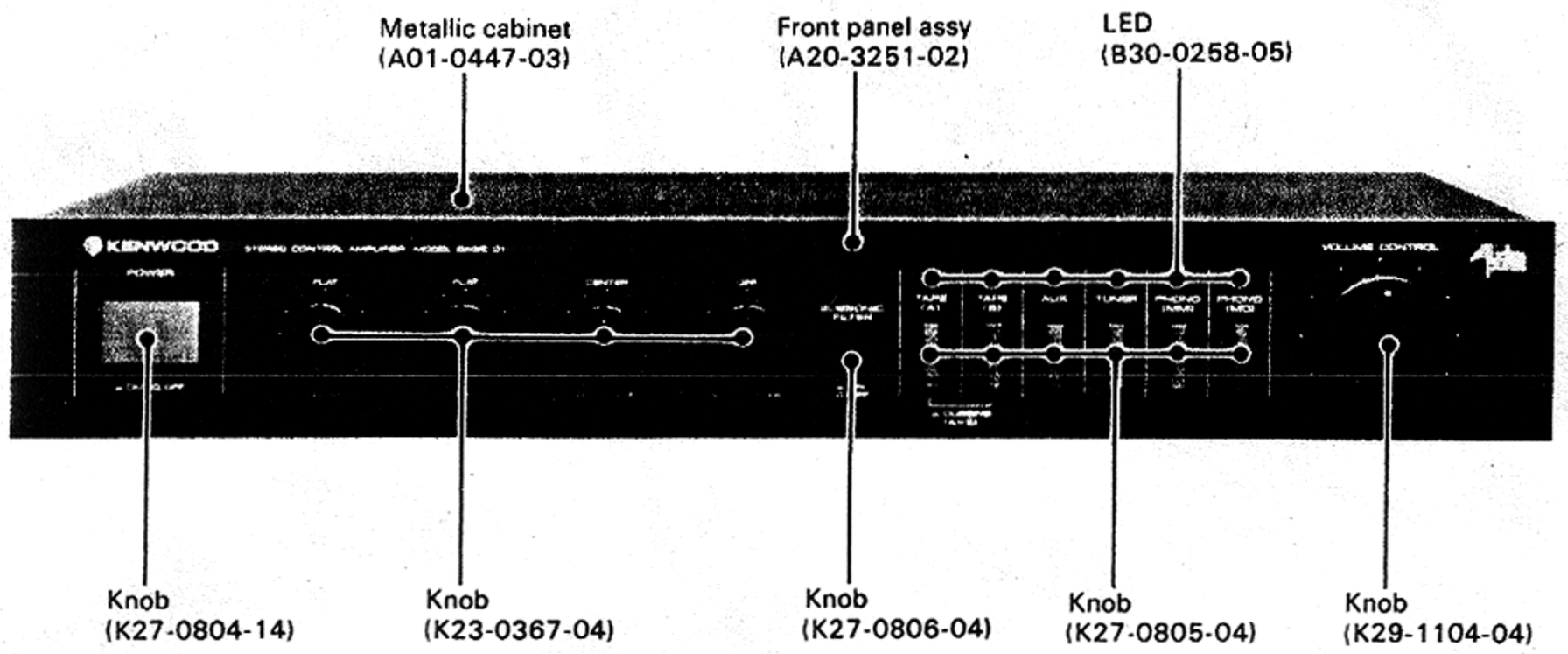
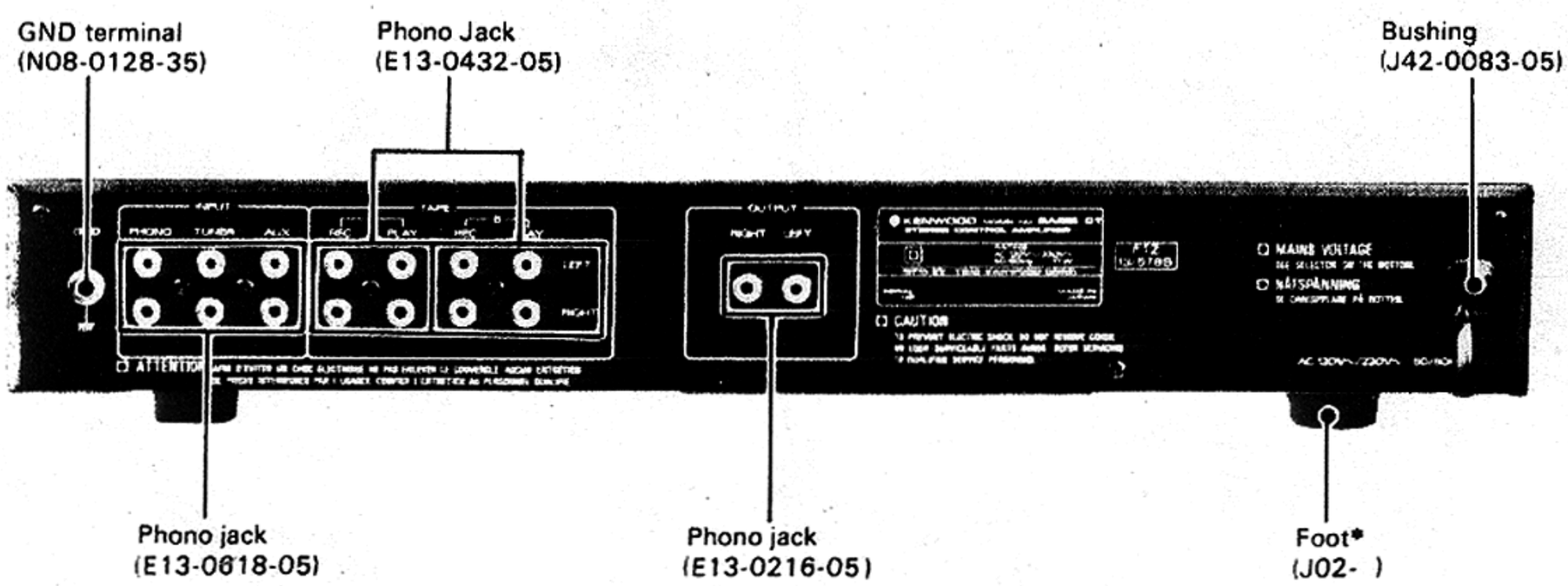
KENWOOD BASIC C1

