

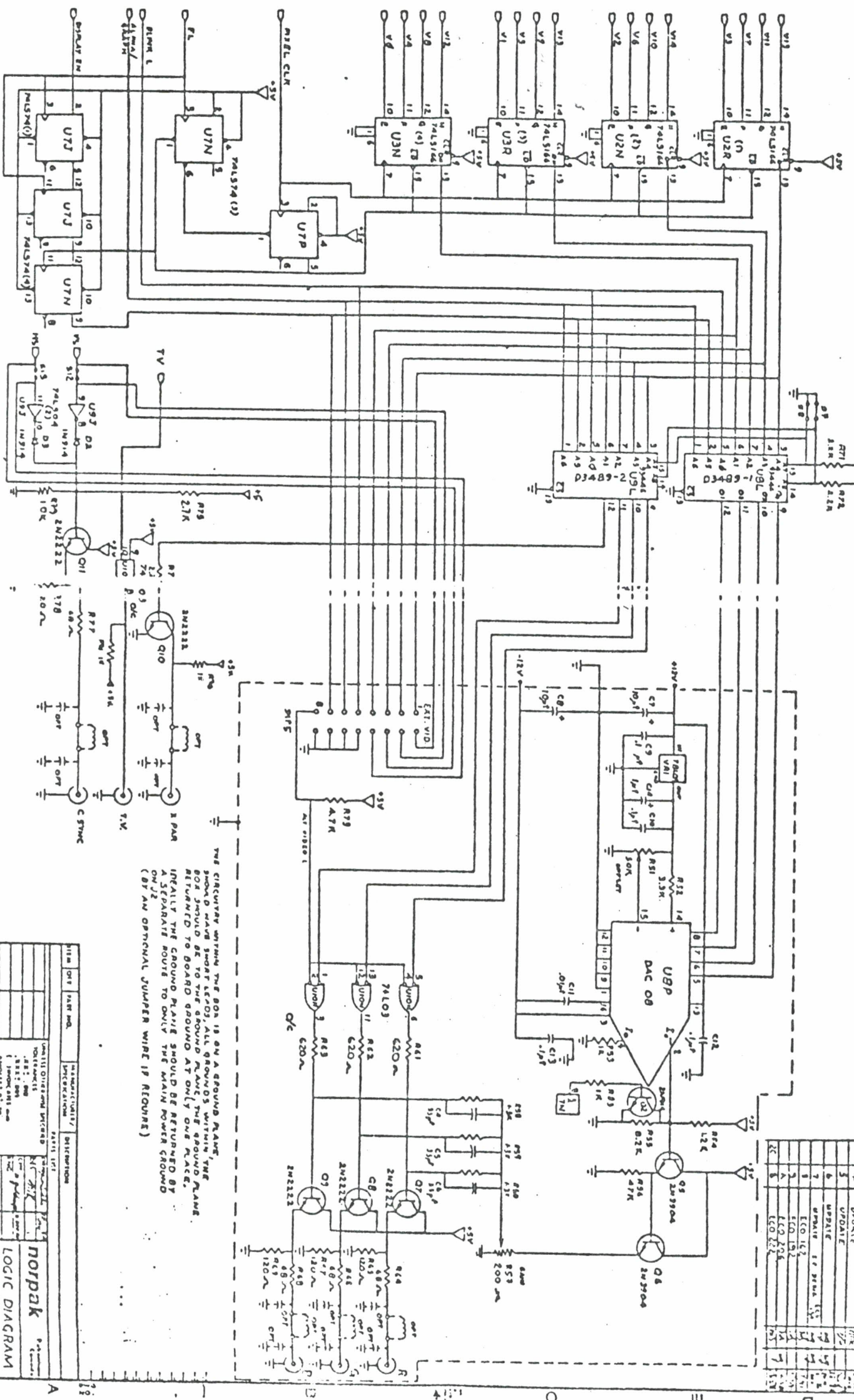




Section B is not to assembly. Refer only to 1:10 magnification to location indicated by the arrow. Section C is not to assembly. Refer only to 1:10 magnification to location indicated by the arrow.

SECTION B (continued) and should be assembled on top of the board. Refer to the manufacturer's data sheet for the component values of the components of SECTION B (LIMITS).

Pin	Pin	Function	Pin	Pin	Function
1	2	PROVIDE	1	2	PROVIDE
3	4	UPDATE	3	4	UPDATE
5	6	UPDATE	5	6	UPDATE
7	8	UPDATE	7	8	UPDATE
9	10	UPDATE	9	10	UPDATE
11	12	UPDATE	11	12	UPDATE
13	14	UPDATE	13	14	UPDATE
15	16	UPDATE	15	16	UPDATE
17	18	UPDATE	17	18	UPDATE
19	20	UPDATE	19	20	UPDATE
21	22	UPDATE	21	22	UPDATE
23	24	UPDATE	23	24	UPDATE
25	26	UPDATE	25	26	UPDATE
27	28	UPDATE	27	28	UPDATE
29	30	UPDATE	29	30	UPDATE
31	32	UPDATE	31	32	UPDATE
33	34	UPDATE	33	34	UPDATE
35	36	UPDATE	35	36	UPDATE
37	38	UPDATE	37	38	UPDATE
39	40	UPDATE	39	40	UPDATE
41	42	UPDATE	41	42	UPDATE
43	44	UPDATE	43	44	UPDATE
45	46	UPDATE	45	46	UPDATE
47	48	UPDATE	47	48	UPDATE
49	50	UPDATE	49	50	UPDATE
51	52	UPDATE	51	52	UPDATE
53	54	UPDATE	53	54	UPDATE
55	56	UPDATE	55	56	UPDATE
57	58	UPDATE	57	58	UPDATE
59	60	UPDATE	59	60	UPDATE
61	62	UPDATE	61	62	UPDATE
63	64	UPDATE	63	64	UPDATE
65	66	UPDATE	65	66	UPDATE
67	68	UPDATE	67	68	UPDATE
69	70	UPDATE	69	70	UPDATE
71	72	UPDATE	71	72	UPDATE
73	74	UPDATE	73	74	UPDATE
75	76	UPDATE	75	76	UPDATE
77	78	UPDATE	77	78	UPDATE
79	80	UPDATE	79	80	UPDATE
81	82	UPDATE	81	82	UPDATE
83	84	UPDATE	83	84	UPDATE
85	86	UPDATE	85	86	UPDATE
87	88	UPDATE	87	88	UPDATE
89	90	UPDATE	89	90	UPDATE
91	92	UPDATE	91	92	UPDATE
93	94	UPDATE	93	94	UPDATE
95	96	UPDATE	95	96	UPDATE
97	98	UPDATE	97	98	UPDATE
99	100	UPDATE	99	100	UPDATE

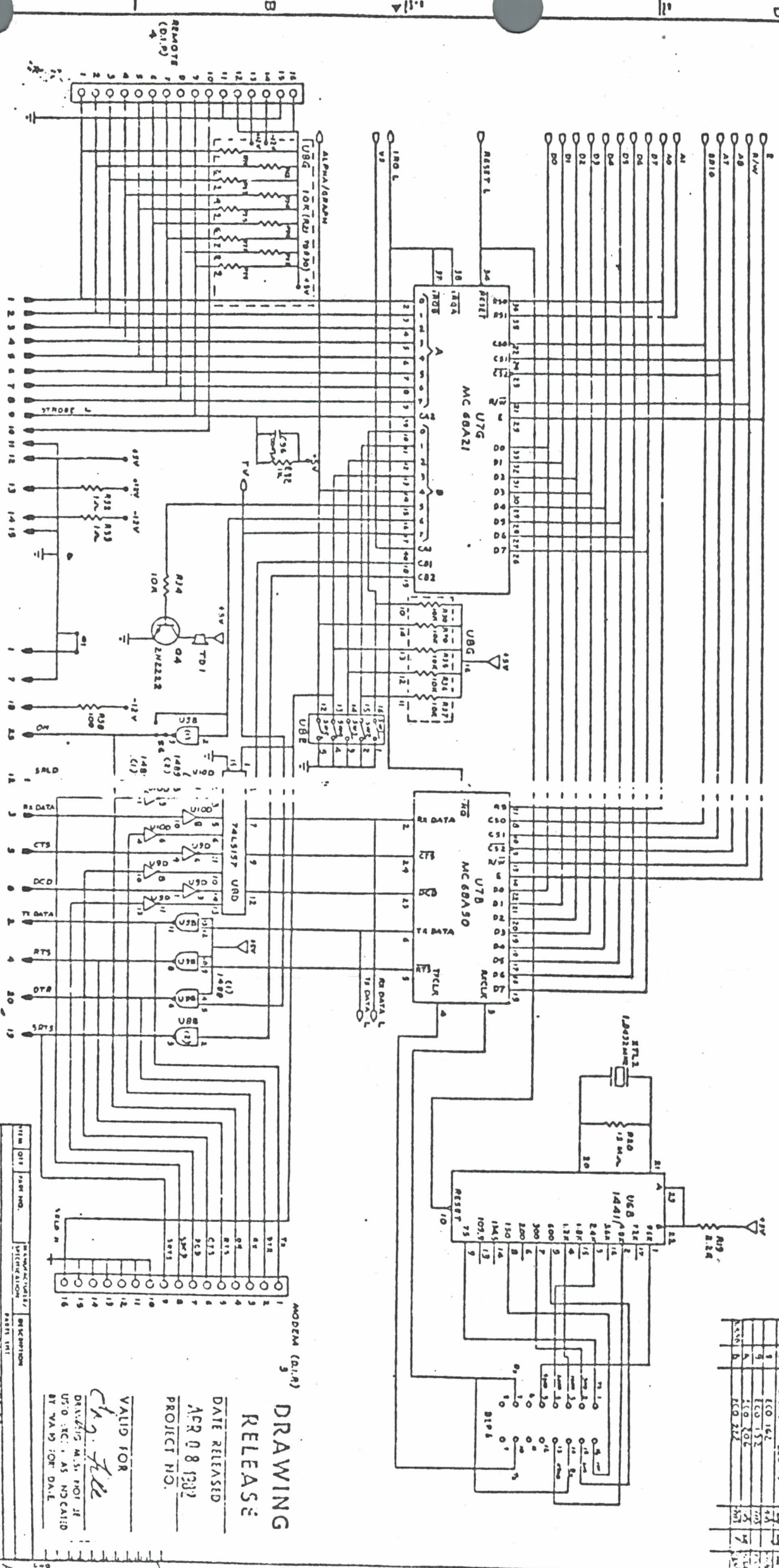


THE CIRCUITS WITHIN THE BOX IS ON A GROUND PLANE. THE BOX SHOULD BE TO THE GROUND PLANE. THE GROUND PLANE SHOULD BE RETURNED TO BOARD AT ONLY ONE PLACE. INSTEAD THE GROUND PLANE SHOULD BE RETURNED BY A SEPARATE ROUTE TO ONLY THE MAIN POWER GROUND (BY AN OPTIONAL JUMPER WIRE IF REQUIRED)

ITEM	QTY	PART NO.	MANUFACTURER/DESCRIPTION
1	1	74LS164	74LS164
2	1	74LS164	74LS164
3	1	74LS164	74LS164
4	1	74LS164	74LS164
5	1	74LS164	74LS164
6	1	74LS164	74LS164
7	1	74LS164	74LS164
8	1	74LS164	74LS164
9	1	74LS164	74LS164
10	1	74LS164	74LS164
11	1	74LS164	74LS164
12	1	74LS164	74LS164
13	1	74LS164	74LS164
14	1	74LS164	74LS164
15	1	74LS164	74LS164
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18	1	74LS164	74LS164
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97	1	74LS164	74LS164
98	1	74LS164	74LS164
99	1	74LS164	74LS164
100	1	74LS164	74LS164

