

CHAPTER 22

AUTOPILOT

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22-1	(Pitch) Servo Assembly Installation and Components	22.0
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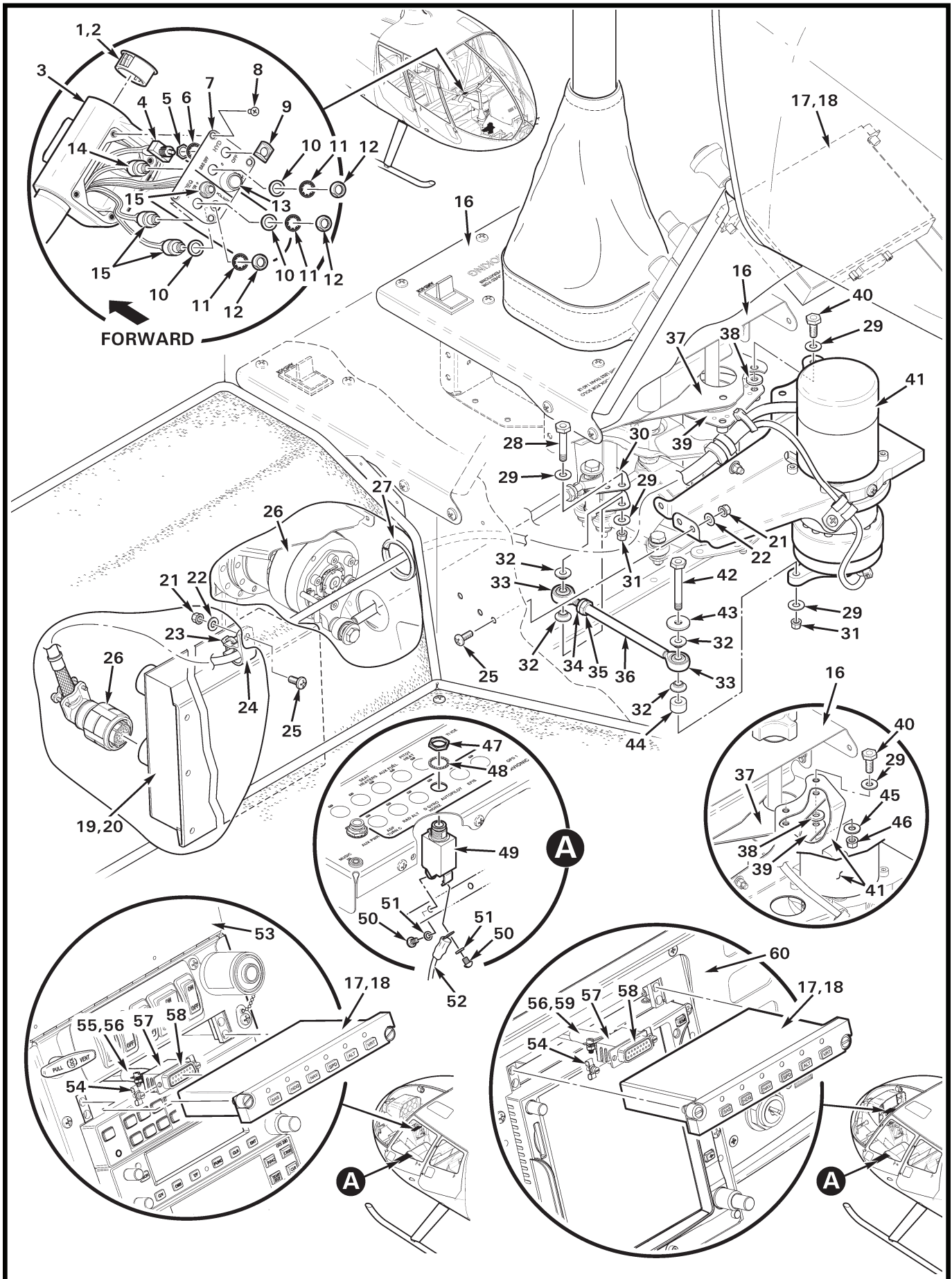


