

TITLE	SHEET	SIZE	CODE	NUMBER	REV
DRAWING DIRECTORY DD11-P	2 OF 3	B	DD	DD11-P	D



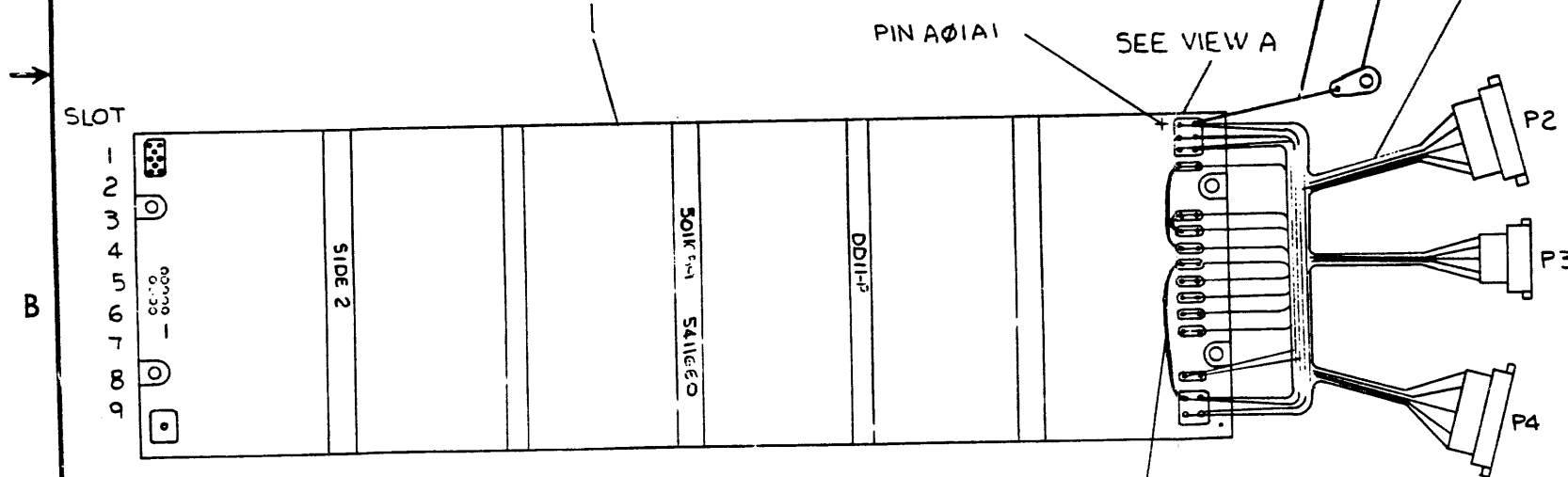
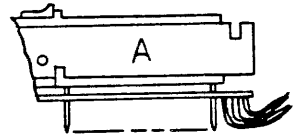
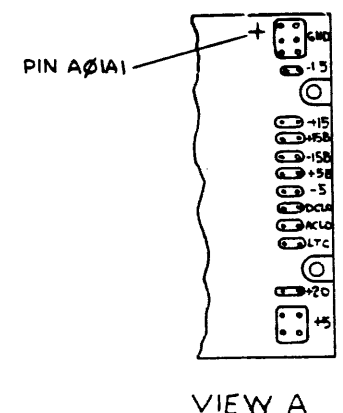
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WIRE TABLE

FROM			TO	FROM			TO
COLOR	POINT	CONNECTION	SIGNAL	COLOR	POINT	CONNECTION	SIGNAL
BLUE	P4-13	SOLDER	-15V	BRN	P2-14	SOLDER	-5V
RED	P4-4		+5V	BLK	P2-8		GND
RED	P4-1		+5V	GRAY	P2-2		+15
BLK	P4-8		GND	ORG	P2-3		+20
ORG	P4-3		+20V	BLK	P2-9		GND
BLK	P4-9		GND	RED	P2-12	SOLDER	+5B
WHT	P4-6		+15B	ITEM 5	ITEM 6	SOLDER	GND
GRN	P4-15		-15B				
YEL	P3-4		ACLO				
BLK	P3-1		GND				
BRN	P3-2		LTC				
VIO	P3-3		DCLO				
RED	P2-4		+5V				
RED	P2-1	SOLDER	+5V				

NOTES:

- WHEN THE DD11-PK'S USED WITH A BA11-K EXPANSION BOX WITHOUT BATTERY BACK UP, (I.E., NO 785 OR 7850) INSTALL THE THREE JUMPERS SHOWN:  
 A) -15 TO -15B  
 B) +15 TO +15B  
 C) +5 TO +5B (SEE NOTE 3)  
 USE #22 SHIELD BUS WIRE ON SIDE 2. THIS WILL PROVIDE POWER TO THE MOS MEMORY VOLTAGE RAILS.
- INSTALL ITEM #6 UNDER LOGIC FRAME MOUNTING SCREW TO TIE LOGIC GROUND TO CHASSIS GROUND.
- BA11-K'S THAT USE THE 5410864-YA-1 POWER DISTRIBUTION (I.E., 11/34A, 11/34 WITH FP11-AU, AND SOME 11/04'S) AND HAVE MORE THAN ONE DD11-DK (OR AN ADDITIONAL DD11-CK) CAN ONLY HAVE THE +5 TO +5B JUMPER IN ONE OF THE BACK PANELS. IF TWO OF THE BACK PANELS HAVE THE JUMPER IN, THE +5V REGULATORS MAY BE CONNECTED TOGETHER. TYPICALLY THIS JUMPER IS IN THE FIRST BACK PANEL, BUT IT MAY BE PLACED IN ONE OF THE OTHER BACK PANELS IF DEEMED NECESSARY FOR POWER REQUIREMENTS.



