIZATION & TEMPERATURE CONTROL			
124				145	Pressurization control switches ...	1	B.5
125				146	Temperature control switch	1	B.5
126				147	Temperature selector	1	B.5
127				148	Flood switch... ..	1	B.5
FLAP CONTROL				149	Hood interlock relay 'K'	1	B.6
128	Selector switch	1	C.3	150	Flood control relay 'H'	1	B.6
129	Drum follow-up switch... ..	5	D.5	151	Ductstat... ..	2	
130	Solenoid valve	5	C.4	152	Altitude switch	1	A.6
131				153	Pressure warning and flood test		
132					switch	1	A.6
HOOD CONTROL				154	Temperature control valve		
133	Hood motor	2	F.2		actuator	2	G.2
134	Relay unit	2	F.2	155	Suppressor	2	G.2

TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.
156	Follow-up resistor	2	
157	Cabin element	2	C.2
158	Cabin pressure control valve	2	C.2
159	Magnetic amplifier	2	F.2
160	Extractor solenoid	2	F.2
161	Air supply valve actuator	3	F.2
162	Pressure warning lamp..	1	F.3
163	Auxiliary discharge valve	2	G.1

164

165

166

167

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169

ALIGHTING GEAR CONTROL

170 Control push-switches 1 C.3

171 Solenoid valve 5 F.4

172 Alighting gear compression
switches 5 H.2

173

AIRBRAKE CONTROL

174 Control switch 1 C.4

175 Air brake relay box 1 A.3

176 Pressure switch 4 D.5

ITEM	EQUIPMENT	FIG.	GRID REF.
177	Solenoid valves	4	D.5
178	Magnetic indicator	1	
179	Forward micro-switch	4	B.6
180	Aft micro-switch	4	C.6
181	Test switch	1	A.3

