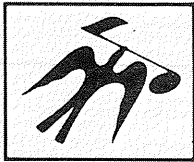




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please visit [www.hifiengine.com](http://www.hifiengine.com)

SERVICE MANUAL

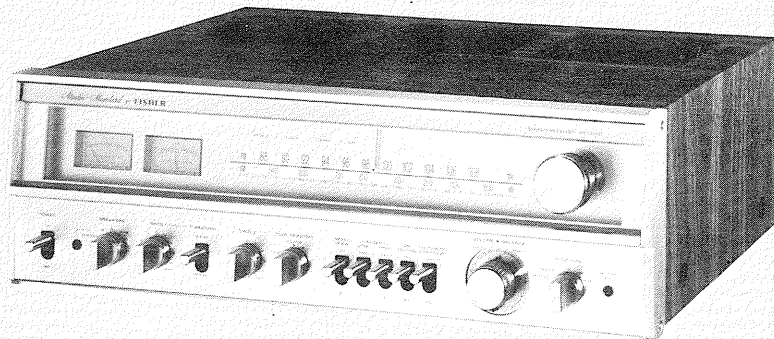


# FISHER

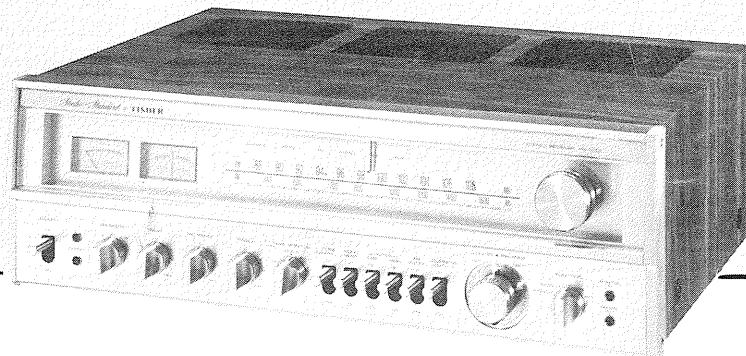
## RS-1056

## RS-1058

Stereo Receivers



RS-1056



RS-1058

*FIRST NAME IN HIGH FIDELITY*

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## DISASSEMBLY INSTRUCTIONS

### Removal Of Chassis From Cabinet

1. Remove 4 screws from left and right sides of cabinet.
2. Separate cabinet from chassis.
3. Remove 18 screws from bottom of cabinet. (Do Not Remove Leg From Bottom Of Cabinet).
4. Separate bottom of cabinet from chassis.

### Removal Of Front Panel Assembly

1. Remove all Knobs
2. Remove 4 screws from top of panel.
3. Remove 5 screws from bottom of Panel.
4. Remove nut from "Function", "Speaker" and "Tape monitor" switches located on Front Panel Assembly.
5. Separate Front Panel Assembly from chassis.

### Removal Of Meters

1. Remove One screw and Meter Cover.
2. Unsolder leads from meter terminals.
3. Grasp Meter firmly and pull back separating Meter from panel.

### Removal Of Slide Rail Pointer

1. Remove Metal Slide Pointer from Slide Rail Pointer.
2. Remove 2 screws from top of Slide Rail Pointer.

### Removal Of AM-FM Stereo Function Indicator Lamps

1. Grasp base of lamp with long-nosed Pliers and Carefully extract from grommet holder.
2. Unsolder AM-FM Indicator Lamp from P.C. Board.

### Removal And Replacement Of Dial Lamps

1. Remove Dial P.C. Board from Shelter Light with two flaps straight.
2. Grasp Dial Lamp and extract from lamp grommet holder.

### Removal Of Front End

1. Unscrew 2 screws from Drum. (Do Not Remove Dial String From Drum).
2. Remove 4 screws releasing clip holding Front End.
3. Remove 4 screws from bottom of Front End.

Testing and troubleshooting any of the P.C. boards do not require removal since all component parts are top board mounted. For underneath board inspection purposes or when a defective component is to be unsoldered and replaced, the P.C. board can be sufficiently turned over by only removing the hold down hardware. Where it necessitates complete removal of any individual board then proceed as follows.

### Removal Of AM-FM RF/IF/MPX Amp P.C. Board

1. Unsolder wire wraps from terminals.
2. Remove 4 hold down screws.

### Removal Of Power Amp P.C. Board

1. Unsolder wire wraps from terminals.
2. Remove 5 hold down screws.

### Removal Of Power Supply P.C. Board

1. Unsolder wire wraps from terminals.
2. Remove 4 hold down screws.

### Removal Of EQ-Amp P.C. Board

1. Unsolder wire wraps from terminals.
2. Remove 5 hold down screws.

### Removal Of Speaker Protection P.C. Board

1. Unsolder wire wraps from terminals.
2. Remove 5 hold down screws.

### Removal Of Tone Control Amp P.C. Board

1. Unsolder wire wraps from terminals.
2. Remove 6 screws from 6 Levers switch.
3. Remove 2 nuts from variable resistors. (RS-1056)  
Remove 3 nuts from variable resistors. (RS-1058)

### Removal Of Power Transistor (Q01~Q04)

1. Remove Cover 4 screws from top and bottom of Plate Heat Sink.
2. Remove 2 screws holding Power Transistor.

## RECOMMENDED TEST EQUIPMENT

The following test equipment is recommended to completely test and align the Receiver.

- Line Voltage Isolation Transformer.
- AC DC Multimeter.
- Accurately Calibrated AC Voltmeter.
- Oscilloscope (Flat to 100 KHz Minimum)
- Low-Distortion Audio Sine-Wave Generator
- Harmonic Distortion Analyzer
- Two (2) Load Resistors, 8-ohms, 250 Watts (Minimum Rating)
- Low-Distortion AM-FM Signal Generator
- 10.7 MHz Sweep Generator
- Multiplex Generator
- 455 KHz Sweep Generator

## HARMONIC DISTORTION TEST

CAUTION: Limit the following tests to no more than ten minutes each. Use 8-ohm resistors with a minimum power rating of 250 watts when connecting a load across the SPEAKERS terminals.

### CONTROL SETTINGS:

Unplug the AC power cord and set the front panel controls as follows;

BASS, MID, TREBLE, and BALANCE controls to center positions

POWER switch to OFF

SPEAKERS switch to PHONES

FUNCTION switch to AUX

HIGH & LOW, FILTER, MONO MODE, LOUDNESS CONTROL and TAPE MONITOR switch to OFF and SOURCE

VOLUME control to MINIMUM position

LEFT CHANNEL DRIVEN

### ONE CHANNEL DRIVEN:

- 1) Connect a low distortion audio generator to LEFT AUX IN jack. Set generator frequency to 1 KHz and output to minimum.
- 2) Connect an 8-ohm load resistor between SPEAKERS MAIN LEFT and COM terminals. Connect a Harmonic Distortion analyzer and an AC VTVM in parallel across the 8-ohm load.
- 3) Connect the AC power cord and set SPEAKERS switch to MAIN. Turn VOLUME control to MAX.
- 4) Increase generator output for  
RS-1056 68W RMS (23.3V across the 8-ohm load)  
RS-1058 90W RMS (26.8V across the 8-ohm load)  
Harmonic Distortion Analyzer should measure 0.1 % distortion or less.
- 5) Repeat steps 1 through 4 for RIGHT CHANNEL.

## BOTH CHANNELS DRIVEN

Connect 8-ohm load resistors across LEFT and RIGHT MAIN SPEAKERS terminals. Push down "MONO" switch. Adjust generator output and "BALANCE" control for RS-1056: 68W/RS-1058: 90W at Left and Right Channels (RS-1056: 23.3V /RS-1058: 26.8V) across the 8-ohm loads. Harmonic Distortion Analyzer should measure 0.1% distortion or less at each channel.

## ADJUSTMENT OF THE POWER AMP. P.C. BOARD

### BEFORE ADJUSTMENT

1. Disconnect the PRE OUT/MAIN IN connector.
2. After the power switch is turned ON, allow a few minutes marking adjustment, to be sure of the most stable operation.
3. Connect dummy load resistors (8 ohm) to the speaker terminals.
4. Use DC V.T.V.M. or Circuit Tester (input impedance: More than 50k ohm/V)

### (A) IDLING CURRENT ADJUSTMENT

Adjust VR01 (VR02) for an idling current of 30mA, Measure the voltage at both sides of R65 (R66) resistor (0.47 ohm) and Adjust VR01 (VR02) to indicate  $14\text{mV} \pm 2\text{mV}$ .

Note: Polarity of Emitter of Q01 (Q02) is (+) Mid-Point is (-).


- (B) a. Turn the semi-fixed variable resistor slowly during adjustment.
- b. Be careful of the polarity of each measurement point.

**Nominal Specifications For Information Only.**

<b>RECEIVERS</b>		<b>RS-1056</b>	<b>RS-1058</b>
<b>POWER AMPLIFIER SECTION</b>			
Continuous RMS sine wave power per channel within stated bandwidth at no more than stated distortion and with an 8 ohm load.		68 W x 2	90 W x 2
Power Bandwidth		20Hz/20kHz	20Hz/20kHz
Total Harmonic Distortion		0.1 %	0.1 %
<b>PREAMPLIFIER SECTION</b>			
Input Sensitivity and Impedance At rated output, 8-ohms at 1kHz Phono (1 and 2)		2mV/ 50k ohm	2mV/ 50k ohm
Phono (max input capability)		180mV	180mV
Auxiliary		150mV/100k ohm	150mV/100k ohm
Tape Monitor (1 and 2)		150mV/100k ohm	150mV/100k ohm
Hum & Noise (below rated output) Phono (1 and 2)		76 dB	76 dB
Auxiliary		90 dB	90 dB
Tape Monitor (1 and 2)		90 dB	90 dB
Frequency Response Phono (RIAA EQUALIZED $\pm 2$ dB)		30Hz - 15kHz	30Hz - 15kHz
Auxiliary input $\pm 2$ dB		20Hz - 20kHz	20Hz - 20kHz
Tape Monitor input $\pm 2$ dB		20Hz - 20kHz	20Hz - 20kHz
Bass Control Range (at 100Hz)		$\pm 10$ dB	$\pm 10$ dB
Treble Control Range (at 10kHz)		$\pm 10$ dB	$\pm 10$ dB
Mid Range (at 1.5kHz)		—	$\pm 10$ dB
Loudness Contour (at 30 dB volume attenuation)		+8 dB at 100Hz +4 dB at 10kHz	+8 dB at 100Hz +4 dB at 10kHz
High Filter		-6 dB (5kHz)	-6 dB (5kHz)
Low Filter		-6 dB (60Hz)	-6 dB (60Hz)
Separation (Stereo) @ 1kHz		40 dB	40 dB
<b>POWER SECTION INPUT</b>		150mV/100k ohm	150mV/100k ohm
<b>FM TUNER SECTION</b>			
Usable Sensitivity	Mono	1.7 $\mu$ V / 9.8 dBf	1.7 $\mu$ V / 9.8 dBf
	Stereo	4.3 $\mu$ V / 17.9 dBf	4.3 $\mu$ V / 17.9 dBf
50 dB Quieting Sensitivity	Mono	2.5 $\mu$ V / 13.2 dBf	2.5 $\mu$ V / 13.2 dBf
	Stereo	34 $\mu$ V / 35.9 dBf	34 $\mu$ V / 35.9 dBf
Capture Ratio		0.8 dB	0.8 dB
Alt Channel Selectivity +400kHz		75 dB	75 dB
Image Response Rejection		80 dB	80 dB
Spurious Response Rejection		100 dB	100 dB
AM Rejection		65 dB	65 dB
Signal-to-Noise Ratio (Mono & Stereo)		75/ 70 dB	75/70 dB
Total Harm. Distortion (Mono & Stereo) 6kHz		0.15/ 0.25 %	0.15/ 0.25 %
50 dB Quieting Sensitivity THD	Mono	0.3 %	0.3 %
	Stereo	0.4 %	0.4 %
Stereo Separation (1 kHz/10 kHz)		45/36 dB	45/36 dB
Sub-Carrier Suppression (19/38 kHz)		60/70 dB	60/70 dB
<b>AM TUNER SECTION</b>			
Sensitivity		300 $\mu$ V/m	300 $\mu$ V/m
Selectivity		43 dB	43 dB
Signal-to-Noise Ratio		55 dB	55 dB
Image Frequency Rejection		56 dB	56 dB
IF Rejection		70 dB	70 dB
<b>GENERAL SECTION</b>			
Power Requirements (50/60 Hz)		120V AC $\pm 10$ %	120V AC $\pm 10$ %
Power Consumption		400W /498VA	500W /612VA
AC Outlets		2	2
Dimensions H x W x D (Inches)		6-13/16" x 20-3/4" x 14-1/4"	6-13/16" x 20-3/4" x 14-1/4"
Weight (Lbs.)		31.3	32.4



# AM-FM MULTIPLEX ALIGNMENT

## AM ALIGNMENT

Step	Adjusting circuit	Connection		SG. frequency	Position of tuning dial	Adjustment	V.T.V.M. Oscilloscope
		Input	Output				
1	IF	Connect sweep generator to VC4.	Connect oscilloscope to test point Pin No. 8	455 KHz	Near max. capacity of VC at position with no signal.	AM 1st 9-21310 AM DET 9-21291	 455 KHz
2	RF	Connect standard loop antenna to output terminal of SG. Place receiver 2 feet from loop antenna	Connect V.T.V.M. to Pin No. 8	600 KHz (400Hz, 30 % modulation)	600 KHz	AM ANT 9-25040 AM OSC 9-20880	Max.
3				1400 KHz (400Hz, 30 % modulation)	1400 KHz	TC 5 TC 6	Max.
4	Repeat adjustments.						

1. Variable capacitor completely closed.
2. Set the dial pointer to very left line dial scale.
3. Connect sweep generator, SG, V.T.V.M. and oscilloscope.
4. Function switch to "AM."
5. Use a screwdriver with plastic grip for all adjustments.

## FM ALIGNMENT

Step	Adjusting circuit	Connection		SG.frequency	Position of tuning dial	Adjustment	V.T.V.M. Oscilloscope
		Input	Output				
1	IF	Connect sweep generator to test point VC3 through 0.01 $\mu$ F.	Connect oscilloscope to test point TP 7 IC 02 Pin No. 13	10.7 MHz (none modulation)	Near max.capacity of VC. at position with no signal.	IFT In FRONT END	 10.7MHz
2	Ratio Det.		Connect oscilloscope to test point TP 1			FM QUADRA TURE COIL. 9-21320	
3	RF	Connect FM SG. to FM ANT terminals.	Connect V.T.V.M. to speaker terminal.	90 MHz (400 Hz, 30 % modulation)	90 MHz	LA LR	Max.
4				106 MHz (400 Hz, 30 % modulation)	106 MHz	TCA TCR	Max.
5	Repeat adjustments.						

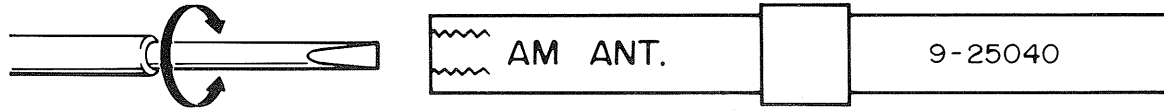
1. Variable capacitor completely closed.
2. Set the dial pointer to very left line of dial scale.
3. Connect sweep generator, FM SG, V.T.V.M. and oscilloscope. FM ANT input impedance is 300 ohm.
4. Function switch to "FM."
5. Use a screwdriver with plastic grip for all adjustments.

## FM MPX ALIGNMENT

Step	Adjusting circuit	Connection		Position of tuning dial	Adjustment	
		Input	Output			
1	PLL IC FO (19 KHz) Adjustment	None	Connect Frequency counter or synchroscope to TP 2	Near max. capacity of VC. at position with no signal.	Adjust VR 03(4.7K-B) so that 19 KHz may be indicated on the frequency counter or synchroscope.	
2	FM STEREO Signal Separation	Connect FM stereo SG to FM ANT terminals. 19 KHz signal ON. Main channel, sub channel signal ON. Add 1000 Hz signal from L Ch.	Connect V.T.V.M. to output terminal (R channel).		VR 02 (1K-B)	V.T.V.M. Min.
		Connect FM stereo SG to FM ANT terminals. 19 KHz signal ON. Main channel, sub channel signal ON. Add 1000 Hz signal from R Ch.	Connect V.T.V.M. to output terminal (L channel)			
3	Repeat steps 1, 2, Set at position with max. channel separation.					

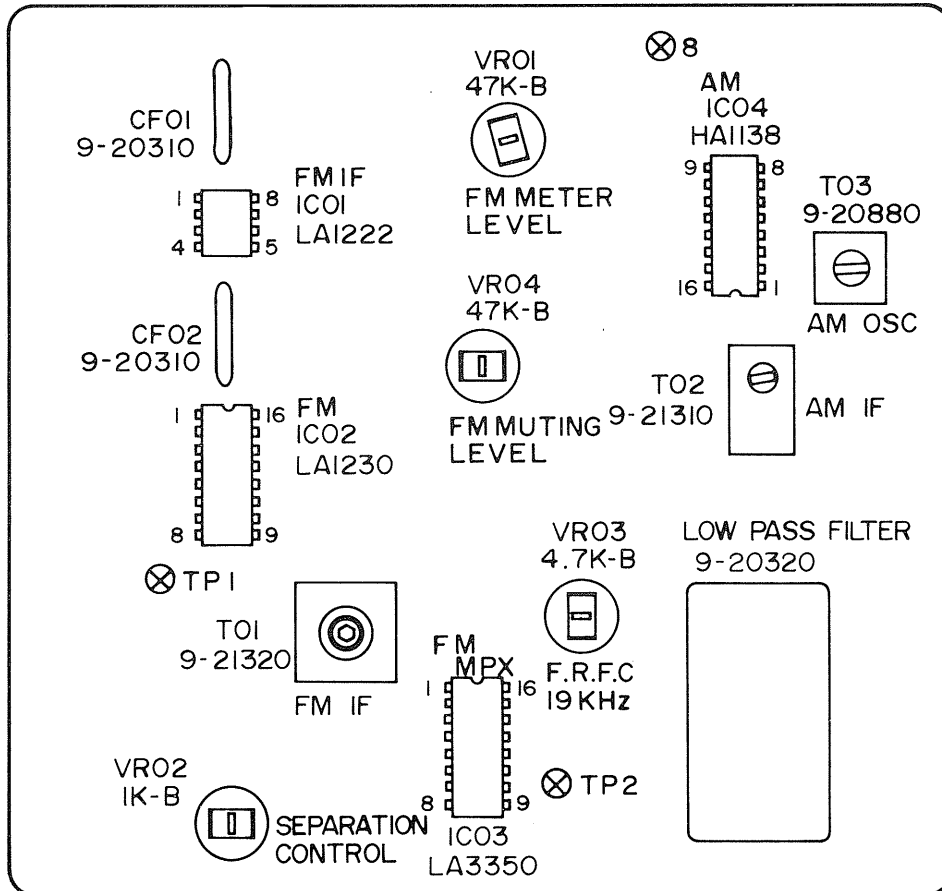
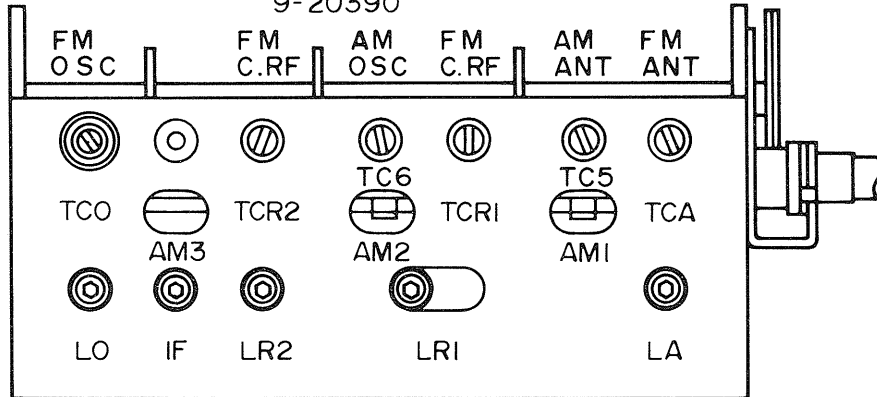
1. Variable capacitor completely closed.
2. Connect FM stereo SG and V.T.V.M.
3. Function switch to "FM"
4. Use a screwdriver with plastic grip for all adjustments.

# AM-FM RF/IF MPX BOARD LAYOUT



## FRONT END

9-20390

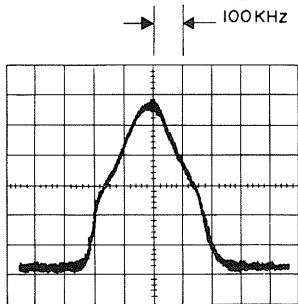




# ALIGNMENT WAVE FORMS

WITH OSCILLOSCOPE TIME BASE SETTINGS

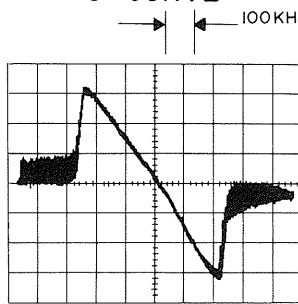
### FM IF CURVE



Vertical Sensitivity: 0.5V/cm.  
Horizontal Sweep: 100 usec./cm.