A/R	DESCRIPTION	PART NO.	QTY.
	COPRESS-O-CARTON	9905016-4	8
REF.	PACKAGING INSTRUCTIONS	3700040-0-0	7
1	TERMINAL, SOLDER	9008150	6
2	WIRE, BLK, STRD#14	9107370-00	5
6	TUBING #22 (BLUE)	9107256-06	4
6	WIRE BUS #22	9107560-01	3
1	POWER HARNESS (BA11-K, BA11-K)	D-IA-7011523-0-0	2
1	WIRED ASSY DD11-P	C-IA-7011522-0-0	1

REV.	CHANGE NO.	DATE	BY
A	7011523-00001		R. BARRY
B	7011523-00002	17-FEB-77	R. BARRY
C	7011523-00003	17-FEB-77	R. BARRY
D	7011523-00004	17-FEB-77	R. BARRY
E	7011523-00005	17-FEB-77	R. BARRY
F	7011523-00006	17-FEB-77	R. BARRY
G	7011523-00007	17-FEB-77	R. BARRY
H	7011523-00008	17-FEB-77	R. BARRY
I	7011523-00009	17-FEB-77	R. BARRY
J	7011523-00010	17-FEB-77	R. BARRY
K	7011523-00011	17-FEB-77	R. BARRY
L	7011523-00012	17-FEB-77	R. BARRY
M	7011523-00013	17-FEB-77	R. BARRY
N	7011523-00014	17-FEB-77	R. BARRY
O	7011523-00015	17-FEB-77	R. BARRY
P	7011523-00016	17-FEB-77	R. BARRY
Q	7011523-00017	17-FEB-77	R. BARRY
R	7011523-00018	17-FEB-77	R. BARRY
S	7011523-00019	17-FEB-77	R. BARRY
T	7011523-00020	17-FEB-77	R. BARRY
U	7011523-00021	17-FEB-77	R. BARRY
V	7011523-00022	17-FEB-77	R. BARRY
W	7011523-00023	17-FEB-77	R. BARRY
X	7011523-00024	17-FEB-77	R. BARRY
Y	7011523-00025	17-FEB-77	R. BARRY
Z	7011523-00026	17-FEB-77	R. BARRY

FIRST USED ON OPTION/MODEL		DD11-P	
DIMENSIONAL TOLERANCE		UNLESS OTHERWISE SPECIFIED	
MILLIMETERS	INCHES	ANGLES	
.XXX ±0.10	.XXX ±.005	±0° 30'	
.XX ±0.5	.XX ±.02		
.X ±.1	.X ±.1		
THIRD ANGLE PROJECTION	REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY ✓	NEXT HIGHER ASSY.	
MATERIAL	SEE PARTS LIST	A-PL-DD11-P-Ø	
FINISH	++	SCALE ++	
PARTS LIST		TITLE	
DRN: J. Miller DATE: 5/20/75		Digital	
CHK'D: J. Hoag DATE: 7/1/75		BACKPLANE ASS'Y (DD11-PK)	
ENG: R. Barry DATE: 7-2-75		SIZE CODE	
PROJ. ENG: R. Barry DATE: 7-2-75		NUMBER	
PROD: R. Barry DATE: 7/1/75		REV. D	
SHEET 1 OF 1		DIST.	

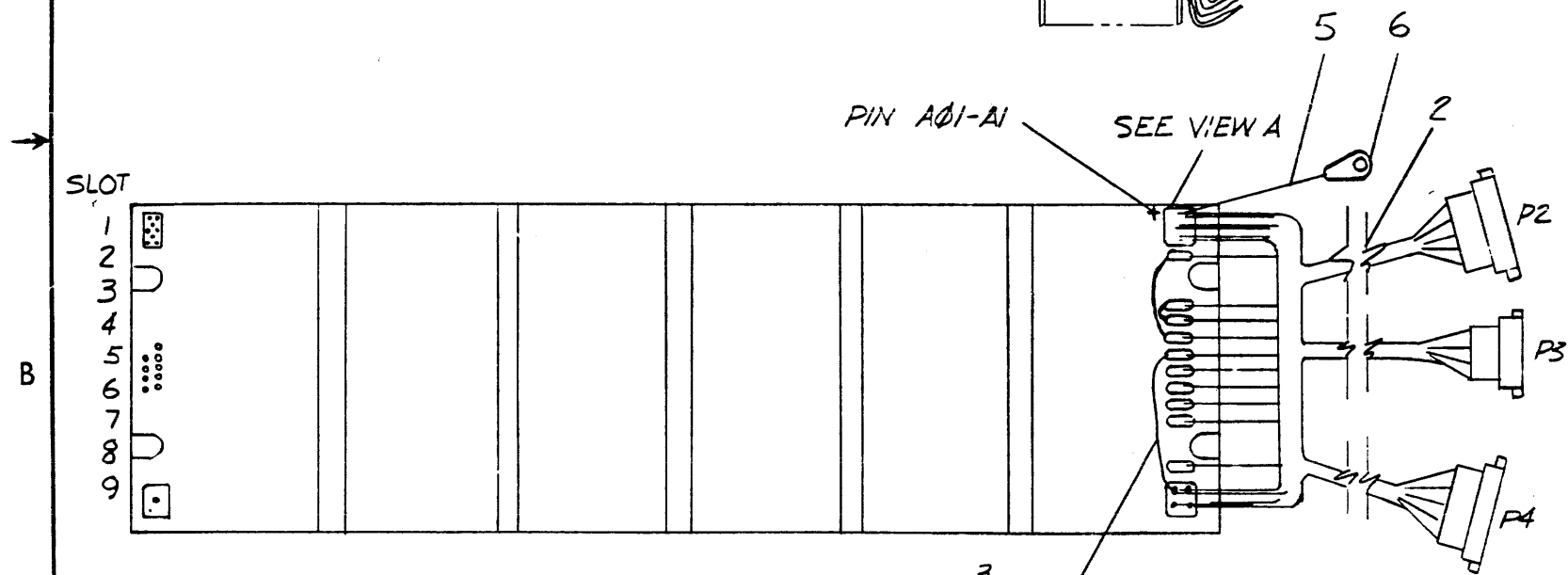
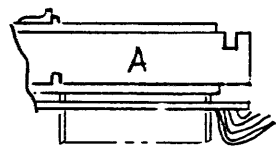
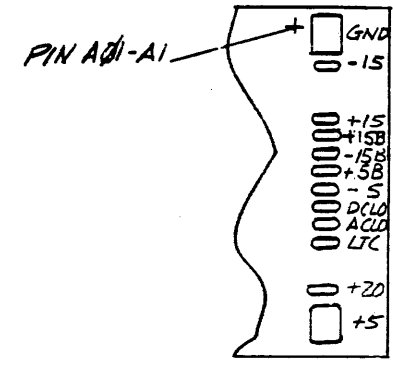
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WIRE TABLE

