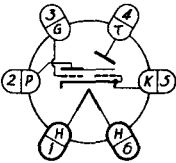


CATHODE RAY TUNING INDICATOR
Heater Type Glass Bulb

The 6E5 is a high vacuum type indicator tube designed for service as a tuning indicator in radio receivers.



BOTTOM VIEW OF SOCKET

RATINGS

Heater Voltage (a-c or d-c)	6.3	volts
Heater Current	0.3	amp
Maximum Plate Supply Voltage	250	volts
Maximum Target Voltage	250	volts
Minimum Target Voltage	90	volts

TUNING INDICATOR

Plate Supply Voltage	100	200	250	volts
Target Voltage	100	200	250	volts
Plate Resistor	0.5	1	1	megohm
Target Current (approx.)	4.5	4.5	4.5	ma
Plate Current (zero bias)	0.19	0.19	0.24	ma
Grid Bias (approx.) (For shadow angle = 0°)	-3.3	-6.5	-8	volts
Grid Bias (approx.) (For shadow angle = 90°)	0	0	0	volts

The 6E5 is a high vacuum tube designed to visually indicate the effect of changing the control grid bias. The shaded pattern produced on the fluorescent target varies through an angle from 90° to approximately 0° as the control voltage is varied. The voltage on the shadow control electrode, the extension of the triode plate between the cathode and target, controls the extent of the shaded area. The voltage of the shadow control electrode is determined by the voltage of the control grid of the triode connected as a d-c amplifier. Thus the control grid voltage determines the extent of the shadow. An increase of control grid bias thus increases the shadow control voltage and decreases the shadow while a decrease of bias increases the shadow. In practical use the control grid voltage is obtained from a suitable point in the AVC network.

