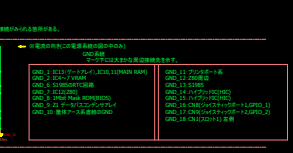
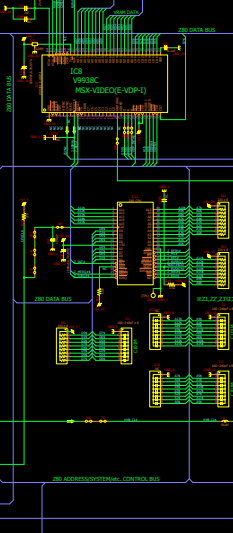
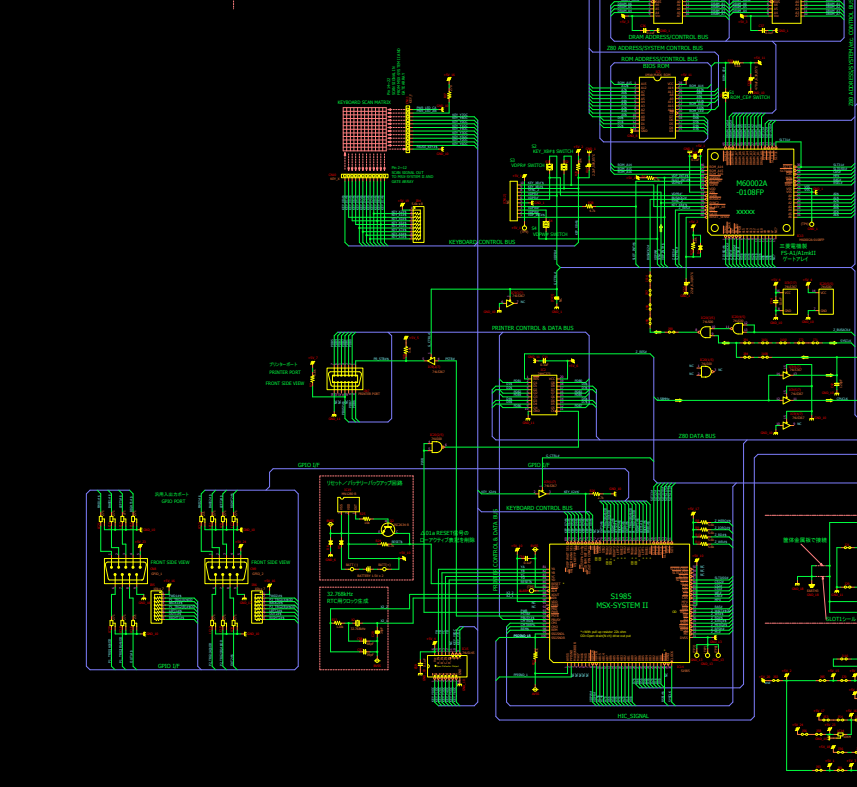
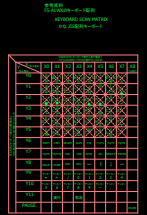
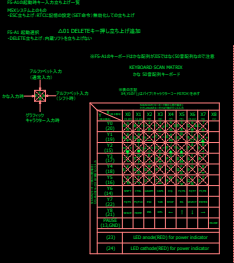
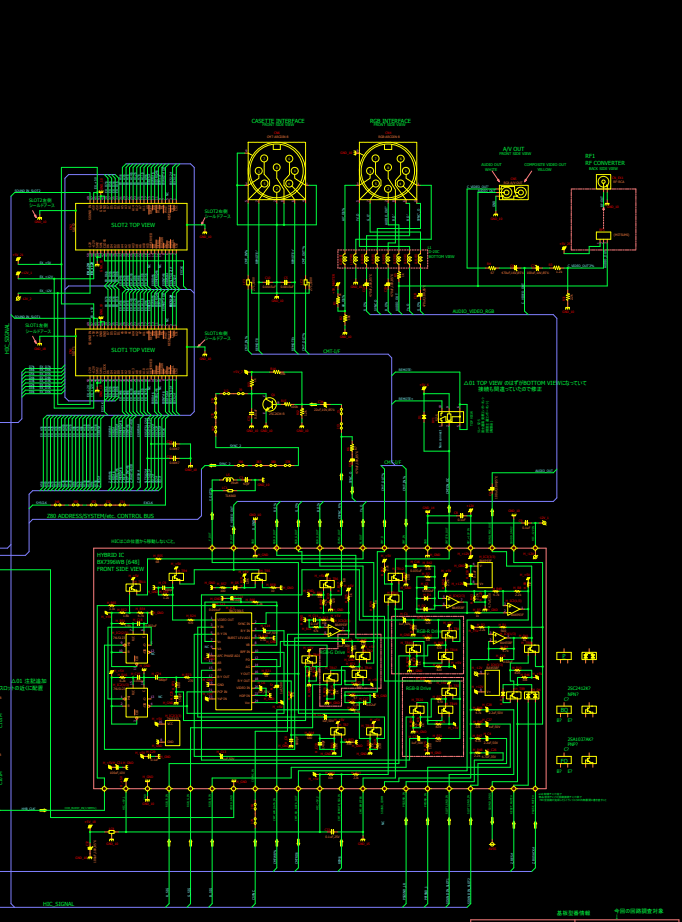
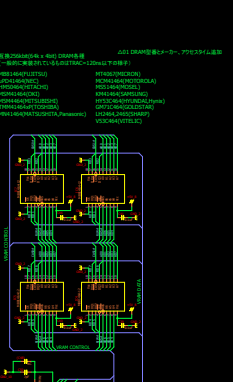
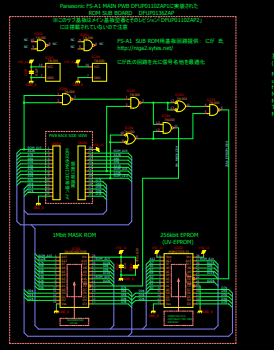


