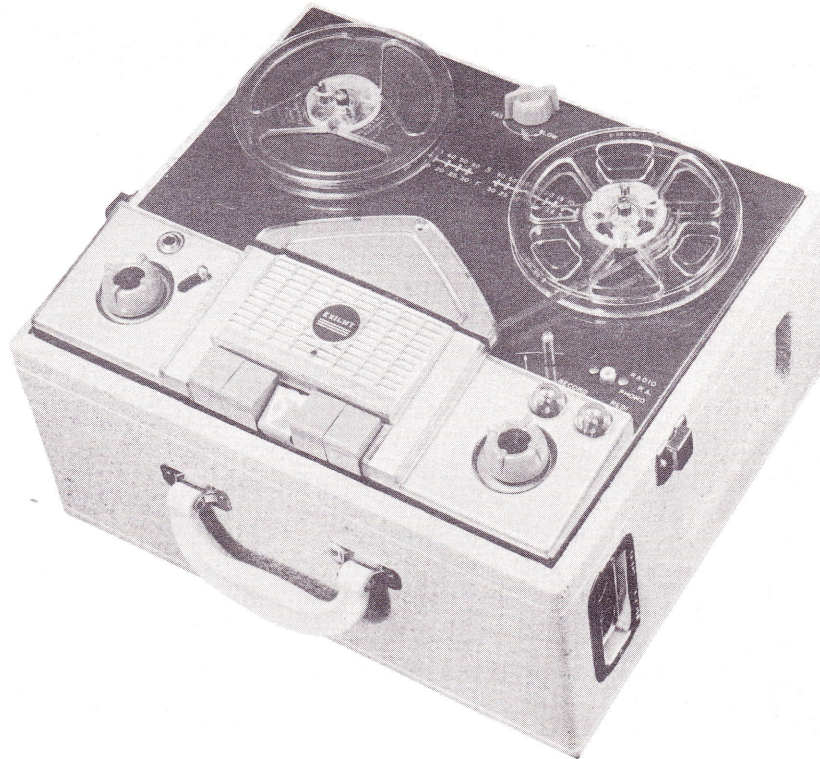




KNIGHT
MODEL 96RZ940



KNIGHT
MODEL 96RZ940

GENERAL INFORMATION

The Knight Model 96RZ940 uses pushbutton control. Two tracks of material can be recorded and played back on standard width recording tape. This doubles the playing time of a standard 5" or 7" reel of tape with no loss of quality or frequency response. Recordings can be made from a radio, television receiver or phonograph. Recordings can be played back through either the self-contained speaker or through an external speaker by using the External Speaker Jack.

Using both channels of the tape, the recording time is as follows:

SIZE	3 3/4" SPEED	7 1/2" SPEED
5" reel (600 ft.)	1 hour	1/2 hour
7" reel (1200 ft.)	2 hours	1 hour.

The Knight is designed to operate on 60 cycle, 115V. AC supply only. Before connecting to a line supply, be absolutely certain that it agrees with the above specifications.

Supplied by:

Allied Radio Corporation
833 W. Jackson Blvd.
Chicago 7, Illinois

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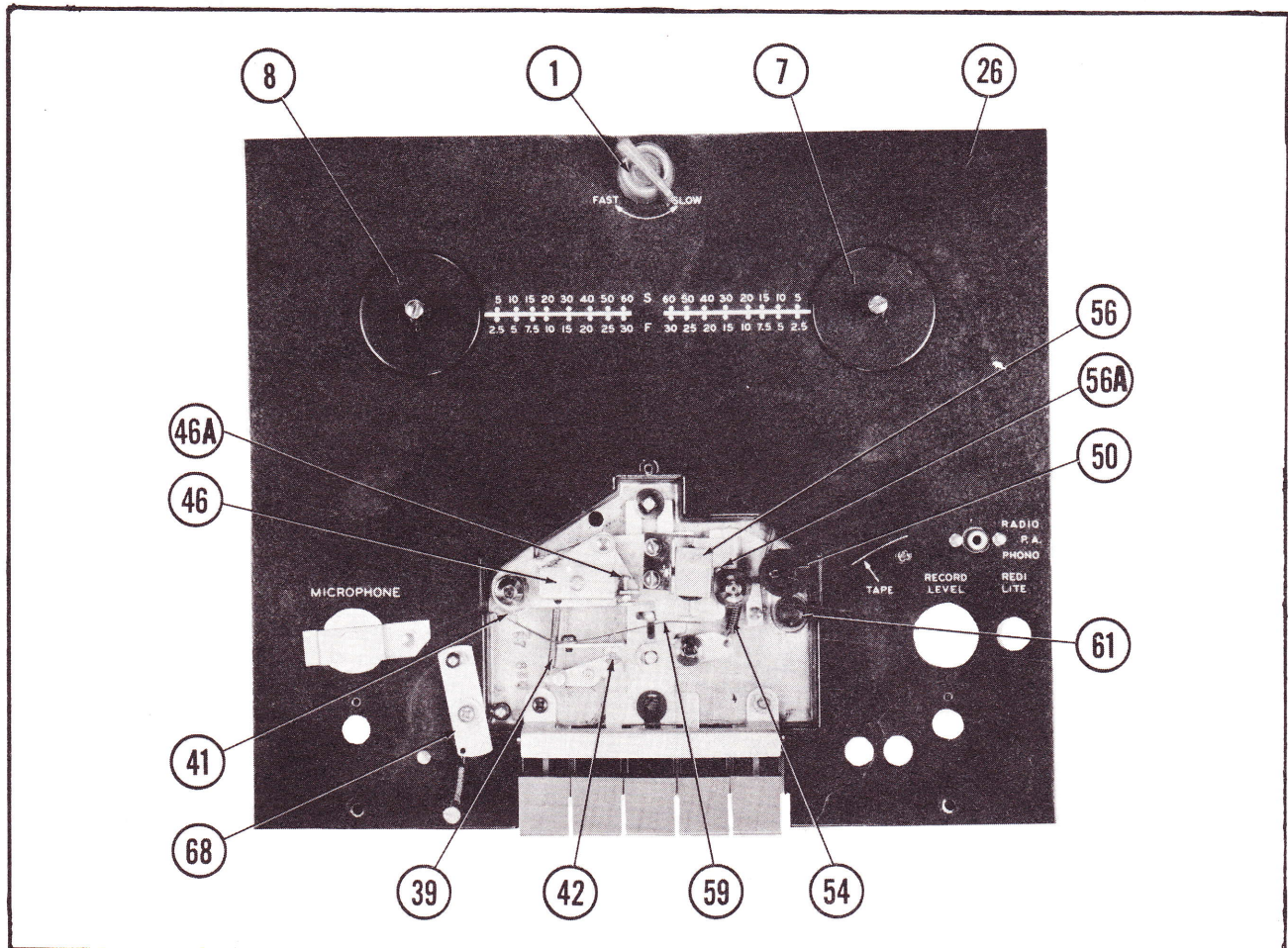


FIGURE 1
OPERATING INSTRUCTIONS

Preparation For Operation

1. Remove the AC power cord, 5" reel of tape, empty reel and the microphone from the storage compartment.
2. Depress the stop button until it locks.
3. Plug the AC cord into a convenient wall receptacle of the proper rating.
4. Set speed change knob to "Slow" or "Fast" as desired.

CAUTION: Do not turn speed change knob unless "Stop" button is depressed.

When the Forward or Reverse buttons are depressed, the Play and Record buttons are locked in the up position. This prevents the possibility of spilling the tape. All buttons should be depressed firmly until they latch. The "Stop" button must be depressed before changing functions or speeds of the recorder.

IMPORTANT: Always depress the "Stop" button when recorder is not in use.

Speed Change Knob

The arrow on the speed change knob (1) should point at "Fast" or "Slow" according to the speed de-

sired. This recorder has two speeds "Fast" - 7 1/2" per second and "Slow" - 3 3/4" per second tape speed.

