E-Series RF 4:1 Auto Transformer
20 - 1000 MHz

Features

- Surface Mount
- 4:1 Impedance Ratio

Description

M/A-COM’s MABAES0034 is a 4:1 RF transformer in a low cost, surface mount package. Ideally suited for high volume cellular and wireless applications.

Functional Configuration

<table>
<thead>
<tr>
<th>Function</th>
<th>Pin No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Primary dot</td>
<td>1</td>
</tr>
<tr>
<td>Primary</td>
<td>5</td>
</tr>
<tr>
<td>Primary CT</td>
<td>-</td>
</tr>
<tr>
<td>Secondary dot</td>
<td>4</td>
</tr>
<tr>
<td>Secondary</td>
<td>5</td>
</tr>
<tr>
<td>Secondary CT</td>
<td>-</td>
</tr>
<tr>
<td>Case Ground</td>
<td>-</td>
</tr>
<tr>
<td>Not Connected</td>
<td>2,3</td>
</tr>
</tbody>
</table>

Absolute Maximum Ratings

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Absolute Maximum</th>
</tr>
</thead>
<tbody>
<tr>
<td>RF Power</td>
<td>250 mW</td>
</tr>
<tr>
<td>DC Current</td>
<td>30 mA</td>
</tr>
<tr>
<td>Storage Temperature</td>
<td>-55°C to +100°C</td>
</tr>
</tbody>
</table>

Electrical Specifications @25°C

<table>
<thead>
<tr>
<th>Parameter</th>
<th>Units</th>
<th>Nominal</th>
<th>Typical</th>
<th>Minimum</th>
<th>Maximum</th>
</tr>
</thead>
<tbody>
<tr>
<td>Frequency Range</td>
<td>MHz</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
<tr>
<td>Insertion Loss</td>
<td>dB</td>
<td>—</td>
<td>1.8</td>
<td>—</td>
<td>2.0</td>
</tr>
<tr>
<td>20 - 500 MHz</td>
<td>dB</td>
<td>—</td>
<td>2.2</td>
<td>—</td>
<td>2.5</td>
</tr>
<tr>
<td>500 - 1000 MHz</td>
<td>dB</td>
<td>—</td>
<td>—</td>
<td>—</td>
<td>—</td>
</tr>
</tbody>
</table>

Note: photograph above indicates package only, not actual unit.