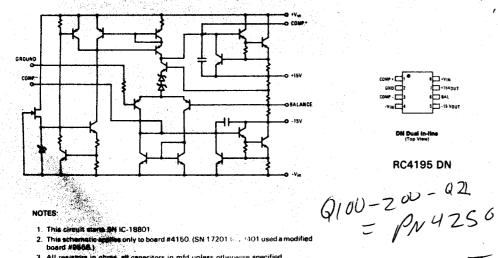


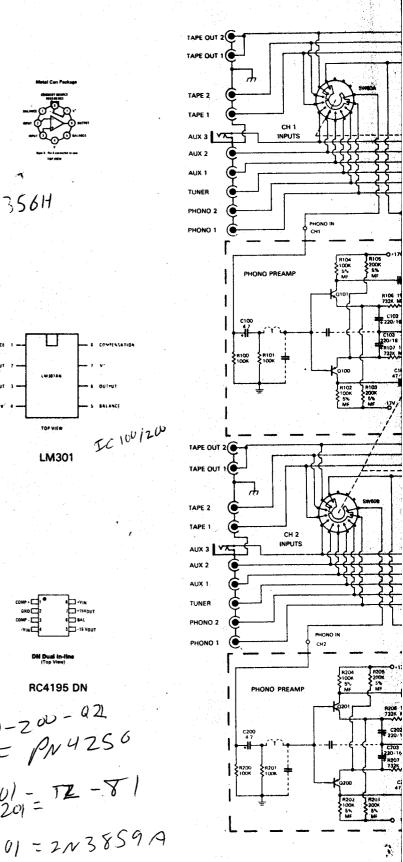
RC4195 DN

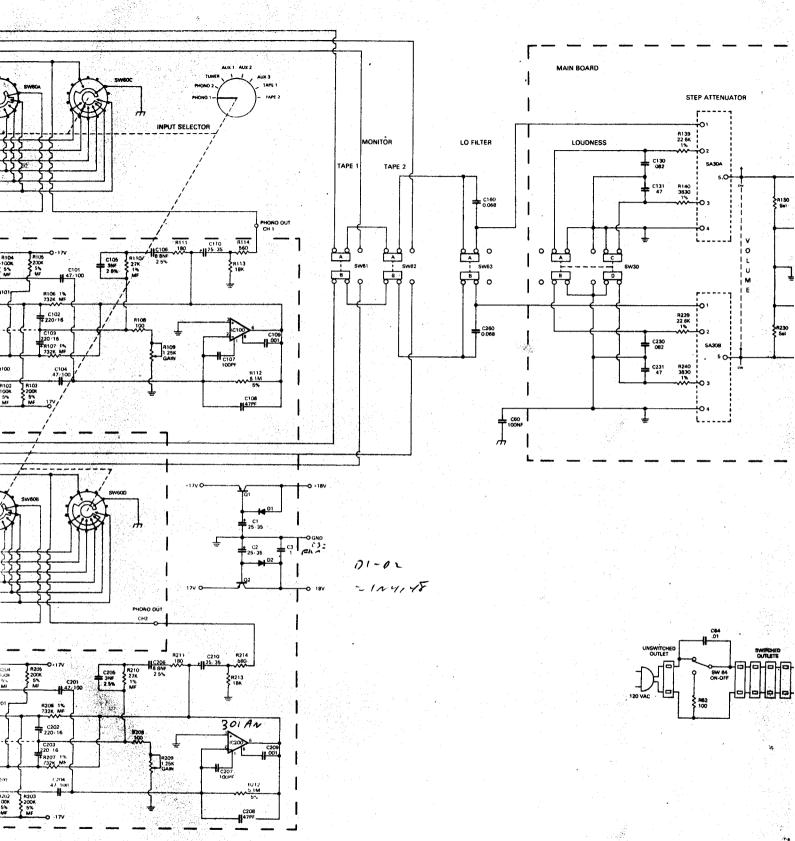
a 101 - TZ -81



NOTES

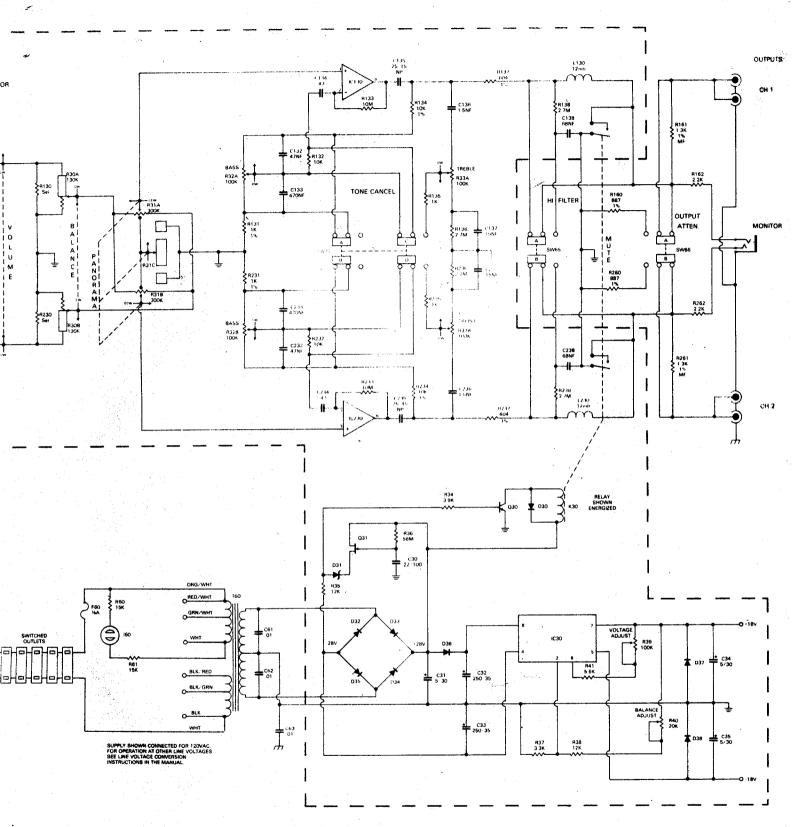
- 1. This circuit store SN IC-18801
- This sch matic applies only to board #4150. (SN 17201 to 2 401 used a modified
- All resistors in ohms, all capacitors in mfd unless otherwise specified.
- Input selector shown in Phono 1 (full ccw) looking from front panel.
- 5. Tape Monitors 1 and 2 shown inactive (out).
- 6. Lo Filter shown inactive (out).
- 7. Loudness switch shown inactive (out).
- 8. Balance control shown in normal position