FIGURE AND INDEX NUMBER	PART NUMBER	DESCRIPTION	PARTS AVAIL	QTY PER ASSY
		(PITCH) SERVO ASSEMBLY INSTALLATION AND COMPONENTS		
22-1-1	2703	Hole Plug (install using item 2)	X	1
2	B270-15	Adhesive	X	A/R
3	C058-16	Grip Assembly (Incl items 1, 2, 4, 7 thru 9, and 13 thru 15) . .	X	1
4	B300-3	Switch Assembly – “HYD OFF” (Incl items 5 and 6)	X	1
5	—	Nut	O	1
6	—	Lockwasher	O	1
7	C214-27	Plate	X	1
8	MS24693-S1	Screw	X	4
9	D443-7	Guard	X	1
10	94773A770	Washer	X	5
11	B227-3	Lockwasher	X	5
12	B227-4	Dress Nut	X	4
13	B227-8	Switch Assembly – “TRIM” (includes items 10 [1], 11 [1] P/N 702501201 dress nut, and P/N 801801000 cap)	X	1
14	B227-7	Switch Assembly – “AP OFF” (Incl items 6, 10 [1], 11 [1], and 12 [1])	X	1
15	B227-2	Switch Assembly – “FREQ” (Incl items 10 [1], 11 [1], and 12 [1])	X	3
16	F444	Cover Assembly – Cyclic (Ref)		
17	01309-03-01*	Control Panel (For Software Version 52; used only with item 19.)	X	1
18	01309-01-01*	Control Panel (For Software Version 51; used only with item 20, not shown.)	X	1
19	01311-02-111*	Flight Control Computer (For Software Version 52; used only with item 17, Ref.)		
20	01311-03-11*	Flight Control Computer (For Software Version 51. Used only with item 18, not shown; Ref.)		
21	MS21042L08	Nut	X	4
22	NAS1149FN832P	Washer	X	4
23	MS3367-5-9	Ty-Rap	X	A/R
24	M23190/1-2	Clamp	X	1
25	MS27039C0806	Screw	X	4
26	01317-4*	Servo Assembly (Roll, Ref; see Figure 22-5)		
27	NAS557-16A	Grommet	X	1
28	NAS6606-11	Bolt	X	1
29	NAS1149F0332P	Washer	X	4
30	D320-8	Cyclic Stick Assembly (Ref)		

NOTES * Genesys-Aerosystems part no.

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FIGURE AND INDEX NUMBER	PART NUMBER	DESCRIPTION	PARTS AVAIL	QTY PER ASSY
(PITCH) SERVO ASSEMBLY INSTALLATION AND COMPONENTS (Cont'd)				
22-1-31	D210-3	Nut	X	2
32	A341-1	Spacer	X	4
33	A127-3	Rod End	X	2
34	B330-7	Palnut	X	1
35	AN315-3R	Nut	X	1
36	A336-8	Tube	X	1
37	F338-1	Box Assembly (Ref)		
38	NAS1149F0363P	Washer	X	2
39	D337-1	Tube Assembly (Ref)		
40	NAS6603-3	Bolt	X	2
41	01317-3*	Servo Assembly (Pitch)	X	1
42	NAS6603-18	Bolt	X	1
43	A141-17	Washer	X	1
44	C130-50	Spacer	X	1
45	NAS1149F0332P	Washer (earlier R66s this location)	X	2
46	D210-3	Nut (earlier R66s this location)	X	1
47	—	Nut	O	1
48	—	Lockwasher	O	1
49	B297-5	Circuit Breaker (5 amp; includes items 47, 48, 50, and 51) . .	X	1
50	—	Screw	O	2
51	—	Washer	O	2
52	-2103	Wire (Ref)		
53	G050	Console Assembly (or G070, not shown; Ref)		
54	B269-31	Screw Lock (male)	X	2
55	D323-2	Harness Assembly (Incl items 54, and 56 thru 58)	X	1
56	B158-6	Heat Shrink	X	A/R
57	B269-22	Backshell	X	1
58	B269-8	Receptacle	X	1
59	D323-14	Harness Assembly (Incl items 54, and 56 thru 58)	X	1
60	G060	Console Assembly (Ref)		

NOTES * Genesys-Aerosystems part number.