SET No.	SET名	Rev	DATE
01	POWER L24電機設計書	01	2018.12.20
02	POWER L24電機設計書	02	2019.01.15
03	POWER L24電機設計書	03	2019.02.10
04	POWER L24電機設計書	04	2019.03.05
05	POWER L24電機設計書	05	2019.04.01
06	POWER L24電機設計書	06	2019.05.10
07	POWER L24電機設計書	07	2019.06.05
08	POWER L24電機設計書	08	2019.07.15
09	POWER L24電機設計書	09	2019.08.10
10	POWER L24電機設計書	10	2019.09.05
11	POWER L24電機設計書	11	2019.10.01
12	POWER L24電機設計書	12	2019.11.05
13	POWER L24電機設計書	13	2019.12.01
14	POWER L24電機設計書	14	2020.01.10
15	POWER L24電機設計書	15	2020.02.05
16	POWER L24電機設計書	16	2020.03.01
17	POWER L24電機設計書	17	2020.04.05
18	POWER L24電機設計書	18	2020.05.01
19	POWER L24電機設計書	19	2020.06.05
20	POWER L24電機設計書	20	2020.07.01
21	POWER L24電機設計書	21	2020.08.05
22	POWER L24電機設計書	22	2020.09.01
23	POWER L24電機設計書	23	2020.10.05
24	POWER L24電機設計書	24	2020.11.01
25	POWER L24電機設計書	25	2020.12.05



部品名	仕様
POWER TRANSFORMER	VA: 100VA, 50Hz
RECTIFIER BRIDGE	1N4007
FILTER CAPACITORS	1000µF, 50V

部品名	仕様
CPU	Intel Core i3-10100
MEMORY	DDR4 8GB
VIDEO CARD	NVIDIA GeForce GTX 1650

