

SERVICE
MANUAL EQ551



marantz®

model EQ551

Graphic Equalizer

MARANTZ DESIGN AND SERVICE

Using superior design and selected high grade components, MARANTZ company has created the ultimate in stereo sound.

Only **original MARANTZ parts** can insure that your MARANTZ product will continue to perform to the specifications for which it is famous.

Parts for your MARANTZ equipment are generally available to our National Marantz Subsidiary or Agent.

ORDERING PARTS:

Parts can be ordered either by mail or by telex. In both cases, correct part number has to be specified. If you order by mail, fulfil MARANTZ order forms.

The following information must be supplied to eliminate delays in processing your order:

1. Complete address
2. Complete part numbers and quantities required
3. Description of parts
4. Model number for which part is required
5. Way of shipment
6. Signature: any order form or telex must be signed otherwise such part order will be considered as null and void.

PARTS ORDERING

Parts may be ordered at the following addresses:

AUSTRIA HORNYPHON Vertriebsgesellschaft GmbH Wienerbergstrasse 1 A 1101 Wien Austria Telex: 132.332	EIRE MARANTZ IRELAND Ltd. Newstead Glonkeagh Dublin 4 Telex: 25200	FINLAND MARANTZ DIVISION OF OY PHILIPS Ab Kaivokatu 8 00100 Helsinki Finland Telex: 124811	FRANCE MARANTZ FRANCE 4 Rue Bernard Palissy 92600 Asnières France Telex: 611651	GERMANY MARANTZ GERMANY GmbH Max-Planck-Strasse 22 6072 Dreieich 1 Germany Telex: 529821	THE NETHERLANDS MARANTZ De Limiet 3 4131 NR Vianen The Netherlands Telex: 47679	DENMARK MARANTZ DIVISION OF PHILIPS SERVICE A/S Prags Boulevard 80 Postbox 1919 DK-2300 København S Denmark Telex: 31201
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NORWAY MARANTZ DIVISION OF PHILIPS A/S Sandstuveien 40 Oslo 6 Norway Telex: 72694	GREAT BRITAIN MARANTZ AUDIO U.K. Ltd Unit 15/16 Saxon Way Industrial Estate Moor Lane Harmondsworth UB7 OLW Great Britain Telex: 935196
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GREECE ADAMCO S.A. P.O.Box 21025 Hippocrates Street 188 Athens 11410 Greece Telex: 216.795

ITALY MARANTZ ITALIANA S.p.A. Via Monte Napoleone 10 20121 Milano Italia

JAPAN MARANTZ JAPAN, Inc. 35-1, 7-chome, Sagamiono Sagamihara-shi, Kanagawa Japan
--

KUWAIT AL ALAMIAH ELECTRONICS Ussama Building Fahd al Saleem Street P.O.Box 23781 Safat-Kuwait Telex: 22694
--

SAUDI ARABIA AL ALAMIAH ELECTRONICS P.O.Box 5954 University Street Riyadh 11432 Saudi Arabia Telex: 201530

SOUTH AFRICA MARANTZ DIVISION OF PHILIPS S.A. Rainer House Ove Street, 10 Doornfontein Johannesburg Telex: 483.456
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SPAIN PHONO S.A. Ignacio Iglesias 10 Badalona (Barcelona) Spain Telex: 59355
--

SWEDEN MARANTZ DIVISION OF PHILIPS Försäljning AB Tegeluddsvägen 1 S-115 84 Stockholm Sweden Telex: 14060

SWITZERLAND DYNAVOX ELECTRONICS Route de Villars 105 1701 Fribourg Switzerland Telex: 942377
--

TURKEY DOGRUOL Ltd. I.M.C. 6 Blok N°6310 Unkapani Istanbul Turkey Telex: 22085
--

MALTA CACHIA & GALEA Republic Street, 68D Valetta Telex: 1682
--

U.S.A. MARANTZ COMPANY, Inc. National Service Department P.O.Box 577 Chatsworth, CA 91311 U.S.A.
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TECHNICAL ASSISTANCE

Should you require any other technical support, do not hesitate to contact the Technical Department of MARANTZ EUROPE & Co.
Avenue Louise 326 - Bte. 32
B-1050 Brussels
Belgium
Telephone: (02) 6407830 (10 l)
Telex: 26602
Fax.: (02) 649.29.20

In case of difficulties, do not hesitate to contact the Technical Department at abovementioned address.



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How to use this service manual

- The "Common parts" which Marantz Japan, Inc. has established are eliminated from this service manual.
- These "Common parts" are applied to all models in the service manuals arranged and issued by MJI.
- To indicate clearly the common parts in the schematic diagram, a line is drawn above or under the Ref. Desig. No. of applicable parts.
- "Common parts" can be supplied from the Marantz service center as ever.
In case of ordering, please establish the parts number of 10 figures following the procedure mentioned in this service manual "How to establish the parts number for common parts".

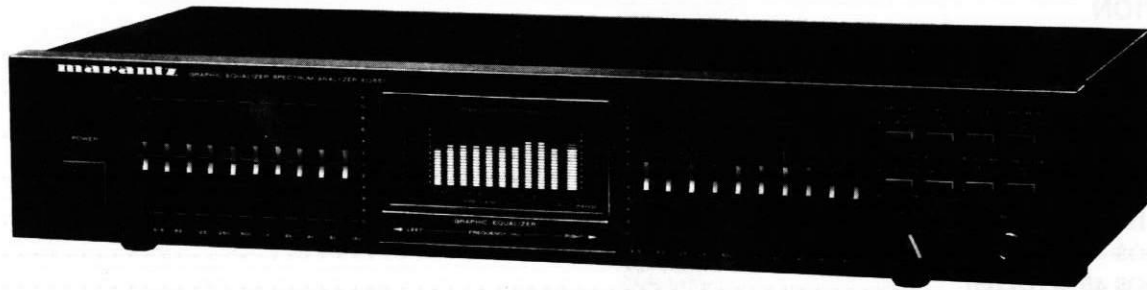
(NOTE)

When you order parts to the Marantz parts center, please take notice of the following points.

- 1) Please correctly write the parts number of 10 figures following the rule.
- 2) Since ordering parts by the Ref. Desig. No. or ratings indicated in the schematic diagram does not satisfy the above conditions, the Marantz parts supply system does not work properly.
As this case is apt to cause a trouble, please pay attention to it.

M/3169

MODEL EQ551 GRAPHIC EQUALIZER SPECTRUM ANALYZER



INTRODUCTION

This service manual was prepared for use by Authorized Warranty Stations and contains service information for Marantz Model EQ551 Graphic Equalizer Spectrum Analyzer.

Servicing information and voltage data included in this manual are intended for use by the knowledgeable and experienced technician only. All instructions should be read carefully. No attempt should be made to proceed without a good understanding of the operation of the Graphic Equalizer Spectrum Analyzer.

The parts list furnishes information by which replacement parts may be ordered from the Marantz Company. A simple description is included for parts which can usually be obtained through local suppliers.

1. SHOCK, FIRE HAZARD SERVICE TEST

CAUTION: After servicing this appliance and prior to returning to customer, measure the resistance between either primary AC cord connector pins (with unit NOT connected to AC mains and its Power switch ON), and the face or front Panel of product and controls and chassis bottom.

Any resistance measurement less than 1 Megohms should cause unit to be repaired or corrected before AC power is applied, and verified before return to user/customer.

Ref. UL Standard No. 1270. Para. 66. 3. D (Mandatory Test after servicing Electrical Appliances, effective 7-1-83).