182

183

ARRESTING HOOK CONTROL

184 Control switch 1 C.3

185 Release unit 4 G.5

186 Warning lamp 1 C.3

187 Hook microswitch 4 E.5

188 Test socket 4 B.4

189

190

A.C. SUPPLIES

191 Inverters 2 F.3

192 Torque switches 2 In item 5

193 Suppressors... .. 2 In item 5

194 Auto-transformer 2 In item 5

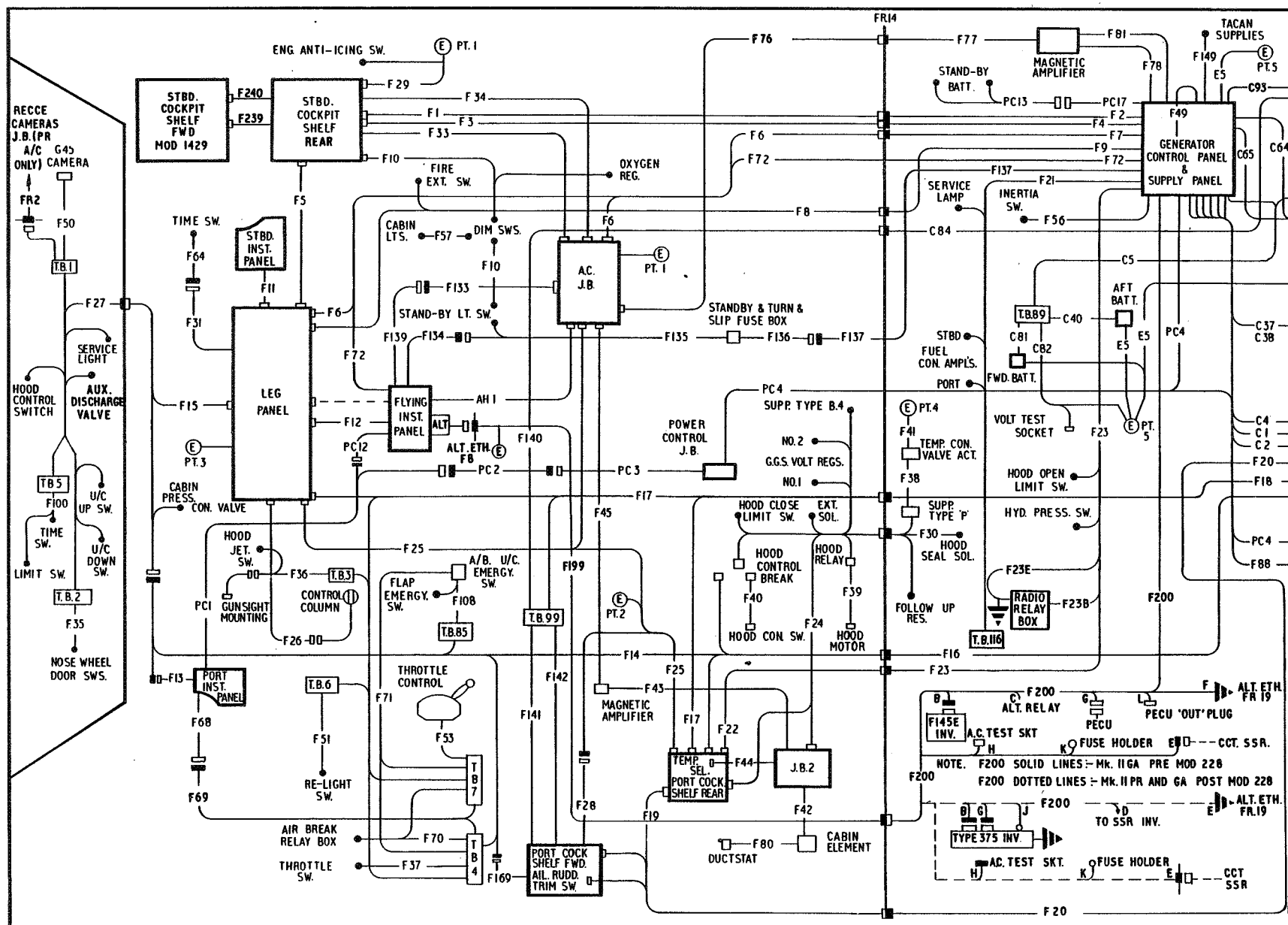
195 Standby test switch 2 In item 5

196 Normal supply failure indicator... .. 1 D.2

197 Normal circuit breaker 2 In item 5

TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.	ITEM	EQUIPMENT	FIG.	GRID REF.
198	Standby circuit breaker	2	In item 5	218	Tail lamp	4	H.3
199	Relay A... ..	2	In item 5	219	Upper power unit (Mod 1443)	4	B.5
200	Relay B... ..	2	In item 5	220	Lower power unit (Mod 1443)	3	G.4
201	Relay C... ..	2	In item 5	SERVICING LAMPS			
202	Relay D... ..	2	In item 5	221	Nose bay lamp	2	B.2
203	Relay E... ..	2	In item 5	222	Radio bay lamp	2	G.2
204	Relay F... ..	2	In item 5	223	Starter bay lamp	3	C.3
205				NOSE LAMP (Mod 1391)			
206				224	Harley lamp	2	A.1
207				225	Lamp switch	1	G.4
208				226	Magnetic relay	2	B.1
CABIN LIGHTING				227	Warning lamp	1	G.4
209	Dimmer switches	1	H.2	228	Circuit breaker	2	G.3
210	U/V lamps	1	C.3	GUN FIRING			
211	Red lamps	1	A.5, B.4, C.2, F.2, F.3, G.4, G.5	229	Firing trigger	1	E.3
212	Standby lamps	1	C.2, F.2	230	Armament ground test switch	1	H.5
213	Standby lamps switch	1	F.3	R.P. FIRING			
NAVIGATION AND ANTI-COLLISION LAMPS				231	Bomb/R.P. push-switch	1	F.3
214	Control switches	1	F.4	232	Bomb/R.P. selector switch	1	C.3
215	Upper anti-collision lamp unit (Mod 1443)	4	B.3	233	R.P. selector switch (Post Mod 229 only)	1	D.2
216	Lower anti-collision lamp unit (Mod 1443)	3	G.4	234	Ripple/Normal switch (Post Mod 229 only)	1	D.2
217	Wing-tip lamps	5	A.5, J.5	235	R.P. firing distribution box (Post Mod 229 only)	3	A.3