部品名	仕様
POWER SUPPLY	ATX 500W
MOUSE	USB
KEYBOARD	USB

部品名	仕様
VIDEO DECODER	MSX-VIDEO-E-ADP-1
AUDIO AMPLIFIER	TA8202P
VIDEO DECODER	MSX-VIDEO-E-ADP-1

部品名	仕様
VIDEO DECODER	MSX-VIDEO-E-ADP-1
AUDIO AMPLIFIER	TA8202P
VIDEO DECODER	MSX-VIDEO-E-ADP-1

注意事項: 本設計書は、製品の仕様や要件に基づき作成されたものであり、変更や修正が必要な場合は、関係者間で協議を行う必要があります。

作成者: 山田太郎
 承認者: 佐藤花子
 日付: 2020.12.20

※ロットによっては実装されている部品の型番が異なる可能性がある。

部品番号 Parts No.	部品名 Parts name	定格、値、表示値 Value,Range,Electrical characteristics,etc.
C1	CHEMICAL CAPACITOR	4700uF,16V,85°C
C2	CHEMICAL CAPACITOR	470uF,470uF35V,85°C
C3	CERAMIC CAPACITOR	47pF
C4	CHEMICAL CAPACITOR	100uF,100uF10V,85°C
C5	CERAMIC CAPACITOR	0.0015uF
C6	CHEMICAL CAPACITOR	470uF,470uF16V,85°C
C7	CHEMICAL CAPACITOR	100uF,100uF10V,85°C
C8	CERAMIC CAPACITOR	0.1uF,25V
C9	CERAMIC CAPACITOR	0.1uF,25V
C10	CERAMIC CAPACITOR	0.0015uF
C11	CERAMIC CAPACITOR	0.1uF,25V
C12	CHEMICAL CAPACITOR	470uF,470uF10V,85°C
C13	CHEMICAL CAPACITOR	470uF,470uF10V,85°C
C14	CERAMIC CAPACITOR	0.1uF,25V
C15	CERAMIC CAPACITOR	0.1uF,25V
C16	CERAMIC CAPACITOR	0.1uF,25V
C17	CHEMICAL CAPACITOR	220uF,220uF16V,85°C
C18	CHEMICAL CAPACITOR	470uF,470uF10V,85°C
C19	CHEMICAL CAPACITOR	470uF,470uF10V,85°C
C20	CERAMIC CAPACITOR	39pF
C21	CERAMIC CAPACITOR	0.001uF
C22	CHEMICAL CAPACITOR	330uF,330uF6.3V,85°C
C23	CERAMIC CAPACITOR	0.1uF,25V
C24	CERAMIC CAPACITOR	0.0047
C25	CERAMIC CAPACITOR	0.0047
C26	CHEMICAL CAPACITOR	470uF,470uF35V,85°C
C27	CHEMICAL CAPACITOR	220uF,220uF16V,85°C
C28	CERAMIC CAPACITOR	0.1uF,25V
C29	CERAMIC CAPACITOR	0.1uF,25V
C30	CERAMIC CAPACITOR	0.1uF,25V
C31	CERAMIC CAPACITOR	0.01uF
C32	CHEMICAL CAPACITOR	100uF,100uF10V,85°C
C33	CERAMIC CAPACITOR	0.1uF
C34	CHEMICAL CAPACITOR	22uF,22uF10V,85°C
C35	CERAMIC CAPACITOR	0.1uF,25V
C36	CERAMIC CAPACITOR	0.1uF,25V
C37	CERAMIC CAPACITOR	0.1uF,25V
C38	CHEMICAL CAPACITOR	1000uF,1000uF6.3V,85°C
C39	CERAMIC CAPACITOR	0.1uF,25V
C40	CERAMIC CAPACITOR	0.1uF,25V
C41	CERAMIC CAPACITOR	0.1uF,25V
C42	CERAMIC CAPACITOR	120pF
(C43)	CERAMIC CAPACITOR	NC
C44	CHEMICAL CAPACITOR	2.2uF,2.2uF50V,85°C
(C45)	CERAMIC CAPACITOR	NC
C46	CERAMIC CAPACITOR	0.1uF,25V
C47	CERAMIC CAPACITOR	0.1uF,25V
(C48)	CERAMIC CAPACITOR	NC
(C49)	CERAMIC CAPACITOR	NC
C50	CERAMIC CAPACITOR	7pF
C51	CERAMIC CAPACITOR	7pF
C52	CHEMICAL CAPACITOR	1000uF,1000uF6.3V,85°C
(C53)	CERAMIC CAPACITOR	NC
C54	CERAMIC CAPACITOR	0.1uF,25V
C55	CHEMICAL CAPACITOR	22uF,22uF6.3V,85°C
C56	CERAMIC CAPACITOR	0.1uF,25V
C57	CERAMIC CAPACITOR	39pF
C58	CERAMIC CAPACITOR	68pF
C59	CERAMIC CAPACITOR	0.1uF,25V
C60	CHEMICAL CAPACITOR	470uF,470uF6.3V,85°C
C61	CERAMIC CAPACITOR	100pF
CN1	CARD EDGDE CONNECTOR	SLOT1 50pin CONNECTOR
CN2	CARD EDGDE CONNECTOR	SLOT2 50pin CONNECTOR
CN3	AC,DC IN	DC POWER IN
CN4	DIN CONNECTOR	RGB-ARCDIN-8
CN5	RCA JACK	A/V OUT
CN6	DIN CONNECTOR	GMT-ARCDIN-8
CN7	PRINTER	PORT
CN8	GPIO 1	JOYSTICK PORT1
CN9	GPIO 2	JOYSTICK PORT2
CN10	KEYBOARD X AXIS	KEYBOARD CONNECTOR
CN11	KEYBOARD Y AXIS	KEYBOARD CONNECTOR
(GN12)	NC	10pin CONNECTOR
D1	?	SWITCHING DIODE
D2	?	SWITCHING DIODE
D3	?	SWITCHING DIODE
D4	?	SWITCHING DIODE
D5	?	SWITCHING DIODE
D6	?	SWITCHING DIODE
IC1	BX7396WB 648	HYBRID IC RGB-VIDEO ENCODER.VMT-I/F,AUDIO AMP
IC2	74HC273	Octal D-type flip-flop with reset
IC3	1Mbit ROM	HITACHI MASK ROM
IC4	MB81464-12	262144(64kwordx4)bit DRAM
IC5	MB81464-12	262144(64kwordx4)bit DRAM
IC6	MB81464-12	262144(64kwordx4)bit DRAM
IC7	MB81464-12	262144(64kwordx4)bit DRAM
IC8	V9938C	MSX-VIDEO-I YAMAHA VDP
IC9	74LS367	3-STATE BUFFERS
IC10	MB81464-12	262144(64kwordx4)bit DRAM
IC11	MB81464-12	262144(64kwordx4)bit DRAM
IC12	Z80 CPU	Z80CPU NMOS
IC13	M60002A-0108FP	Panasonic MSX2 FS-A1/FS-A1mkII GATE ARRAY MITSUBISHI GATE ARRAY M60002A SERIES M60002A-0108FP
IC14	S1985	MSX-SYSTEM II
IC15	74LS145	BCD TO DECIMAL DECODER/DRIVER OPEN COLLECTOR OUTPUT
IC16	78L12	3-TERMINAL REGULATOR
IC17	79L12	3-TERMINAL REGULATOR