STEREO CONTROL AMPLIFIER

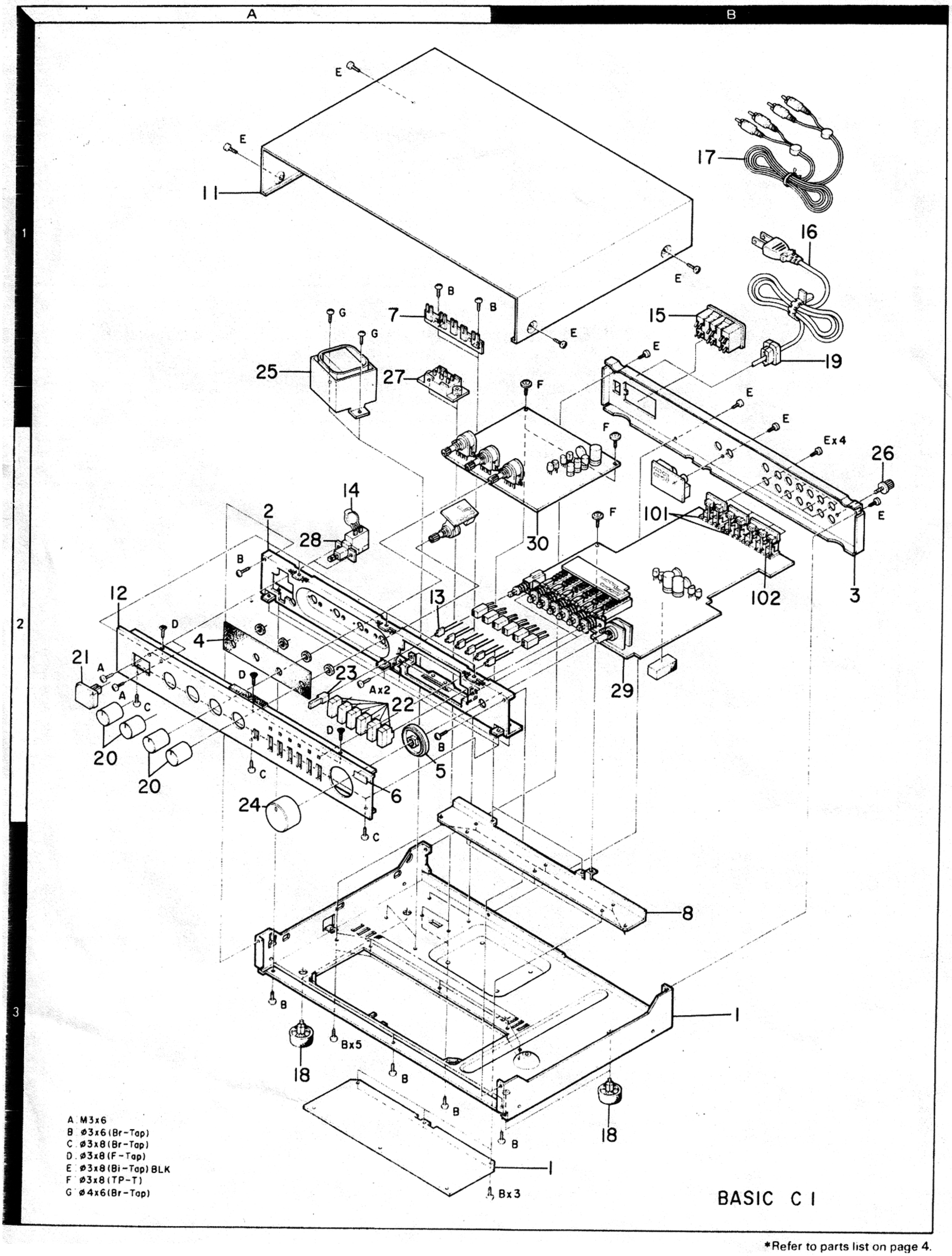
SERVICE MANUAL





