

MECHANICAL DATA

Bulb	T-5½
Base	E7-1, Miniature Button 7-Pin
Outline	5-1
Basing	7DK
Cathode	Coated Unipotential
Mounting Position	Any

ELECTRICAL DATA

HEATER CHARACTERISTICS AND RATINGS

Characteristics

Heater Voltage¹ 6.3 Volts

Heater Current² 225 Ma

Ratings (Design Maximum Values)

Heater Voltage³ 6.3 ± 0.6 Volts

Maximum Heater-Cathode Voltage

Heater Negative with Respect to Cathode

Total DC and Peak 200 Volts Max.

Heater Positive with Respect to Cathode

DC 100 Volts Max.

Total DC and Peak 200 Volts Max.

DIRECT INTERELECTRODE CAPACITANCES (Shielded)⁴

Grid to Plate 1.7 μμf

Input: g to (h+k) 3.0 μμf

Output: p to (h+k) 1.8 μμf

Heater to Cathode 3.0 μμf

RATINGS (Design Maximum Values)

Continuous Class C Service at 175 mc.

Plate Voltage 330 Volts Max.

Plate Dissipation 5.0 Watts Max.

Plate Input 7.5 Watts Max.

Cathode Current⁵ 40 mAdc Max.

Grid Current⁵ 10 mAdc Max.

Negative Grid Voltage 50 Volts Max.

Grid Circuit Resistance

Fixed Bias 0.1 Megohm Max.

Cathode Bias 0.5 Megohm Max.

CHARACTERISTICS AND TYPICAL OPERATION

Plate Voltage 200 Volts

Grid Voltage 0 Volts

Cathode Bias Resistor 100 Ohms

Plate Current 12 Ma

Transconductance 9500 μmhos

Amplification Factor 80

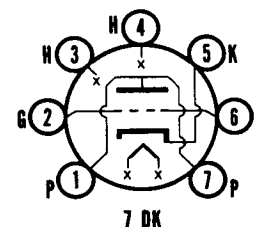
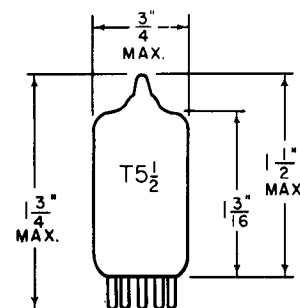
Ec for Ib = 20 μAdc (Approx.) -6.5 Volts

NOTES:

1. For parallel operation of heaters, equipment should be designed that at normal supply voltage bogey tubes will operate at this value of heater voltage.
2. The bogey value of current is obtained when operating the heater at the specified 6.3 volts.
3. Heater voltage supply variations shall be restricted to maintain heater voltage within the specified tolerance.
4. Shield No. 316.
5. In Sonobow or other battery applications where considerations of long life are secondary to those of power output, the maximum ratings for cathode current and grid current may be taken as 50 mAdc and 15 mAdc respectively.

QUICK REFERENCE DATA

The Sylvania Type 7738 is a miniature high mu triode designed for Continuous Class C Amplifier Service in the 200 megacycle range.



SYLVANIA ELECTRONIC TUBES

A Division of
Sylvania Electric Products Inc.

RECEIVING TUBE OPERATIONS EMPORIUM, PA.