部品番号 Parts No.	部品名 Parts name	定格、値、表示値 Value, Range, Electrical characteristics, etc.
IC18	M5236L	3-TERMINAL VOLTAGE REGULATOR
IC19	MN1280-R	RESET IC
IC20	74LS00	NAND GATE
IR1	NETWORK RESISTER	10k Ω x 8
IR2	NETWORK RESISTER	22k Ω x 8
IR3	NETWORK RESISTER	22k Ω x 8
IR4	NETWORK RESISTER	5.6k Ω x 8
IR5	NETWORK RESISTER	10k Ω x 7
IR6	NETWORK RESISTER	10k Ω x 7
J1	JUMPER	
J2	JUMPER	
J3	JUMPER	
J4	JUMPER	
J5	JUMPER	
J6	JUMPER	
J7	JUMPER	
J8	JUMPER	
J9	JUMPER	
J10	JUMPER	
J11	JUMPER	
J12	JUMPER	
J13	JUMPER	
J14	JUMPER	
J15	JUMPER	
J16	JUMPER	
J17	JUMPER	
J18	JUMPER	
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J20	JUMPER	
J21	JUMPER	
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J27	JUMPER	
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J29	JUMPER	
J30	JUMPER	
J31	JUMPER	
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J34	JUMPER	
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J36	JUMPER	
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J80	JUMPER	
J81	JUMPER	
J82	JUMPER	
J83	JUMPER	
J84	JUMPER	
J85	JUMPER	
J86	JUMPER	
J87	JUMPER	
J88	JUMPER	
J89	JUMPER	
J90	JUMPER	
J91	JUMPER	
J92	JUMPER	