FROM			TO	FROM			TO
COLOR	POINT	CONNECTION	SIGNAL	COLOR	POINT	CONNECTION	SIGNAL
BLU	P4-13	SOLDER	-15V	BRN	P2-14	SOLDER	-5V
RED	P4-4		+5V	BLK	P2-8		GND
RED	P4-1		+5V	GRAY	P2-2		+5
BLK	P4-8		GND	GRN	P2-3		+20
GRN	P4-3		+20V	BLK	P2-9		GND
BLK	P4-9		GND	RED	P2-10	SOLDER	+5B
WHT	P4-6		+15B	ITEM*5	ITEM*6	SOLDER	GND.
GRN	P4-15		-15B				
YEL	P3-4		ACLO				
BLK	P3-1		GND				
BRN	P3-2		LTC				
VIO	P3-3		DCLO				
RED	P2-4		+5V				
RED	P2-1	SOLDER	+5V				

NOTES:

- WHEN DD11-PF IS USED WITH A BAI-F EXP BOX WITHOUT BATTERY BACK UP INSTALL THE THREE JUMPERS SHOWN:  
 1) -15 TO -15B  
 2) +15 TO +15B  
 3) +5 TO +5B  
 USE #20 INSULATED BUS WIRE ON SIDE 2 THIS WILL PROVIDE POWER TO THE MOS MEM VOLTAGE RAILS.
- INSTALL ITEM #6 UNDER LOGIC FRAME MOUNTING SCREW TO TIE LOGIC GROUND TO CHASSIS GROUND.



QTY.	DESCRIPTION	PART NO.	ITEM NO.
1	TERMINAL, SOLDER	9008150	6
A/R	WIRE, BLK STRD #14	9107370-00	5
A/R	TUBING, #20 (CLEAR)	9107267-10	4
A/R	WIRE, BUS #20	9107560-02	3
1	POWER HARNESS BAI-F	D-7A-7011109-0-0	2
1	WIRED ASSY DD11-P	C-7A-7011522 0-0	1

FIRST USED ON OPTION/MODEL DD11-PF		QTY.		DESCRIPTION		PART NO.		ITEM NO.	
DIMENSIONAL TOLERANCE									
DIMENSIONS ARE $\frac{\text{MILLIMETERS}}{\text{INCHES}}$ UNLESS OTHERWISE SPECIFIED									
MILLIMETERS		INCHES		ANGLES					
X,XX = ±0.10		.XX = ±0.05		30° 30'					
XX = ±0.5		.X = ±.1							
X = ±.2									
THIRD ANGLE PROJECTION		REMOVE BURRS AND BREAK SHARP CORNERS SURFACE QUALITY ✓							
MATERIAL		SEE PARTS LIST		SCALE		NONE			
FINISH				SHEET		1 OF 1			
TITLE		BACK PLANE ASSY (DD11-PF)		SIZE CODE		C AD		NUMBER	
								7012307-0-0	
								REV.	

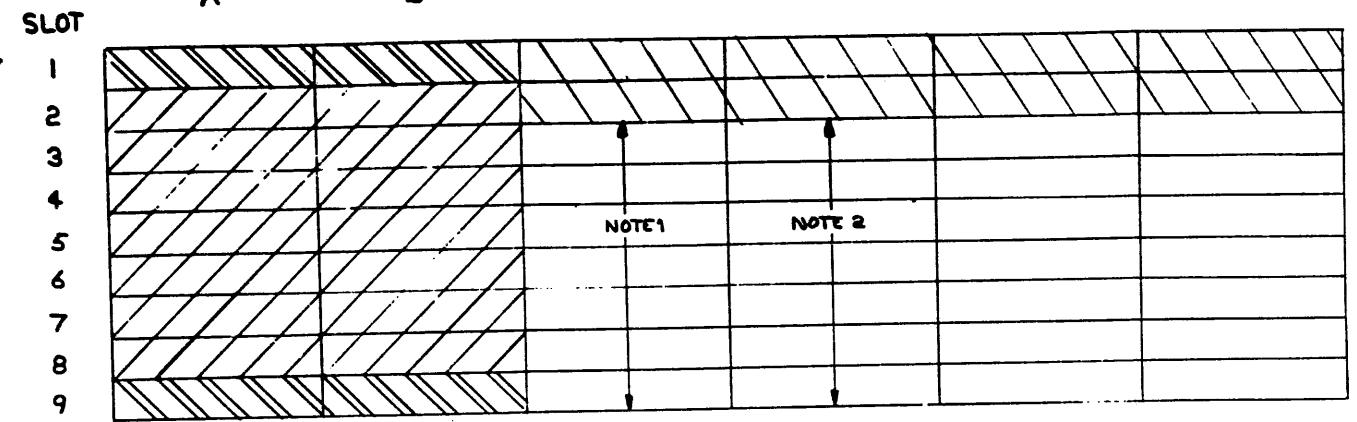
REV.	
CHANGE NO.	
CHK	

CAD 7012307-0-0

NOTES:

1. REMOVE CA1 TO CB1 WIRE WRAP JUMPER TO INSTALL AN MPR OPTION IN ANY SPC SLOT.
2. 0727 REQUIRED IN ANY UNUSED SPC SLOT TO PROVIDE BUS GRANT CONTINUITY.
3. GRANT DIRECTION IS SLOT 1 TO SLOT 9.
4. USE M9202 TO INTERCONNECT SYSTEM UNITS INSTEAD OF M920. M9202 IS A 2 FT. UNIBUS JUMPER CABLE USED TO DISTRIBUTE UNIBUS LOADING.
5. M9302 (SACK/TERM) AND M930 (TERM) MUST NEVER BE INSTALLED IN ANY SLOT OTHER THAN SLOT 9 (A & B). POWER SUPPLY VOLTAGES WILL BE SHORTED OUT IF THESE TERMINATORS ARE MOUNTED IN THE MODIFIED UNIBUS SLOTS.
6. MODIFIED UNIBUS SECTION CARRIES CORE AND MOS MEMORY VOLTAGE RAILS AND MEMORY PARITY CONTROL SIGNALS INSTEAD OF BUS GRANT AND SOME GND SIGNALS THAT ARE CONTAINED IN STANDARD UNIBUS SLOTS.
7. REFER TO NEXT PAGE FOR RECOMMENDED UTILIZATION OF THIS SLOT IN STANDARD SYSTEM.
8. THIS SLOT IS RESERVED FOR KK11-A OPTION ON PDP1134A ONLY BALL-K BOX ONLY.

NOTE 7  
NOTE 7  
NOTE 7  
NOTE 7  
NOTE 8



VIEW FROM MODULE SIDE

**STANDARD UNIBUS (SLOTS 1 & 9)**  
DUAL MODULES WHICH PLUG INTO STANDARD UNIBUS SLOTS ONLY:  
BC11A UNIBUS CABLE  
M9302 SACK/TERM (NOTES)  
M920 (NOTE 4)  
M930 (NOTES 5)  
M9202 (NOTE 4)  
SLOT 9 (A & B) IS EITHER THE TERMINATION OF THE UNIBUS OR THE OUTPUT CABLE (BC11A)

**MODIFIED UNIBUS (SLOTS 2-8)**  
DUAL MODULES WHICH PLUG INTO THE MODIFIED UNIBUS ONLY:  
M9301 BOOT/TERM.  
M9306 TERM.  
M7850 PARITY CONT.

**SMALL PERIPHERAL CONTROLLER (SLOTS 3-9)**  
ANY S.P.C. OPTION:  
C D E F  
**CPU BUS (SLOTS 1 & 2)**  
PROCESSOR INTERCONNESS FOR KD11-E AND KD11-EA

**HEX MODULE WITH MODIFIED UNIBUS SIGNALS (SLOTS 2-8)**  
HEX MODULES THAT PLUG INTO MODIFIED UNIBUS ONLY:  
M7847 MOS MEMORY (MS11 EP-JP)  
MM11-BP, CP, DP, OR YP CORE MEMORY

**GENERAL**  
ANY HEX MODULE THAT MEETS EITHER OF THE FOLLOWING REQUIREMENTS CAN BE MOUNTED IN THESE SLOTS.  
1.) THOSE PINNED TO TAKE SIGNALS FROM MODIFIED UNIBUS (A & B) WITH THE BUS GRANTS TAKEN FROM SPC SLOTS 10: ABOVE  
2.) THOSE PINNED TO TAKE SIGNALS FROM STANDARD SPC PINNING WITH THE EXCEPTION OF POWER FROM (A & B). 10: SPECIAL OPTIONS

**HEX MODULE WITH STANDARD UNIBUS SIGNALS (SLOT 1 ONLY)**  
M7263 PDP11/04 CPU MODULE OR M7266 PDP 1134 CONTROL MODULE  
M7266 KD11-E (PDP 11/34) CONTROL MODULE  
M8266 KD11-RE (PDP 1134A) CONTROL MODULE

DATE	BY	CHKD	APPD
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM
11/21/75	DRM	DRM	DRM

QUANTITY & VARIATION	DESCRIPTION	DWG. PART NO.	ITEM NO.
	UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES		
	ANGLES CLASS 'C' ACC'Y		
	SURFACE FINISH (CHECK ONE)		
	DENSITY TH		
	MEDIUM		
	PREFERRED		
	THIRD ANGLE PROJECTION		
	REMOVE PURRS AND BREAK SHARP CORNERS		
	DO NOT SCALE DWG		
	MATERIAL		
	FINISH		
	DRM 11/21/75		
	CHKD: 11/21/75		
	ENG: RB 11/21/75		
	PROJ. ENG: RB 11/21/75		
	PROD. RB 11/21/75		
	NEXT HIGHER ASSY.		
	B-DD-DD11-P		
	SCALE		
	SHEET 1 OF 2		
	FIRST USED ON		
	TITLE		
	MODULE UTILIZATION (DD11-P)		
	SIZE CODE		
	D MU DD11-P-2		
	NUMBER		
	REV. B		
	DIST.		

