
THE FISK RADIOLA

Models 92Y, 84Y, 92X and 84X

**FOUR VALVE (92X and Y), AND FIVE VALVE (84X and Y),
ONE BAND, A.C. OPERATED SUPERHETERODYNES**

Technical Information & Service Data

ELECTRICAL SPECIFICATIONS

TUNING RANGE. "Standard Medium Wave": 1600-550 K.C. R.F. ALIGNMENT SETTINGS.
600 K.C. (Osc.), 1500 K.C. (Osc. and Aer.)

INTERMEDIATE FREQUENCY 455 K.C.

POWER SUPPLY RATING 200-260 V., 50-60 cycles
(Instruments with other voltage and frequency ratings available.)

POWER CONSUMPTION Model 92Y, 40 watts; Model 84Y, 42 watts;
Model 92X, 60 watts; Model 84X, 62 watts.

VALVE COMPLEMENT.

MODEL 92Y.	MODEL 92X.	MODEL 84Y.	MODEL 84X.
6A8G Converter.	6A8G Converter.	6A8G Converter.	6A8G Converter.
6G8G I.F. Amp. and Det.	6G8G I.F. Amp. and Det.	6U7G I.F. Amplifier.	6U7G I.F. Amplifier.
6V6G Output.	6V6G Output.	6B6G Det., A.V.C. and A.F. Amp.	6B6G Det., A.V.C. and A.F. Amp.
6X5GT Rectifier.	5Y3G Rectifier.	6V6G Output.	6V6G Output.
		6X5GT Rectifier.	5Y3G Rectifier.

LOUDSPEAKER5 inch, Type AA4.

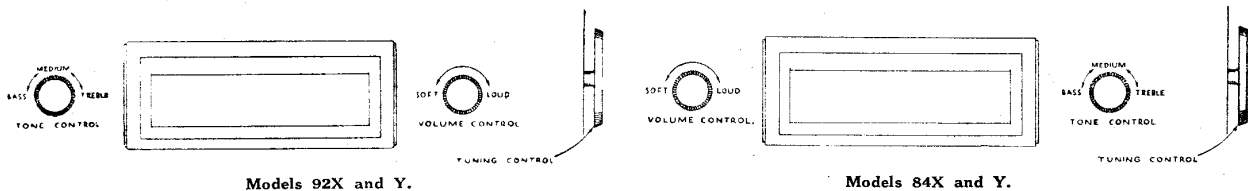
Loudspeaker Transformer XA2

 " Field Coil Resistance 1000 ohms

 " Voice Coil Impedance 3 ohms at 400 cycles

UNDISTORTED POWER OUTPUT4 watts

CONTROLS.



DIAL LAMPS (2) 6.3V., .25 Amp.

ALIGNMENT PROCEDURE.

Alignment should be necessary only when adjustments have been altered from the factory setting or when repairs have been made to the tuned circuits. Climatic conditions should not seriously affect the Receiver.

It is important to apply a definite procedure, as given in this booklet, and to use adequate and reliable test equipment. Instruments ideally suited to the requirements are either the A.W.A. Junior Signal Generator, Type 2R3911, or the A.W.A. Modulated Oscillators, Types J6726 and C1070. If either of the latter instruments is used, see that a 250,000 ohms resistor is connected between the output terminals of the instrument.

Perform alignment in the proper order as shown in the chart, starting from No. 1 and following all operations across, then No. 2, etc. Adjustment locations are shown in the layout diagrams.

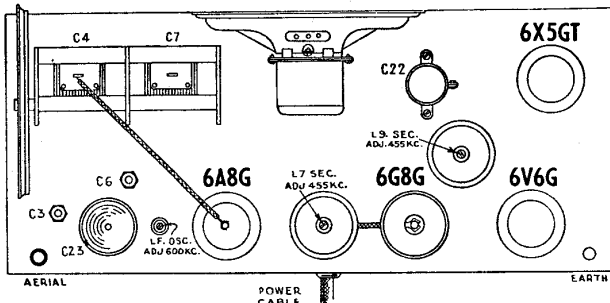
Keep the Volume Control set in the maximum clockwise position and regulate the output of the test instrument so that a minimum signal is introduced to the Receiver to give a standard indication on the output meter. This will avoid A.V.C. action and overloading.

When the Receiver has been satisfactorily aligned, seal the adjusting screws with a small quantity of celluloid cement to eliminate the possibility of their shifting.

