

Features

- Semi-shielded construction
- Miniature size
- Low profile, 1 mm
- Flat wire
- Low DCR
- RoHS compliant* and halogen free**

Applications

- DC/DC converters
- Notebook computers
- Digital video cameras
- HDDs
- Cell phones
- TV, LCD displays

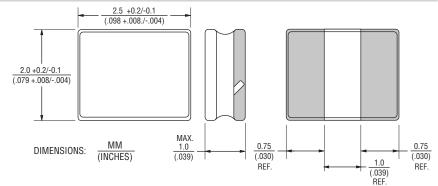
BOURNS

SRN2510F Series – Semi-Shielded Power Inductors

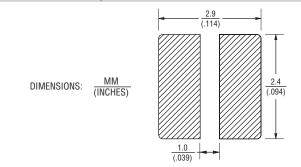
Electrical Specifications @ 25 °C

Bourns	Inductance @ 1 MHz / 1 V		SRF (MHz)	DCR (Ω)	DCR (Ω)	I rms (A)	l sat (A)
Part Number	L (µH)	Tol. %	Ref.	Typ.	Max.	Тур.	Тур.
SRN2510F-R24M	0.24	± 20 %	180	0.018	0.022	5.5	9.5
SRN2510F-R33M	0.33	± 20 %	150	0.023	0.028	5.3	8.0
SRN2510F-R47M	0.47	± 20 %	120	0.027	0.035	4.6	7.0
SRN2510F-R68M	0.68	± 20 %	90	0.032	0.040	4.2	5.5
SRN2510F-1R0M	1.00	± 20 %	60	0.044	0.053	3.5	4.9
SRN2510F-1R5M	1.50	± 20 %	55	0.062	0.074	3.2	3.8
SRN2510F-2R2M	2.20	± 20 %	40	0.078	0.093	2.6	2.8
SRN2510F-3R3M	3.30	± 20 %	30	0.125	0.150	2.0	2.1
SRN2510F-4R7M	4.70	± 20 %	20	0.180	0.216	1.7	1.7

Product Dimensions



Recommended Layout



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

RoHS Directive 2002/95/EC Jan. 27, 2003 including annex and RoHS Recast 2011/65/EU June 8, 2011.

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

Specifications are subject to change without notice.

Users should verify actual device performance in their specific applications.

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General Specifications

Operating Temperature

-40 °C to +125 °C
(Temperature rise included)
Storage Temperature
40 °C to +125 °C
Rated Current
Inductance drops 30 % at Isat
Temperature Rise 40 °C at rated Irms
MSL 1
ESD Classification (HBM)N/A

Materials

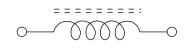
	Metal alloy
Terminal Finish	Sn
	Magnetic epoxy resin 2000 pcs. per 7-inch reel

How to Order

	SRN2510F	-	R33M
Model —			

Value Code (see table)

Schematic





Asia-Pacific: Tel: +886-2 2562-4117 Email: asiacus@bourns.com

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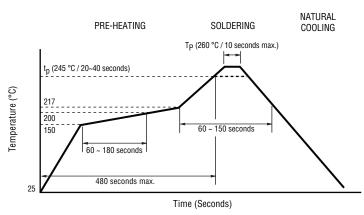
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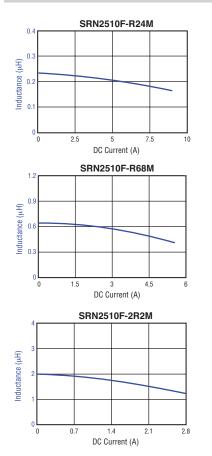
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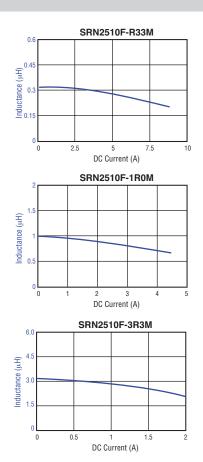
Soldering Profile

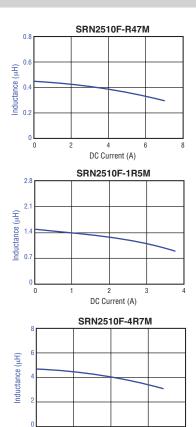




L vs. I Charts







0

0.5

1

DC Current (A)

1.5

2

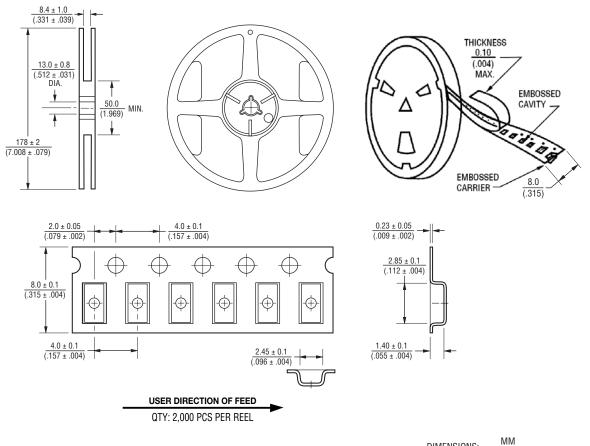
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Packaging Specifications



DIMENSIONS: $\frac{MM}{(INCHES)}$

Users should verify actual device performance in their specific applications.

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