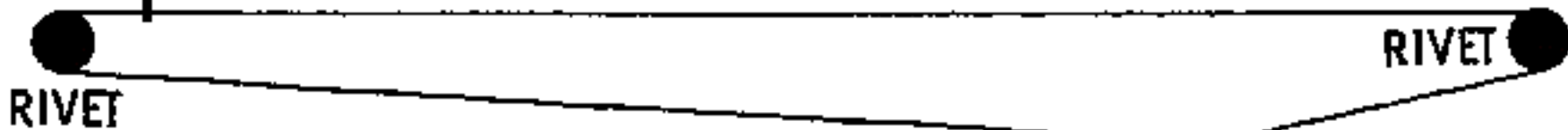
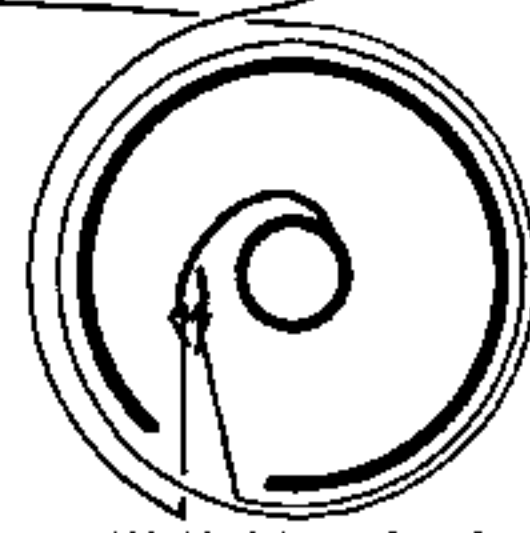


DIAL CORD STRINGING

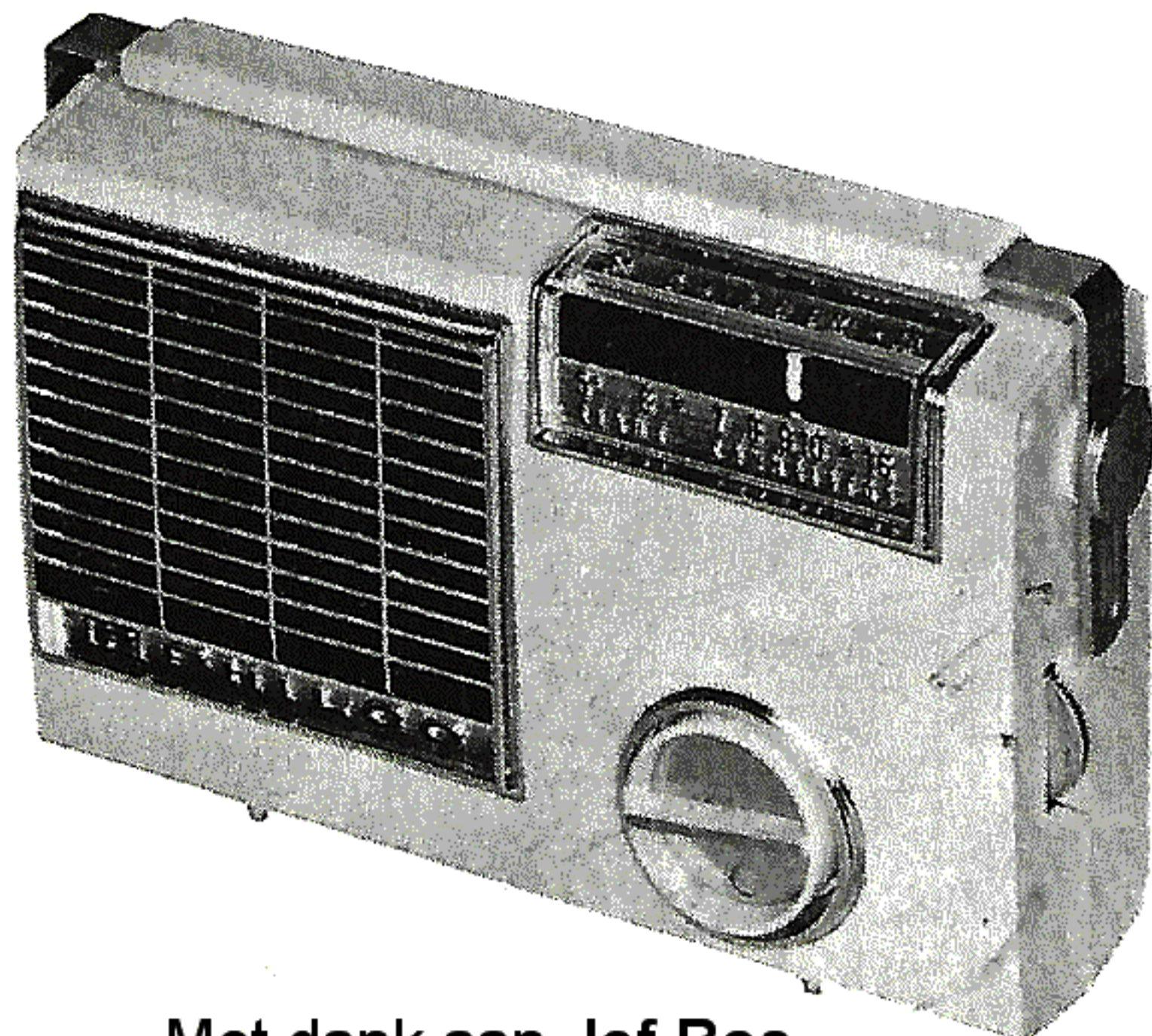
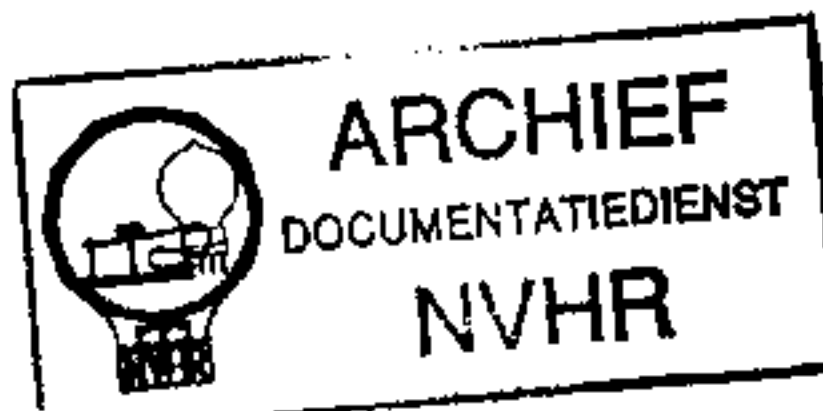