2. P.W. BOARDS

As can be seen from the circuit diagram the chassis of Model EQ551 consists of the following units. Each unit mounted on a printed circuit board is described within the square enclosed by a bold dotted line on the circuit diagram

1. Main mounted on P.W. Board PE15
2. Power Indicator mounted on P.W. Board PL15
3. Bar Drive/Volume mounted on P.W. Board PR15
4. FL Set mounted on P.W. Board PR25
5. Input Switch mounted on P.W. Board PS15
6. Display Switch mounted on P.W. Board PS25
7. Power Switch mounted on P.W. Board PS35
8. Mic Amp. mounted on P.W. Board PV15

H3170

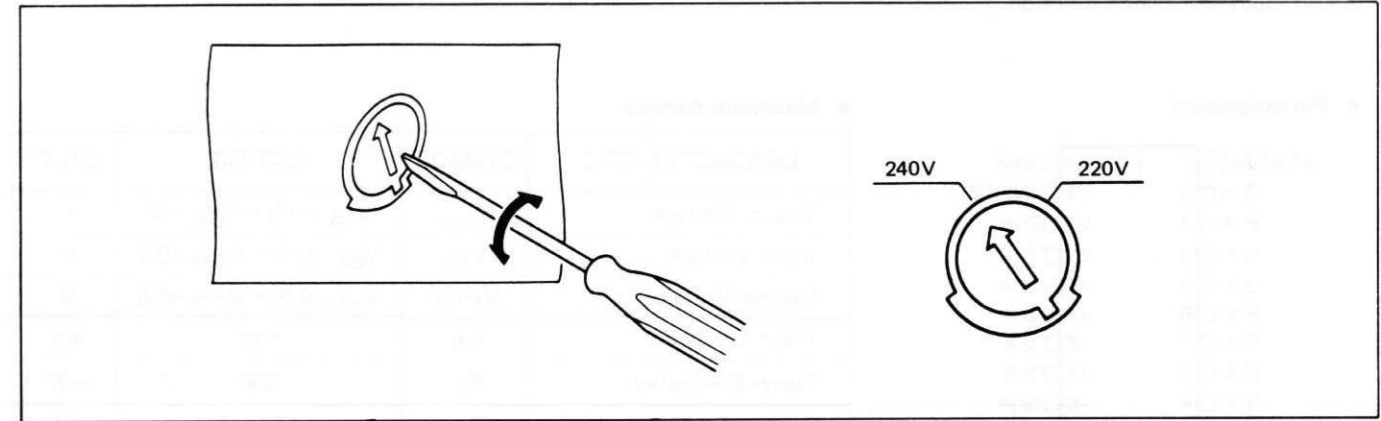
3. VOLTAGE CONVERSION

- EUROPEAN MODEL ONLY

To convert the unit to a different power source voltage, change the position as illustrated in the drawing below.

CAUTION:
DISCONNECT POWER SUPPLY CORD FROM AC OUTLET BEFORE CONVERTING VOLTAGE.

Voltage Conversion Chart

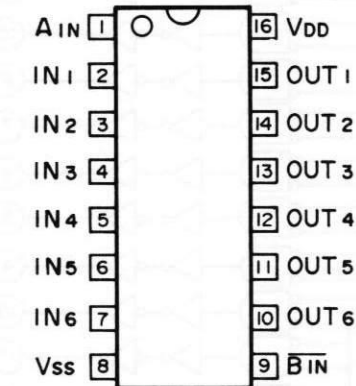


Note on safety: Symbol Δ Fire or electrical shock hazard. Only original parts should be used to replace any part marked with symbol Δ . Any other component substitution (other than original type), may increase risk of fire or electrical shock hazard.

4. CIRCUIT DESCRIPTION

MOS DIGITAL INTEGRATED CIRCUIT TC5064BP (QL07, QL08)

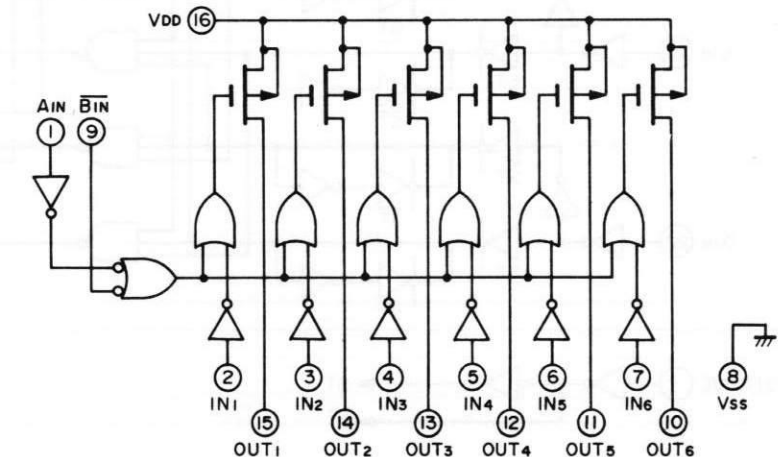
- Pin assignment



- Maximum Ratings

CHARACTERISTIC	SYMBOL	RATING	UNIT
Supply Voltage	V_{DD}	$V_{SS} - 0.5 \sim V_{SS} + 20$	V
Input Voltage	V_{IN}	$V_{SS} - 0.5 \sim V_{DD} + 0.5$	V
Output Voltage	V_{OUT}	$V_{DD} - 50 \sim V_{DD} + 0.5$	V
Power Dissipation	P_D	300	mW
Input Current	I_{IN}	± 10	mA
Storage Temperature	T_{stg}	$-65 \sim 150$	$^{\circ}C$

- Logic Diagram

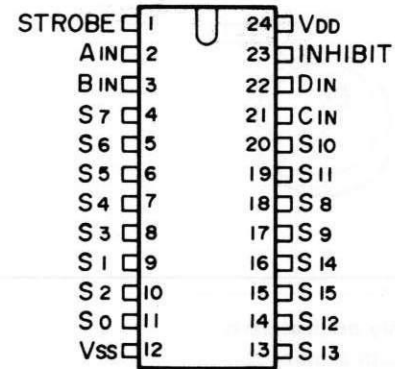


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MOS DIGITAL INTEGRATED CIRCUIT 4514 (QL06)

IC 4514 is a decoder which converts 4-bit binary input signals into hexadecimal output signals, and has a decode inhibit input and a latch function.