- 9. Panorama shown in mono position.
- 10. Tone Cancel switch shown in cancel (in) position
- 11. Hi Filter shown inactive (out).
- 12. Output Attenuator shown in 0 db position
- Schematic-designations are se follows:
 Parts cerymon to both channels: 1-29 (Phono Board), 30-59 (Main Board), 60-99 (Chaestell, The same number sequences preceded by 1 or 2 indicate left channel and right observe).
- In early units, the Selance control (R30A.B) was 500K, the Panorama control (R31A,B,C) was 1M.
- 15. R139/239 and R140/240 may be mounted either on the PC board or on the step





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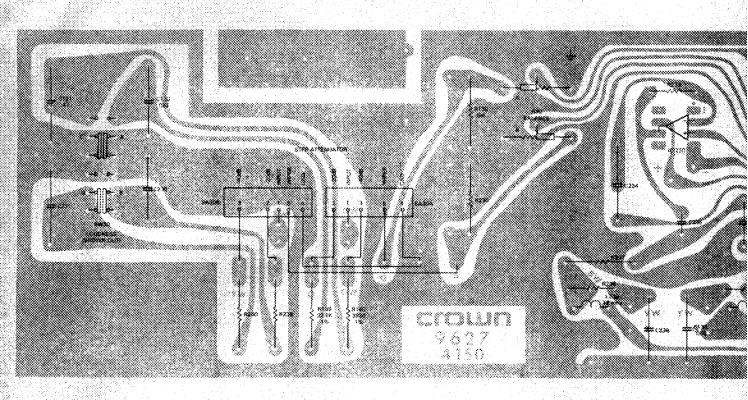
3