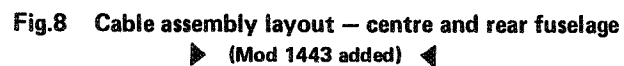


TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.	ITEM	EQUIPMENT	FIG.	GRID REF.
236	Reset push-switch	3	A.3	255	Fuzing selector switch	1	C.3
237	Reset indicator	3	A.3	256	Arm relay A	2	In item 13
238	Rippling relay (Post-Mod 229 only) ...	3	In item 12	257	Arm relay B	2	In item 13
239	Arm relay C	2	In item 13	258	Release units	5	B.1
240	Arm relay S	2	In item 8	259	Cock test socket	5	C.1
241	Circuit breaker	2	G.3	260			
242				261	Inboard pylon T.B.1	5	C.1
243				262	E.R.U. relay 'C'	5	B.1
244				263	E.R.U. relay 'D'	5	B.1
CAMERA GUN (<i>Pre-Mod 1391 only on GA a/c</i>)				264	Fuel high level switch plockets..	5	A.2
245	Camera gun	2	B.2	265	Fuel low level switch plockets...	5	A.2
246	Gyro caging and camera relay U ...	2	In item 8	266	E.R.U. safety break	5	C.1
247	Camera master switch	1	D.4	267			
248	Sunny/Cloudy switch	1	F.3	268	Outboard pylon T.B.1....	5	E.6
249	Camera push-switch	1	F.3	269	Outboard pylon slip release	5	D.6
250				270	Outboard pylon cock test socket ...	5	E.6
251				271	Jettison solenoid... ..	5	D.6
252				272			
PYLON STORES RELEASE AND JETTISON				273			
253	Clear aircraft push-switch (Post-Mod 229 only)	1	D.2	274			
254	Inner pylon stores jettison push-switch (Pre-Mod 229) or			RADIO AND RADAR SUPPLIES			
	Outer pylon stores jettison push-switch (Post Mod 229)	1	C.3	▶ 275	UHF-VHF selector relay box (Mod 1429)	2	G.2
				276	VHF transceiver and amplifier (Mod 1429)	2	F.3 ◀
				277	U H F normal/standby switch	1	C.2
				278	U H F press-to-transmit switch	1	C.4

TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.	ITEM	EQUIPMENT	FIG.	GRID REF.
279	Emergency press-to-transmit			300			
	switch	1	C.2		(For positioning of I F F /S S R components fitted post Mod 1319 see Sect.6, Chap.2, App 2, Fig.1)		
280	Normal/battery switch... ..	1	C.2				
281	Channel change-over switch	1	C.2		TERMINAL BLOCKS		
282	Tele-briefing push-switch	1	C.4	301	T.B.1	2	B.2
283	Tele-briefing indicator lamp	1	C.4	302	T.B.2	2	B.3
284	U H F circuit breaker	2	H.3	303	T.B.3	2	D.3
285	Filter unit, dc (Mod 1480)	2	H.1	304	T.B.4	2	E.3
286	I F F inverter (pre-Mod 1319)	2	H.3	305	T.B.5	2	C.3
287	I F F altitude switch (pre Mod 1319)	3	A.2	306	T.B.6	2	D.3
288	ARC 52 circuit breaker (pre-Mod 1480) PTR1751 circuit breaker (post-Mod 1480)	2	G.3	307	T.B.7	2	D.3
289	IFF/SSR circuit breaker	2	G.3	308			
290	U H F tone switch	1	B.4	309	T.B.9	2	F.3
291	I F F fuse box (pre Mod 1319) ...	3	A.2	310	T.B.10	2	F.3
292	I F F suppressor (pre-Mod 1319)	3	A.2	311	T.B.11	3	F.4
293	Tacan inverter	2	On item 9	312	T.B.12	3	F.4
294	Tacan inverter control panel ...	2	On item 9	313			
295	Tacan A.C. J.B.	2	On item 9	314			
296	Starter unit	2	On item 9	315			
297	Relay	2	On item 9	316			
298	Thermal delay unit	2	On item 9	317			
299	Tacan indicator and switches ...	1	E.3	318			