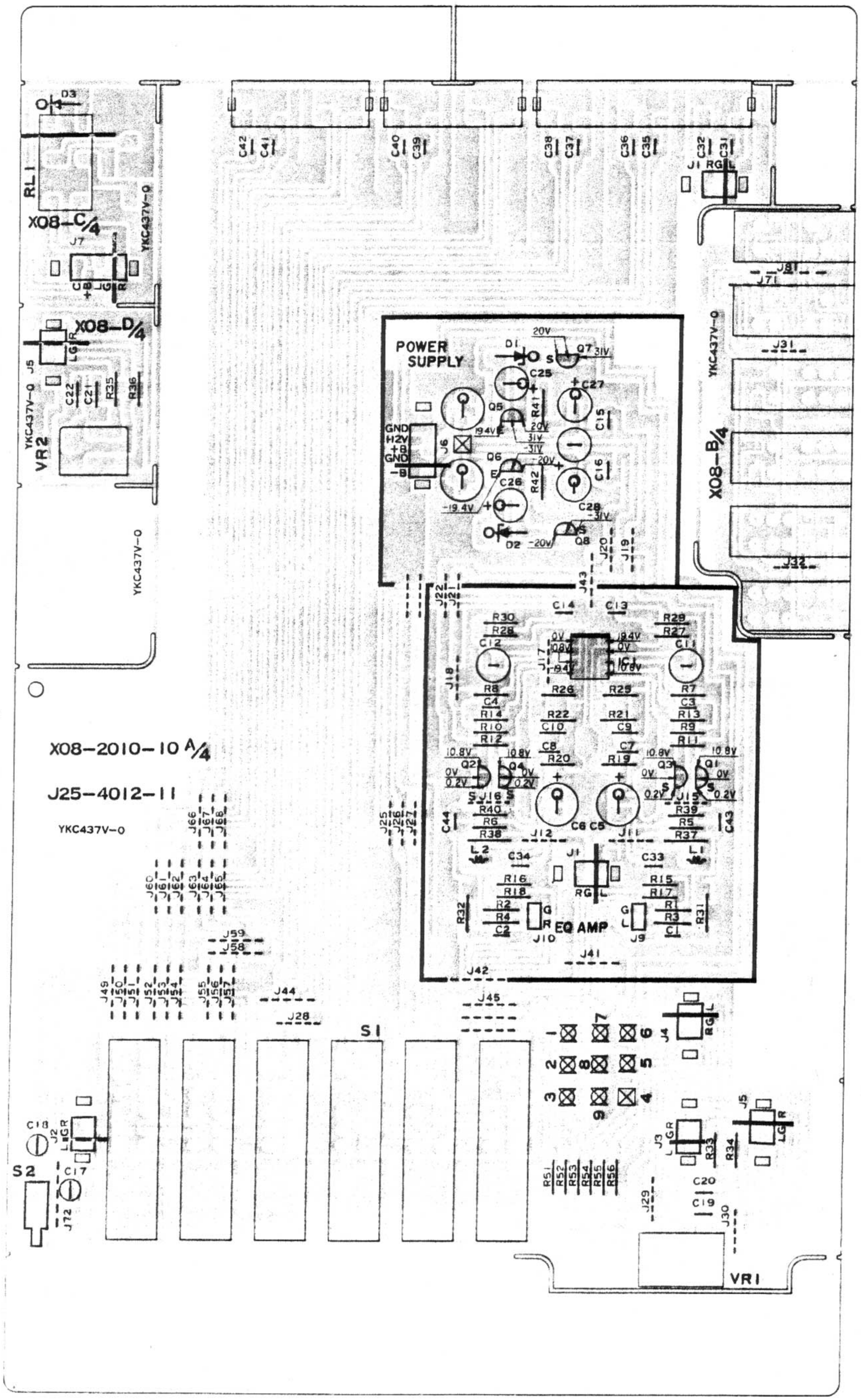
*Refer to parts list on page 4.