FRONT VIEW



TUNING GANG CLOSED

Ned. Ver. v. Historie v/d Radio



Met dank aan Jef Bos

TRADE NAME	Philco Model T-88 (Code 124)		
MANUFACTURER	Philco Corp., A Subsidiary of Ford Motor Co., Tioga & C Streets, Philadelphia, Pa.		
TYPE SET	Battery Operated 8 Transistor Portable AM Receiver		
POWER SUPPLY	3 Volts DC	RATING	9MA@3 Volts DC (No Signal, Min. Volume)
TUNING RANGE— BROADCAST	535 — 1620KC		15MA@3 Volts DC (Signal, Normal Volume)

ALIGNMENT INSTRUCTIONS

ALIGNMENT INSTRUCTIONS—READ CAREFULLY BEFORE ATTEMPTING ALIGNMENT

Use only enough generator output to provide a usable indication.

Suggested Alignment Tools:

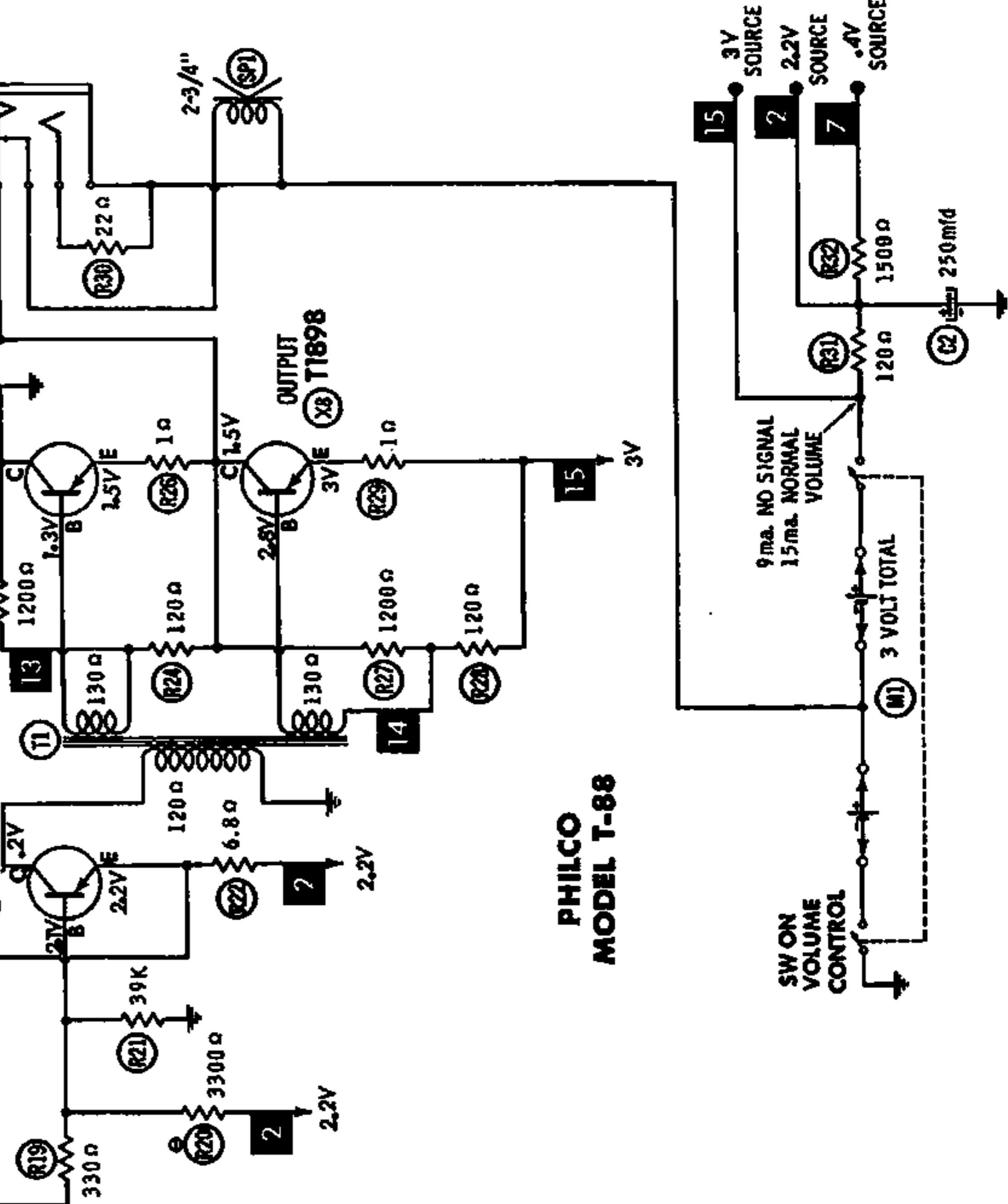
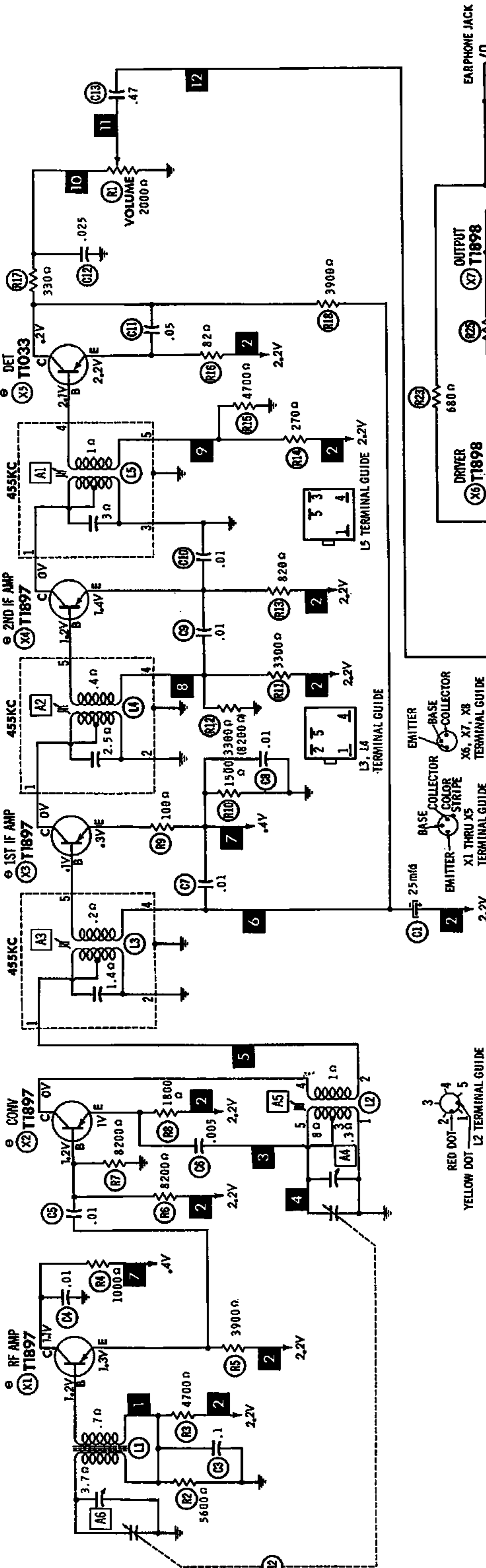
- A1, A2, A3..... GENERAL CEMENT #8728, 8729, 8987, 8988, 8989
WALSCO #2531, 2532
- A5..... GENERAL CEMENT #5000, 5003, 8276, 8290
WALSCO #2512, 2515, 2522, 2523, 2525, 2537
- A4, A6..... GENERAL CEMENT #5000, 5003, 5066, 8276, 8290, 9087, 9089
WALSCO #2512, 2525, 2528