# RECOMMENDED SLOT UTILIZATION IN STANDARD SYSTEMS

**KDII-D w/M9301 & MS11-JP(PF) PDP-11/04**

SLOT 1	M7263
2	M911-JP (200)
3	M9301
4	
5	
6	
7	
8	
SLOT 9	

**KDII-E w/M9301 PDP-11/34**

SLOT 1	M7266
2	M7265
3	M9301
4	
5	
6	
7	
8	
SLOT 9	

**KDII-D w/M9301 & MM11-DP PDP-11/04**

SLOT 1	M7263
2	MM11-DP
3	
4	M9301
5	
6	
7	
8	
SLOT 9	

**KDII-EA w/M9301 FP11-A PDP-1134A**

SLOT 1	M8266
2	M8265
3	M8267
4	M9301
5	
6	
7	
8	
SLOT 9	

**KDII-D w/M9301 & MM11-CP PDP-11/04**

SLOT 1	M7263
2	MM11-CP
3	M9301
4	
5	
6	
7	
8	
SLOT 9	

SLOT 1	
2	
3	
4	
5	
6	
7	
8	
SLOT 9	

**KDII-EA w/M9301 PDP-1134A**

SLOT 1	M8266
2	M8265
3	M9301
4	
5	
6	
7	
8	
SLOT 9	

SLOT 1	
2	
3	
4	
5	
6	
7	
8	
SLOT 9	

A B C D E F A B C D E F

REVISIONS		
CHK	CHANGE NO.	REV.

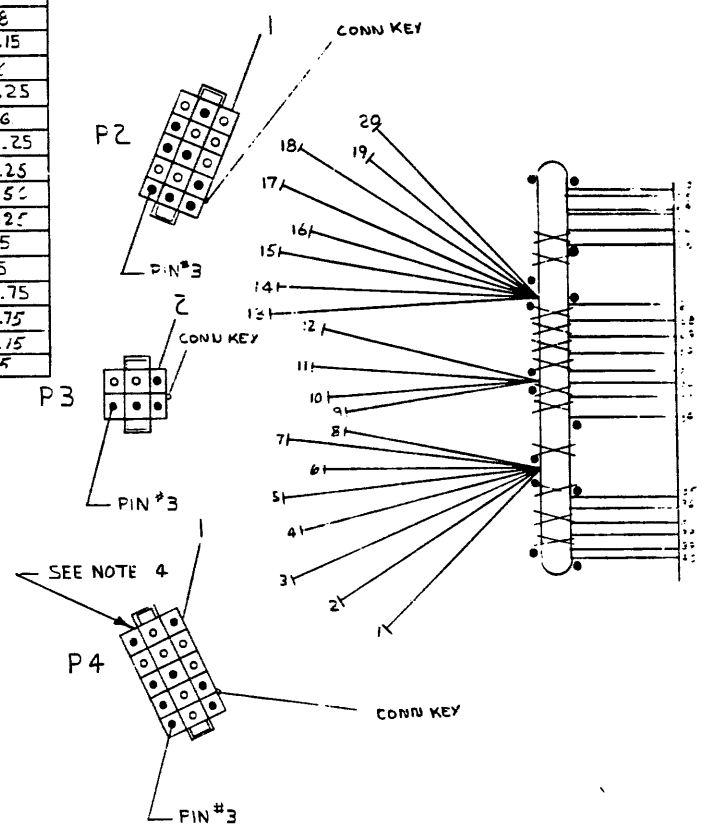
DDII-P-2

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- NOTES:
1. USE TIE WRAPS (X) ITEM #4 AT BREAKOUT POINTS SHOWN
  2. DOT (•) INDICATES NAIL LOCATION FOR ASS'Y USE ONLY. COVER NAILS WITH SHINK TUBING TO PREVENT CUTTING HARNESS.
  3. WIRE LENGTH TOLERANCES WILL BE +1/8, -0 INCHES.
  4. ALL CONN. SHOWN FROM WIRING SIDE.

WIRING TABLE

ITEM AC	DESCRIPTION	FROM			TO			SIGNAL	LENGTH
		AWG	COLOR	POINT	CONNECTION	WITH	POINT		
9	#18	BLUE	1	P4-13	3	26	SOLDER	-15V	7
5	14	RED	2	P4-4		37		+5V	5
5	4	RED	3	P4-1		38		+5V	5
6	14	BLK	4	P4-8		21		GND	7.75
7	14	ORN	5	P4-3		35		+20V	5
8	14	ELK	6	P4-9		22		GND	8
13	18	WHT	7	F4-2		28		+15B	6.15
12	18	GFN	8	F4-15		29		-15B	7
12	18	YEL	9	F3-4		33		ACLO	4.25
6	14	ELK	10	F3-1		23		GND	6
10	18	BRN	11	F3-2		34		LTC	4.25
11	18	VIO	12	F3-3		32		DCLO	4.25
8	14	RED	13	P2-4		39		+5V	7.5
5	14	RED	14	F2-1		40		+5V	7.25
10	18	BRN	15	F2-14		31		-5V	5
6	14	BLK	16	F2-8		24		GND	5
6	18	GREY	17	F2-2		27		+15	4.75
7	14	ORN	18	F2-3		36		+20	6.75
6	14	BLK	19	F2-9		25		GND	5.15
5	14	RED	20	F2-12	3	30	SOLDER	+5B	5



DO NOT REDUCE SCALE

6 IN

FOR MANUFACTURING PURPOSES ONLY

FOR WIRE LENGTHS SEE WIRING TABLE

DESCRIPTION	DWG/PART NO.	ITEM NO.
1 POWER HARNESS	7809872-2-0	1
A/R WIRE #18 AWG BRN	9107360-55	2
A/R WIRE #18 AWG WHT	9107360-99	13
A/R WIRE #18 AWG YEL	9107360-44	12
A/R WIRE #18 AWG VIO	1107360-77	11
A/R WIRE #18 AWG BRN	9107360-11	10
A/R WIRE #18 AWG BLUE	1107360-66	1
A/R WIRE #18 AWG GREY	9107360-88	8
A/R WIRE #14 AWG ORN	9107370-33	7
A/R WIRE #14 AWG BLK	9107370-00	6
A/R WIRE #14 AWG RED	9107370-22	5
12 TIE WRAP	30070-31	4
20 PIN MALE	1209378-01	3
1 CONN. 6 PIN HOUSING	1209351-06	2
2 CONN. 15 PIN HOUSING	1209351-15	1