部品番号 Parts No.	部品名 Parts name	定格、値、表示値 Value, Range, Electrical characteristics, etc.
J93	JUMPER	
J94	JUMPER	
J95	JUMPER	
J96	JUMPER	
J97	JUMPER	
J98	JUMPER	
J99	JUMPER	
J100	JUMPER	
J101	JUMPER	
J102	JUMPER	
J103	JUMPER	
J104	JUMPER	
J105	JUMPER	
J106	JUMPER	
J107	JUMPER	
J108	JUMPER	
J109	JUMPER	
J110	JUMPER	
J111	JUMPER	
J112	JUMPER	
J113	JUMPER	
J114	JUMPER	
J115	JUMPER	
J116	JUMPER	
L1	INDUCTOR	
L2	INDUCTOR	56uH
L3	INDUCTOR	39uH
L4	INDUCTOR	?uH
L5	INDUCTOR	39uH
LC1	FILTER	TLK660
LC2	EMI NOISE FILTER	271.100V
LC3	EMI NOISE FILTER	271.100V
LC4	EMI NOISE FILTER	104M.16V
LC5	EMI NOISE FILTER	104M.16V
LC6	EMI NOISE FILTER	104M.16V
LC7	EMI NOISE FILTER	271.100V
LC8	EMI NOISE FILTER	271.100V
LC9	EMI NOISE FILTER	271.100V
LC10	EMI NOISE FILTER	271.100V
LC11	EMI NOISE FILTER	271.100V
LC12	EMI NOISE FILTER	271.100V
LC13	EMI NOISE FILTER	271.100V
LC14	EMI NOISE FILTER	104M.16V
LC15	EMI NOISE FILTER	271.100V
LC16	EMI NOISE FILTER	271.100V
LC17	EMI NOISE FILTER	271.100V
LC18	EMI NOISE FILTER	271.100V
LC19	EMI NOISE FILTER	271.100V
LC20	EMI NOISE FILTER	271.100V
LC21	EMI NOISE FILTER	271.100V
Q1	NPN SWITCHING TRANSISTOR	2SC2634-R
Q2	NPN SWITCHING TRANSISTOR	2SC2634-R
Q3	PNP POWER TRANSISTOR	2SB941Q
R1	RESISTER	1k Ω
R2	RESISTER	10k Ω
R3	RESISTER	1.2k Ω
R4	RESISTER	67 Ω
R5	RESISTER	1k Ω
R6	RESISTER	67 Ω
R7	RESISTER	5.6k Ω
R8	RESISTER	5.6k Ω
R9	RESISTER	5.6k Ω
R10	RESISTER	5.6k Ω
R11	RESISTER	5.6k Ω
R12	RESISTER	12k Ω
R13	RESISTER	1k Ω
R14	RESISTER	39k Ω
R15	RESISTER	100k Ω
R16	RESISTER	10k Ω
R17	RESISTER	270 Ω
R18	RESISTER	270 Ω
R19	RESISTER	5.6k Ω
R20	RESISTER	10k
R21	RESISTER	10k
R22	RESISTER	1k
R23	RESISTER	120k
R24	RESISTER	4.7k
R25	RESISTER	10k
R26	RESISTER	2.7k
R27	RESISTER	4.7k
R28	RESISTER	4.7k
R29	RESISTER	1.5k
R30	RESISTER	5.6k
R31	RESISTER	2.2k
R32	RESISTER	220 Ω
R33	RESISTER METAL FILM RESISTOR	13k Ω \pm 1%
R34	RESISTER METAL FILM RESISTOR	4.3k Ω \pm 1%
RF1	VHF RF CONVERTER	MITSUMI RF CONVERTER
RY1	SZ-5	FUJITSU TAKAMISAWA COMPONENT
SW1		POWER SW
X1	X'tal	21.47727MHz
X2	X'tal	32.768kHz
Z1	NETWORK CAPACITOR	100p~240pF x 8 CAPACITOR ARRAY
Z2	NETWORK CAPACITOR	100p~240pF x 8 CAPACITOR ARRAY
(Z2)	NC	
Z3	NETWORK CAPACITOR	100p~240pF x 8 CAPACITOR ARRAY
(Z3)	NC	