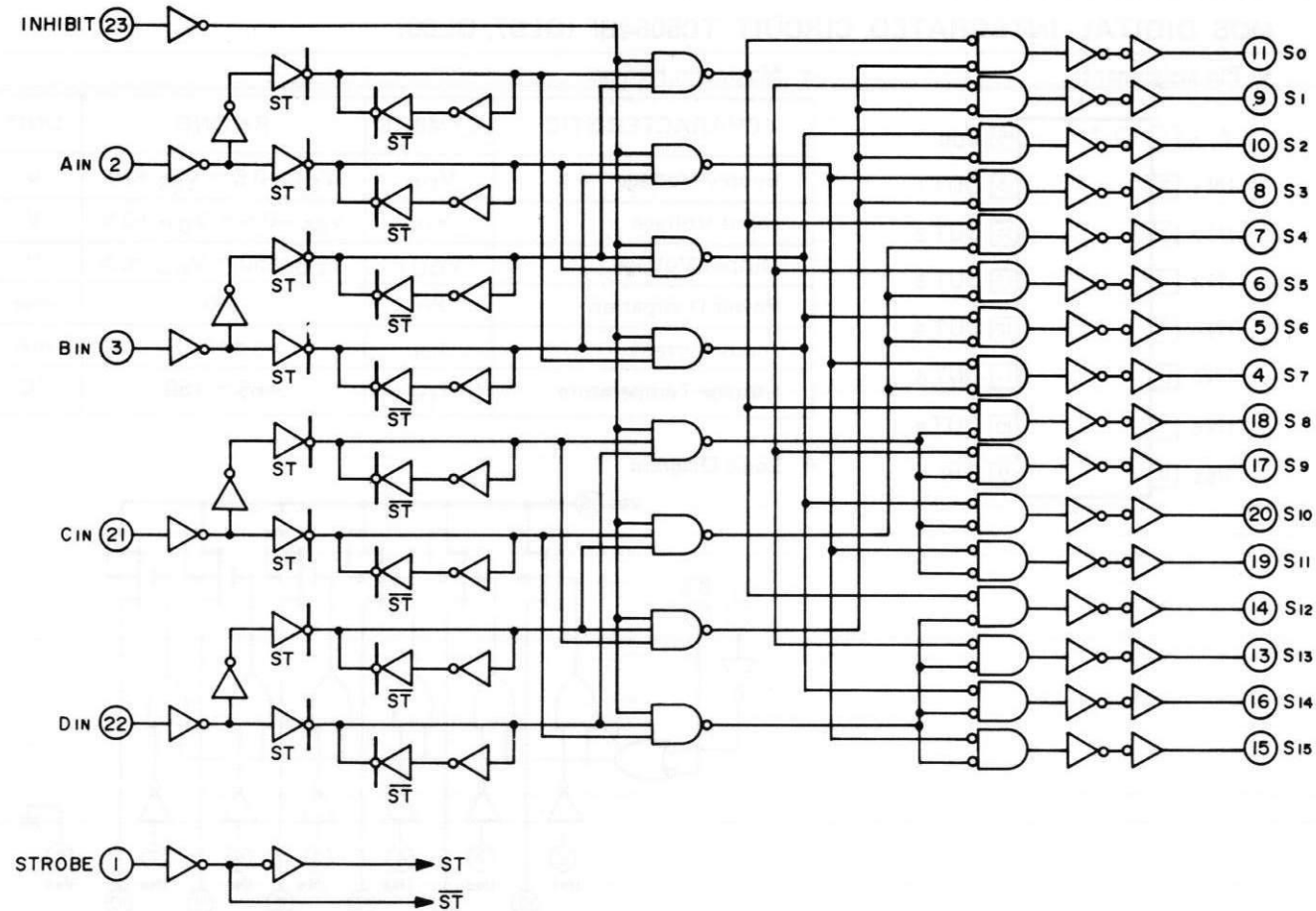
Pin assignment



Maximum Ratings

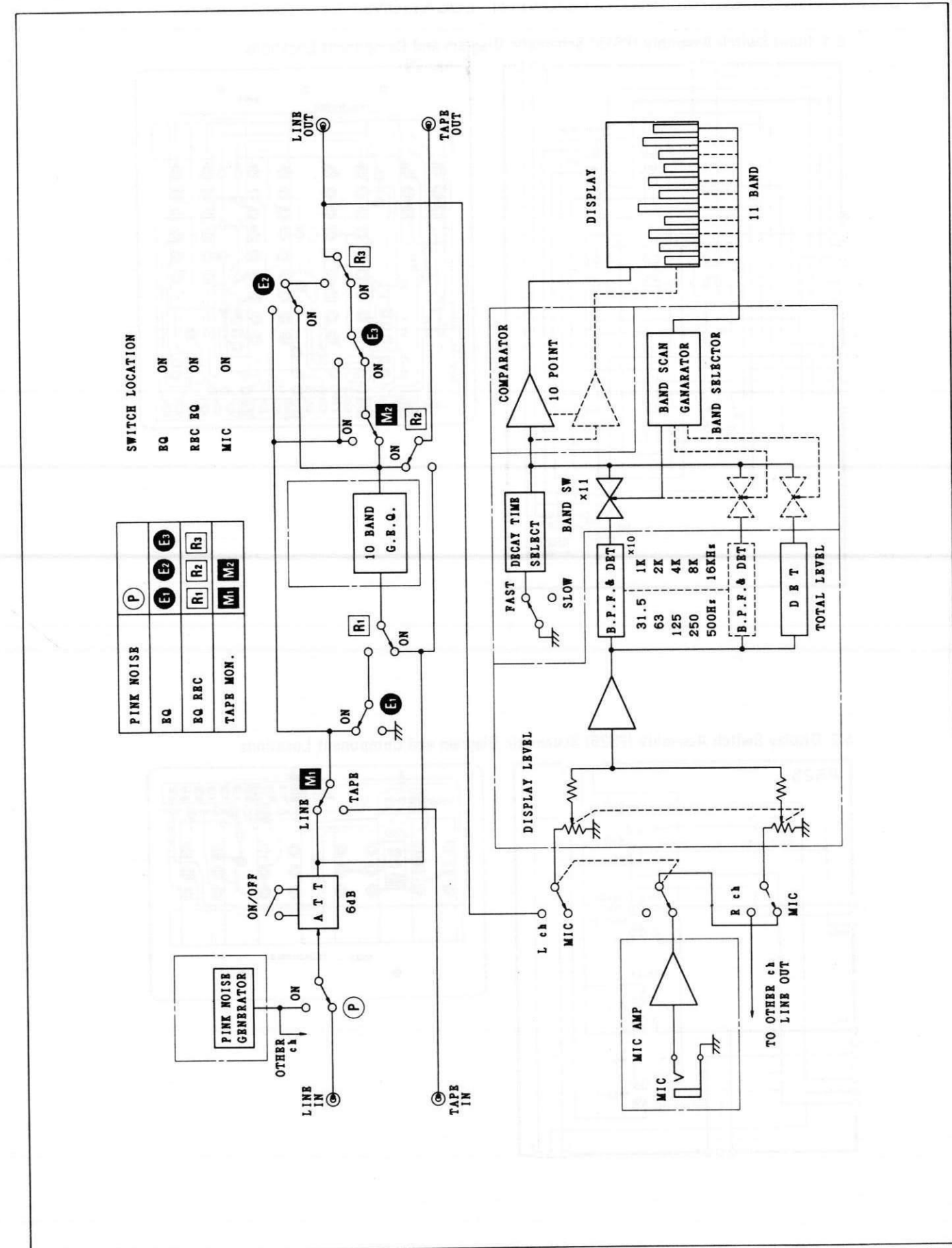
CHARACTERISTIC	SYMBOL	RATING	UNIT
Supply Voltage	V _{DD}	V _{SS} - 0.5 ~ V _{SS} + 20	V
Input Voltage	V _{IN}	V _{SS} - 0.5 ~ V _{DD} + 0.5	V
Output Voltage	V _{OUT}	V _{SS} - 0.5 ~ V _{DD} + 0.5	V
Input Current	I _{IN}	±10	mA
Power Dissipation	P _D	300	mW
Storage Temperature	T _{stg}	-65 ~ 150	°C
Lead Temperature - Time	T _{sol}	260°C - 10 sec	

Logic Diagram



M3172

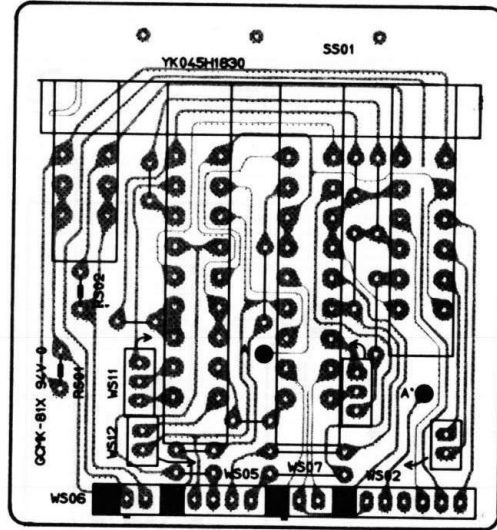
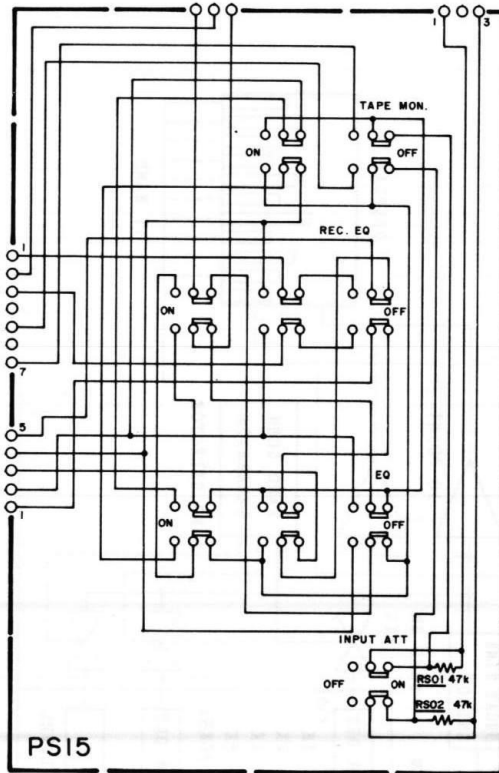
5. BLOCK DIAGRAM



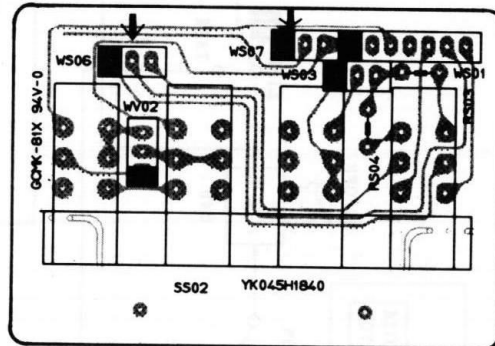
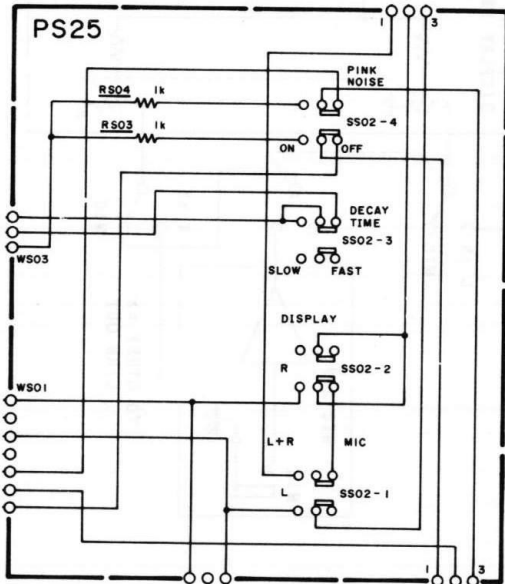
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6. SCHEMATIC DIAGRAM AND COMPONENT LOCATIONS