norpak  
LOGIC DIAGRAM  
PC8, PORT3





P1 KEYBOARD

P2 HOST INTERFACE

ITEM	QTY	PART NO.	DESCRIPTION
1	1	74LS157	74LS157 UND
2	1	MC68A50	MC68A50 UND
3	1	MC68A50	MC68A50 UND
4	1	74LS157	74LS157 UND
5	1	74LS157	74LS157 UND
6	1	74LS157	74LS157 UND
7	1	74LS157	74LS157 UND
8	1	74LS157	74LS157 UND
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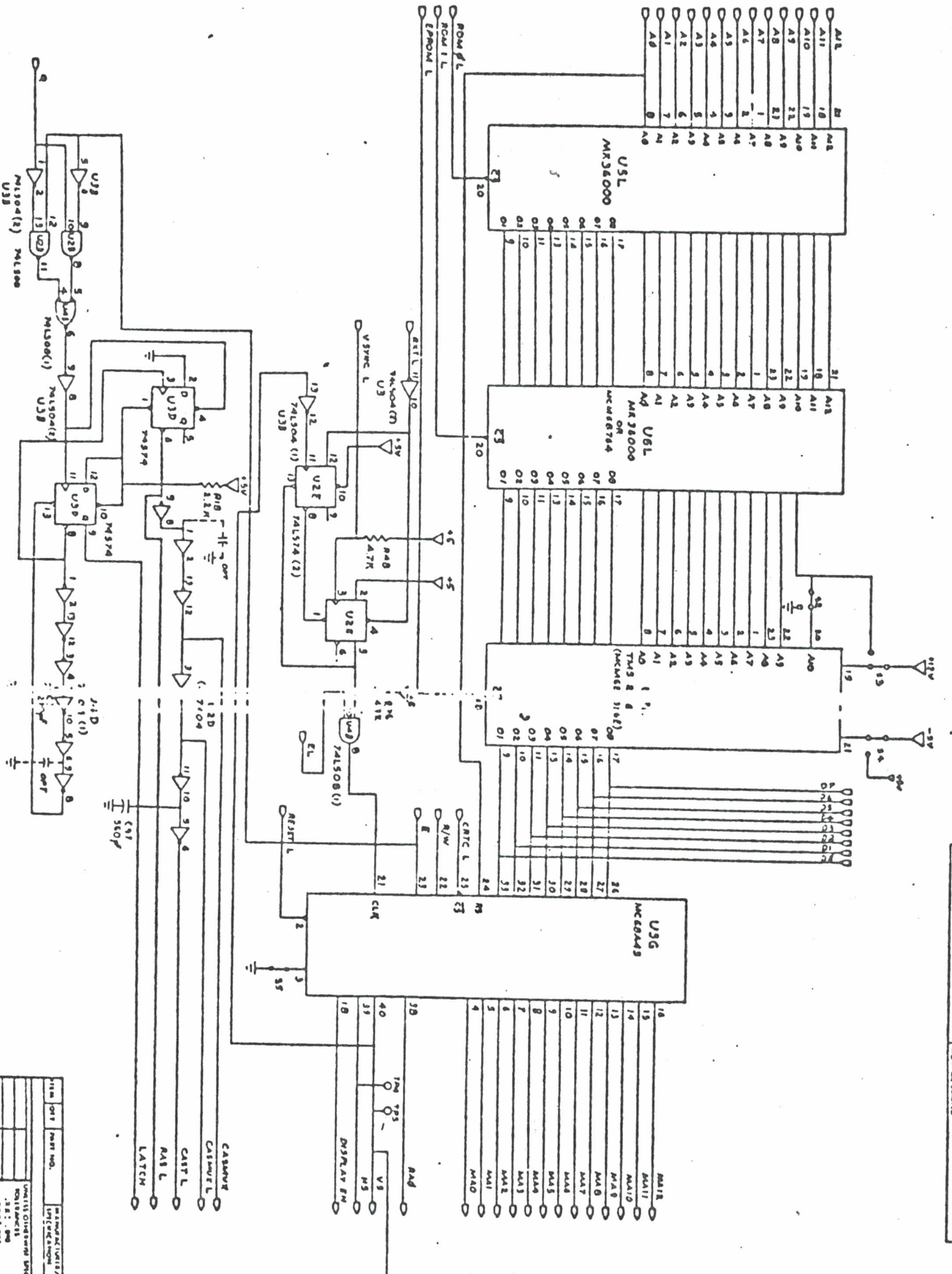
DRAWING RELEASE  
 DATE RELEASED  
 APR 08 1982  
 PROJECT NO.  
 VALID FOR  
 Chg. File  
 DRAWING M.S. PROJ. #  
 U.S. SEC. AS NCALIBD  
 BY VAAS FOR DA.L

Item	Part No.	Description	QTY	Unit
1	74LS157	74LS157 UND	1	PCB
2	MC68A50	MC68A50 UND	1	PCB
3	MC68A50	MC68A50 UND	1	PCB
4	74LS157	74LS157 UND	1	PCB
5	74LS157	74LS157 UND	1	PCB
6	74LS157	74LS157 UND	1	PCB
7	74LS157	74LS157 UND	1	PCB
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96	74LS157	74LS157 UND	1	PCB
97	74LS157	74LS157 UND	1	PCB
98	74LS157	74LS157 UND	1	PCB
99	74LS157	74LS157 UND	1	PCB
100	74LS157	74LS157 UND	1	PCB

This drawing is based on the latest information available at the time of preparation. It is subject to change without notice.

ITEM	QTY	PART NO.	DESCRIPTION
1	1	74LS157	74LS157 UND
2	1	MC68A50	MC68A50 UND
3	1	MC68A50	MC68A50 UND
4	1	74LS157	74LS157 UND
5	1	74LS157	74LS157 UND
6	1	74LS157	74LS157 UND
7	1	74LS157	74LS157 UND
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16	1	74LS157	74LS157 UND
17	1	74LS157	74LS157 UND
18	1	74LS157	74LS157 UND
19	1	74LS157	74LS157 UND

REV	DESCRIPTION	DATE	BY	CHKD
1	PROTOTYPE			
2	UPDATE			
3	UPDATE			
4	UPDATE			
5	UPDATE			
6	UPDATE			
7	ISSUE TO PRODUCTION			
8	ECO 142			
9	ECO 152			
10	ECO 205			
11	ECO 207			
12	ECO 208			



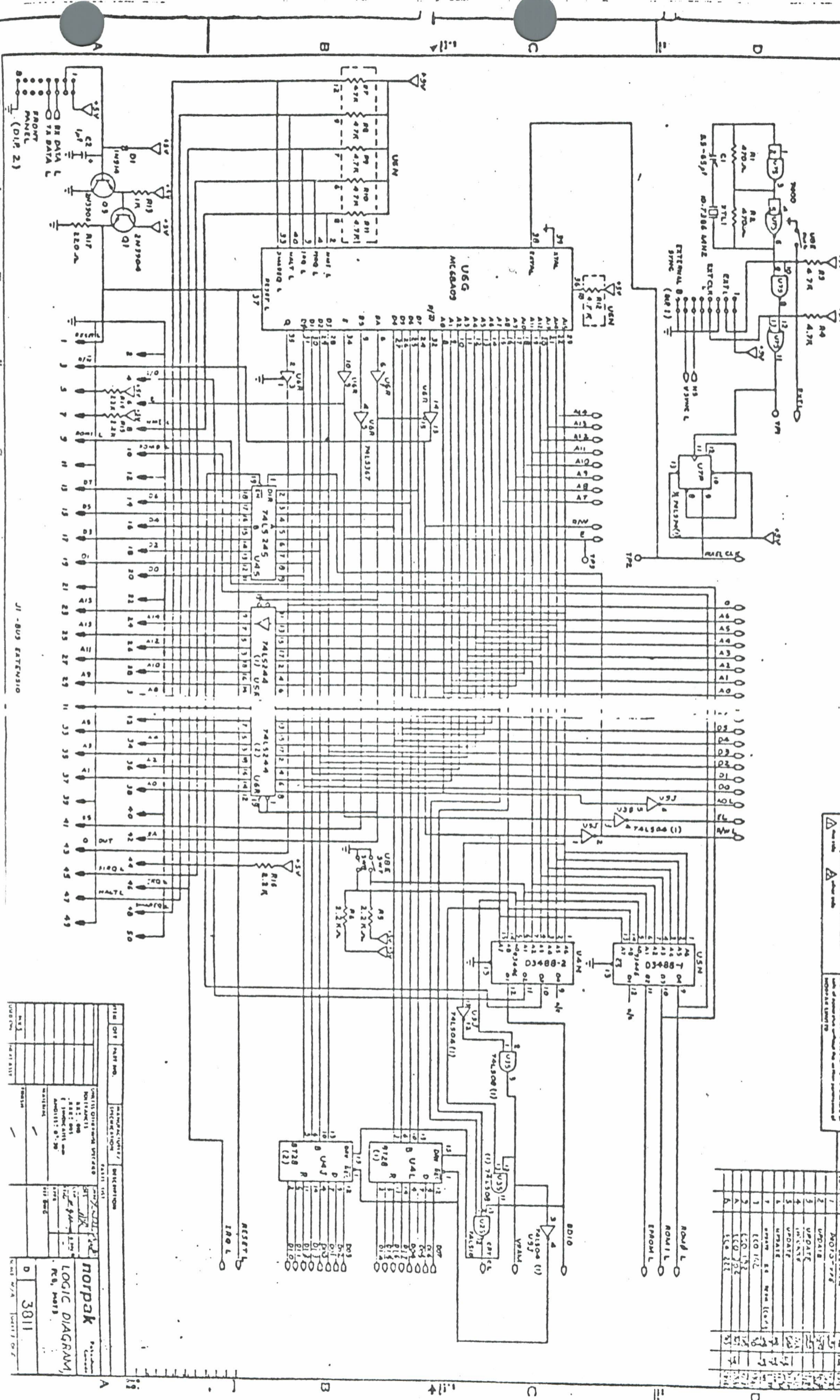
VALID FOR  
 DATE RELEASED  
 APR 08 1982  
 PROJECT NO.  
 3811

DRAWING  
 RELEASED

ITEM	QTY	PART NO.	DESCRIPTION
1	1	74LS00	NAND
2	1	74LS04	NOT
3	1	74LS10	NAND
4	1	74LS13	NOT
5	1	74LS157	DECODER
6	1	74LS158	MULTIPLEXER
7	1	74LS159	DECODER
8	1	74LS158	MULTIPLEXER
9	1	74LS157	DECODER
10	1	74LS158	MULTIPLEXER
11	1	74LS159	DECODER
12	1	74LS158	MULTIPLEXER
13	1	74LS157	DECODER
14	1	74LS158	MULTIPLEXER
15	1	74LS159	DECODER
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44	1	74LS158	MULTIPLEXER
45	1	74LS157	DECODER
46	1	74LS158	MULTIPLEXER
47	1	74LS159	DECODER
48	1	74LS158	MULTIPLEXER
49	1	74LS157	DECODER
50	1	74LS158	MULTIPLEXER

norpak  
 LOGIC DIAGRAM  
 3811





JI-803 EXTENSION

REV	DATE	DESCRIPTION
1	04/73	REVISED
2	04/73	REVISED
3	04/73	REVISED
4	04/73	REVISED
5	04/73	REVISED
6	04/73	REVISED
7	04/73	REVISED
8	04/73	REVISED
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48	04/73	REVISED
49	04/73	REVISED
50	04/73	REVISED

norpac  
LOGIC DIAGRAM,  
REV. 04/73  
3811

For 11 pin connectors in between indicated  
by two dots. indicates  
that of space pins within the indicated  
connector limits.

NO.	REV	DESCRIPTION	DATE
1	1	REVISED	04/73
2	2	REVISED	04/73
3	3	REVISED	04/73
4	4	REVISED	04/73
5	5	REVISED	04/73
6	6	REVISED	04/73
7	7	REVISED	04/73
8	8	REVISED	04/73
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47	47	REVISED	04/73
48	48	REVISED	04/73
49	49	REVISED	04/73
50	50	REVISED	04/73







NOTE: ALL I.C.S MUST BE TESTED BEFORE ASSEMBLY

QTY	ITEM NO	PART NO	MANUFACTURER	DESCRIPTION	UNIT PRICE	TOTAL PRICE
1	10	00000-10/75	Steel	Cap. 100, 100, 100, 250, 400, 500, 600, 700, 800, 900, 1000, 1100, 1200, 1300, 1400, 1500, 1600, 1700, 1800, 1900, 2000, 2100, 2200, 2300, 2400, 2500, 2600, 2700, 2800, 2900, 3000, 3100, 3200, 3300, 3400, 3500, 3600, 3700, 3800, 3900, 4000, 4100, 4200, 4300, 4400, 4500, 4600, 4700, 4800, 4900, 5000, 5100, 5200, 5300, 5400, 5500, 5600, 5700, 5800, 5900, 6000, 6100, 6200, 6300, 6400, 6500, 6600, 6700, 6800, 6900, 7000, 7100, 7200, 7300, 7400, 7500, 7600, 7700, 7800, 7900, 8000, 8100, 8200, 8300, 8400, 8500, 8600, 8700, 8800, 8900, 9000, 9100, 9200, 9300, 9400, 9500, 9600, 9700, 9800, 9900, 10000		

QTY	ITEM NO	PART NO	MANUFACTURER	DESCRIPTION	UNIT PRICE	TOTAL PRICE
1	11	00000-11/75	Steel	Cap. 100, 100, 100, 250, 400, 500, 600, 700, 800, 900, 1000, 1100, 1200, 1300, 1400, 1500, 1600, 1700, 1800, 1900, 2000, 2100, 2200, 2300, 2400, 2500, 2600, 2700, 2800, 2900, 3000, 3100, 3200, 3300, 3400, 3500, 3600, 3700, 3800, 3900, 4000, 4100, 4200, 4300, 4400, 4500, 4600, 4700, 4800, 4900, 5000, 5100, 5200, 5300, 5400, 5500, 5600, 5700, 5800, 5900, 6000, 6100, 6200, 6300, 6400, 6500, 6600, 6700, 6800, 6900, 7000, 7100, 7200, 7300, 7400, 7500, 7600, 7700, 7800, 7900, 8000, 8100, 8200, 8300, 8400, 8500, 8600, 8700, 8800, 8900, 9000, 9100, 9200, 9300, 9400, 9500, 9600, 9700, 9800, 9900, 10000		

