

CABINET-REAR VIEW

## HORIZONTAL SWEEP CIRCUIT ADJUSTMENTS

Connect a clip lead from point  $\diamond$  (pin 2, grid of V4, Sync Separator) to ground. Adjust Horizontal Stabilizer Coil, L17 slug, Horizontal

Hold for MINIMUM sideways drift of picture. Remove clip lead from point  $\diamond$ .

## DISASSEMBLY INSTRUCTIONS

### CHASSIS REMOVAL

1. Remove 8 screws on back and remove cabinet back.
2. Disconnect speaker leads, yoke slug, picture tube socket, high voltage anode lead, and remote control power plug.
3. Remove 4 screws holding chassis at bottom of cabinet and remove 2 screws at top of tuner plate.
4. Remove lock nut on volume control. Now chassis and tuner can be removed.

### PICTURE TUBE REMOVAL

1. Follow "Chassis Removal" procedure and lay set face down on a soft protective surface.
2. Remove 4 bolts at corners of picture tube and lift out picture tube.

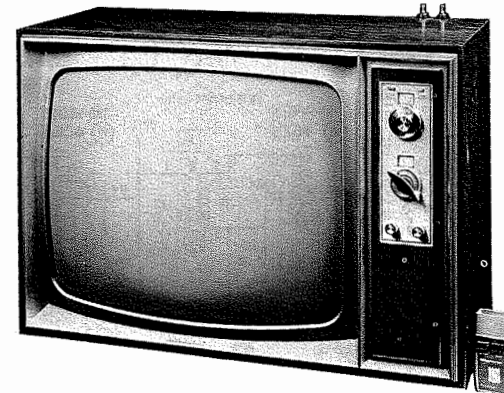
SET 790 FOLDER 2

MAGNAVOX CHASSIS T/U914-01-00,  
T/U914-02-00, T/U914-03-00

PHOTOFACT® Folder with CIRCUITRACE™



MAGNAVOX CHASSIS T/U914-01-00,  
T/U914-02-00, T/U914-03-00



REPRESENTATIVE MODEL 1RT303N  
USING CHASSIS U914-03-00

## CAUTION

ONE SIDE OF AC LINE CONNECTED TO CHASSIS

TRADE NAME	Magnavox Chassis T914-01-00, T914-02-00, T914-03-00, U914-01-00, U914-02-00, U914-03-00
SUPPLIER	For current address, see Master Index.
TYPE SET	Television Receiver
TUBES	VHF - Sixteen, UHF - One Transistor
POWER SUPPLY	110-120 Volts AC, 60 Cycles
TUNING RANGE	Channels 2 thru 13 VHF, 14 thru 83 UHF, Video IF 45.75MC, Sound IF 41.25MC (Intercarrier)
	RATING 113 Watts, 1.25 Amp. @ 117 Volts AC

## SERVICING IN THE FIELD

### SAFETY GLASS

The safety glass is an integral part of the picture tube.

### FUSE OR FUSE DEVICE

A 4.7 $\Omega$  fusible resistor is used for low voltage power supply protection.

### VHF OSCILLATOR ADJUSTMENT

The fine tuning mechanically engages osc. slug for adjustment (one slug for each channel).

### AGC

No provision is made to vary the AGC on this receiver.

### HORIZONTAL OSCILLATOR FIELD ADJUSTMENT

The Horizontal Stabilizer Coil is used for the horizontal hold. (See "Tube Placement Chart" for location.)

### FOCUS

The focus may be varied by connecting the lead from pin 4 of the picture tube to various voltage points. (For location, see photo "Cabinet - Rear View".)

### CENTERING

Centering is accomplished by 2 magnetic rings located on yoke rear cover.

## IMPORTANT FILING NOTICE

Some models covered by this PHOTOFACT Folder employ chassis in addition to the TV chassis. PHOTOFACT Folders covering these additional chassis are packaged immediately behind this Folder and should be filed with this Folder in the yellow filing jacket provided. For specific coverage see index below.

## INDEX

Remote Control Receiver 704028-8,  
Transmitter 704018-4 ..... Set 790, Folder 2-A

MAGNAVOX CHASSIS T/U914-01-00,  
T/U914-02-00, T/U914-03-00

SET 790 FOLDER 2

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 the particular type of replacement part listed. NA526

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DATE 12 -65

SET 790 FOLDER 2

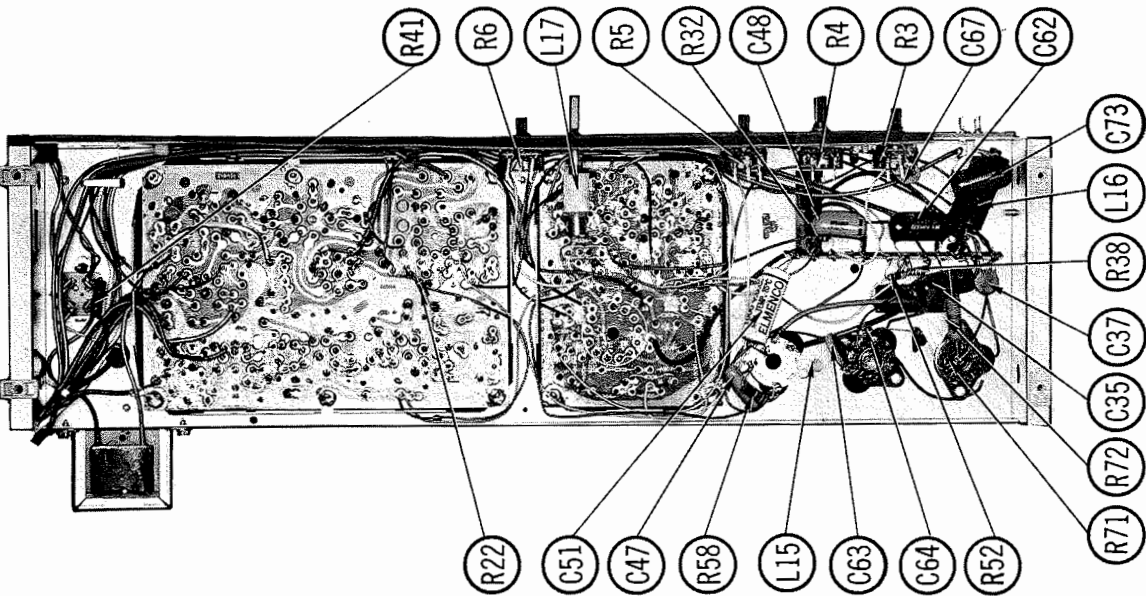


RESISTANCE MEASUREMENTS

ITEM	TUBE	Pin 1	Pin 2	Pin 3	Pin 4	Pin 5	Pin 6	Pin 7	Pin 8	Pin 9	Pin 10	Pin 11	Pin 12
V1	4BZ6	110K	47Ω	3.6Ω	4.9Ω	1500Ω †	1500Ω †	0Ω					
V2	4BZ6	70K	47Ω	4.9Ω	6.2Ω	1500Ω †	1500Ω †	0Ω					
V3	4CB6	0Ω	120Ω	6.3Ω	7.5Ω	1500Ω †	1500Ω †	0Ω					
V4	10GN8	0Ω	4.7meg	4.6meg #	10.3Ω	7.5Ω	15Ω	800Ω ●	7000Ω †	4300Ω †			
V5	4AU6	37K †	13Ω	14Ω	440K	1.2meg #	23Ω †						
V6	4AU6	8Ω	0Ω	14Ω	15Ω	15K †	15K †	270Ω					
V7	4DT6	3.8Ω	680Ω	15Ω	16Ω	2meg #	6800Ω †	470K					
V8	12FX5	82Ω	30K	23Ω	16Ω	NC	174Ω †	339Ω †					
V9	17JZ8	26Ω	2.3meg †	NC	316Ω †	NC	2meg	2meg	24Ω †	0Ω	1.3meg	0Ω	30Ω
V10	8FQ7	28K †	1.4meg	1500Ω	23Ω	26Ω	82K †	47K	1500Ω	0Ω			
V11	18GB5	390K	390K	0Ω	41Ω	36Ω	1000Ω †	1000Ω †	0Ω	NC			TOP CAP 7.8Ω †
V12	17AY3	NC	24Ω †	NC	30Ω	36Ω	NC	NC	NC	1.1meg			
V13	1G3GT												TOP CAP 447.8Ω †
PINS 1 THRU 8 HAVE INFINITE RESISTANCE													
V14	23HQP4	13Ω	55K	600K	21.3Ω †	NC	NC	160K	10.3Ω				
V201	3HQ5	1meg	0Ω	1.2Ω	0Ω	1.2K †	0Ω	0Ω					
V202	6HB7	0Ω	220K	0Ω	1.2Ω	3.6Ω	60Ω †	22K †	5500Ω †	3300Ω			

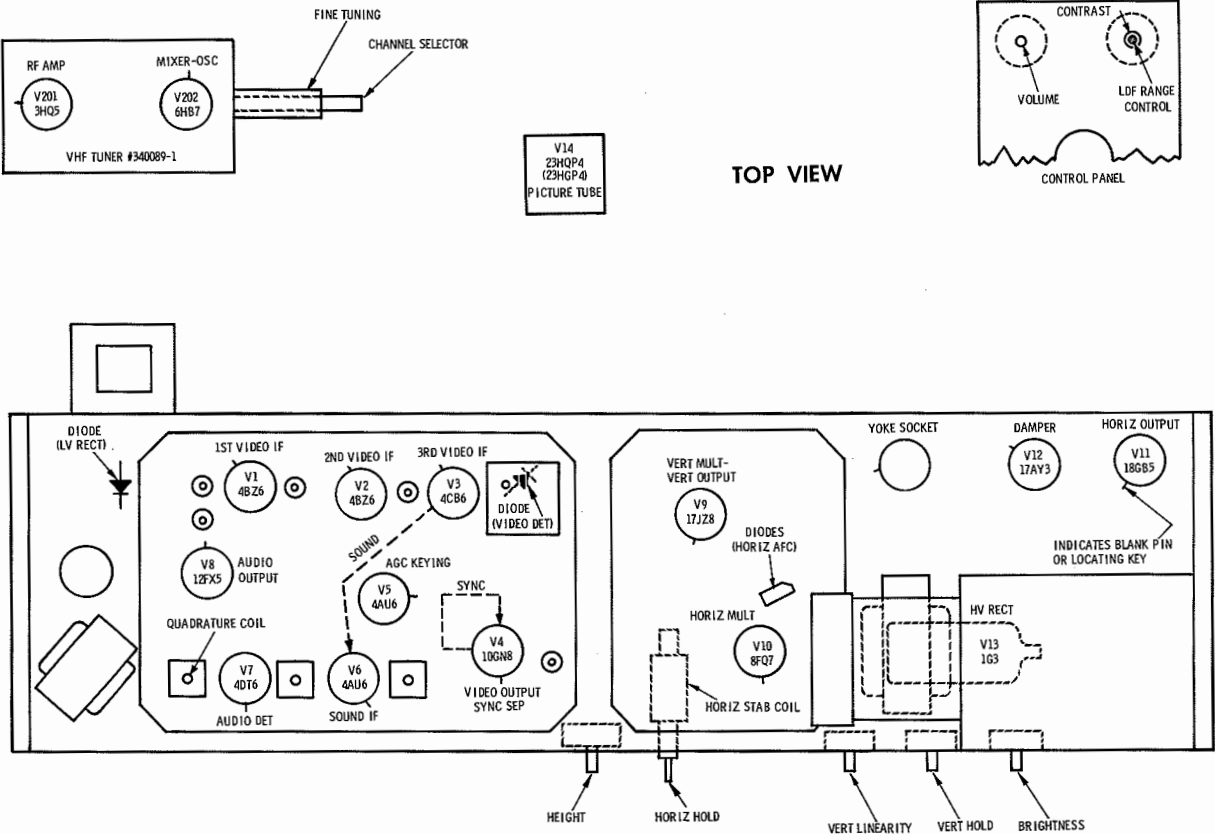
# THIS READING WILL VARY DEPENDING UPON THE CONDITION OF THE ELECTROLYTIC IN THE CIRCUIT.  
● READING DEPENDS ON POLARITY OF METER CONNECTIONS.  
† MEASURED FROM OUTPUT OF X1.