EXPLODED VIEW



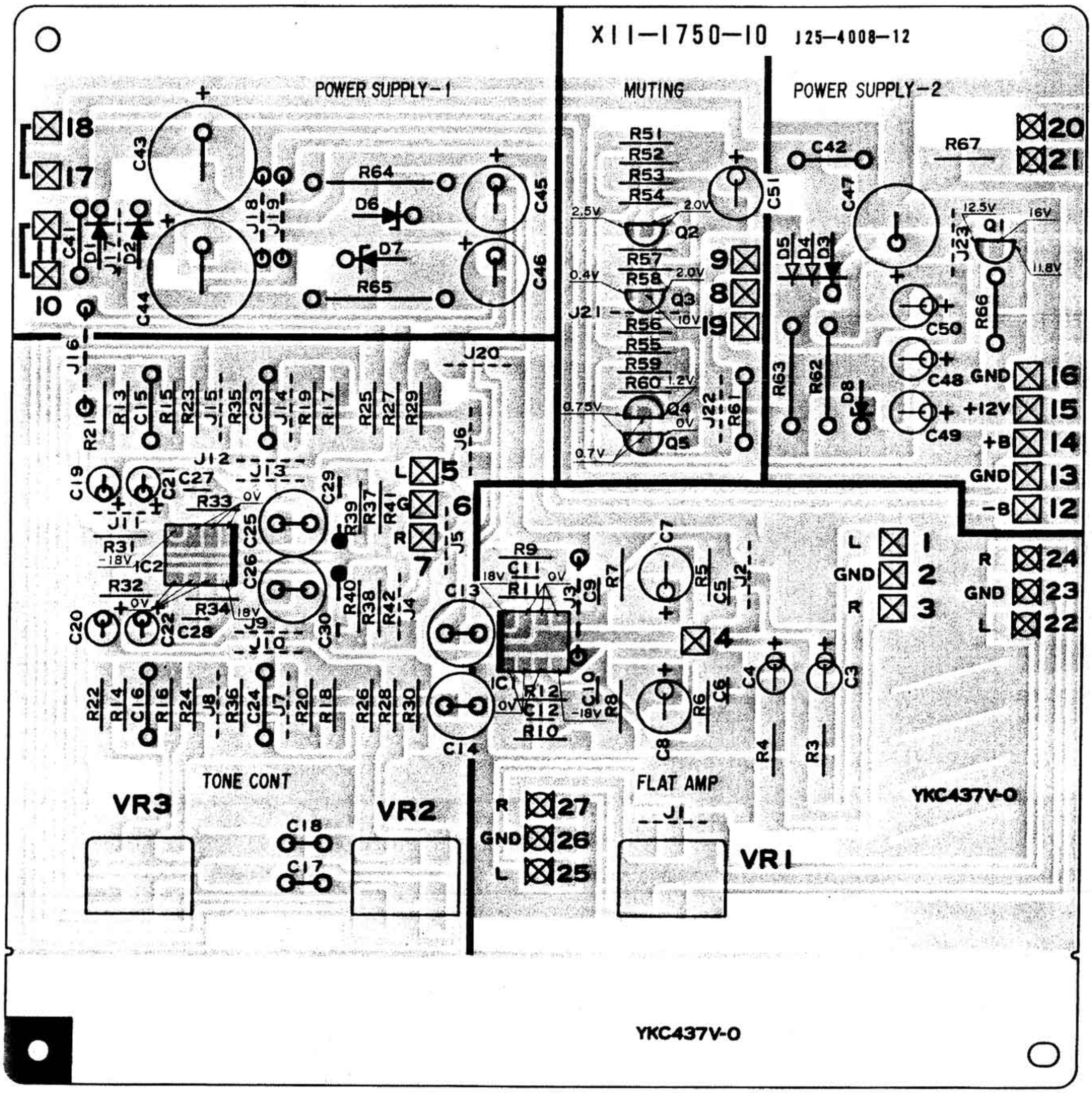
*Refer to parts list on page 4.

PRE AMP (X08-2010-10)
Component side view



BOARD

TONE AMP (X11-1750-10)
Component side view



In this model, there are separated pc boards which was originally one. These separated pc boards can't be supplied independently.

ex. X09-1230-00 (A/3)
X09-1230-00 (B/3)
X09-1230-00 (C/3)

Parts no. of pc board — Separated portion no.