	SIGNAL GENERATOR COUPLING	SIGNAL GENERATOR FREQUENCY	RADIO DIAL SETTING	CONNECT VTVM	ADJUST	REMARKS
1.	Fashion loop of several turns of wire and radiate signal into loop of receiver.	455KC (Unmod.)	Tuning gang fully open.	Across Volume Control.	A1, A2, A3	Adjust for maximum deflection.
2.	"	1620KC	"	"	A4	"
3.	"	600KC	600KC Signal.	"	A5	Adjust for maximum deflection while rocking tuning gang. Repeat Steps 2 & 3.
4.	"	1400KC	1400KC Signal.	"	A6	Adjust for maximum deflection.

HOWARD W. SAMS & CO., INC. Indianapolis 6, Indiana

The listing of any available replacement part herein does not constitute in any case a recommendation, warranty or guaranty by Howard W. Sams & Co., Inc., as to the quality and suitability of such replacement part. The numbers of these parts have been compiled from information furnished to Howard W. Sams & Co., Inc., by the manufacturers of LF449

the particular type of replacement part listed. Reproduction or use, without express permission, of editorial or pictorial content, in any manner, is prohibited. No patent liability is assumed with respect to the use of the information contained herein. © 1962 Howard W. Sams & Co., Inc., Indianapolis 6, Indiana. Printed in U.S. of America