IF FREQ.  
FM IF  
ALIGNMENT

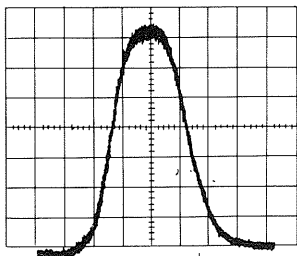
### S-CURVE



Vertical Sensitivity: 0.5V/cm.  
Horizontal Sweep: 100 usec./cm.

FM DETECTOR  
ALIGNMENT

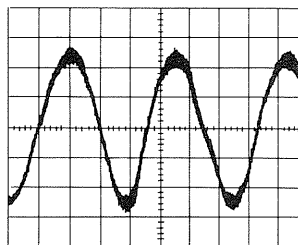
### AM IF CURVE



Vertical Sensitivity: 0.5V/cm.  
Horizontal Sweep: 100 usec./cm.

AM IF  
ALIGNMENT

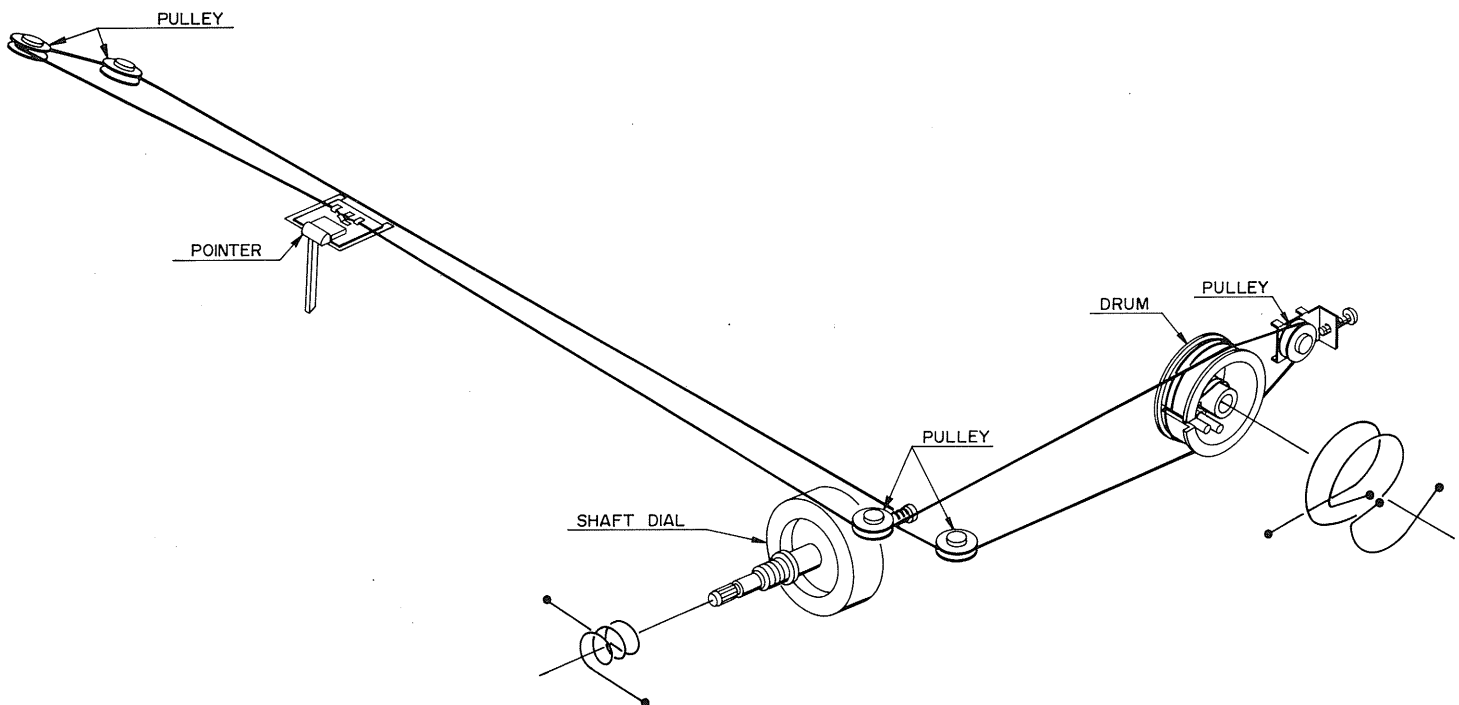
### SINE WAVE



Vertical Sensitivity: 0.5V/cm.  
Horizontal Sweep: 500 usec./cm.

SYMMETRICAL  
TUNING

## DIAL CORD STRINGING

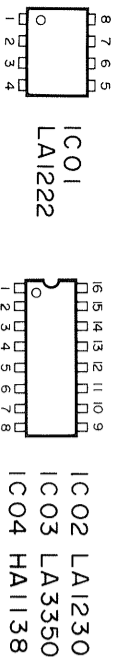


# AM-FM RF/IF MPX P.C. BOARD

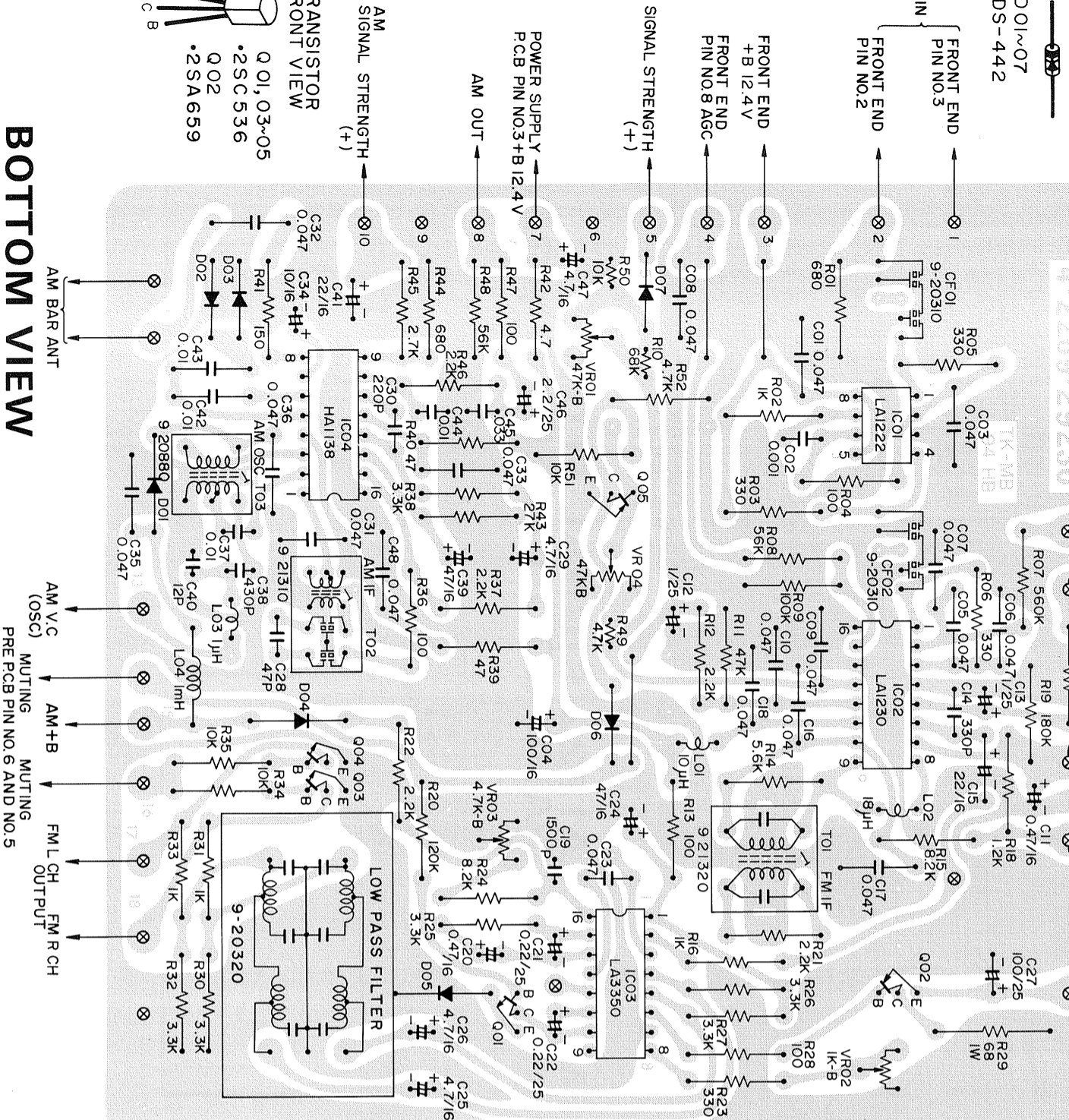
## PARTS LIST

RS-1056  
RS-1058

### IC TOP VIEW



### DIODE FRONT VIEW



### BOTTOM VIEW

PIN NUMBERS VOLTAGES

IC01 LA1222	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	16
	1.39V	1.39V	11.5V	12.4V	1.35V	9.7V	12.4V									
IC02 LA1230	2.85V	2.85V	0V	0V	5.92V	5.73V	5.75V	5.75V	12.1V	3.38V	0.54V	0V	5.13V	0V		
IC03 LA3350	10.7V	2.74V	4.71V	8.08V	8.11V	11.6V	0V	0.34V	0.56V	2.08V	2.25V	1.96V	2.09V	2.08V	2.85V	
IC04 HA1138	11.7V	2.79V	11.7V	11.7V	4.9V	9.86V	2.0V	0.88V	0.06V	3.8V	4.3V	11.8V	2.76V	2.77V	2.72V	0V

### AM FM RF/IF MPX PCB Assy 1310 4001 72700

Ref. No.	Part Number	Description	Ref. No.	Parts No.	Description
L01	4 2539 20370	Coil 10 $\mu$ H $\pm 10\%$	D01,02	2055 9040 44210	Diode DS-442
L02	4 2539 20380	Coil 18 $\mu$ H $\pm 5\%$	03,04		
L03	4 2539 20310	Coil 1 $\mu$ H $\pm 5\%$	05,06		
L04	4 2539 20170	Choke Coil 1 mH	07		
T01	4 2569 21320	IF Trans FM	IC01	2065 0131 22210	IC LA1222
T02	4 2569 21310	IF Trans AM	IC02	2065 0151 23010	IC LA 1230
T03	4 2589 20880	OSC Coil AM	IC03	2065 0743 35019	IC LA-3350SS
VR01	4 2229 25100	Semi-Fixed VR 47K-B	IC04	IKK-HA1138	IC HA1138
VR02	4 2229 22910	VR 1K-B	C01	2035 5100 53640	TR 25C536 D or E
VR03	4 2229 23880	VR 4.7K-B	C02	2035 6800 65940	TR 25A659 D or E
VR04	4 2229 25100	Semi-Fixed VR 47K-B	C03,04	2035 5100 53640	TR 25C536 D or E
CF01,02	4 2279 20310	Ceramic Filter			

### CAPACITORS

C01	C1HYSZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%
C02	C1HYSZ102A	Ceramic 0.001 $\mu$ F 50V +80,-20%
C03	C1HYSZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%
C04	C1CRB-107A	Electrolytic 100 $\mu$ F 16V
C05,06	C1HYDZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%
07,08		
09,10		
C11	C1CUEX474A	Alicon 0.47 $\mu$ F 16V +40,-20%
C12,13	C1EUEM105A	Alicon 1 $\mu$ F 25V $\pm 20\%$
C14	C1CHDK331SL	Ceramic 330pF 50V $\pm 10\%$
C15	C1CTR226A	Tantalum 22 $\mu$ F 16V $\pm 20\%$
C16,17	C1HYDZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%
C18		
C19	C1HSEJ152A	Styrol 1500pF 50V $\pm 5\%$
C20	C1CUEX474A	Alicon 0.47 $\mu$ F 16V +40,-20%
C21,22	C1EUEM224A	Alicon 0.22 $\mu$ F 25V $\pm 20\%$
C23	C1HFRM473A	Mylar 0.047 $\mu$ F 50V $\pm 20\%$
C24	C1CRB-476A	Electrolytic 47 $\mu$ F 16V
C25,26	C1CRB-475A	Alicon 4.7 $\mu$ F 16V +40,-20%
C27	C1ERB-107A	Electrolytic 100 $\mu$ F 25V
C28	C1HCSK470SL	Ceramic 47pF 50V $\pm 10\%$
C29	C1CRB-475A	Electrolytic 4.7 $\mu$ F 16V
C30	C1HCDK221SL	Ceramic 220pF 50V $\pm 10\%$
C31,32	C1HYDZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%
33		
C34	C1CRB-106A	Electrolytic 10 $\mu$ F 16V
C35,36	C1HYDZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%
C37	C1HFRM103A	Mylar 0.01 $\mu$ F 50V $\pm 20\%$
C38	C1HSEJ431A	Styrol 430pF 50V $\pm 5\%$
C39	C1CRB-476A	Electrolytic 47 $\mu$ F 16V
C40	C1HCDJ120SL	Ceramic 12pF 50V
C41	C1CRB-226A	Electrolytic 22 $\mu$ F 16V
C42,43	C1HYDZ103A	Ceramic 0.01 $\mu$ F 50V +80,-20%
C44	C1HFRM103A	Mylar 0.01 $\mu$ F 50V $\pm 20\%$
C45	C1HFRM333A	Mylar 0.033 $\mu$ F 50V $\pm 20\%$
C46	C1EUEM225A	Alicon 2.2 $\mu$ F 25V $\pm 20\%$
C47	C1CUEX475A	Alicon 4.7 $\mu$ F 16V +40,-20%
C48	C1HYDZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%

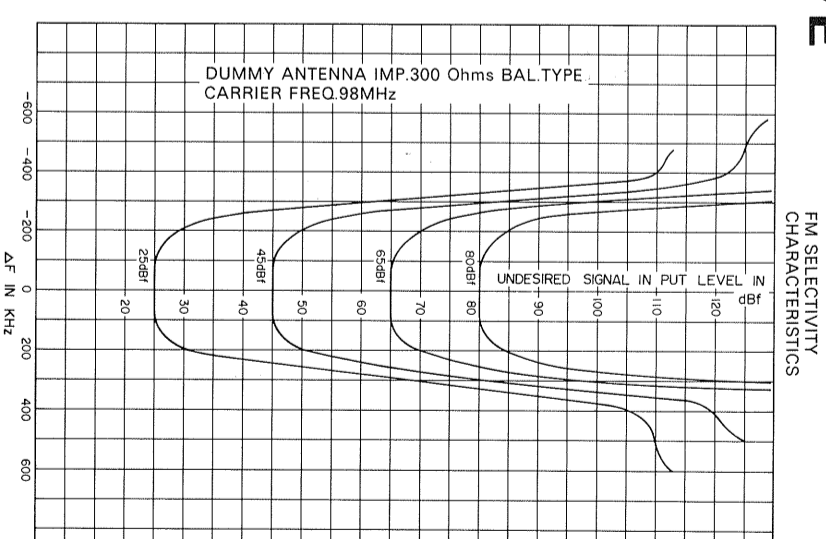
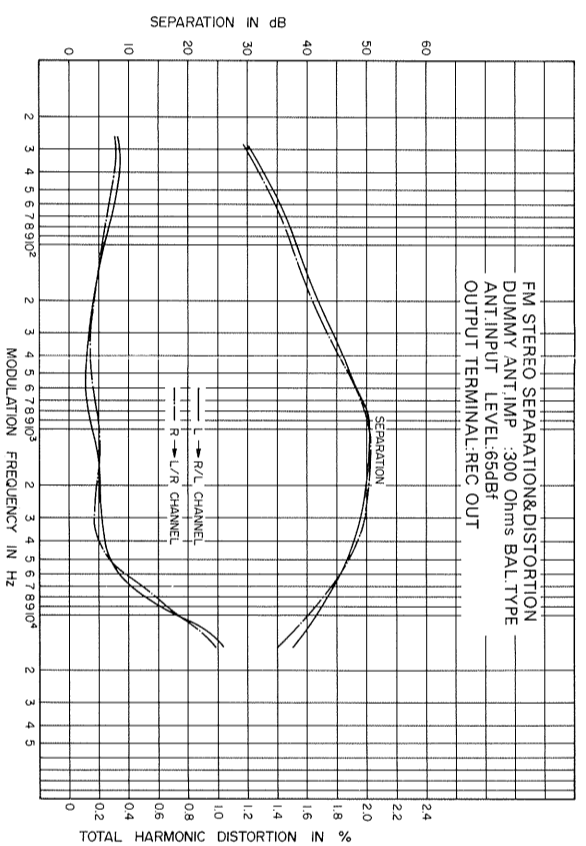
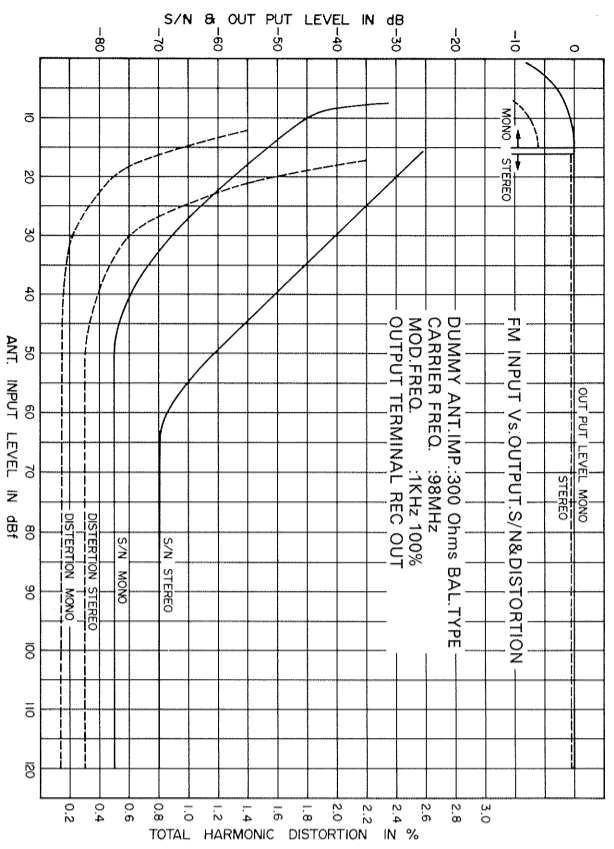
### TRANSISTOR DC VOLTAGES

SYMBOL NO.	DEVICE	B	C	E
001	25C536	1.09V	0.56V	0.56V
002	25A659	5.33V	5.36V	6.12V
003,04	25C536	0V	0V	0V
005	25C536	0.03V	3.78V	0V

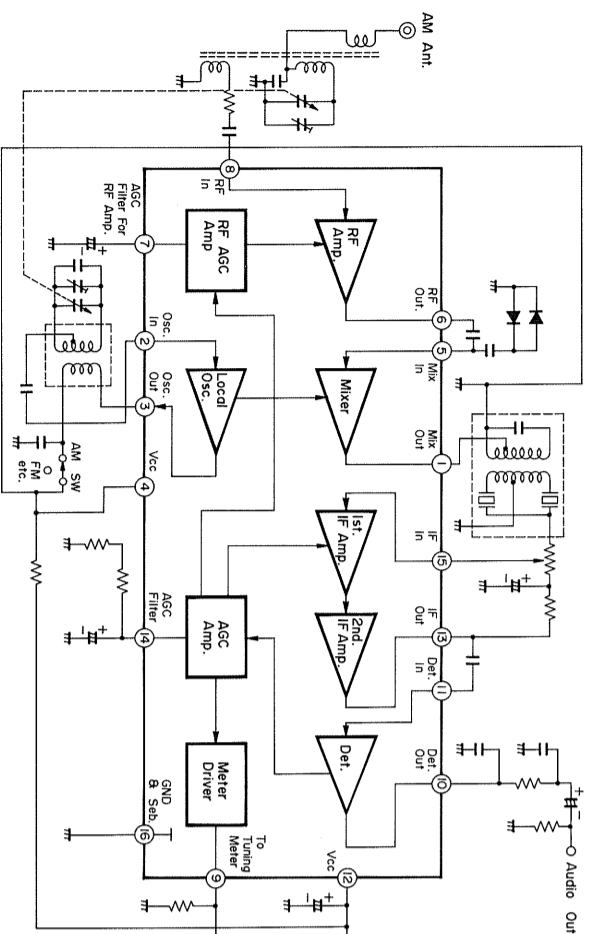
### RESISTORS

R01	R2EDSJ681A	Carbon 680	1/4W $\pm 5\%$
R02	R2EDSJ102A	Carbon 1k	1/4W $\pm 5\%$
R03	R2EDSJ331A	Carbon 330	1/4W $\pm 5\%$
R04	R2EDSJ101A	Carbon 100	1/4W $\pm 5\%$
R05,06	R2EDSJ331A	Carbon 330	1/4W $\pm 5\%$
R07	R2EDSJ564A	Carbon 560k	1/4W $\pm 5\%$
R08	R2EDSJ563A	Carbon 56k	1/4W $\pm 5\%$
R09	R2EDSJ104A	Carbon 100k	1/4W $\pm 5\%$
R10	R2EDJ0683A	Carbon 68k	1/4W $\pm 5\%$
R11	R2EDSJ473A	Carbon 47k	1/4W $\pm 5\%$
R12	R2EDSJ222A	Carbon 2.2k	1/4W $\pm 5\%$
R13	R2EDSJ101A	Carbon 100	1/4W $\pm 5\%$
R14	R2EDSJ562A	Carbon 5.6k	1/4W $\pm 5\%$
R15	R2EDSJ822A	Carbon 8.2k	1/4W $\pm 5\%$
R16	R2EDSJ102A	Carbon 1k	1/4W $\pm 5\%$
R17	R2EDSJ123A	Carbon 12k	1/4W $\pm 5\%$
R18	R2EDSJ122A	Carbon 1.2k	1/4W $\pm 5\%$
R19	R2EDSJ184A	Carbon 180k	1/4W $\pm 5\%$
R20	R2EDSJ124A	Carbon 120k	1/4W $\pm 5\%$
R21,22	R2EDSJ222A	Carbon 2.2k	1/4W $\pm 5\%$
R23	R2EDSJ331A	Carbon 330	1/4W $\pm 5\%$
R24	R2EDSJ822A	Carbon 8.2k	1/4W $\pm 5\%$
R25,26	R2EDSJ332A	Carbon 3.3k	1/4W $\pm 5\%$
27			
R28	R2EDSJ101A	Carbon 100	1/4W $\pm 5\%$
R29	R3AXBJ680A	Oxide Metal Film 68 1W	$\pm 5\%$
R30	R2EDSJ332A	Carbon 3.3k	1/4W $\pm 5\%$
R31	R2EDSJ102A	Carbon 1k	1/4W $\pm 5\%$
R32	R2EDSJ332A	Carbon 3.3k	1/4W $\pm 5\%$
R33	R2EDSJ102A	Carbon 1k	1/4W $\pm 5\%$
R34,35	R2EDSJ103A	Carbon 10k	1/4W $\pm 5\%$
R36	R2EDSJ101A	Carbon 100	1/4W $\pm 5\%$
R37	R2EDSJ222A	Carbon 2.2k	1/4W $\pm 5\%$
R38	R2EDSJ332A	Carbon 3.3k	1/4W $\pm 5\%$
R39,40	R2EDSJ470A	Carbon 47	1/4W $\pm 5\%$
R41	R2EDSJ151A	Carbon 150	1/4W $\pm 5\%$
R42	R2EDSJ487A	Carbon 4.7	1/4W $\pm 5\%$
R43	R2EDSJ273A	Carbon 27k	1/4W $\pm 5\%$
R44	R2EDSJ681A	Carbon 680	1/4W $\pm 5\%$
R45	R2EDSJ272A	Carbon 2.7k	1/4W $\pm 5\%$
R46	R2EDSJ222A	Carbon 2.2k	1/4W $\pm 5\%$
R47	R2EDSJ101A	Carbon 100	1/4W $\pm 5\%$
R48	R2EDSJ563A	Carbon 56k	1/4W $\pm 5\%$
R49	R2EDJ472A	Carbon 4.7k	1/4W $\pm 5\%$
R50	R2EDJ103A	Carbon 10k	1/4W $\pm 5\%$
R51	R2EDSJ103A	Carbon 10k	1/4W $\pm 5\%$
R52	R2EDSJ472A	Carbon 4.7k	1/4W $\pm 5\%$