QTY	ITEM NO	PART NO	MANUFACTURER	DESCRIPTION	UNIT PRICE	TOTAL PRICE
1	1	00000-1/75	Steel	Cap. 100, 100, 100, 250, 400, 500, 600, 700, 800, 900, 1000, 1100, 1200, 1300, 1400, 1500, 1600, 1700, 1800, 1900, 2000, 2100, 2200, 2300, 2400, 2500, 2600, 2700, 2800, 2900, 3000, 3100, 3200, 3300, 3400, 3500, 3600, 3700, 3800, 3900, 4000, 4100, 4200, 4300, 4400, 4500, 4600, 4700, 4800, 4900, 5000, 5100, 5200, 5300, 5400, 5500, 5600, 5700, 5800, 5900, 6000, 6100, 6200, 6300, 6400, 6500, 6600, 6700, 6800, 6900, 7000, 7100, 7200, 7300, 7400, 7500, 7600, 7700, 7800, 7900, 8000, 8100, 8200, 8300, 8400, 8500, 8600, 8700, 8800, 8900, 9000, 9100, 9200, 9300, 9400, 9500, 9600, 9700, 9800, 9900, 10000		

QTY	ITEM NO	PART NO	MANUFACTURER	DESCRIPTION	UNIT PRICE	TOTAL PRICE
1	2	00000-2/75	Steel	Cap. 100, 100, 100, 250, 400, 500, 600, 700, 800, 900, 1000, 1100, 1200, 1300, 1400, 1500, 1600, 1700, 1800, 1900, 2000, 2100, 2200, 2300, 2400, 2500, 2600, 2700, 2800, 2900, 3000, 3100, 3200, 3300, 3400, 3500, 3600, 3700, 3800, 3900, 4000, 4100, 4200, 4300, 4400, 4500, 4600, 4700, 4800, 4900, 5000, 5100, 5200, 5300, 5400, 5500, 5600, 5700, 5800, 5900, 6000, 6100, 6200, 6300, 6400, 6500, 6600, 6700, 6800, 6900, 7000, 7100, 7200, 7300, 7400, 7500, 7600, 7700, 7800, 7900, 8000, 8100, 8200, 8300, 8400, 8500, 8600, 8700, 8800, 8900, 9000, 9100, 9200, 9300, 9400, 9500, 9600, 9700, 9800, 9900, 10000		

QTY	ITEM NO	PART NO	MANUFACTURER	DESCRIPTION	UNIT PRICE	TOTAL PRICE
1	3	00000-3/75	Steel	Cap. 100, 100, 100, 250, 400, 500, 600, 700, 800, 900, 1000, 1100, 1200, 1300, 1400, 1500, 1600, 1700, 1800, 1900, 2000, 2100, 2200, 2300, 2400, 2500, 2600, 2700, 2800, 2900, 3000, 3100, 3200, 3300, 3400, 3500, 3600, 3700, 3800, 3900, 4000, 4100, 4200, 4300, 4400, 4500, 4600, 4700, 4800, 4900, 5000, 5100, 5200, 5300, 5400, 5500, 5600, 5700, 5800, 5900, 6000, 6100, 6200, 6300, 6400, 6500, 6600, 6700, 6800, 6900, 7000, 7100, 7200, 7300, 7400, 7500, 7600, 7700, 7800, 7900, 8000, 8100, 8200, 8300, 8400, 8500, 8600, 8700, 8800, 8900, 9000, 9100, 9200, 9300, 9400, 9500, 9600, 9700, 9800, 9900, 10000		

norpak  
MOTHER BOARD  
NOT SELECTED  
D 02-00010-01

FORM NO	ITEM	QTY	UNIT	DESCRIPTION	MANUFACTURER	PRICE
10	1	1	EA	...	...	...
10	2	1	EA	...	...	...
10	3	1	EA	...	...	...
10	4	1	EA	...	...	...
10	5	1	EA	...	...	...
10	6	1	EA	...	...	...
10	7	1	EA	...	...	...
10	8	1	EA	...	...	...
10	9	1	EA	...	...	...
10	10	1	EA	...	...	...

FORM NO	ITEM	QTY	UNIT	DESCRIPTION	MANUFACTURER	PRICE
10	11	1	EA	...	...	...
10	12	1	EA	...	...	...
10	13	1	EA	...	...	...
10	14	1	EA	...	...	...
10	15	1	EA	...	...	...
10	16	1	EA	...	...	...
10	17	1	EA	...	...	...
10	18	1	EA	...	...	...
10	19	1	EA	...	...	...
10	20	1	EA	...	...	...

FORM NO	ITEM	QTY	UNIT	DESCRIPTION	MANUFACTURER	PRICE
10	21	1	EA	...	...	...
10	22	1	EA	...	...	...
10	23	1	EA	...	...	...
10	24	1	EA	...	...	...
10	25	1	EA	...	...	...
10	26	1	EA	...	...	...
10	27	1	EA	...	...	...
10	28	1	EA	...	...	...
10	29	1	EA	...	...	...
10	30	1	EA	...	...	...

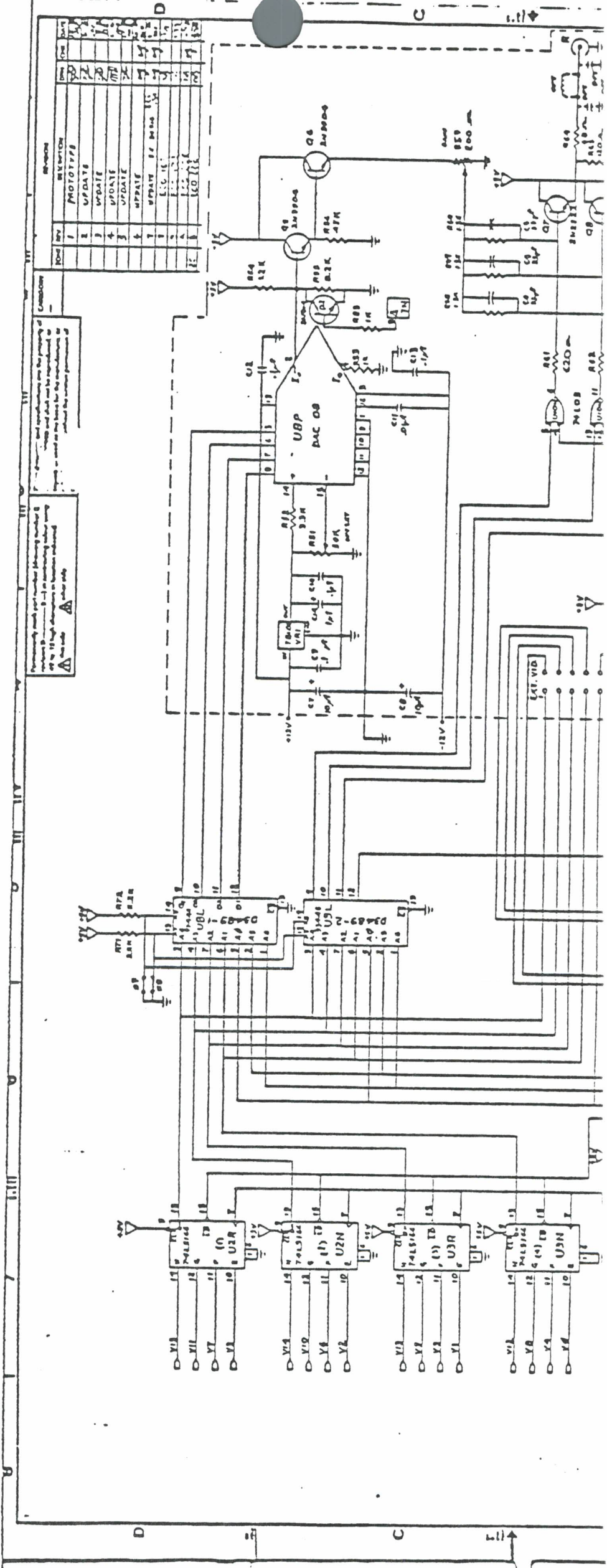
FORM NO	ITEM	QTY	UNIT	DESCRIPTION	MANUFACTURER	PRICE
10	31	1	EA	...	...	...
10	32	1	EA	...	...	...
10	33	1	EA	...	...	...
10	34	1	EA	...	...	...
10	35	1	EA	...	...	...
10	36	1	EA	...	...	...
10	37	1	EA	...	...	...
10	38	1	EA	...	...	...
10	39	1	EA	...	...	...
10	40	1	EA	...	...	...

FORM NO	ITEM	QTY	UNIT	DESCRIPTION	MANUFACTURER	PRICE
10	41	1	EA	...	...	...
10	42	1	EA	...	...	...
10	43	1	EA	...	...	...
10	44	1	EA	...	...	...
10	45	1	EA	...	...	...
10	46	1	EA	...	...	...
10	47	1	EA	...	...	...
10	48	1	EA	...	...	...
10	49	1	EA	...	...	...
10	50	1	EA	...	...	...