QUANTITY & VARIATION	DESCRIPTION	DWG/PART NO.	ITEM NO.
10108-0	UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES		
	ANGLES	CLASS OF ACCURACY	NOMINAL DIMENSION RANGE INCHES
	20° 30°		OVER 0.2 TO 1.0
			OVER 1.0 TO 3.0
			OVER 3.0 TO 6.0
			OVER 6.0 TO 30.0
	SURFACE QUALITY	CHECK ONE	
		<input type="checkbox"/> MEDIUM	
		<input type="checkbox"/> PREFERRED	
	MICROINCHES		
		±0.012	±0.018
		±0.025	±0.04
		±0.06	±0.1

THIRD ANGLE PROJECTION	DRN. John D. G. 1/11/75	FIRST USED ON DD11-D
REMOVE BURRS AND BREAK SHARP CORNERS	CHK'D. P. S. 5/21/75	
DO NOT SCALE DWG	ENG. C. R. 5/21/75	TITLE
MATERIAL SEE PARTS LIST	PROJ. ENG. P. S. 5/21/75	POWER HARNESS (BAIL-K, BAIL-L)
FINISH	NEXT HIGHER ASSY.	SIZE CODE D IA
		NUMBER 701108-0-0
		REV. B
		SHEET OF DIST.

REV.	CHANGE NO.	DATE	BY	APP.
1				
2				
3				
4				
5				
6				
7				
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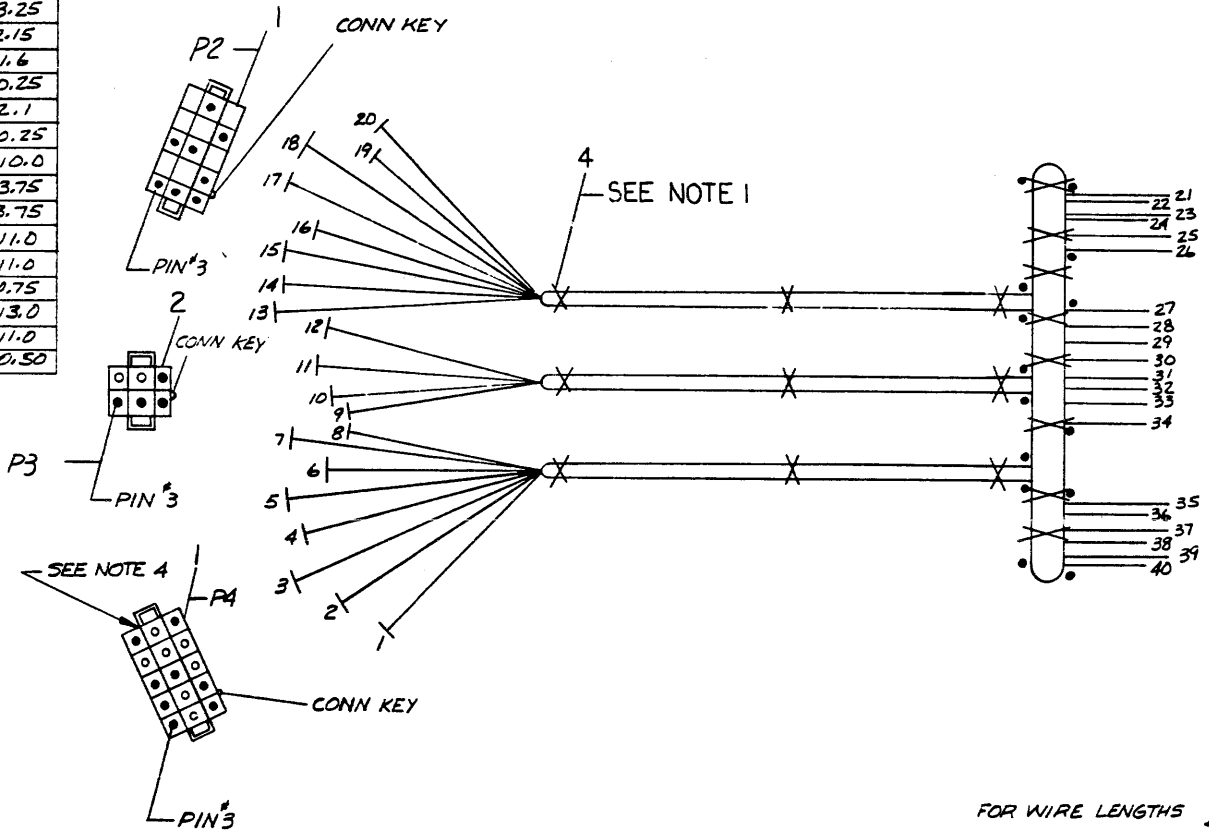


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- NOTES:**
1. USE TIE WRAPS (X) ITEM #4 AT BREAKOUT POINTS SHOWN.
  2. DOT (•) INDICATES NAIL LOCATION FOR ASSY USE ONLY. COVER NAILS WITH SHRINK TUBING.
  3. WIRE LENGTH TOL WILL BE ± .12 IN
  4. ALL CONN SHOWN FROM WIRING SIDE.
  5. STRIP 1/8" INSULATION FROM POINTS 21 THRU 40 AND FULL TIN POINTS 21 THRU 40.