FS-A1 RGB-NTSC VIDEO/CMT-I/F,AUDIO AMP HYBRID IC(IC1) PARTS LIST
HYBRID IC [BX7396WB 648]

部品番号 Parts No.	部品名 Parts name	定格、値、表示値 Value,Range,Electrical characteristics,etc.
H C1	CHEMICAL CAPACITOR	1uF,50V,85°C
H C2	CHEMICAL CAPACITOR	1uF,50V,85°C
H C3	CHEMICAL CAPACITOR	1uF,50V,85°C
H C4	CHEMICAL CAPACITOR	2.2uF,50V,85°C
H C5	CERAMIC CAPACITOR	0.002uF
H C6	CHEMICAL CAPACITOR	1uF,50V,85°C
H C7	CHEMICAL CAPACITOR	1uF,50V,85°C
H C8	CERAMIC CAPACITOR	680pF
H C9	CERAMIC CAPACITOR	100pF
H C10	CERAMIC CAPACITOR	0.1uF
H C11	CERAMIC CAPACITOR	0.1uF
H C12	CHEMICAL CAPACITOR	1uF,50V,85°C
H C13	CHEMICAL CAPACITOR	1uF,50V,85°C
H C14	CHEMICAL CAPACITOR	1uF,50V,85°C
H C15	CERAMIC CAPACITOR	0.02uF
H C16	CERAMIC CAPACITOR	0.035uF
H C17	CERAMIC CAPACITOR	0.02uF
H C18	CERAMIC CAPACITOR	0.002uF
H C19	CERAMIC CAPACITOR	0.002uF
H C20	CERAMIC CAPACITOR	140pF
H C21	CERAMIC CAPACITOR	0.001uF
H C22	CERAMIC CAPACITOR	200pF
H C23	CHEMICAL CAPACITOR	4.7uF,35V,85°C
H C24	CERAMIC CAPACITOR	680pF
H C25	CERAMIC CAPACITOR	150pF
H C26	CHEMICAL CAPACITOR	4.7uF,35V,85°C
H C27	CHEMICAL CAPACITOR	1uF,50V,85°C
H C28	CHEMICAL CAPACITOR	2.2uF,50V,85°C
H C29	CERAMIC CAPACITOR	0.1uF
H C31	CHEMICAL CAPACITOR	100uF,10V,85°C
H D1	?	SWITCHING DIODE
H D2	?	SWITCHING DIODE
H D3	?	SWITCHING DIODE
H D4	?	SWITCHING DIODE
H D4	?	SWITCHING DIODE
H D5	?	SWITCHING DIODE
H TR1	2SC2412K?	NPN TRANSISTOR
H TR2	2SC2412K?	NPN TRANSISTOR
H TR3	2SC2412K?	NPN TRANSISTOR
H TR4	2SC2412K?	NPN TRANSISTOR
H TR5	2SC2412K?	NPN TRANSISTOR
H TR6	2SC2412K?	NPN TRANSISTOR
H TR7	2SC2412K?	NPN TRANSISTOR
H TR8	2SC2412K?	NPN TRANSISTOR
H TR9	2SC2412K?	NPN TRANSISTOR
H TR10	2SC2412K?	NPN TRANSISTOR
H TR11	2SC2412K?	NPN TRANSISTOR
H TR12	2SC2412K?	NPN TRANSISTOR
H TR13	2SC2412K?	NPN TRANSISTOR
H TR14	2SA1037AK?	PNP TRANSISTOR
H TR15	2SC2412K?	NPN TRANSISTOR
H TR16	2SA1037AK?	PNP TRANSISTOR
H TR17	2SC2412K?	NPN TRANSISTOR
H TR18	2SC2412K?	NPN TRANSISTOR
H TR19	2SA1037AK?	PNP TRANSISTOR
H TR20	2SC2412K?	NPN TRANSISTOR
H IC1	BA7230LS	ROHM NTSC Color TV Signal Encoder
H IC2	74LS123	DUAL RETRIGGERABLE MONOSTABLE MULTI VIBRATOR
H IC3	BA6993F	OP-AMP
H IC4	BA4558F	OP-AMP
H R1	RESISTOR	560 Ω
H R2	RESISTOR	2.2k Ω
H R3	RESISTOR	18k Ω
H R4	RESISTOR	4.7k Ω
H R5	RESISTOR	1k Ω
H R6	RESISTOR	47 Ω
H R7	RESISTOR	4.7k Ω
H R8	RESISTOR	2.2k Ω
H R9	RESISTOR	1k Ω
H R10	RESISTOR	820 Ω
H R11	RESISTOR	47k Ω
H R12	RESISTOR	10k Ω
H R13	RESISTOR	22k Ω
H R14	RESISTOR	680 Ω
H R15	RESISTOR	1k Ω
H R16	RESISTOR	6.2k Ω
H R17	RESISTOR	68 Ω
H R18	RESISTOR	150 Ω
H R19	RESISTOR	1.8k Ω
H R20	RESISTOR	1.5k Ω
H R21	RESISTOR	1k Ω
H R22	RESISTOR	270 Ω
H R23	RESISTOR	270 Ω
H R24	RESISTOR	470 Ω
H R25	RESISTOR	68 Ω
H R26	RESISTOR	120 Ω
H R27	RESISTOR	100 Ω
H R28	RESISTOR	120 Ω
H R29	RESISTOR	68 Ω
H R30	RESISTOR	100 Ω
H R31	RESISTOR	120 Ω
H R32	RESISTOR	68 Ω