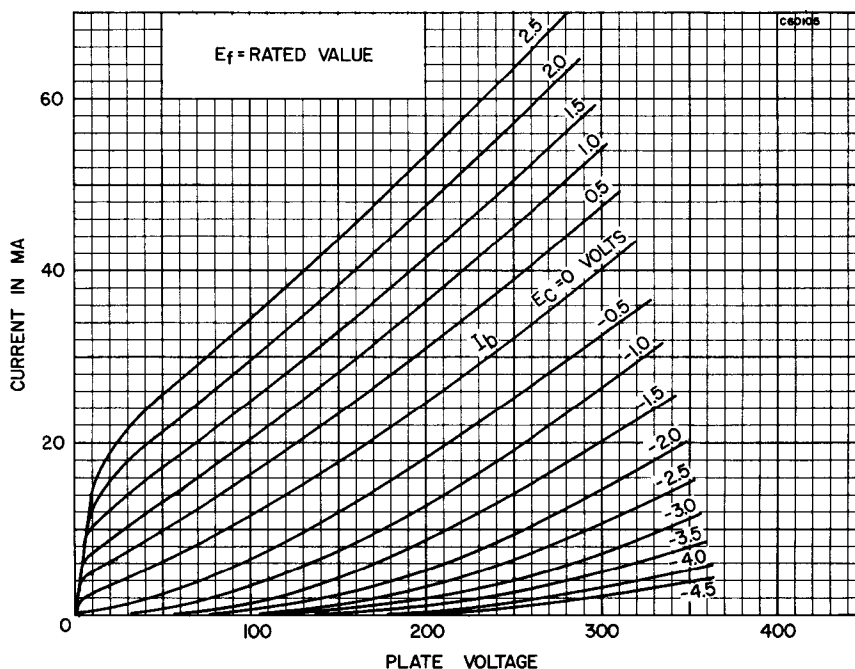
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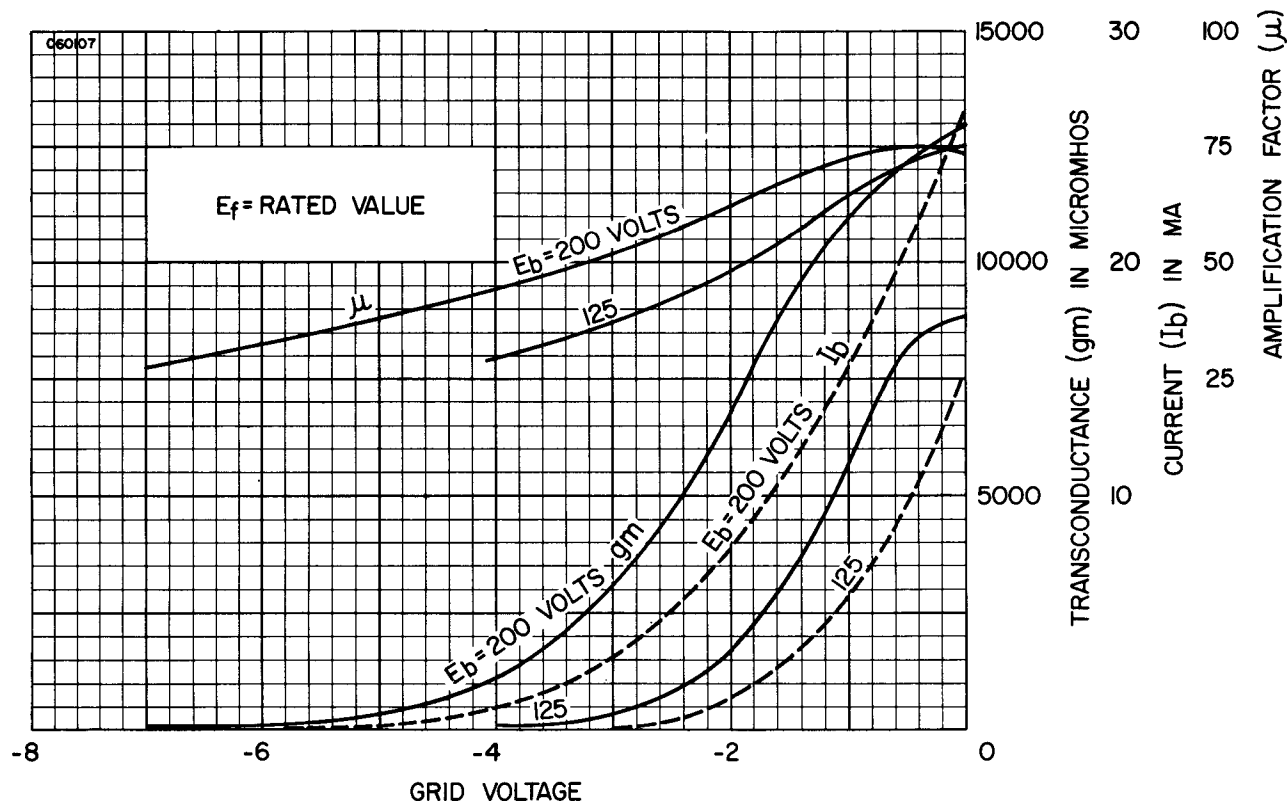
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