NC NO CONNECTION  
‡ MEASURED FROM PIN 9 OF V12.



CHASSIS—BOTTOM VIEW

TUBE PLACEMENT CHART



TUBE FAILURE CHECK CHART

The following chart lists tubes whose failures are most likely to produce indicated symptoms. Refer to tube placement chart for location and type of tube.

**POWER SUPPLY FAILURE**  
No raster, no sound Rectifier X1

**SWEEP FAILURE**  
No raster, has sound V10, V11, V12, V13, V14  
No vertical deflection V9  
Poor vert. linearity or foldover V9  
Poor horiz. linearity or foldover V10, V11, V12  
Narrow picture V10, V11, V12, X1  
Vert. off freq. V9  
Horiz. off freq. AFC Diode X3, V10

**LOSS OF PICTURE OR SOUND**  
No pic, no sound, has raster V1, V2, V3, Video Det. X2, V4  
No pic, no sound, has snow V201, V202, V1  
No pic, has sound, has raster V4, V14  
Has pic, no sound V8, V7, V8

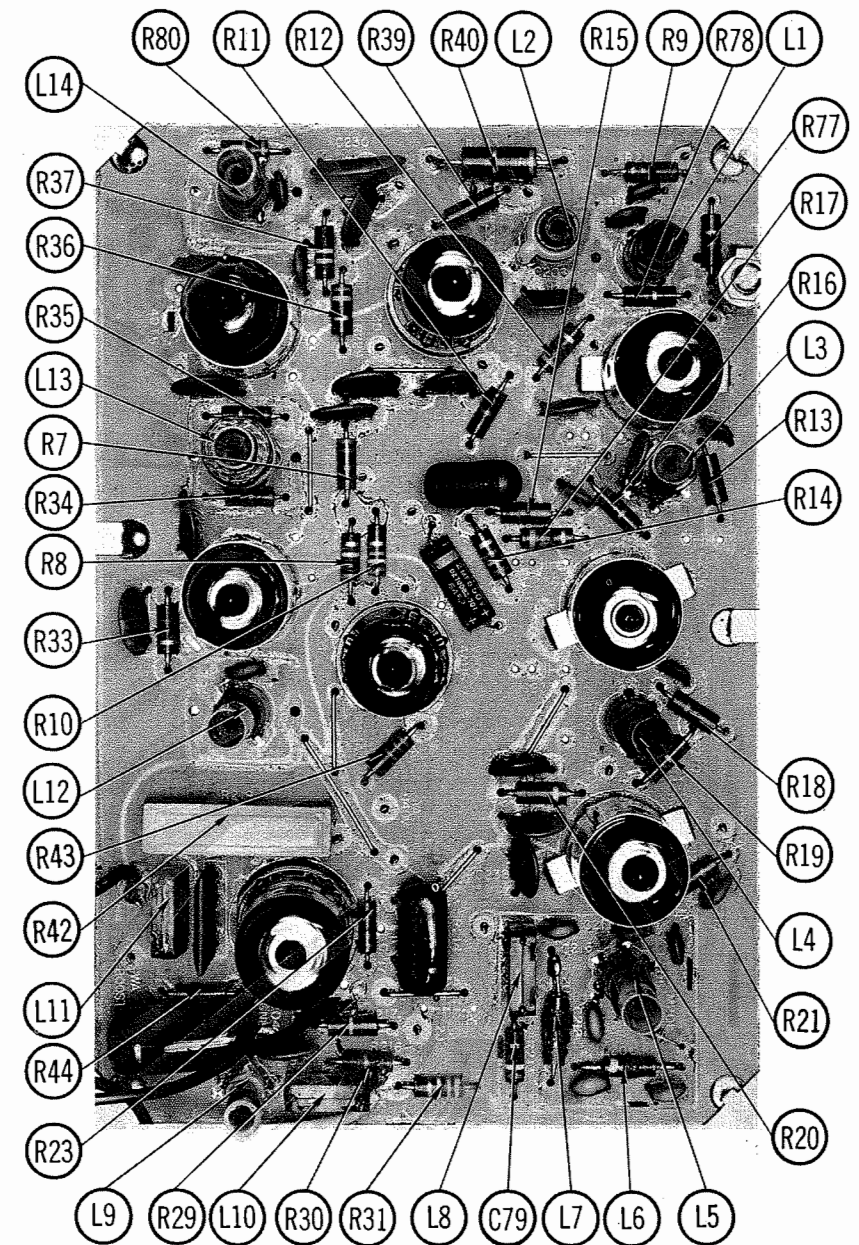
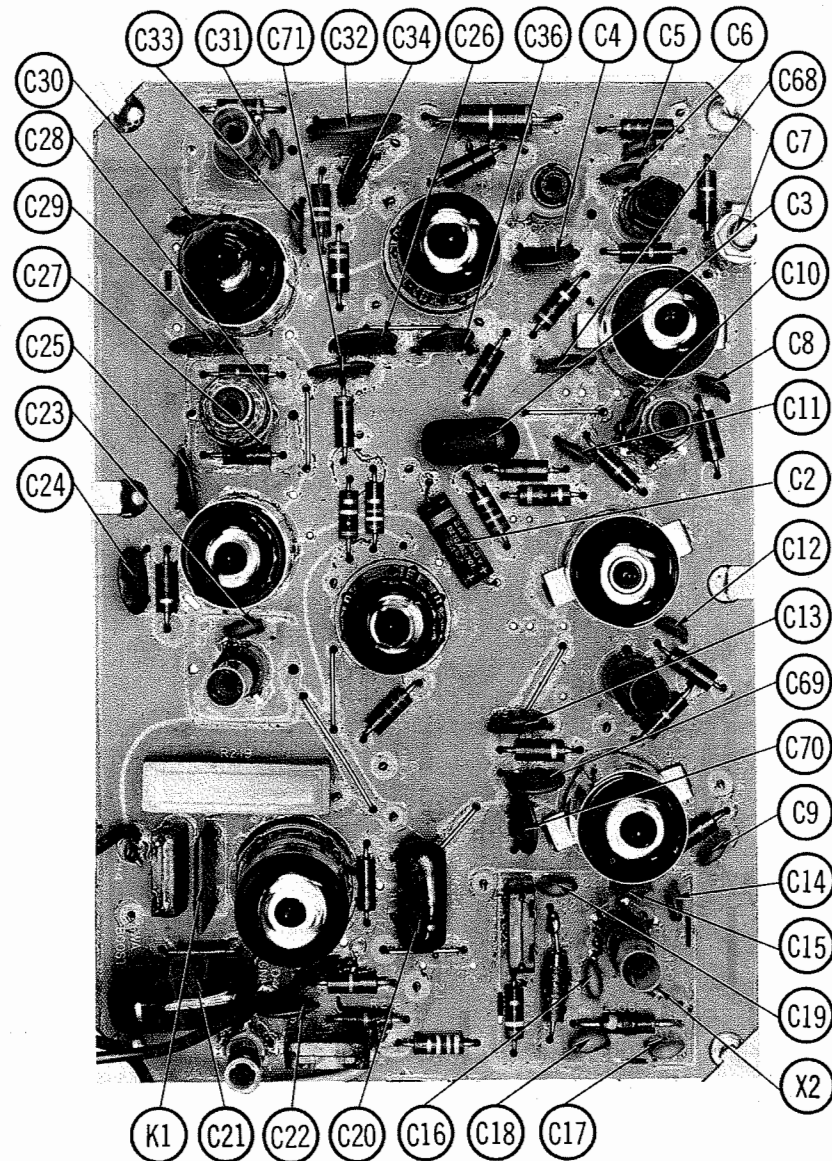
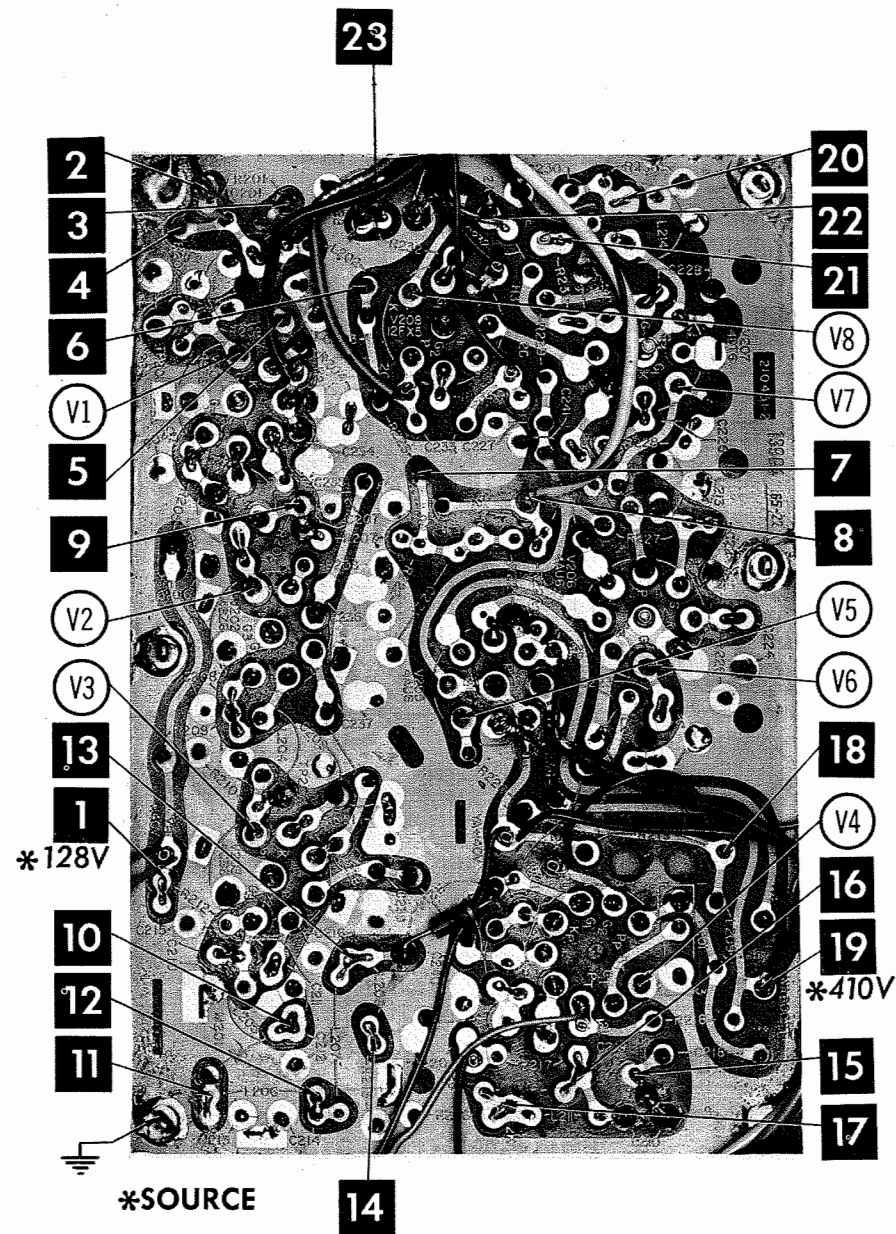
**SYNC FAILURE**  
No vert. sync V4  
No horiz. sync V4  
No vert. or horiz. sync V4

This receiver employs tubes used in a series filament network, an open filament in any tube will cause the set to be inoperative. (See circuit below.)