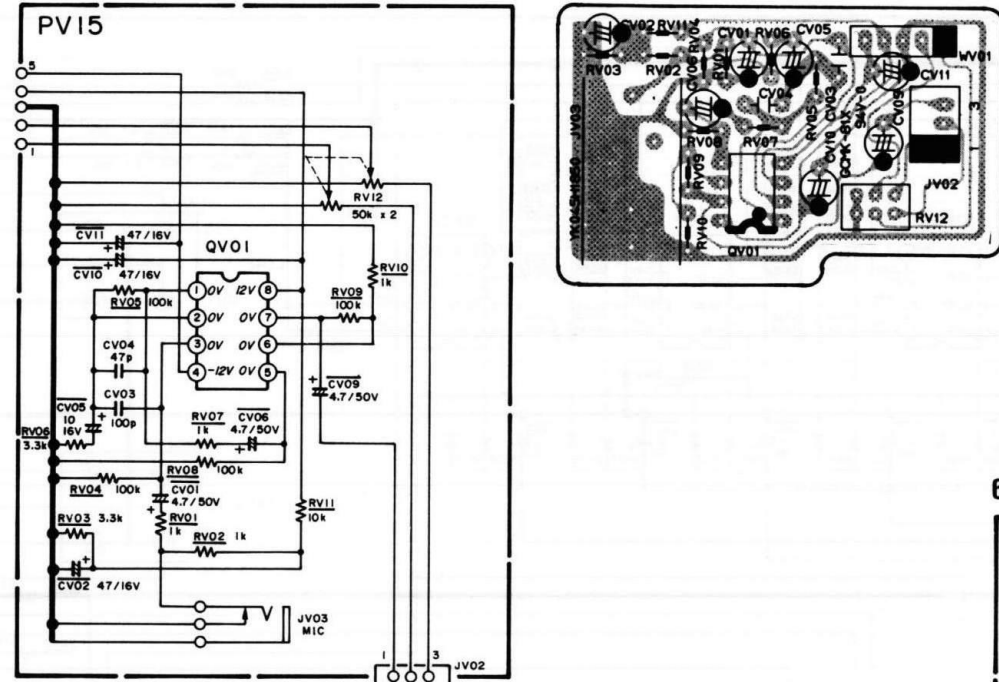
6.1 Input Switch Assembly (PS15) Schematic Diagram and Component Locations



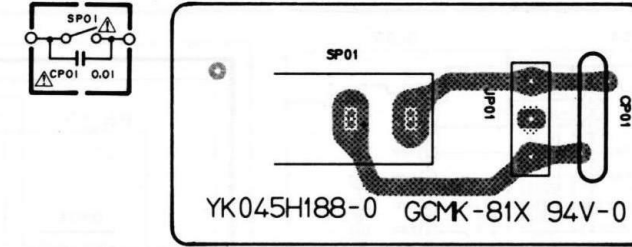
6.2 Display Switch Assembly (PS25) Schematic Diagram and Component Locations



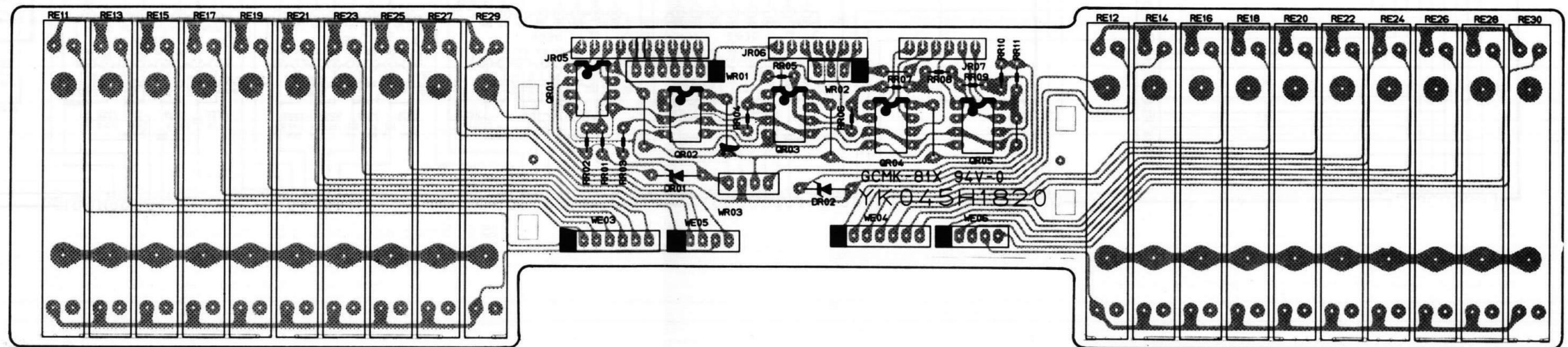
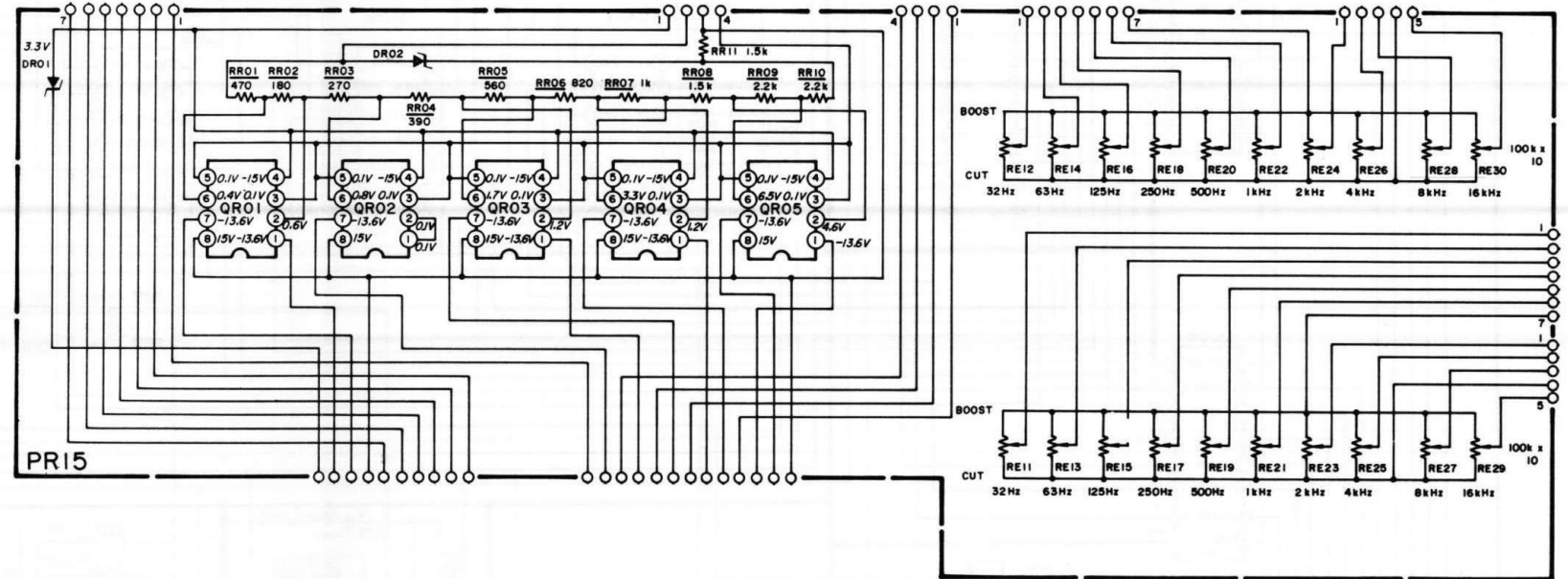
6.3 Mic Amp. Assembly (PV15) Schematic Diagram and Component Locations