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FIGURE AND INDEX NUMBER	PART NUMBER	DESCRIPTION	PARTS AVAIL	QTY PER ASSY
(ROLL) SERVO ASSEMBLY INSTALLATION				
22-5-1	NAS6603-20	Bolt	X	1
2	A141-17	Washer	X	1
3	A341-1	Spacer	X	4
4	A127-3	Rod End	X	2
5	B330-7	Palnut	X	2
6	AN315-3R	Nut	X	2
7	C130-51	Spacer	X	1
8	NAS1149F0332P	Washer	X	1
9	D210-3	Nut	X	3
10	D320-8	Stick Assembly – Cyclic (Ref)		
11	F391-1	Cover Assembly (Ref)		
12	D353-5	Brace Assembly (Ref)		
13	NAS1352-08-8P	Screw	X	2
14	NAS620-8L	Washer	X	4
15	NAS1352-08-6P	Screw	X	2
16	B526-6	Screw	X	1
17	O1317-4*	Servo Assembly (Roll)	X	1
18	NAS620-10L	Washer	X	1
19	NAS6603-14	Bolt	X	1
20	A336-8	Tube	X	1
21	F293-2	Keel Panel – Forward (Ref, LH)		
22	G702-7	Cover Assembly (Ref, see Figure 22-5)		
23	NAS6603-21	Bolt (earlier R66s)	X	1
24	A141-17	Washer (earlier R66s)	X	1

NOTES * Genesys-Aerosystems part number.