MAGNAVOX CHASSIS  
T/U914-01-00, T/U914-02-00, T/U914-03-00

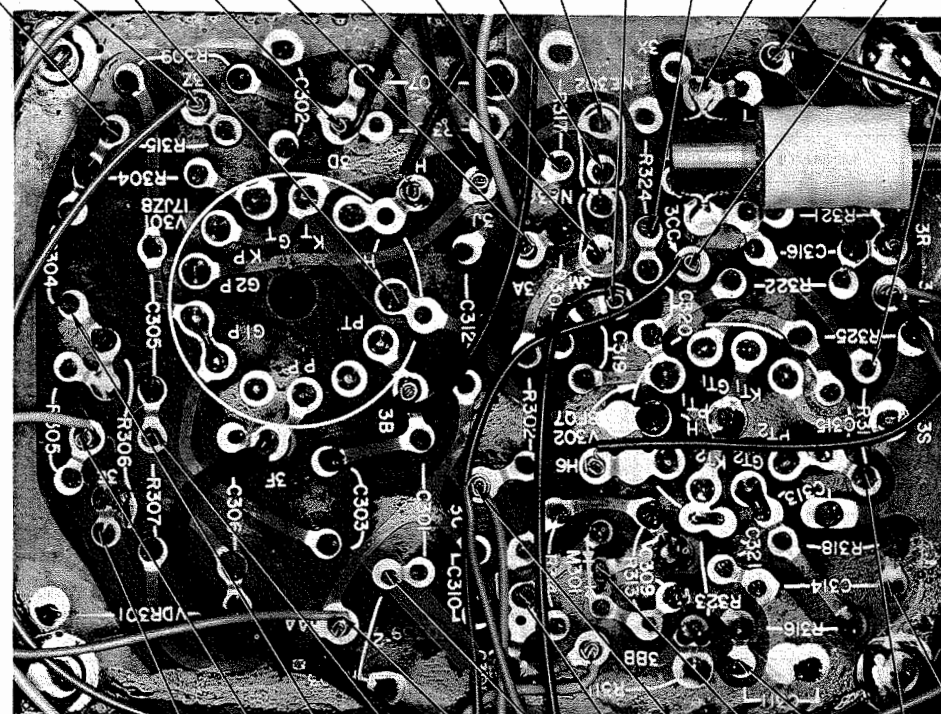
FOLDER 2





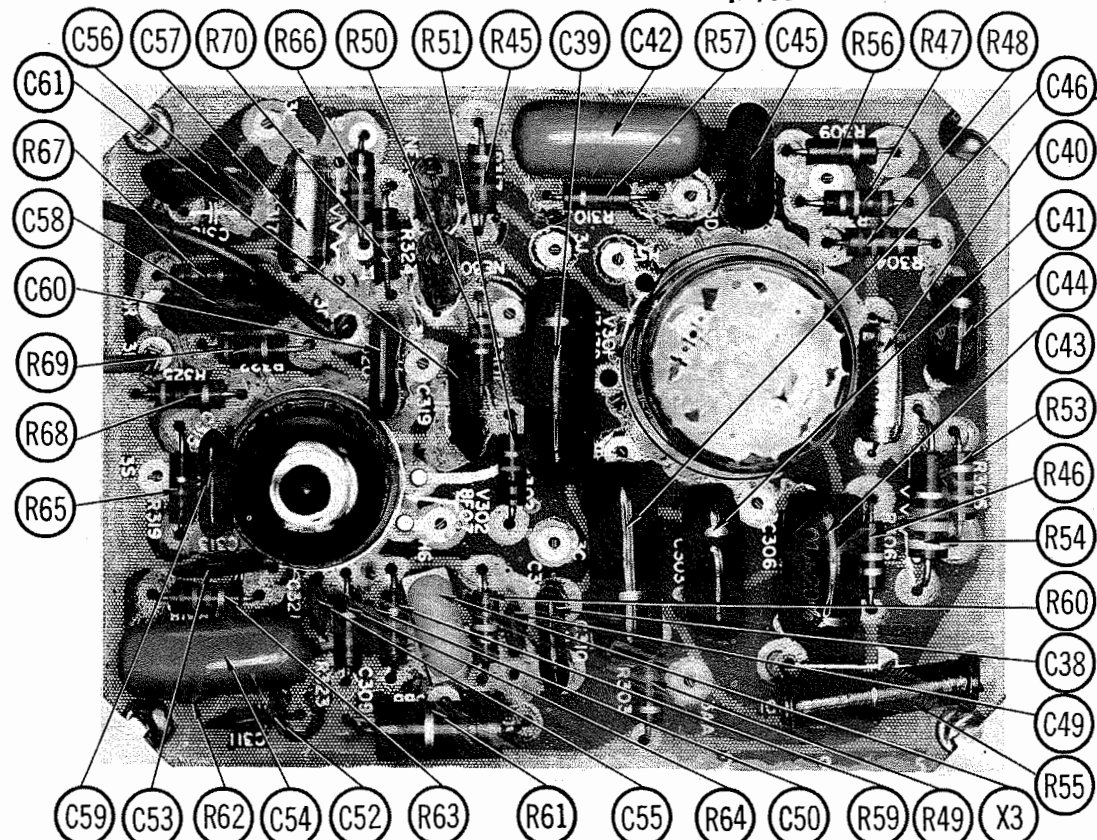
MAIN PRINTED BOARD

\* 128V  
27 30 V9 32 33 34 25 35 1 44 43 41 39 45 42



\* SOURCE 29 31 28 26 24 46 38 19 36 37 V10 40

\* 410V



A Howard W. Sams CIRCUITRACE Photo SWEEP PRINTED BOARD ARROWS INDICATING TUBE LOCATIONS ARE POINTING TO PIN 1 UNLESS OTHERWISE INDICATED

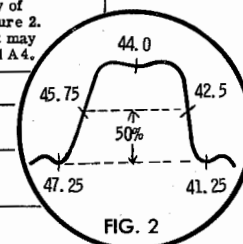
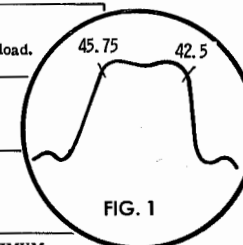
## ALIGNMENT INSTRUCTIONS

Use an isolation transformer and maintain voltage at 117 volts. Allow a 20-minute warm-up period for the receiver and test equipment.  
Suggested Alignment Tools: A1 thru A7, A9 thru A13... GENERAL CEMENT #8806, 8869, 9302 ... WALSCO #2511, 2543, 2588  
A8 ..... GENERAL CEMENT #8868, 8987, 9089 ... WALSCO #2531-X, 2541, 2587  
Mixer Plate Coil ..... GENERAL CEMENT #9286, 9300, 9302 ... WALSCO #2510, 2511, 2547

### VIDEO IF ALIGNMENT

Connect the synchronized sweep voltage from the sweep generator to the horizontal input of the oscilloscope for horizontal deflection. Use only enough generator output to provide a usable indication. Note: Response may vary slightly from those shown. Connect a variable bias supply to the IF AGC line (point  $\Delta$ ) and adjust to obtain a response curve which shows no indication of overload. Disable Oscillator section of Mixer-Osc. Set the Channel Selector to any non-interfering channel.

INDICATOR	GENERATOR COUPLING	SWEEP GENERATOR FREQUENCY	MARKER GENERATOR FREQUENCY	ADJUST	REMARKS
1. Connect DC probe of a VTVM thru a 47K resistor to point $\Delta$ . Common to ground.	Connect high side to ungrounded tube shield over Mixer-Osc. Low side to ground.		41.25MC 47.25MC	A1, A2	Adjust for MINIMUM.
2. Connect vertical input of a scope to point $\Delta$ . Low side to ground.	Connect high side to pin 1 (grid) of V3. Low side to ground.	44MC (10MC Sweep)	42.5MC 45.75MC	A3, A4	Adjust for maximum amplitude and MINIMUM tilt with markers as shown in Figure 1.
3. Connect vertical input of a scope to point $\Delta$ . Low side to ground.	Connect high side to ungrounded tube shield over Mixer-Osc. Low side to ground.	44MC (10MC Sweep)	41.25MC 42.5MC 44.0MC 45.75MC 47.25MC	A5, A6, A7, A8, Mixer Plate Coil	Adjust for maximum gain and symmetry of response with markers as shown in Figure 2. In order to obtain a proper response, it may be necessary to slightly retouch A3 and A4.

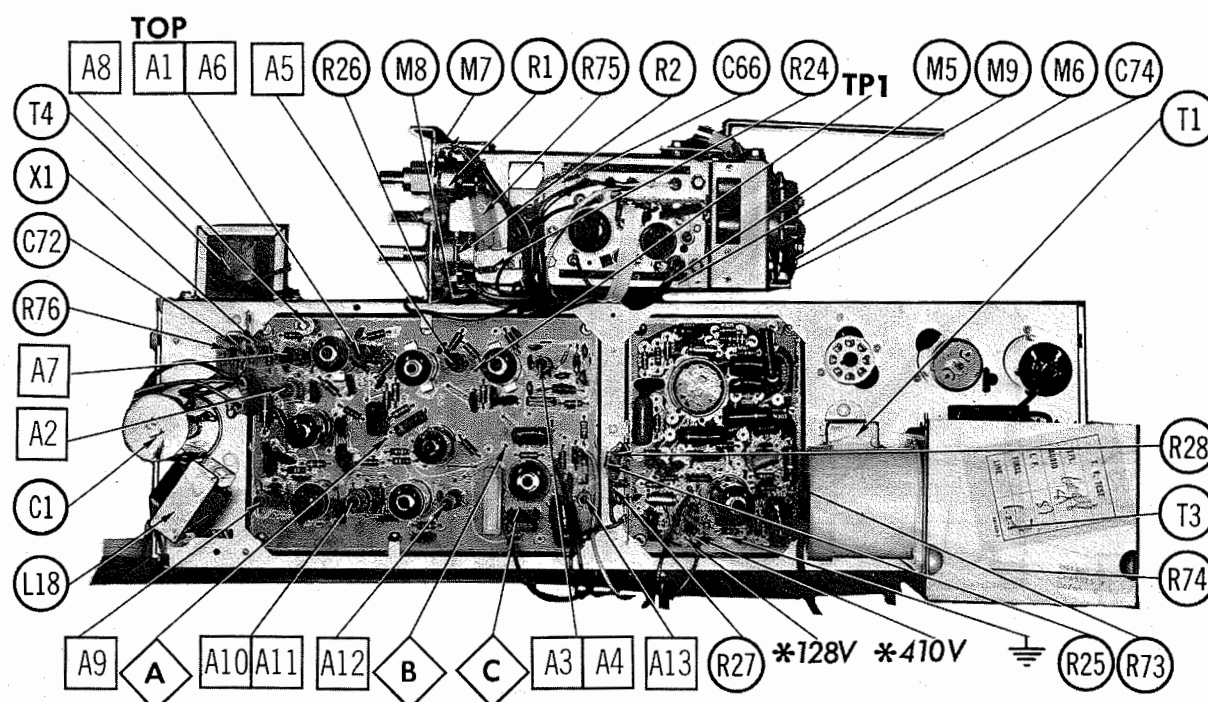


### SOUND IF ALIGNMENT

Tune in a station and adjust A9 for maximum sound. Reduce signal strength at the antenna terminals until distortion appears. Continue to reduce signal while aligning for undistorted output by adjusting A10, A11, and A12.