6.4 Power Switch Assembly (PS35) Schematic Diagram and Component Locations

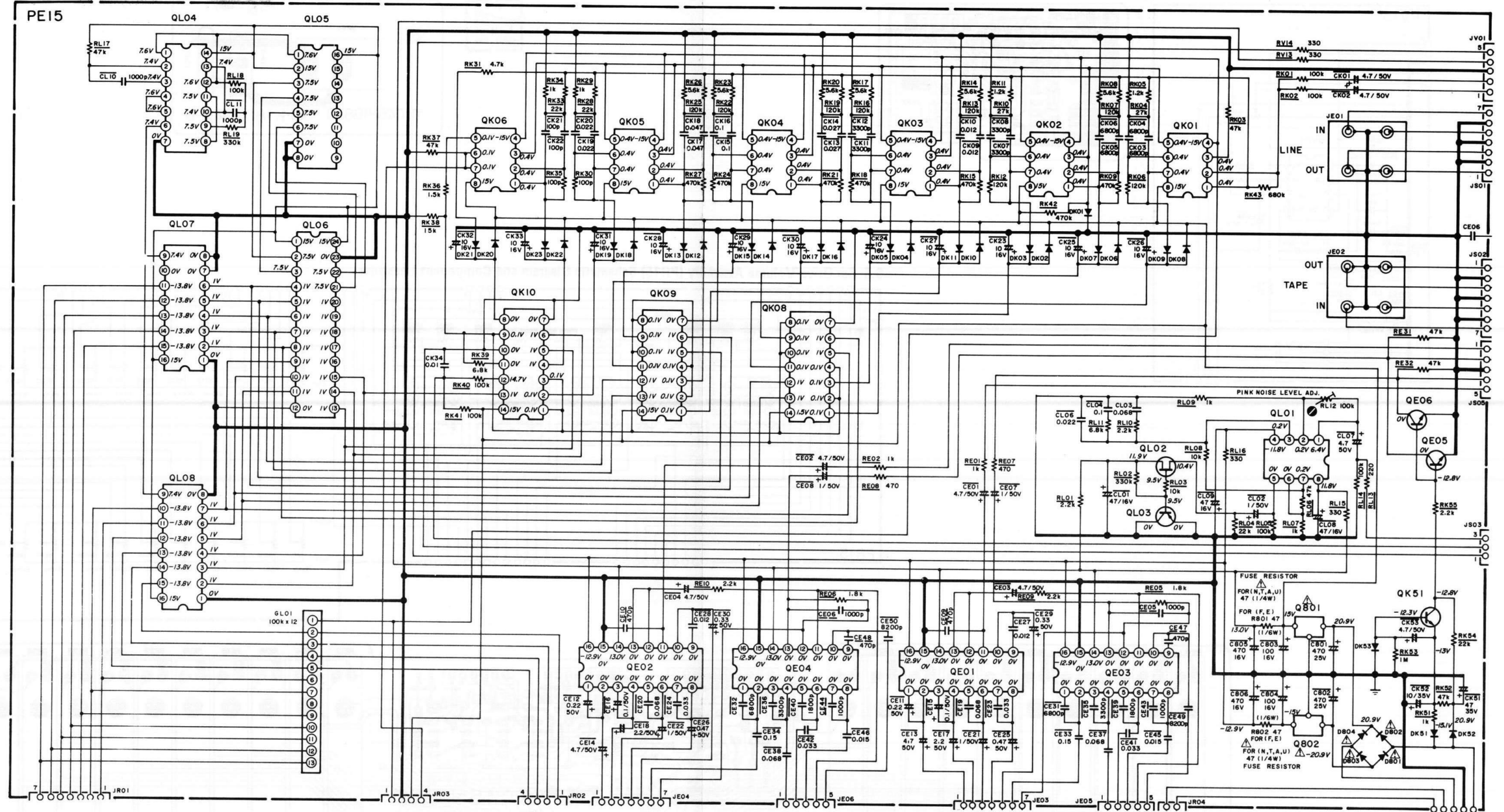


6.5 Bar Drive/Volume Assembly (PR15) Schematic Diagram and Component Locations

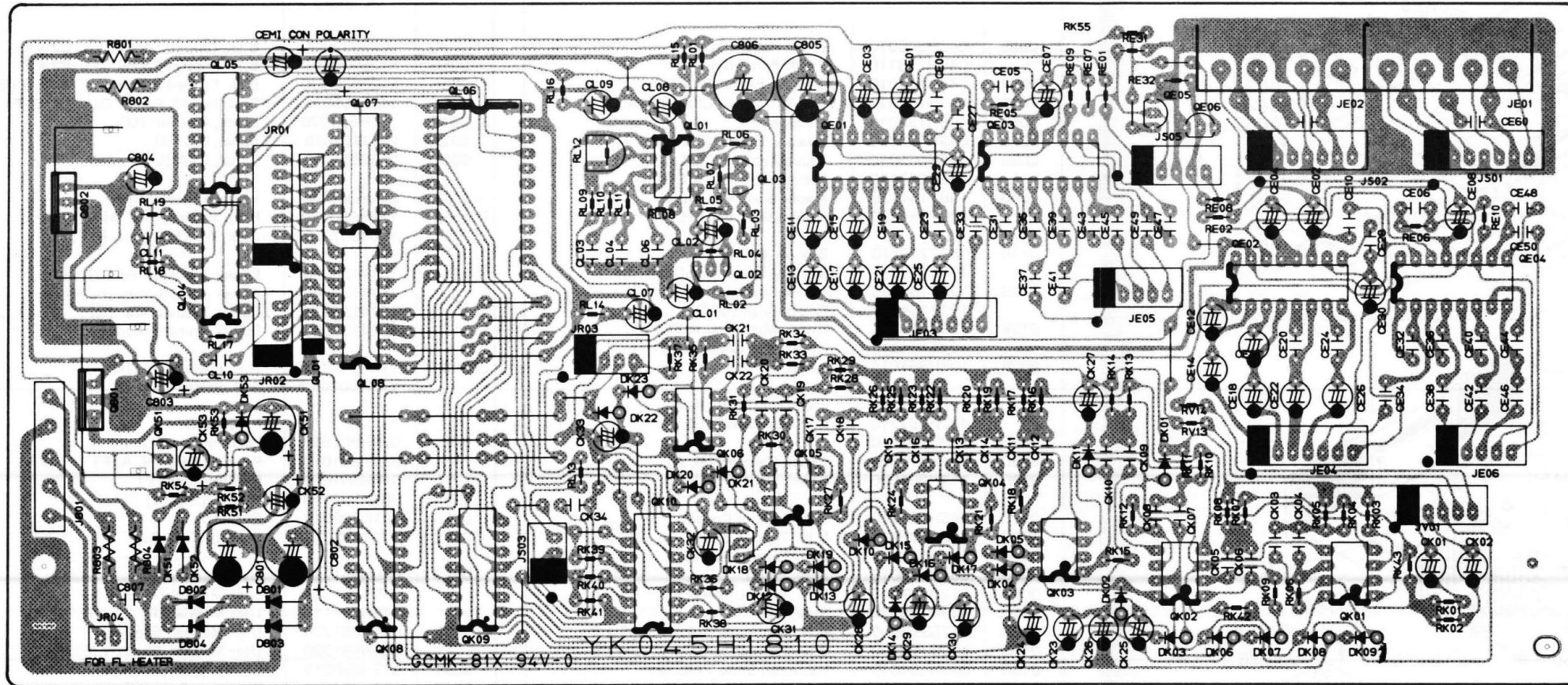


M3175

6.6 Main Assembly (PE15) Schematic Diagram and Component Locations



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7. TECHNICAL SPECIFICATIONS

AUDIO SECTION

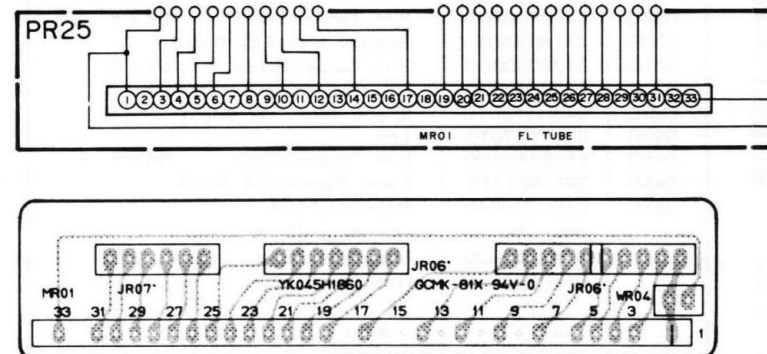
RATED OUTPUT 1 V
TOTAL HARMONIC DISTORTION
AT RATED OUTPUT, 20 Hz TO 20 kHz 0.005%
I.M. DISTORTION AT RATED OUTPUT
(250 Hz AND 8 kHz MIXED,
AMPLITUDE RATIO 4:1) 0.005%

Frequency Response (± 1 dB) 10 Hz ~50 kHz
 Signal-to-Noise Ratio (A weighted) 110 dB
 Input Terminals
 LINE IN: Input Impedance 47 k ohms
 Channel Balance
 LINE ± 1 dB
 Inter Channel Crosstalk (1 kHz)
 LINE 60 dB
 Output Voltage (1 kHz)
 LINE 7 V
 Output Impedance (1 kHz)
 LINE OUT 600 ohms
 EQ Action (31.5 Hz, 63 Hz, 125 Hz, 250 Hz,
 500 Hz, 1 kHz, 2 kHz, 4 kHz, 8 kHz, 16 kHz) ... ± 10 dB

