

#### **Features**

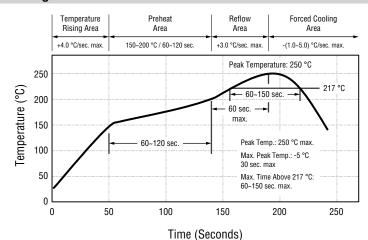
- Semi-shielded construction
- High operating temperature
- Inductance range: 0.55 to 100 µH
- Rated current up to 7 A
- AEC-Q200 compliant
- RoHS compliant\* and halogen free\*\*

# SRN6045HA Series - Semi-shielded Power Inductors

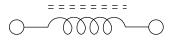
#### Electrical Specifications @ 25 °C

	Inductance @ 100 kHz / 0.1 V			Q Test	SRF	DCR	DCR	Irms	Isat
Bourns Part No.	<b>L (μH)</b>	Tol. %	Q Typ.	Freq. (MHz)	(MHz) Typ.	(mΩ) Typ.	(mΩ) Max.	(A) Typ.	(A) Typ.
SRN6045HA-R55Y	0.55	30	19.0	7.96	135	4.80	6.00	7.00	18.00
SRN6045HA-1R0Y	1.00	30	17.0	7.96	80	7.30	9.00	6.50	14.50
SRN6045HA-1R5Y	1.50	30	17.0	7.96	55	12.90	15.00	5.00	11.00
SRN6045HA-2R2Y	2.20	30	17.0	7.96	50	17.00	23.00	4.40	9.50
SRN6045HA-3R3Y	3.30	30	20.0	7.96	40	23.00	30.00	4.00	8.00
SRN6045HA-4R7Y	4.70	30	20.0	7.96	30	30.00	35.00	3.60	7.00
SRN6045HA-100M	10.00	20	20.0	2.52	20	41.00	50.00	2.60	4.00
SRN6045HA-220M	22.00	20	24.0	2.52	13	121.00	144.00	1.70	2.50
SRN6045HA-330M	33.00	20	24.0	2.52	10	170.00	211.00	1.50	2.20
SRN6045HA-470M	47.00	20	23.0	2.52	8	224.00	305.00	1.00	1.90
SRN6045HA-101M	100.00	20	23.0	0.796	6	484.00	540.00	0.72	1.20

#### **Soldering Profile**



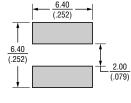
#### **Electrical Schematic**



## **How to Order**

SRN6045HA - 1R0Y Model Value Code (see table)

# **Recommended Layout**



DIMENSIONS:



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

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 (CI) content is 900 ppm or less; and (c) the total Bromine (Br) and Chlorine (CI) content is 1500 ppm or less.

Specifications are subject to change without notice. Users should verify actual device performance in their specific applications. The products described herein and this document are subject to specific legal disclaimers as set forth on the last page of this document, and at www.bourns.com/docs/legal/disclaimer.pdf.

#### **Additional Information**

Click these links for more information:











TECHNICAL INVENTORY SAMPLES

CONTACT

# **General Specifications**

**Operating Temperature** 

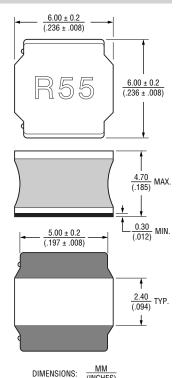
.....-55 °C to +150 °C (Temperature rise included) Storage Temperature (Component) .....-55 °C to +150 °C Temperature Rise .....40 °C at rated Irms Rated Current .....Inductance drops 30 % at Isat Moisture Sensitivity Level.....1

# **Materials**

Core......Ferrite Wire ......Enameled copper Terminal Finish ...... Sn/Ag/Cu Coating ...... Magnetic epoxy resin Packaging..... 1000 pcs. per 13-inch reel

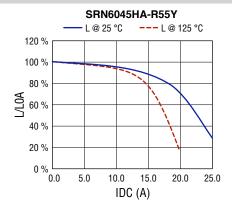
ESD Classification (HBM).....N/A

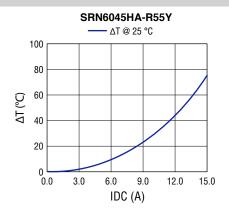
## **Product Dimensions**

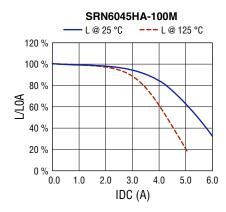


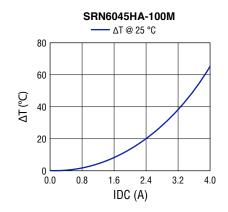
(INCHES)

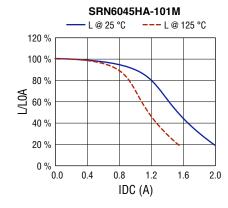
## Inductance vs. IDC

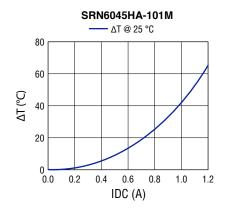








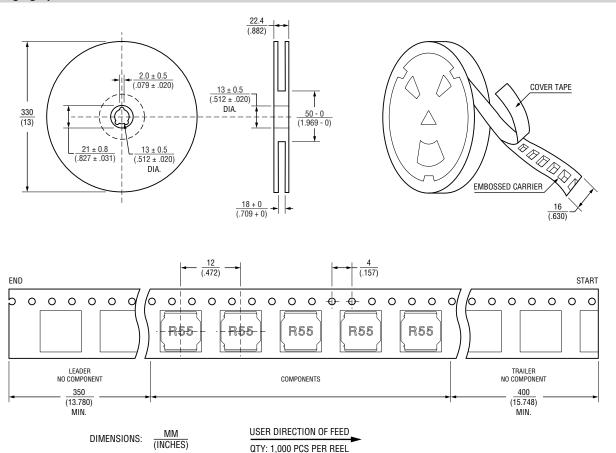




# SRN6045HA Series - Semi-shielded Power Inductors

# BOURNS

## **Packaging Specifications**



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