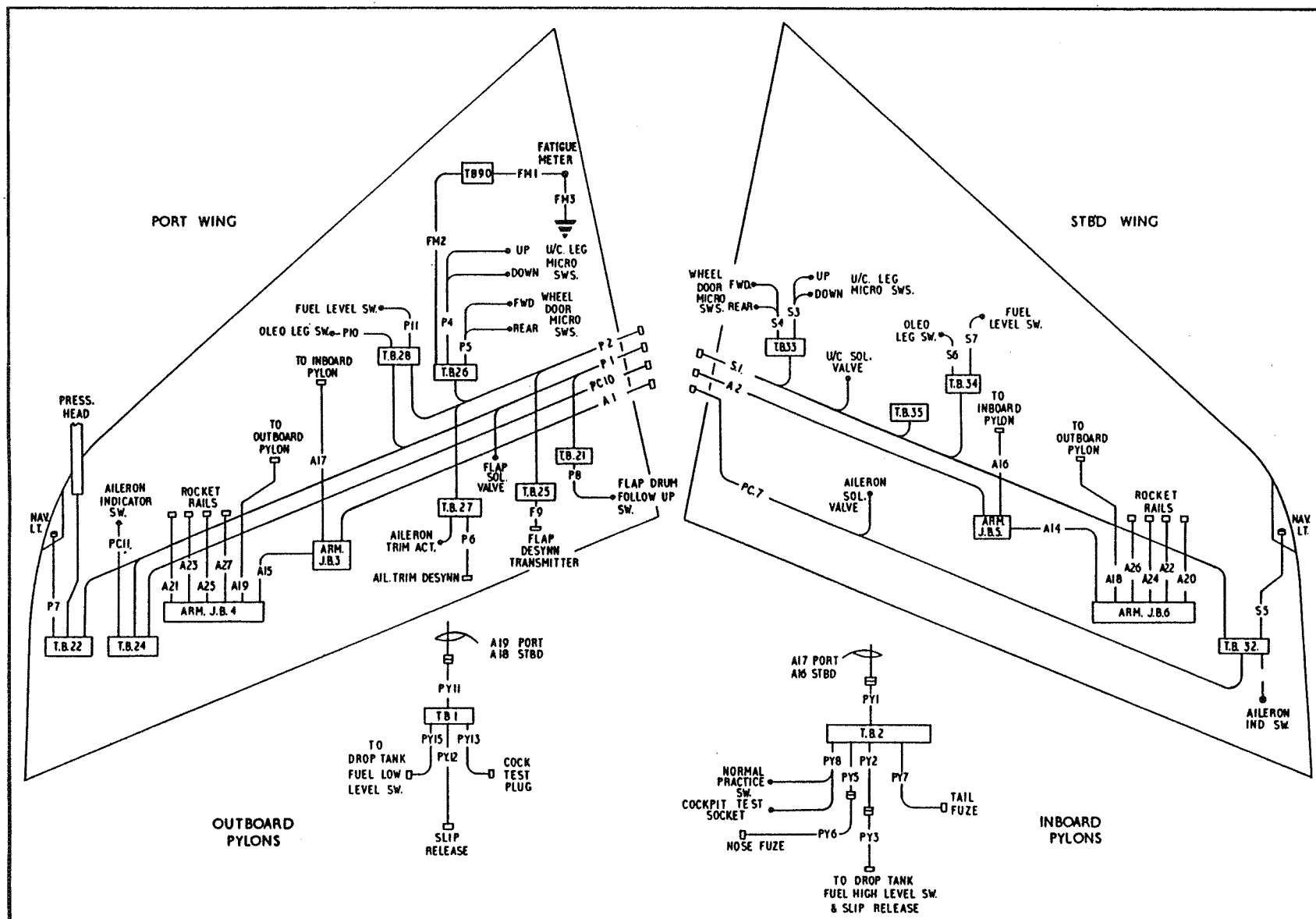


Fig.9 Cable assembly layout – wings and pylons

TABLE 1 Continued

ITEM	EQUIPMENT	FIG.	GRID REF.	ITEM	EQUIPMENT	FIG.	GRID REF.
319				344	T.B.44	4	D.4
320				345	T.B.45	4	D.3
321	T.B.21	5	D.5	346	T.B.46	4	E.3
322	T.B.22	5	A.6	347	T.B.47	4	B.5
323				348	T.B.48	4	B.5
324	T.B.24	5	A.6	349			
325	T.B.25	5	D.5	350			
326	T.B.26	5	D.5	351			
327	T.B.27	5	C.6	352			
328	T.B.28	5	C.5	353	T.B.53	4	E.5
329	T.B.29	5	C.5	354	T.B.54	4	F.5
330				355	T.B.55	4	G.3
331				356	T.B.56	4	B.5
332	T.B.32	5	H.6	357	T.B.57	4	A.4
333	T.B.33	5	F.5	358	T.B.58	4	F.5
334	T.B.34	5	E.5	359			
335	T.B.35	5	F.5	▶ 360	T.B.60	2	G.3 ◀
336				361			
337				362			
338				363	T.B.63	2	G.3
339				364	T.B.64	2	F.3
340				365			
341	T.B.41	4	A.4	366			
342	T.B.42	4	E.4	367			
343	T.B.43	4	F.4	368			

TABLE 1 - continued

ITEM	EQUIPMENT						FIG.	GRID REF.	ITEM	EQUIPMENT						FIG.	GRID REF.
369									394								
370									395								
371									396								
372									397	T.B.97	...	...	...	...	...	4	D.4
373									398								
374									399	T.B.99	...	...	...	...	...	2	E.3
375									400								
376									401								
377									402								
378									403								
379	T.B.79	...	...	...	...	...	4	F.3	404								
380									405								
381									406								