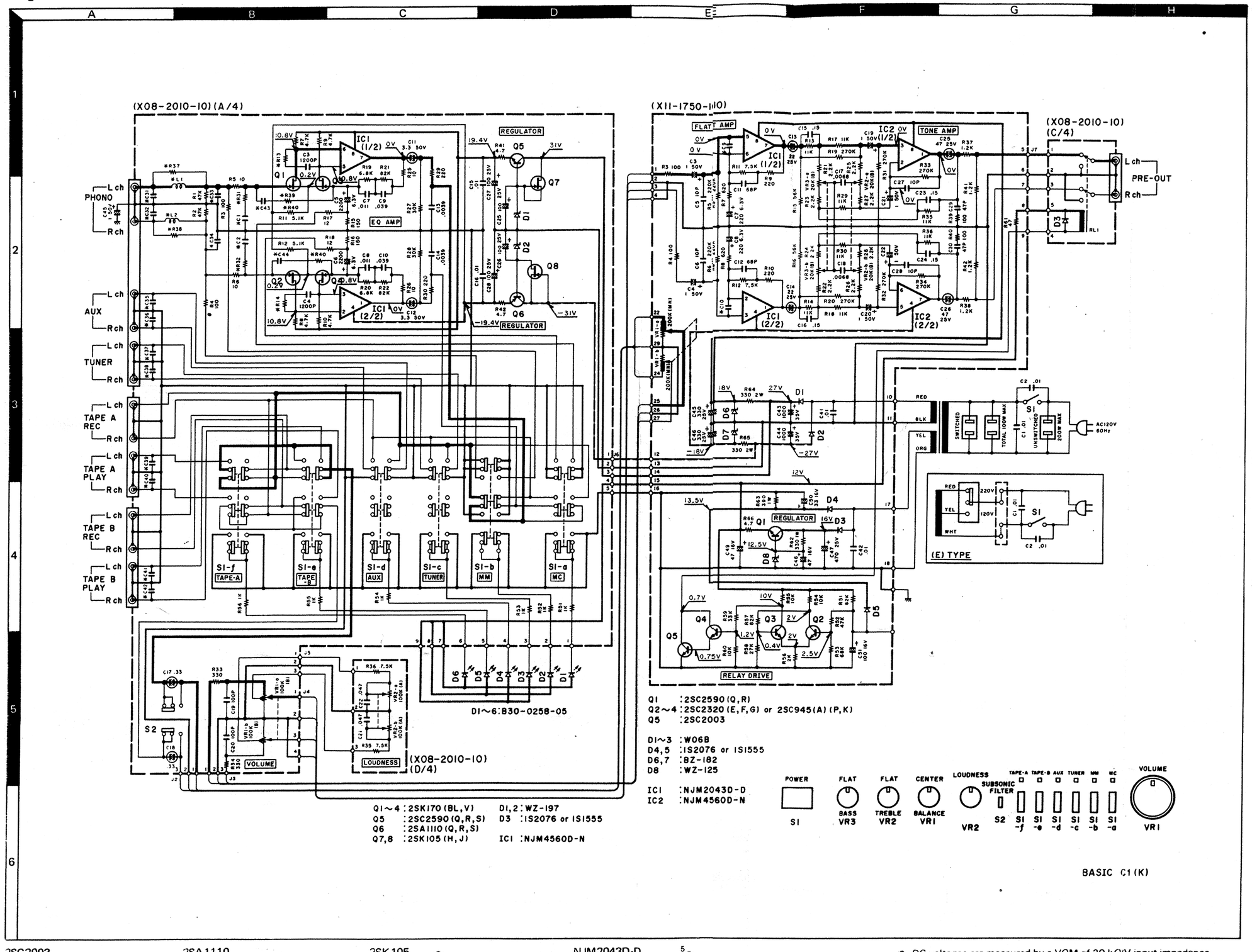
In the example shown above, separated portion can't be ordered independently.
In case only A/3 was ordered, pc board ass'y of X09-123-00, which all A/3, B/3, C/3 included, will be shipped.

Refer to the schematic diagram for the values of resistors and capacitors. The PC board drawing is viewing from the side easy to check.