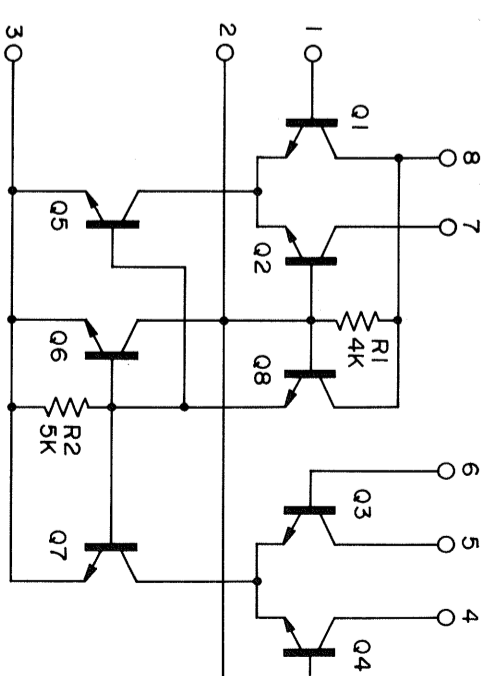
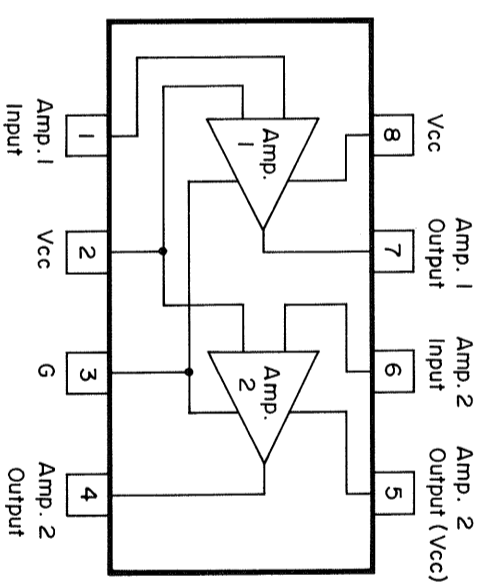
# FM TUNER SECTION CHARACTERISTIC CURVE



# AM RF IF IC HA1138 SIGNAL FLOW



# FM IF IC LA1222 SIGNAL FLOW AND EQUIVALENT DIAGRAM



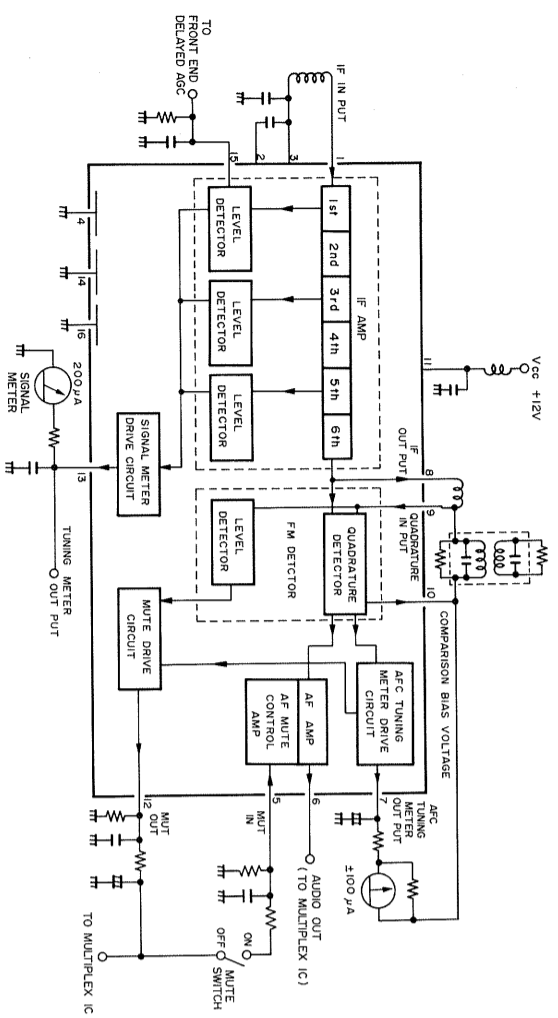
Signal enters R.F. AMP of I.C. where it is amplified. The converter section consists of a mixer and a local oscillator. The output of the mixer stage contains two frequency components.

The 455 KHz component signal is then fed to the I.F. amplifier. The tuned Frequency of the I.F. filter is 455 KHz. When the I.F. signal appears at the low pass filter, the 455-KHz carrier component is then locked, allowing only its audio component to pass.

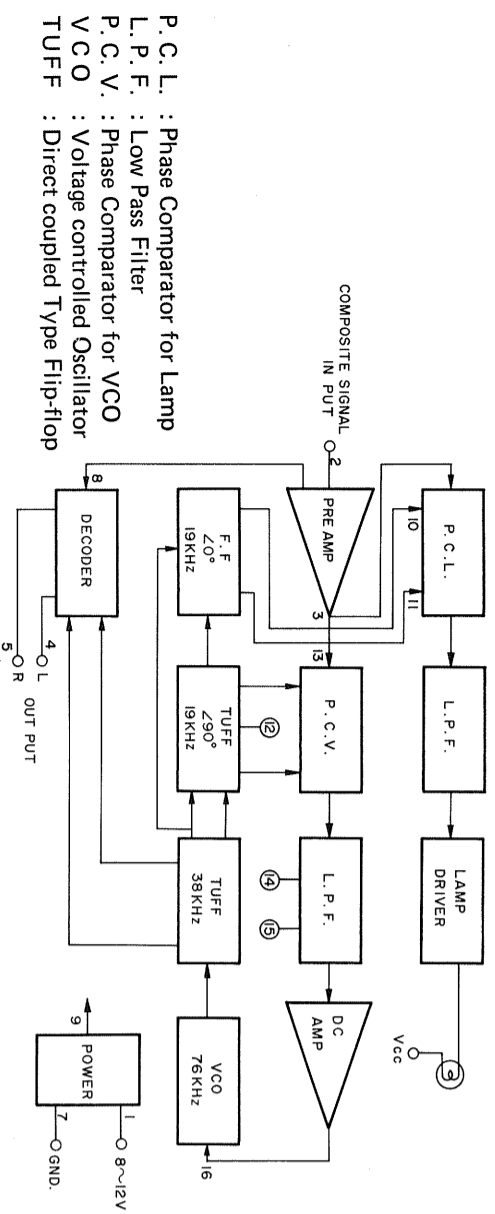
The circuit contains two steps of an independent differential amplification circuit, although the LA1222 is rated to operate on 12-volt power, it can also be used at low voltage, it also permits desired current limitation through insertion of a resistor between pins (2) and (8).

The limiting action by this circuit has current-limiting type limiter characteristics. The advantages that the current-limiting type limiter are: It improves capture ratio against input variation, it does not deviate center frequency, etc...

# FM IF IC LA1230 SIGNAL FLOW



# FM MPX IC LA3350 SIGNAL FLOW



**P. C. L. :** Phase Comparator for Lamp  
**L. P. F. :** Low Pass Filter  
**P. C. V. :** Phase Comparator for VCO  
**VCO :** Voltage controlled Oscillator  
**TUFF :** Direct coupled Type Flip-flop

The function of LA3350 is divided into two sections; the PLL section that reproduces the 38 KHz subcarrier, and the decoder section that switches the composite signal. The phase-duty cycle stability of the switching signal reproduced by the PLL determines the separation and the distortion factor of the demodulated signal. The phase comparator detects the phase difference between the VCO oscillator signal and the pilot signal. The detected output is in turn used as the control signal for the VCO.

Since higher harmonics are contained in this phase difference signal, it is necessary that a loop filter be used to eliminate these harmonics. The resulting DC component is applied to the VCO as the control signal. The characteristics of the loop filter practically determines the characteristics of the PLL. Stability of the signal synchronized to the input cannot be obtained unless the VCO itself is stable.

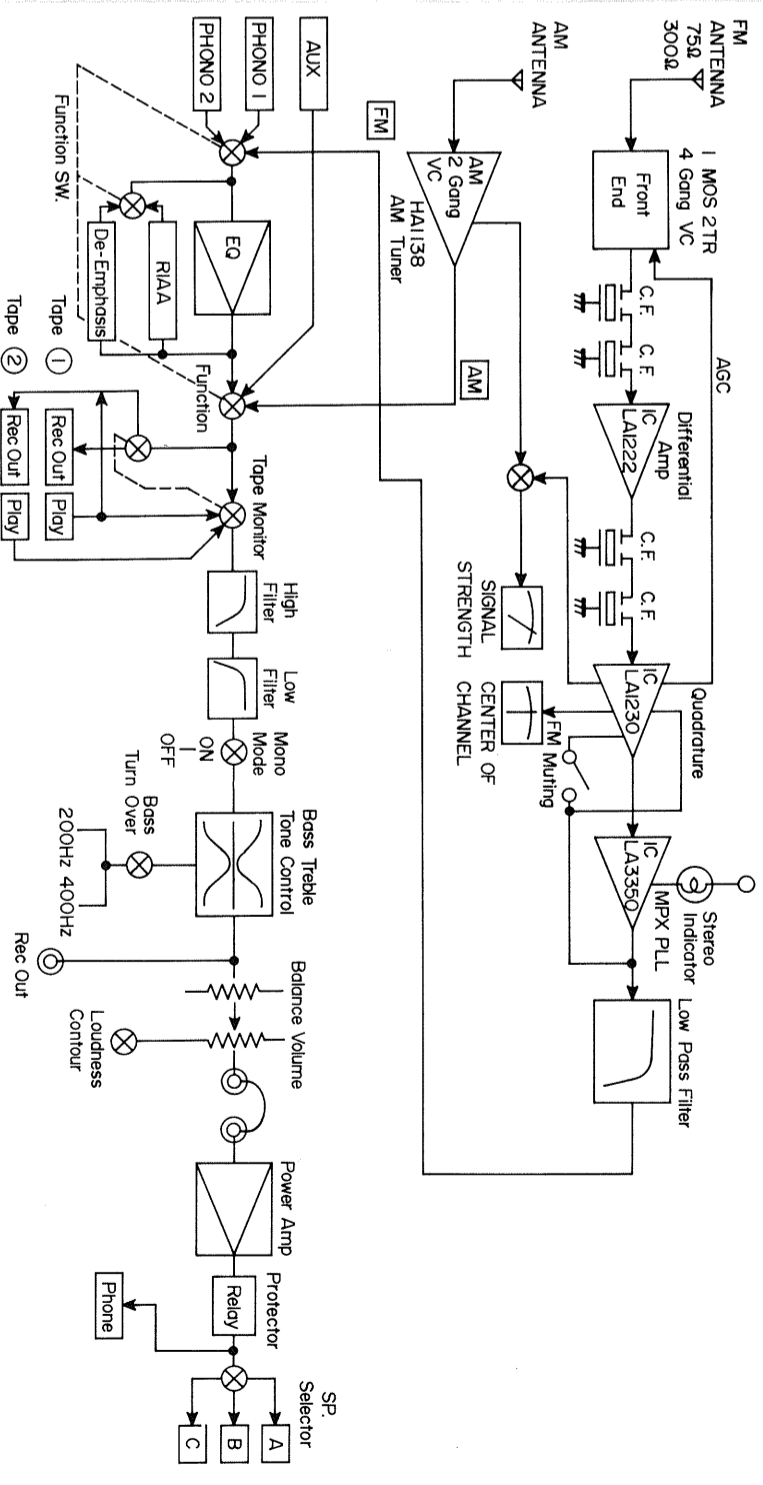
Here, only the demodulator circuit is essential as the FM stereo multiplex demodulator. The other components are the PLL as the 19 KHz selective circuit, and the stereo broadcast indicator circuit. The functions of these components are briefly described below.

The voltage controlled oscillator generates a saw-tooth wave of 76 KHz, and is frequency-controlled by the output from the DC amplifier. The frequency of the DC amplifier output is reduced to half, or 38 KHz, by means of a direct-coupled flip-flop circuit FF-1. This 38 KHz signal is applied to the demodulator circuit and demodulates the stereo composite signal. The FF-1 output is again reduced to 19 KHz by another direct-coupled flip-flop circuit FF-2.

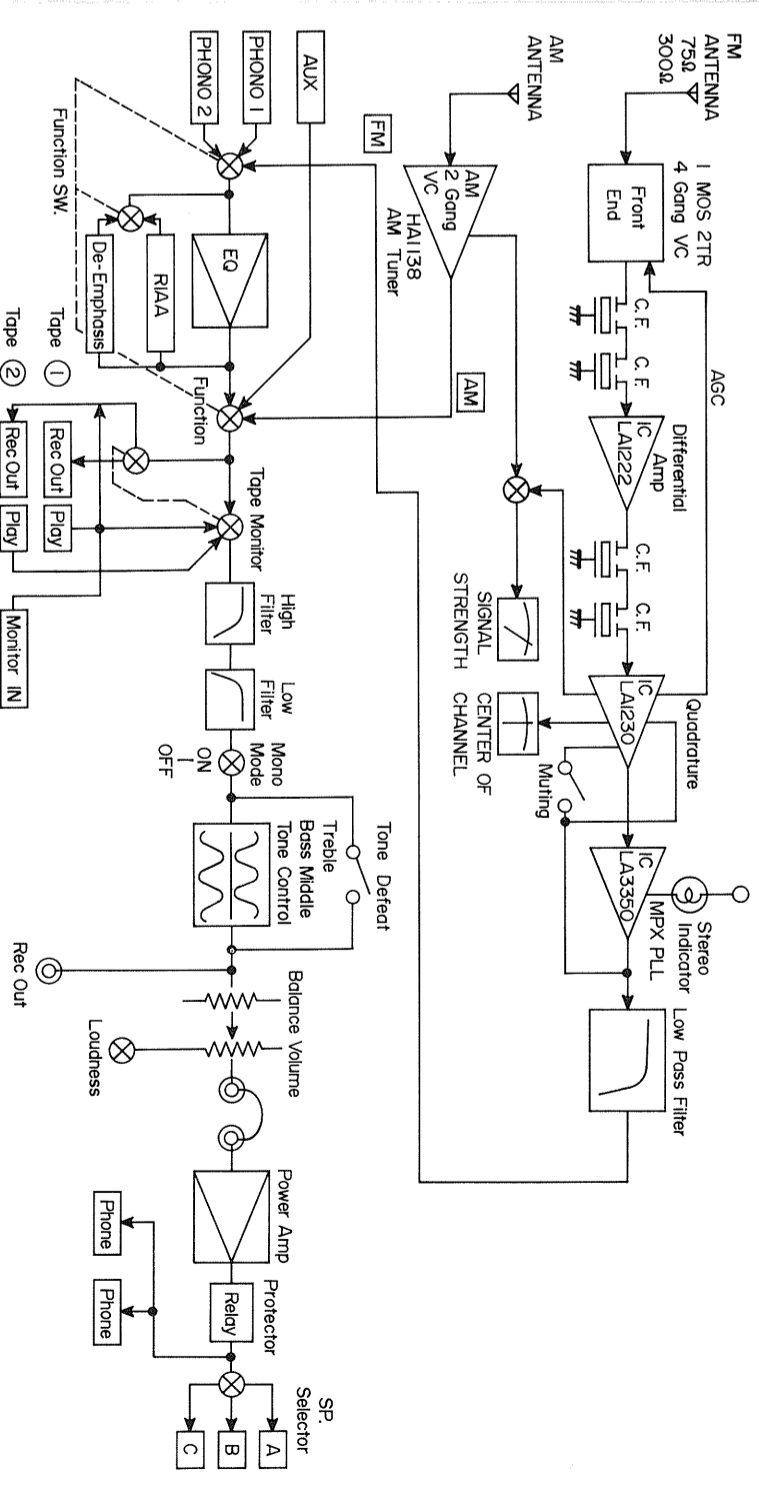
This FF-2 output is then applied to a phase comparator, PC-1, and its phase is compared with that of the pilot signal contained in the input signal. The output from the FF-3 is 19 KHz and 90 degrees lagging in phase behind that of the FF-2 output. It is then applied to another phase comparator, PC-2, and fed to the stereo broadcast indicator circuit to activate the pilot lamp.