### 4.5 MC TRAP ALIGNMENT

Tune in a strong TV signal and set the Contrast at maximum. Adjust the Fine Tuning until a beat pattern is visible on the screen. Adjust A13 for MINIMUM beat interference.



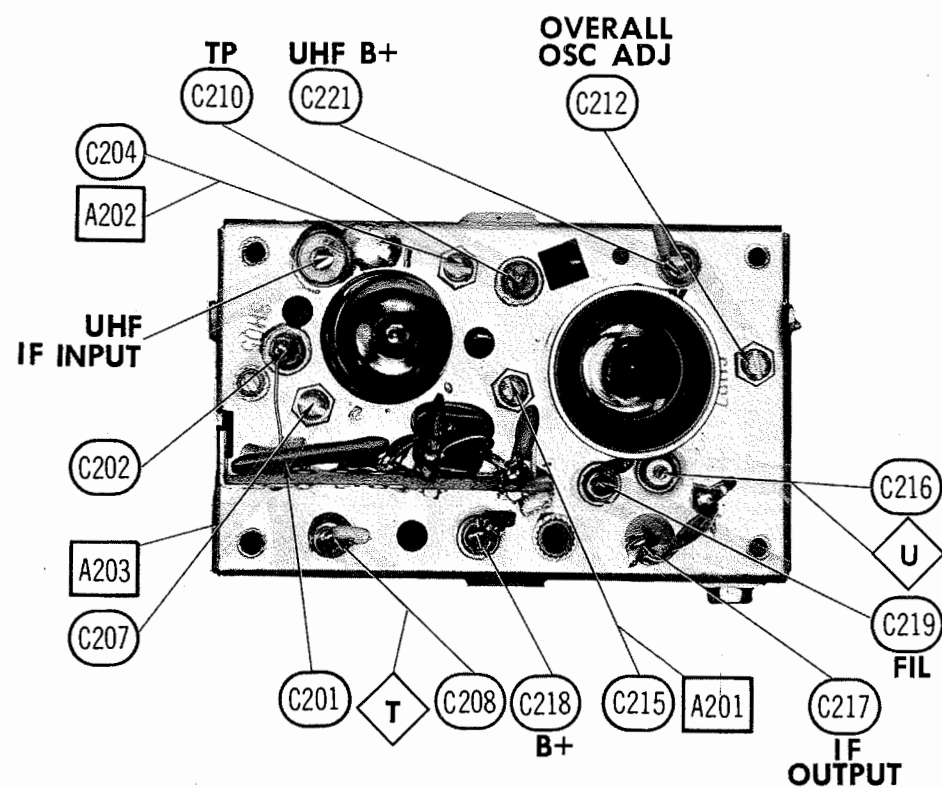
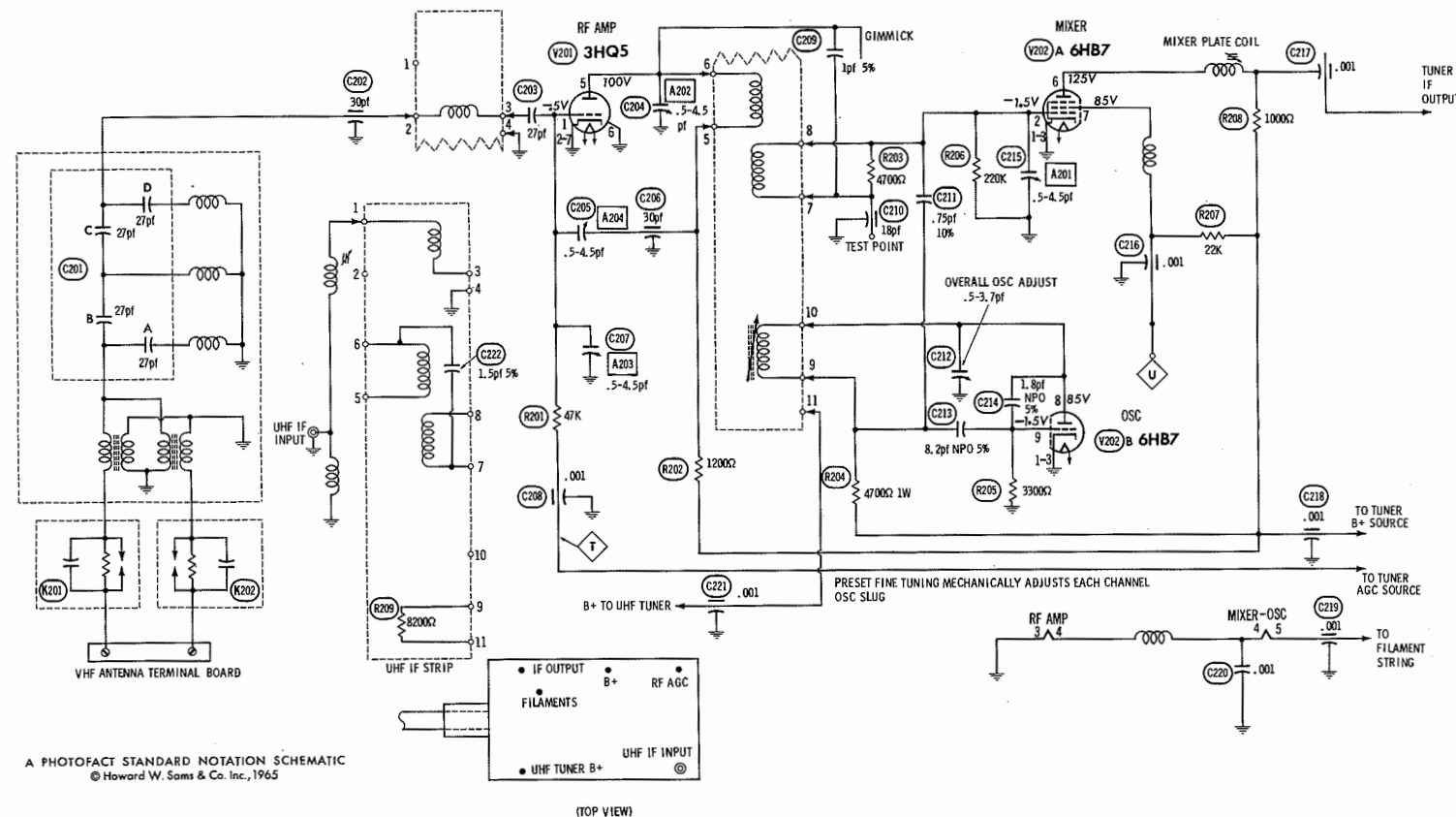
## CHASSIS—TOP VIEW

SET 790 FOLDER 2

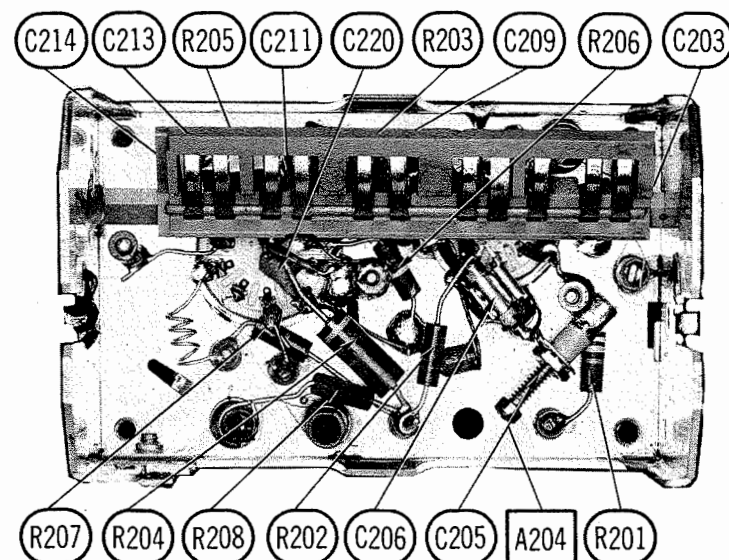
MAGNAVOX CHASSIS  
T/U914-01-00, T/U914-02-00, T/U914-03-00

FOLDER 2





VHF TUNER 340089-1



UHF TUNER 340087-1

## VHF TUNER ALIGNMENT INSTRUCTIONS

### OSCILLATOR ADJUSTMENTS

The oscillator for each channel is preset by means of the fine tuning control. Adjust fine tuning for best picture and sound on each channel. If any channel cannot be properly tuned in with the fine tuning, adjust overall oscillator adjustment and recheck all available channels.

### RF AND MIXER ALIGNMENT

Connect the synchronized sweep voltage from the sweep generator to the horizontal input of the oscilloscope for horizontal deflection. Use 10MC sweep unless otherwise noted. Connect a variable bias to the RF AGC line at point  $\diamond$ . Adjust bias to obtain response curve which shows no indication of overloading.