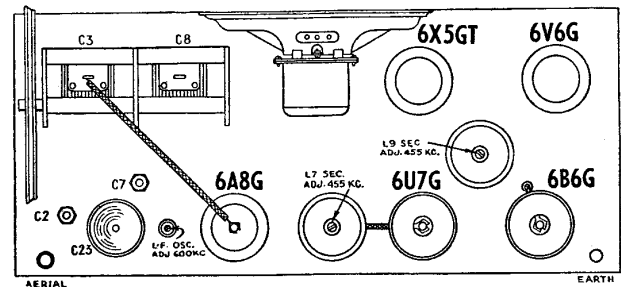
ALIGNMENT TABLE

Alignment Order	Test Inst. Connection to Receiver	Test Instrument Setting	Receiver Dial Setting	Circuit to Adjust	Adjust for	
					Max. Peak Output 92Y	84Y
1.	*6A8G Grid Cap	455 K.C.	With Gang Closed	2nd I.F. Trans.	L9	L9
2.	*6A8G Grid Cap	455 K.C.	With Gang Closed	2nd I.F. Trans.	L8	L8
3.	*6A8G Grid Cap	455 K.C.	With Gang Closed	1st I.F. Trans.	L7	L7
4.	*6A8G Grid Cap	455 K.C.	With Gang Closed	1st I.F. Trans.	L6	L6
Repeat adjustments 1, 2, 3 and 4.						
5.	Aerial	600 K.C.	7600 K.C. (7ZL)	Oscillator	Core L5	Core L5
6.	Aerial	1500 K.C.	1500 K.C. (3AK)	Oscillator	C6	C7
7.	Aerial	1500 K.C.	1500 K.C. (3AK)	Aerial	C3	C2
Repeat adjustments 5, 6 and 7.						

* With grid clip connected. A .001 mfd condenser should be connected in series with the "hot" output lead of the test instrument.
 † Rock the Tuning Control back and forth through the signal. Reset the dial pointer to 600 K.C. if necessary. The pointer is soldered to the control wire and may be moved by applying a hot soldering iron to the connection.



Layout Diagram (Top View), Models 92X and Y.



Layout Diagram (Top View), Models 84X and Y.

The 6X5GT Rectifier Valve shown in the above diagrams is replaced with a 5Y3G in the case of the Models 92X and 84X.

SOCKET VOLTAGES (92-Y).

VALVE	Cathode to Chassis	Screen Grid to Chassis	Plate to Chassis	Plate Current	Filament
	Volts	Volts	Volts	M.A.	Volts
6A8G Converter ..	4.0	100	250	2.5	6.3
Oscillator ..	—	—	160	5.0	—
6G8G I.F. Amp., 2nd Det.	3.2	100	250	7.0	6.3
6V6G Output	12.5	250	230	35	6.3
6X5GT Rectifier	600/300 volts, 60 M.A. Total Current.				6.3

Voltage across loudspeaker field—60 volts.

Measured at 240 volts A.C. Supply. No signal input. Volume Control at Maximum clockwise.

SOCKET VOLTAGES (92-X).

VALVE	Cathode to Chassis	Screen Grid to Chassis	Plate to Chassis	Plate Current	Filament
	Volts	Volts	Volts	M.A.	Volts
6A8G Converter	4.0	100	250	2.5	6.3
Oscillator	—	—	160	5.0	—
6G8G I.F. Amp. 2nd Det.	3.0	100	250	7.0	6.3
6V6G Output	12.5	250	230	35	6.3
5Y3G Rectifier	640/320 Volts, 60 M.A. Total Current				5.0

Voltage across loudspeaker field—60 Volts.

Measured at 240 volts A.C. Supply. No signal input.
 Volume Control at maximum clockwise.

SOCKET VOLTAGES (84-Y).

VALVE	Bias Volts	Screen Grid to Chassis	Plate to Chassis	Plate Current	Heater
		Volts	Volts	M.A.	Volts
6A8G Converter	-3*	90	230	2.5	6.3
Oscillator	—	—	150	4	—
6U7G I.F. Amp.	-3*	90	230	7	6.3
6B6G 2nd Det.	0	—	120*	0.4	6.3
6V6G Output	12.5	230	215	34	6.3
6X5GT Rectifier	600/300 volts, 60 M.A. Total Current.				6.3

Voltage across loudspeaker field—60 volts.

*Cannot be measured with ordinary voltmeter.

Measured at 240 volts A.C. Supply. No signal input. Volume Control at maximum clockwise.

SOCKET VOLTAGES (84-X).