# RS-1056

# BLOCK DIAGRAM

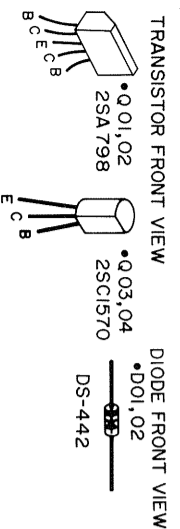
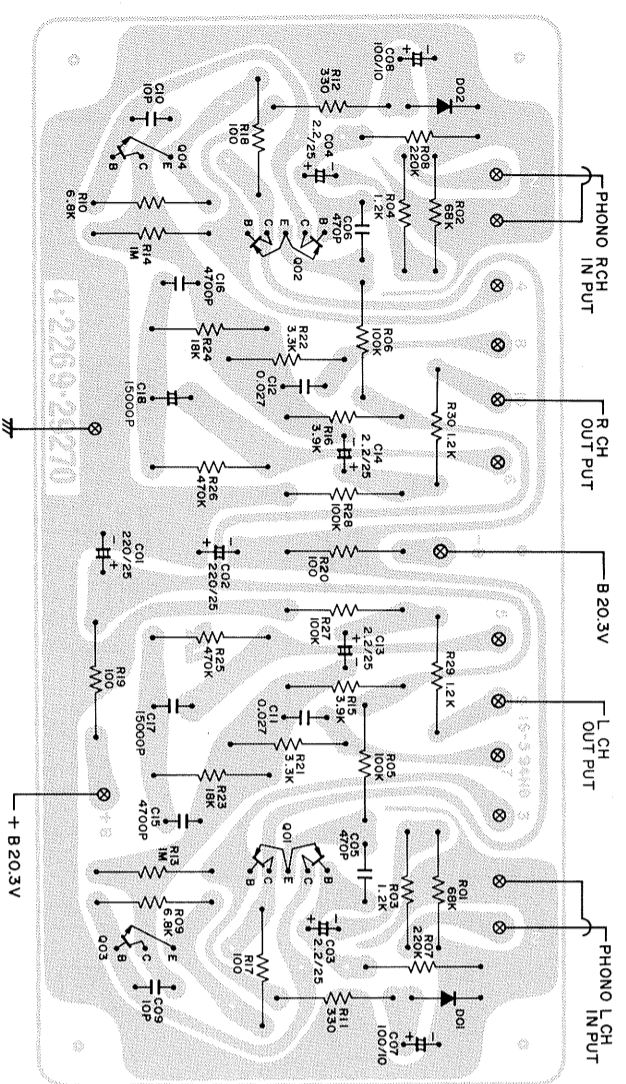


# RS-1058



# EQ P.C. BOARD

# PARTS LIST



## BOTTOM VIEW

SYMBOL NO.	DEVICE	B	C	E	C	B
001,02	2SA798	0.45V	-18.7V	0.61V	-19.3V	0.05V
003,04	2SC1570	-18.7V	-0.04V	-18.8V		

## PARTS LIST

Ref. No.	Part Number	Description	Ref. No.	Part Number	Description
<b>EQ PCB Assy</b>					
<b>1310 4001 73100</b>					
<b>CAPACITORS</b>					
C01,02	C1ERE-227A	Electrolytic 220 $\mu$ F 25V	R01,02	R2EDVJ683A	Carbon 68k
C03,04	C1EUEM225A	Alisicon 2.2 $\mu$ F 25V	R03,04	R2EDVJ122A	Carbon 1.2k
C05,06	C1HC DK471SL	Ceramic 470pF 50V $\pm$ 10%	R05,06	R2EDVJ104A	Carbon 100k
C07,08	C1ARE-107A	Electrolytic 100 $\mu$ F 10V	R07,08	R2EDVJ224A	Carbon 220k
C09,10	C1HCSD100SL	Ceramic 10pF 50V $\pm$ 0.5%	R09,10	R2EDVJ682A	Carbon 6.8k
C11,12	C1HFRM273A	Mylar 0.027 $\mu$ F 50V $\pm$ 20%	R11,12	R2EDVJ331A	Carbon 330
C13,14	C1EUEM225A	Alisicon 2.2 $\mu$ F 25V $\pm$ 20%	R13,14	R2EDVJ105A	Carbon 1M
C15,16	C1HSEL472A	Syrol 4700pF 50V $\pm$ 5%	R15,16	R2EDVJ392A	Carbon 3.9k
C17,18	C1HSEL153A	Syrol 15000pF 50V $\pm$ 5%	R17,18	R2EDVJ101A	Carbon 100
<b>SEMICONDUCTORS</b>					
D01,02	2055 9040 44210	Diode DS-442	R21,22	R2EDVJ332A	Carbon 3.3k
Q01,02	TMM-2SA798-F	TR 2SA798 F	R23,24	R2EDVJ183A	Carbon 18k
Q03,04	2035 5151 57079	TR 2SC1570 LG	R25,26	R2EDVJ474A	Carbon 470k
			R27,28	R2EDVJ104A	Carbon 100k
			R29,30	R2EDVJ122A	Carbon 1.2k

## PRE TONE PCB Assy

1310 4001 73200 (RS-1056)  
1310 4001 74900 (RS-1058)

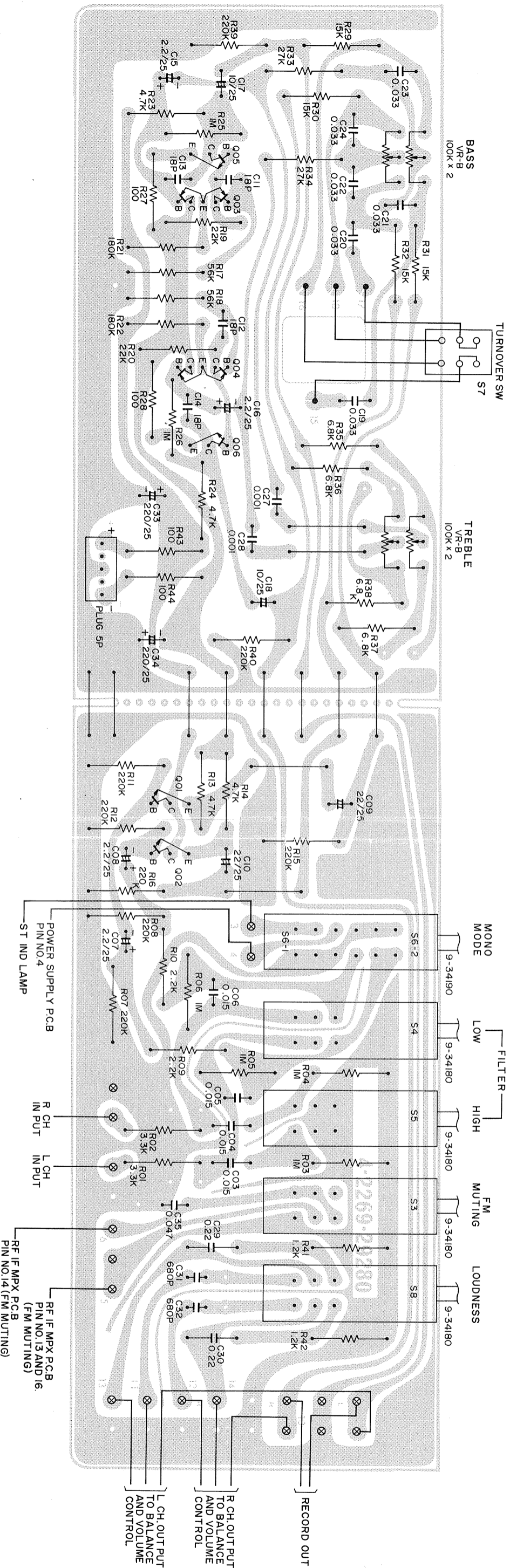
Ref. No.	Part Number	Description	Ref. No.	Part Number	Description
<b>CAPACITORS</b>					
C03,04	C1HFAK153A	Mylar 0.015 $\mu$ F 50V $\pm$ 10%	R07,08	R2EDVJ224A	Carbon 220k
05,06	C1EUEM225A	Alisicon 2.2 $\mu$ F 25V $\pm$ 20%	R09,10	R2EDVJ222A	Carbon 2.2k
C07,08	C1EUEM225A	Alisicon 2.2 $\mu$ F 25V $\pm$ 20%	R11,12	R2EDVJ224A	Carbon 220k
C09,10	C1EAEN226A	Electrolytic 22 $\mu$ F 25V $\pm$ 30%	R13,14	R2EDVJ472A	Carbon 4.7k
C11,12	C1HC DK180SL	Ceramic 18pF 50V $\pm$ 10%	R15,16	R2EDVJ224A	Carbon 220k
13,14	C1EUEM225A	Alisicon 2.2 $\mu$ F 25V $\pm$ 20%	R17,18	R2EDVJ563A	Carbon 56k
C15,16	C1EAEN106A	Electrolytic 10 $\mu$ F 25V $\pm$ 30%	R19,20	R2EDVJ223A	Carbon 22k
C17,18	C1EAEN106A	Electrolytic 10 $\mu$ F 25V $\pm$ 30%	R21,22	R2EDVJ184A	Carbon 180k
C19,20	C1HFAJ333A	Mylar 0.033 $\mu$ F 50V $\pm$ 5%	R23,24	R2EDVJ472A	Carbon 4.7k
21,22			R25,26	R2EDVJ105A	Carbon 1M
23,24			R27,28	R2EDVJ101A	Carbon 100
C27,28	C1HFAK102A	Mylar 0.001 $\mu$ F 50V $\pm$ 10%	R29,30	R2EDVJ153A	Carbon 15k
C29,30	C1HFERK224A	Mylar 0.22 $\mu$ F 50V $\pm$ 10%	31,32		
C31,32	C1HYDM681R	Titanium 680pF 50V $\pm$ 20%	R33,34	R2EDVJ273A	Carbon 27k
C33,34	C1ERE-227A	Electrolytic 220 $\mu$ F 25V	(RS-1056)		
C35	C1HYDZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%	R35,36	R2EDVJ682A	Carbon 6.8k
(RS-1058)			37,38		
C19,20	C1HFRK183A	Mylar 0.018 $\mu$ F 50V $\pm$ 10%	R39,40	R2EDVJ224A	Carbon 220k
21,22			R41,42	R2EDVJ122A	Carbon 1.2k
C23,24	C1HFRK472A	Mylar 0.0047 $\mu$ F 50V $\pm$ 10%	R43,44	R2EDVJ101A	Carbon 100
C27,28	C1HFRK332A	Mylar 0.0033 $\mu$ F 50V $\pm$ 10%	(RS-1058)		
C29,30	C1HFRK682A	Mylar 0.0068 $\mu$ F 50V $\pm$ 10%	R35,36	R2EDVJ562A	Carbon 5.6k
C31,32	C1HFRK224A	Mylar 0.22 $\mu$ F 50V $\pm$ 10%	37,38		
C33,34	C1HYDK681R	Ceramic 680pF 50V $\pm$ 10%	39,40		
C35,36	C1ERE-227A	Electrolytic 220 $\mu$ F 25V	R41,42	R2EDVJ682A	Carbon 6.8k
C37	C1HYDZ473A	Ceramic 0.047 $\mu$ F 50V +80,-20%	43,44		
			R45,46	R2EDVJ224A	Carbon 220k
			R47,48	R2EDVJ122A	Carbon 1.2k
			R49,50	R2EDVJ101A	Carbon 100

## SEMICONDUCTORS

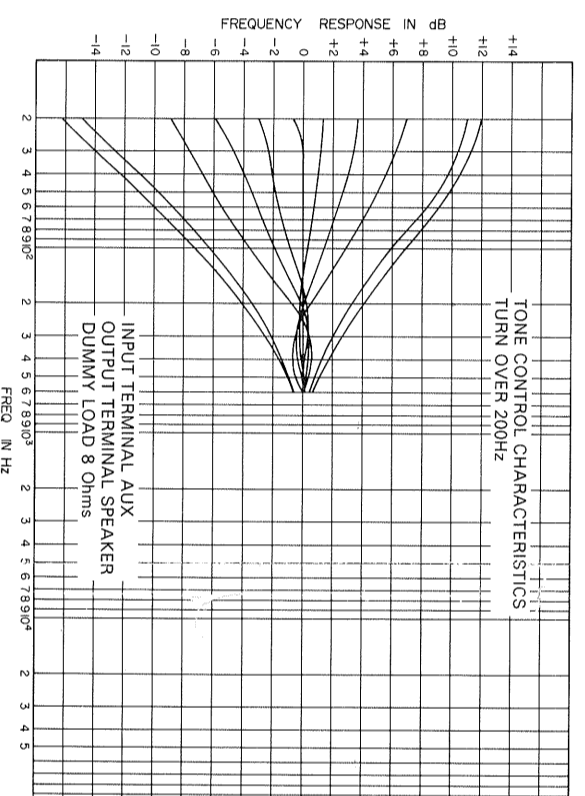
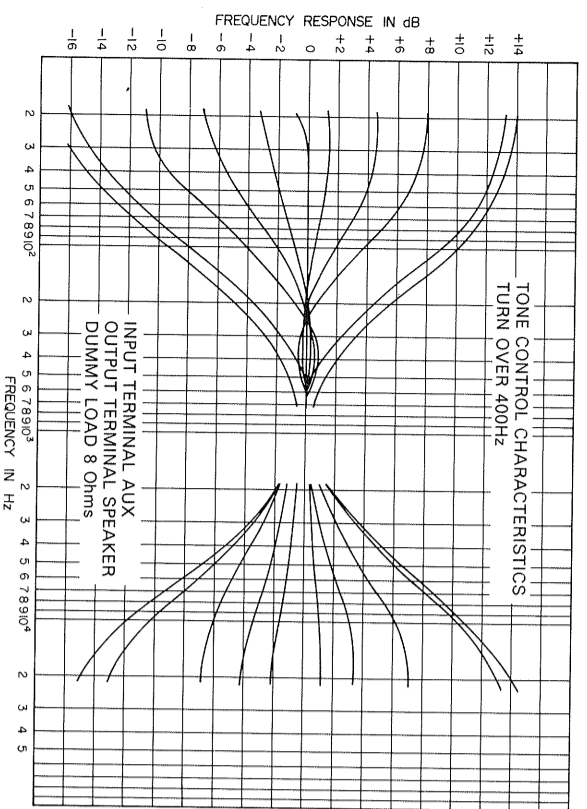
### RESISTORS

# tone control and mode selector P.C. BOARD

RS-1056

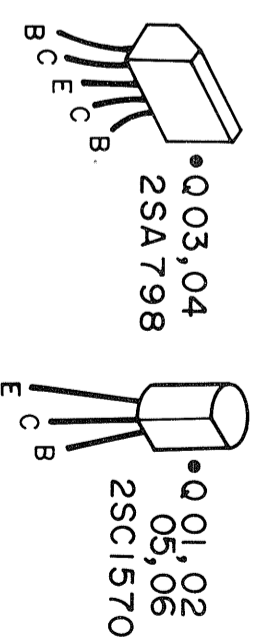


## CHARACTERISTIC CURVE

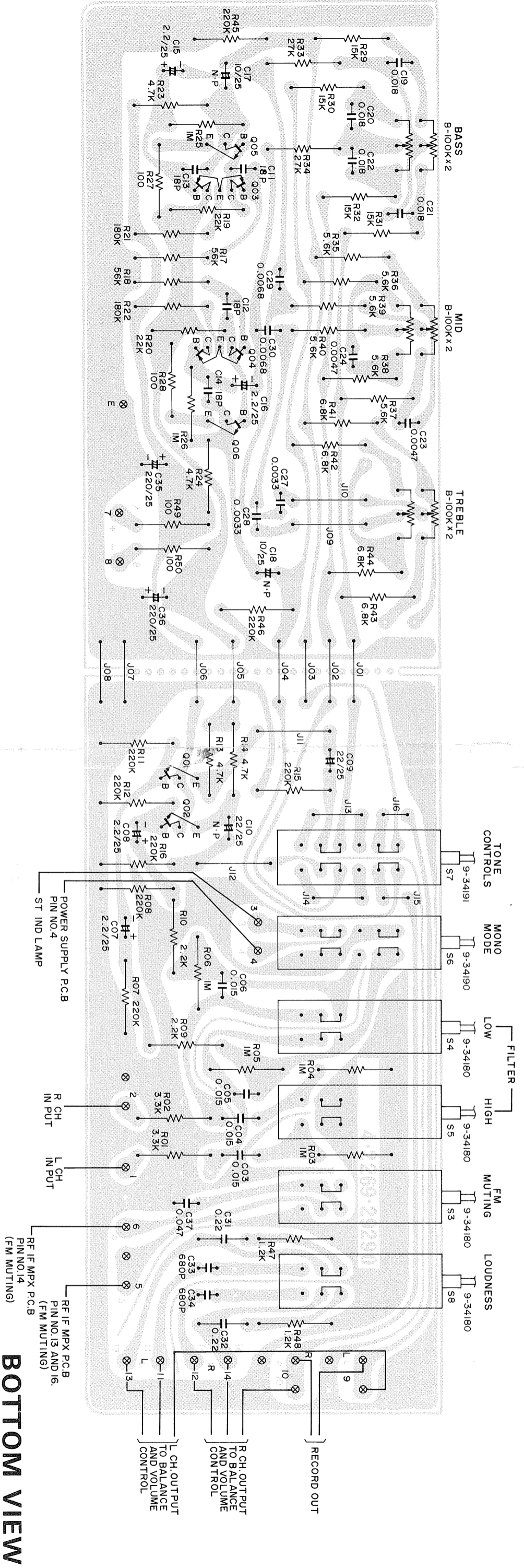


TRANSISTOR DC VOLTAGES						
SYMBOL NO.	DEVICE	B	C	E	C	B
Q01,02	2SC1570	-1.55V	19.6V	-22V		
Q03,04	2SA798	0.09V	-17.9V	0.07V	-18.9V	0.015V
Q05,06	2SC1570	-17.9V	-0.1V	-18.4V		

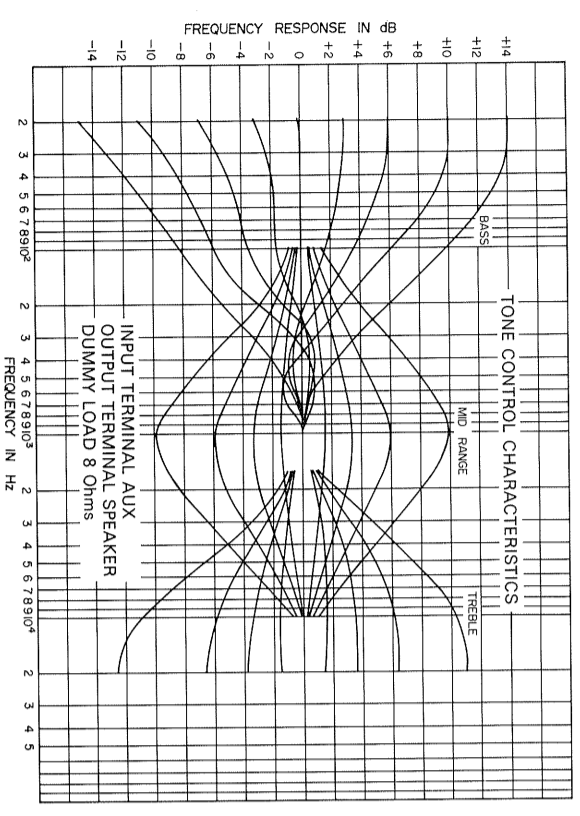
### TRANSISTOR FRONT VIEW



# tone control and mode selector P.C. BOARD

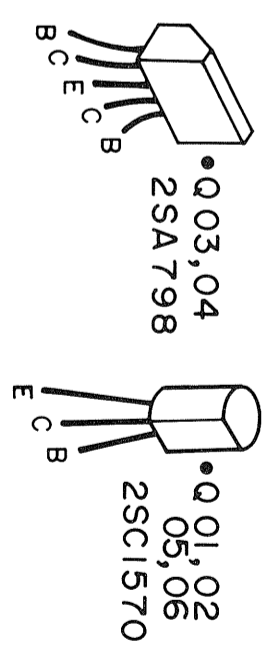


## CHARACTERISTIC CURVE

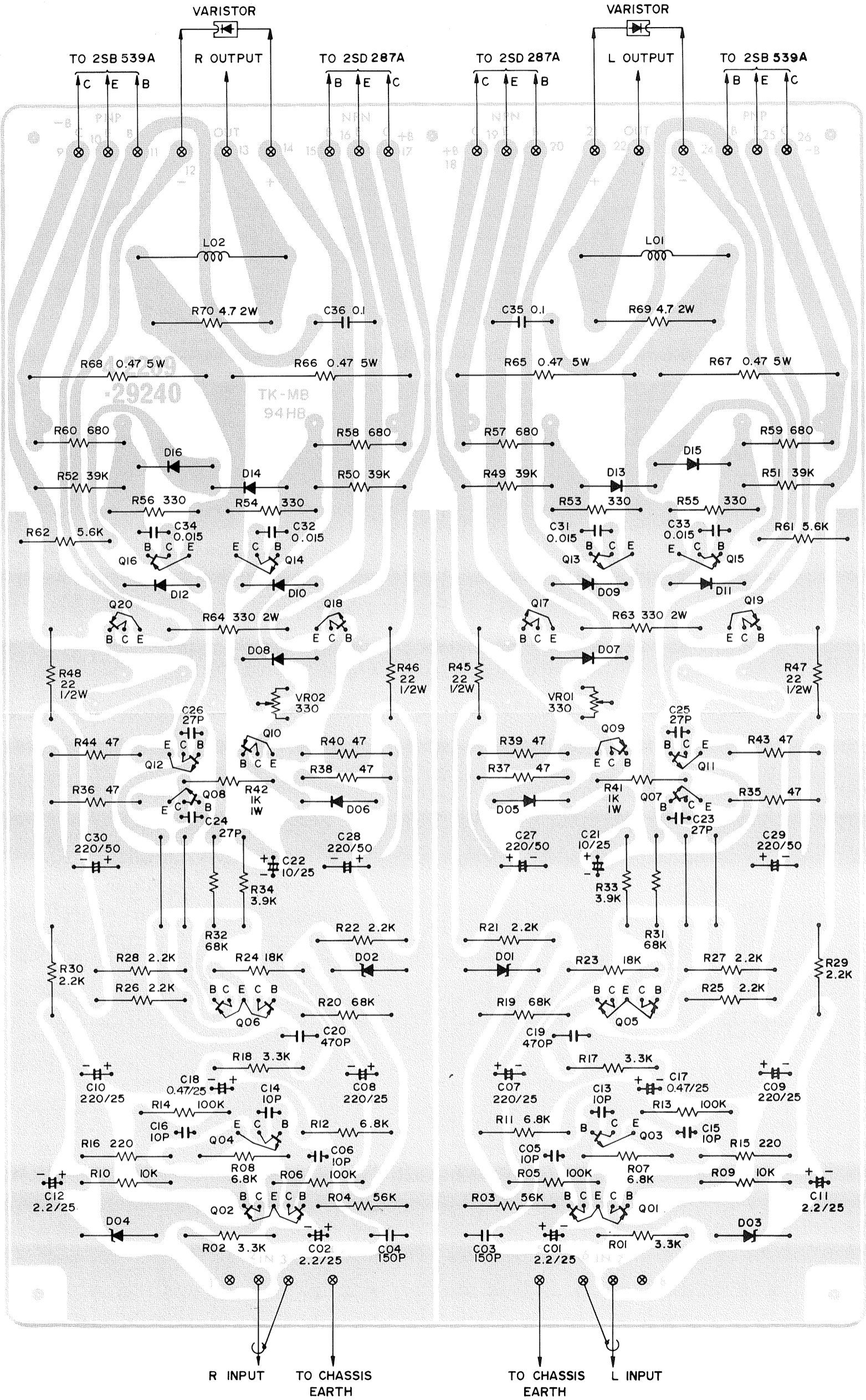


TRANSISTOR DC VOLTAGES					
SYMBOL NO.	DEVICE	B	C	E	B
Q01,02	2SC1570	-1.55V	-22V		
Q03,04	2SA798	0.09V	-17.9V	-18.9V	0.015V
Q05,06	2SC1570	-17.9V	-0.1V	-18.4V	