SWEEP GENERATOR COUPLING	SWEEP GENERATOR FREQUENCY	MARKER GENERATOR FREQUENCY	CHANNEL	CONNECT SCOPE	ADJUST	REMARKS
1. Across antenna terminals with 120 $\Omega$ in each lead.	213MC	211.25MC 215.75MC	13	Vert. Input to Point $\diamond$ , low side to ground.	A201, A202, A203	Adjust for maximum gain and symmetry of response with markers as shown in Fig. 201.
2. "	195MC	193.25MC 197.75MC	10	Across Video Det. load resistor.	A204	Increase bias to -15 volts and adjust for MINIMUM amplitude of response.
3. "	See Chart	See Chart	12 thru 2	Vert. Input to Point $\diamond$ , low side to ground.		Decrease bias. Check individual channels for maximum gain and symmetry of response with markers as shown in Fig. 201. Make compromise adjustments of A201/2/3

### CHANNEL & FREQUENCY CHART

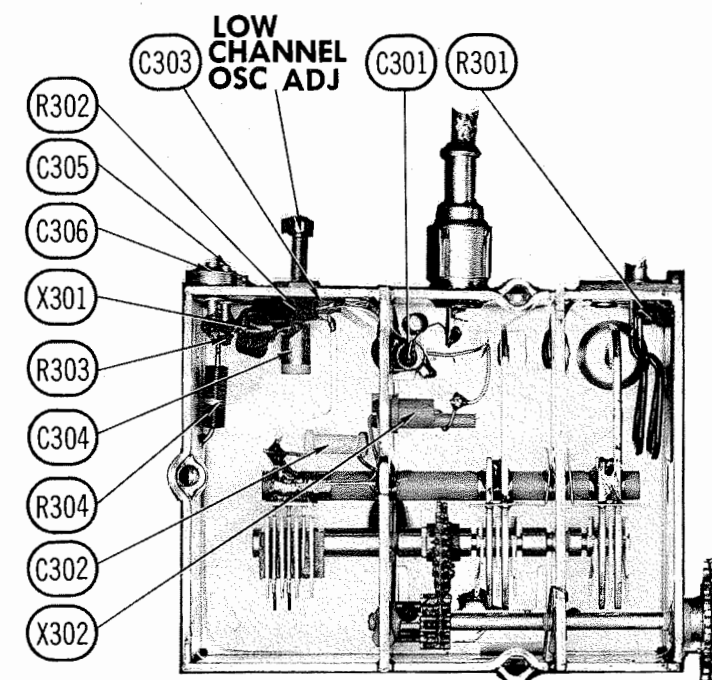
SWEEP GENERATOR FREQUENCY	MARKER GENERATOR FREQUENCY	CHANNEL	SWEEP GENERATOR FREQUENCY	MARKER GENERATOR FREQUENCY	CHANNEL	SWEEP GENERATOR FREQUENCY	MARKER GENERATOR FREQUENCY	CHANNEL
57MC	55.25MC 59.75MC	2	85MC	83.25MC 87.75MC	6	195MC	193.25MC 197.75MC	10
63MC	61.25MC 65.75MC	3	177MC	175.25MC 179.75MC	7	201MC	199.25MC 203.75MC	11
69MC	67.25MC 71.75MC	4	183MC	181.25MC 185.75MC	8	207MC	205.25MC 209.75MC	12
79MC	77.25MC 81.75MC	5	189MC	187.25MC 191.75MC	9	213MC	211.25MC 215.75MC	13



FIG. 201

### UHF TUNER ALIGNMENT INSTRUCTIONS

Tune to a UHF station and adjust UHF IF Input Coil for best picture and sound. Tune UHF Channel Selector to the lowest UHF channel operating in the area (low end of the dial). Adjust UHF Low Channel Oscillator Trimmer for best picture and sound.



MAGNAVOX CHASSIS  
T/U914-01-00, T/U914-02-00, T/U914-03-00

FOLDER 2

## VHF TUNER PARTS LIST AND DESCRIPTION TUBES

## UHF TUNER PARTS LIST AND DESCRIPTION

## TRANSISTORS

♦ AMPEREX ♦		♦ GENERAL ELECTRIC ♦		♦ RCA ♦		♦ PENNSYLVANIA ♦	
ITEM No.	USE	TYPE		ITEM No.	USE	TYPE	
V201	RF Amp.	3HQ5		V202	Mixer - Osc.	6HB7	

## CAPACITORS

ITEM No.	RATING	REMARKS	REPLACEMENT DATA					
			AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	ELEMCO PART No.	MALLORY PART No.	SPRAGUE PART No.
C201A	27			TCN-27			CN7427	107TCU-Q27
B	27			TCN-27			CN7427	107TCU-Q27
C	27			TCN-27			CN7427	107TCU-Q27
D	27			TCN-27			CN7427	107TCU-Q27
C202	30							
C203	27							
C204	5-4.5							
C205	5-4.5							
C206	30							
C207	5-4.5							
C208	.001							
C209	1	5%	EF-001	MFT-1000 TCZ-1				
C210	18							
C211	.75pf	10%						
C212	5-3.7							
C213	8.2 NFO 5%							
C214	1.8 NFO 5%							
C215	5-4.5							
C216	.001		EF-001	MFT-1000				
C217	.001		EF-001	MFT-1000				
C218	.001		EF-001	MFT-1000				
C219	.001		EF-001	MFT-1000				
C220	.001		EF-001	MFT-1000				
C221	.001		EF-001	MFT-1000				
C222	1.5	5%		DTZ-1RS				

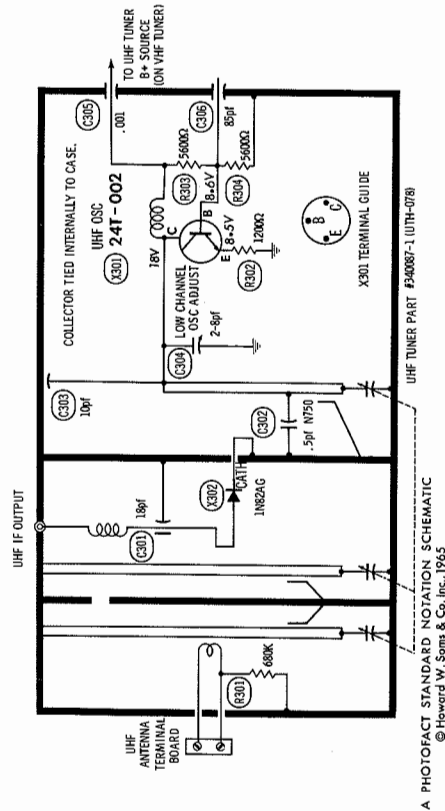
## POWER RECTIFIERS & SIGNAL DIODES

ITEM No.	MEASURED CURRENT	ORIGINAL Port or Type No.	RECTIFIERS				DIODES
			GENERAL ELECTRIC PART No.	MALLORY PART No.	RCA PART No.	SARKES TARZIAN PART No.	
X302		1N92AG					GENERAL ELECTRIC PART No. 1N92A

## CAPACITORS

ITEM No.	RATING	REMARKS	AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	ELEMCO PART No.	MALLOY PART No.	SPRAGUE PART No.
C301	1B							
C302	S	N470						
C303	10							
C304	2-8		NPO-DI 10	DTZ-10	CZ601CG100K	* CCTO-100	* CNO410	10TQC-Q10
C305	.001		EF-.001	MFT-1000		CCF-102	CT280A	
C306								
C308	85							

\* Not normally in distributor's stock. Available thru distributor on order to manufacturer.



A PHOTOFACT STANDARD NOTATION SCHEMATIC  
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## PARTS LIST AND DESCRIPTION

*(When ordering parts, state Model, Part Number, and Description.)*

Replacement parts shown may be superseded by the availability of newly introduced replacements. Have your local distributor check Sams COUNTER FACTS® for the most up-to-date replacement.

## TUBES

• AMPEREX •		• GENERAL ELECTRIC •		• RCA •		• SYLVANIA •	
ITEM No.	USE	TYPE		ITEM No.	USE	TYPE	
V1	1st Video IF	4BZ6		V8	Audio Output	12FX5	
V2	2nd Video IF	4BZ6		V9	Vert. Mult. - Vert. Output	17JZ8	
V3	3rd Video IF	4C8B		V10	Horiz. Mult.	8FY7	
V4	Video Output - Sync Sep.	10GN8		V11	Horiz. Output	18GB5	
V5	AGC Keying	4AU6		V12	Damper	17AY3	
V6	Sound IF	4AU6		V13	HV Rectifier	1G3	
V7	Audio Detector	4DT6					

## PICTURE TUBE

ITEM No.	REPLACEMENT DATA				NOTES
	MAGNAVOX PART No.	GENERAL ELECTRIC PART No.	RCA PART No.	SYLVANIA PART No.	
V14	23HQP4 23HGP4		23HGP4	23HQP4 ①	① Silver Screen "65"

## POWER RECTIFIERS & SIGNAL DIODES

ITEM No.	MEASURED CURRENT	ORIGINAL Part or Type No.	RECTIFIERS				DIODES
			GENERAL ELECTRIC PART No.	MALLOY PART No.	RCA PART No.	SARKES TARZIAN PART No.	GENERAL ELECTRIC PART No.
X1	.330A	530082-2	GE-504A or GE-505	1N1490 or 1N2070	SK-3016 or SK-3017	40C or F-4	
X2		530085-1					1N60
X3		530093-1					6GC1

## ELECTROLYTIC CAPACITORS

ITEM No.	RATING		REPLACEMENT DATA					
	CAP.	VOLT.	MAGNAVOX PART No.	AEROVOX PART No.	CORNELL-DUBILIER PART No.	GENERAL ELECTRIC PART No.	MALLORY PART No.	SPRAGUE PART No.
C1A	200	200	270021-121 †		CC0129, 5. BR40-150			TVLS-4468*
B	200	150						
C	40	150						
D	5	150						
C2	2	50	270082-701	PTT88	NLW2-50	MT1-1	TT50X2	TE-1301

† Chassis T914-01 and 02 use 200mfd, 200mfd, 40mfd @ 200V, Part #270021-120 in this application.

\* Not normally in distributor's stock. Available thru distributor on order to manufacturer.

## 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	.22	(20) †	DBE2P22		DMF1P22	1DP-3-224	PVC1022	2PS-P22
C4	.01		BPD-01	DD-103	BYV102ZU103M	CCD-103	B110	5HK-S10
C5	150		DI-150	DD-150		CCD-151	GP315	10TS-T15
C6	.20			DTZ-20			CNO420	10TCC-Q20
C7	.5-3			829-3			CT565	
C8	.680		DI-680	DD-681	JBY601YP681K	CCD-681	JF368	10TS-T68
C9	.001		BPD-001	DD-102	HVX162XP102M	CCD-102	B210	5HK-D10
C10	.27			DTZ-27			CNO427	10TCC-Q28
C11	.001		BPD-001	DD-102	HVX162XP102M	CCD-102	B210	5HK-D10
C12	.680		DI-680	DD-681	JBY601YP681K	CCD-681	JF368	10TS-T68
C13	.0015	BPD-.0015	DD-152		CCD-152	B215	5HK-D15	
C14	.560	DI-561	DD-561	JBY601YP561K	CCD-561	GP356	10TS-T56	
C15	3.3	NPO ±.25	TCZ-3R3			CNO533	10TCC-V33	
C16	4.7	NPO ±.5	DTZ-4R7			CCTO-4R7	10TCC-V47	
C17	3.3	NPO ±.25	TCZ-3R3			CNO533	10TCC-V33	
C18	4.7	NPO ±.5	DTZ-4R7			CCTO-4R7	10TCC-V47	
C19	3.3	NPO ±.25	TCZ-3R3			CNO533	10TCC-V33	
C20	.047	200V	P288N-047	DD-503	PM2847	4DP-3-473	PVC2147	2TM-S47
C21	.1	400V	P488N-1	DF-104	PM4P1	4DP-3-104	GEM401	4TM-P104
C22	47	NPO 10%	NPO-DI 47	DTZ-47	CX801CG470K	CCTO-470	CNO447	10TCC-Q47
C23	3.3	NPO ±.25		TCZ-3R3			CNO533	10TCC-V33
C24	.01		BPD-01	DD-103	BYV102ZU103M	CCD-103	B110	5HK-S10
C25	.0033	5%						
C26	.01		BPD-01	DD-103	BYV102ZU103M	CCD-103	B110	5HK-S10
C27	3	±.25						10TCC-V30
C28	3	±.25						10TCC-V30
C29	.01		BPD-01	DD-103	BYV102ZU103M	CCD-103	B110	5HK-S10
C30	.01		BPD-01	DD-103	BYV102ZU103M	CCD-103	B110	5HK-S10
C31	.18	N150 5%				*	*	10TCC-Q18
C32	.022		TTD-02	DA-203	HOR101ZV203P	CCD-203	TA120	TCG-S20
C33	.0012		DI-1200	DD-122	JSB601YP122K	CCD-122	JF212	10TS-D12
C34	.01		BPD-01	DD-103	BYV102ZU103M	CCD-103	B110	5HK-S10
C35	.1	600V	P668N-1	DF-104	PM6P1	8DP-4-104	GEM601	8TM-P104
C36	.002	1KV	BPD-002	DD-202	HVX202XU202P	CCD-202	B220	5HK-D20
C37	.001	2KV	HVD-30-1000	DD30-102	HV202XP102M	3CCD-102	2HV210	30GA-D10
C38	.150	10%	ADM-15-151	CPTR-150J	CD7F15IK500	DM-151K	GP315	10TS-T15