CAUTION: Turning the speed change knob while the unit is operating will not change the speed. The "Stop" button must be depressed before the speed can be changed.

Threading The Tape

1. Place a full reel of tape on the left (feed) reel plate (8), making sure the slots in the reel are seated on the pan protrusions. Unwind about 14" of tape from the reel.
2. Hold a section of the unwound tape straight with both hands and insert the tape in the tape slot between the escutcheons making certain the dull (coated) side of tape is facing the back of the recorder.
3. Insert the free end of the tape into one of the three slots in the hub of the empty (take-up) reel. Place the take-up reel on the take up spindle (7) and wind up the tape until it is secured on the reel.

To Record From Microphone

1. Turn the On-Off-Volume control (9) to the right until a click is heard, then allow about 30 seconds for the unit to warm up. The "Redilite" will glow when the unit is turned on.

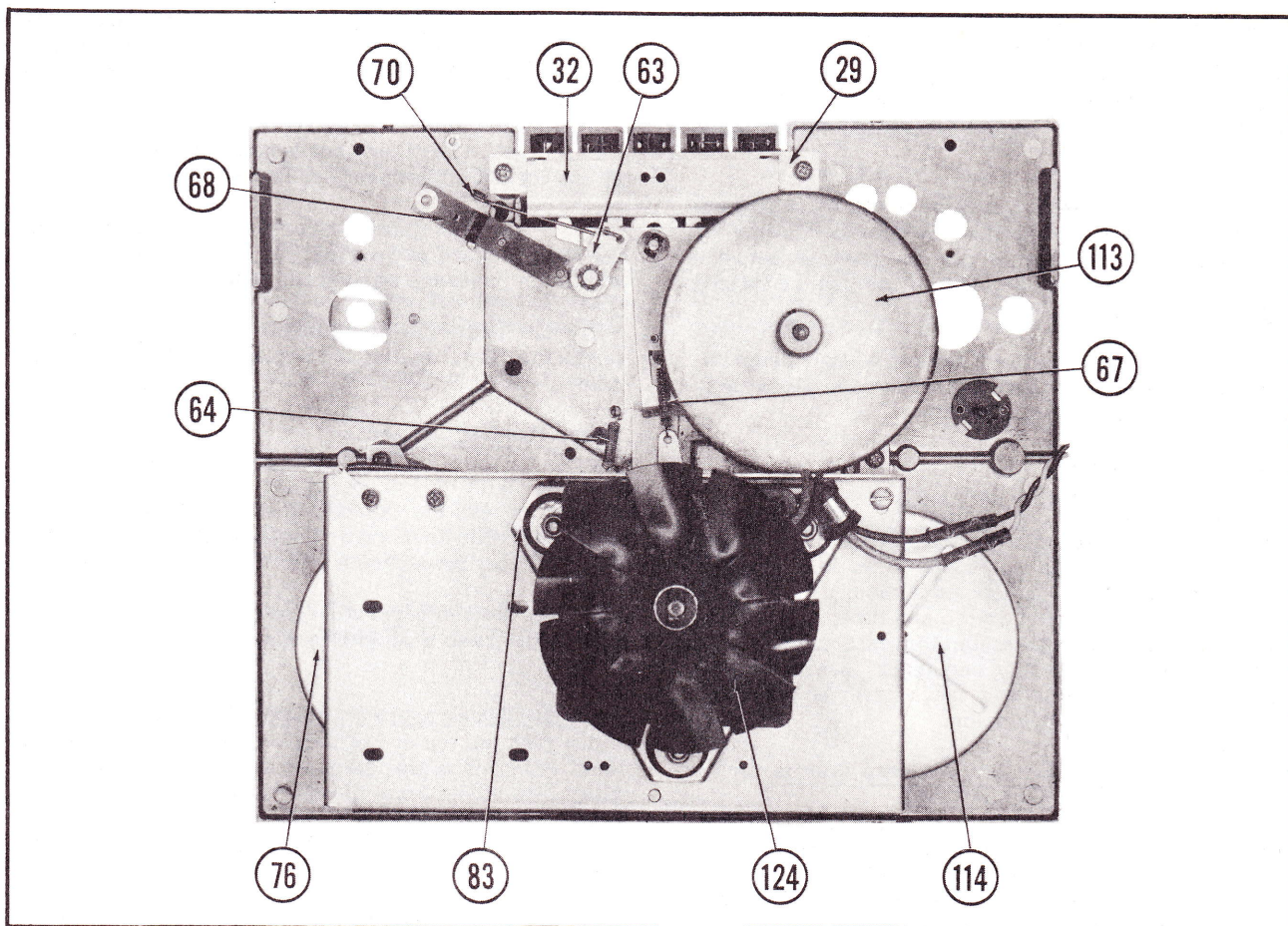


FIGURE 2

2. Insert the microphone plug into the "Microphone" jack.

3. Move the record lock button downward with the left hand. This releases the safety lock which prevents accidental erasures.

4. While holding the record lock button, depress the "Record" button with the right hand until it latches.

5. Adjust the "Volume" Control until the "Record" level indicator just flashes while speaking into the microphone. When the volume control is advanced too far, distortion will result.

Note: The "Tone" control does not operate during recording. When recording from a radio, set the radio "Tone" control to maximum treble.

To Record From Radio, TV, or Phono

1. Insert the phonograph pickup plug into the "Radio-P. A.-Phono" Jack.

2. For radio or TV recording, connect patch cord, (part C-20.233) to the voice coil of the radio or TV receiver speaker by means of the alligator clips. Plug into the "Radio-P. A.-Phono" Jack.

3. Proceed as described under "To Record From Microphone".

NOTE: Remove patch cord after recording is completed.

To Use Second Track

1. When all the tape has wound on the take-up reel, depress the "Stop" button.

2. Remove reel containing tape and place it on feed spindle.

3. Place empty reel on take-up spindle.

4. Thread tape as described under "Threading The Tape".

To Play Recordings

1. Turn unit on with "Volume" control knob (9).

2. Thread tape as described under "Threading The Tape".

3. Set the speed change knob (1) to the speed at which the recording was made.

4. Depress "Play" button until it latches.

5. Adjust "Volume" and "Tone" controls to desired listening level.

High Speed Forward or Reverse

Should it be desired to play a portion of the tape it is not necessary to rewind the entire tape. By depressing the "Forward" or "Reverse" button the tape will advance or rewind at a rapid speed to the desired section.

To Edit and Splice Tape

NOTE: It is impossible to edit and splice one track of tape without affecting the second track, therefore re-recordings to be edited should be limited to one track only.

1. Tape recordings may be edited by cutting out unwanted sections, or by joining selections into another sequence. Announcements can be inserted between selections etc. Unused sections of tape can be spliced together for reuse.

2. For best results cut tape on a slight diagonal, join ends together with splicing tape on the glossy side and trim off any excessive width.

Erasing Recorded Material

When the "Record" button is depressed, the erase head is positioned automatically erasing any previous recording before a new one is made. Material no longer needed may be erased without recording by depressing the "Record" button and turning the "Volume" control to the minimum, (or extreme counter-clockwise position). Only one track is erased at a time. To erase the second track reverse the reels and repeat the above operation.

To Use Recorder As a Public Address System

Insert the microphone plug into the "Microphone" jack. Plug in an extension speaker and depress the "Record" button. Set the "Tone" and "Volume" controls to the desired level. A recording can be made at the same time by placing a tape on the unit in the normal manner.

NOTE: When using the public address feature keep the microphone as far away from the speakers as possible to prevent "feedback" squeal.

ADJUSTMENTS

Record-Play Head Adjustment (See Exploded View)

For maximum frequency response, adjust the record-play head (56) as follows:

1. Remove the rear escutcheon (4).
2. Thread an alignment tape or good recorded tape in the usual manner.
3. Set the controls as described under "To Play Recordings".
4. With the unit playing turn head adjustment screw (56A) clockwise or counter-clockwise until maximum high frequencies are obtained.

