DUPLEx-DIODE TRIODE
Single-Ended Metal Type
(TENTATIVE DATA)

Ratings are to be interpreted according to RMA Standard M8-210 (Jan. 8, 1940 Rev. 11-40)

HEATER VOLTAGE (A.C. or D.C.) 6.3 Volts
HEATER CURRENT 0.15 Ampere
DIRECT INTERELECTRODE CAPACITANCES—Triode Unit (Approx.): grid to Plate \( C_{gp} \)
\[
1.5 \ \mu\text{f}
\]
grid to Cathode \( C_{g(h+k+shell)} \)
\[
2.0 \ \mu\text{f}
\]
Plate to Cathode \( C_{p(h+k+shell)} \)
\[
3.0 \ \mu\text{f}
\]
MAXIMUM OVERALL LENGTH 2-5/8"
MAXIMUM SEATED HEIGHT 2-1/16"
MAXIMUM DIAMETER 1-5/16"
BULB Metal Shell, MT-8
BASE Small Wafer Octal 8-Pin
MOUNTING POSITION Any

\(^0\) With shell connected to cathode.

Triode Unit

PLATE VOLTAGE 250 max. Volts
PLATE DISSIPATION 2.5 max. Watts
CHARACTERISTICS—Class A\(_1\) Amplifier:
Plate Voltage
Grid Voltage
Amplification Factor
Plate Resistance
Transconductance
Plate Current

<table>
<thead>
<tr>
<th>Characteristic</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Plate Voltage</td>
<td>250 Volts</td>
</tr>
<tr>
<td>Grid Voltage</td>
<td>-9 Volts</td>
</tr>
<tr>
<td>Amplification Factor</td>
<td>16</td>
</tr>
<tr>
<td>Plate Resistance</td>
<td>8500 Ohms</td>
</tr>
<tr>
<td>Transconductance</td>
<td>1900 Micromhos</td>
</tr>
<tr>
<td>Plate Current</td>
<td>9.5 Milliamperes</td>
</tr>
</tbody>
</table>

Diode Units—Two

The two diode plates are placed at one end of a cathode, the sleeve of which is common to the triode unit. Diode biasing of the triode unit of the 6ST7 is not suitable.

Bottom View of Socket Connections

Pin 1—Shell
Pin 2—Triode Grid
Pin 3—Cathode
Pin 4—Diode Plate #2
Pin 5—Diode Plate #1
Pin 6—Triode Plate
Pin 7—Heater
Pin 8—Heater

E. I. A. REGISTRATION FILE

December 1, 1941