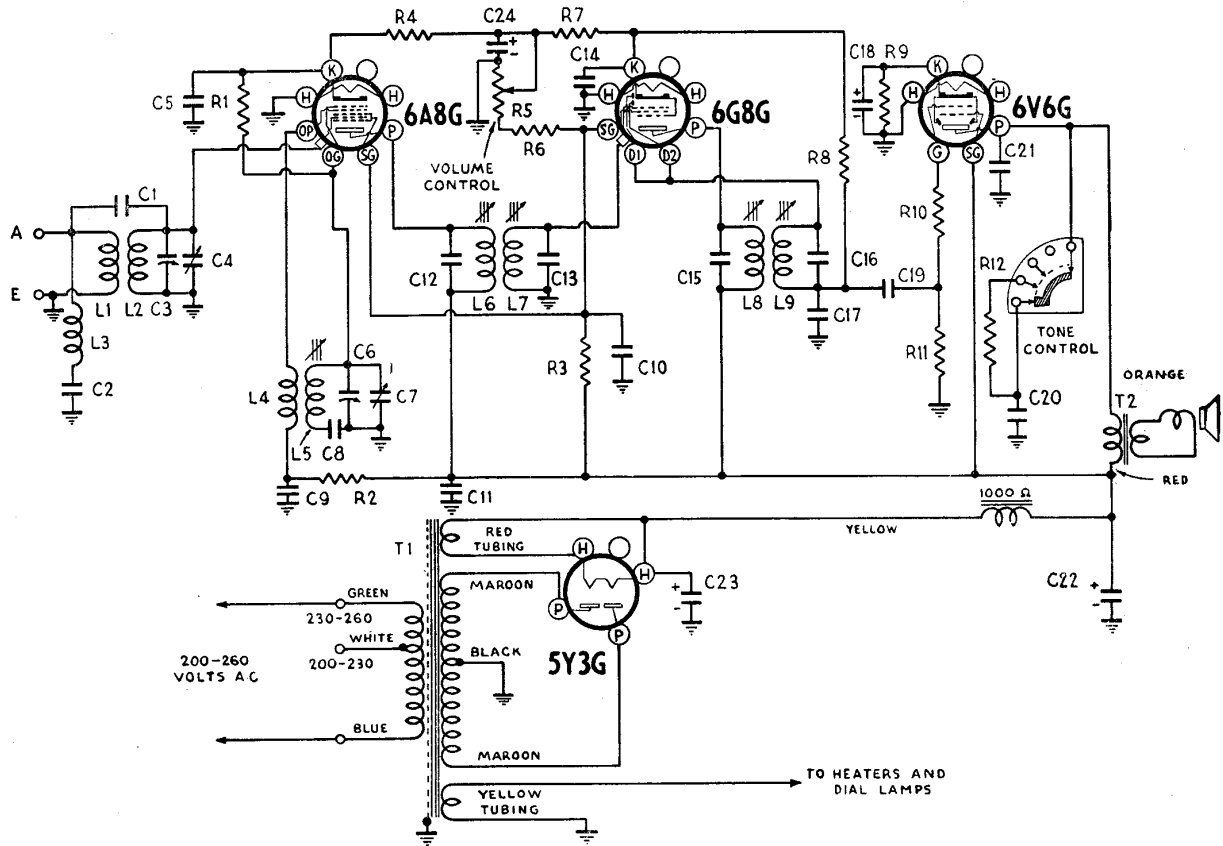
VALVE	Bias Volts	Screen Grid to Chassis	Plate to Chassis	Plate Current	Heater
		Volts	Volts	M.A.	Volts
6A8G Converter	-3*	95	250	2.5	6.3
Oscillator	—	—	160	4	—
6U7G I.F. Amp	-3*	95	250	8.0	6.3
6B6G 2nd Det.	0	—	120*	0.5	6.3
6V6G Output	12.5	250	230	35	6.3
5Y3G Rectifier	640/320 Volts, 60 M.A. Total Current				5.0

Voltage across loudspeaker field—60 Volts.

*Cannot be measured with ordinary voltmeter.