Pressure Pad Adjustment (See Exploded View)

1. Remove the front escutcheon (13).
2. Depress the "Play" button. Do not turn the recorder on.
3. Using a pencil type postal scale, check the amount of pressure necessary to just pull the pad

away from the tape. The test should be made on the end of the pressure pad mounting spring (59). Adjust the pressure pad for 1 3/4 oz. \pm 1/4 oz. pressure as follows:

(a) The record head pressure pad is adjusted by the locked adjustment screw (42).

(b) The guide post pressure pad (41) by bending the pressure pad spring. It must be adjusted for minimum pressure against the tape.

4. After the adjustments are completed depress the "Stop" button and replace the front escutcheon.

Erase Head Adjustment

1. With tape properly threaded, turn recorder on and depress the "Record" button. Allow tape to run a few seconds then turn recorder off, but leave the "Record" button depressed.

2. With the escutcheons (4) and (13) removed check the erase head (44) to see if it is parallel to the tape.

3. Check to see if the top edge of the tape coincides with the top end of the diagonal slot in the erase head (junction of the diagonal slot and short vertical slot). To adjust level of tape, loosen set screw (34), (exploded view), and rotate tape guide post (35) to move tape up or down to correct height. Tighten set screw (34).

4. After this adjustment has been made, check to see if tape moves forward approximately 1/64" when the "Record" button is depressed. If not, loosen the forward adjustment screw (44A), exploded view, and turn the screw in or out as required to obtain 1/64" movement. Tighten the locknut. Replace escutcheons.

Brake Shoe Adjustment

1. To adjust the brake shoes the complete mechanism must be removed from the carrying case, and the speaker disconnected.

2. With all push buttons in the up position the brake shoes (99A) should clear the drums by approximately 1/8".

3. Depress the "Stop" button while observing the brake shoes. Both brake shoes must contact the drums at the same time and with equal pressure.

4. Adjust by bending spring arm (99).

Adjustment for Slow Take-Up Reel

1. Occasionally the spring drive belt (51) stretches after a period of time. This results in insufficient drive torque to wind the tape properly on the take-up reel. Replace belt as follows:

(a) Remove rear escutcheon (4) and take-up reel pan (7). Depress the "Stop" button and remove old belt from around the pressure roller (50). Lift clear of recorder. Install new belt by reversing the above procedure.

Bias Adjustment

The bias voltage can be checked without dismantling the unit by connecting a VTVM across the top lug

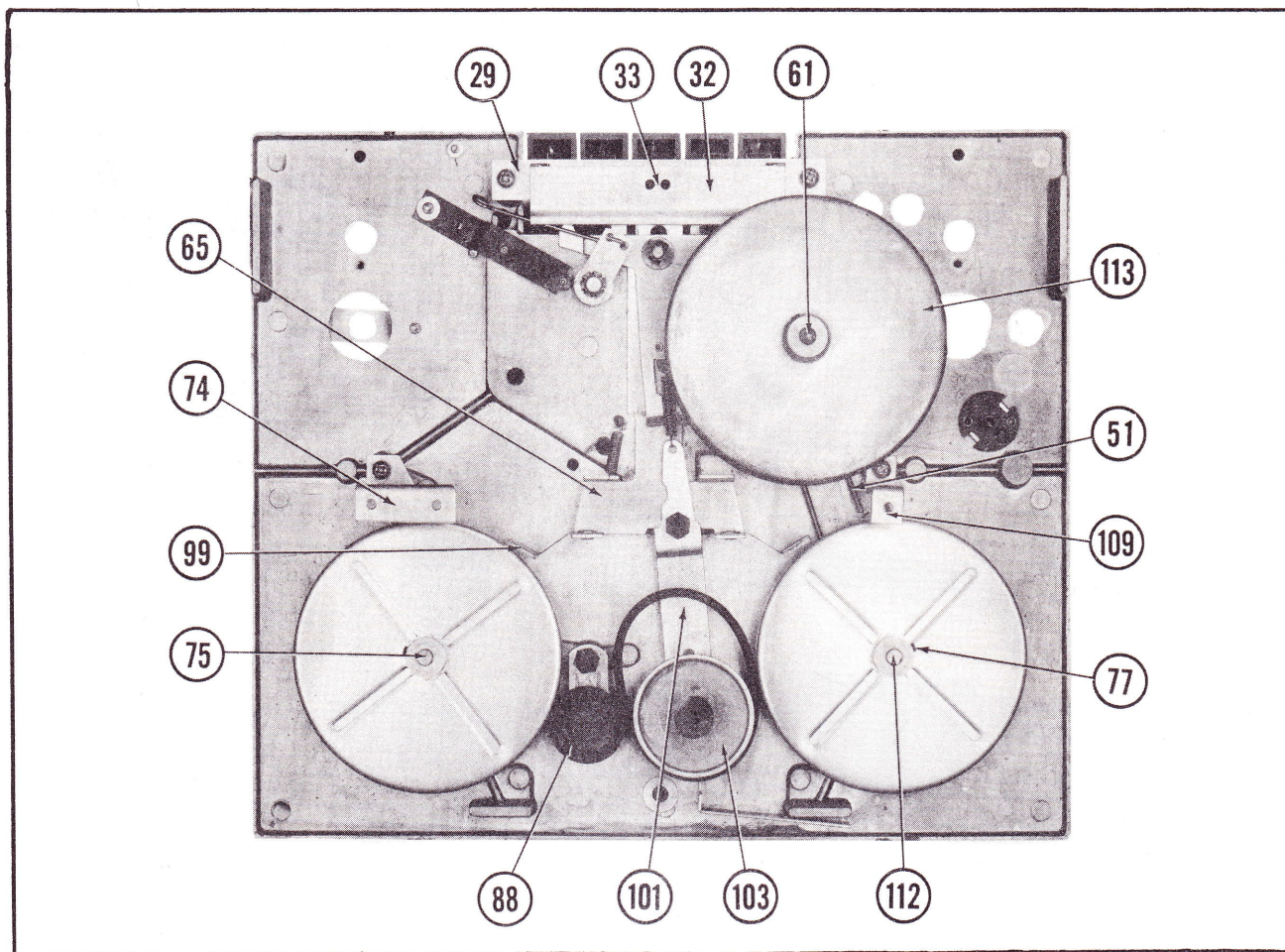


FIGURE 3

of the recording head and chassis. Using no tape, turn the recorder on and depress the "Record" button. If 75 to 100 volts are present no adjustment is necessary.

If the reading is outside this range, proceed as follows:

1. Try a new 12AY7, 12AX7, 6AQ5, and 5Y3.
2. If still not within range, remove chassis and connect a low capacity VTVM from test point "A" to ground. Using low scale adjust trimmer C18 to obtain maximum reading. This provides the optimum in performance.

Neon Record Level Indicator

The neon record indicator firing level adjustment is required only if a neon bulb is replaced. The neon indicator is adjusted for correct firing level by means of the trimmer capacitor. To adjust proceed as follows:

1. Connect a short jumper lead across the bias oscillator coil, L1, to disable the oscillator.
2. Turn the recorder on and depress the "Record" button.
3. Plug an audio oscillator, set at 1000 cycles, into the microphone input jack. Set oscillator output to .01 volt. (A one volt output can be connect-

ing a 100 to 1 resistor reduction pad between the oscillator output and microphone input.