KENWOOD

STEREO CONTROL AMPLIFIER

BASIC C1



SPECIFICATIONS

PERFORMANCE

Input Sensitivity/Impedance/Signal-to-Noise Ratio (IHF A Curve)	
Phone 1 (for MM use)	2.5 mV/47 kohms/87 dB
Phone 2 (for MC use)	0.25 mV/100 ohms/70 dB
Tuner/AUX	150 mV/47 kohms/108 dB
Tape Play	150 mV/47 kohms/108 dB
Maximum Input Voltage for Phono 1	200 mV (RMS), T.H.D. 0.005% at 1,000 Hz
Maximum Input Voltage for Phono 2	15 mV (RMS), T.H.D. 0.005% at 1,000 Hz
Frequency Response	
Phono 1 & 2	RIAA Standard Curve ±0.3 dB (30 Hz - 20 kHz)
Tuner, AUX & Tape Play	1 Hz - 250 kHz (−3 dB)
Subsonic Filter	18 Hz, 6 dB/Octave
Transient Response	
Rise Time	1.4 μs
Total Harmonic Distortion	
Tuner, AUX & Tape Play 20 Hz - 20 kHz	0.004% at 1 V Output
Phono 1 (for MM use) 20 Hz - 20 kHz	0.005% at 1 V Output (VOLUME at −30 dB)
Phono 2 (for MC use) 20 Hz - 20 kHz	0.005% at 1 V Output (VOLUME at −30 dB)
Output Voltage & Impedance	1 V/less than 600 ohms
Maximum Output	5 V
Load Impedance	47 kohms
Loudness Control (at VOLUME −30 dB)	0 to +9 dB Continuously Variable

GENERAL

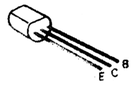
Power Requirement	60 Hz 120 V (U.S.A. & Canada Model) Model sold elsewhere incorporates switch to accommodate 50/60 Hz 120 V/220 V
Power Consumption	0.15A
AC Outlet	1 Unswitched, 2 Switched
Dimensions	W 440 mm (17-5/16") H 78 mm (3-5/64") D 326 mm (12-27/32")
Weight (Net)	4.2 kg (9.3 lbs)
(Gross)	4.8 kg (10.6 lbs)

Kenwood follows a policy of continuous advancements in development. For this reason specifications may be changed without notice.

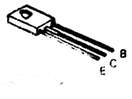
Kenwood poursuit une politique de progrès constants en ce qui concerne le développement. Pour cette raison, les spécifications sont sujettes à modifications sans préavis.

Kenwood strebt standige Verbesserungen in der Entwicklung an. Daher bleiben Anderungen der technischen Daten jederzeit vorbehalten.

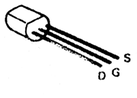
2SC2003
2SC2320



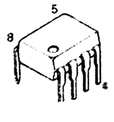
2SA1110
2SC2590



2SK105
2SK170



NJM2043D-D
NJM4560D-N



- DC voltages are measured by a VOM of 20 kΩ/V input impedance.
- Les tensions de courant continu sont measurées par un multimètre d'une impédance d'entrée de 20 kΩ/V.
- Die Gleichstrom-Spannungen werden durch ein Vielfachmeßgerät von 20 kΩ/V Eingangs-Impedanz gemessen.

* New Parts

Parts without **Parts No.** are not supplied.
Les articles non mentionnés dans le **Parts No.** ne sont pas fournis.
Teile ohne **Parts No.** werden nicht geliefert.

PARTS LIST

INSTRUCTION FOR PARTS LIST

Ref. No. 参照番号	Parts No. 部品番号	Description 部品名／規格	Remarks 備考
② 1 3A	-	MAIN CHASSIS ASS'Y	
① 2 2A	-	FRONT CHASSIS	
3 2A	-	FLUOR DISPLAY HOLDER	
4 1A,1B	-	FRONT PANEL	③
5 1A	A20-1666-08	FRONT PANEL ASS'Y	*K ④
⑤ PS3	S42-3201-08	PUSH SW.(SELECTOR) 111	*
RS1	S01-1204-08	ROTARY SW.(FUNC.) 105	* ①
RL1	S51-2206-08	RELAY FIG.106	*M

① Exploded view drawing No.
② Position in exploded view.
③ Symbol of new parts
④ Area to which parts are shipped. Example: A20-1666-08 is the part No. of FRONT PANEL ASS'Y for the "K" type products (for U.S.A.). When this column is blank, it means that the same type of parts (same parts No.) are used for the products shipped to all areas.
⑤ Reference No. in schematic diagram.
⑥ Abbreviation of "ceramic capacitor"
All capacitors and resistors are listed using abbreviations.
Abbreviations

* Abbreviations of capacitors (Parts No. with initial letter "C").

ELECTRO	Electrolytic capacitor
LL-ELEC	Low leak electrolytic capacitor
NP-ELEC	Non-pole electrolytic capacitor
MICA	Mica capacitor
POLYSTY	Polystyrene capacitor
MYLAR	Mylar capacitor
CERAMIC	Ceramic capacitor
TANTAL	Tantalum capacitor
MF	Metallized film capacitor
MP	Metallized paper capacitor
OIL	Oil capacitor

The unit "UF" is used in lieu of "μF"

* Abbreviations of resistors (Parts No. with initial letters "R")

RC	Carbon composition resistor
RD	Carbon film resistor
FL-PROOF RD	Flame-proof carbon film resistor
RW	Wire wound power resistor
FL-PROOF RS	Flame-proof metal oxide film resistor
RN	Metal film resistor
FUSE-RESIST	Resistor with fuse function
2B	Rated wattage 1/8W
2E	Rated wattage 1/4W
2H	Rated wattage 1/2W
3A	Rated wattage 1W
3D	Rated wattage 2W
3F	Rated wattage 3W
3G	Rated wattage 4W
3H	Rated wattage 5W

All resistor values are indicated with the unit (Ω) omitted.