### TRANSISTOR FRONT VIEW



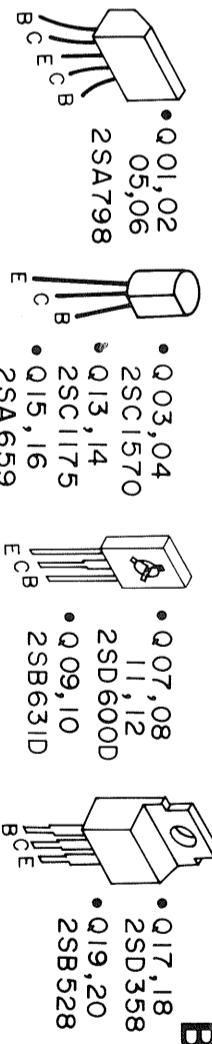
## BOTTOM VIEW



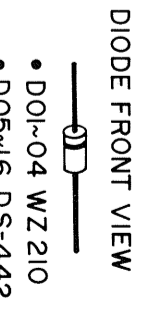
TRANSISTOR DC VOLTAGES

SYMBOL NO.	DEVICE	B	C	E	SYMBOL NO.	DEVICE	B	C	E
001,02	2SA798	0.077V	-19.9V	0.58V	Q11,12	2SD600	-42.3V	-1.14V	-0.94V
003,04	2SC1570	-19.9V	-0.04V	-20.5V	Q13,14	2SC1175	0.222V	0.95V	-0.94V
005,06	2SA798	0.068V	-42.7V	0.65V	Q15,16	2SA659	-0.247V	-1.17V	-0.94V
007,08	2SD600	-42.9V	-30.6V	-43.3V	Q17,18	2SD358	1.16V	44.5V	0.57V
009,10	2SB631	42.4V	1.16V	42.9V	Q19,20	2SB528	-1.14V	-44.5V	-0.6V

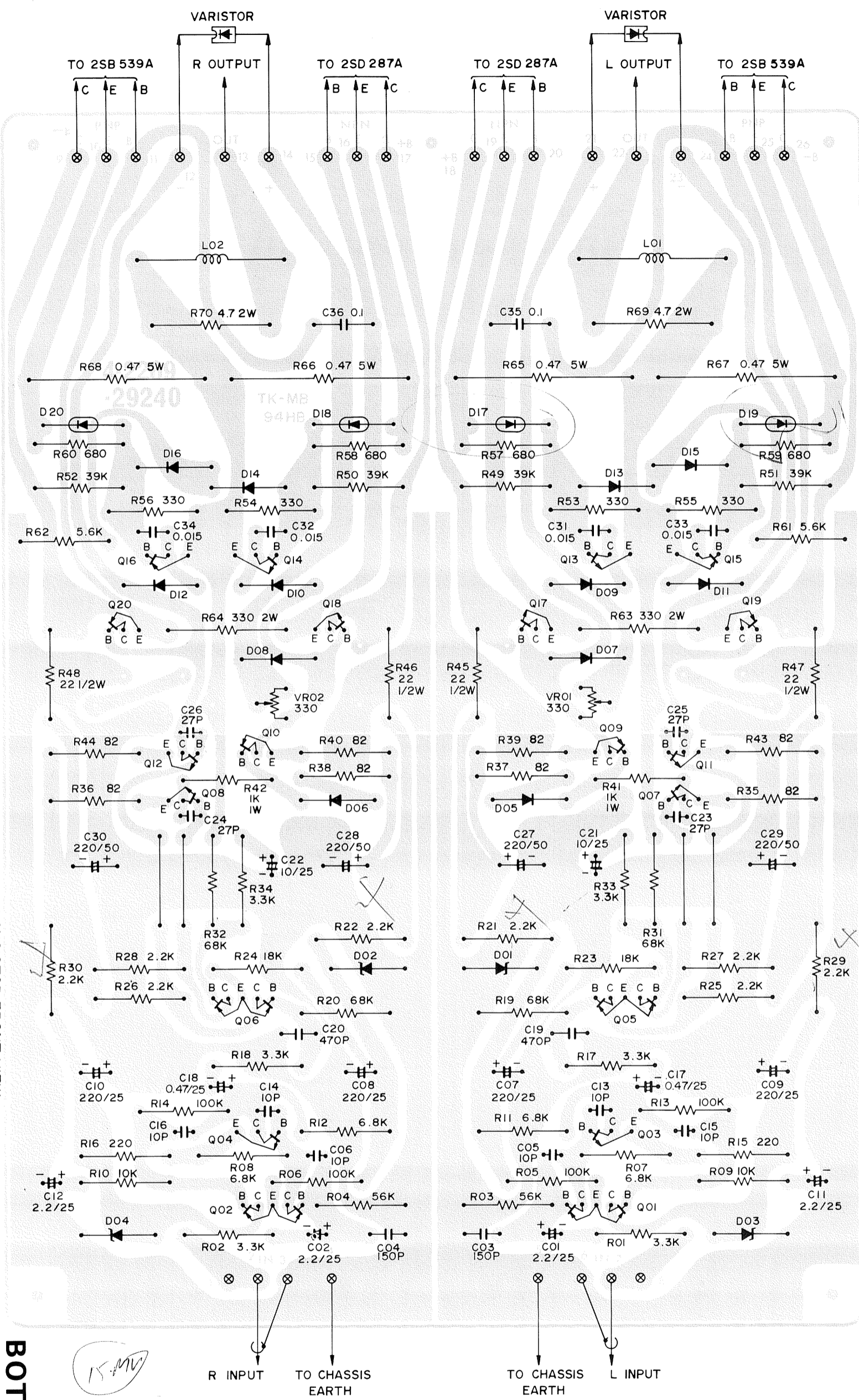
TRANSISTOR FRONT VIEW



BOTTOM VIEW







TRANSISTOR DC VOLTAGES				
SYMBOL NO.	DEVICE	B	C	E
001,02	2SA798	0.012V	-19.4V	0.59V
003,04	2SC1570	-19.4V	-0.03V	-20.6V
005,06	2SA798	0.069V	-42.5V	0.688V
007,08	2SD600	-51.7V	-31.9V	-52.1V
009,10	2SB631	52.1V	1.18V	43.3V

- TRANSISTOR FRONT VIEW**
- Q01,02 2SA798
  - Q03,04 2SC1570
  - Q07,08 2SD600D
  - Q09,10 2SB631D
  - Q17,18 2SD358
  - Q19,20 2SB528
- DIODE FRONT VIEW**
- D01~04 WZ 210
  - D05~16 DS-442
  - D17~20 SV-04

# PARTS LIST

## POWER AMP PCB Assy

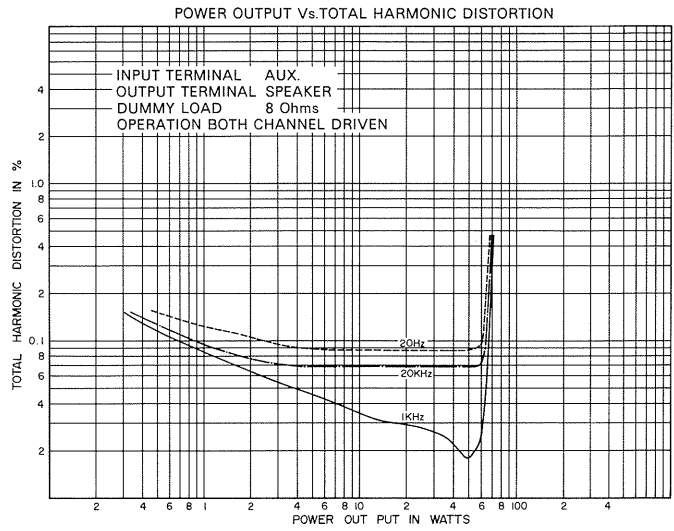
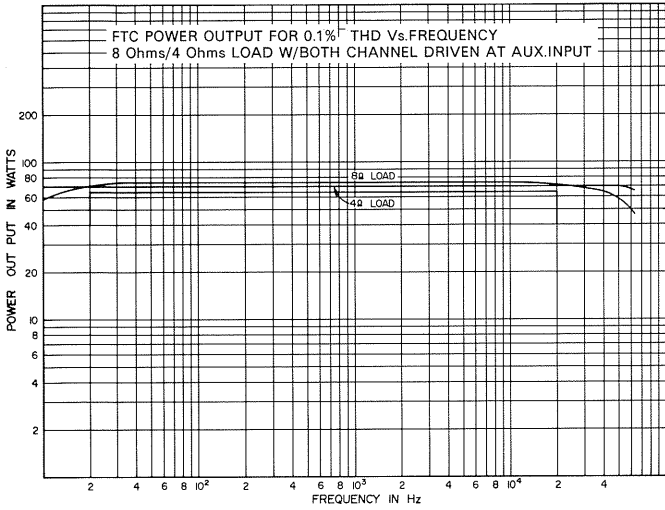
1310 4001 72802 (RS-1056)

1310 4001 72803 (RS-1058)

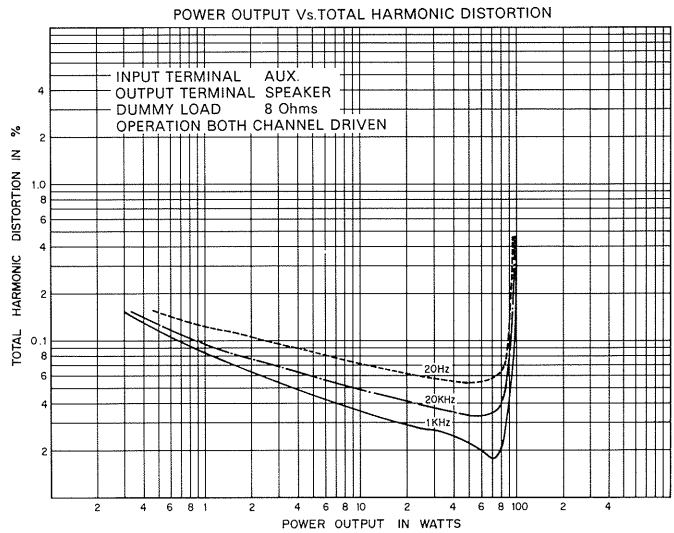
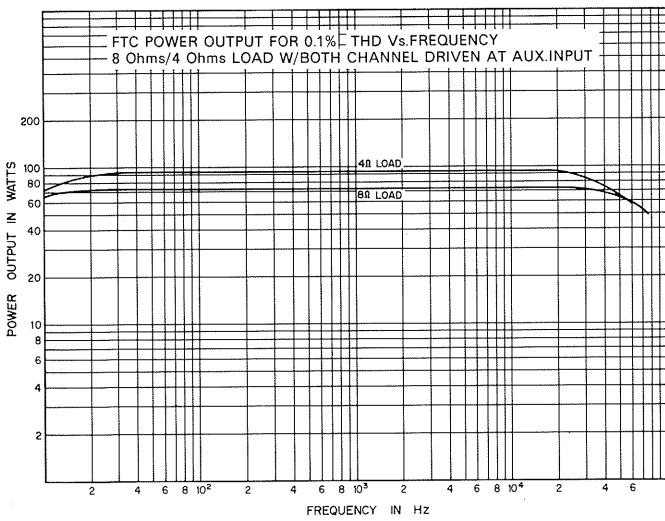
Ref. No.	Part Number	Description	Ref. No.	Part Number	Description
L01,02	4 2539 20281	Coil 2 $\mu$ H			
VR01,02	4 2229 25500	VR B-330x1			
<b>CAPACITORS</b>			<b>RESISTORS</b>		
C01,02	C1EUEM 225A	Alsicon 2.2 $\mu$ F 25V $\pm 20\%$	R01,02	R2EDVJ332A	Carbon 3.3k 1/4W $\pm 5\%$
C03,04	C1HCDK151SL	Ceramic 150pF 50V $\pm 10\%$	R03,04	R2EDVJ563A	Carbon 56k 1/4W $\pm 5\%$
C05,06	C1HCDD100SL	Ceramic 10pF 50V $\pm 0.5\%$	R05,06	R2EDVJ104A	Carbon 100k 1/4W $\pm 5\%$
C07,08	C1ERB-227A	Electrolytic 220 $\mu$ F 25V	R07,08	R2EDVJ682A	Carbon 6.8k 1/4W $\pm 5\%$
09,10			R09,10	R2EDVJ103A	Carbon 10k 1/4W $\pm 5\%$
C11,12	C1EUEM225A	Alsicon 2.2 $\mu$ F 25V $\pm 20\%$	R11,12	R2EDVJ682A	Carbon 6.8k 1/4W $\pm 5\%$
C13,14	C1HCDD100SL	Ceramic 10pF 50V $\pm 0.5\%$	R13,14	R2EDVJ104A	Carbon 100k 1/4W $\pm 5\%$
15,16			R15,16	R2EDVJ221A	Carbon 220 1/4W $\pm 5\%$
C17,18	C1EUEM474A	Alsicon 0.47 $\mu$ F 25V $\pm 20\%$	R17,18	R2EDVJ332A	Carbon 3.3k 1/4W $\pm 5\%$
C19,20	C1HCDK471SL	Ceramic 470pF 50V $\pm 10\%$	R19,20	R2EDVJ683A	Carbon 68k 1/4W $\pm 5\%$
C21,22	C1ERB-106A	Electrolytic 10 $\mu$ F 25V	R21,22	R2EDVJ222A	Carbon 2.2k 1/4W $\pm 5\%$
C23,24	C1HCDK270SL	Ceramic 27pF 50V $\pm 10\%$	R23,24	R2EDVJ183A	Carbon 18k 1/4W $\pm 5\%$
25,26			R25,26	R2EDVJ222A	Carbon 2.2k 1/4W $\pm 5\%$
C27,28	C1HRB-227A	Electrolytic 220 $\mu$ F 50V	27,28		
29,30			29,30		
C31,32	C1HFRM153A	Mylar 0.015 $\mu$ F 50V $\pm 20\%$	R31,32	R2EDVJ683A	Carbon 68k 1/4W $\pm 5\%$
33,34			R33,34	R2EDVJ392A	Carbon 3.9k 1/4W $\pm 5\%$
C35,36	C1HFRM104A	Mylar 0.1 $\mu$ F 50V $\pm 20\%$	R33,34	R2EDVJ332A	Carbon 3.3k 1/4W $\pm 5\%$
<b>SEMICONDUCTORS</b>			R35,36	R2EDVJ470A	Carbon 47 1/4W $\pm 5\%$
D01,02	DJJ-WZ-210	Diode WZ-210	37,38		
03,04			39,40		
D05,06	2055 9040 44210	Diode DS-442	R35,36	R2EDVJ820A	Carbon 82 1/4W $\pm 5\%$
07,08			37,38		
09,10			39,40		
11,12			R41,42	R3AXBJ102A	Oxide Metal Film 1k 1W $\pm 5\%$
13,14			R43,44	R2EDVJ470A	Carbon 47 1/4W $\pm 5\%$
15,16			R43,44	R2EDVJ820A	Carbon 82 1/4W $\pm 5\%$
Q01,02	TMM-2SA798--F	TR 2SA798 F	R45,46	R2HZPK220A	Fuse 22 1/2W $\pm 10\%$
Q03,04	2035 5151 57079	TR 2SA1570 LG	47,48		
Q05,06	TMM-2SA798--F	TR 2SA798 F	R49,50	R2EDVJ393A	Carbon 39k 1/4W $\pm 5\%$
Q07,08	2035 4900 60040	TR 2SD600D	51,52		
Q09,10	2035 4910 63140	TR 2SB631D	R53,54	R2EDVJ331A	Carbon 330 1/4W $\pm 5\%$
Q11,12	2035 4900 60040	TR 2SD600D	55,56		
Q13,14	2035 6701 17550	TR 2SC1175 E	R57,58	R2EDVJ681A	Carbon 680 1/4W $\pm 5\%$
Q15,16	2035 6800 65950	TR 2SA659 E	59,60		
Q17,18	TMM-2SD358--D	TR 2SD358 D	R61,62	R2EDVJ562A	Carbon 5.6k 1/4W $\pm 5\%$
Q19,20	TMM-2SB528--D	TR 2SB528 D	R63,64	R3DXBJ331A	Oxide Metal Film 330 2W $\pm 5\%$
			R65,66	R3HEPKR47A	Cement 0.47 5W $\pm 10\%$
			67,68		
			R69,70	R3DXBJ4R7A	Oxide Metal Film 4.7 2W $\pm 5\%$

# POWER AMPSECTION CHARACTERISTIC CURVE

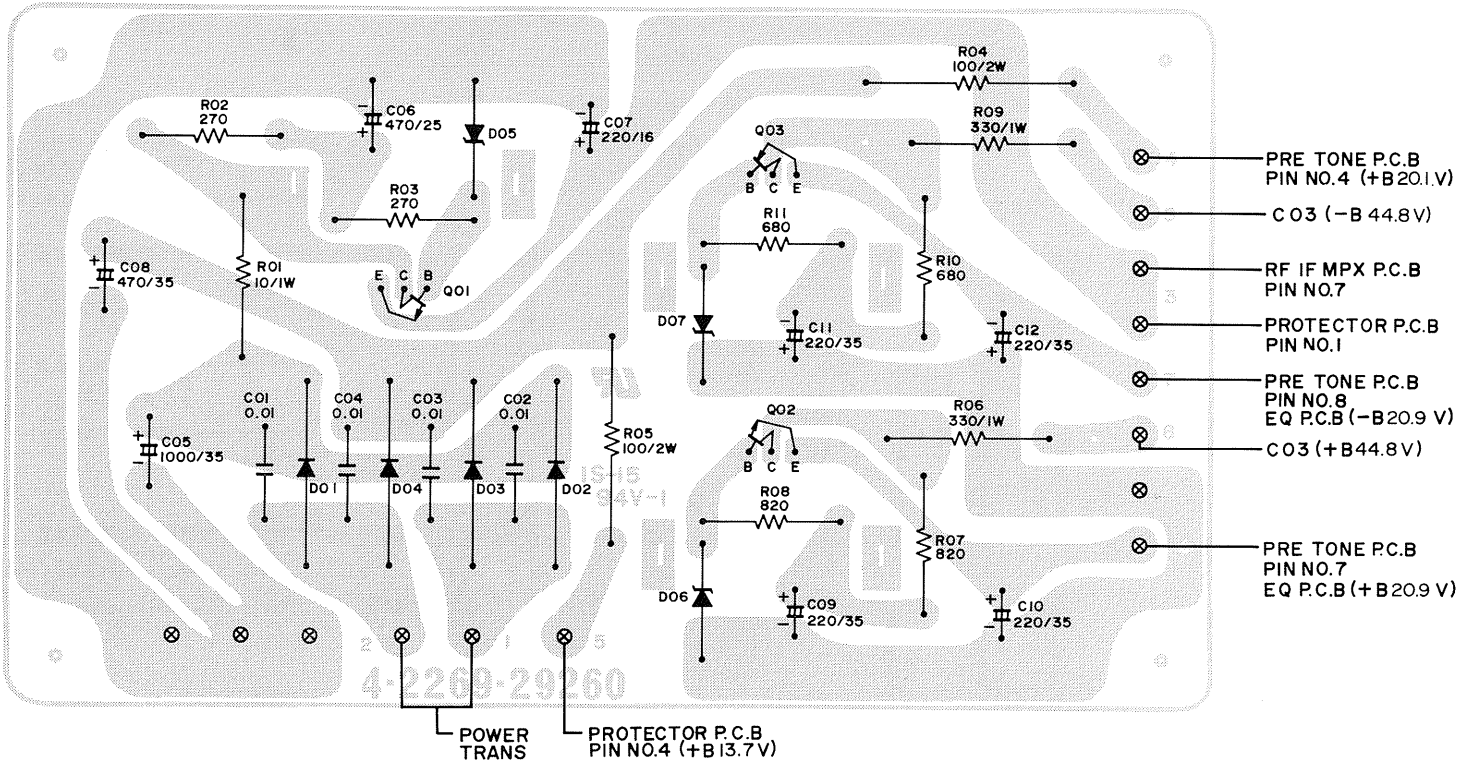
## RS-1056



## RS-1058



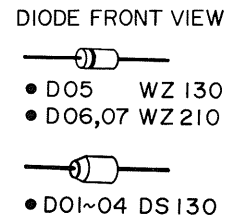
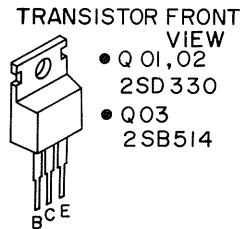
# POWER SUPPLY P.C.BOARD



TRANSISTOR DC VOLTAGES

SYMBOL NO.	DEVICE	B	C	E
Q01	2SD330	13.0V	20.0V	12.41V
Q02	2SD330	21.9V	33.8V	20.9V
Q03	2SB514	21.3V	-33.7V	-20.9V

## BOTTOM VIEW



## PARTS LIST

POWER SUPPLY PCB Assy  
 1310 4001 73001 (RS-1056)