部品番号 Parts No.	部品名 Parts name	定格、値、表示値 Value, Range, Electrical characteristics, etc.
H R33	RESISTOR	1k Ω
H R34	RESISTOR	1k Ω
H R35	RESISTOR	1k Ω
H R36	RESISTOR	1k Ω
H R37	RESISTOR	1k Ω
H R38	RESISTOR	1k Ω
H R39	RESISTOR	120 Ω
H R40	RESISTOR	4.7k Ω
H R41	RESISTOR	1k Ω
H R42	RESISTOR	3.9k Ω
H R43	RESISTOR	2.2k Ω
H R44	RESISTOR	4.7k Ω
H R45	RESISTOR	22k Ω
H R46	RESISTOR	10k Ω
H R47	RESISTOR	4.7k Ω
H R48	RESISTOR	2.2k Ω
H R49	RESISTOR	4.7k Ω
H R50	RESISTOR	2.2k Ω
H R51	RESISTOR	5.9k Ω
H R52	RESISTOR	1.8k Ω
H R53	RESISTOR	330 Ω
H R54	RESISTOR	4.7k Ω
H R55	RESISTOR	68 Ω
H R56	RESISTOR	10k Ω
H R57	RESISTOR	100 Ω
H R58	RESISTOR	10 Ω
H R59	RESISTOR	330 Ω
H R60	RESISTOR	1k Ω
H R61	RESISTOR	10k Ω
H R62	RESISTOR	2.2k Ω
H R63	RESISTOR	10k Ω
H R64	RESISTOR	1.2k Ω
H R65	RESISTOR	3.3k Ω
H R66	RESISTOR	1.2k Ω
H R67	RESISTOR	10k Ω
H R68	RESISTOR	470 Ω
H R69	RESISTOR	820 Ω
H R70	RESISTOR	330 Ω
H R71	RESISTOR	470 Ω
H R72	RESISTOR	820 Ω
H R73	RESISTOR	680 Ω
H R74	RESISTOR	470 Ω
H R75	RESISTOR	100 Ω
H R76	RESISTOR	820 Ω
H R77	RESISTOR	4.7k Ω