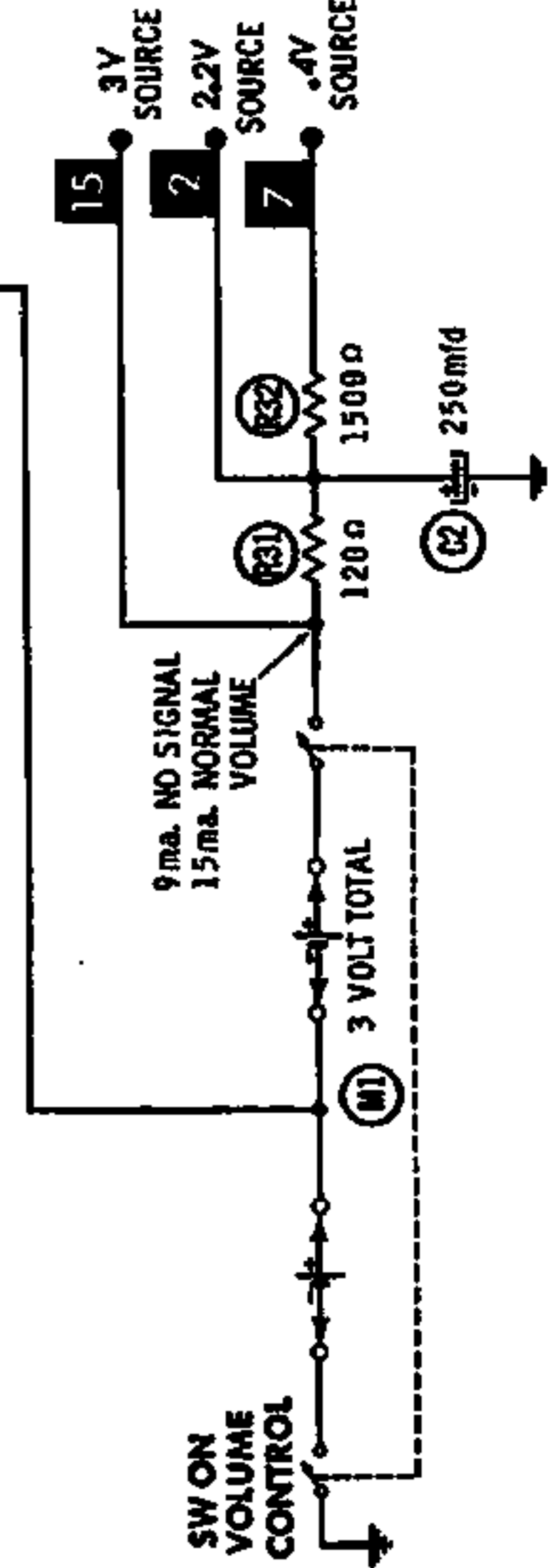
SEE PARTS LIST FOR ALTERNATE VALUE OR APPLICATION

- DC voltage measurements taken with vacuum tube voltmeter.
- Socket connections or transistor terminals are shown as bottom views.
- Measured values are from socket pin or terminal to common ground.
- Nominal tolerance on component values makes possible a variation of $\pm 15\%$ in voltage and resistance readings.
- Volume control at maximum, no signal applied for voltage measurements.

A PHOTOFAC STANDARD NOTATION SCHEMATIC with **CIRCUITAGE**

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**PHILCO
MODEL T-88**



PARTS LIST AND DESCRIPTIONS

TRANSISTORS

ITEM No.	ORIG. TYPE	USE	REPLACEMENT DATA		NOTES
			RCA PART No.	RAYTHEON PART No.	
X1	T1897	RF Amplifier	2N1525	2N483	PNP PNP PNP PNP PNP PNP PNP PNP Matched Pair
X2	T1232*	RF Amplifier	2N412	2N486	
X3	T1897	Converter	2N1525	2N483	
X4	T1232*	Converter	2N1525	2N483	
X5	T1033*	1st IF Amp.	2N1525	2N483	
X6	T1897	1st IF Amp.	2N1525	2N483	
X7	T1232*	2nd IF Amp.	2N1525	2N483	
X8	T1033	2nd IF Amp.	2N1525	2N483	
X9	T1897	Detector			
X10	T1232*	Detector			
X11	T1898	Driver			
X12	T1898	Output			
X13	T1898	Output			

* Alternate Type **ELECTROLYTIC CAPACITORS**

ITEM No.	RATING		REPLACEMENT DATA						
	CAP.	VOLT.	PHILCO PART No.	AEROVOX PART No.	CORNELL-DUBILIER PART No.	GENERAL ELECTRIC PART No.	MALLORY PART No.	PYRAMID PART No.	SPRAGUE PART No.
C1	25	6	30-2588-10	PTT78	NLW6-25	MT1-5	TT25X6	MLV5-25	TE-1203
C2	250	3	30-2588-12	PTT15	NLW250-3	MT1-24	TT3X250	MLV250-3	TE-1065

FIXED CAPACITORS

ITEM No.	RATING	REMARKS	REPLACEMENT DATA						
			AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	ELMENCO PART No.	MALLORY PART No.	SPRAGUE PART No.	
C3	.1	(.01) †	C80V104AM	UK-104	H-05P1		TA-010	TG-P10	
C4	.01		C80V103AM	DM-103	H-05S1	CCD-103	TA-110	TG-S10	
C5	.01		C80V103AM	DM-103	H-05S1	CCD-103	TA-110	TG-S10	
C6	.005		C80V502AM	DM-502	H-05D5	CCD-502	TA-250	TG-D50	
C7	.01		C80V103AM	DM-103	H-05S1	CCD-103	TA-110	TG-S10	
C8	.01		C80V103AM	DM-103	H-05S1	CCD-103	TA-110	TG-S10	
C9	.01		C80V103AM	DM-103	H-05S1	CCD-103	TA-110	TG-S10	
C10	.01		C80V103AM	DM-103	H-05S1	CCD-103	TA-110	TG-S10	
C11	.05		C80V503AM	DA-503	H-05S5		TA-150	TG-S50	
C12	.025				H-05S25		TA-125	TG-S25	
C13	.47 4.5V			UK10-474	HCC10474Z			HY-330	

† Alternate Value.