**norpack**  
 A-100 DMC  
 MOTHER BOARD  
 NOT RECOMMENDED  
 D-02-04010-01

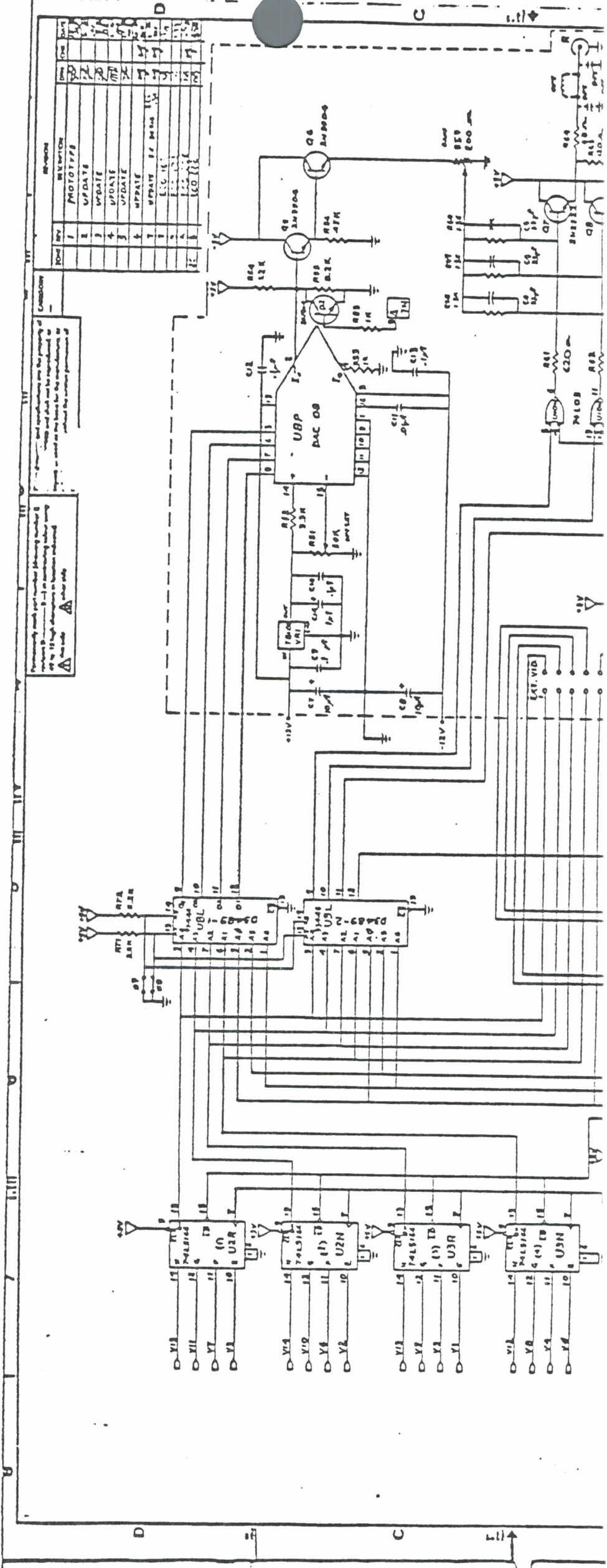
PARTS LIST

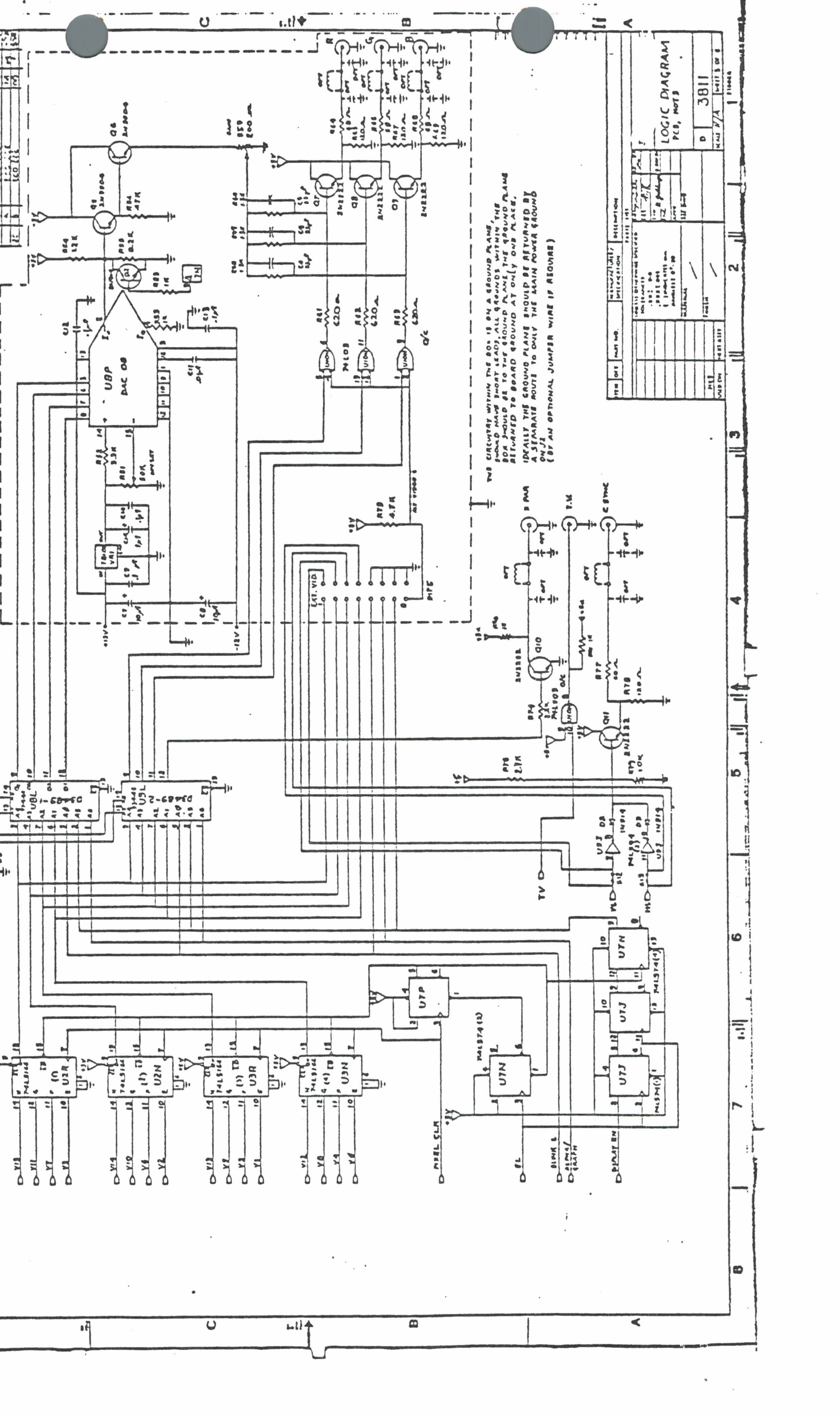
DESCRIPTION	MANUFACTURER	COMMERCIAL NUMBER	CIRCUIT REFERENCE
IC, TTL, 7400, NAND, 2INPUT	FAIRCHILD MFG	7400FC	U7S
IC, TTL, 74LS00, NAND, 2INPUT	FAIRCHILD MFG	74LS00PC	U29
IC, TTL, 74LS03, NAND, 2INPUT, OC	FAIRCHILD MFG	74LS03PC	U10N
IC, TTL, 7404, HEX, INVERTER	FAIRCHILD MFG	7404FC	U2D, U4D
IC, TTL, 74LS04, HEX, INVERTER	FAIRCHILD MFG	74LS04PC	U9J, U3B
IC, TTL, 74LS08, AND, 2INPUT	FAIRCHILD MFG	74LS08PC	U3S, U4B
IC, TTL, 74LS10, NAND, 3INPUT	FAIRCHILD MFG	74LS10PC	U2S
IC, TTL, 74LS74, FLIP, FLOP, DUAL, D	FAIRCHILD MFG	74LS74PC	U7P, U2E, U7N, U7J
IC, TTL, 74S74, DUAL, FLIP, FLOP	FAIRCHILD MFG	74S74PC	U3D
IC, TTL, 74LS157, QUAD, 2INPUT, MPX	FAIRCHILD MFG	74LS157PC	U8D
IC, TTL, 74LS166, 8BIT, SHIFT, REG	FAIRCHILD MFG	74LS166PC	U2N, U3N, U2R, U3R
IC, TTL, 74LS244, OCTAL, BUSDRIVER	FAIRCHILD MFG	74LS244PC	U5R, U4R
IC, TTL, 74LS245, OCTAL, TRANSCEIV	FAIRCHILD MFG	74LS245PC	U4S
IC, TTL, 74S257, QUAD, 2INPUT, MPX,	FAIRCHILD MFG	74S257PC	U4E, U3E, U3G, U4G
IC, TTL, 74LS367, HEX, BUSDRIV, TRI	FAIRCHILD MFG	74LS367PC	U6R
IC, TTL, 74LS373, OCTAL, LATCH	FAIRCHILD MFG	74LS373PC	U3J, U3L, U2J, U2L
IC, TTL, 74LS390, DUAL, DECADE, COU	FAIRCHILD MFG	74LS390PC	U8J
IC, UP, 68A09, 8BIT, MICRO, 1.5MHZ	MOTOROLA MFG	MC68A09	U6G
IC, UP, 68A21, PERIPHERAL, I/O	MOTOROLA MFG	MC68A21	U7G
IC, UP, 68A45, CRTC	MOTOROLA MFG	MC68A45	U5G
IC, UP, 68A50, ACIA	MOTOROLA MFG	MC68A50	U7B
IC, DIG, CMOS, MC14411, BIT-KATE, F	MOTOROLA MFG	MC14411	U6B
IC, INTF, DIG, QUAD, 75188, RS232, D	MOTOROLA MFG	MC1488	U8B, U9B
IC, INTF, DIG, QUAD, 75189, RS232, R	MOTOROLA MFG	MC1489	U9D, U10D
IC, INTF, DIG, 8T29QUAD, RUSTRANS	NO VENDOR FOUND	NO COMM. P/N FOUND	U4L, U4J
IC, RAM, 4116, 16KX1, 150, 1375NS	MOTOROLA MFG	MCM4116BF-15	ALL U1'S
TRANSISTOR, NPN, TO-18	HAMILTON AVNET M	2N914	Q2
TRANSIUCER, 3-12V, 40MA, 2600HM, 7	PANASONIC MFG	A14R06C	TD1
XTAL, 1.8432MHZ, .02%, M17W	CTS MFG	MP018	XTL2
XTAL, 10.739MHZ	CTS MFG	S1032-2-BA	XTL1
IC, DAC, 8BIT, 135NS, MULTIPLYING	NATIONAL MFG	DAC0800LCN	U8P
IC, REG, 8V, TO-92	MOTOROLA MFG	MC78L08	VR1
IC, REG, -5V, TO-220	TO BE INPUT AT L	LM7905C	VR2
DIODE, SIGNAL, DO-35	HAMILTON AVNET M	1N914	D1, D2, D3
TRANSISTOR, NPN, TO-18	HAMILTON AVNET M	2N2222	Q4, Q7-11
TRANSISTOR, NPN, TO-92	HAMILTON AVNET M	2N3904	Q1, 5, 6
TRANSISTOR, PNP, TO-92	HAMILTON AVNET M	2N3906	Q3
CONN, D/SUB, 15PIN, FEMALE	CANNON MFG	DA15S	P1
CONN, D/SUB, 25PIN, MALE	CANNON MFG	DR25P	P2
CONN, RNC, RESEP, ISOLATED	AMPHENOL MFG	31-010	S, X, TV, R, G, B
CONN, WAFER, .156, 12PIN, MALE, R.A	MOLEX MFG	09-88-2121	J2
CONN, SOCKET, IC, 24P, DIP, LOW, TIN	CAMBION MFG	703-5324-01-04-12	USL, U6L, U7L
CONN, SOCKET, IC, 16P, DIP, TIN, CLI	ROBERTSON-NUGENT	ICN-163-53-T	DIP3, 4
RES, VAR, 50K, 10T, 1/4W, CER, TOP	BECKMAN MFG	68WR50K	R51
RES, VAR, 200/OHM, 10T, 1/4W, CER, T	BECKMAN MFG	68WR200	R57
RES, FIXED, 33/OHM, TRANS, 16PIN, D	ALLEN BRADLEY MF	316R330	U2G
RES, FIXED, 4.7K, PULLUP, 16PIN, DI	ALLEN BRADLEY MF	316A472	U6N
RES, FIXED, 10K/OHM, PULLUP, 16PIN	ALLEN BRADLEY MF	316A103	U8G
RES, FIXED, 1/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/1 OHM	R32, R33
RES, FIXED, 33/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/33 OHM	R46, 49, 50
RES, FIXED, 68/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/68 OHM	R64, R68, R66, R77
RES, FIXED, 100/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/100 OHM	R38, 80
RES, FIXED, 120/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOL 5/120 OHM	R65, 67, 69, 78
RES, FIXED, 220/OHM, 5%, 1/4W, CAR	ALLEN BRADLEY MF	CR-221-5	R17
RES, FIXED, 620/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/620 OHM	R61, 62, 63
RES, FIXED, 470/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/470 OHM	R1, 2
RES, FIXED, 1K/OHM, 5%, 1/4W, CAR	ALLEN BRADLEY MF	CR-102-5	R13, R53, 81, 82, 79, 83
RES, FIXED, 1.3K/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/1.3K	R58, 59, 60
RES, FIXED, 2.2K/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/2K2	R5, 6, 14, 15, 16, 18, 19, 71, 72, 74
RES, FIXED, 3.3K/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/3K3	R52
RES, FIXED, 4.7K/OHM, 5%, 1/4W, CAR	ALLEN BRADLEY MF	CR-472-5	R3, 4, 48, 73, 76
RES, FIXED, 10K/OHM, 5%, 1/4W, CAR	ALLEN BRADLEY MF	CR-103-5	R34
RES, FIXED, 47K/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/47K	R56
RES, FIXED, 15K/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/15K OHM	R20
RES, FIXED, 1.2K/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/1K2	R54
RES, FIXED, 2.7K/OHM, 5%, 1/4W, CAR	ALLEN BRADLEY MF	CR-272-5	R75
RES, FIXED, 8.2K/OHM, 5%, 1/4W, CAR	PHILIPS MFG	CR25TOLS/8K2	R55
CAP, CER, RADIAL, 560PF, 10%, 1000V	CENTRALAB MFG	DD-551	C97
CAP, CER, RADIAL, 0.01UF, 20%, 50V	ERIE MFG	9121-050-651-103M	C11
CAP, CER, RADIAL, 0.1UF, 20%, 50V, Z	ERIE MFG	9121-050-25U-104	C9, C10, C12, C13
CAP, TANT, RADIAL, 1UF, 20%, 35V	ITT MFG	TAG1.0M35	C2, 14
CAP, ALUM, AXIAL, 10UF, 50/10%, 50V	SIEMENS MFG	B41313-A5106-T	C7, 8, 13, 16-21
FRUG, EPROM, MK3, PD1+, COMMON, 8K#	NORPAK LTD	36-05383-02	U5L
FRUG, EPROM, MK3, PD1+, COMMON, 8K#	NORPAK LTD	36-05383-01	U6L
FRUG, EPROM, MK3, PD1+, 2N, 60HZ	NORPAK LTD	36-05382-01	U7L
FRUG, ROM, RGB, DECODER, 1	NORPAK LTD	36-03489-01	U8L
FRUG, ROM, RGB, DECODER, 2	NORPAK LTD	36-03487-02	U9L
FRUG, ROM, ADDRESS, DECODER	NORPAK LTD	36-03488-01	U5N
FRUG, ROM, ADDRESS, DECODER	NORPAK LTD	36-03488-02	U4N
CONN, SOCKET, CLIF, 16P, RETAINING	ROBERTSON-NUGENT	RC-76	DIP3, 4
CONN, SCREW, LOCK, D/SUB, FEMALE	AMP MFG	205817-1	P1, C2
CAP, CER, RADIAL, 33PF, 10%, 1K, 52L	CENTRALAB MFG	DD-330	C1, 4-6
CAP, CER, RADIAL, 220PF, 10%, 1000V	CENTRALAB MFG	DD-221	C96
COIL, FIXED, 2.2UH, 10%	DELEVAN MFG	1537-20	L1
CAP, CER, RADIAL, 4700PF, 10%, 100V	ERIE MFG	CA05RX472K	P1
CAP, CER, RADIAL, 270PF, 10%, 1000V	CENTRALAB MFG	DD-271	C3



Code	Function	Notes
1	INITIALIZE	
2	UPDATE	
3	UPDATE	
4	UPDATE	
5	UPDATE	
6	UPDATE	
7	UPDATE	
8	UPDATE	
9	UPDATE	
10	UPDATE	
11	UPDATE	
12	UPDATE	
13	UPDATE	
14	UPDATE	
15	UPDATE	
16	UPDATE	
17	UPDATE	
18	UPDATE	
19	UPDATE	
20	UPDATE	

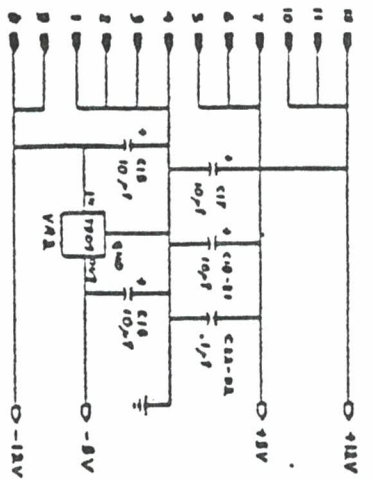
Primarily each part number (factory number) is shown in the table. If a part number is not shown, it is assumed that the part is a standard component. The table is intended to be used as the basis for the construction of the circuit. The table is not intended to be used as the basis for the construction of the circuit.