Ref. No. Part Number Description

### CAPACITORS

C01,02,03,04	C2HYDP103A	Ceramic 0.01 $\mu$ F 500V +100,-0 %
C05	C1VRE-108A	Electrolytic 1000 $\mu$ F 35V
C06	C1ERE-477A	Electrolytic 470 $\mu$ F 25V
C07	C1CRE-227A	Electrolytic 220 $\mu$ F 16V
C08	C1VRE-477A	Electrolytic 470 $\mu$ F 35V
C09,10,11,12	C1VRE-227A	Electrolytic 220 $\mu$ F 35V

### SEMICONDUCTORS

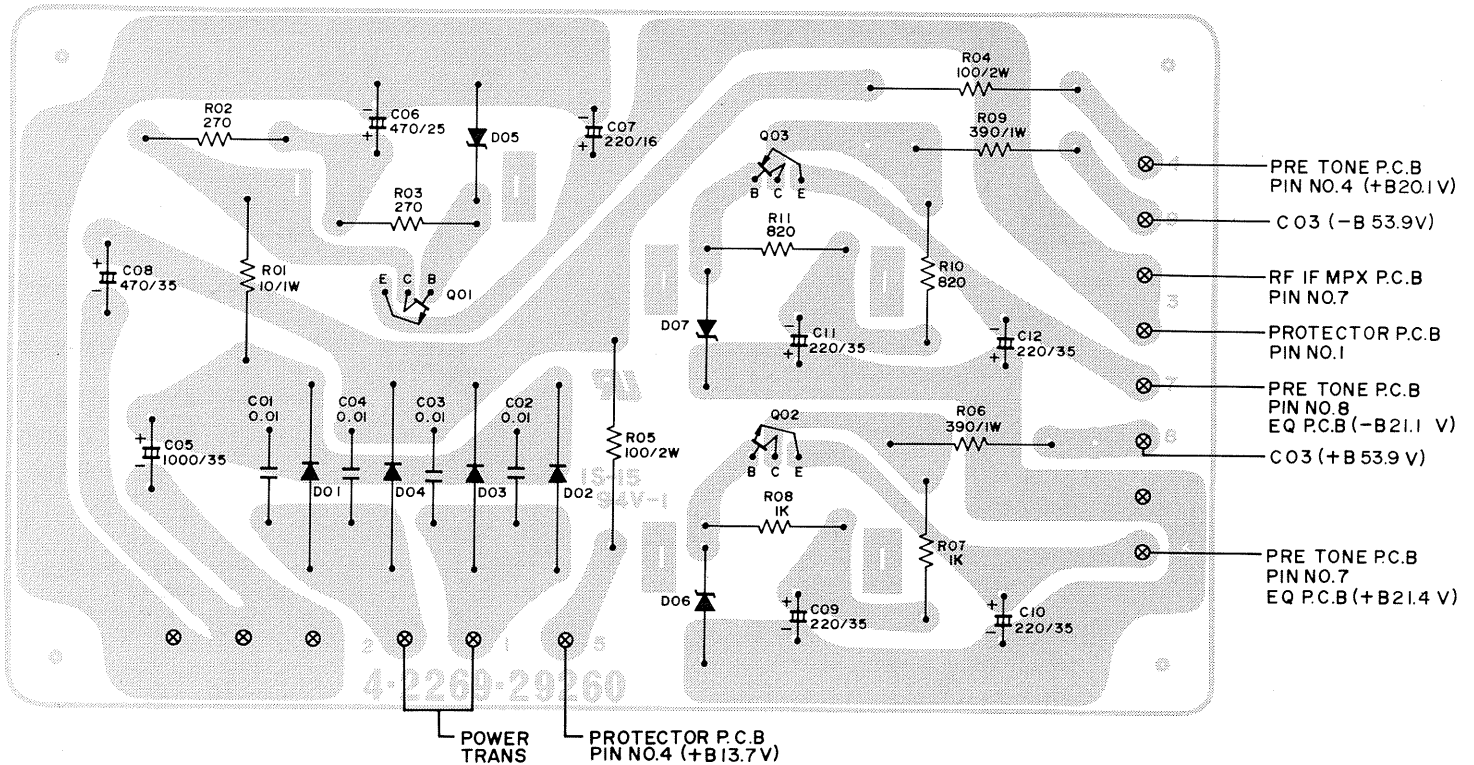
D01,02,03,04	2025 2310 13020	Diode DS130YD
D05	DJJ-WZ-130	Diode WZ-130
D06,07	DJJ-WZ-210	Diode WZ-210
Q01,02	2035 8220 33050	TR 2SD330 E
Q03	2035 6460 51440	TR 2SB514 D

Ref. No. Part Number Description

### RESISTORS

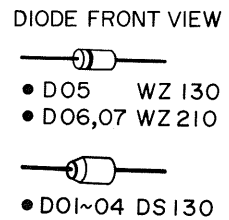
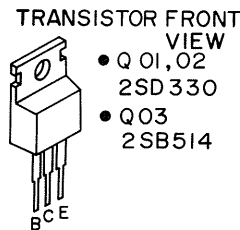
R01	R3AXB100A	Oxide Metal Film 10 1W $\pm$ 5 %
R02,03	R2EDVJ271A	Carbon 270 1/4W $\pm$ 5 %
R04,05	R3DXBJ101A	Oxide Metal Film 100 2W $\pm$ 5 %
R06,09	R3AXB1331A	Oxide Metal Film 330 1W $\pm$ 5 %
R07,08,10,11	R2EDVJ821A	Carbon 820 1/4W $\pm$ 5 %

# POWER SUPPLY P.C.BOARD



## BOTTOM VIEW

TRANSISTOR DC VOLTAGES				
SYMBOL NO.	DEVICE	B	C	E
Q01	2SD330	13.0V	18.9V	12.41
Q02	2SD330	22.0V	39.7V	21.4V
Q03	2SB514	-21.7V	-39.9V	-21.1V



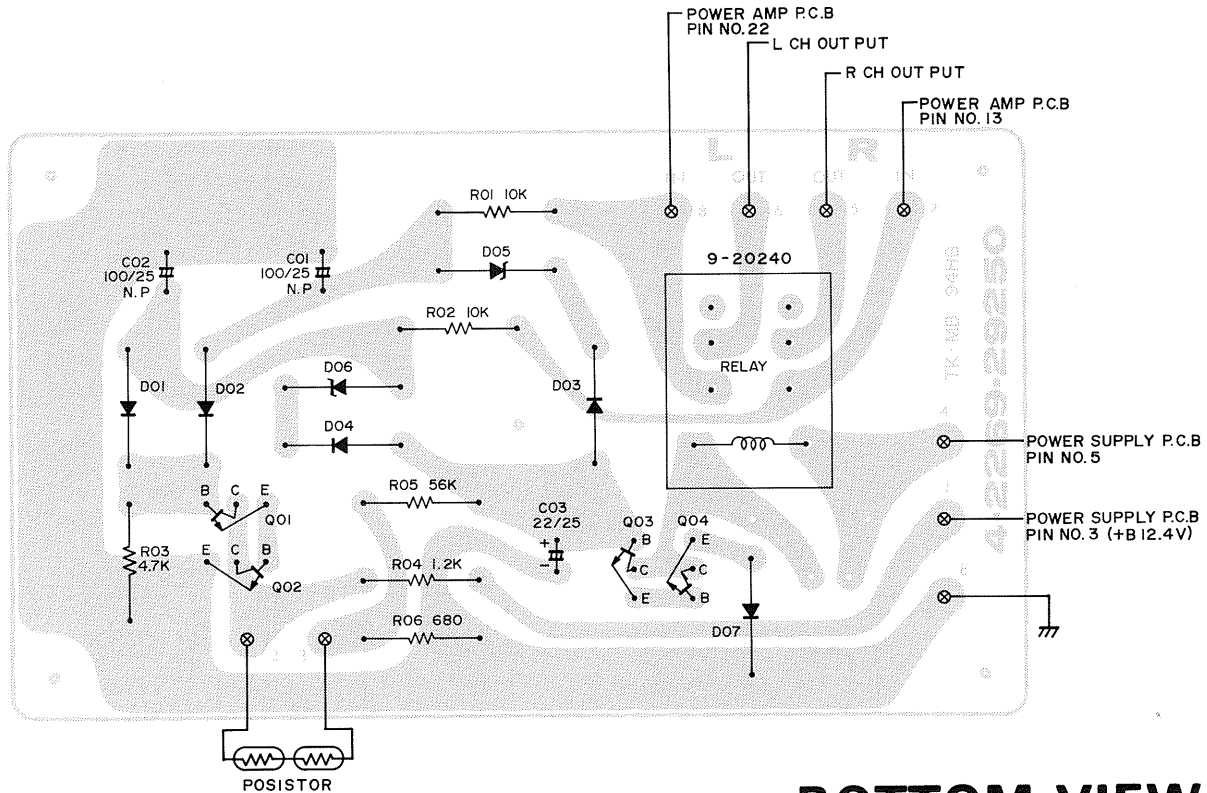
## PARTS LIST

### POWER SUPPLY PCB Assy 1310 4001 73002 (RS-1058)

Ref. No.	Part Number	Description	Ref. No.	Part Number	Description
<b>CAPACITORS</b>			<b>RESISTORS</b>		
C01,02 03,04	C2HYDP103A	Ceramic 0.01 $\mu$ F 500V +100,-0 %	R01	R3AXBJ100A	Oxide Metal Film 10 1W $\pm$ 5 %
C05	C1VRE-108A	Electrolytic 1000 $\mu$ F 35V	R02,03	R2EDVJ271A	Carbon 270 1/4W $\pm$ 5 %
C06	C1ERE-477A	Electrolytic 470 $\mu$ F 25V	R04,05	R3DXXBJ101A	Oxide Metal Film 100 2W $\pm$ 5 %
C07	C1CRE-227A	Electrolytic 220 $\mu$ F 16V	R06,09	R3AXBJ391A	Oxide Metal Film 390 1W $\pm$ 5 %
C08	C1VRE-477A	Electrolytic 470 $\mu$ F 35V	R07,08 10,11	R2EDVJ102A	Carbon 1k 1/4W $\pm$ 5 %
C09,10 11,12	C1VRE-227A	Electrolytic 220 $\mu$ F 35V			
<b>SEMICONDUCTORS</b>					
D01,02 03,04	2025 2310 13020	Diode DS130YD			
D05	DJJ-WZ-130	Diode WZ-130			
D06,07	DJJ-WZ-210	Diode WZ-210			
Q01,02	2035 8220 33050	TR 2SD330E			
Q03	2035 6460 51440	TR 2SB514 D			

# PROTECTOR P.C. BOARD

RS-1056  
RS-1058



## BOTTOM VIEW

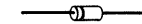
TRANSISTOR DC VOLTAGES				
SYMBOL NO.	DEVICE	B	C	E
Q01	2SC536	0.02V	5.55V	0.045V
Q02	2SC536	0.045V	5.55V	0V
Q03	2SC536	2.16V	1.62V	1.5V
Q04	2SC1175	1.5V	1.62V	0.74V

TRANSISTOR FRONT VIEW

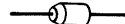


- Q01 ~ 03 2SC536
- Q04 2SC1175

DIODE FRONT VIEW



- D01~04 DS-442
- D05,06 RD-6.2E



- D07 DS-130

## PARTS LIST

PROTECTOR PCB Assy  
1310 4001 72900

Ref. No. Part Number Description

4 2329 20240 Relay

### CAPACITORS

C01,02 C1EAEN107A Electrolytic 100  $\mu$ F 25V  $\pm$ 30 %  
C03 C1ERE-226A Electrolytic 22  $\mu$ F 25V

### SEMICONDUCTORS

D01,02 2055 9040 44210 Diode DS-442  
03,04  
D05,06 DNN-RD6.2E Diode RD-6.2 E  
D07 2025 2310 13020 Diode DS130 YD  
Q01,02 2035 5100 53650 TR 2SC536 E  
03  
Q04 2035 6701 17550 TR 2SC1175 E

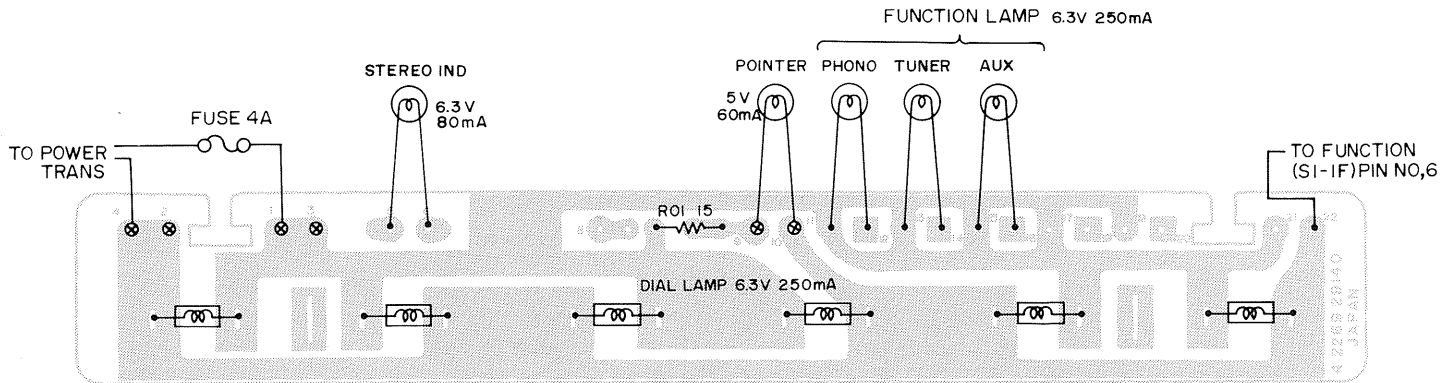
Ref. No. Part Number Description

### RESISTORS

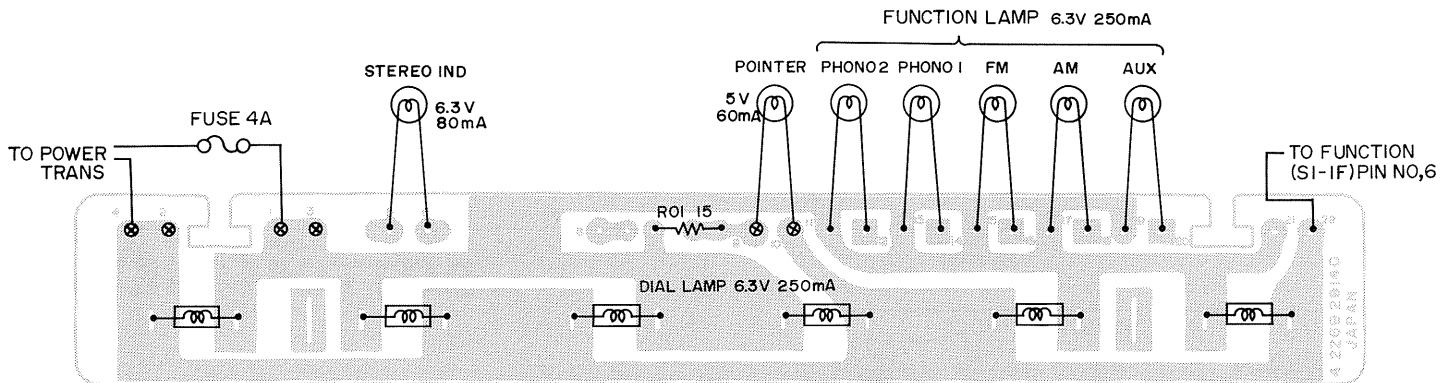
R01,02 R2EDVJ103A Carbon 10k 1/4W  $\pm$ 5 %  
R03 R2EDVJ472A Carbon 4.7k 1/4W  $\pm$ 5 %  
R04 R2EDVJ122A Carbon 1.2k 1/4W  $\pm$ 5 %  
R05 R2EDVJ563A Carbon 56k 1/4W  $\pm$ 5 %  
R06 R2EDVJ681A Carbon 680 1/4W  $\pm$ 5 %

# DIAL LAMP P.C.BOARD

## RS-1056



## RS-1058



## BOTTOM VIEW

## PARTS LIST

### DIAL LAMP PCB Assy

1310 4001 72162 (RS-1056)

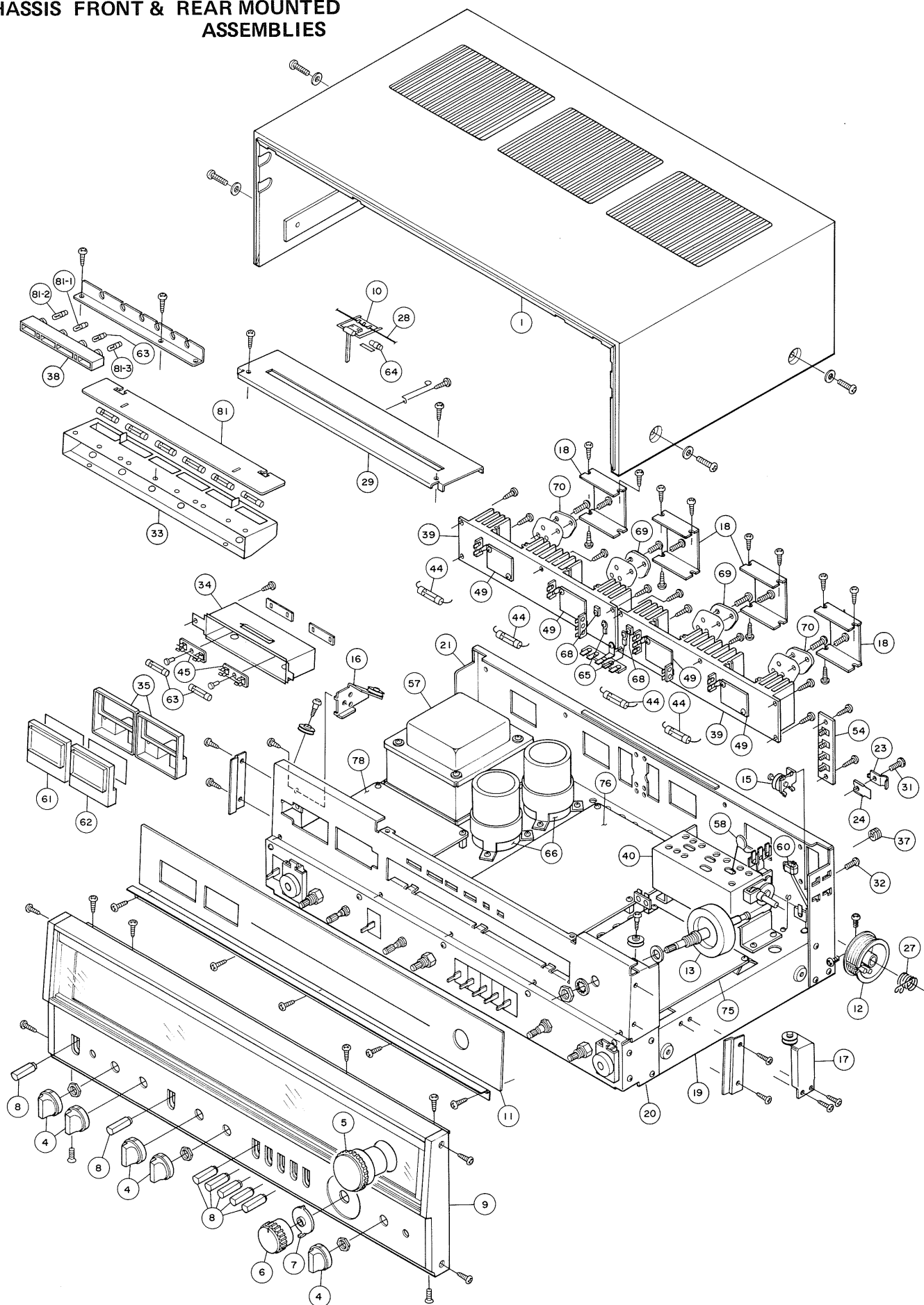
1310 4001 72163 (RS-1058)

Ref. No.	Part Number	Description
	4 2359 20930	Lamp Holder
63	4 6129 20219	Small Lamp IND 6.3V 80mA
	4 6129 20280	Pilot Lamp 6.3V 250mA (Dial Lamp)
		(Function Lamps)
81-1	4 6129 20430	Pilot Lamp 6.3V 80mA
81-2	4 6129 20431	Pilot Lamp 6.3V 80mA
81-3	4 6129 20432	Pilot Lamp 6.3V 80mA
81-4	4 6129 20216	Pilot Lamp 6.3V 80mA (RS-1058)
81-5	4 6129 20433	Pilot Lamp 6.3V 80mA (RS-1058)