CONTROLS

All wattages 1/2 watt, or less, unless otherwise listed.

ITEM No.	USE	RESISTANCE	REPLACEMENT DATA				
			PHILCO PART No.	CENTRALAB PART No.	CLAROSTAT PART No.	CTS-IRC PART No.	MALLORY PART No.
R1	Volume & Switch	2000Ω	33-5583-22				

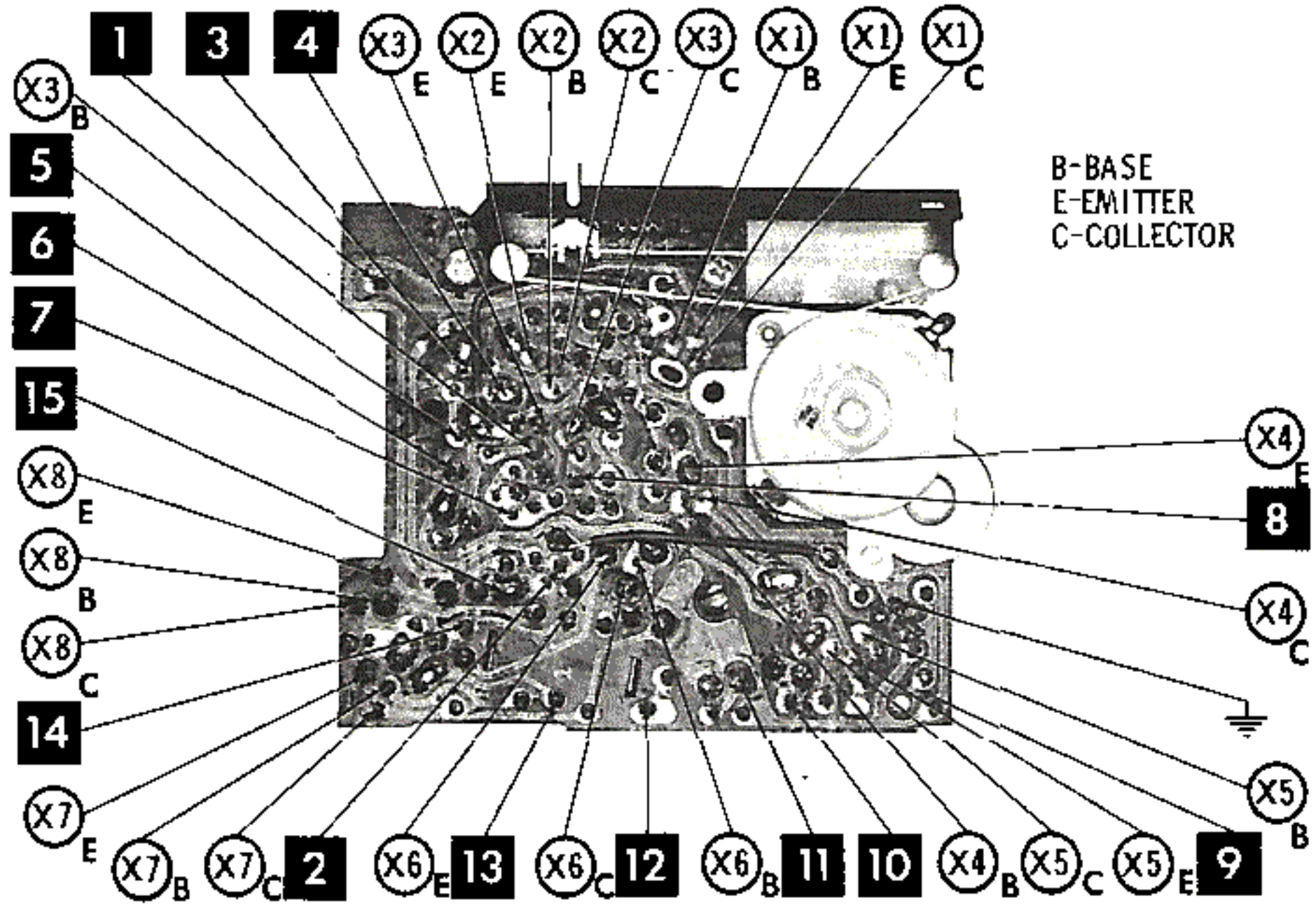
RESISTORS

All wattages 1/2 watt, or less, unless otherwise listed.