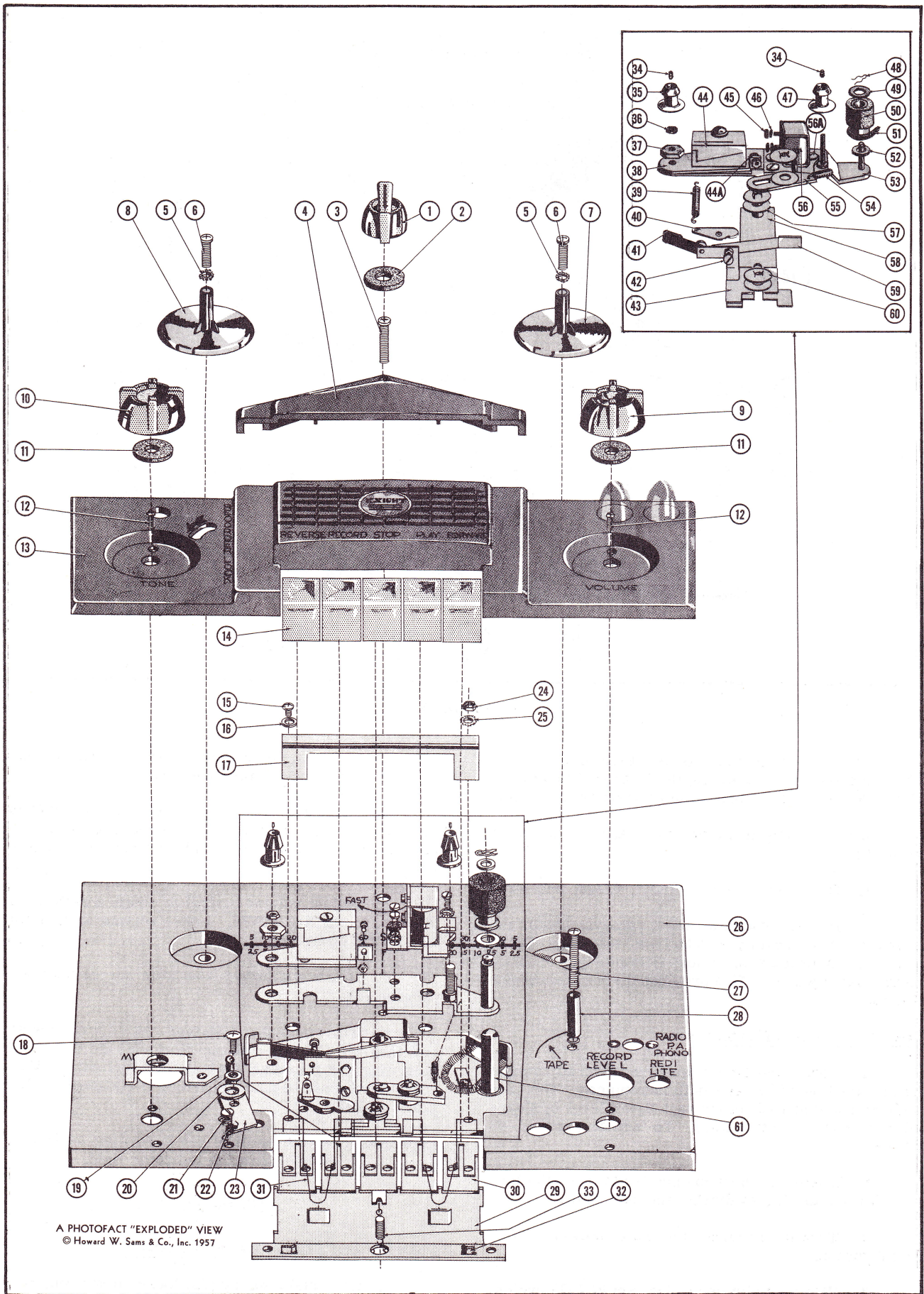
4. Connect probe of low capacity type AC VTVM to test point "B" (Junction of coupling capacitor C20 and 330K resistor R22 on terminal strip near volume control).
5. Adjust volume control to obtain a reading of 36 volts on the AC VTVM. Leave volume control set and VTVM connected.
6. Remove shorting lead from across bias oscillator coil.
7. Turn indicator trimmer C22 fully clockwise and then turn slowly counter-clockwise so that upon loosening the trimmer the bulb barely lights. This adjustment must be made loosening the trimmer. Remove VTVM.

Important: Do not readjust the recording oscillator after setting the indicator light.

TROUBLES

Push Buttons Fail To Latch In Position

1. Lock plate spring (33) loose or broken, resulting in lock plate not being held against the hinge bracket (29).



A PHOTOFAC "EXPLODED" VIEW
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FIGURE 4A - EXPLODED VIEW OF PARTS ABOVE BASEPLATE.

**KNIGHT
MODEL 96RZ940**

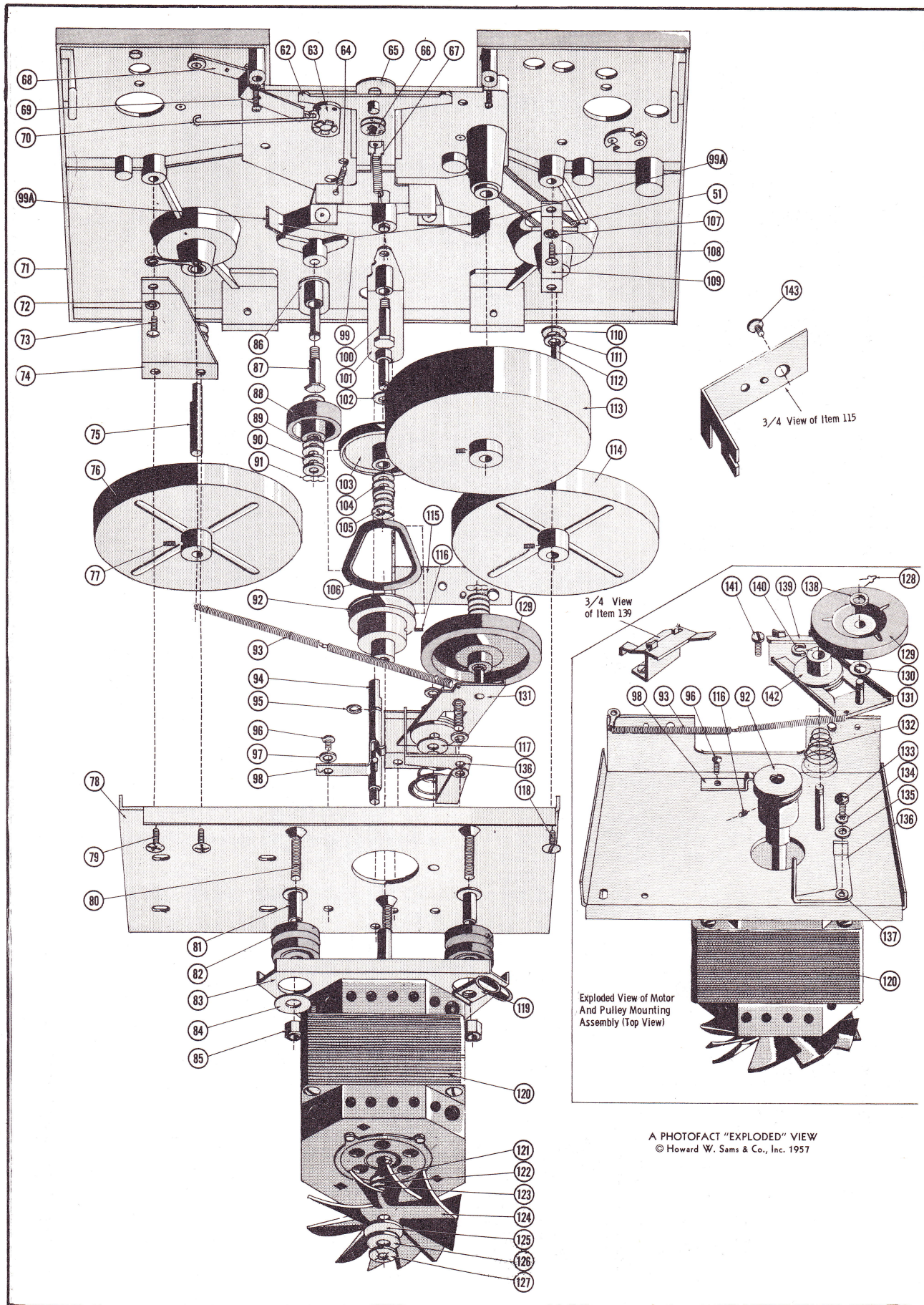
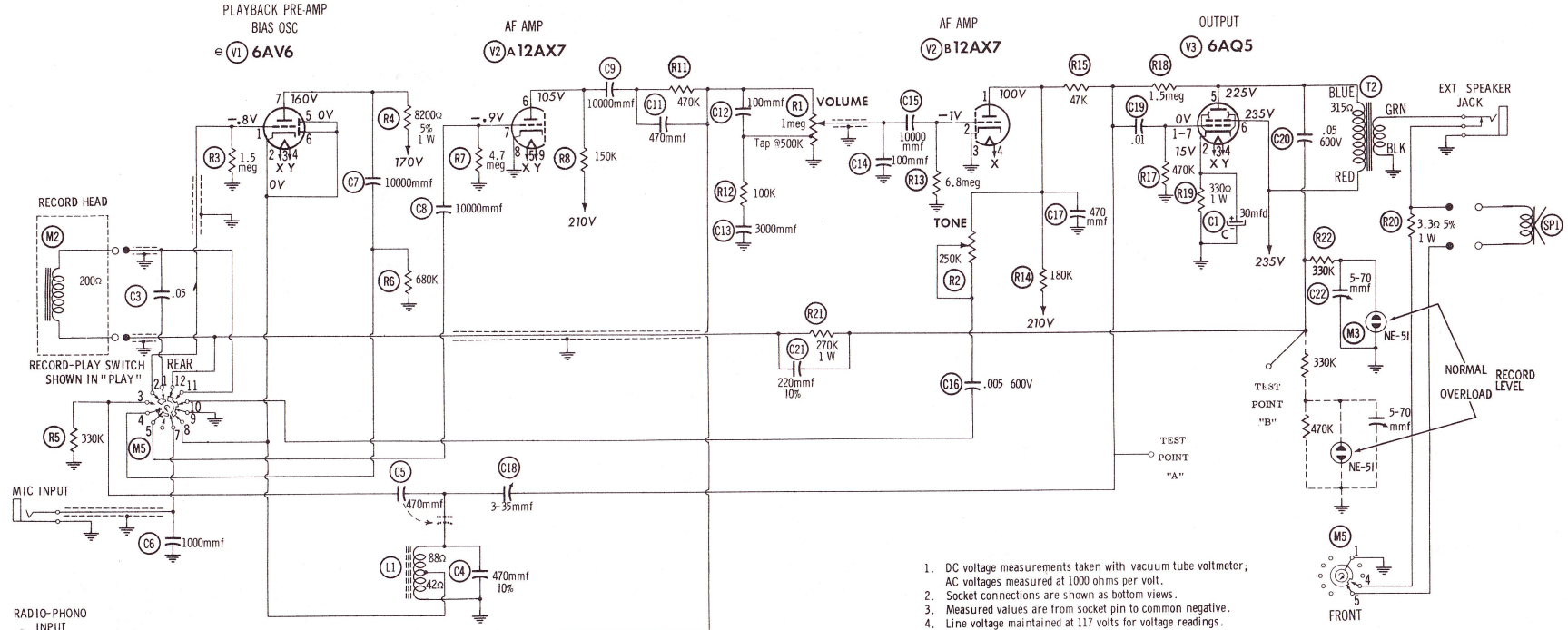