GENERAL

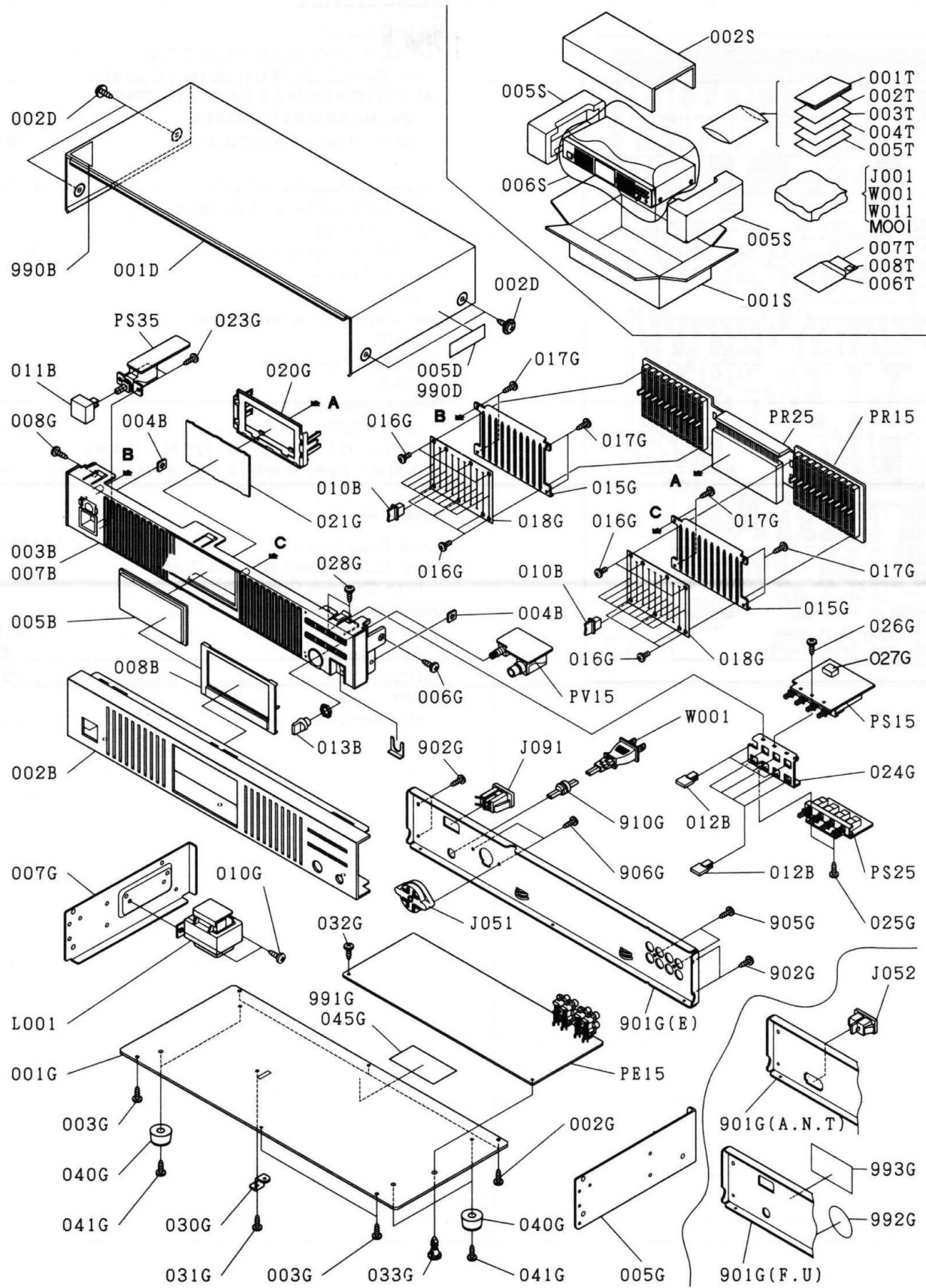
Power Requirement 220 ~240 V AC, 50/60 Hz
 Power Consumption at Rated Output,
 both Channels Operating 8 W
 Dimensions
 Panel Width 420 mm
 Panel Height 73 mm
 Depth 194 mm
 Weight
 Unit alone 2.7 kg

6.7 FL Set Assembly (PR25) Schematic Diagram and Component Locations



6. EXPLODED VIEW AND PARTS LIST

●(U): for U.S.A.
 ●(N): for Europe
 ●(E): for Europe
 ●(A): for Australia
 ●(F): for Japan



REF. DESIG.	PART NO.	DESCRIPTION
002B	045H248010	Front Panel (BLK)
	045H248110	Front Panel (GLD)
003B	045H105010	Chassis, Front (BLK)
004B	045H160020	Bracket, Front Chassis Side
005B	045H158010	Window, FL
007B	045H105500	Chassis, Front (K) (GLD)
008B	045H063010	Escutcheon, FL (BLK)
	045H063110	Escutcheon, FL (GLD)
010B	198T154120	Knob, Slide VR (BLK)
	198T154020	Knob, Slide VR (GLD)
011B	158T270110	Button, Power (BLK)
	158T270010	Button, Power (GLD)
012B	129T154130	Knob, Push (BLK)
	129T154030	Knob, Push (GLD)
013B	124T154210	Knob, Mic Level (BLK)
	124T154310	Knob, Mic Level (GLD)
990B	105H861010	Label, 3 Year
001D	403H257110	Lid, Top Cover (BLK)
	403H257310	Lid, Top Cover (GLD)
002D	51260408U0	B.T. Screw B4 x 8
005D	2911861140	Label, Caution [N, A]
990D	117H861020	Label, Caution [U]
001G	045H257010	Lid, Bottom Cover
002G	51280308U0	B.H. Tapped Screw B3 x 8
003G	51280308U0	B.H. Tapped Screw B3 x 8
005G	008H126010	Stay, Right
006G	51280308U0	B.H. Tapped Screw B3 x 8
007G	403H126020	Stay, Left
008G	51280308U0	B.H. Tapped Screw B3 x 8
010G	51280406U0	B.H. Tapped Screw B4 x 6
015G	045H104010	Retainer, Slide Volume
016G	51100203S0	B.H.M. Screw B2 x 3
017G	51280308U0	B.H. Tapped Screw B3 x 8
018G	045H303020	Mask
020G	045H271010	Holder, FL
021G	045H303010	Mask, FL (BLK)
	045H303110	Mask, FL (GLD)
023G	51280308U0	B.H. Tapped Screw B3 x 8
024G	045H160010	Bracket, Push Switch
025G	51280308U0	B.H. Tapped Screw B3 x 8
026G	51280308U0	B.H. Tapped Screw B3 x 8
027G	147T118010	Spacer
028G	51280308U0	B.H. Tapped Screw B3 x 8
030G	471H160040	Bracket, Main P.W. Board
031G	51280308U0	B.H. Tapped Screw B3 x 8
032G	51280308U0	B.H. Tapped Screw B3 x 8
033G	045H118010	Spacer, Main P.W. Board
040G	011T057010	Leg
041G	51280408U0	B.H. Tapped Screw B4 x 8
045G	2911861110	Label, Caution [A, N, E]
901G	045H250040	Rear Panel [U]
	045H250010	Rear Panel [N, A]
	045H250020	Rear Panel [E]
	045H250030	Rear Panel [F]
902G	51280308U0	B.H. Tapped Screw B3 x 8
905G	51280308U0	B.H. Tapped Screw B3 x 8
906G	51280308U0	B.H. Tapped Screw B3 x 8
909G	1455259030	Bushing, AC Power Cord [U, E, F]
991G	117H861020	Label, Caution [U]
992G	9511101070	Label, UL [U]
993G	2457861040	Label, CSA [U]
Δ J051	BY05060040	Voltage Selector [E]
Δ J052	YP04000580	Plug, AC Inlet [N, A]
Δ J091	YJ04001220	Jack, AC Outlet [U, E, F]
Δ L001	TS14138050	Power Transformer [U]
	TS14138040	Power Transformer [N, A]
	TS14138070	Power Transformer [E]
	TS14138060	Power Transformer [F]
Δ W001	YC01900100	A.C. Power Cord [U]
	YC01900080	A.C. Power Cord [E, F]
		PACKING
001S	045H801030	Packing Case [U]
	045H801010	Packing Case [N, A, F]
	045H801020	Packing Case [E]
002S	009H807010	Reinforcing [E]
005S	001H809010	Cushion
006S	9014312230	Polyethylene Bag
001T	045H851210	User Manual [U]
	045H851310	User Manual [N, E, A]
	045H851110	User Manual [F]
002T	045H851220	User Manual, Spec [U]
	045H851320	User Manual, Spec [N, E, A]
003T	045H856010	Circuit Diagram [N, E]
004T	103H854010	Warranty Card [U]
	9631000090	Warranty Card [A]
005T	9631000130	Warranty Card [F]
006T	128T854010	Warranty Card [F]
007T	9611000050	User's Card [F]
008T	9540000010	License
Δ J001	YJ04001240	Jack, AC Adapter [E]
Δ W001	ZC01805010	A.C. Power Cord [N]
	ZC02006020	A.C. Power Cord [A]
W011	ZD01000170	Connective Cord
M001	MP50000200	Microphone

7. ELECTRICAL PARTS LIST

- (U): for U.S.A.
- (N): for Europe
- (E): for Europe
- (A): for Australia
- (F): for Japan

ASSIGNMENT OF COMMON PARTS CODES.