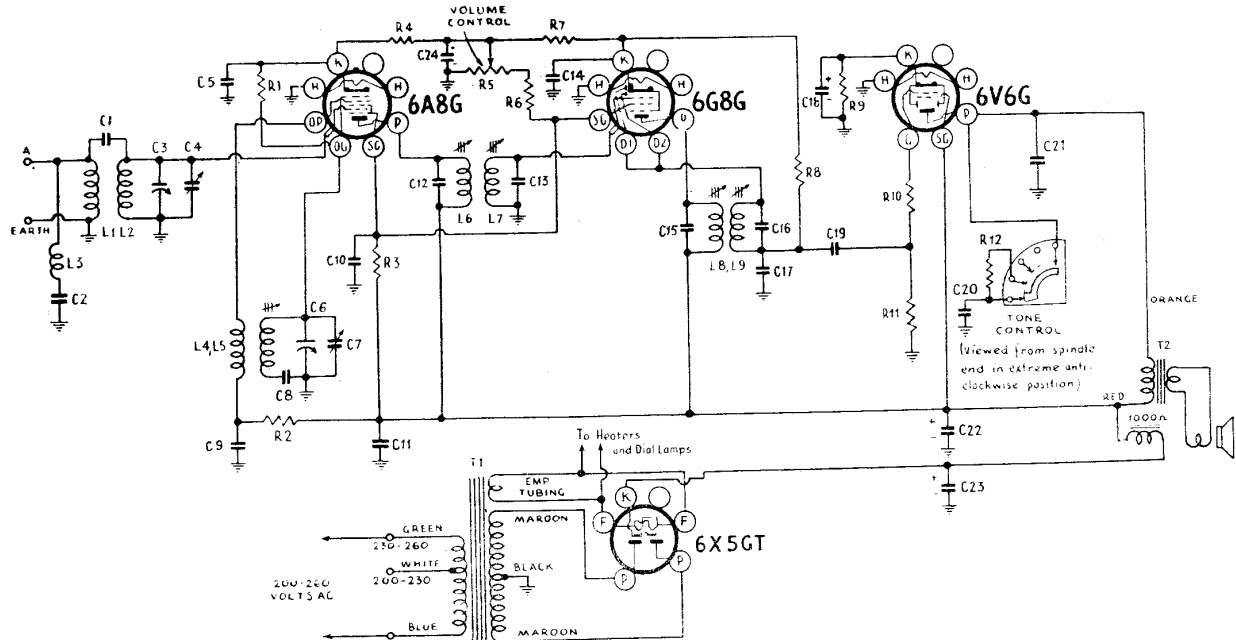
Measured at 240 Volts A.C. Supply. No signal input.
 Volume Control at maximum clockwise.