FIGURE 4B - EXPLODED VIEW OF PARTS BELOW BASEPLATE.



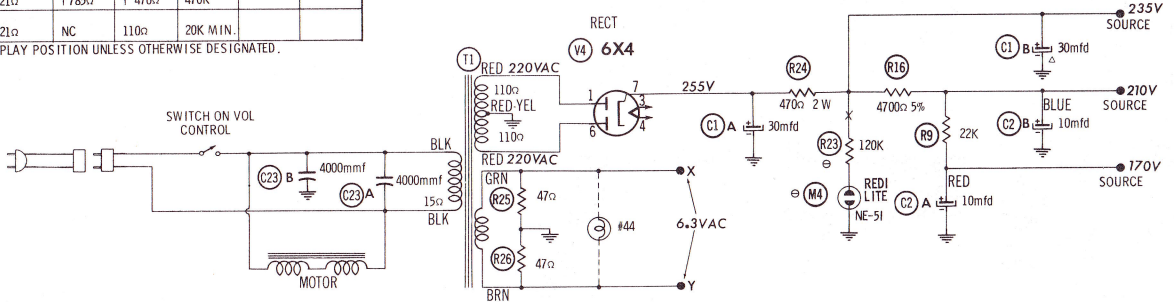
1. DC voltage measurements taken with vacuum tube voltmeter; AC voltages measured at 1000 ohms per volt.
2. Socket connections are shown as bottom views.
3. Measured values are from socket pin to common negative.
4. Line voltage maintained at 117 volts for voltage readings.
5. Nominal tolerance of component values makes possible a variation of ±15% in voltage and resistance readings.
6. All controls at minimum, proper output load connected.

RESISTANCE READINGS

ITEM	TUBE	Pin 1	Pin 2	Pin 3	Pin 4	Pin 5	Pin 6	Pin 7	Pin 8	Pin 9
V1	6AV6	1.5Meg	42Ω	21Ω	21Ω	42Ω	42Ω	† 35K		
V2	12AX7	† 185K	6.8Meg	0Ω	21Ω	21Ω	† 155K	4.7Meg	0Ω	21Ω
V3	6AQ5	470K	330Ω	21Ω	21Ω	† 785Ω	† 470Ω	470K		
V4	6X4	110Ω	TP	21Ω	21Ω	NC	110Ω	20K MIN.		

ALL MEASUREMENTS TAKEN IN PLAY POSITION UNLESS OTHERWISE DESIGNATED.
 † MEASURED FROM PIN 7 OF V4.
 † TIE POINT
 NC NO CONNECTION.

SEE PARTS LIST FOR ALTERNATE VALUE OR APPLICATION



Fails To Erase

1. Spring (39) loose or broken resulting in the erase head (44) not being pulled forward to engage the tape.
2. Erase head (44) not aligned properly. See "Erase Head Adjustment".

No Fast Forward Or Reverse

1. Idler lever tension spring (67) may be loose or broken, not allowing idler lever (101) to be actuated.
2. Check idler drive belt (106) for proper operation.

No Drive On Record Or Playback

1. Idler tension spring (93) loose or broken, thereby not holding idler wheel (129) in solid contact with motor pulley (92) and flywheel (113).
2. Idler slide plate (131) binding on slide bushing (142) preventing idler wheel (129) from moving into position.

Tape Fails To Wind On Take-Up Reel During Record or Playback

1. Reel drive spring (51) loose or broken. See "Adjustment For Slow Take-Up Reel".
2. Brake drum shaft (112) binding. Clean foreign matter from bearing surface.

Speed Variation or "Wow"

1. Check Capstan (61), pinch roller (50), idler wheel (129), motor pulley (92) and flywheel (113) for

oil or foreign matter on the driving surfaces. Clean these surfaces with a good cleaning fluid.

2. Check motor pulley (92) to see if it is secured to motor shaft.
3. Check idler tension spring (93) to see if it is holding idler wheel (129) in firm contact with motor pulley (129) and flywheel (113).
4. Idler slide plate (131) binding on slide bushing (142) preventing idler wheel (129) from making positive connection with motor pulley (129) and flywheel (113).

CLEANING

The record head (56), capstan (61) and pressure roller (50) are subject to an accumulation of tape coating residue, which is worn off the tape as it passes these parts. Use a soft cloth and alcohol to clean the head surfaces, pressure roller and capstan.

CAUTION: Do not use a brush or metal object to clean the record head as this could mar the metal pole piece.

LUBRICATION

All rotating parts are provided with generous size oilite bearings, lubricated at the factory and requiring no further attention.

An occasional cleaning out of foreign material under the plastic pushbutton cover is desirable. Also, a small drop of oil on the sliding members is advisable.