### RESISTORS

R01	R2EDSJ150A	Carbon 15	1/4W ± 5 %
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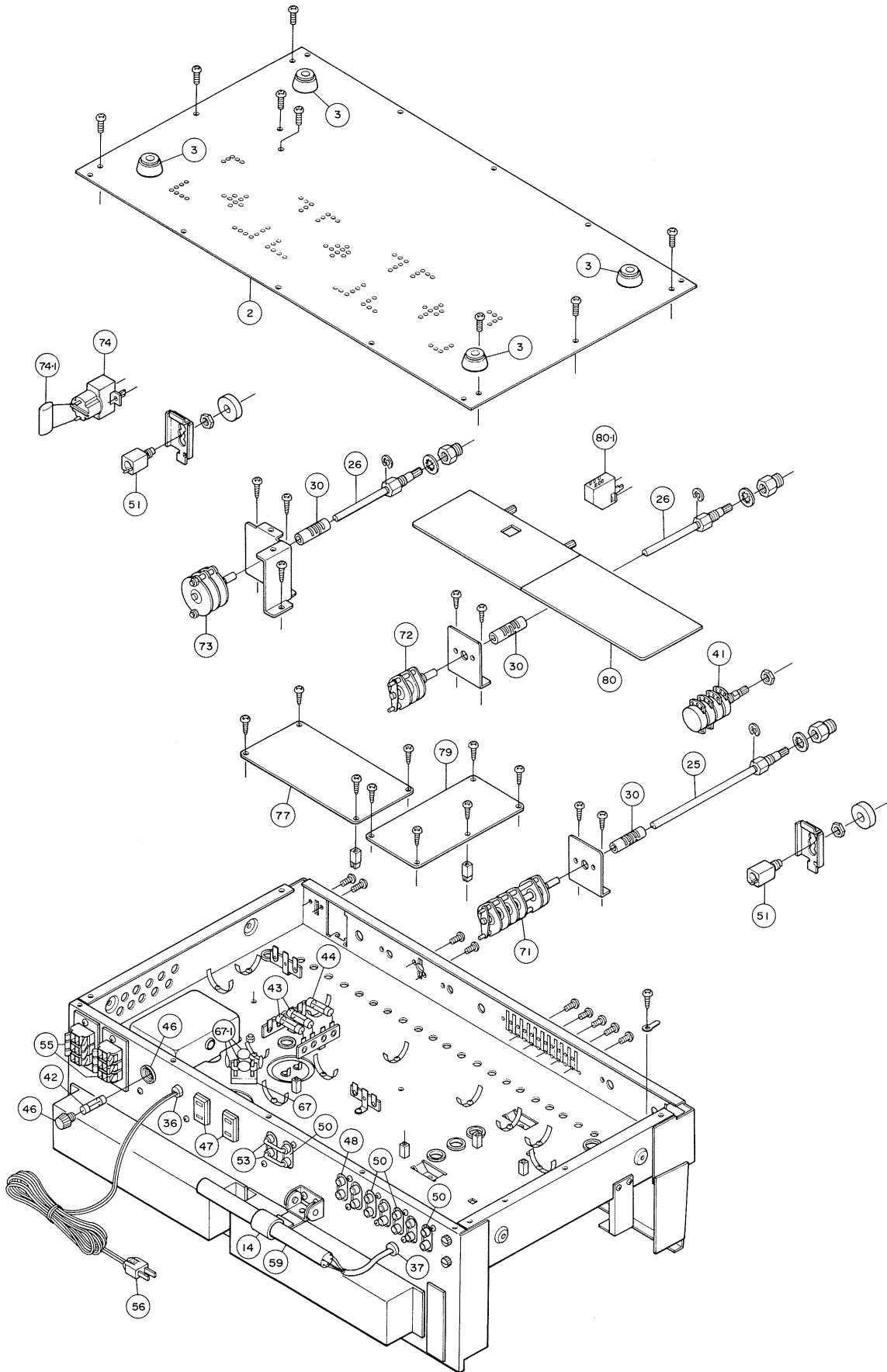
## EXPLODED VIEW OF CABINET AND CHASSIS FRONT & REAR MOUNTED ASSEMBLIES



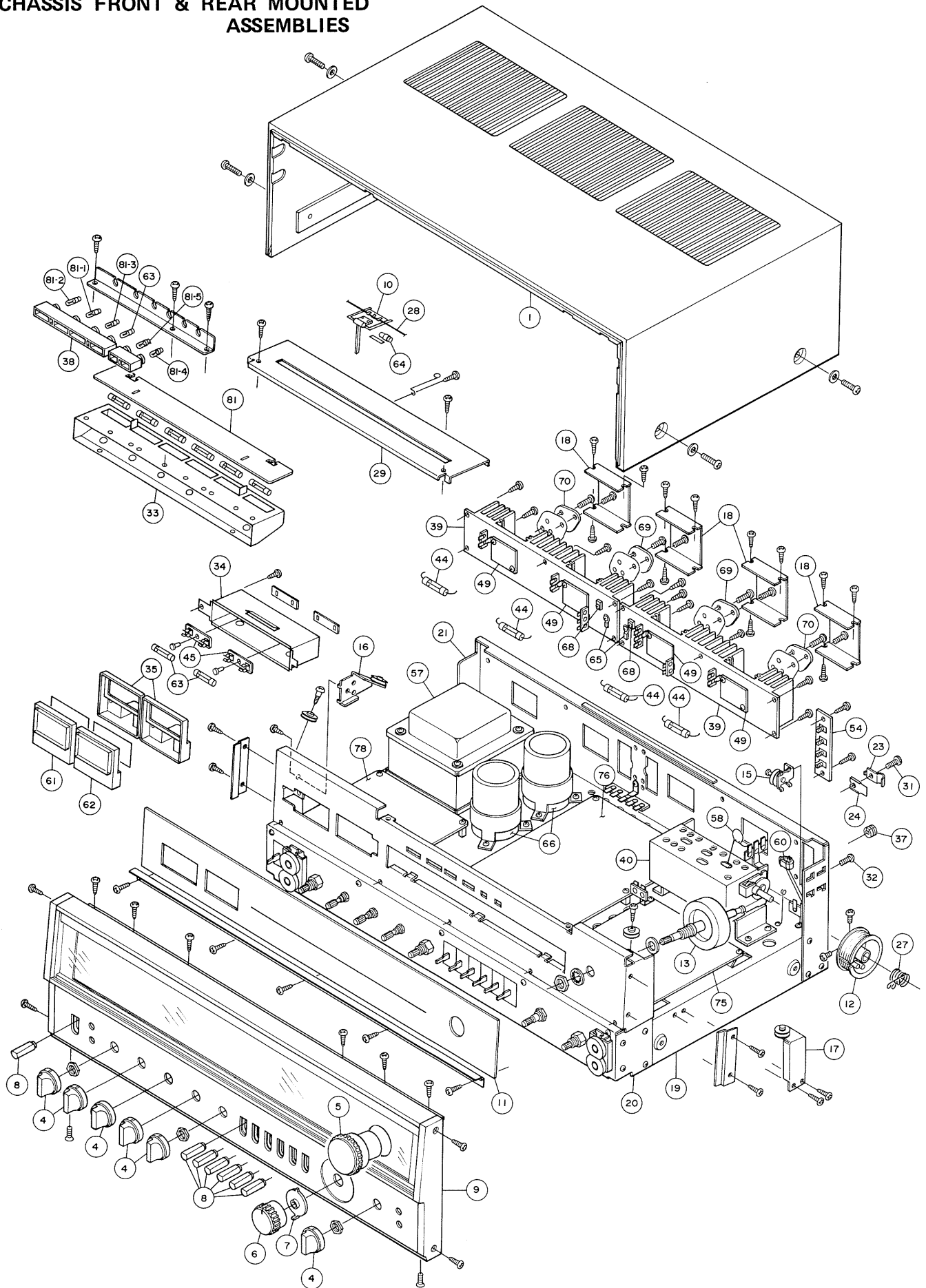


# RS-1056

## EXPLODED VIEW OF CHASSIS BOTTOM MOUNTED ASSEMBLIES

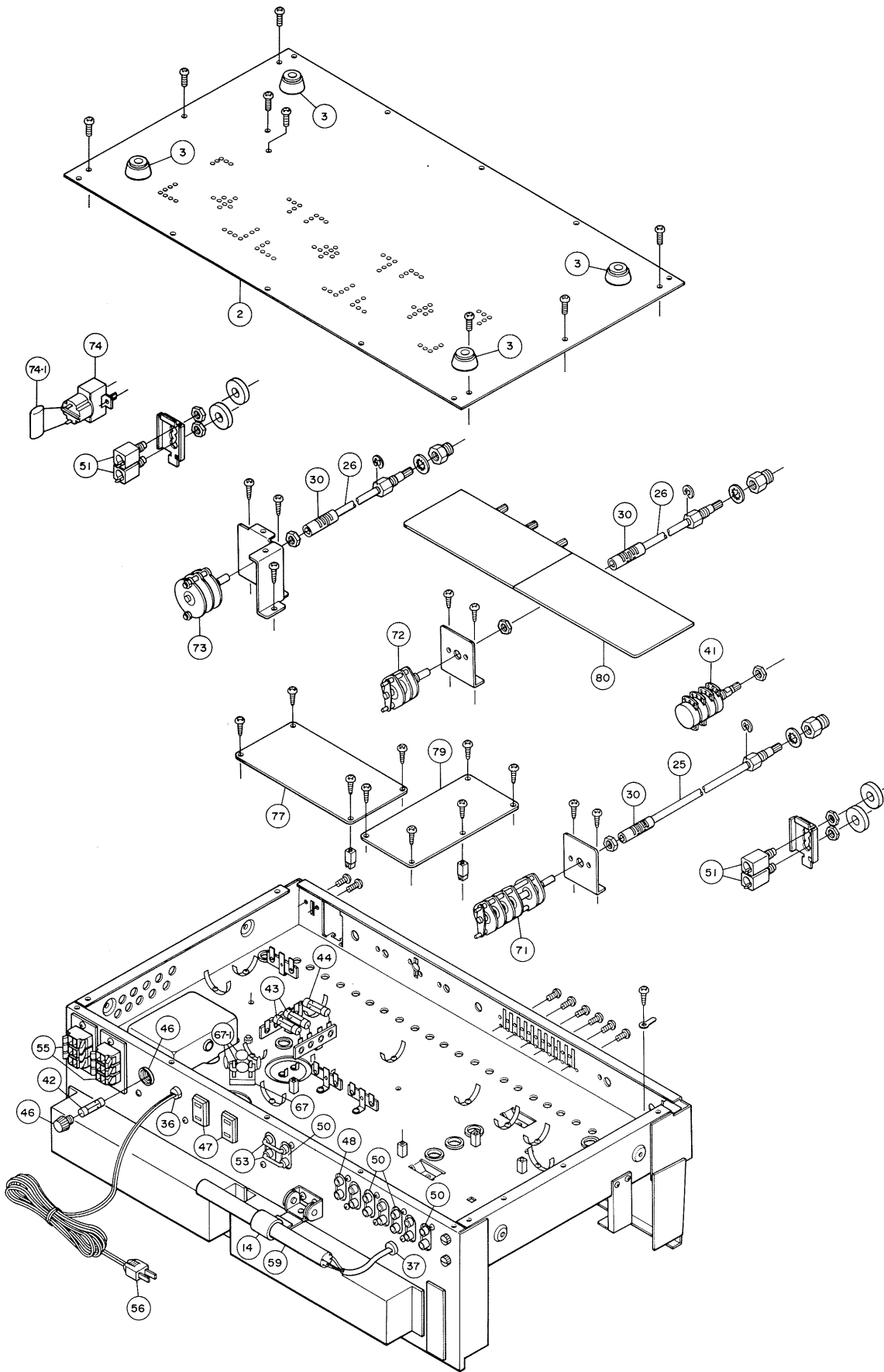


## EXPLODED VIEW OF CABINET AND CHASSIS FRONT & REAR MOUNTED ASSEMBLIES



# RS-1058

## EXPLODED VIEW OF CHASSIS BOTTOM MOUNTED ASSEMBLIES



# PARTS LIST

## CABINET PARTS LIST

Ref. No.	Part Number	Description
1	1310 1101 08700	Cabinet Assy
2	* 1312 1105 17800	Plate Bottom
3	* 1312 1801 13200	Leg

## APPEARANCE PARTS LIST

Ref. No.	Part Number	Description
4	1310 1001 35500	Knob, Controls
5	1310 1001 41500	Knob, Tuning
6	1310 1001 36000	Knob, Volume
7	1312 1601 40400	Knob, Balance
8	1310 1001 36100	Knob, Lever Switch
9	1310 1016 24800	Panel Decorate Assy (RS-1056)
9	1310 1016 24900	Panel Decorate Assy (RS-1058)
10	1310 3011 16800	Dial Pointer Assy
11	1312 1201 28400	Plate Dial (RS-1056)
11	1312 1201 28500	Plate Dial (RS-1058)

## CHASSIS PARTS LIST

Ref. No.	Part Number	Description
12	1310 3002 11300	Drum Assy Tuning Gang
13	1310 3003 19100	Tuning Shaft Assy
14	1310 3008 11702	Support, Antenna Assy
15	* 1310 3020 05800	Pulley Assy Panel Rear
16	* 1310 3020 07400	Pulley Assy Panel Front (Left)
17	* 1310 3020 07500	Pulley Assy Chassis (Right)
18	1312 1410 15100	Cover Power Transistor (RS-1056)
18	1312 1410 15400	Cover Power Transistor (RS-1058)
19	* 1312 3301 21900	Chassis
20	* 1312 3305 20300	Panel Front
21	* 1312 3306 22603	Panel Rear (RS-1056)
21	* 1312 3306 22604	Panel Rear (RS-1058)
23	1312 3621 00400	Clamp, 75 ohm Coax.
24	1312 3621 00500	Base, Coax. Clamp
25	1312 4103 11400	Metal Shaft Rotary SW (Long)
26	1312 4103 11500	Metal Shaft Rotary SW (Short)
27	1312 4111 00400	Tension Spring
28	1312 4112 10200	Dial Cord
29	1312 4120 11700	Slide Rail Dial Pointer
30	1312 4121 00100	Coupling (Nylon)
31	131 2 4201 12701	Screw, Panel Rear
32	1312 4201 15400	Screw, Panel Rear (Ground)
33	1312 6110 23701	Housing, Dial Lamp P.C.B.
34	1312 6110 26100	Housing, Meter Lamp
35	1312 6110 26200	Housing, Meter
36	1312 6111 11300	Bushing, Line Cord
37	1312 6111 14200	Bushing, AM Antenna Lead
38	1312 6111 19700	Housing, Stereo Beacon Lamp (RS-1056)
38	1312 6111 19800	Housing, Stereo Beacon Lamp (RS-1058)
39	1312 6201 23100	Heat Sink (RS-1056)
39	1312 6201 23200	Heat Sink (RS-1058)

NOTE: \* Asterisk indicates not a service part

# PARTS LIST

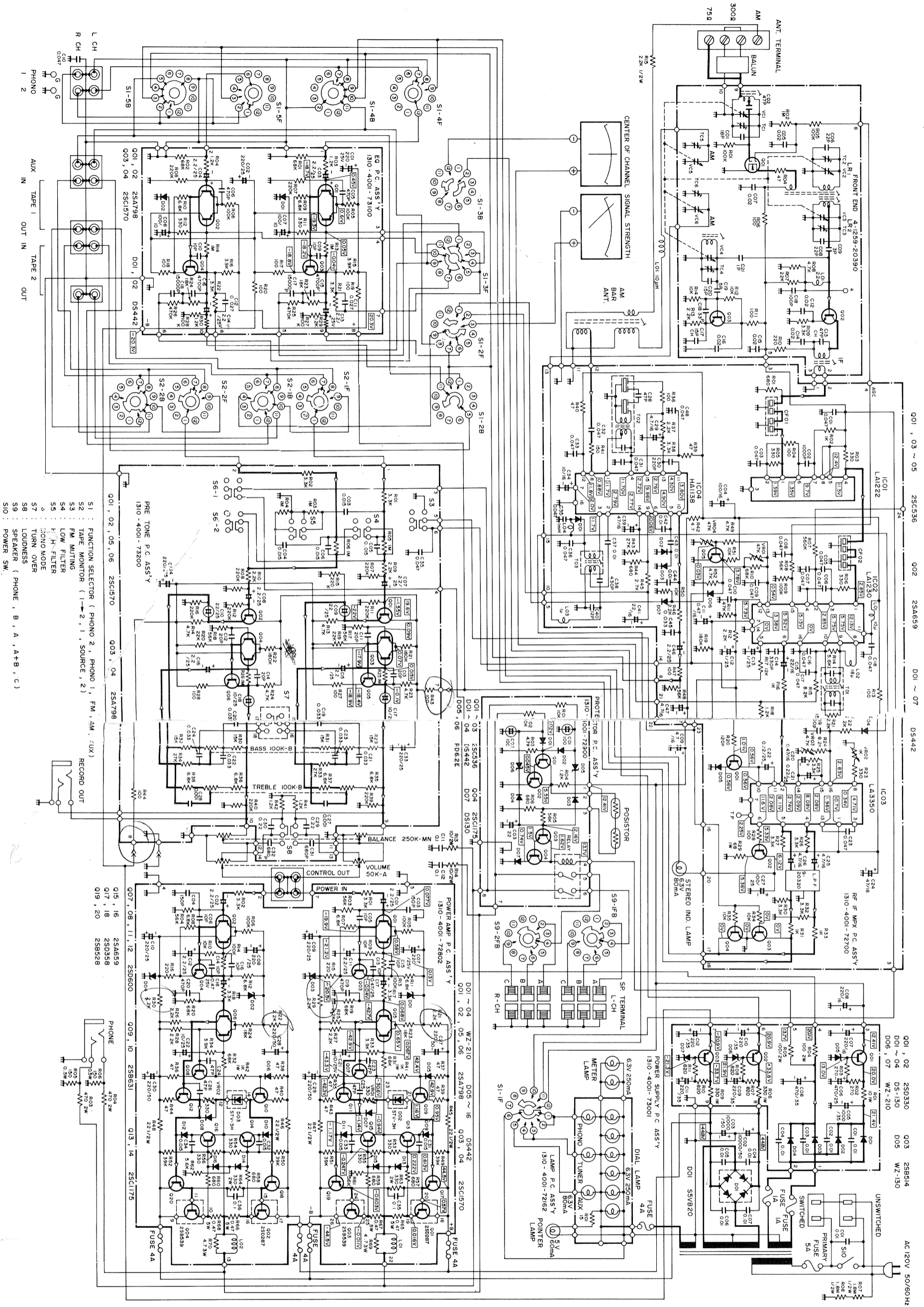
## ELECTRICAL PART LIST

Ref. No.	Part Number	Description	Ref. No.	Part Number	Description
40	4 1259 20390	Front End (Component parts used in Front End are not serviceable and available.)	C08	C1CRE-227A	Cap. Electrolytic 220 $\mu$ F 16V
41	4 2229 25490	VR A-50k, MN-250k	C09	C1EUEM475A	Cap. Alsicon 4.7 $\mu$ F 25V $\pm$ 20 %
42	4 2349 20910	Fuse 5A AC	C10	C1HYDZ473A	Cap. Ceramic 0.047 $\mu$ F 50V +80,-20 %
43	4 2349 21300	Fuse 1A	C11	C1HFRM104A	Cap. Mylar 0.1 $\mu$ F 50V $\pm$ 20 %
44	4 2349 21310	Fuse 4A (RS-1056)	67	DDD-S5VB20	Diode S5VB20 (Power Supply)
44	4 2349 21380	Fuse 5A (RS-1058)	67-1	C2HYDP103A	Cap. Ceramic 0.01 $\mu$ F 500V +100, -0 %
45	4 2359 20161	Holder Lamp (RS-1056)	(C04,05 06,07)		
45	4 2359 20160	Holder Lamp (RS-1058)	68	DAA-STV-3H-W	Diode STV-3H (Idling Bias)
46	4 2359 21110	Fuse Holder	69	TNN-2SD287A-Q	TR 2SD287A
47	4 2359 21960	Socket	(Q01,02)		
48	4 2359 22130	RCA Pin Jack 2P	70	TNN-2SB539A-Q	TR 2SB539A
49	4 2359 22440	Socket Transistor	(Q03,04)		
50	4 2359 22710	Socket 4P	R03,04	R3DXPK471A	Resistor Oxide Metal Film 470 ohm 2W $\pm$ 10 % (RS-1056)
51	4 2359 22730	Socket 1P	R03,04	R3DXPK561A	Resistor Oxide Metal Film 560 ohm 2W $\pm$ 10 % (RS-1058)
52	4 2369 20561	Plug 1P	R05,06	R2HXP151A	Resistor Oxide Metal Film 150 ohm 1/2W $\pm$ 10 %
53	4 2369 21220	Short Plug	R07,08	R2HCPK185A	Resistor Solid 1.8M 1/2W $\pm$ 10 %
54	4 2379 21460	Terminal, Antenna Connector	R09,10	R3DXPK561A	Resistor Oxide Metal Film 560 ohm 2W $\pm$ 10 % (RS-1058)
55	4 2379 21570	Terminal, Speakers Connector	R11,12	R2HXP151A	Resistor Oxide Metal Film 150 ohm 1/2W $\pm$ 10 %
56 *	4 2439 20720	Power Cord	R13,14	R3DXPK100A	Resistor Oxide Metal Film 10 ohm 2W $\pm$ 10 %
57 (T-1)	4 2519 23761	Power Trans (RS-1056)	71(S-01)	4 2319 34150	Switch Rotary Function
57 (T-1)	4 2519 24100	Power Trans (RS-1058)	72(S-02)	4 2319 34130	Switch Rotary Tape Monitor
58	4 2539 20430	Peaking Coil 10 $\mu$ H (L01)	73(S-09)	4 2319 34140	Switch Rotary Speaker
59	4 2579 25040	AM Antenna	74(S-10)	4 2319 34160	Switch Lever Power
60	4 2599 20300	Balun	74-1	C2JNRM103C	Capacitor Polypropilene 0.01 $\mu$ F 630V $\pm$ 20 %
61	4 5119 20670	Meter, Signal Strength	(C01)		
62	4 5119 20680	Meter, Center of Channel	75 *	1310 4001 72700	AM, FM RF/IF MPX PC Assy
63	4 6129 20280	Pilot Lamp 6.3V 250mA	76 *	1310 4001 72802	Power AMP PC Assy (RS-1056)
64	4 6129 20592	Small Lamp Indicator 5V 60mA	76 *	1310 4001 72803	Power AMP PC Assy (RS-1058)
65	H11-PTH487A-BE	Posistor Protector	77 *	1310 4001 72900	Protector PC Assy
R15	R2HCPK222A	Resistor Solid 2.2kohm 1/2W $\pm$ 10 %	78 *	1310 4001 73001	Power Supply PC Assy (RS-1056)
66	4 2239 20990	Capacitor Electrolytic 10000 $\mu$ F 50V (RS-1056)	78 *	1310 4001 73002	Power Supply PC Assy (RS-1058)
(C02,03)			79 *	1310 4001 73100	EQ PC Assy
66	4 2239 21160	Capacitor Electrolytic 15000 $\mu$ F 63V (RS-1058)	80 *	1310 4001 73200	PRE Tone PC Assy (RS-1056)
(C02,03)			80 *	1310 4001 74900	PRE Tone PC Assy (RS-1058)
			81 *	1310 4001 72162	Dial Lamp PC Assy (RS-1056)
			81 *	1310 4001 72163	Dial Lamp PC Assy (RS-1058)