CIRCUIT DIAGRAM AND CODE—Model 92X



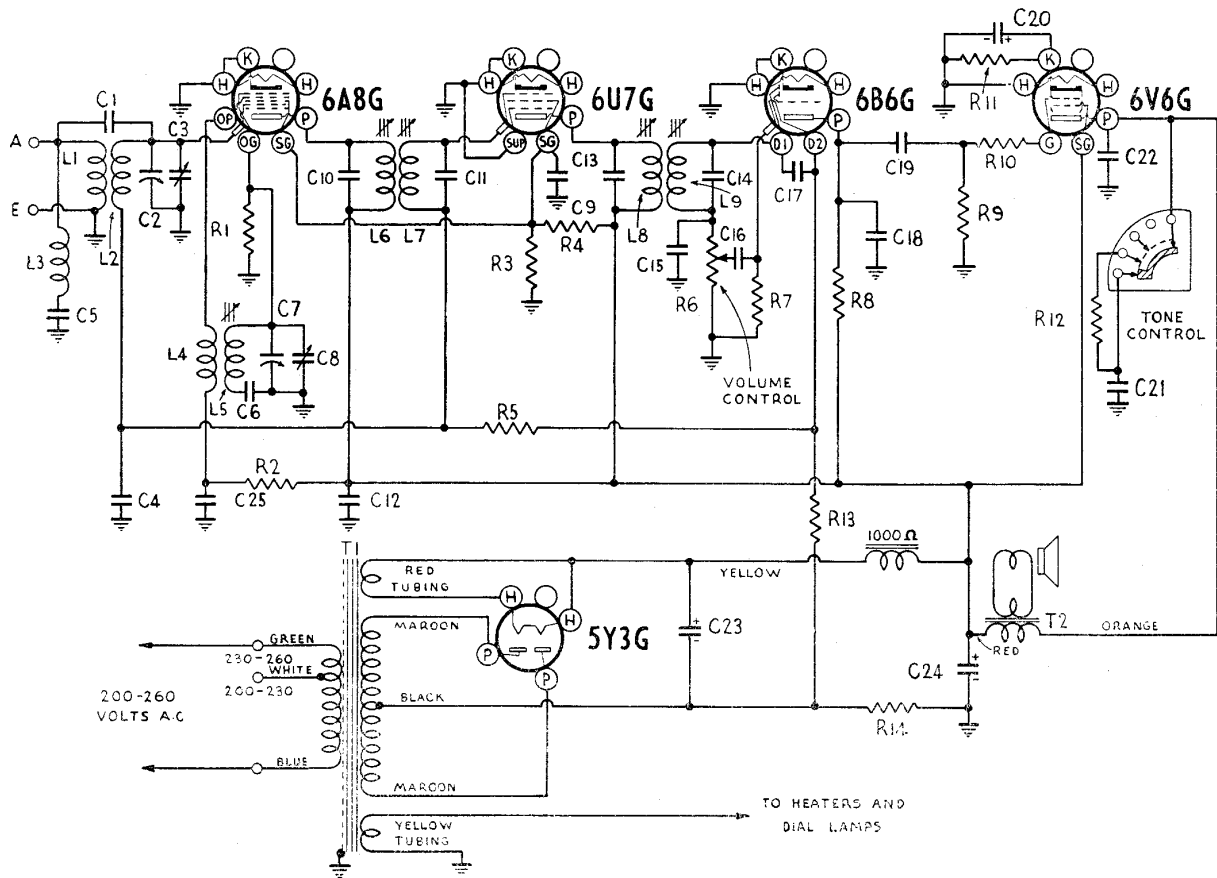
Code No.	Part No.	COILS.	Code No.	Part No.	CONDENSERS.	
L1, L2	7647	Aerial Coil.	R6	40,000 ohms 1 W.	C9	.05 mfd Paper
L3, C2	9382	Filter Unit.	R7	400 ohms 1/3 W.	C10	.1 mfd Paper
L4, L5	7638	Oscillator Coil	R8	500,000 ohms 1/3 W.	C11	.1 mfd Paper
L6, L7	9315	1st I.F. Transformer	R9	325 ohms Wire Wound	C12	70 mmfd Silvered Mica
L8, L9	9316	2nd I.F. Transformer	R10	50,000 ohms 1/3 W.	C13	70 mmfd Silvered Mica
TRANSFORMERS.			R11	500,000 ohms 1/3 W.	C14	.1 mfd Paper
T1	7635	Power Transf. 50-60c.	R12	5,000 ohms 1/3 W.	C15	70 mmfd Silvered Mica
T1	7636	Power Transf. 40c.	CONDENSERS.			
T2	XA2	Loudspeaker Transformer	C1	4 mmfd Mica	C16	70 mmfd Silvered Mica
RESISTORS.			C2	50 mmfd Silvered Mica	C17	110 mmfd Mica (L)
R1	50,000 ohms 1/3 W.	C3	5462A 6-14 mmfd Air Trimmer	C18	25 mfd 40 V. Electro.	
R2	20,000 ohms 1 W.	C4	7645 Tuning Condenser	C19	.05 mfd Paper	
R3	20,000 ohms 2 W.	C5	.1 mfd Paper	C20	.05 mfd Paper	
R4	300 ohms 1/3 W.	C6	4849A 16-24 mmfd Air Trimmer.	C21	.02 mfd Paper	
R5	9024 4,000 ohms W.W. Vol. Cont.	C7	7645 Tuning Condenser	C22	8 mfd., 525V. Dry Electro.	
		C8	420 mmfd Mica (Padder)	C23	8 mfd., 500V. Wet Electro.	
				C24	25 mfd., 40V. Electro.	

