



Features

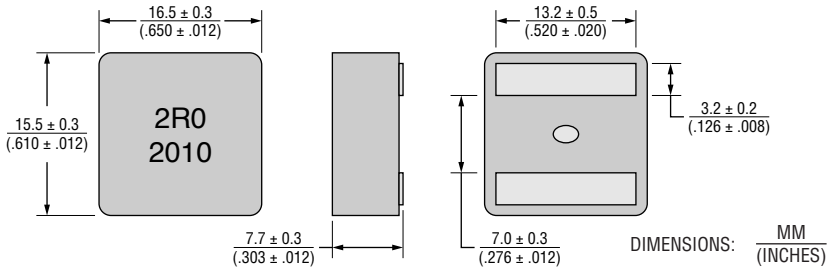
- Shielded construction
- Metal alloy powder core
- High saturation current
- Low buzz noise
- Flat wire
- AEC-Q200 compliant
- RoHS compliant* and halogen free**

SRP1580CA Series - Shielded Power Inductors

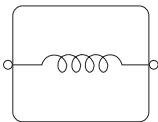
Electrical Specifications @ 25 °C

Bourns Part Number	Inductance @ 100 KHz / 0.1 V		Q Typ. @ 100 kHz / 0.1 V	SRF (MHz) Typ.	DCR (mΩ) Typ.	DCR (mΩ) Max.	I _{rms} (A) Typ.		I _{sat} (A) Typ.
	L (μH)	Tol. (%)					20 °C Temp. Rise	40 °C Temp. Rise	
SRP1580CA-1R0M	1.0	20	30	28	1.0	1.15	41	58	80
SRP1580CA-2R0M	2.0	20	30	18	1.92	2.21	29.5	40	57
SRP1580CA-5R3M	5.3	20	30	12	4.45	5.34	19.5	26	35

Product Dimensions



Electrical Schematic

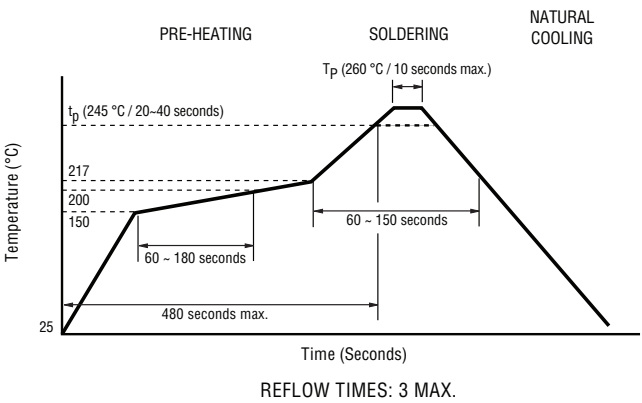


How to Order

SRP1580CA - 1R0M

Model _____
 Value Code (see table) _____

Soldering Profile



Additional Information

Click these links for more information:

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 [TECHNICAL LIBRARY](#) |
 [INVENTORY](#) |
 [SAMPLES](#)

General Specifications

- Operating Temperature-55 °C to +155 °C (Temperature rise included)
- Storage Temperature (Component)-55 °C to +155 °C
- Rated Current Inductance drops 30 % at I_{sat}
- Temperature Rise 20 or 40 °C at rated I_{rms}¹
- Rated Voltage40 V Typ.
- Moisture Sensitivity Level 1
- ESD Classification (HBM)..... N/A

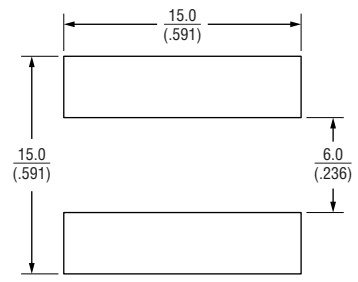
¹ Circuit design, component, PCB trace size and thickness, airflow and other cooling provisions all affect the part temperature. Part temperature should be verified in the end application.

Materials

- Core..... Metal alloy powder
- Wire Enameled copper
- Terminal FinishSn
- Packaging..... 200 pcs. per 13-inch reel

Please consult [Bourns® Model SRP-A Series Visual Inspection Guide](#) for detailed construction, processing and testing information.