RESISTOR

- R***:** (1) GD05 --- 140, Carbon film fixed resistor, ±5%, 1/4W
R*:** (2) GD05 --- 160, Carbon film fixed resistor, ±5%, 1/6W

① — Resistance value

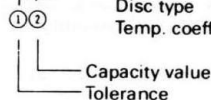
Examples

- ① Resistance value
- | | | | |
|------------|------------|-------------|--------------|
| 0.1Ω...001 | 10Ω...100 | 1kΩ...102 | 100kΩ...104 |
| 0.5Ω...005 | 18Ω...180 | 2.7kΩ...272 | 680kΩ...684 |
| 1Ω...010 | 100Ω...101 | 10kΩ...103 | 1MkΩ...105 |
| 6.8Ω...068 | 390Ω...391 | 22kΩ...223 | 4.7MkΩ...475 |

(Note) Please distinguish 1/4W from 1/6W by the shape of parts used actually.

C***: CERAMIC CAP.

- (1) DD1 --- 370, Ceramic condenser
 Disc type
 Temp. coeff. P350 ~ N1000, 50V



Examples

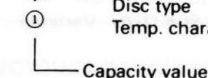
- ① Tolerance (Capacity deviation)
- ±0.25pF...0
 - ±0.5pF...1
 - ±5%...5

* Tolerance of COMMON PARTS handled here are as follows:

- 0.5pF ~ 5pF...±0.25pF
 - 6pF ~ 10pF...±0.5pF
 - 12pF ~ 560pF...±5%
- ② Capacity value
- | | | |
|-------------|------------|-------------|
| 0.5pF...005 | 3pF...030 | 100pF...101 |
| 1pF...010 | 10pF...100 | 220pF...221 |
| 1.5pF...015 | 47pF...470 | 560pF...561 |

C***: CERAMIC CAP.

- (1) DK16 --- 300, High dielectric constant ceramic condenser
 Disc type
 Temp. chara. 2B4, 50V

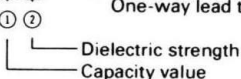


Example

- ② Capacity value
- | | | |
|-------------|--------------|---------------|
| 100pF...101 | 1000pF...102 | 10000pF...103 |
| 470pF...471 | 2200pF...222 | |

C***: ELECTROLY CAP. (⚡), FILM CAP. (±)

- (1) EA --- 10, Electrolytic condenser
 One-way lead type, Tolerance ±20%

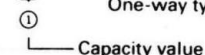


Examples

- ① Capacity value
- | | | |
|--------------|-------------|--------------|
| 0.1μF...104 | 4.7μF...475 | 100μF...107 |
| 0.33μF...334 | 10μF...106 | 330μF...337 |
| 1μF...105 | 22μF...226 | 1100μF...108 |
| | | 2200μF...228 |

- ② Working voltage
- | | |
|------------|-----------|
| 6.3V...006 | 25V...025 |
| 10V...010 | 35V...035 |
| 16V...016 | 50V...050 |

- (2) DF15 --- 350, Plastic film condenser
 One-way type, Mylar ±5% 50V



Examples

- ① Capacity value
- | | |
|------------------------|--------------|
| 0.001μF (1000pF)...102 | 0.1μF...104 |
| 0.0018μF...182 | 0.56μF...564 |
| 0.01μF...103 | 1μF...105 |
| 0.015μF...153 | |

REF. DESIG.	PART NO.	DESCRIPTION
PE15	YK045H1810 ZZ045H1810 ZZ045H8810 ZZ045H7810	PE15-MAIN CIRCUIT BOARD P.W. Board, Main P.W. Board Assembly [U] P.W. Board Assembly [N, A] P.W. Board Assembly [E]
CE60 CK34	DK18103310 DK18103310	PE15-CAPACITORS Ceramic 0.01μF +80% -20% Ceramic 0.01μF +80% -20%
△R801 △R802 RL12 GL01	NH05470140 NH05470140 RA01040600 BW05104020	PE15-RESISTORS 47Ω ±5% ¼W, Fusible [U,N,A] 47Ω ±5% ¼W, Fusible [U,N,A] 100KΩ, Trimming 100KΩx12, Composite
△D801 } △D804 DK01 } DK23 DK51 DK52 DK53	HD20022030 HD20002000 HD20022030 HD20022030 HD20022030	PE15-SEMICONDUCTORS Diode DSF10C Diode, Substitute Diode DSF10C Diode DSF10C Diode DSF10C
△Q801 △Q802 QE01 } QE04 QE05 QE06 QK01 } QK06	HC38515090 HC38515090 HC10036200 HT328781A0 HT328781A0 HC10008090	IC NJM78M15A IC NJM78M15A IC M5227P Transistor 2SC2878(A) Transistor 2SC2878(A) IC NJM4558D-D
QK08 QK09 QK10 QK51 QL01 QL02 QL03 QL04 QL05 QL06 QL07 QL08	HC406600B0 HC406600B0 HC406600B0 HT30001000 HC10008090 HF202462B0 HT113092B0 HC406905B0 HC452000B0 HC451400B0 HC10158050 HC10158050	IC 4066 IC 4066 IC 4066 Transistor 2SC536SP, 2SC2458 ETC IC NJM4558D-D F.E.T. 2SK246(Y, GR) Transistor 2SA1309(R, S) IC 4069 IC 4520 IC 4514 IC TC5064BP IC TC5064BP
J801 JE01 JE02 JE03 JE04 JE05 JE06 JR01 JR02 JR03 JR04 JS01 JS02 JS03 JS05 JV01	YP06001050 YT02040610 YT02040500 YJ06002460 YJ06002460 YJ06002390 YJ06002390 YJ06002460 YJ06002440 YJ06002440 YJ06001520 YJ06002460 YJ06002460 YJ06002430 YJ06002390 YJ06002390	PE15-MISCELLANEOUS Plug, 5P Terminal, 4P; RCA Pin Terminal, 4P; RCA Pin Jack, 7P Jack, 7P Jack, 5P Jack, 5P Jack, 7P Jack, 4P Jack, 4P Jack, 2P Jack, 7P Jack, 7P Jack, 3P Jack, 5P Jack, 5P