CIRCUIT DIAGRAM AND CODE—Model 92Y



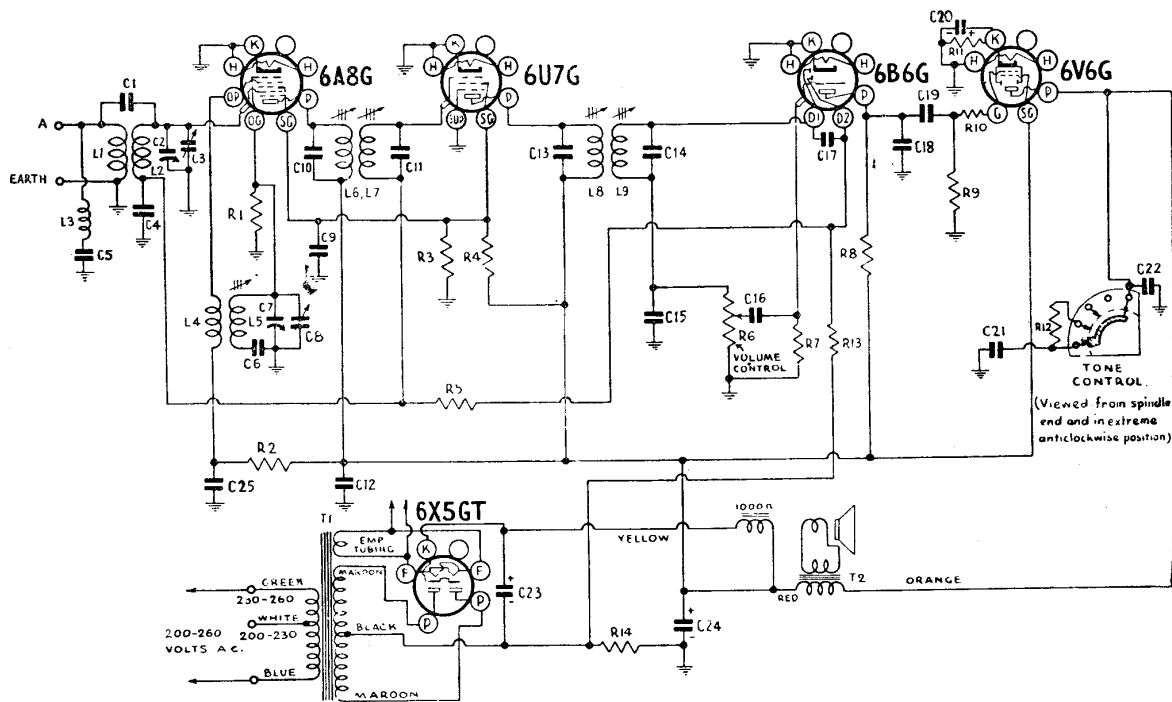
Code No.	Part No.	COILS.	Code No.	Part No.	CONDENSERS.	Code No.	Part No.	RESISTORS.
L1, L2	7647	Aerial Coil.	R5	9024	4,000 ohms W.W. Vol. Cont.	C8		420 mmfd Mica (Padder)
L3, C2	9382	Filter Unit.	R6		40,000 ohms 1 W.	C9		.05 mfd Paper
L4, L5	7638	Oscillator Coil.	R7		400 ohms 1/3 W.	C10		.1 mfd Paper
L6, L7	9315	1st I.F. Transformer.	R8		500,000 ohms 1/3 W.	C11		.1 mfd Paper
L8, L9	9316	2nd I.F. Transformer.	R9		325 ohms Wire Wound.	C12		70 mmfd Silvered Mica
TRANSFORMERS.			R10		50,000 ohms 1/3 W.	C13		70 mmfd Silvered Mica
T1	10229A	Power Transformer 50-60 c.	R11		500,000 ohms 1/3 W.	C14		.1 mfd Paper
T1	10231A	Power Transformer 40 c.	R12		5,000 ohms 1/3 W.	C15		70 mmfd Silvered Mica
T2	XA2	Loudspeaker Transformer				C16		70 mmfd Silvered Mica
			Code No. Part No. CONDENSERS.			C17		110 mmfd Mica (L.)
C1		4 mmfd Mica	C1		4 mmfd Mica	C18		25 mfd 40 V. Electro.
C2		50 mmfd Silvered Mica	C2		50 mmfd Silvered Mica	C19		.05 mfd Paper
C3		5462A 6-14 mmfd Air Trimmer	C3		5462A 6-14 mmfd Air Trimmer	C20		.05 mfd Paper
C4		7645 Tuning Condenser	C4		7645 Tuning Condenser	C21		.02 mfd Paper
C5		.1 mfd Paper	C5		.1 mfd Paper	C22		8 mfd, 525 V. Dry Electro.
C6		4849A 16-24 mmfd Air Trimmer	C6		4849A 16-24 mmfd Air Trimmer	C23		8 mfd 500 V. Wet Electro.
C7		7645 Tuning Condenser	C7		7645 Tuning Condenser	C24		25 mfd 40 Volt Electro.
R1		50,000 ohms 1/3 W.						
R2		20,000 ohms 1 W.						
R3		20,000 ohms 2 W.						
R4		300 ohms 1/3 W.						

