MECHANICAL DATA

Bulb .................................................. T-5½
Base .................................................. Miniature Button 7-Pin
Basing .................................................. 7DW
Cathode .................................................. Coated Unipotential
Mounting Position ................................ Any

ELECTRICAL DATA

HEATER CHARACTERISTICS

Heater Voltage Series/Parallel ...................... 12.6/6.3 Volts
Heater Current Series/Parallel ....................... 150/300 Ma

DIRECT INTERELECTRODE CAPACITANCES

<table>
<thead>
<tr>
<th>Shielded</th>
<th>Unshielded</th>
</tr>
</thead>
<tbody>
<tr>
<td>Grid to Plate</td>
<td>3.4</td>
</tr>
<tr>
<td>Input</td>
<td>2.6</td>
</tr>
<tr>
<td>Output</td>
<td>3.2</td>
</tr>
</tbody>
</table>

RATINGS (Design Center Values)

Plate Voltage ........................................ 300 Volts Max.
Plate Dissipation .................................. 2.5 Watts Max.
Heater-Cathode Voltage ............................. 90 Volts Max.

CHARACTERISTICS AND TYPICAL OPERATION

<table>
<thead>
<tr>
<th></th>
<th>90</th>
<th>250 Volts</th>
</tr>
</thead>
<tbody>
<tr>
<td>Plate Voltage</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Grid Voltage</td>
<td>0</td>
<td>-8 Volts</td>
</tr>
<tr>
<td>Plate Current</td>
<td>10</td>
<td>9 Ma</td>
</tr>
<tr>
<td>Transconductance</td>
<td>3000</td>
<td>2600 μmhos</td>
</tr>
<tr>
<td>Plate Resistance</td>
<td>6700</td>
<td>7700 Ohms</td>
</tr>
<tr>
<td>Amplification Factor</td>
<td>20</td>
<td>20</td>
</tr>
<tr>
<td>Grid Voltage (approx.)</td>
<td>For I_b = 10 μa</td>
<td>-7</td>
</tr>
</tbody>
</table>

NOTE:

1. With shield No. 316 connected to cathode.
AVERAGE PLATE CHARACTERISTICS
AVERAGE TRANSFER CHARACTERISTICS

$E_f = 6.3 \text{ VOLTS}$
$E_b = 250 \text{ VOLTS}$

$\mu$, $I_b$, $r_p$,

PLATE (I_b) MILLIAMPERES OR AMPLIFICATION FACTOR ($\mu$)

PLATE RESISTANCE ($r_p$) IN KILOHMS

CONTROL GRID VOLTS

-16 -12 -8 -4 0
AVERAGE TRANSFER CHARACTERISTICS

$E_f = 6.3$ VOLTS
$E_b = 100$ VOLTS

$C2048$

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