**WIRING TABLE**

ITEM NO	DESCRIPTION		FROM			TO			SIGNAL	LENGTH
	AWG	COLOR	POINT	CONNECTION	WITH	POINT	CONNECTION			
9	18	BLU	1	P4-13	3	26	SOLDER	-15V	12.75	
5	14	RED	2	P4-4		37		+5V	11	
5	14	RED	3	P4-1		38		+5V	11.25	
6	14	BLK	4	P4-8		21		GND	13.75	
7	14	ORN	5	P4-3		35		+20V	11.0	
6	14	BLK	6	P4-9		22		GND	13.25	
13	18	WHT	7	P4-6		28		+15B	12.15	
14	18	GRN	8	P4-15		29		-15B	11.6	
12	18	YEL	9	P3-4		35		ACLO	10.25	
6	14	BLK	10	P3-1		23		GND	12.1	
10	18	BRN	11	P3-2		34		LTC	10.25	
11	18	VIO	12	P3-3		32		DELO	10.0	
5	14	RED	13	P2-4		39		+5V	13.75	
5	14	RED	14	P2-1		40		+5V	13.75	
15	14	BRN	15	P2-14		31		-5V	11.0	
6	14	BLK	16	P2-8		24		GND	11.0	
8	18	GRY	17	P2-2		27		+15	10.75	
7	14	ORN	18	P2-3		36		+20	13.0	
6	14	BLK	19	P2-9		25		GND	11.0	
5	14	RED	20	P2-10	3	30	SOLDER	+5B	10.50	



1	POWER HARNESS DECAL	7409872-2	16
AIR	WIRE #14 AWG (BRN)	9107370-11	15
AIR	WIRE #18 AWG (GRN)	9107360-55	14
AIR	WIRE #18 AWG (WHT)	9107360-99	13
AIR	WIRE #18 AWG (YEL)	9107360-44	12
AIR	WIRE #18 AWG (VIO)	9107360-77	11
AIR	WIRE #18 AWG (BRN)	9107360-11	10
AIR	WIRE #18 AWG (BLU)	9107360-66	9
AIR	WIRE #18 AWG (GRY)	9107360-88	8
AIR	WIRE #14 AWG (ORN)	9107370-33	7
AIR	WIRE #14 AWG (BLK)	9107370-00	6
AIR	WIRE #14 AWG (RED)	9107370-22	5
17	TIE WRAP	9007031	4
20	PIN MALE	1209378-01	3
1	CONN 6 PIN HOUSING	1209351-06	2
2	CONN 15 PIN HOUSING	1209351-13	1