CIRCUIT DIAGRAM AND CODE—Model 84X

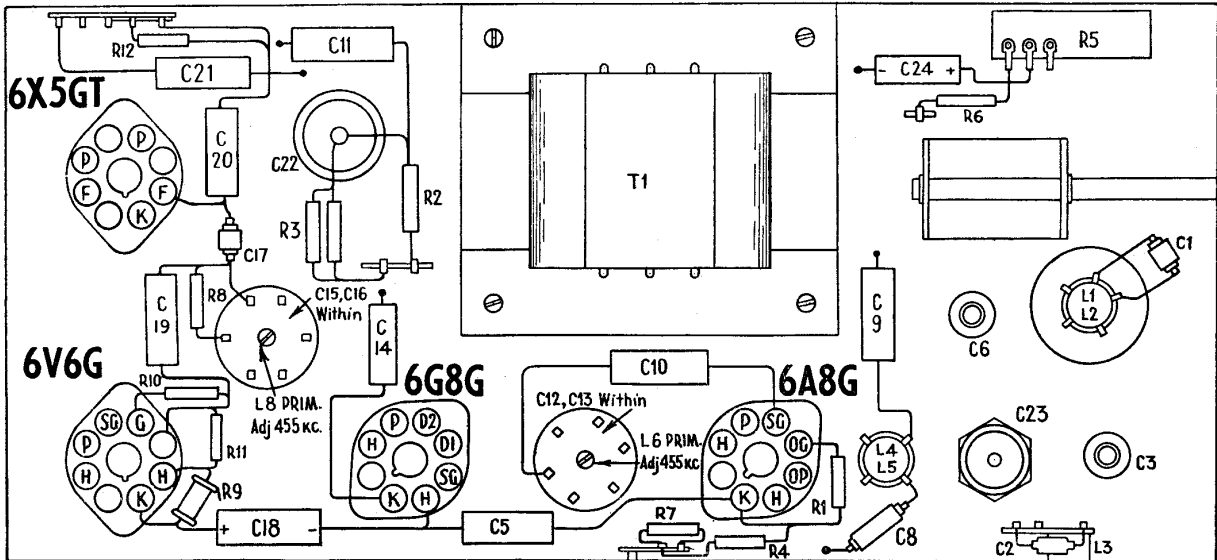


Code No.	Part No.	DESCRIPTION	Code No.	Part No.	DESCRIPTION	Code No.	Part No.	DESCRIPTION
		COILS.	R7		10 megohms 1 W.	C9		.1 mfd Paper
L1, L2	7647	Aerial Coil	R8		250,000 ohms 1 W.	C10		70 mmfd Silvered Mica
L3, C5	9382	I.F. Filter	R9		500,000 ohms 1/3 W.	C11		70 mmfd Silvered Mica
L4, L5	7638	Oscillator Coil	R10		50,000 ohms 1/3 W.	C12		.1 mfd Paper
L6, L7	76392	1st I.F. Transformer	R11		325 ohms 3 W.	C13		115 mmfd Silvered Mica
L8, L9	76412	2nd I.F. Transformer	R12		5,000 ohms 1/3 W.	C14		115 mmfd Silvered Mica
		TRANSFORMERS	R13		1.75 meg. 1/3 W.	C15		110 mmfd Mica (L)
T1	7635	Power Transformer 50-60c.	R14		50 ohms 3 W.	C16		.01 mfd Paper
T1	7636	Power Transformer 40c.				C17		50 mmfd Mica (D)
T2	XA2	Loudspeaker Transformer				C18		350 mmfd Mica
		RESISTORS				C19		.01 mfd Paper
R1		50,000 ohms 1/3 W.	C1		4 mmfd Mica	C20		25 mfd., 40V. Electro.
R2		20,000 ohms 1 W.	C2		5462A 6-14 mmfd Air Trimmer	C21		.035 mfd Paper
R3		30,000 ohms 1 W.	C3		7645 Tuning Condenser	C22		.02 mfd Paper
R4		20,000 ohms 2 W.	C4		.05 mfd Paper	C23		8 mfd., 500V. Electro.
R5		1.75 megohms 1/3 W.	C5		50 mmfd Silvered Mica	C24		8 mfd., 525V. Electro.
R6	7690	500,000 ohms Vol. Cont.	C6		420 mmfd Mica (Padder)	C25		.05 mfd Paper
			C7		4849A 16-24 mmfd Air Trimmer			
			C8		7645 Tuning Condenser			

