SRN3015C Series – Semi-Shielded Power Inductors

Features
- Semi-shielded construction
- Miniature size
- RoHS compliant* and halogen free**

**Bourns considers a product to be "halogen free" if (a) the Bromine (Br) content is 900 ppm or less; (b) the Chlorine (Cl) content is 900 ppm or less; and (c) the total Bromine (Br) and Chlorine (Cl) content is 1500 ppm or less.

Electrical Specifications @ 25 °C

<table>
<thead>
<tr>
<th>Bourns Part No.</th>
<th>Inductance (L µH)</th>
<th>Q @ 100 kHz / 1 V Typ.</th>
<th>SRF (MHz)</th>
<th>DCR (mΩ) Typ.</th>
<th>DCR (mΩ) Max.</th>
<th>Irms (A) Typ.</th>
<th>Isat (A) Typ.</th>
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<tbody>
<tr>
<td>SRN3015C-R24M</td>
<td>0.24</td>
<td>20</td>
<td>3</td>
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<td>10</td>
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<td>10</td>
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<td>10</td>
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<td>SRN3015C-1R5M</td>
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</table>

General Specifications
- Operating Temperature: -55 °C to +125 °C (Temperature rise included)
- Storage Temperature (Component on board): -55 °C to +125 °C
- Temperature Rise... 40 °C at rated Irms'
- Rated Current
- Moisture Sensitivity Level: 1
- ESD Classification (HBM): N/A

Materials
- Core: Ferrite
- Wire: Enamled copper
- Terminal Finish: Ag/Ni/Sn
- Coating: Magnetic resin
- Packaging: 2000 pcs. per 7-inch reel

How to Order

SRN3015C - 1R0M

Product Dimensions

Note: Top and side view dimensions do not include termination. For maximum overall dimensions including termination, add 0.1 mm.

Dimensions: MM (INCHES)

WARNING Cancer and Reproductive Harm - www.P65Warnings.ca.gov

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Soldering Profile

Profile Feature | Pb Free Assembly
---|---
Preheat
- Temperature Min. ($T_{smin}$)
- Temperature Max. ($T_{smax}$)
- Time ($t_s$) from $T_{smin}$ to $T_{smax}$
150 °C
200 °C
60-120 seconds
Ramp-up Rate ($T_L$ to $T_p$)
3 °C/second max.
Liquidous temperature ($T_L$)
Time ($t_L$) maintained above $T_L$
217 °C
60-150 seconds
Peak package body temperature ($T_p$)
260 °C
Time within 5 °C of Actual Peak Temperature ($t_p$)
< 30 seconds
Ramp-Down Rate ($T_p$ to $T_L$)
6 °C/second max.
Time 25 °C to Peak Temperature
8 minutes max.

REFLOW TIMES: 3 TIMES MAX.

L vs. I Charts

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SRN3015C Series Semi-shielded Power Inductors

L vs. I Charts (continued)

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Packaging Specifications

USER DIRECTION OF FEED

QTY: 2,000 PCS. PER REEL

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