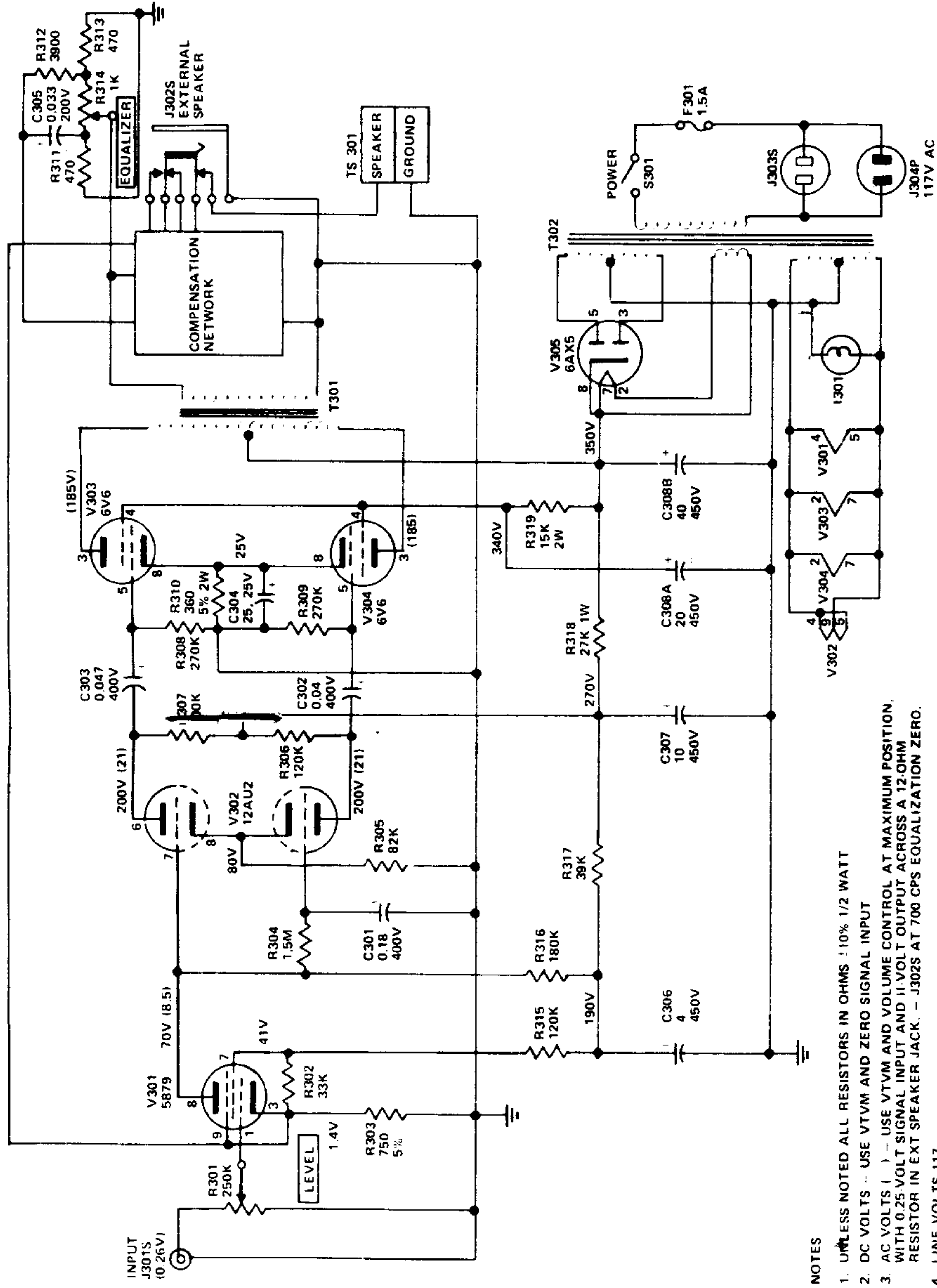


MODEL 620 SCHEMATIC DIAGRAM



NOTES

1. UNLESS NOTED ALL RESISTORS IN OHMS ±10% 1/2 WATT
2. DC VOLTS - USE VTVM AND ZERO SIGNAL INPUT
3. AC VOLTS () - USE VTVM AND VOLUME CONTROL AT MAXIMUM POSITION. WITH 0.25-VOLT SIGNAL INPUT AND 11-VOLT OUTPUT ACROSS A 12-OHM RESISTOR IN EXT SPEAKER JACK. - J302S AT 700 CPS EQUALIZATION ZERO.
4. LINE VOLTS 117

SERVICE NOTES

Certain circuit characteristics of the Model 620 should be understood before attempting measurements or servicing. (See schematic diagram.)

1. While response of the 620 (including speaker) is **acoustically flat**, the response of the amplifier, measured at the internal speaker terminals, is **not** flat. The amplifier response is flat **only** when measured across a 12-ohm load plugged into the **EXTERNAL SPEAKER** jack.
2. The phase inverter, (V302) is of the differential amplifier type. Note, however, that the grid of the second section, (V302B) is at ground potential with respect to AC only, (due to the low impedance of C303), and is approximately 100 volts positive with respect to DC ground.

The remainder of the circuitry is conventional, and subject to standard servicing procedures.

For service access to tubes, remove the four retaining screws from the front panel of the amplifier. For access to under-chassis parts, remove the screws at the forward edges of the amplifier chassis, and pull the front panel forward and down.

No attempt should be made to service the speaker, or to remove it from the case. If servicing is required during the warranty period, return the entire Model 620 to the nearest Ampex district office or Ampex distributor for exchange. After the warranty period has expired, the equipment, accompanied by an Authorized Equipment Return Tag, may be sent for servicing to Ampex Loudspeaker Corporation, 6915 Farmdale Ave., North Hollywood, California.