* Abbreviations common to capacitors and resistors.

C	±0.25pF (Used for capacitors only)
D	±0.5pF (Used for capacitors only)
F	±1%
G	±2%
J	±5%
K	±10%
M	±20%
Z	+80%, −20% (Used for capacitors only)
P	+100%, −0% (Used for capacitors only)

Resistors RD (carbon composition resistors) are not listed in the parts list. For values, refer to the schematic diagram.

Ref. No. 参照番号	Parts No. 部品番号	Description 部品名／規格	Remarks 備考
BASIC C1 UNIT			
1 3A,3B	NO STOCK	MAIN CHASSIS	
2 2A	NO STOCK	SUB PANEL	
3 2B	NO STOCK	REAR PANEL	
4 2A	NO STOCK	SHEET	
5 2A	NO STOCK	ESCUTCHEON	
6 2A	NO STOCK	BADGE	
7 1A	NO STOCK	TERMINAL BOARD	
8 3B	NO STOCK	MOUNTING HARDWARE	
11 1A,1B	A01-0447-03	METALLIC CABINET	*
12 2A	A20-3251-02	FRONT PANEL ASSY	*
-	B46-0061-30	WARRANTY CARD	K
-	B46-0078-03	WARRANTY CARD	E
-	B50-4419-00	INSTRUCTION MANUAL	*K
-	B50-4476-00	INSTRUCTION MANUAL	*E
13 2A	B30-0258-05	LED	
14 2A	C91-0079-05	CERAMIC 0.01UF AC125V	
15 1B	E03-0007-05	AC OUTLET	K
16 1B	E30-0181-05	POWER CORD	K
16 1B	E30-0459-05	POWER CORD	E
17 1B	E30-0505-05	CORD WITH PLUG	
-	H01-3461-04	CARTON BOX	*
-	H10-1538-13	POLYSTYRENE FIXTURE	
-	H20-0452-04	COVER	
-	H25-0078-04	BAG (235X315)	
18 3A,3B	J02-0088-05	FOOT	K
18 3A,3B	J02-0089-05	FOOT	E
19 1B	J42-0083-05	BUSHING	
20 2A	K23-0367-04	KNOB(TONE,LOUD,BALANCE)	*
21 2A	K27-0804-14	KNOB(POWER)	*
22 2A	K27-0805-04	KNOB(INPUT SELECTOR)	*
23 2A	K27-0806-04	KNOB(FILTER)	*
24 2A	K29-1104-04	KNOB(VOLUME)	*
25 1A	L01-2771-05	POWER TRANS	*K
25 1A	L01-2776-05	POWER TRANS	*E
26 2B	N08-0126-35	GND TERMINAL	
27 1A	S31-2053-05	SLIDE SWITCH	E
28 2A	S40-1035-05	PUSH SWITCH	K
28 2A	S40-1037-05	PUSH SWITCH	E
29 2B	X08-2010-10	PRE AMP PCB ASSY	*K
29 2B	X08-2012-71	PRE AMP PCB ASSY	*E
30 2B	X11-1750-10	TONE AMP PCB ASSY	*K
30 2B	X11-1752-71	TONE AMP PCB ASSY	*E
PRE AMP (X08-2010-10)			
C1 ,2	C71-1710-15	CERAMIC 100PF J	
C3 ,4	C52-1712-26	CERAMIC 0.0012UF K	
C5 ,6	C24-0822-87	ELECTRO 2200UF 6.3WV	
C7 ,8	C46-1711-35	MYLAR 0.011UF J	
C9 ,10	C46-1739-35	MYLAR 0.039UF J	
C11 ,12	C26-1733-57	NP-ELEC 3.3UF 50WV	
C13 ,14	C46-1739-26	MYLAR 0.0039UF K	
C15 ,16	C46-1710-36	MYLAR 0.01UF K	
C17 ,18	C26-1733-47	ELECTRO 0.33UF 50WV	
C19 ,20	C71-1710-15	CERAMIC 100PF J	
C21 ,22	C46-1747-35	MYLAR 0.047UF J	
C25 -28	C24-1410-77	ELECTRO 100UF 25WV	
C31 ,32	C71-1768-05	CERAMIC 68PF J	

E: Scandinavia & Europe H: Audio Club K: USA P: Canada
S: South Africa T: England U: PX (Far East, Hawaii)
UE: AAFES (Europe) X: Australia M: Other Areas

PARTS LIST

* New Parts

Parts without **Parts No.** are not supplied.
Les articles non mentionnés dans le **Parts No.** ne sont pas fournis.
Teile ohne **Parts No.** werden nicht geliefert.