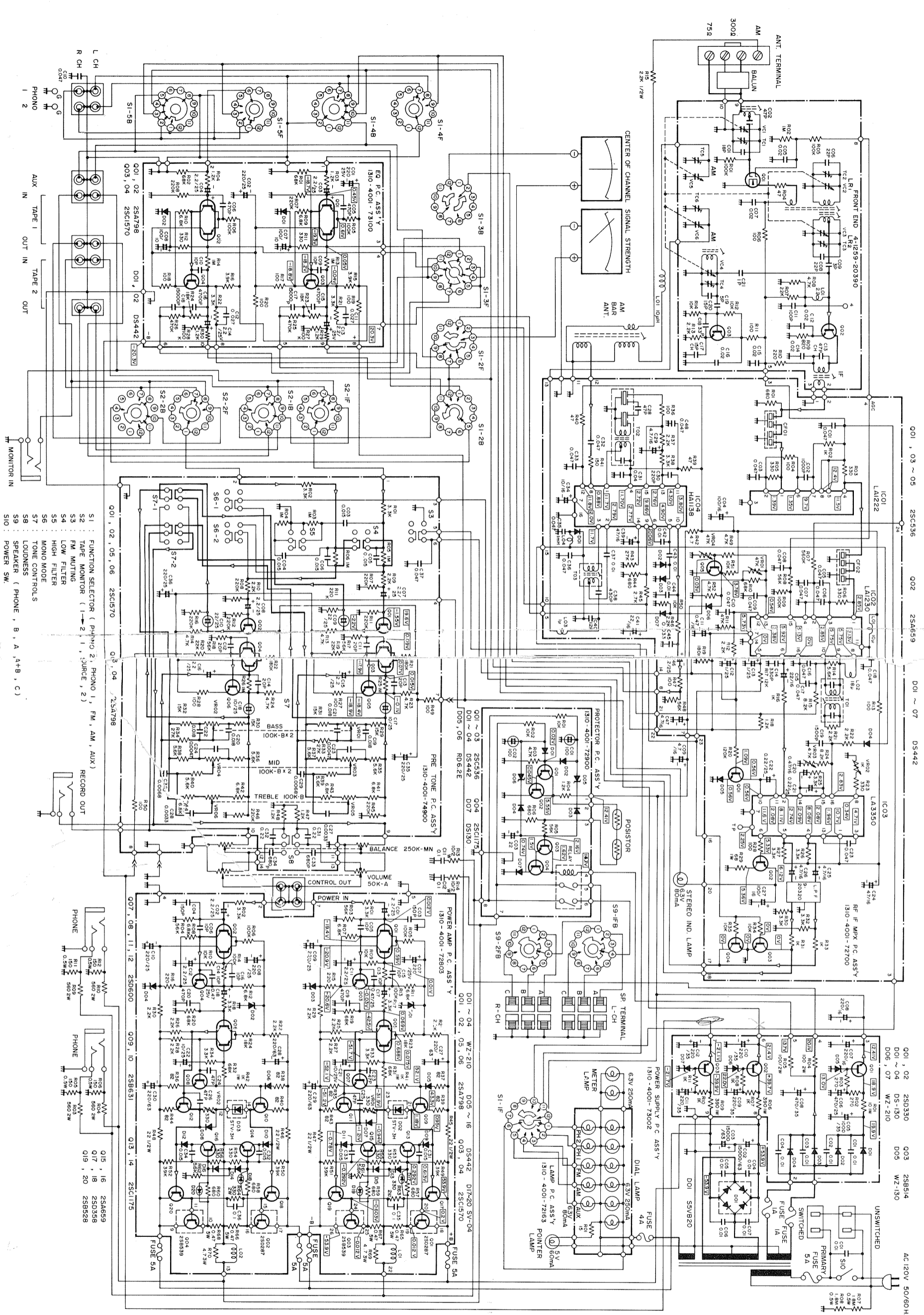
NOTE: \* Asterisk indicates not a service part

# SCHEMATIC DIAGRAM

RS-1056



# SCHEMATIC DIAGRAM

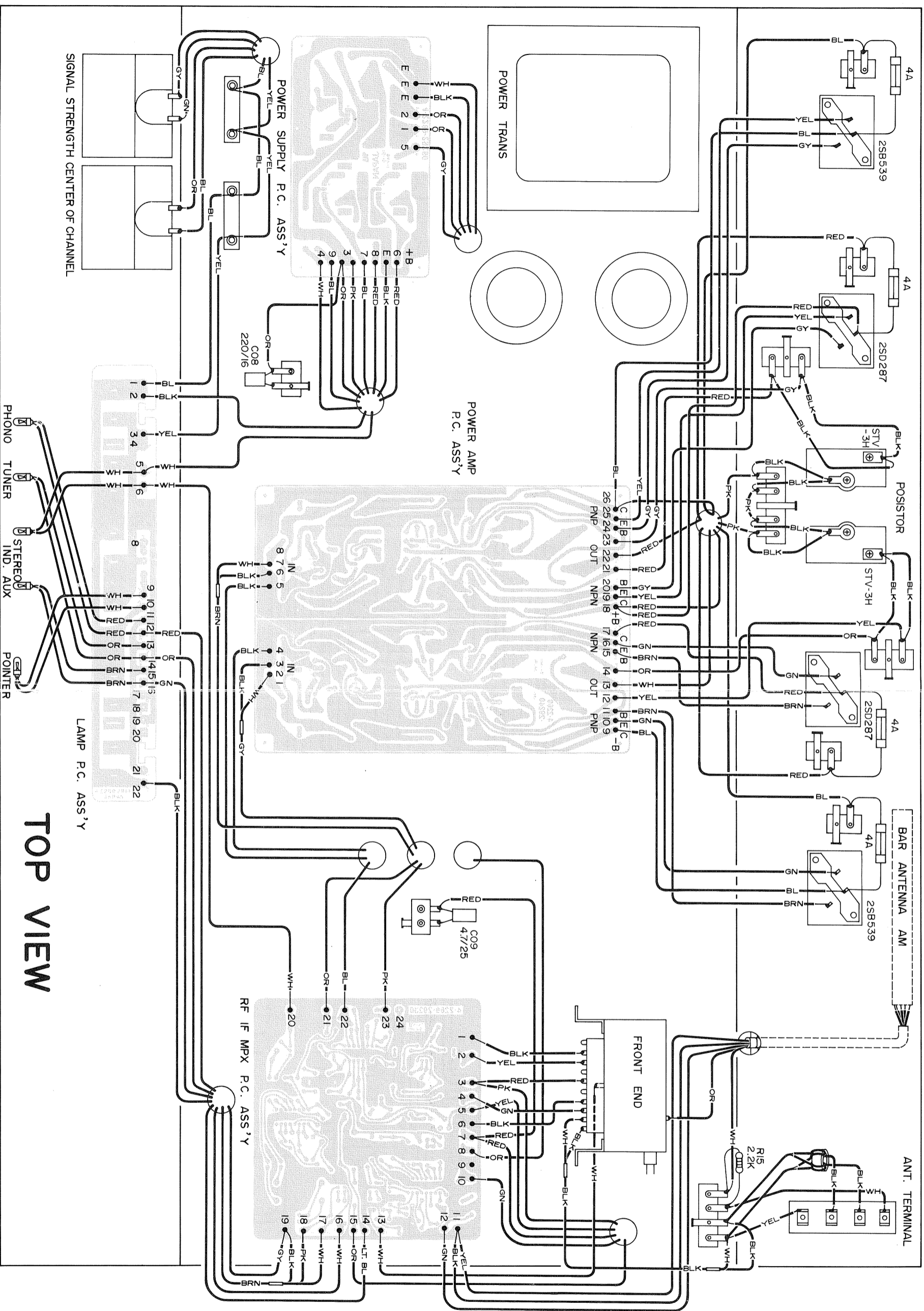


001, 03 ~ 05 25C536 002 25A659 DO1 ~ 07 DS442  
 001, 02 25D330 003 25B514 AC 120V 50/60Hz  
 DO1 ~ 04 DS-130 DO5 WZ-210  
 DO6, 07 WZ-210  
 009, 10 25B631 Q13, 14 25C175  
 001, 02, 05, 06 25C1570 Q13, 04 25A798  
 001, 02 25A798 DO1, 02 DS442  
 003, 04 25C1570

- S1: TAPING SELECTOR (PHONE 1, FM, AM, AUX)
- S2: TAPING MONITOR (1-2, 1, SOURCE, 2)
- S3: FM MUTING
- S4: LOW FILTER
- S5: HIGH FILTER
- S6: MONO MODE
- S7: TONE CONTROLS
- S8: LOUDNESS
- S9: SPEAKER (PHONE, B, A, A+B, C)
- S10: POWER SW.

# POINT TO POINT WIRING DIAGRAM

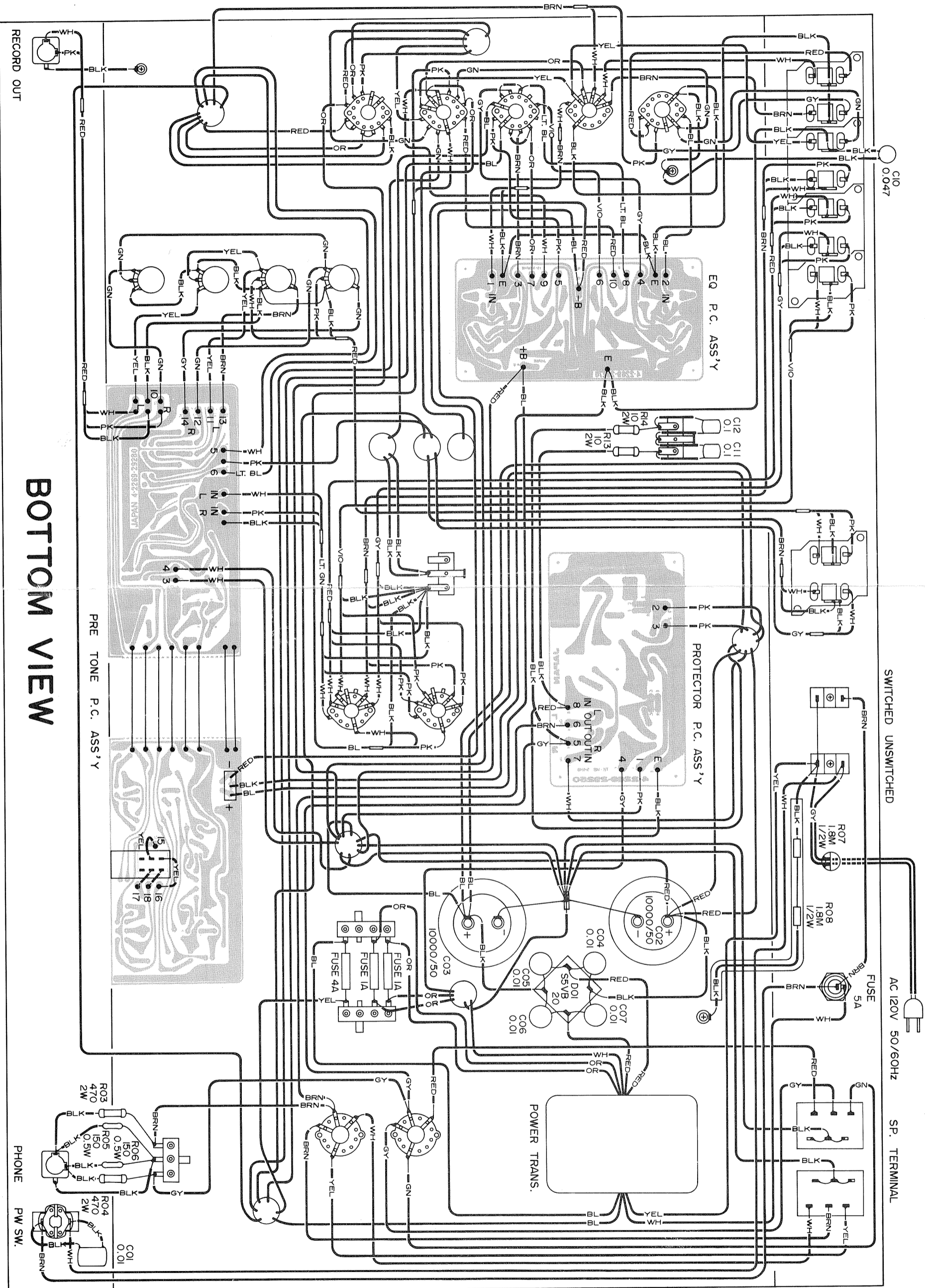
RS-1056



## TOP VIEW



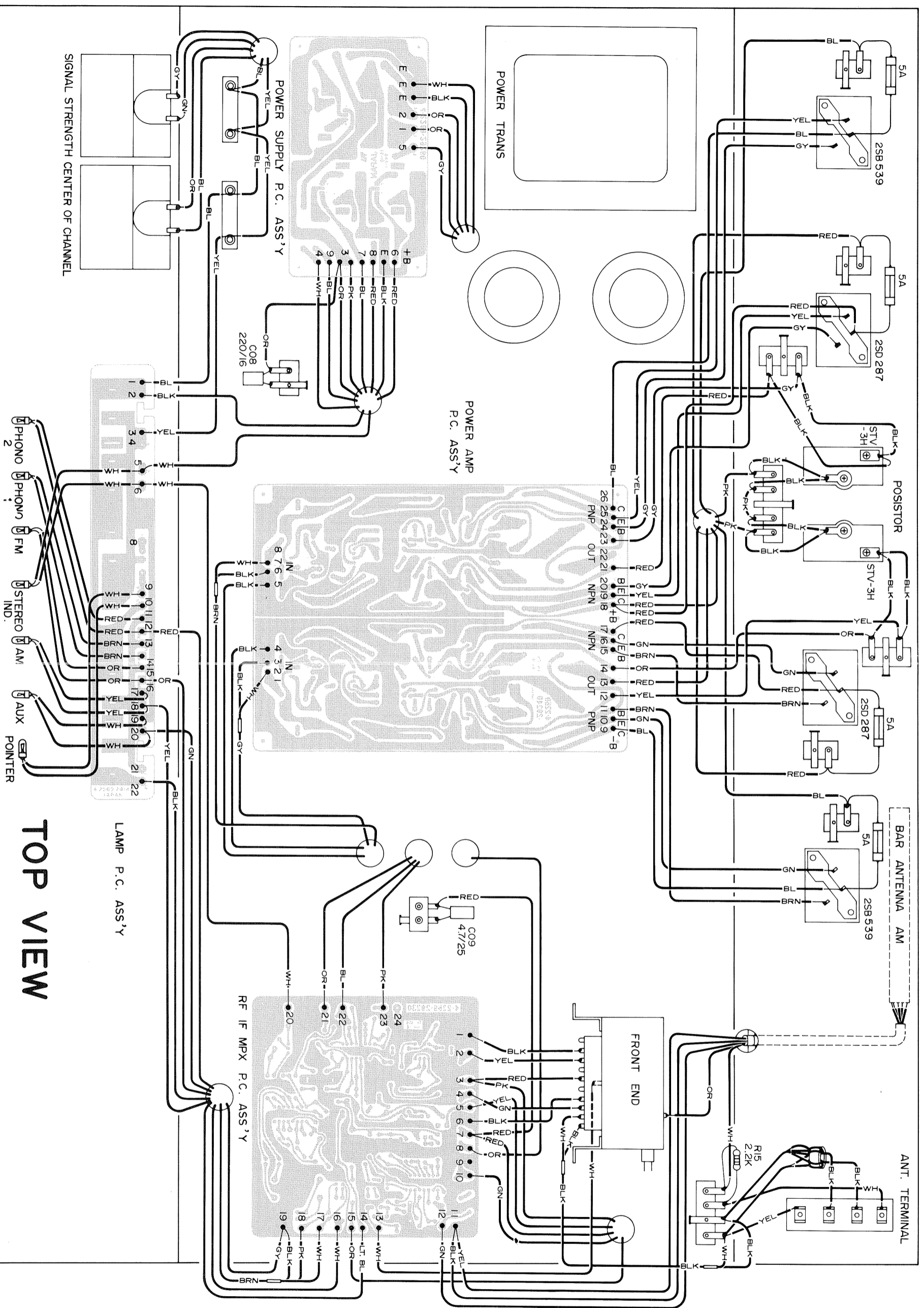
# POINT TO POINT WIRING DIAGRAM



## BOTTOM VIEW

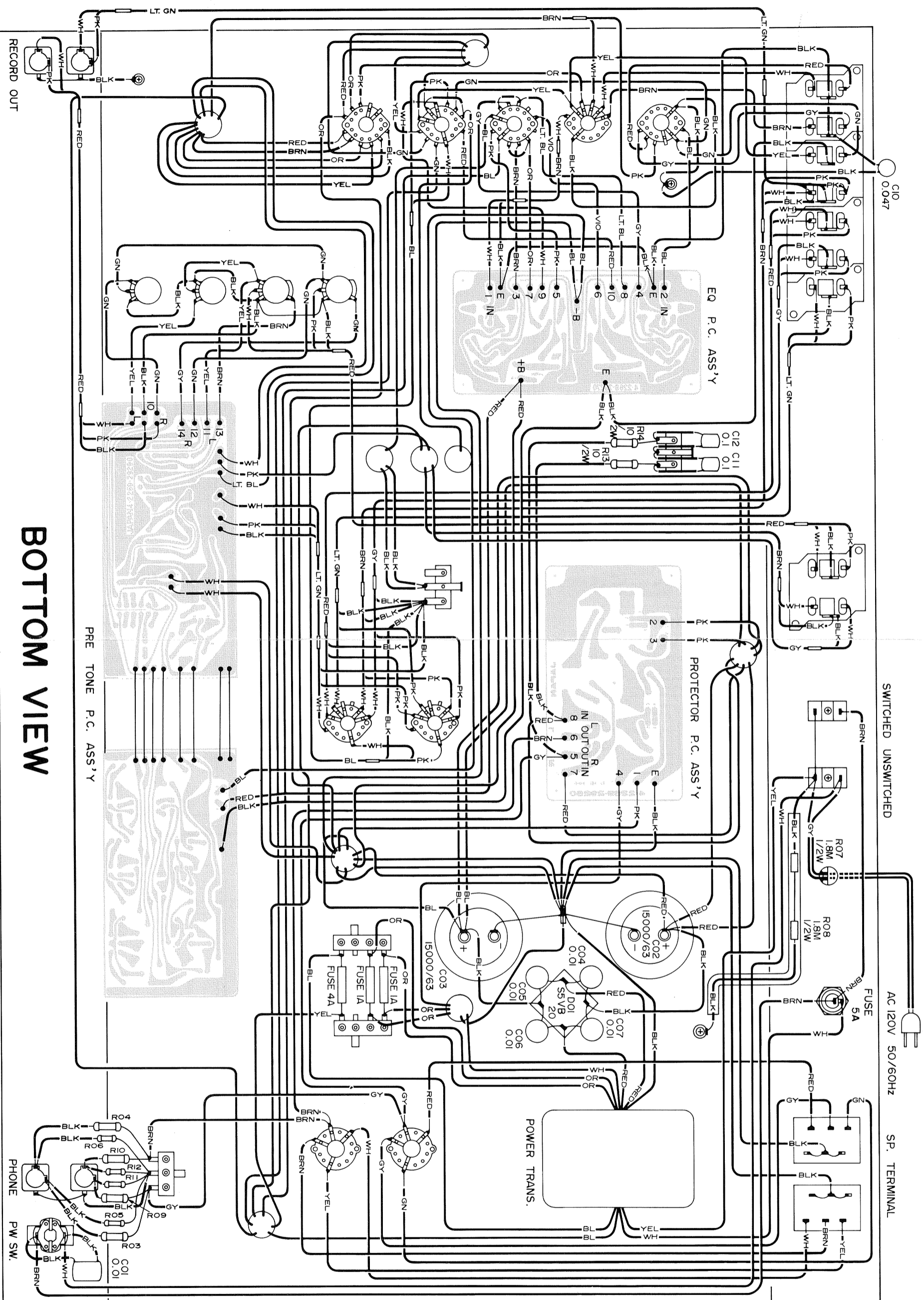
# POINT TO POINT WIRING DIAGRAM

RS-1058



TOP VIEW

# POINT TO POINT WIRING DIAGRAM



## BOTTOM VIEW