**KNIGHT
MODEL 96RZ940**

MECHANICAL PARTS LIST

Ref. No.	Part No.	Description	Ref. No.	Part No.	Description
1	C-13.253-18	Speed Shift Knob	19	73-2231-5	#8 Int. Lockwasher, Stl. C. P.
2	73-2254-3	Felt Washer, 3/4 O. D X 1/4 I. D X 1/16	20	73-2241-148F	Flat Washer 1/2 x .200 x 1/32 Stl. C. P.
3	57-3494-0	Screw #6-32 X 1 OHMS Brass, Phillips	21	57-3586-1	#8-32 x 5/16 Tr. H. M. S. St. Slot Stl. C. P.
4	D-13.264-1	Rear Escutcheon	22	B-31.338B	Record Lock Return Spring
5	73-2231-4	#6 Int. Lockwasher, Stl. C. P. (2 Used)	23	B-35.775B	Interlock Lever & Handle Assembly.
6	57-2049-4	Screw, 6-32 X 1/4 B. H. M. S. Stl. Br. Pltd. (2Used)	24	48-410-1	#6-32 Hex Nut Steel C. P.
7	B-13.262-8	Reel Pan for Take-Up Reel	25	73-2234-3	#6 Ext. Lockwasher Stl. C. P.
8	B-13.262-8	Reel Pan for Feed Reel	26	D-35.861-1	Base Plate Assembly
9	C-13.254-13	Volume Control Knob	27	57-3496-1	#6-32 x 1 R. H. M. S. Phillips Stl. C. P.
10	C-13.254-13	Tone Control Knob	28	B-32.282-A	Tape Guide Post
11	73-2254-3	Felt Washer, 3/4 O. D X 1/4 I. D. X 1/16 (2 Used)	29	B-19.859-1J	Hinge Bracket for Push Buttons
12	57-2624-5	Screw, #6-32 X 3/8 BHMS Phillips Stl. (2 Used)	30	B-19.876D	Push Button Lever (5 used)
13	E-13.265-2	Front Escutcheon	31	B-31.337B	Push Button Return Spring
14	B-13.258	Push Button, Gray, (5 Used)	32	B-19.870C	Push Button Lock Plate
15	57-2109-2	Screw, #6-32 X 3/16 BHMS St. Stat. Bronz Phillips	33	B-31.343A	Lock Plate Spring
16	73-2231-4	#6 Int. Lockwasher Stl. C. P.	34	57-3439-0	#6-32 x 3/16 Bristol Head Set Screw (2 Used)
17	B-19.858	Pushbutton Retainer Bracket.	35	B-32.300D	Tape Guide Post (Left).
18	57-2471-1	Screw, #8-32 x 1/4 RHMS Stl. C. P. Phillips	36	48-410-1	#6-32 Hex Nut Steel C. P.
			37	B-32.260D	Tape Guide Post Spacer
			38	B-35.794	Erase Head Plate Assembly

PARTS LIST AND DESCRIPTIONS TUBES (GENERAL ELECTRIC, SYLVANIA)

ITEM No.	USE	TYPE	NOTES	ITEM No.	USE	TYPE	NOTES
V1	Playback Pre-amplifier	6AV6	Note 1.	V3	Output Rectifier	6AQ5	
V2	Bias Osc. AF Amplifier	12AX7		V4	Rectifier	6X4	

Note 1. Some versions use a 6AT6.

ELECTROLYTIC CAPACITORS

ITEM No.	RATING CAP. VOLT.	REPLACEMENT DATA				SPRAGUE PART No.
		KNIGHT PART No.	AEROVOX PART No.	CORNELL-DUBILIER PART No.	MALLORY PART No.	
C1A	30	BPD-05	AFH3-88	CO670	FP216-8	T-340
C1B	30	1464-00047			TC58	MMT-0210
C1C	30	SI470		BHRD8D45	TCD52	MTD-4510
C2A	10	SI1000	PRS250V100			TVA-2722
C2B	10	SI1000				

* Non Catalog Item

FIXED CAPACITORS

Capacity values given in the rating column are in mfd. for Paper Capacitors, and in mmfd. for Mica and Ceramic Capacitors.

ITEM No.	RATING CAP. VOLT.	REPLACEMENT DATA						NOTES
		KNIGHT PART No.	AEROVOX PART No.	CENTRALAB PART No.	CORNELL-DUBILIER PART No.	ERIE PART No.	MALLORY PART No.	
C3	05	D-3, 100-18	BPD-05	DF-503	CUB255	ED-470	GEM-415	2TM-S5
C4	470	D-4, 105-1	1464-00047	D6-471	9H3T47	GP-470	UC-5347	MS-347
C5	470	C-4, 109-2	SI470	D6-102	L76T47	GP-1000	DCS21	5GA-T47
C6	1000	C-4, 109-9	SI1000	D6-103	L76T1	GP-10000	DCS21	5HK-D1
C7	10000	C-4, 109-33	SI10000	D6-103	L76S1	GP-10000	DCS11	5HK-S1
C8	10000	C-4, 109-33	SI10000	D6-103	L76S1	GP-10000	DCS11	5HK-S1
C9	10000	C-4, 109-33	SI10000	D6-103	L76S1	GP-10000	DCS11	5HK-S1
C10	1500	C-4, 109-13	SI1500	D6-152	L76D15	GP-1500	DCS215	5HK-D15
C11	470	C-4, 109-2	SI470	D6-471	L76T47	GP-470	UC-5347	5GA-T47
C12	100	C-4, 109-10	SI100	D6-101	L76T1	GP-100	UC-531	5GA-T1
C13	3000	C-4, 109-31	SI3000	D6-302	L76D3	GP-3000	UC-531	5GA-D3
C14	100	C-4, 109-10	SI100	D6-101	L76T1	GP-100	UC-531	5GA-T1
C15	10000	C-4, 109-33	SI10000	D6-103	L76S1	GP-10000	DCS11	5HK-S1
C16	005	D-3, 100-4	BPD-005	D6-502	CUB6D5	GP-5000	GEM-625	6TM-D5
C17	470	C-4, 109-2	SI470	D6-471	L76T47	GP-470	UC-5347	5GA-T47
C18	3-35	E-4, 144						
C19	01	D-3, 100-7	BPD-01	D6-103	CUB4S1	GP-10000	GEM-411	4TM-S1
C20	05	D-3, 100-20	BPD-05	DF-503	CUB6S5	GP-10000	GEM-615	6TM-S5
C21	220	C-4, 109-27	1469-00022	D6-221	L10T22	ED-220		5GA-T22
C22	5-70							
C23A	4000	B-4, 131-1	BPD-2X004	D6-402	BYC6DD4	ED2-004	DCD524	5HK-2D4
C23B	4000			D6-402				