Ref. No. 参照番号	Parts No. 部品番号	Description 部品名／規格	Remarks 備考
C33 -42	C71-1718-15	CERAMIC 180PF J	
C43 ,44	C52-1722-26	CERAMIC 0.0022UF K	
C45	C24-1710-57	ELECTRO 1UF 50WV	
-	E13-0216-05	PHONO JACK	
101 2B	E13-0432-05	PHONO JACK	
102 2B	E13-0618-05	PHONO JACK	
L1 ,2	L40-1511-43	INDUCTOR	
R41 ,42	R42-1247-95	FL-PROOF RD4.7 J 2E	
VR1	R06-5095-05	POTENTIOMETER	*
VR2	R06-5089-05	POTENTIOMETER	*
RL1	S51-2056-05	RELAY	
S1	S42-6014-05	PUSH SWITCH	*
S2	S40-2152-05	PUSH SWITCH	*
D1 ,2	V11-4100-30	WZ-197	
D3	V11-0271-05	1S2076	
IC1	V30-0344-40	NJM4560D-N	
Q1 -4	V09-0150-20	2SK170(BL)	
Q5	V03-2590-30	2SC2590(Q,R,S)	
Q6	V01-1110-30	2SA1110(Q,R,S)	
Q7 ,8	V09-0127-40	2SK105(H,J)	
TONE AMP (X11-1750-10)			
C3 ,4	C25-1710-57	LL-ELEC 1UF 50WV	
C5 ,6	C71-1710-02	CERAMIC 10PF D	
C7 ,8	C24-0822-77	ELECTRO 220UF 6.3WV	
C9 ,10	C71-1710-15	CERAMIC 100PF J	
C11 ,12	C71-1768-05	CERAMIC 68PF J	
C13 ,14	C26-1422-67	NP-ELEC 22UF 25WV	
C15 ,16	C46-1715-45	MYLAR 0.15UF J	
C17 ,18	C46-1768-25	MYLAR 0.0068UF J	
C19 -22	C25-1710-57	LL-ELEC 1UF 50WV	
C23 ,24	C46-1715-45	MYLAR 0.15UF J	
C25 ,26	C26-1447-67	NP-ELEC 47UF 25WV	
C27 ,28	C71-1710-02	CERAMIC 10PF D	
C29 ,30	C71-1747-05	CERAMIC 47PF J	
C41 ,42	C54-2710-39	CERAMIC 0.01UF P	
C43 ,44	C24-6510-87	ELECTRO 1000UF 35WV	
C45 ,46	C24-1433-77	ELECTRO 330UF 25WV	
C47	C24-1447-77	ELECTRO 470UF 25WV	
C48 -49	C24-1247-67	ELECTRO 47UF 16WV	
C50	C24-1233-67	ELECTRO 33UF 16WV	
C51	C24-1210-77	ELECTRO 100UF 16WV	
R61	R42-1247-05	FL-PROOF RD47 J 2E	
R62	R47-5433-15	FL-PROOF RS330 J 3A	
R63	R47-5439-15	FL-PROOF RS390 J 3A	
R64 ,65	R47-5533-15	FL-PROOF RS330 J 3D	
R66	R42-1247-95	FL-PROOF RD4.7 J 2E	
VR1	R06-5088-05	POTENTIOMETER	*
VR2 ,3	R06-3029-05	POTENTIOMETER	*
D1 -3	V11-0295-05	W06B	
D4 ,5	V11-0271-05	1S2076	
D6 ,7	V11-4104-90	BZ-182	
D8	V11-4104-80	WZ-125	
IC1	V30-0732-10	NJM2043D-D	
IC2	V30-0344-40	NJM4560D-N	
Q1	V03-2590-10	2SC2590(Q,R)	
Q2 -4	V03-2320-80	2SC2320(E,F,G)	
Q5	V03-2003-00	2SC2003	

E: Scandinavia & Europe H: Audio Club K: USA P: Canada
S: South Africa T: England U: PX (Far East, Hawaii)
UE: AAFES (Europe) X: Australia M: Other Areas

Note:

Component and circuitry are subject to modification to insure best operation under differing local conditions. This manual is based on, the U.S. (K) standard, and provides information on regional circuit modification through use of alternate schematic diagrams, and information on regional component variations through use of parts list.

A product of
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