TECHNICAL DATA

ARCTURUS
TYPE 6R6G
REMOTE CUT-OFF PENTODE AMPLIFIER

Heater Voltage 6.3 Volts
Heater Current 0.3 Amperes
Plate Voltage 1500 (max)*
Screen Grid Voltage 75 (max)
Control Grid Voltage (**) 6.3 Volts

LOW VOLTAGE CHARACTERISTICS

Plate Voltage 250 Volts
Screen Grid Voltage 100 Volts
Control Grid Voltage 6.3 Volts
Plate Current 7.0 ma.
Screen Grid Current 1.7 ma.
Plate Resistance 300,000 ohms
Transconductance 1450 micromhos
Amplification Factor 1160
Transconductance = 2
when control grid voltage = -42.5 Volts

DIRECT INTERELECTRODE CAPACITANCES

Grid to plate 0.007 uuf (max)
Input 4.5 uuf
Output 11.0 uuf

* This is the plate supply voltage. The voltage effective at the plate will be this voltage minus the drop in the series resistor which should not be less than 100,000 ohms.

** When the grid bias is developed in the grid circuit the tube should not be operated without grid excitation. When the bias is developed in the cathode circuit the minimum value of cathode resistor should be 500 ohms.

APPLICATION

The characteristics of Type 6R6G make it suitable for use as an amplifier of the output of a sweep oscillator such as the 5AD5G. Advantage is taken of the shape of its grid voltage plate current curve to compensate for the non-linearity of the output of the sweep oscillator and produce a resultant linear sawtooth wave for cathode-ray oscillograph and television sweep circuits.

The 6R6G is especially insulated to withstand high surge voltages, but the plate dissipation must be limited by a series protective resistor.

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