Recommended Layout

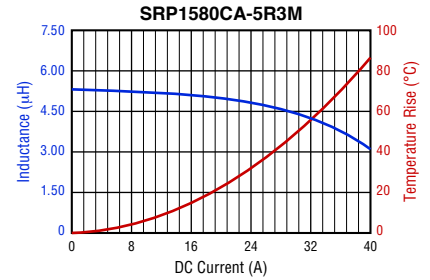
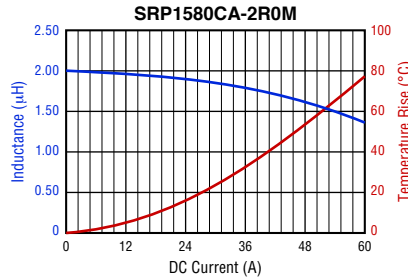
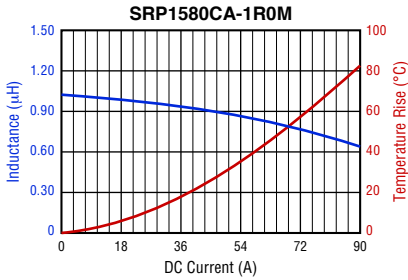


* RoHS Directive 2015/863, Mar 31, 2015 and Annex.
 ** Bourns considers a product to be "halogen free" if (a) the Bromine (Br) content is 900 ppm or less; (b) the Chlorine (Cl) content is 900 ppm or less; and (c) the total Bromine (Br) and Chlorine (Cl) content is 1500 ppm or less.
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 Users should verify actual device performance in their specific applications.
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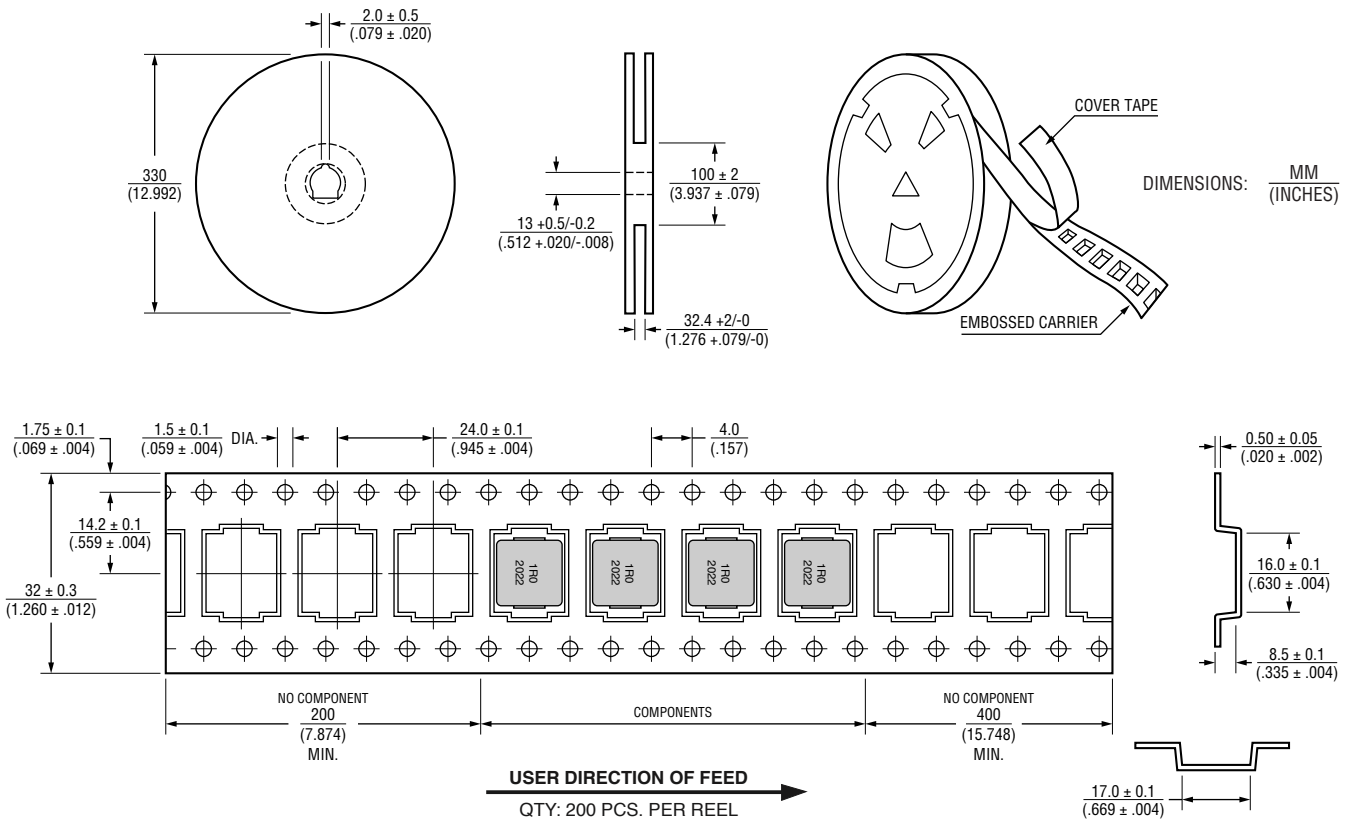
SRP1580CA Series - Shielded Power Inductors



L vs. I Charts



Packaging Specifications



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Users should verify actual device performance in their specific applications.

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