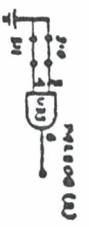
ITEM	QTY	PART NO.	DESCRIPTION	REVISION
1	1	7400	NAND GATE	
2	1	7410	NAND GATE	
3	1	7415	DECODER	
4	1	7432	OR GATE	
5	1	CM108	COMPARATOR	
6	1	CM109	COMPARATOR	
7	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
8	1	7415	DECODER	
9	1	7400	NAND GATE	
10	1	7410	NAND GATE	
11	1	7432	OR GATE	
12	1	CM108	COMPARATOR	
13	1	CM109	COMPARATOR	
14	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
15	1	7415	DECODER	
16	1	7400	NAND GATE	
17	1	7410	NAND GATE	
18	1	7432	OR GATE	
19	1	CM108	COMPARATOR	
20	1	CM109	COMPARATOR	
21	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
22	1	7415	DECODER	
23	1	7400	NAND GATE	
24	1	7410	NAND GATE	
25	1	7432	OR GATE	
26	1	CM108	COMPARATOR	
27	1	CM109	COMPARATOR	
28	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
29	1	7415	DECODER	
30	1	7400	NAND GATE	
31	1	7410	NAND GATE	
32	1	7432	OR GATE	
33	1	CM108	COMPARATOR	
34	1	CM109	COMPARATOR	
35	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
36	1	7415	DECODER	
37	1	7400	NAND GATE	
38	1	7410	NAND GATE	
39	1	7432	OR GATE	
40	1	CM108	COMPARATOR	
41	1	CM109	COMPARATOR	
42	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
43	1	7415	DECODER	
44	1	7400	NAND GATE	
45	1	7410	NAND GATE	
46	1	7432	OR GATE	
47	1	CM108	COMPARATOR	
48	1	CM109	COMPARATOR	
49	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
50	1	7415	DECODER	
51	1	7400	NAND GATE	
52	1	7410	NAND GATE	
53	1	7432	OR GATE	
54	1	CM108	COMPARATOR	
55	1	CM109	COMPARATOR	
56	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
57	1	7415	DECODER	
58	1	7400	NAND GATE	
59	1	7410	NAND GATE	
60	1	7432	OR GATE	
61	1	CM108	COMPARATOR	
62	1	CM109	COMPARATOR	
63	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
64	1	7415	DECODER	
65	1	7400	NAND GATE	
66	1	7410	NAND GATE	
67	1	7432	OR GATE	
68	1	CM108	COMPARATOR	
69	1	CM109	COMPARATOR	
70	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
71	1	7415	DECODER	
72	1	7400	NAND GATE	
73	1	7410	NAND GATE	
74	1	7432	OR GATE	
75	1	CM108	COMPARATOR	
76	1	CM109	COMPARATOR	
77	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
78	1	7415	DECODER	
79	1	7400	NAND GATE	
80	1	7410	NAND GATE	
81	1	7432	OR GATE	
82	1	CM108	COMPARATOR	
83	1	CM109	COMPARATOR	
84	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
85	1	7415	DECODER	
86	1	7400	NAND GATE	
87	1	7410	NAND GATE	
88	1	7432	OR GATE	
89	1	CM108	COMPARATOR	
90	1	CM109	COMPARATOR	
91	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
92	1	7415	DECODER	
93	1	7400	NAND GATE	
94	1	7410	NAND GATE	
95	1	7432	OR GATE	
96	1	CM108	COMPARATOR	
97	1	CM109	COMPARATOR	
98	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
99	1	7415	DECODER	
100	1	7400	NAND GATE	
101	1	7410	NAND GATE	
102	1	7432	OR GATE	
103	1	CM108	COMPARATOR	
104	1	CM109	COMPARATOR	
105	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
106	1	7415	DECODER	
107	1	7400	NAND GATE	
108	1	7410	NAND GATE	
109	1	7432	OR GATE	
110	1	CM108	COMPARATOR	
111	1	CM109	COMPARATOR	
112	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
113	1	7415	DECODER	
114	1	7400	NAND GATE	
115	1	7410	NAND GATE	
116	1	7432	OR GATE	
117	1	CM108	COMPARATOR	
118	1	CM109	COMPARATOR	
119	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
120	1	7415	DECODER	
121	1	7400	NAND GATE	
122	1	7410	NAND GATE	
123	1	7432	OR GATE	
124	1	CM108	COMPARATOR	
125	1	CM109	COMPARATOR	
126	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
127	1	7415	DECODER	
128	1	7400	NAND GATE	
129	1	7410	NAND GATE	
130	1	7432	OR GATE	
131	1	CM108	COMPARATOR	
132	1	CM109	COMPARATOR	
133	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
134	1	7415	DECODER	
135	1	7400	NAND GATE	
136	1	7410	NAND GATE	
137	1	7432	OR GATE	
138	1	CM108	COMPARATOR	
139	1	CM109	COMPARATOR	
140	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
141	1	7415	DECODER	
142	1	7400	NAND GATE	
143	1	7410	NAND GATE	
144	1	7432	OR GATE	
145	1	CM108	COMPARATOR	
146	1	CM109	COMPARATOR	
147	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
148	1	7415	DECODER	
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151	1	7432	OR GATE	
152	1	CM108	COMPARATOR	
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154	1	DAC 08	DIGITAL TO ANALOG CONVERTER	
155	1	7415	DECODER	
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159	1	CM108	COMPARATOR	
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166	1	CM108	COMPARATOR	
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172	1	7432	OR GATE	
173	1	CM108	COMPARATOR	
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242	1	7432	OR GATE	
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244	1	CM109	COMPARATOR	
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246	1	7415	DECODER	
247	1	7400	NAND GATE	
248	1	7410	NAND GATE	
249	1	7432	OR GATE	</

**MOLFX  
PWR  
CONNECTOR  
J2**



Part No.	QTY	DESCRIPTION	UNIT	QTY	DESCRIPTION	UNIT	QTY	DESCRIPTION	UNIT	QTY	DESCRIPTION	UNIT
1488	14	10µF	14	1	10µF	1	1	10µF	1	1	10µF	1
1489	14	10µF	14	1	10µF	1	1	10µF	1	1	10µF	1
4116	3	10µF	3	1	10µF	1	1	10µF	1	1	10µF	1
68A0V	7	10µF	7	1	10µF	1	1	10µF	1	1	10µF	1
68A21	20	10µF	20	1	10µF	1	1	10µF	1	1	10µF	1
68A45	10	10µF	10	1	10µF	1	1	10µF	1	1	10µF	1
68A50	12	10µF	12	1	10µF	1	1	10µF	1	1	10µF	1
8720	16	10µF	16	1	10µF	1	1	10µF	1	1	10µF	1
8716	24	10µF	24	1	10µF	1	1	10µF	1	1	10µF	1
14911	24	10µF	24	1	10µF	1	1	10µF	1	1	10µF	1
4411000	24	10µF	24	1	10µF	1	1	10µF	1	1	10µF	1
13948	16	10µF	16	1	10µF	1	1	10µF	1	1	10µF	1

THIS SHEET HAS  
NUMBER IN CIRCLES  
SERIAL NUMBER  
FOR IDENTIFICATION



- NOTES:**
- 1- THE 4116'S ARE DISCOUPLED WITH 2-10µF CAPACITORS PER CHIP. ONE ON THE +115V AND THE OTHER, ALTERNATELY ON +01-8V.
  - 2- RESISTOR 1488 AND 1489 IS DISCOUPLED WITH ONE 10µF CAP PER TWO CHIPS.
  - 3- 7-10µF AND ALL OTHER CHIPS ARE DISCOUPLED WITH 10µF CAPACITORS TO GROUND ON EACH OF THEIR SUPPLIES.
  - 4- CARE SHOULD BE TAKEN WITH THE TABS OF THE 7805. IT CONNECTS DIRECTLY TO THE +15VOLT VOLTAGE.
  - 5- THESE SHOULD BE APPROX. 4-10µF (ELECTRUM) CAPACITORS DISTRIBUTED OVER THE BOARD FOR 25 VOLTS.
  - 6- POWER LINES AROUND RESISTORS INDICATES THEY ARE PART OF A PACKAGED CHIP.
  - 7- 10µF ELECTROLYTIC DISCOUPLING CAPACITORS ARE NUMBERED C81-105 INCLUSIVE.
  - 8- 10µF CERAMIC DISCOUPLING CAPACITORS ARE NUMBERED C81-105 INCLUSIVE.