SET 790 FOLDER 2

**MAGNAVox CHASSIS**  
T/U914-01-00, T/U914-02-00, T/U914-03-00

## FOLDER 2

## PARTS LIST AND DESCRIPTION (CONTINUED)

(When ordering parts, state Model, Part Number, and Description.)

Replacement parts shown may be superseded by the availability of newly introduced replacements.  
Have your local distributor check Sams COUNTER FACTS® for the most up-to-date replacement.

## CAPACITORS (cont)

ITEM No.	RATING	REMARKS	REPLACEMENT DATA						
			AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	ELMENCOPART No.	MALLORY PART No.	SPRAGUE PART No.	
C39	.047 400V 10%		DBE4S47		DMF4S47	4DP-3-473	PVC4147	4PS-847	
C40	.001 400V 5%				CD19F102J500	DM-19-102J	SX210	MS-210	
C41	.022 400V		P488N-022	CPR-1000J	DD-103	PM4S22	4DP-2-223	GEM4122	4TM-S22
C42	.1 200V		P288N-1	DF-104	PM2P1	2DP-3-104	PVC201	2TM-P10	
C43	.01 1KV		BE10S1		DPMS16S1	16DP-3-103	GEM1011	10TM-S10	
C44	.0015 600V 10%		DBE8D15		DMF8D15	8DP-1-152	PVC8215	6PS-D15	
C45	.0039 200V 10%		DBE8D39		DPM8D39	6DP-1-392	PVC8239	6PS-D39	
C46	.047 400V 10%		DBE4S47		DMF4S47	4DP-3-473	PVC4147	4PS-847	
C47	.047 400V		P488N-047	DD-503	PM4S47	4DP-3-473	GEM4147	4TM-S47	
C48	.1 400V		P488N-1	DF-104	PM4P1	4DP-3-104	GEM401	4TM-P10	
C49	470 10%		DI-470	DD-471	JB801YP471K	CCD-471	JF347	10TS-T47	
C50	220 10%		DI-220	DD-221	JB801YP221K	CCD-221	JF220	10TS-T22	
C51	.027 1KV 10%		BE10S27		BYV601ZU202P	CCD-202	B220	5HK-D20	
C52	.002		BPD-002	DD-332	BYS601ZU332P	CCD-332	B233	5HK-D33	
C53	.0033		BPD-0033	DF-104	PM2P1	2DP-3-104	PVC201	2TM-P10	
C54	.1 200V		P288N-1	DD-102	HVX162XP102M	CCD-102	B210	5HK-D10	
C55	.001 1KV		BPD-001	DD-102	HVX162XP102M	CCD-102	B210	5HK-D10	
C56	.001 1KV		BPD-001	DD-102	HVX162XP102M	CCD-102	B210	5HK-D10	
C57	.002 5%			CPR-2000J	CD19F202J500	DM-19-202J	SX220	MS-220	
C58	.0039 200V 10%			CPR-3900J	DPMS-6D39	6DP-1-392	PVC8239	6PS-D39	
C59	470 5%		ADM-15-471	CPR-470J	CD19F471J500	DM-19-471J	SX347	MS-347	
C60	620 5%		ADM-19-621	CPR-620J	CD19F621J500	DM-19-621J	SX362	MS-362	
C61	.0047		BPD-0047	DD-472	BYX801ZU472P	CCD-472	B247	5HK-D47	
C62	.1 600V		P688N-1	DF-104	PM6P1	6DP-4-104	GEM601	6TM-P10	
C63	88 N1500 5KV 10%		BPD-00068	DD-681	BYZ601ZU681P	CCD-681	B388	5GA-T68	
C64	880								
C65	58 N1500 3KV 10%								
C66	88 NPO 5%								
C67	.0022		BPD-0022	DD-222	BYV601ZU222P	CCD-222	B222	5HK-D22	
C68	.0015		BPD-0015	DD-152		CCD-152	B215	5HK-D15	
C69	.0015		BPD-0015	DD-152		CCD-152	B215	5HK-D15	
C70	.0015		BPD-0015	DD-152		CCD-152	B215	5HK-D15	
C71	.01		BPD-01	DD-103	BYV102ZU103M	CCD-103	B110	5HK-S10	
C72	.001 2KV		HVD-30-1000	DD30-102	HVV203XP102M	3CCD-102	2HV210	30GA-D10	
C73	.1 600V		P688N-1	DF-104	PM6P1	6DP-4-104	GEM601	6TM-P10	
C74	.01 1500V		DAC-27	DD16-103	ACT142ZU103P	16DP-3-104	UAC110	125L-S10	

\* Not normally in distributor's stock. Available thru distributor on order to manufacturer.

① Not used in Chassis T914-01, -02.

## COILS (RF-IF)

ITEM No.	USE	REPLACEMENT DATA					
		MAGNAVOX PART No.	MEISSNER PART No.	MERIT PART No.	MILLER PART No.	STANCOR PART No.	WORKMAN PART No.
L1	1st Video IF	360848-1					
L2	47.25MC Trap	360842-1					
L3A	41.25MC Trap	361178-1					
L4	2nd Video IF	360849-2					
L5	3rd Video IF	361161-1					
L6	4th Video IF	360852-4					
L7	RF Choke (1.7uh)	361157-1	19-1001	BC-562	74F186AP	RTC-8516	T810
L8	RF Choke (10.5uh)	360853-1	19-2016	BC-566	72F105AP	RTC-8522	TA306
L9	Peaking (278uh)	360851-1	19-3275	BC-874	6130	RTC-8576	T347
L10	4.5MC Trap	360851-1			ST-109		
L11	Peaking (122uh)	360853-8	19-3125	TV-195	6153	RTC-8585	T307
L12	Peaking (410uh)	360853-7	19-4400	TV-202	6136	RTC-8579	T351
L13	Sound Takeoff	360845-1			SI-143		
L14	Sound Interstage	360846-2			SI-144		
L15	Quadrature	360847-2					
L16	RF Choke (3uh)	360783-3	19-2011	SW-630	74F336AP	RTC-8517	TB294
	Line Choke	361075-1					

## COILS (SWEEP CIRCUITS)

ITEM No.	USE	REPLACEMENT DATA						
		MAGNAVOX PART No.	MERIT PART No.	MILLER PART No.	STANCOR PART No.	THORDARSON PART No.	TRIAD PART No.	WORKMAN PART No.
L17	Horiz. Stabilizer (Hold)	361171-1	TV-185 ①②	6319 ②	RTC-8829 ②	HS-5 ②	WIC-25 ①②	TA167 ①②

① Disregard Tap.

② Install plastic sleeve on adjustment screw.

## FILTER CHOKE

ITEM No.	CURRENT (Measured)	DC RES.	INDUCTANCE (0 CURRENT 1000~)	REPLACEMENT DATA					NOTES
				MAGNAVOX PART No.	MERIT PART No.	STANCOR PART No.	THORDARSON PART No.	TRIAD PART No.	
L18	.33 ADC	24.5Ω	.37H	320125-1	C-4133	C-2708	28C81	C-40X	

## \* TRANSFORMERS (SWEEP CIRCUITS)

ITEM No.	USE	REPLACEMENT DATA					NOTES
		MAGNAVOX PART No.	MERIT PART No.	STANCOR PART No.	THORDARSON PART No.	TRIAD PART No.	
T1	Vert. Output Alternate	320308-2		A-8147	28S30	A-131X	#May be used in some versions. ① Remove Orange lead and remove vertical damping network if necessary.
T2	Yoke (Horiz. 24mh) 110° (Vert. 76mh)	320314-2 ‡	MDF-143 ①		Y-102	YT-103-1 ①	
T3	Horiz. Output	703046-6					

## \* COMPONENT CONNECTION DATA

ORIGINAL →	HV TRANSFORMER	VERTICAL OUTPUT			YOKE			YOKE PLUG		
		Original Connections			Original Connections			1	2	3
REPLACEMENT ↓			Blue	Red	Green			1	2	3
MERIT								1	2	3
STANCOR			Blue	Black	Red					
THORDARSON			Blue	Red	Yellow					
TRIAD			Blue	Red	Yellow					

## TRANSFORMER (AUDIO OUTPUT)

ITEM No.	IMPEDANCE		REPLACEMENT DATA					NOTES
	PR1.	SEC.	MAGNAVOX PART No.	MERIT PART No.	STANCOR PART No.	THORDARSON PART No.	TRIAD PART No.	
T4	3811Ω	3-4Ω	320279-7	A-301B	A-3825 ①	26S50	S-54X	① Drill new mounting holes.

