

Semiremote-Cutoff Twin Pentode

DUODECAR TYPE

GENERAL DATA

Electrical:

Heater Characteristics and Ratings (*Design-Maximum Values*):Voltage (AC or DC) 6.3 ± 0.6 volts

Current at heater volts = 6.3 0.800 amp

Peak heater-cathode voltage

(Each unit):

Heater negative with respect to cathode. 200 max. volts

Heater positive with respect to cathode. 200^a max. voltsDirect Interelectrode Capacitances:^b

Unit No. 1:

Grid No.1 to plate. 0.026 pf

Grid No.1 to cathode, grid No.2, grid No.3 & internal shield, and heater. 10 pf

Plate to cathode, grid No.2, grid No.3 & internal shield, and heater. 2.8 pf

Unit No. 2:

Grid No.1 to plate. 0.026 pf

Grid No.1 to cathode, grid No.2, grid No.3, grid No.3 of unit No.1 & internal shield, and heater 10 pf

Plate to cathode, grid No.2, grid No.3, grid No.3 of unit No.1 & internal shield, and heater. 3.0 pf

Plate of unit No.1 to plate of unit No.2. 0.02 max. pf

Grid No.1 of unit No.1 to plate of unit No.2 0.002 max. pf

Grid No.1 of unit No.2 to plate of unit No.1. 0.002 max. pf

Characteristics, Class A₁ Amplifier (Each Unit):

Plate Supply Voltage. 125 volts

Grid No.3 Connected to cathode at socket

Grid-No.2 Supply Voltage. 125 volts

Cathode Resistor. 56 ohms

Plate Resistance (Approx.). 0.2 megohm

Transconductance. 10500 μ hos

Plate Current 11 ma

Grid-No.2 Current 3.5 ma

Grid-No.1 Voltage (Approx.) for transconductance (μ hos) = 50 -15 volts

Mechanical:

Operating Position. Any

Type of Cathodes. Coated Unipotential

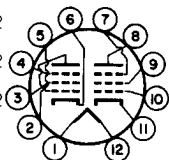
Maximum Overall Length. 1.875"



6AR11

Seated Length 1.250" to 1.500"
 Diameter. 1.062" to 1.188"
 Bulb. T9
 Base. Small-Button Duodecar 12-Pin (JEDEC No.E12-70)
 Basing Designation for BOTTOM VIEW. 12DM

- | | |
|---|---------------------------------|
| Pin 1 - Heater | Pin 8 - Plate of Unit No.1 |
| Pin 2 - Plate of Unit No.2 | Pin 9 - Grid No.2 of Unit No.1 |
| Pin 3 - Grid No.2 of Unit No.2 | Pin 10 - Grid No.1 of Unit No.1 |
| Pin 4 - Grid No.3 of Unit No.2 | Pin 11 - Cathode of Unit No.1 |
| Pin 5 - Grid No.1 of Unit No.2 | Pin 12 - Heater |
| Pin 6 - Cathode of Unit No.2 | |
| Pin 7 - Grid No.3 of Unit No.1, Internal Shield | |



AMPLIFIER — Class A₁

Values are for Each Unit

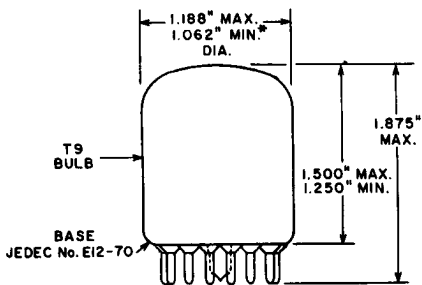
Maximum Ratings, Design-Maximum Values:

PLATE VOLTAGE 330 max. volts
 GRID No.3 (SUPPRESSOR GRID) . . .Connect to cathode at socket
 GRID-No.2 (SCREEN-GRID) SUPPLY VOLTAGE . . 330 max. volts
 GRID-No.2 VOLTAGESee Grid-No.2 Input Rating Chart
 at front of Receiving Tube Section
 GRID-No.1 (CONTROL-GRID) VOLTAGE:
 Positive-bias value 0 max. volts
 GRID-No.2 INPUT:
 For grid-No.2 voltages up to 165 volts . 0.65 max. watt
 For grid-No.2 voltages between
 165 and 330 voltsSee Grid-No.2 Input Rating Chart
 at front of Receiving Tube Section
 PLATE DISSIPATION 3.1 max. watts

^a The dc component must not exceed 100 volts.

^b With external shield JEDEC No.309 connected to cathode of unit under test.





92CS-11485R1

* APPLIES TO MINIMUM DIAMETER EXCEPT IN AREA OF SEAL.