**LAST**

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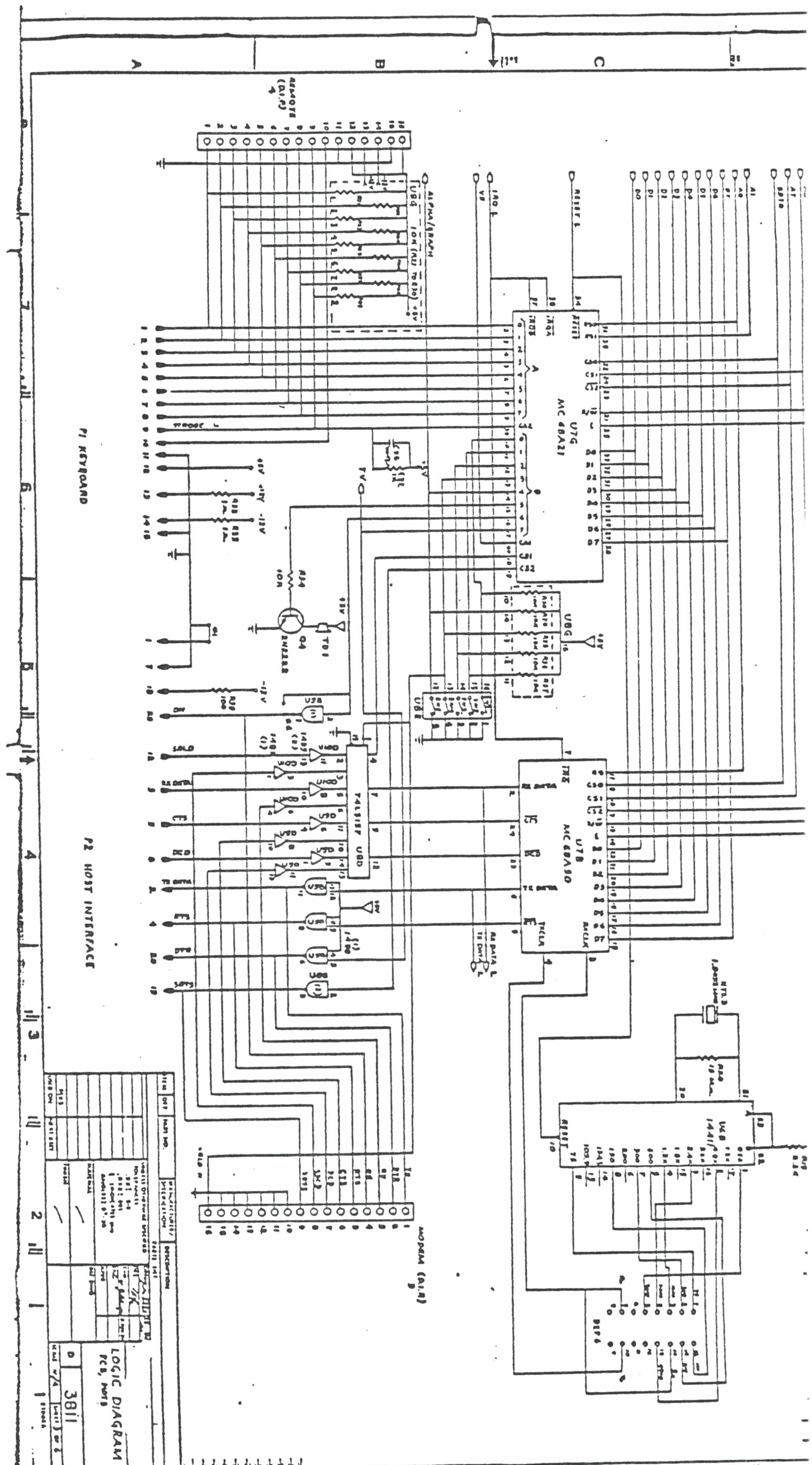
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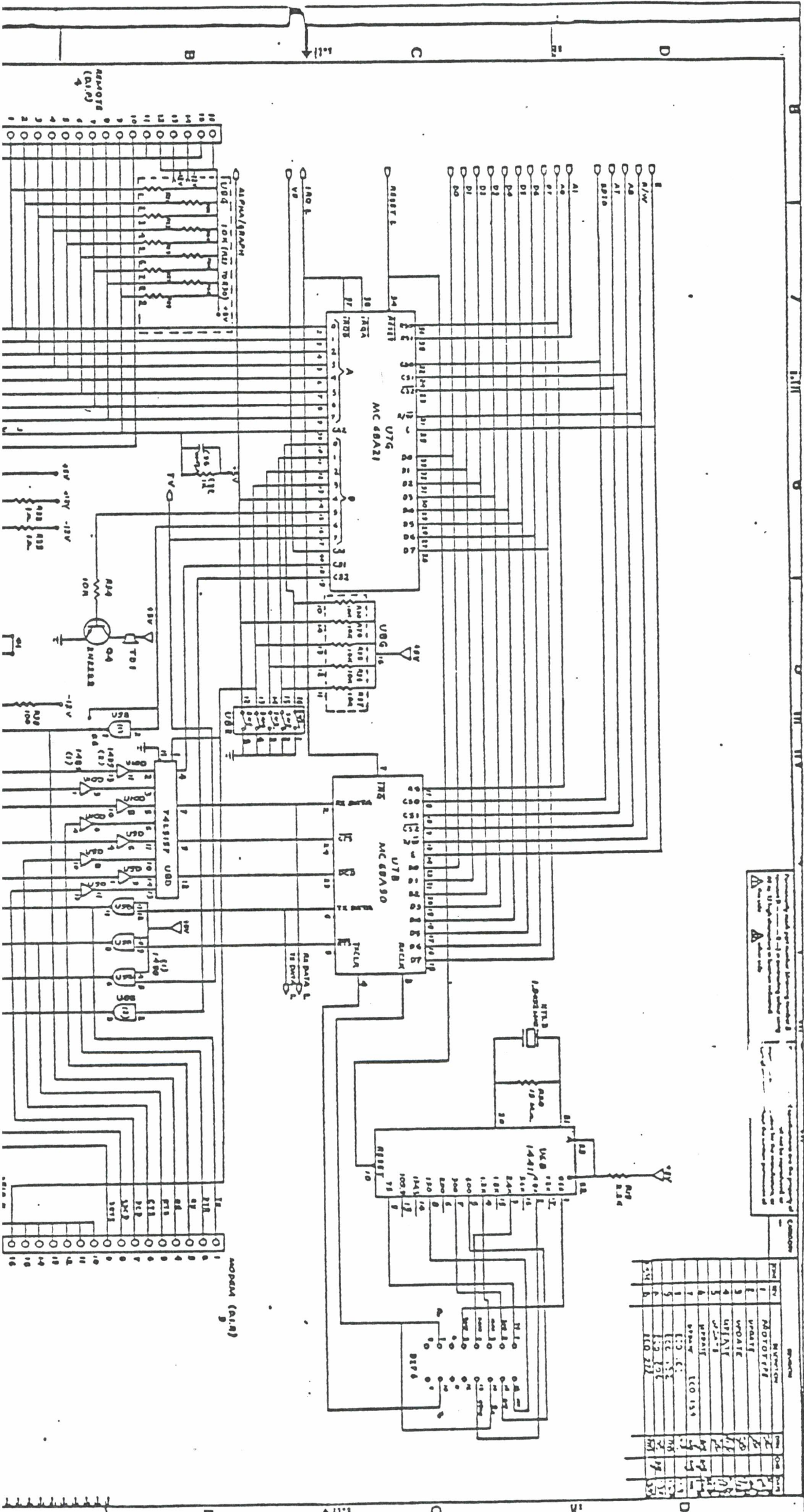
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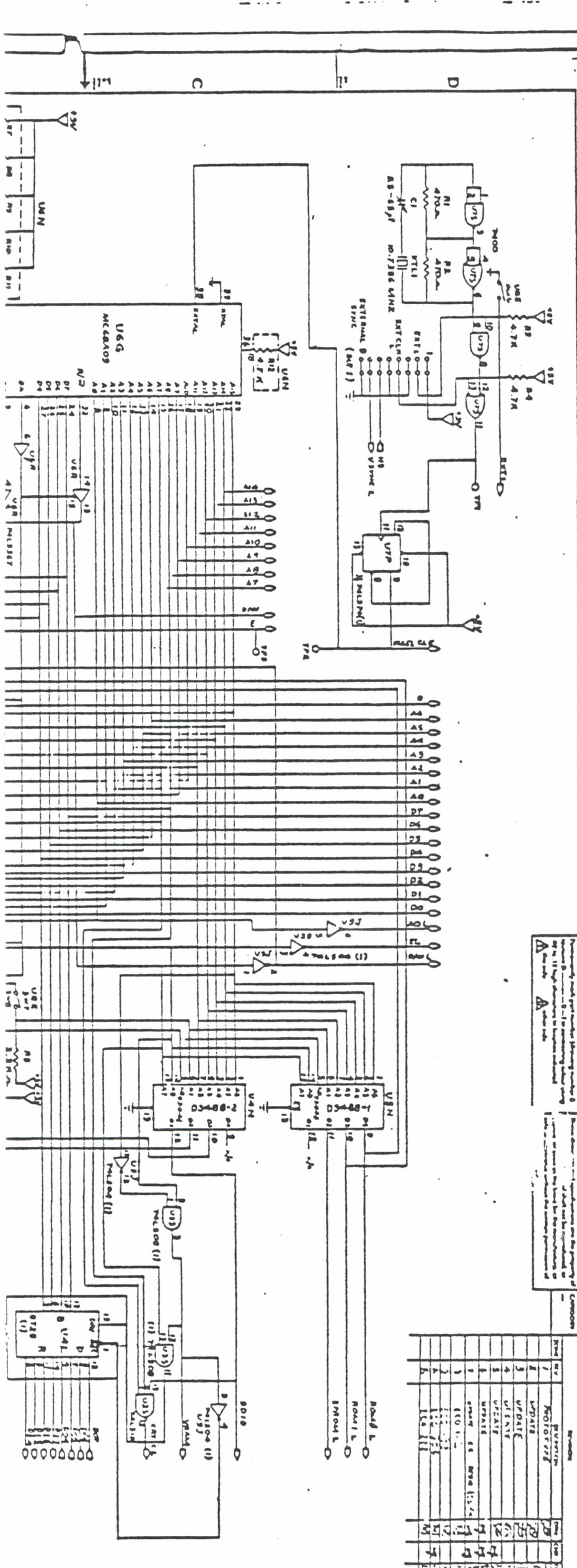


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Part	Quantity	Notes
MC 68A21	1	MC 68A21
MC 68A50	1	MC 68A50
74LS157	1	74LS157
74LS158	1	74LS158
74LS159	1	74LS159
1.5kV NTC	1	1.5kV NTC
RESIST	10	RESIST
U8	1	74LS157
U9	1	74LS158
U10	1	74LS159
U11	1	1.5kV NTC







Pin numbers and pin functions are the property of Motorola. Pin numbers are not to be reproduced or used in any form on the board for the microcontroller or other components without the written permission of Motorola.

Pin	Function	Motor
1	VCC	1
2	VP	2
3	VP	3
4	VP	4
5	VP	5
6	VP	6
7	VP	7
8	VP	8
9	VP	9
10	VP	10
11	VP	11
12	VP	12
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40	VP	40





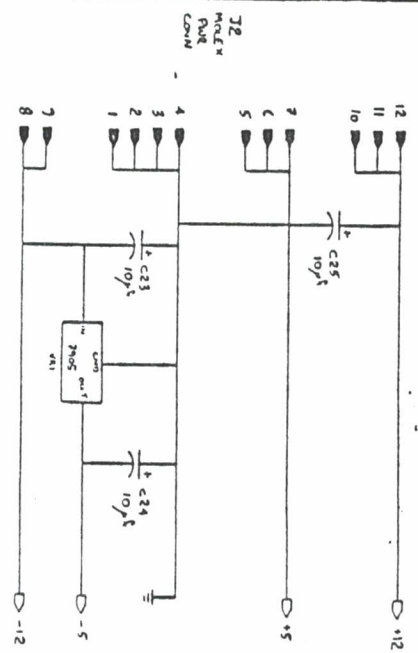
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 PROJECT NO.  
 ID FOR  
 DATE AS NOTED  
 DATE FOR DATE

TOTAL UNIT		ITEM QTY	PART NO.	MANUFACTURER / SPECIFICATION	DESCRIPTION	UNIT
18	1	1	D3928 RC	HORBAR	I.C. GALVANIZED SAT	E30
17	1	1	D3928 RA	HORBAR	I.C. WIRE BOND	E29
16	1	1	74LS174		I.C. HEX LATCH	E28
15	1	1	74LS393		I.C. DUAL BINARY COUNTER	E27
14	1	1	74LS390		I.C. DUAL DECADE COUNTER	E26
13	1	1	74LS374		I.C. DUAL OCTAL LATCH	E25
12	1	1	74LS367		I.C. HEX BUS DRIVER	E24
11	2	2	74LS245		I.C. OCTAL BUS TRANSCEIVER	E23
10	2	2	74LS244		I.C. OCTAL BUS DRIVER	E22
9	1	1	74LS168		I.C. B BIT 5 R	E21
8	1	1	74LS157		I.C. DUAL 2 INPUT NAND	E20
7	2	2	74LS270		I.C. DUAL 0 TYPE 1125 TOP	E19
6	1	1	74LS271		I.C. DUAL 4 INPUT AND	E18
5	1	1	74LS110		I.C. TRIPLE 3 INPUT NAND	E17
4	2	2	74LS04		I.C. HEX INVERTER	E16
3	1	1	74LS500		I.C. DUAL NAND	E15
2	1	1	74LS00		I.C. DUAL NAND	E14
1	1	1	74LS01		I.C. DUAL NAND	E13

TOTAL UNIT		ITEM QTY	PART NO.	MANUFACTURER / SPECIFICATION	DESCRIPTION	UNIT
40	1	1	RC-76	ROBERTSON-WALKER	PC CLIP	E23
39	1	1	ICM-151-58-7	ROBERTSON-WALKER	PC SOCKET 16 PIN	E22
38	1	1			PC LOCK WASHER	E21
37	1	1			PC-32 SCREW	E20
36	1	1			PC-32 SCREW	E19
35	1	1	109-598-01-00-15	CANBIRD	SOCKET 24 PIN DIP	E18
34	1	1	291-36-48-H	WATERLOO	HEAT SINK	E17
33	6	6	475E-108-16	IBM	SOCKET 1/2" x 1/4" DIA	E16
32	33	33	037049-1/63/5	SIEMENS	COIL 100V, 100-108, 25V, AT ELEC. MATERIAL	E15
31	5	5	80000-10/25	SIEMENS	COIL 100V, 100-108, 25V, AT ELEC. MATERIAL	E14
30	1	1	010660E	PHILIPS	COIL 100V, 100-108, 25V, AT ELEC. MATERIAL	E13
29	2	2	316A103	A. B.	RES. 470 OHM, 1/4W, 5%	E12
28	1	1	16808	GRAYHILL	SWITCH, 0.5W 010 STYLE	E11
27	1	1	09-88-2121	MOTOR	CONNECTOR, 12 PIN MALE RIGHT ANGLE, 158°	E10
26	1	1	WA7905T	T. I.	VOLTAGE REGULATOR, 5V, 10220A8	E9
25	1	1	S1032-2-BA	CIS	14.318 MHz CRYSTAL, 32PF 30 OHM	E8
24	1	1	MC68A45	MOTOROLA	I.C. CRTC	E7
23	1	1	MC68A21	MOTOROLA	I.C. P1A	E6
22	1	1	MC2114-10	MOTOROLA	I.C. 16PIN BIT STATIC MEM, 300MS	E5