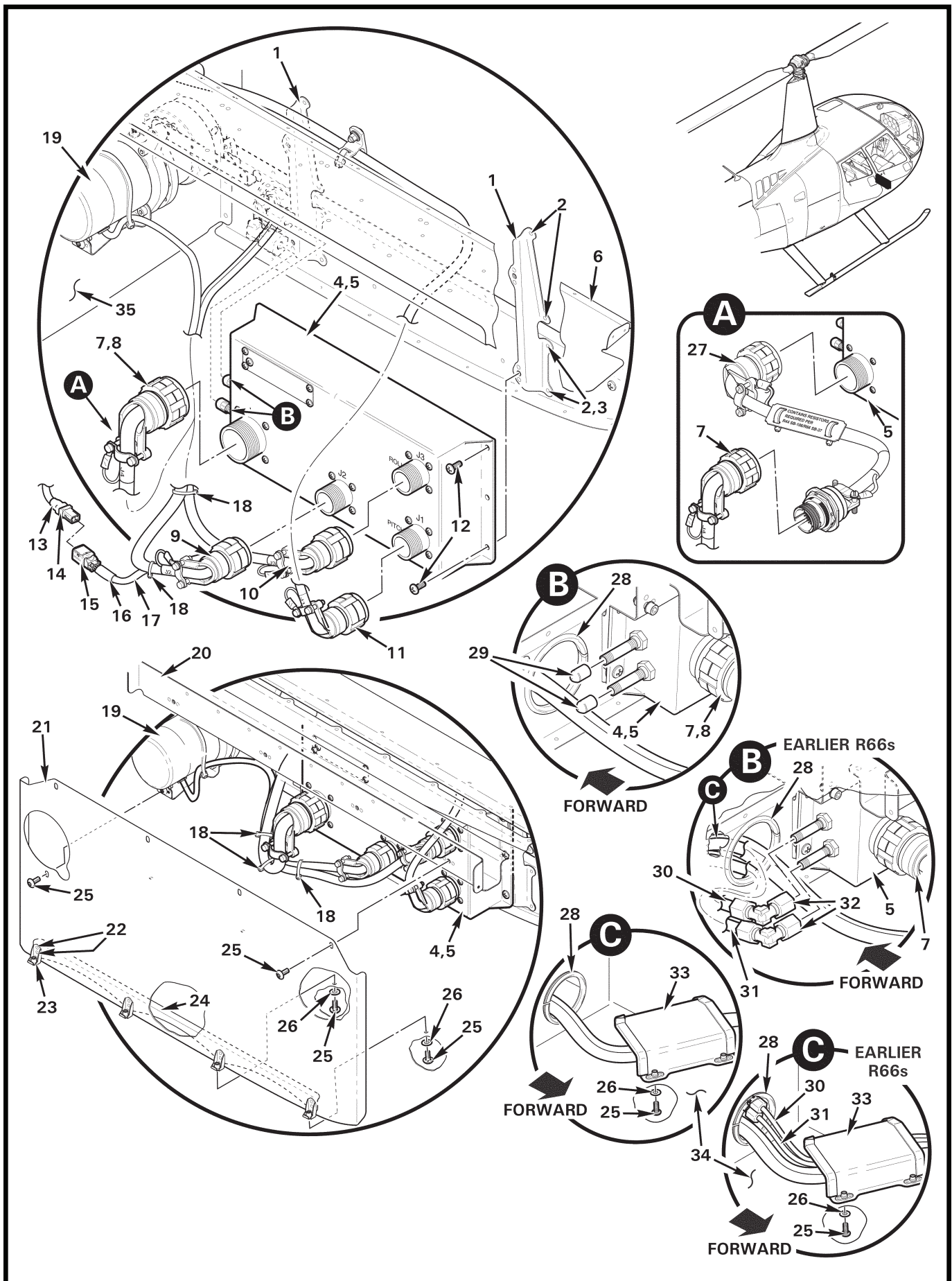


FIGURE AND INDEX NUMBER	PART NUMBER	DESCRIPTION	PARTS AVAIL	QTY PER ASSY
FLIGHT CONTROL COMPUTER INSTALLATION				
22-7-1	D358-1	Support Assembly	X	2
2	MS20470AD3	Rivet	X	8
3	MS20604R3W2	Rivet (optional)	X	2
4	01311-02-111*	Flight Control Computer (For Software Version 52; used only with Figure 22-1 item17.)	X	1
5	01311-03-11*	Flight Control Computer (For Software Version 51; used only with Figure 22-1 item18.)	X	1
6	F391-1	Panel (Ref)		
7	D323-12	Harness Assembly (G500H, for use with item 5 only)	X	1
8	D323-13	Harness Assembly (J4 or Aspen)	X	1
9	D323-2	Harness Assembly (Autopilot, Std; Incl items 15 thru 17) . . .	X	1
	D323-14	Harness Assembly (Autopilot, Long; Incl items 15 thru 17) . .	X	1
10	01317-4*	Servo Wire Harness Assembly (Roll, Ref)		
11	01317-3*	Servo Wire Harness Assembly (Pitch, Ref)		
12	MS27039C0806	Screw	X	4
13	D323-15	Harness Assembly (EFIS, G500H; Incl items 14, 16, 17, B268-3 Lacing Tape, and wires)	X	1
	D323-10	Harness Assembly (EFIS, G500H; Incl items 14, 16, 17, B268-3 Lacing Tape, and wires; for use with item 5 only) . . .	X	1
	D323-11	Harness Assembly (EFIS, Aspen; Incl items 14, 16, 17, B268-3 Lacing Tape, and wires)	X	1
14	D269-12	Receptacle (includes [9] M39029/58-360 pins)	X	1
15	D269-11	Plug (includes [9] M39029/57-354 sockets)	X	1
16	B158-6	Heat Shrink	X	A/R
17	B266-4	Sleeving	X	A/R
18	MS3367-5-0	Ty-rap	X	A/R
19	01317-4*	Servo Assembly — Roll (Ref)		
20	F362-5	Beam Assembly (Ref)		
21	G702-7	Cover Assembly (Incl items 22 thru 24)	X	1
22	MS20470AD3	Rivet	X	8
23	MF6000-08	Nutplate	X	4
24	G702-12	Stiffener	X	1
25	B526-6	Screw	X	11

NOTES * Genesys-Aerosystems part no.

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FIGURE AND INDEX NUMBER	PART NUMBER	DESCRIPTION	PARTS AVAIL	QTY PER ASSY
FLIGHT CONTROL COMPUTER INSTALLATION (Cont'd)				
22-7-26	B527-08	Washer	X	6
27	D840-1*	Harness Assembly (Incl items 28 and 29)	X	1
28	NAS557-28A	Grommet	X	1
29	VC-240-8	Cap	X	2
30	A729-23	Static Tube (Ref)		
31	A729-23	Pitot Tube (Ref)		
32	50-4-N-0	Elbow	X	2
33	D555-4	Shield Assembly	X	1
34	F272-1	Chin (Ref)		
35	F293-2	Keel Panel — Fwd (RH, Ref; see also Figure 22-5)		

NOTES * Harness may be installed between items 5 and 7 as an alternate method of compliance with R66 SB-37.