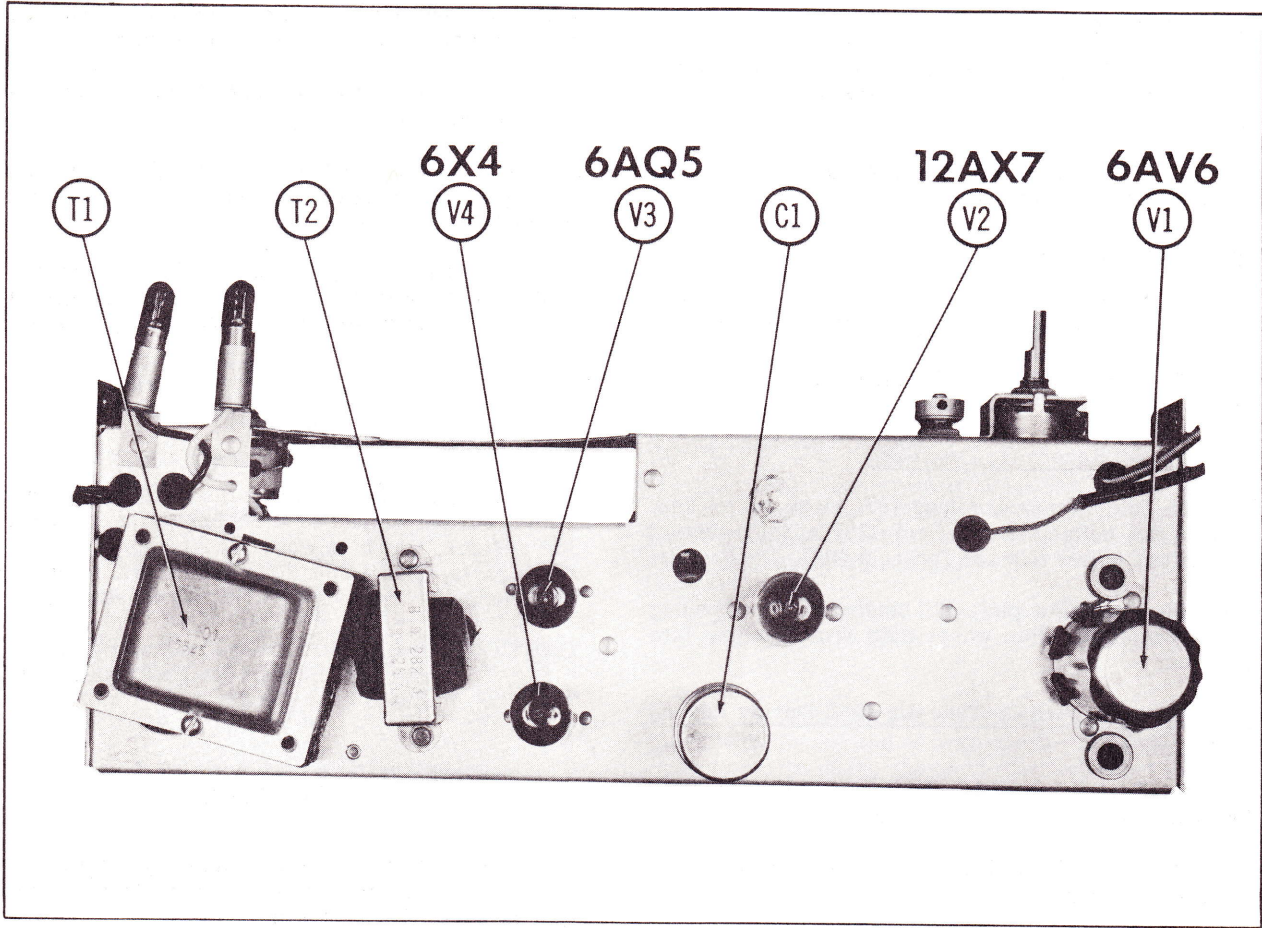
CONTROLS

ITEM No.	RATING RESIST-ANCE	WATTS	REPLACEMENT DATA				INSTALLATION NOTES
			KNIGHT PART No.	CENTRALAB PART No.	CLAROSTAT PART No.	IRC PART No.	
R1A	1Meg	1/2	C-8, 227-2	BT-71	A47F5-1Meg	Q19-137X	UT-443
B	Shaft			KB-1	SWE-12	76-1	Not Req.
C	Switch			B-50	A47-250K-S	Q11-130	US-26
R2A	250K	1/2	C-8, 231-1	Not Req.	FS-3	Not Req.	U46
B	Shaft				FS-3	Not Req.	Not Req.

Volume Tap @ 500K

Tone

CHASSIS—TOP VIEW



PARTS LIST AND DESCRIPTIONS (Continued)

RESISTORS

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

ITEM No.	RATING		REPLACEMENT DATA		NOTES
	OHMS	WATT	KNIGHT PART No.	IRC PART No.	
R3	1.5Meg		BTS-1.5Meg		
R4	8200Ω 5%	1	DCF-8200	BTS-47K	
R5	330K		BTS-330K	DCF-4700	
R6	680K		BTS-680K	BTS-470K	
R7	4.7Meg		BTS-4.7Meg	BTS-1.5Meg	
R8	150K		BTS-150K	BTA-330	
R9	22K		BTS-22K		
R10	68K		BTS-68K	BTA-270K	
R11	470K		BTS-470K	BTS-330K	
R12	100K		BTS-100K	BTS-120K	
R13	6.8Meg		BTS-6.8Meg	BTS-470	
R14	180K		BTS-180K	BTS-47	

TRANSFORMER (POWER)

ITEM No.	RATING			REPLACEMENT DATA		
	SEC. 1	SEC. 2	SEC. 3	KNIGHT PART No.	Slancor PART No.	Triad PART No.
T1	117VAC ④ .31A	440VCT ④ 1.6A	6.3V ④ 1.6A	C-9, 281*	P-6348 ①	

① Tape Center Tap On 6.3V Fil. Winding.

TRANSFORMER (AUDIO OUTPUT)

ITEM No.	IMPEDANCE	REPLACEMENT DATA			NOTES		
		KNIGHT PART No.	Hollidorsen PART No.	Triad PART No.			
T2	1500Ω 3-4Ω	B9-282-3	Z1107	A-2930	A-3877	24551	S-3X

COILS (RF-IF)

ITEM No.	USE	REPLACEMENT DATA			NOTES
		KNIGHT PART No.	MEISSNER PART No.	MILLER PART No.	
L1	Bias Osc. Coil	B-1.557			37 Millihenries