REV	DATE	BY	CHK	DESCRIPTION
1				FRONT TYPE
2				UPDATE
3				UPDATE ITEM 19, 35, 39, 40

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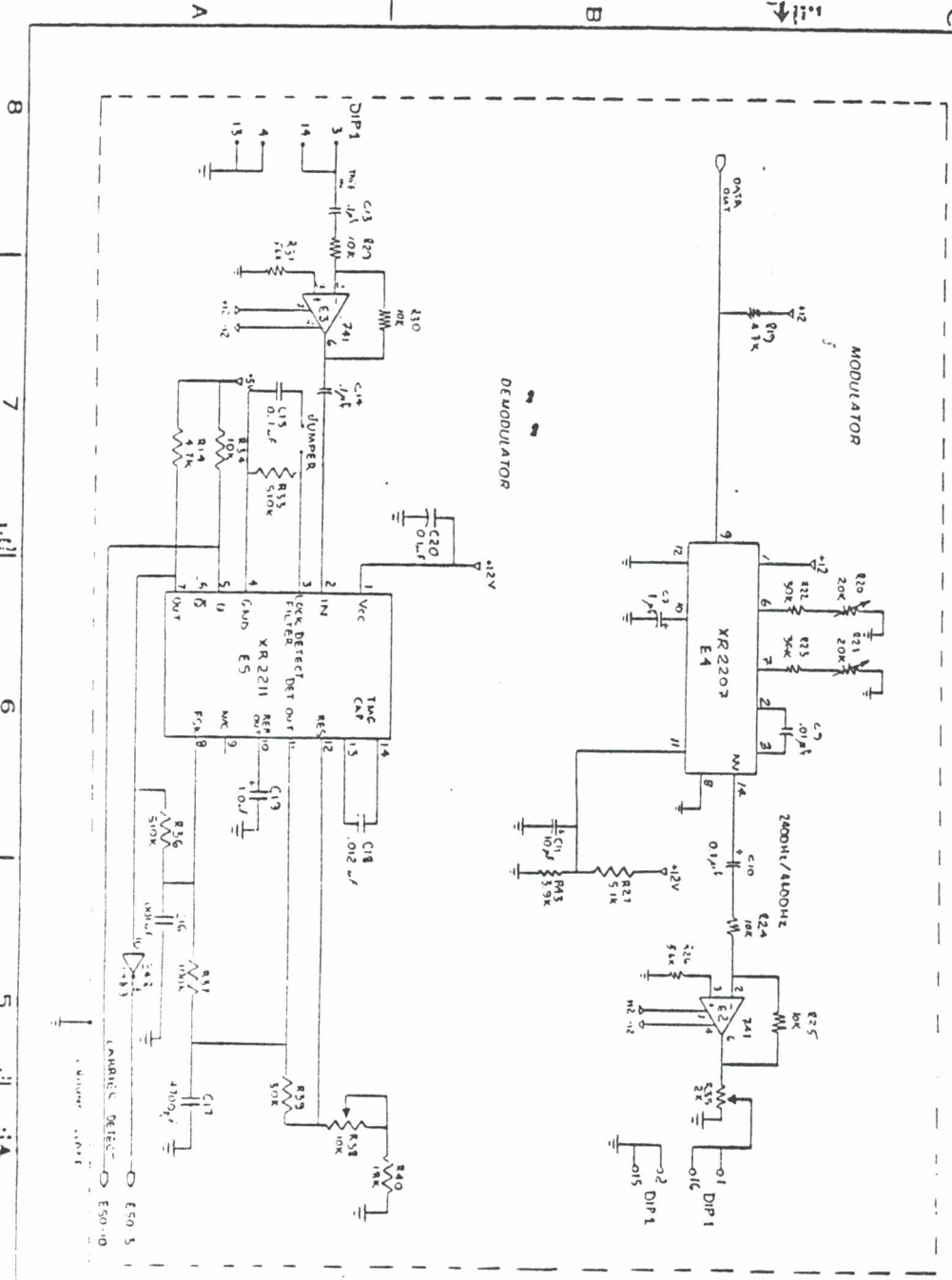


POWER

C10	5	12	5	12	5	12	5	12	5
C11	2	13	2	13	2	13	2	13	2
C12	14	14	14	14	14	14	14	14	14
C13	9	8	1	16					
C14	6	8	1	16					
C15	12	12	1	14					
C16	28	28							

SOME OF THESE SUPPLY  
LINES HAVE STRONG  
MAGNETIC INTERFERENCE

A	ECO 1021	PLC UNIT	1	1
B	ECO 318		1	1
C	ECO 767		1	1
D	ECO 1021	PLC UNIT	1	1



DEMODULATOR

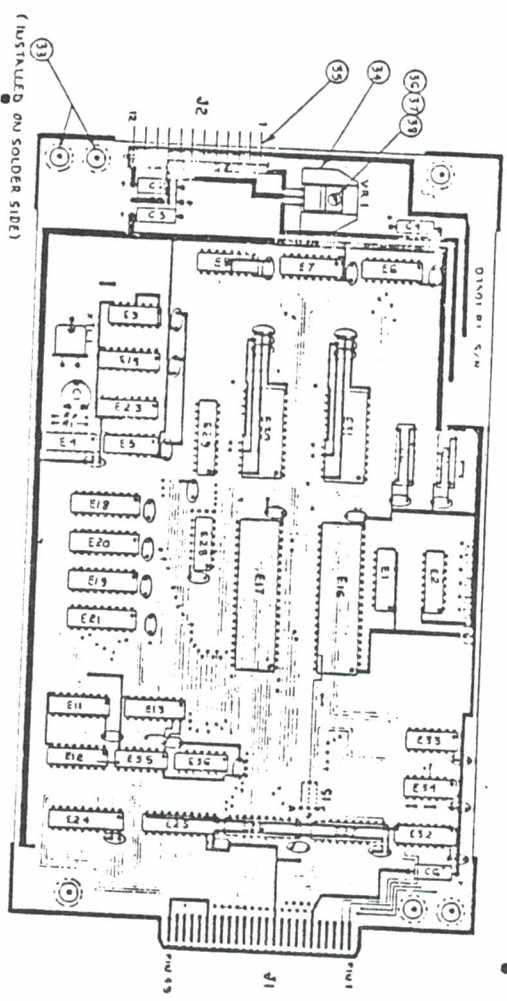
- LAST
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  - R-99
  - R-100

SINCE CENTER

- 2410-413 - 2
- 2410-414 - 2
- 2410-415 - 2
- 2410-416 - 2
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- 2410-418 - 2
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- 2410-499 - 2
- 2410-500 - 2

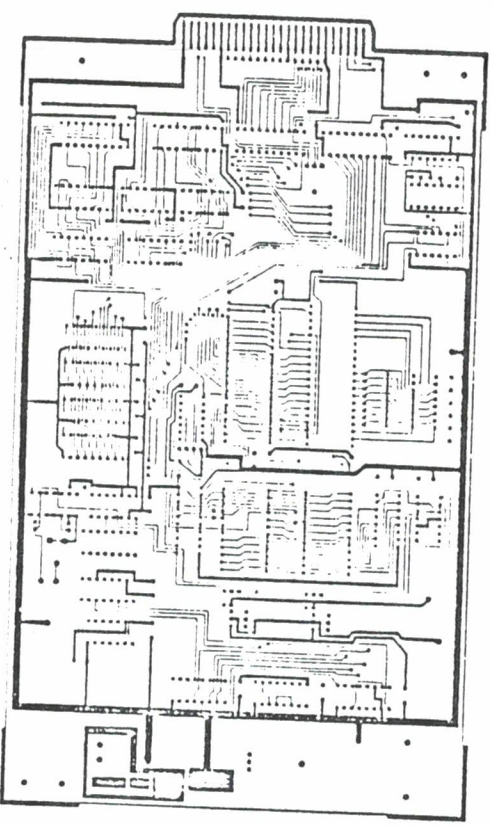
ITEM NO.	DESCRIPTION	QUANTITY	UNIT	REVISION
1	XR2202 E4	1	IC	1
2	741	1	IC	1
3	74182	1	IC	1
4	RESISTORS	100	RES	1
5	CAPACITORS	100	CAP	1
6	WIRE	100	WIR	1
7	PCB	1	PCB	1
8	ENCLOSURE	1	ENC	1
9	POWER SUPPLY	1	PSU	1
10	TEST EQUIPMENT	1	TEQ	1
11	LOGIC DIAG	1	LOG	1
12	MEX. BLT	1	MEX	1
13	R5-03831-01	1	R5	1

101-03831-01



COMPONENT SIDE

- NOTES
- 1- INSTALL PEAM SPACERS (TRIM KIT) ON SOLDER SIDE.
  - 2- INSTALL VARI WITH A HEAT SINK.



SOLDER SIDE

DRAWING  
RELEASE

DATE LICENSED  
11 30 1982  
PROJECT NO.

VALID FOR

*Manufacturing file*

Personnel with legal number referring number 8  
Section D  
Of 13 high clearance personnel other than  
this side  
This side

Have the items and item locations are the property of  
and shall not be released or  
used for any other purpose without the written permission of  
the originator.

REV	DATE	DESCRIPTION
1	11-29-82	INITIAL RELEASE
2	11-29-82	REVISION CUT NOTE
3	11-29-82	UPDATE

ITEM	QTY	PART NO.	DESCRIPTION	DATE	REVISION
1	1	100-1000000000	PRINTED CIRCUIT BOARD	11-29-82	1
2	1	100-1000000000	PRINTED CIRCUIT BOARD	11-29-82	1
3	1	100-1000000000	PRINTED CIRCUIT BOARD	11-29-82	1
4	1	100-1000000000	PRINTED CIRCUIT BOARD	11-29-82	1
5	1	100-1000000000	PRINTED CIRCUIT BOARD	11-29-82	1

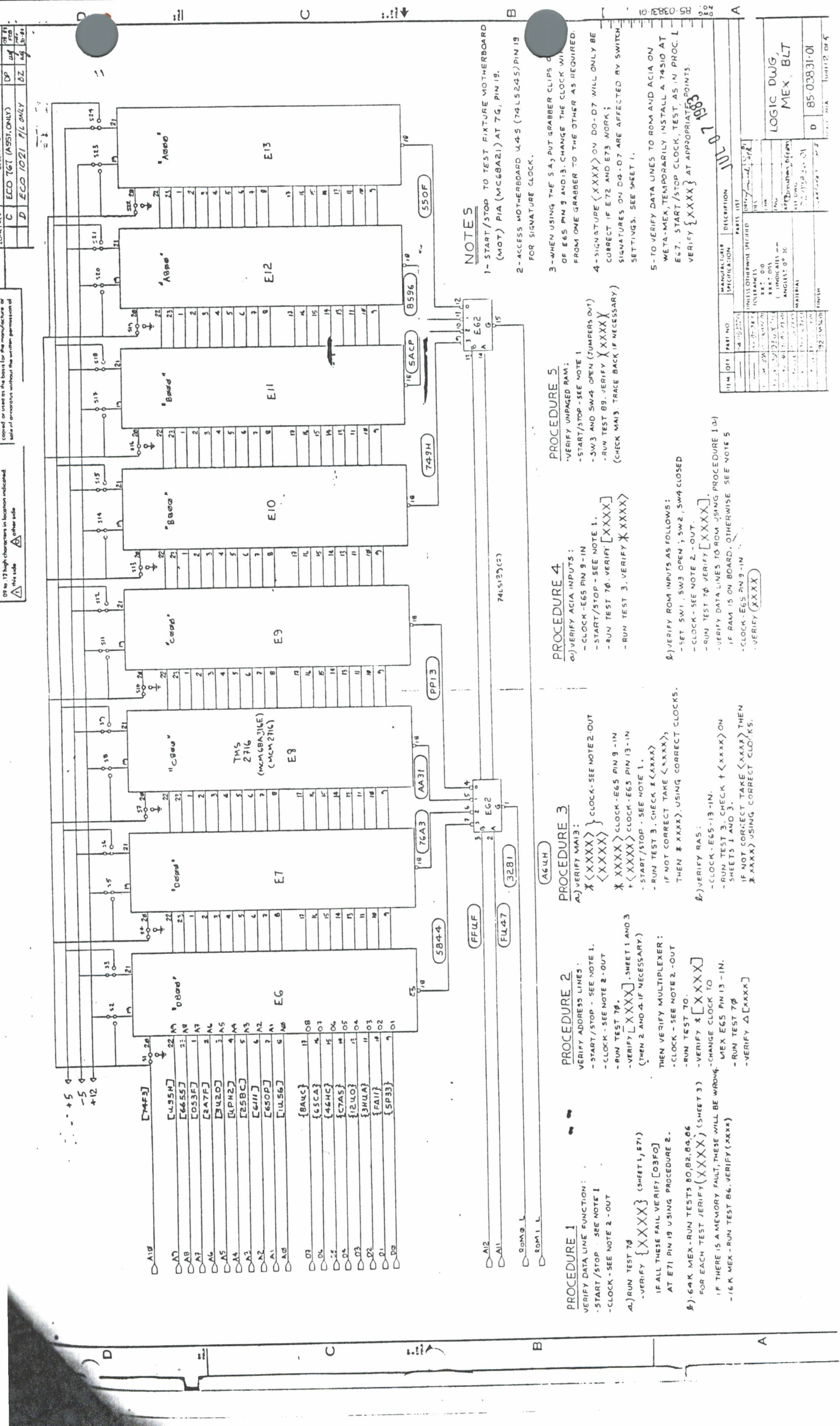
ASST. MGR

A

B

C

D



09 to 12 high characters in location indicated  
 △ this side  
 △ other side

COPYED or used as the basis for the manufacture of  
 parts of apparatus without the written permission of  
 the manufacturer

DP  
 DZ  
 DZ

**NOTES**

- 1- START/STOP TO TEST FIXTURE MOTHERBOARD (MOT) PIA (MC68A21) AT 76, PIN 19.
- 2- ACCESS MOTHERBOARD U4-5 (74LS245) PIN 19 FOR SIGNATURE CLOCK.
- 3- WHEN USING THE S4, PUT GRABBER CLIPS ON OF E65 PIN 9 AND 13. CHANGE THE CLOCK WIRE FROM ONE GRABBER TO THE OTHER AS REQUIRED.
- 4- SIGNATURE (XXXX) ON DO-D7 WILL ONLY BE CORRECT IF E72 AND E73 WORK; SIGNATURES ON DO-D7 ARE AFFECTED BY SWITCH SETTINGS. SEE SHEET 1.

- 5- TO VERIFY DATA LINES TO ROM AND ACIA ON WETA-MEX, TEMPORARILY INSTALL A 74510 AT E67. START/STOP CLOCK, TEST AS IN PROC. 1. VERIFY {XXXX} AT APPROPRIATE POINTS.