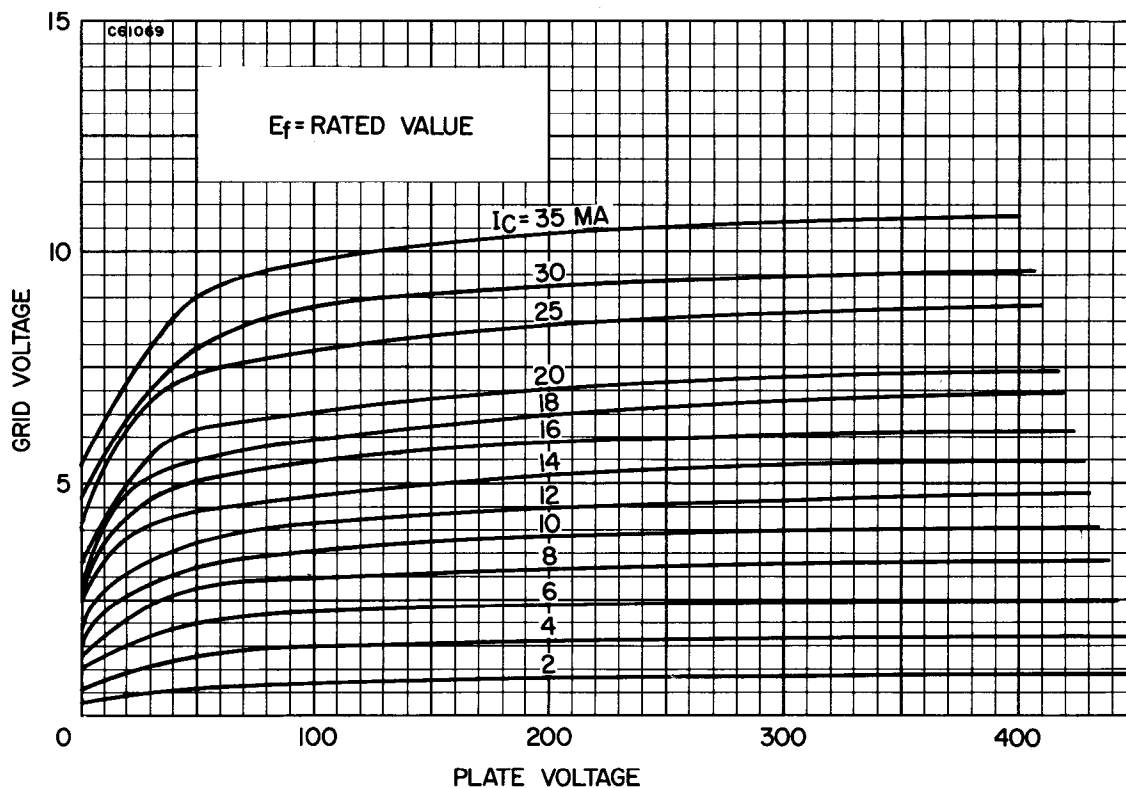
AVERAGE PLATE CHARACTERISTICS



AVERAGE TRANSFER CHARACTERISTICS



AVERAGE GRID CHARACTERISTICS



CONSTANT CURRENT CHARACTERISTICS