* Tapped @ 42Ω

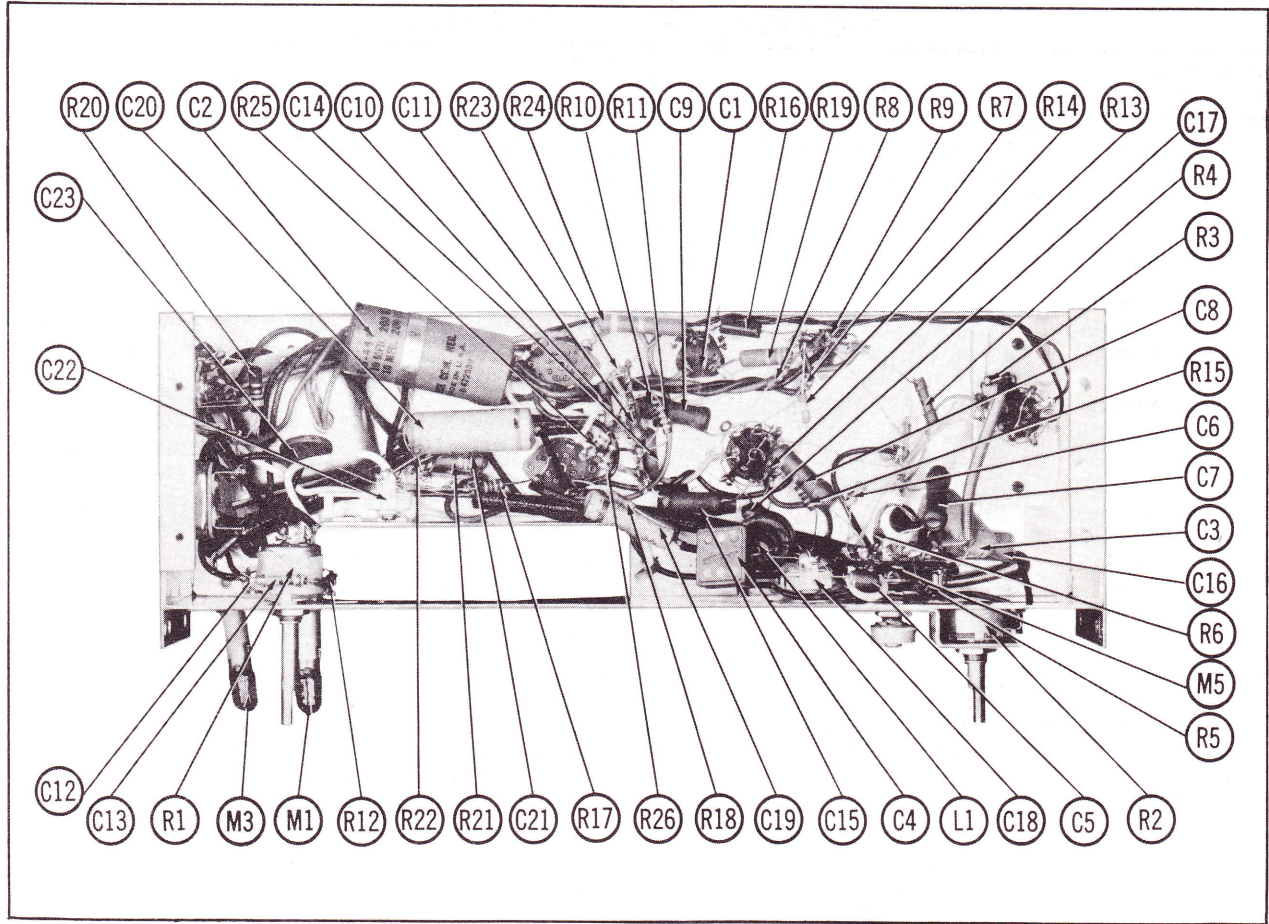
SPEAKER

ITEM No.	TYPE	REPLACEMENT DATA		NOTES
		KNIGHT PART No.	QUAM PART No.	
SPI	4" PM 3-4Ω	30.447	4A07	

MISCELLANEOUS

ITEM No.	PART NAME	KNIGHT PART No.	NOTES
M1	Erase Head	B-35, 794	
M2	Record Head	C-36, 156E	
M3	Neon Bulb	45-2036	NE51
M4	Neon Bulb	45-2036	NE51
M5	Switch	B-11, 239	Function
	Chassis Cover	D-19-895	
	Motor	D-36, 154G	

CHASSIS—BOTTOM VIEW



MECHANICAL PARTS LIST (CONTINUED)

Ref. No.	Part No.	Description	Ref. No.	Part No.	Description
39	B-31. 361	Erase Head Tension Spring	91	B-33. 409	Hairpin Clip
40	B-35. 882	Record Actuating Lever Assembly	92	B-32. 288D	Motor Drive Pulley
41	B-31. 334A	Pressure Pad Felt (2 Used)	93	B-31. 324A	Idler Spring (Tension)
42	57-428-1	#6-32 x 3/8 R. H. M. S. Stl. C. P.	94	C-35. 816	Speed Control Shaft Assembly
43	B-19. 868A	Record Slide Plate	95	33. 469	Truarc Retaining Ring
44	C-35. 756A	Erase Head	96	57-2109-2	#6-32 x 3/16 BHMS St. Stat. Brz. Phillips
45	48-2216-1	#2-56 x 3/16 Hex Nut Brass C. P. (2 Used)	97	73-2231-5	#8 Int. Lockwasher Stl. C. P.
46	73-2233-1	#2 Int. Lockwasher (2 Used)	98	B-19. 961	Speed Control Shaft Detent Spring
47	B32. 309	Tape Guide Post (Right)	99	97-3062	Brake Spring
48	B-33. 409	Hairpin Clip	99A	B-31. 335A	Brake Pad, Felt
49	73-2340	Linen Washer	100	B-32, 275-1E	#8-32 H H Shoulder Screw
50	B-33. 404E	Pinch Roller	101	35-834	Idler Lever Assembly
51	B-31. 351A	Reel Drive Belt (Spring)	102	73-2238-49	Phenolic Washer (2 Used)
52	73-2340	Linen Washer	103	B-33. 406-D	Idler Drive Sheave
53	B-35. 871	Pinch Roller Plate Assembly	104	73-2254-6	Felt Washer
54	B-31. 360	Pinch Roller Tension Spring	105	B-33. 418	Truarc Retaining "E" Ring
55	B-19. 881C	Playback Actuating Lever	106	B-28. 181	Idler Drive Belt
56	C-36. 156E	Tape Recording Head (Shure TR 16A)	107	73-2231-5	#8 Int. Lockwasher
57	73-2241-148F	Flat Washer	108	57-2474-1	#8-32 x 5/16 RHMS Stl. C. P. Phillips
58	B-35. 758	Playback Slide Plate Assembly	109	B-19. 862C	Angle Bracket for Mounting Drive Assembly
59	B-35. 764D	Pressure Pad Spring Assembly	110	B-28. 163	Linen Washer
60	B-33. 412	Push-On Stud Nut, 3/16" Stud	111	73-2241-134	Flat Washer 5/16" x .130 x .03 Stl. C. P. (2 Used)
61	B-32. 259-1G	Capstan Shaft.	112	B-32. 297-B	Brake Drum Shaft
62	B-35. 759	Shift Plate Assembly	113	C-13. 257-1C	Flywheel
63	35. 859-2	Switch Lever Assembly	114	C-35. 823-E	Brake Drum and Bushing Assembly
64	B-31. 338B	Brake Return Spring	115	B-19. 840G	Steady Bracket
65	51-3233-A	Brake Slide Plate Assémbly	116		#8-32 x 1/4 Allen Head Set Screw Stl.
66	B-33. 412	Push-On-Stud Nut, 3/16" Stud	117	B-28. 163	Linen Washer
67	B-31. 339-C	Idler Lever Tension Spring	118	57-2471-1	#8-32 x 1/4 BHMS Stl. C. P.
68	B-35. 774	Record Interlock Assembly	119		Cable Bracket
69	57-2474-1	#8-32 x 5/16 RHMS Stl. C. P. Phillips (2 Used.)	120	D-36. 154G	Square Type (GI and Alliance) Motor
70	B-31. 333	Switch Arm Link		D-36. 153E	Round Type (Fasco) Motor
71		(Bottom View of Item 26)	121	B-33. 418	Truarc Retaining "E" Ring
72	73-2231-5	#8 Int. Lockwasher Stl. C. P.	122	73-2241-143	Flat Washer
73	57-2474-1	#8-32 x 5/16 RHMS Stl. C. P. Phillips	123	73-2254-3	Felt Washer
74	B-19. 863	Drive Mounting Plate Bracket	124	C-19. 887-1	Fan Blade
75	B-32. 297-B	Brake Drum Shaft (Grooved)	125	73-2254-3	Felt Washer
76	C-35. 823-E	Brake Drum and Bushing Assembly	126	73-2241-143	Flat Washer
77	57-3589-1	#8-32 x 1/4 Bristol Head Screw (3 Used)	127	33. 415	Push-On Fastener (Presthole)
78	D-35. 753-1	Drive Mounting Plate Assembly	128	B-33. 409	Hairpin Clip
79	57-2474-1	#8-32 x 5/16 RHMS Stl. C. P. Phillips (2Used)	129	B-33. 408C	Rubber Bonded Idler Wheel 2 1/2" Dia.
80		Motor Mounting Screw (3 Used)	130	B-28. 163	Linen Washer
81		Spacer, Motor Mounting (Part of Item 82)	131	B-35. 768A	Idler Slide Plate Assembly
82	B-28. 159	Shock Mount	132	B-31. 327D	Idler Lift Compression Spring
83	C-19. 837F	Motor Adapter Plate	133	57-2474-1	#8-32 x 5/16 RHMS Stl. C. P.
84	B-33. 411A	Flat Washer	134	73-2231-5	#8 Int. Lockwasher
85	48. 409-1	Hex Nut.	135	73-2241-74F	#8 Flat Washer Stl. C. P. 1/2 x .177 x 1/32
86	B-35. 757D	Sub Idler Plate Assembly	136	110-47	Idler-Throw-Out Lever
87	B-32. 275-1E	#8-32 H H Shoulder Screw	137	B-32. 291-1	Shoulder Washer
88	B-35. 405F	Sub Idler Wheel for Reverse	138	73-2241-150	Steel Washer
89	73-2254-6	Felt Washer (2 Used)	139	51-3182	Shift Plate For High Speed
90	73-2241-150	Flat Washer	140	B-33. 407-1	"C" Washer
			141	57-2109-2	#6-32 x 3/16 Phillips BHMS St. Stat. Brz.
			142	B-32. 264F	Idler Slide Bushing
			143	57-3683-1	#8-32 x 1/4 Undercut Flat Head