## SPEAKER

ITEM No.	TYPE	REPLACEMENT DATA		NOTES
		MAGNAVOX PART No.	QUAM PART No.	
SP1	4" PM 3-4Ω	580405-1	4A07	

## COMPONENT COMBINATIONS

ITEM No.	USE	DESCRIPTION	MAGNAVOX PART NO.	REPLACEMENT DATA
K1	Sync Takeoff	22K, 470K, 4.7meg, 150pf, .0022mfd	250526-1	

## MISCELLANEOUS

ITEM No.	PART NAME	MAGNAVOX PART No.	NOTES
M1	VHF Tuner	340089-1	
M2	UHF Tuner	340087-1	
M3	VHF Antenna		JFD Replacement 6521
M4	UHF Antenna		
M5	Mute Switch	170354-2	
M6	Program Switch	160350-1	Micro
M7	Channel Change Sw.	160350-1	Micro
M8	Volume Step Switch	160350-1	Micro
M9	Tuning Motor Ass'y	500200-5	Remote Receiver 704026-3, -5, -10
	Tuning Motor Ass'y	500200-6	Remote Receiver 704026-4, -6

## CABINETS &amp; CABINET PARTS

(When Ordering Specify Model, Chassis &amp; Color)

## WIRING DATA

High Voltage Lead .....	Use BELDEN No. 8868 (17KV) or 8868 (25KV)
Shielded Hook-up Wire .....	Use BELDEN No. 8885 (Single Conductor)
	8738 (Two Conductor)
General-use Unshielded Hook-up Wire .....	Use BELDEN No. 8530 (Solid) Available in 12 Colors
	8524 (Stranded) Available in 12 Colors
Power Cord (Interlock Type) .....	Use BELDEN No. 8874 (Rubber) or 8895 (Plastic)
300Ω Tuner Input Lead .....	Use BELDEN No. 8225
300Ω Antenna Lead-in .....	Use BELDEN No. 8230 or 8275
Antenna Rotor Cable .....	Use BELDEN No. 8464 (Flat) or 8484 (Round) - 4 Conductor
	8485 (Round) - 5 Conductor
	8486 (Round) - 8 Conductor

## CONTROLS

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

ITEM No.	USE	RESIST-ANCE	REPLACEMENT DATA					
			MAGNAVOX PART No.	CENTRALAB PART No.	CLAROSTAT PART No.	CTS-IRC PART No.	MALLORY PART No.	
R1	Volume/Switch	1meg	220135-1	F2-1meg, SPU304, KR-8	C47S-1meg-Z FS-3	B13-137, SK7 or (PPQ13-137, SK7 or (BU1, CF26, SS10, K) * † QJ-1822	PP16A or (RUP16A, SL250, SL35)	
R2A	Contrast	50K	220149-22	F1-50K, R3-500K ①, FFS102			FA54L, RU55R ①, OF1125, JK625	
B	Light Dependent Resistor Range Contrast	1meg, 550K Stop 375Ω	220126-85 ②	F5-500, SF102			UA52R	
R3	Brightness	200K	220189-22	TT-46 or (F1-200K, SNK014)	B47-200K-S	B11-129, TM4 or (BU11, CF14, SS6) *	TA184L or (RU25L, SL37, SN1000) or (UA25L, SN1000)	
R4	Vert. Hold	1meg	220189-19	TT-69 or (F1-1meg, SNK100)	B47-1meg-S	B11-137, TM4 or (BU11, CF17, SS8) *	PTA1254L or (RU16L, SL37, SN1000) or (UA16L, SN1000)	
R5	Vert. Size (Height)	2meg	220189-23	TT-75 or (F1-2meg, SNK1010)	B47-2meg-S	HLC1	PTA26L or (RU28L, SL37, SN1000) or (UA26L, SN1000)	
R6	Vert. Linearity	5meg	220189-24	TT-87 or (F1-5meg, SNK1010)	B47-5meg-S	B11-141, TM4 or (BU11, CF22, SS8) *	PTA56L or (RU56L, SL37, SN1000) or (UA56L, SN1000)	

† "CONCENTRIKIT" Equivalent: K-15 Kit with Base Elements and Shafts: B11-123, P17-105 (Panel),

"SNAPTROL" Equivalent: BU4, CF12, CR20 ①, SF7, SR100, DC1. B17-133 ①, R15-005 (Rear).

① Connect a 500K resistor in series with the left hand terminal of the control and the lead connected to the same terminal of the original control (control viewed from shaft end, terminals down).

② Used in Chassis T914-01 and 02.

\* "SNAPTROL"

## RESISTORS (Power and Special)

ITEM No.	RATING	REPLACEMENT DATA			ITEM No.	RATING	REPLACEMENT DATA		
		IRC PART No.	WORKMAN PART No.	REMARKS			IRC PART No.	WORKMAN PART No.	REMARKS
R26	L.D.R. ①			#230168-1	R72	1000Ω 3W	PWS-1000	3G-1000	#230150-318
R42	4300Ω 7W	PW10-4500	10W-SQ-4400	#240086-2	R75	910Ω 18W	2C-900	20W-SQ-900	#240088-1
R55	V.D.R. ②			#230187-2	R76	4.7Ω 5W	FR 5	F 4.7	#240080-19

① Light Dependent Resistor.

② Voltage Dependent Resistor.

# Magnavox Part Number



**PARTS LIST AND DESCRIPTION**

(When ordering parts, state Model, Part Number, and Description.)  
 Replacement parts shown may be superseded by the availability of newly introduced replacements.  
 Have your local distributor check Sams COUNTER FACTS® for the most up-to-date replacement.

**RECEIVER**

**TRANSISTORS**

ITEM No.	ORIG. TYPE	USE	REPLACEMENT DATA		NOTES
			DELCO PART No.	GENERAL ELECTRIC PART No.	
X1	40P1	1st Amp.	DS-26	GE-2	PNP Magnavox Part #10040-1
X2	40P1	2nd Amp.	DS-26	GE-2	PNP Magnavox Part #10040-1
X3	40P1	3rd Amp.	DS-26	GE-2	PNP Magnavox Part #10040-1
X4	40P2	4th Amp.	DS-26	GE-2	PNP Magnavox Part #10040-2
X5	40P2	Channel Change Relay Control	DS-26	GE-2	PNP Magnavox Part #10040-2
X6	40P2	Volume Step Relay Control	DS-26	GE-2	PNP Magnavox Part #10040-2

**POWER RECTIFIERS & SIGNAL DIODES**

ITEM No.	MEASURED CURRENT	ORIGINAL Part or Type No.	RECTIFIERS		DIODES GENERAL ELECTRIC PART No.
			GENERAL ELECTRIC PART No.	MALLORY PART No.	
X7	.015A	530086-1 (LN411)	GE-505	A50 or 1N3193 SE-3017	SARKES TARZIAN PART No. 20C or F-2

When replacing selenium rectifier with silicon type, add series resistance to obtain original output voltage.

**ELECTROLYTIC CAPACITORS**

ITEM No.	RATING CAP.	VOLT.	REPLACEMENT DATA		SPRAGUE PART No.
			MAGNAVOX PART No.	CORNELL-DUBILIER PART No.	
C1	250	25	270042-24	BR250-25	TV-1208
C2	5	25	D270082-603 (270042-26) ①	NLW6-25	TL-1202
C3	6	25	D270082-603 (270042-26) ①	NLW6-25	TL-1202
C4	25	25	270089-2610	NLW25-25	TL-1207
C5	25	25	270089-2610	NLW25-25	TL-1207

① This part number at 4mfid may be used in some chassis.

**CAPACITORS**

ITEM No.	RATING	REMARKS	REPLACEMENT DATA			
			AEROVOX PART No.	CORNELL-DUBILIER PART No.	ELMENDO PART No.	MALLORY PART No.
C6	.0089	5%	TTD-05	CPR-3900J	DM-19-392J	SK239
C7	.05	20V	TTD-05	CK-503	TA150	TC-550
C8	.05	20V	TTD-05	CK-104	TA150	TC-550
C9	.05	20V	TTD-05	CK-104	TA150	TC-550
C10	.05	20V	TTD-05	CK-503	TA150	TC-550
C11	.05	20V	TTD-05	CK-503	TA150	TC-550
C12	.05	20V	TTD-05	CK-104	TA150	TC-550
C13	.05	20V	TTD-05	CK-104	TA150	TC-550
C14	.05	20V	TTD-05	CK-503	TA150	TC-550
C15	.0033	5%	TTD-05	DM-202	DM-19-332J	MS-233
C16	.0047	5%	TTD-05	CPR-3300J	SK247	MS-247
C17	.0047	5%	TTD-05	CPR-4700J	DM-19-472J	MS-247
C18	.1	600V	NFO-DI 1.0	TC2-1	CNO510	10TCC-V22



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 the particular type of replacement part listed. NA526

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DATE 12 -65 SET 790 FOLDER 2-A

**ALIGNMENT INSTRUCTIONS**

**REMOTE CONTROL**

SIGNAL GENERATOR COUPLING	SIGNAL GENERATOR FREQUENCY	CHANNEL	CONNECT VTVM	ADJUST	REMARKS
Connect high side to point Ⓐ, low side to ground.	22KC		DC probe of VTVM to point Ⓐ, common to ground.	A1, A2	Adjust for MINIMUM.
"	28KC		"	A3	"

**RESISTORS (Power and Special)**

ITEM No.	RATING	REPLACEMENT DATA		ITEM No.	RATING	REPLACEMENT DATA	
		IRC PART No.	WORKMAN PART No.			IRC PART No.	WORKMAN PART No.
R23	.390 5W			R24	2.7Ω 5W		

**COILS (RF-IF)**

ITEM No.	USE	REPLACEMENT DATA		ITEM No.	USE	REPLACEMENT DATA	
		MAGNAVOX PART No.	MEISSNER PART No.			MILLER PART No.	STANCOR PART No.
L1	Input	380964-1					
L2	Alternate Input	380934-1					
L3	28KC Output	380944-1					

**TRANSFORMER (POWER)**

ITEM No.	RATING	REPLACEMENT DATA		ITEM No.	NOTES
		SEC. 1	SEC. 2		
T1	117VAC @ .017A	15VAC	DC		

**MISCELLANEOUS**

ITEM No.	PART NAME	MAGNAVOX PART No.	NOTES
M1	Microphone	CS70014-1	
M2	Step Relay	100385-6	704028-1, -3, -5
M3	Channel Change Relay	100385-6	704028-2, -4
M4	Volume Step Relay	Part of 100385-2	

**WIRING DATA**

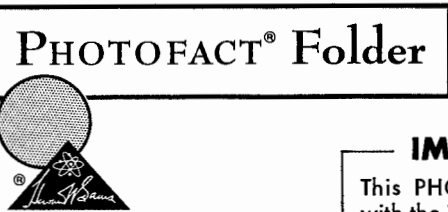
General-use Unshielded Hook-up Wire	..... Use BFLDEN No. 8530 (Solid 22AWG) 8524 (Stranded 22AWG) 8570 (Stranded 26AWG)	Available in 12 Colors
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**TRANSMITTER**

ITEM No.	PART NAME	MAGNAVOX PART No.	NOTES
	Top Case Assembly	170392-1	
	Metal Grille	637323-2	
	Button and Lever Assembly	637256-1	
	Bellows Assembly	170393-1	
	Bottom Case Assy	170394-1	