**PROCEDURE 1**

- VERIFY DATA LINE FUNCTION:  
 -START/STOP - SEE NOTE 1  
 -CLOCK - SEE NOTE 2 - OUT  
 -RUN TEST 70  
 A) RUN TEST 70  
 -VERIFY {XXXX} (SHEET 1, E71)  
 IF ALL THESE FAIL VERIFY [03F0]  
 AT E71 PIN 19 USING PROCEDURE 2.  
 FOR EACH TEST VERIFY (XXXX) (SHEET 3)  
 IF THERE IS A MEMORY FAULT, THESE WILL BE WRONG.  
 -16K MEX - RUN TEST 86. VERIFY (XXXX)

**PROCEDURE 2**

- VERIFY ADDRESS LINES:  
 -START/STOP - SEE NOTE 1.  
 -CLOCK - SEE NOTE 2 - OUT  
 -RUN TEST 70.  
 -VERIFY {XXXX} (SHEET 1 AND 3 (THEN 2 AND 4 IF NECESSARY))  
 THEN VERIFY MULTIPLEXER:  
 -CLOCK - SEE NOTE 2 - OUT  
 -RUN TEST 70.  
 -VERIFY {XXXX} (SHEET 3)  
 -CHANGE CLOCK TO MEX. E65 PIN 13 - IN.  
 -RUN TEST 70  
 -VERIFY Δ [XXXX]

**PROCEDURE 3**

- VERIFY MA13:  
 A) VERIFY MA13:  
 X {XXXX} } CLOCK - SEE NOTE 2 OUT  
 X {XXXX} }  
 X XXXX } CLOCK - E65 PIN 9 - IN  
 X {XXXX} } CLOCK - E65 PIN 13 - IN  
 -START/STOP - SEE NOTE 1.  
 -RUN TEST 3. CHECK X {XXXX}  
 IF NOT CORRECT TAKE X {XXXX};  
 THEN X XXXX. USING CORRECT CLOCKS.  
 B) VERIFY RA5:  
 -CLOCK - E65-13 - IN.  
 -RUN TEST 3. CHECK X {XXXX} ON SHEETS 1 AND 3.  
 IF NOT CORRECT TAKE X {XXXX} THEN X XXXX USING CORRECT CLOCKS.

**PROCEDURE 4**

- VERIFY ACIA INPUTS:  
 -CLOCK - E65 PIN 9 - IN  
 -START/STOP - SEE NOTE 1.  
 -RUN TEST 70. VERIFY [XXXX]  
 -RUN TEST 3. VERIFY X XXXX

**PROCEDURE 5**

- VERIFY UNPACKED RAM:  
 -START/STOP - SEE NOTE 1  
 -SW3 AND SW4 OPEN (JUMPERS OUT)  
 -RUN TEST 89. VERIFY X XXXX  
 (CHECK MA13. TRACE BACK IF NECESSARY)

ITEM	QTY	PART NO	MANUFACTURER SPECIFICATION	DESCRIPTION	PART LIST
1	1	74LS245	74LS245	74LS245	74LS245
2	1	74LS245	74LS245	74LS245	74LS245
3	1	74LS245	74LS245	74LS245	74LS245
4	1	74LS245	74LS245	74LS245	74LS245
5	1	74LS245	74LS245	74LS245	74LS245
6	1	74LS245	74LS245	74LS245	74LS245
7	1	74LS245	74LS245	74LS245	74LS245
8	1	74LS245	74LS245	74LS245	74LS245
9	1	74LS245	74LS245	74LS245	74LS245
10	1	74LS245	74LS245	74LS245	74LS245
11	1	74LS245	74LS245	74LS245	74LS245
12	1	74LS245	74LS245	74LS245	74LS245
13	1	74LS245	74LS245	74LS245	74LS245
14	1	74LS245	74LS245	74LS245	74LS245
15	1	74LS245	74LS245	74LS245	74LS245
16	1	74LS245	74LS245	74LS245	74LS245
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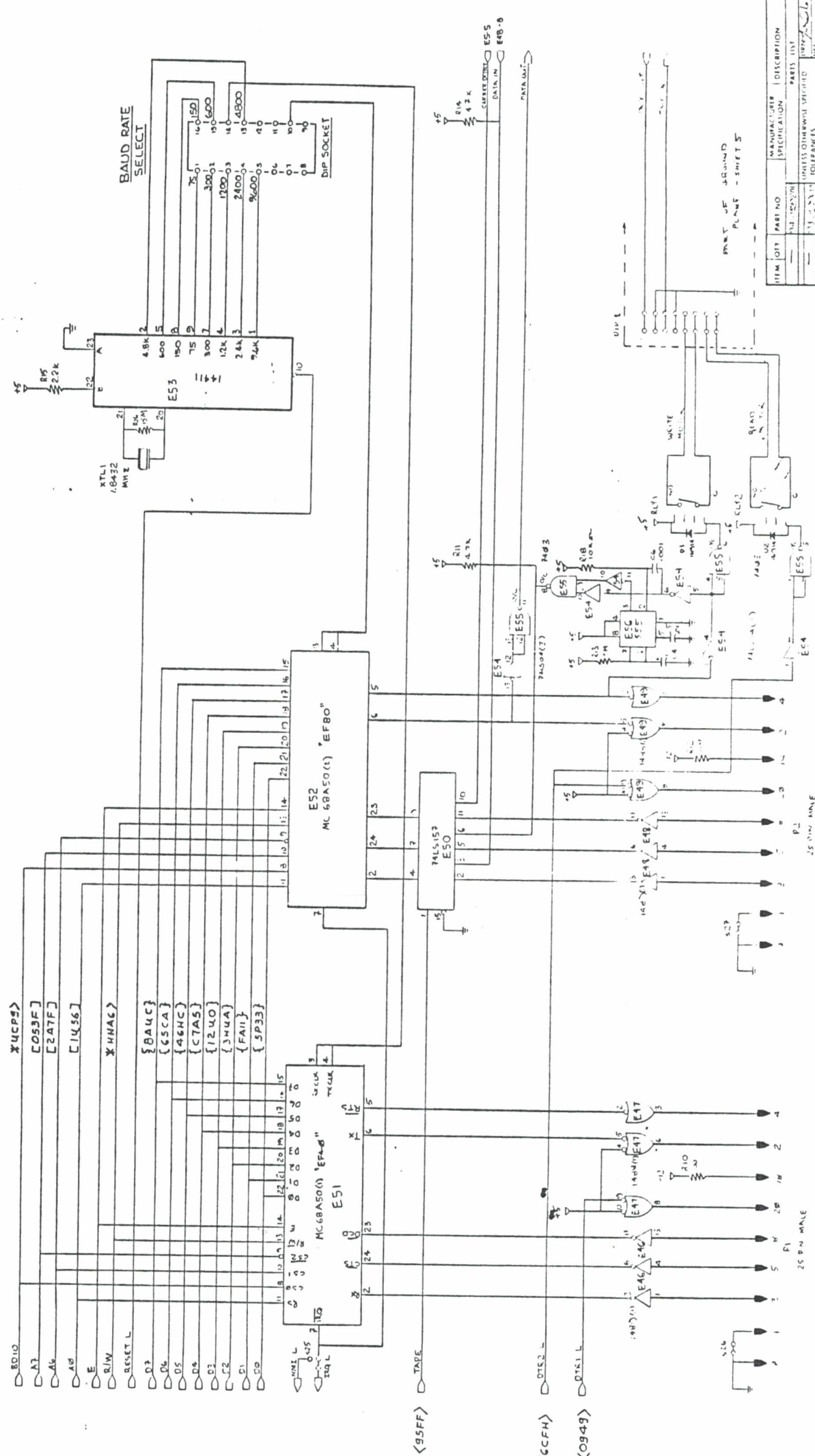
LOGIC DWG, MEX, BL7	
0	85-03831-01

1008



ZONE	REV	DESCRIPTION	DATE	CHK
1	P.C.B. P.C.OTO		11/12	
2	ADD SIGNATURES		11/12	
A	ECO # 714 / PRODUCTION RELEASE		11/12	
B	ECO # 328		11/12	
C	ECO 767		11/12	
D	ECO 1021 P/L ONLY		11/12	

Use as the basis for the manufacture of this side of apparatus without the written permission of other side.



ITEM	QTY	PART NO.	MANUFACTURER	DESCRIPTION
1	1	74LS04	TI	74LS04
2	1	74LS00	TI	74LS00
3	1	74LS02	TI	74LS02
4	1	74LS157	TI	74LS157
5	1	MC6850(1)	TI	MC6850(1)
6	1	MC6850(1)	TI	MC6850(1)
7	1	74LS157	TI	74LS157
8	1	74LS04	TI	74LS04
9	1	74LS00	TI	74LS00
10	1	74LS02	TI	74LS02

LOGIC DWG,  
MEX, ELT

D 85-03831-01

10 1E381 01

PRINT PLANE - SHEETS

25 PIN MALE

25 PIN MALE









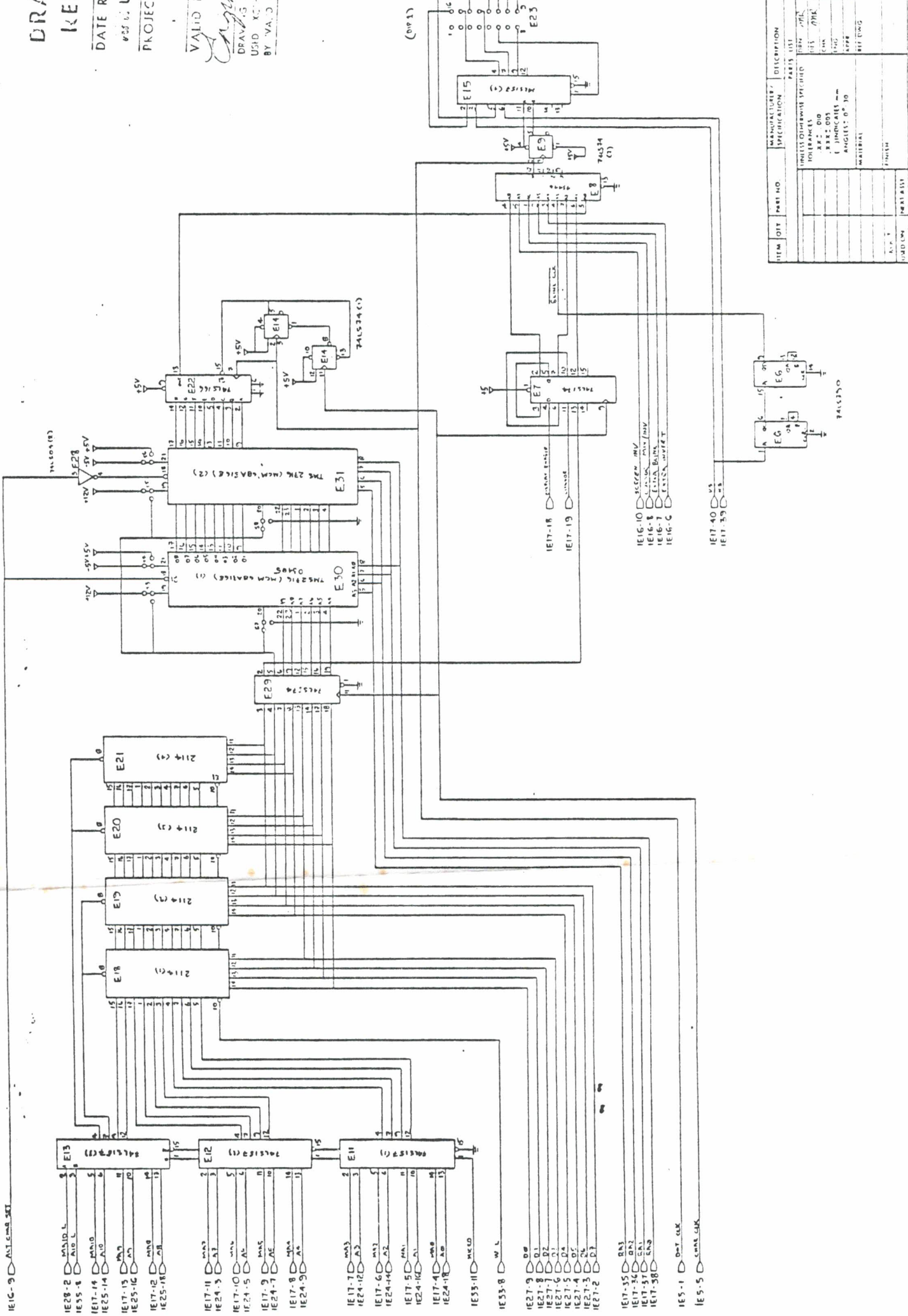
# DRAWING RELEASE

DATE RELEASED  
PROJECT NO.

VALID FOR

*Engineering file*

DRAWING NOT BE  
USED WITHOUT AS NOTED  
BY VA. D. OR DATE



(001)

ITEM	QTY	PART NO.	MANUFACTURER'S SPECIFICATION	DESCRIPTION
				PARTS LIST
				UNLESS OTHERWISE SPECIFIED
				TOLERANCES
				XX.2 - 0.05
				1 - UNLESS OTHERWISE SPECIFIED
				ANGLE: 0° TO 90°
				MATERIAL
				FINISH
				MARKING
				UNIT
				ASSEMBLY
				DATE

IONIC DWG.  
ALPHA  
0 3821  
PAGE 1 OF 3  
1 FLOOR

8 | 7 | 6 | 5 | 4 | 3 | 2 | 1