DO NOT REDUCE  
SCALE  
6 IN  
FOR MANUFACTURING PURPOSES ONLY

0 IN  12 IN

DATE: 11/15/75  
 DRAWN BY: J. J. COOCH  
 CHECKED BY: J. J. COOCH  
 ENGINEER: J. J. COOCH  
 PROJECT: 7012307-0-0

QUANTITY & VARIATION		DESCRIPTION		DWG. PART NO.		ITEM NO.	
UNLESS OTHERWISE SPECIFIED DIMENSIONS ARE IN INCHES							
ANGLE	CLASS OF ACCURACY	TOLERANCES UNLESS OTHERWISE SPECIFIED					
1/2°	F	FRACTION	DECIMAL	ANGLES	DIAMETERS	RADIUSES	LENGTHS
1/2°	F	1/16	0.0625	± 30'	± 0.005	± 0.005	± 0.005
1/4°	F	1/32	0.03125	± 15'	± 0.005	± 0.005	± 0.005
1/8°	F	1/64	0.015625	± 10'	± 0.005	± 0.005	± 0.005
1/16°	F	1/128	0.0078125	± 5'	± 0.005	± 0.005	± 0.005
1/32°	F	1/256	0.00390625	± 3'	± 0.005	± 0.005	± 0.005
1/64°	F	1/512	0.001953125	± 1.5'	± 0.005	± 0.005	± 0.005
1/128°	F	1/1024	0.0009765625	± 0.75'	± 0.005	± 0.005	± 0.005
1/256°	F	1/2048	0.00048828125	± 0.375'	± 0.005	± 0.005	± 0.005
1/512°	F	1/4096	0.000244140625	± 0.1875'	± 0.005	± 0.005	± 0.005
1/1024°	F	1/8192	0.0001220703125	± 0.09375'	± 0.005	± 0.005	± 0.005
1/2048°	F	1/16384	0.00006103515625	± 0.046875'	± 0.005	± 0.005	± 0.005
1/4096°	F	1/32768	0.000030517578125	± 0.0234375'	± 0.005	± 0.005	± 0.005
1/8192°	F	1/65536	0.0000152587890625	± 0.01171875'	± 0.005	± 0.005	± 0.005
1/16384°	F	1/131072	0.00000762939453125	± 0.005859375'	± 0.005	± 0.005	± 0.005
1/32768°	F	1/262144	0.000003814697265625	± 0.0029296875'	± 0.005	± 0.005	± 0.005
1/65536°	F	1/524288	0.0000019073486328125	± 0.00146484375'	± 0.005	± 0.005	± 0.005
1/131072°	F	1/1048576	0.00000095367431640625	± 0.000732421875'	± 0.005	± 0.005	± 0.005
1/262144°	F	1/2097152	0.000000476837158203125	± 0.0003662109375'	± 0.005	± 0.005	± 0.005
1/524288°	F	1/4194304	0.0000002384185791015625	± 0.00018310546875'	± 0.005	± 0.005	± 0.005
1/1048576°	F	1/8388608	0.00000011920928955078125	± 0.000091552734375'	± 0.005	± 0.005	± 0.005
1/2097152°	F	1/16777216	0.000000059604644775390625	± 0.0000457763671875'	± 0.005	± 0.005	± 0.005
1/4194304°	F	1/33554432	0.0000000298023223876953125	± 0.00002288818359375'	± 0.005	± 0.005	± 0.005
1/8388608°	F	1/67108864	0.00000001490116119384765625	± 0.000011444091796875'	± 0.005	± 0.005	± 0.005
1/16777216°	F	1/134217728	0.000000007450580596923828125	± 0.0000057220458984375'	± 0.005	± 0.005	± 0.005
1/33554432°	F	1/268435456	0.0000000037252902984619140625	± 0.00000286102294921875'	± 0.005	± 0.005	± 0.005
1/67108864°	F	1/536870912	0.00000000186264514923095703125	± 0.000001430511474609375'	± 0.005	± 0.005	± 0.005
1/134217728°	F	1/1073741824	0.000000000931322574615478515625	± 0.0000007152557373046875'	± 0.005	± 0.005	± 0.005
1/268435456°	F	1/2147483648	0.00000000046566128730773928125	± 0.00000035762786865234375'	± 0.005	± 0.005	± 0.005
1/536870912°	F	1/4294967296	0.000000000232830643653869640625	± 0.000000178813934326171875'	± 0.005	± 0.005	± 0.005
1/1073741824°	F	1/8589934592	0.0000000001164153218269348203125	± 0.0000000894069671630859375'	± 0.005	± 0.005	± 0.005
1/2147483648°	F	1/17179871184	0.00000000005820766091346741015625	± 0.00000004470348358154296875'	± 0.005	± 0.005	± 0.005
1/4294967296°	F	1/34359742368	0.000000000029103830456733705078125	± 0.000000022351741790771484375'	± 0.005	± 0.005	± 0.005
1/8589934592°	F	1/68719484736	0.0000000000145519152283668525390625	± 0.0000000111758708953857421875'	± 0.005	± 0.005	± 0.005
1/17179871184°	F	1/137438969472	0.00000000000727595761418342626953125	± 0.00000000558793544769287109375'	± 0.005	± 0.005	± 0.005
1/34359742368°	F	1/274877938944	0.000000000003637978807091713134765625	± 0.000000002793967723846435546875'	± 0.005	± 0.005	± 0.005
1/68719484736°	F	1/549755877888	0.000000000001818989403545856667430625	± 0.0000000013969838619232177734375'	± 0.005	± 0.005	± 0.005
1/137438969472°	F	1/1099511755776	0.0000000000009094947017729283337153125	± 0.00000000069849193096160888671875'	± 0.005	± 0.005	± 0.005
1/274877938944°	F	1/2199023511552	0.00000000000045474735088646416685765625	± 0.000000000349245965480804443359375'	± 0.005	± 0.005	± 0.005
1/549755877888°	F	1/4398047023104	0.000000000000227373675443232083428828125	± 0.0000000001746229827404022216796875'	± 0.005	± 0.005	± 0.005
1/1099511755776°	F	1/8796094046208	0.0000000000001136868377216160417144140625	± 0.00000000008731149137020111083984375'	± 0.005	± 0.005	± 0.005
1/2199023511552°	F	1/17592188092416	0.00000000000005684341886080802085720703125	± 0.0000000000436557456851005554196875'	± 0.005	± 0.005	± 0.005
1/4398047023104°	F	1/35184376184832	0.000000000000028421709430404010428603515625	± 0.00000000002182787284255027770984375'	± 0.005	± 0.005	± 0.005
1/8796094046208°	F	1/70368752369664	0.0000000000000142108547152020052143017828125	± 0.00000000001091393642127513885391875'	± 0.005	± 0.005	± 0.005
1/17592188092416°	F	1/140737504739328	0.00000000000000710542735760100260715089140625	± 0.000000000005456968210637569427059375'	± 0.005	± 0.005	± 0.005
1/35184376184832°	F	1/281475009478656	0.000000000000003552713678800501303575445703125	± 0.0000000000027284841053187847135296875'	± 0.005	± 0.005	± 0.005
1/70368752369664°	F	1/562950018957312	0.000000000000001776356839400250651787722860625	± 0.00000000000136424205265939235676434375'	± 0.005	± 0.005	± 0.005
1/140737504739328°	F	1/1125900037914624	0.0000000000000008881784197001253258938614128125	± 0.000000000000682121026329696178382171875'	± 0.005	± 0.005	± 0.005
1/281475009478656°	F	1/2251800075829248	0.00000000000000044408920985006266294693070625	± 0.000000000000341060513164848089191089375'	± 0.005	± 0.005	± 0.005
1/562950018957312°	F	1/4503600151658496	0.0000000000000002220446049250313314734653515625	± 0.0000000000001705302565824240445955446875'	± 0.005	± 0.005	± 0.005
1/1125900037914624°	F	1/9007200303316992	0.000000000000000111022302462515665736727178125	± 0.00000000000008526512829120202229777234375'	± 0.005	± 0.005	± 0.005
1/2251800075829248°	F	1/18036400606633984	0.000000000000000055511151231258328683635390625	± 0.000000000000042632564145601011148886171875'	± 0.005	± 0.005	± 0.005
1/4503600151658496°	F	1/36072801213267968	0.0000000000000000277555756156264143418176953125	± 0.00000000000002131628207280050557444444375'	± 0.005	± 0.005	± 0.005
1/90072801213267968°	F	1/72145602426535936	0.00000000000000001387778780781320717090884765625	± 0.000000000000010658141036400252787222221875'	± 0.005	± 0.005	± 0.005
1/18036400606633984°	F	1/144331204853071872	0.000000000000000006938893903906603535454423828125	± 0.00000000000000532907051820012639361111111875'	± 0.005	± 0.005	± 0.005
1/36072801213267968°	F	1/288662409706143744	0.0000000000000000034694469519533017677272119140625	± 0.00000000000000266453525910006319680555559375'	± 0.005	± 0.005	± 0.005
1/72145602426535936°	F	1/577324819412287488	0.00000000000000000173472347597665088386360595703125	± 0.000000000000001332267629550031598402777796875'	± 0.005	± 0.005	± 0.005
1/144331204853071872°	F	1/1154649638224574976	0.0000000000000000				