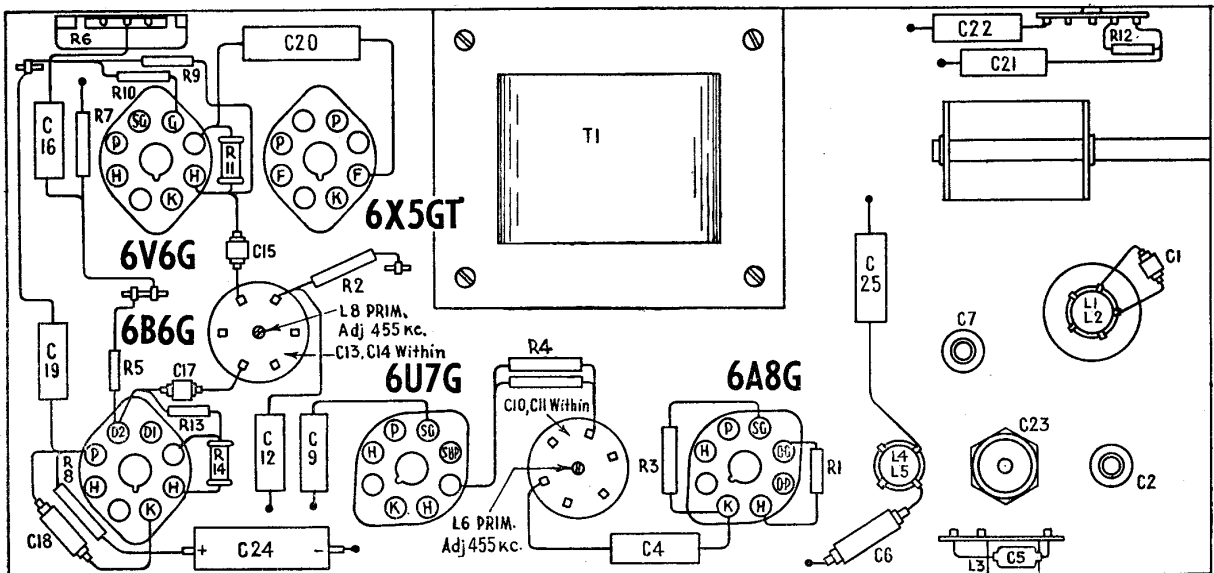
CIRCUIT DIAGRAM AND CODE—Model 84Y



Code No.	Part No.	DESCRIPTION	Code No.	Part No.	DESCRIPTION	Code No.	Part No.	DESCRIPTION
COILS.			R6	7690	500,000 ohms Vol. Cont.	C8	7645	Tuning Condenser
L1, L2	7647	Aerial Coil.	R7		10 megohms 1 W.	C9		.1 mfd Paper
L3, C5	9382	I.F. Filter	R8		250,000 ohms 1 W.	C10		70 mmfd Silvered Mica
L4, L5	7638	Oscillator Coil.	R9		500,000 ohms 1/3 W.	C11		70 mmfd Silvered Mica
L6, L7	7839Z	1st I.F. Transformer	R10		50,000 ohms 1/3 W.	C12		.1 mfd Paper
L8, L9	7641Z	2nd I.F. Transformer	R11		325 ohms 3 W.	C13		115 mmfd Silvered Mica
TRANSFORMERS.			R12		5,000 ohms 1/3 W.	C14		115 mmfd Silvered Mica
T1	10229A	Power Transformer 50-60 c.	R13		1.75 megohms 1/3 W.	C15		110 mmfd Mica (L.)
T1	10231A	Power Transformer 40 c.	R14		50 ohms 3 W.	C16		.01 mfd Paper
T2	XA2	Loudspeaker Transformer	CONDENSERS.			C17		50 mmfd Mica (D.)
RESISTORS.			C1		4 mmfd Mica	C18		350 mmfd Mica
R1		50,000 ohms 1/3 W.	C2	5462A	6-14 mmfd Air Trimmer	C19		.01 mfd Paper
R2		20,000 ohms 1 W.	C3	7645	Tuning Condenser	C20		25 mfd., 40 V. Electro.
R3		30,000 ohms 1 W.	C4		.05 mfd Paper	C21		.035 mfd Paper
R4		20,000 ohms 2 W.	C5		50 mmfd Silvered Mica	C22		.02 mfd Paper
R5		1.75 megohms 1/3 W.	C6		420 mmfd Mica (Padder)	C23		8 mfd., 500 V. Electro.
			C7	4849A	16-24 mmfd Air Trimmer	C24		8 mfd., 525 V. Electro.
						C25		.05 mfd Paper



Layout Diagram (Underneath View), Model 92X and Y.



Layout Diagram (Underneath View), Models 84X and Y.

The 6X5GT Rectifier Valve shown in the above diagrams is replaced with a 5Y3G in the case of the Models 92-X and 84-X.

MECHANICAL REPLACEMENT PARTS.

DESCRIPTION.	PART No.
Dial Pointer and Drive Wire	8405
Dial Pointer Tension Spring	1741
Drive Wire Jockey Pulleys	1730
Drive Drum	5068
Tuning Control Spindle	8119
Dial Scale	9799
Knobs—Volume and Tone Control	7482
Knob—Tuning Control (Colour to be specified)	7483
Dial Lamp Sockets	4194
Valve Sockets	4704
Valve Shields	8147
Valve Clips	7459
Loudspeaker Cone Assembly	8207
Moulded Cabinet	8302