382									407								
383	T.B.83	...	...	...	...	...	3	C.2	408								
384	T.B.84	...	...	...	...	...	3	F.4	409								
385	T.B.85	...	...	...	...	...	2	D.3	410								
386									411								
387	T.B.87	...	...	...	...	...	4	F.4	412								
388									413								
389	T.B.89	...	...	...	...	...	2	H.3	414								
390									415								
391									416	T.B.116	...	...	...	...	...	2	G.1
392									417								
393									418								
									419								

TABLE 1 - continued

ITEM	EQUIPMENT	FIG.	GRID REF.
420			
PHOTOGRAPHIC RECONNAISSANCE CAMERAS			
421	Forward camera	2	A.4
422	Port camera	2	B.4
423	Starboard camera	2	B.5
424	Intervalometer	2	B.4
425			
426	Eyelid actuator	2	A.4
427	Camera 45 amp. circuit breaker	2	G.3
428	Relays	2	In item 20
429	Rectifiers	2	In item 20
430	Resistors	1	In item 20
431	Remote film indicators	1	In item 21
432	Camera speed switches	1	In item 21
433	Iris control switch	1	In item 21
434	Intervalometer switch1	1	In item 21
435	Warning lamps	1	In item 21
436			
437			
438			
439			

ITEM	EQUIPMENT	FIG.	GRID REF.
▶ RADAR ALTIMETER			
440	Transmitter/receiver		
441	Tone generator		
442	Amplifier		
443	Aerials		
444	Indicator		
445	Low warning lights		
446	Master switch		
447	Dimmer		
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