ITEM No.	RATING	REPLACEMENT DATA			ITEM No.	RATING	REPLACEMENT DATA		
		IRC PART No.	WORKMAN PART No.	REMARKS			IRC PART No.	WORKMAN PART No.	REMARKS
R2	5800Ω				R16	82Ω			Note 1
R3	4700Ω				R17	330Ω			
R4	1000Ω				R18	3900Ω			
R5	3900Ω				R19	330Ω			
R6	8200Ω				R20	3300Ω			
R7	8200Ω				R21	39K			
R8	1800Ω				R22	6.8Ω			
R9	100Ω				R23	680Ω			
R10	1500Ω				R24	120Ω			
R11	3300Ω				R25	1200Ω			
R12	3300Ω			(8200Ω) *	R26	1Ω			
R13	820Ω				R27	1200Ω			
R14	270Ω				R28	120Ω			
R15	4700Ω				R29	1Ω			

PRINTED BOARD

A Howard W. Semi **CIRCUITRY** Photo



PARTS LIST AND DESCRIPTIONS (Continued)

RESISTORS (cont)

All wattages 1/2 watt, or less, unless otherwise listed.

ITEM No.	RATING	REPLACEMENT DATA			ITEM No.	RATING	REPLACEMENT DATA		
		IRC PART No.	WORKMAN PART No.	REMARKS			IRC PART No.	WORKMAN PART No.	REMARKS
R30	22Ω				R32	1500Ω			
R31	120Ω								

* Alternate Value.

Note 1. Value varies from 2700Ω to 12K. Selected to provide 2.1mA collector current for X6.

COILS (RF-IF)

ITEM No.	USE	REPLACEMENT DATA					NOTES
		PHILCO PART No.	Merit PART No.	Miller PART No.	Stancor PART No.	Workman PART No.	
L1	Loopstick	76-10982-4					T503 T608
L2	Oscillator	32-4802-2					
L3	1st IF	32-4800-8					
L4	2nd IF	32-4800-9					
L5	3rd IF	32-4800-10					

TRANSFORMER (DRIVER)

ITEM No.	TURNS RATIO		REPLACEMENT DATA					NOTES
	PRI.	SEC.	PHILCO PART No.	Merit PART No.	Stancor PART No.	Thordarson PART No.	Triad PART No.	
T1	1	1	32-8959-4					

SPEAKER

ITEM No.	TYPE			REPLACEMENT DATA		NOTES
	SIZE	FIELD	V. C. IMP.	PHILCO PART No.	QUAM PART No.	
SP1	2 3/4"	PM	6-8Ω	36-1664-10	27A06 Z12	

BATTERIES

ITEM No.	VOLTAGE	PHILCO PART No.	REPLACEMENT DATA						NOTES
			BURGESS		EVEREADY		MALLORY		
			"A"	"B"	"A"	"B"	"A"	"B"	
M1	1.5V	P-15		990		1015		M-15R	2 Required

MISCELLANEOUS

ITEM No.	PART NAME	PHILCO PART No.	NOTES
M2	Tuning Cap. Printed Board	31-2792-2 54-10000-2	2 Gang (With Knob)

CABINETS & CABINET PARTS

(When Ordering Cabinets & Cabinet Parts, Specify Model, Chassis & Color)

NAME	PART NO.	DESCRIPTION
Dial Pointer	28-13726-1	
Dial Window	27-10005-1	
Knob, Volume	27-10014-1	
Knob, Tuning	(Part of M2)	
Handle Assembly	424-8291	
Cabinet, Front	27-10002-1	
Cabinet, Back	27-10003-1	

WIRING DATA

General-use Unshielded Hook-up Wire Use BELDEN No. 8530 (Solid 22AWG) Available
8524 (Stranded 22AWG) In
8570 (Stranded 26AWG) 12 Colors

CHASSIS—TOP VIEW