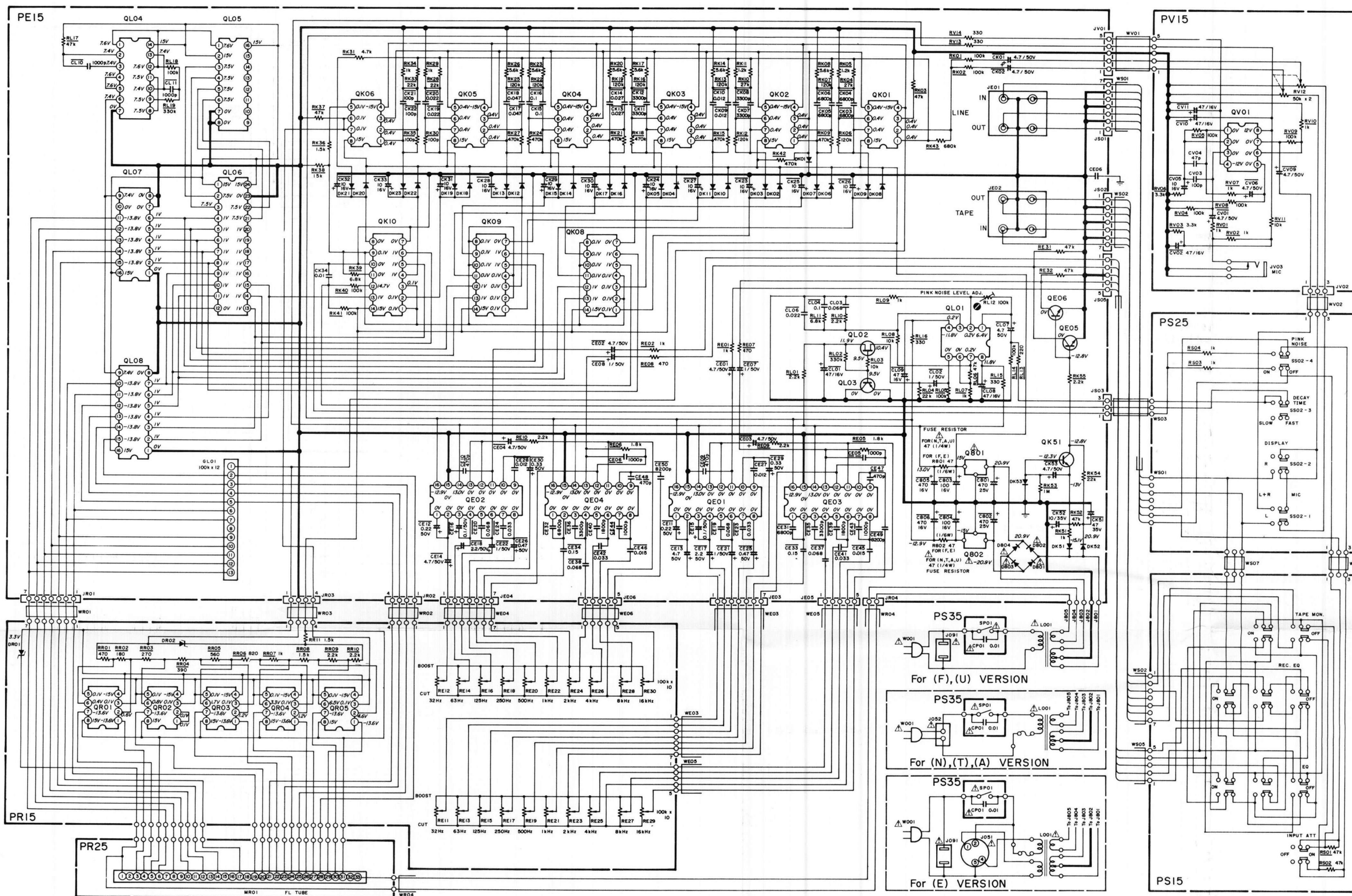
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REF. DESIG.	PART NO.	DESCRIPTION
PR15	YK045H1820 ZZ045H1820	PR15-BAR DRIVE/VOLUME CIRCUIT BOARD P.W. Board, Bar Drive/Volume P.W. Board Assembly
RE11 } RE30	RX01040130	PR15-RESISTORS 100K Ω , Variable
DR01 DR02	HD30001020 HD30044060	PR15-SEMICONDUCTORS Zener MA1033M Zener RD9.1E-B1
QR01 } QR05	HC10008090	IC NJM4558D-D
JR05 JR06 JR07	YP07001600 YP07001570 YP07001560	PR15-MISCELLANEOUS Plug, 10P Plug, 7P Plug, 6P
MR01	HQ31101410	Display Unit
WE03 WE04 WE05 WE06 WR01 WR02 WR03	YU07280260 YU07240260 YU05280260 YU05240260 YU07220260 YU04200260 YU04160260	Jumper Lead, 7P Jumper Lead, 7P Jumper Lead, 5P Jumper Lead, 5P Jumper Lead, 7P Jumper Lead, 4P Jumper Lead, 4P
PR25	YK045H1860 ZZ045H1860	PR25-FL SET CIRCUIT BOARD P.W. Board, FL Set P.W. Board Assembly
WR04	YU02160260	Jumper Lead, 2P
PS15	YK045H1830 ZZ045H1830	PS15-INPUT SWITCH CIRCUIT BOARD P.W. Board, Input Switch P.W. Board Assembly
SS01	SP06040090	Push Switch
WS02 WS05 WS06 WS07 WS11 WS12	YU07140260 YU05140260 YU03060260 YU03060260 YU03080260 YU02080260	Jumper Lead, 7P Jumper Lead, 5P Jumper Lead, 3P Jumper Lead, 3P Jumper Lead, 3P Jumper Lead, 2P

REF. DESIG.	PART NO.	DESCRIPTION
PS25	YK045H1840 ZZ045H1840	PS25-DISPLAY SWITCH CIRCUIT BOARD P.W. Board, Display Switch P.W. Board Assembly
SS02	SP02040390	Push Switch
WS01 WS03 WV02	YU07140260 YU03260260 YU03080260	Jumper Lead, 7P Jumper Lead, 3P Jumper Lead, 3P
PS35	YK045H1880 ZZ045H1880	PS35-POWER SWITCH CIRCUIT BOARD P.W. Board, Power Switch P.W. Board Assembly
Δ CP01	DK18103840	Ceramic Cap. 0.01 μ F 400V
JP01	YP06001040	Plug, 3P
Δ SP01	SP01010660	Push Switch, Power
PV15	YK045H1850 ZZ045H1850 ZZ045H8850	PV15-MIC AMP CIRCUIT BOARD P.W. Board, Mic Amp P.W. Board Assembly (Black) P.W. Board Assembly (Gold)
CV03 CV04	DD15101300 DD15470300	PV15-CAPACITORS Ceramic 100pF \pm 5% Ceramic 47pF \pm 5%
RV12	RM05031190	PV15-RESISTOR 50K Ω (A), Variable
QV01	HC10008090	PV15-SEMICONDUCTOR IC NJM4558D-D
JV02 JV03	YJ06002430 YJ01001780 YJ01002110	PV15-MISCELLANEOUS Jack, 3P Jack, Mic (Gold) Jack, Mic (Black)
WV01	YU05100260	Jumper Lead, 5P

(W01-99)	Assembly and Wiring
(T01-99)	Adjustment
(X01-00)	Correction

NOTE ON SAFETY :
Symbol Δ Fire or electrical shock hazard. Only original parts should be used to replace any part marked with symbol Δ . Any other component substitution (other than original type), may increase risk of fire or electrical shock hazard.



- Q801 HC39515090 NJM78M15A
- Q802 HC39515090 NJM79M15A
- QR01 ~ QR05, QV01 QK01 ~ QK06, QL01 HC1008090 NJM4558D-D
- QK08 ~ QK10 HC40600B0 4066
- QL04 HC406905B0 4069
- QL05 HC45200B0 4520
- QL06 HC451400B0 4514
- QL07, QL08 HC10158050 TC5064BP
- QE01 ~ QE04 HC10036200 M5227P
- QE05, QE06 HT328781A0 25C2878A
- QL02 HF202462B0 25K246
- QL03 HT113092B0 25A1309
- QK51 HT30001000 25C536SP 25C245B, ETC
- DK01 ~ DK26 DK53 HD20002000 IS1133, MA165, ETC
- DB01 ~ DB04 DK51, DK52 HD20022030 DSF10C
- DR01 HD30001020 MA1033M
- DR02 HD30044060 RD9.1E
- TOP VIEW 4514
- TOP VIEW 12 13 14 15 16 M5227P
- TOP VIEW 1 2 3 4 5 6 7 8 9 4066 4069 TC5064BP

- L001 TS14138040 POWER TRANSF. [N, A]
- L001 TS14138070 POWER TRANSF. [E]
- RL12 RA01040600 TRIMMING 100KΩ
- SP01 SP01010660 PUSH SWITCH POWER
- MR01 HQ31101410 DISPLAY UNIT
- RE11 RX01040130 VARIABLE 100KΩ
- RE30
- SS01 SP06040090 PUSH SWITCH
- SS02 SP02040390 PUSH SWITCH
- RV12 RM05031190 VARIABLE 50KΩ

NOTE ON SAFETY :
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Components and wiring are subject to change for modification without notice.

"SERVICE INFORMATION IS FOR USE BY QUALIFIED PERSONNEL ONLY - ANY MISADJUSTMENT OR MISALIGNMENT MAY BE TREATED AS A NON-WARRANTY REPAIR BY ANY MARANTZ SERVICE CENTRE -"

Kind of Common Parts

- RESISTOR**
- R*** (1) GD05 --- 140, Carbon film fixed resistor, $\pm 5\%$ 1/4W
- R*** (2) GD05 --- 160, Carbon film fixed resistor, $\pm 5\%$ 1/6W
- CERAMIC CAP.**
- (1) DD1 --- 370, Ceramic condenser, disc type (titan condenser) Temp. coeff. P350 ~ N1000 50V
- CERAMIC CAP.**
- (1) DK16 --- 300, High dielectric constant ceramic condenser, disc type (titan variable) Temp. chara. 2B4 50V
- ELECTROLY. CAP. / FILM CAP.**
- (1) EA --- 10, Electrolytic condenser, one-way lead type, tolerance $\pm 20\%$
- (2) DF15 --- 350, Plastic film condenser, one-way type, Mylar, $\pm 5\%$ 50V

*In case of ordering the common parts, please establish the correct parts number of 10 figures by the procedure "ASSIGNMENT OF COMMON PARTS CODES"

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