**MAGNAVOX REMOTE CONTROL RECEIVER 704028-8, TRANSMITTER 704018-4**

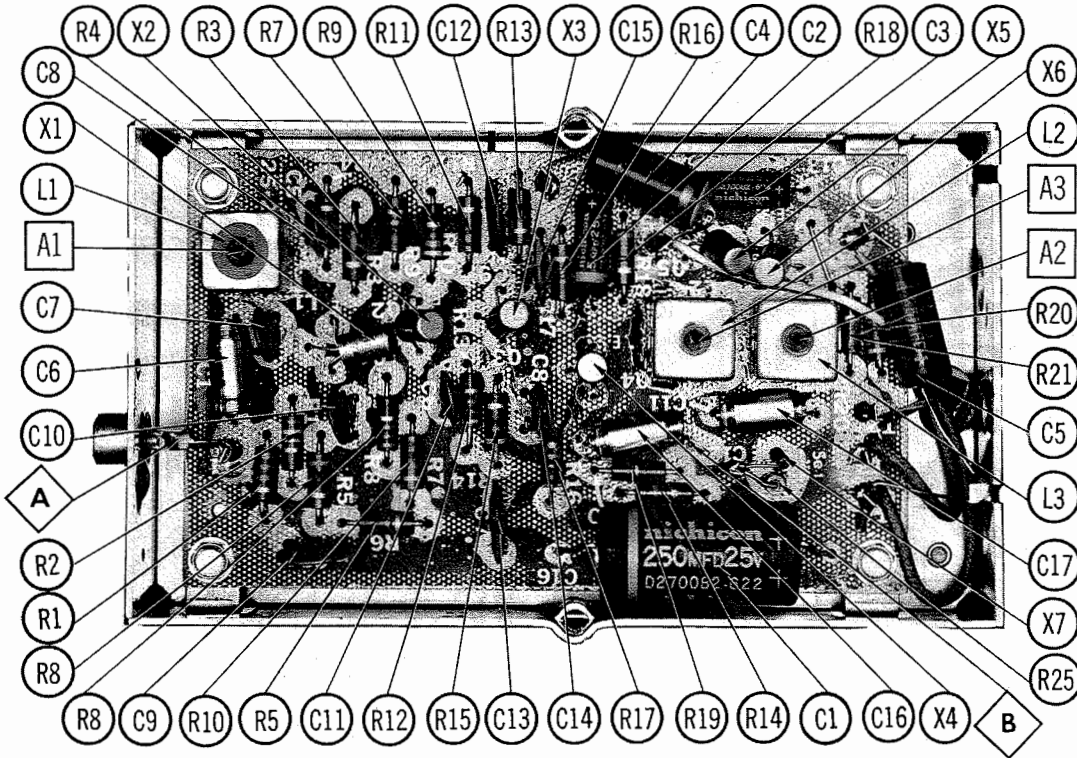
**SET 790 FOLDER 2-A**



with **CIRCUITRACE**

**IMPORTANT FILING NOTICE**

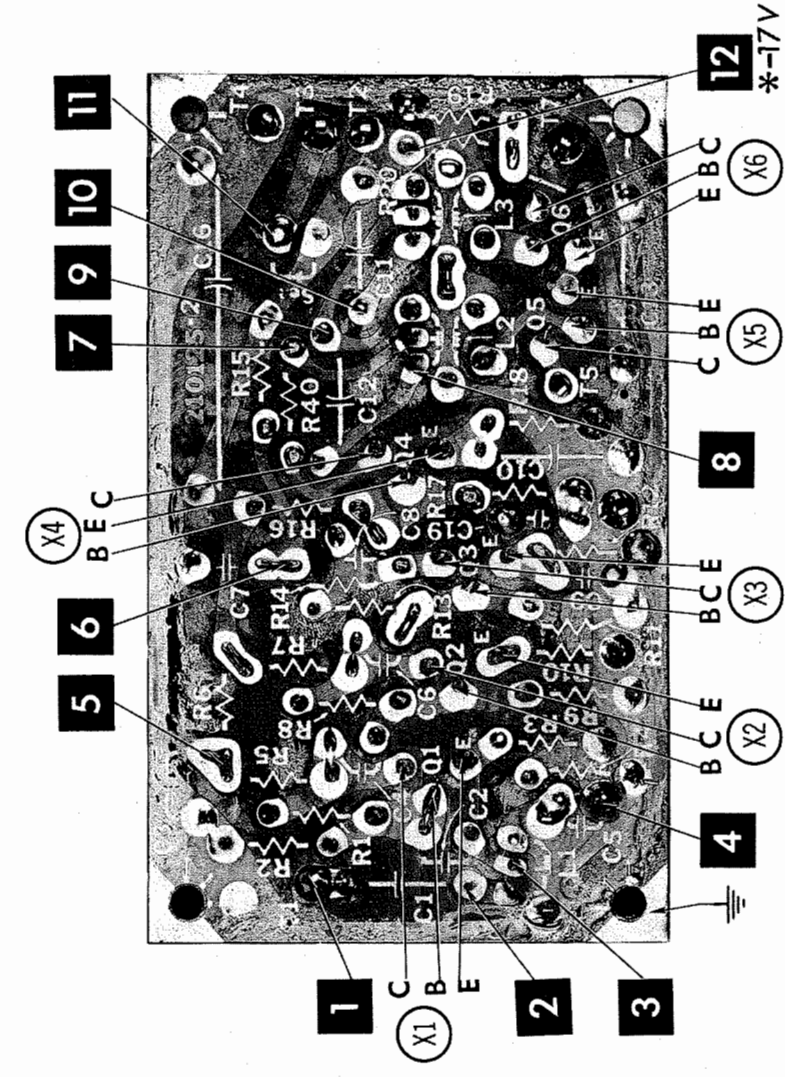
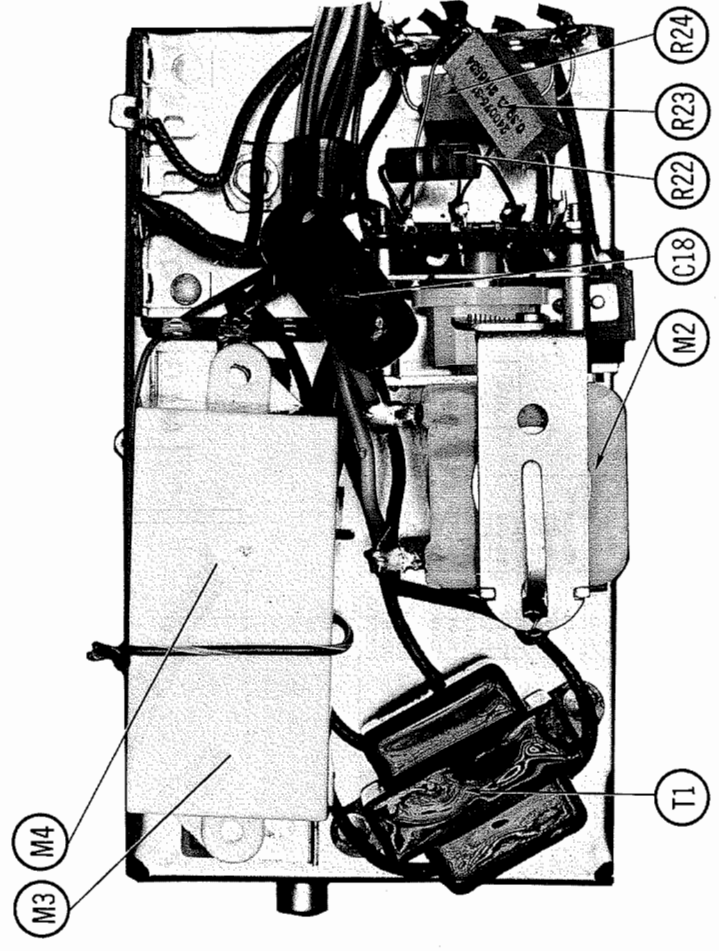
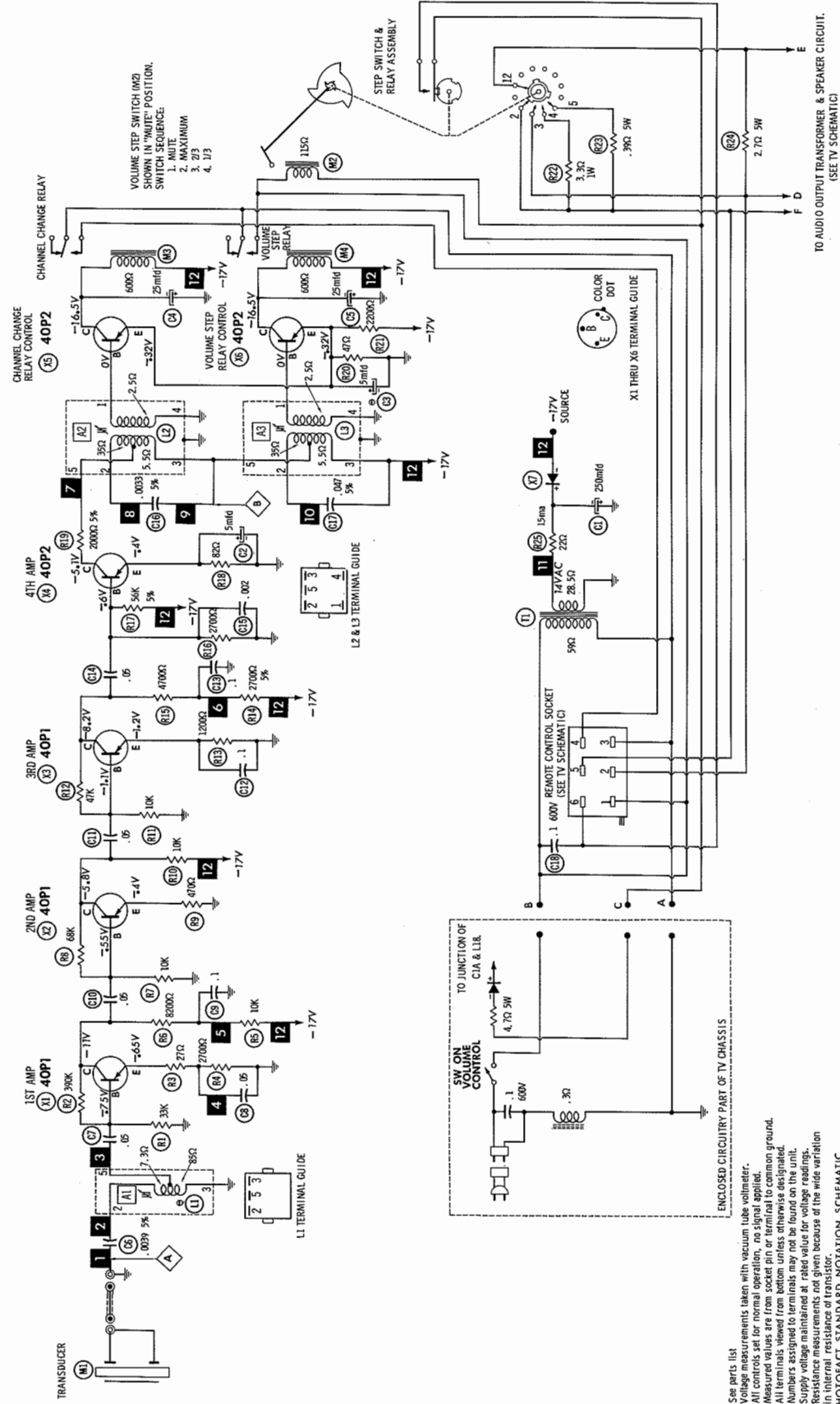
This PHOTOFACT Folder covers equipment used with the TV chassis covered in PHOTOFACT SET 790 FOLDER 2. File this Folder with the TV Folder in the yellow filing jacket provided.



TRADE NAME: Magnavox  
 SUPPLIER: For current address, see Master Index.  
 TYPE SET: Remote Control Receiver 704028-8 and Remote Transmitter 704018-4  
 TRANSISTORS: Six  
 POWER SUPPLY: 110-120 Volts AC, 60 Cycles

**MAGNAVOX REMOTE CONTROL RECEIVER 704028-8, TRANSMITTER 704018-4**

**SET 790 FOLDER 2-A**



\* SOURCE