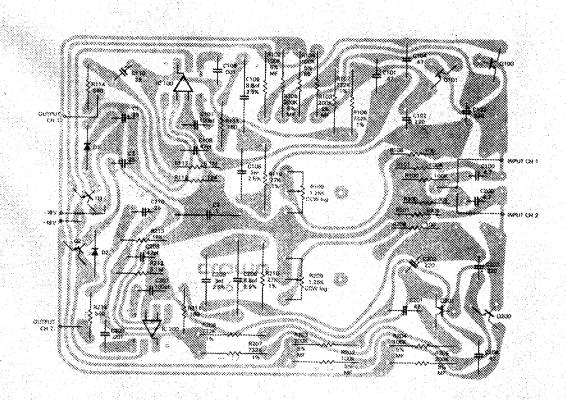


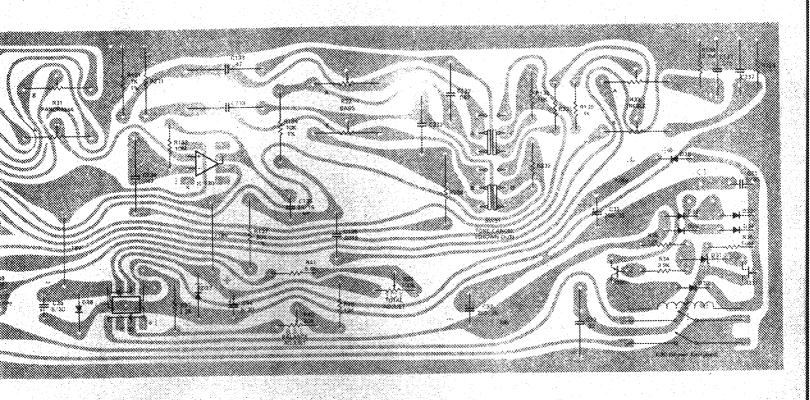


STARTS S/N IC-18801 MI-262A









NOTES:

- THIS BOARD #9627 (4150) STARTS S/N 18401, AND APPLIES TO SCHE-MATICS MI-262 AND MI-262A.
- PHONO BOARD #9607 STARTS S/N 17201 AND APPLIES TO SCHE-MATICS MI-262 AND MI-262A.
- ALL RESISTORS IN OHMS, ALL CAPACITORS IN MFD UNLESS OTHER-WISE INDICATED.
- VALUES GIVEN FOR LEFT CHANNEL ONLY; RIGHT CHANNEL IDENTICAL
- FOIL SIDE SHOWN.
- COMPONENTS COMMON TO BOTH CHANNELS ARE NUMBERED 30-59. COMPONENT NUMBERS PRECEDED BY ONE ARE LEFT CHANNEL; BY TWO, RIGHT CHANNEL.

SPECIFICATIONS IC 150

FREQUENCY RESPONSE Hi-level: ±0.6dB 3Hz-100KHz with hi-impedance load, ±0.1dB 10Hz-

20KHz with IHF load; Phono: ±0.5dB of RIAA

PHASE RESPONSE Hi-level: typically +I° to -12° 20Hz-20KHz with IHF load; Phono:

typically ±5° 20Hz-20KHz additional phase shift

HUM AND NOISE 20Hz-20KHz inputs shorted; Hi-level: 95dB below rated output

(typically 105dB with IHF "A" weighted measurement); Phono: 85dB

below 10mV input (typically 0.3µV input noise)

DISTORTION IM Less than .002% at rated output with IHF load (typically under 0.001%)

DISTORTION THD Less than .0005% @ 1KHz, max. .05% 20Hz-20KHz at rated output

with IHF load

INPUTS Six hi-level inputs (1 tuner, 3 auxiliary, 2 tape), two-equalized phonos

INPUT GAIN & IMPEDANCE Hi-level: 20.8dB ±0.2dB, 100K ohms nominal (25K ohms volume

max.); Phono: 50-70dB (adjustable) 47K ohms. Sensitivity: < 1mV @

1KHz for rated output at maximum gain

PHONO INPUT OVERLOAD 33-330mV at 1KHz, depending on gain (>100mV when set to 60dB

total preamp gain)

MAIN OUTPUTS 12V maximum before overload, 2.5V rated, 600 ohms output

impedance. Switched 0db to -10dB pad affects both sets of outputs

PHONO OUTPUT & IMPEDANCE (Available at tape out jacks with input selector in phono) 600 ohms

with typical maximum output of 11V RMS at 1KHz into hi-impedance

load

MONITOR OUTPUT Stereo, 3 circuit 1/4" phone output, ahead of 0dB to -10dB pad; output

impedance 2.2K ohms each channel

VOLUME CONTROL Precision switched attenuator of 58dB (and off) dynamic range with

calibrated tracking within ±0.2dB

LOUDNESS COMPENSATION New wide-range design for excellent simulation of I.S.O. curves down

to 60 phons; with exclusive dual R/C bass-boost coordinated with

volume attenuator

PANORAMA CONTROL Unique, continuously-variable control for infinite adjustment from

stereo to mono to stereo-reverse; replaces conventional stereo-mode switches and blend controls with an intuitive control of stereo spatial

dimension

TONE CONTROLS Continuously variable ±15dB at 30Hz and 15KHz, cancel switch

bypasses independent bass and treble control settings to give instant

true-flat response in both channels

MUTING Uses reed relay – removes turn-on transients from IC-150A output,

thus protecting speakers

FILTERS Rumble: -3dB at 24Hz with 6dB per-octave cut-off (volume attenuator

at -20), Scratch: -3dB at 5KHz with 12dB-per-octave cut-off

AC OUTLETS Five switched with 25A switch, one unswitched

POWER REQUIREMENTS About 2 watts at 120v or 240v 50-400Hz AC

SEMICONDUCTOR COMPLEMENT Five integrated circuits (equivalent to 89 bipolar transistors, 3 zeners,

12 diodes and 25 FETS) for a total of 96 bipolar transistors, 26 FETS, 4

zeners and 22 diodes

DIMENSIONS 51/4" H x 17" W; 81/8" behind panel

WEIGHT 10 lbs., with walnut cabinet 20 lbs.

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PARTS LIST, IC-150A Page 1

Schematic Designation	Description MAIN MODULE	Crown Part # 41681	Other Information
	Main PC Board	9627	
SW30A,B,C,D SW31A,B,C,D	Switches 4 PDT Latching PB	3226	Loudness Control Tone Cancel
	Integrated Circuits		
IC 130, 230	LF 356H FET-Op Amp	4127	
IC 30	RC 4195	3825	
	Relay		
K30	5K ohms, DPDT, NC, reed	3496	
	Coil		
L130, 230	12 mhy	1661	
	Diodes		
D30, 32 D33,34 D35,36	1N4148	3181	
D31	IN961B, IOV, zener	3549	
D37,38	IN4003	2851	
	Transistors		
Q30	2N3859A, selected	2961	
Q31	2N5459, NCH, JFET	3053	
	Capacitors		
C130, 230	.082 MF 100V	4133	
C131,231 C133,233 C134,234	.47 MF 100V	4119	
C132, 232	.047 MF 200V mylar	3978	
C135, 235	25 MF 15V NP vertical	3186	
C136,236	.0015 MF 200V filmatic	3089	
C137,237	.015 MF 200V filmatic	3288	
C138,238	.068 MF 200V filmatic	3190	
C30	.22 MF 100V filmatic	3218	
C31, 34,35	5 MF 30V vertical	4026	
C32,33	250 MF 35V vertical	3787	