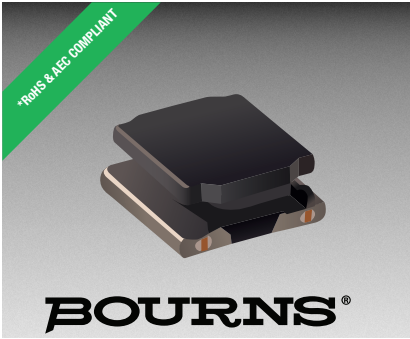





**THE DATASHEET OF  
SRN4018TA-1R0M**





### Features

- Semi-shielded construction
- Inductance range: 1 to 220  $\mu$ H
- Rated current up to 3.7 A
- AEC-Q200 qualified
- RoHS compliant\* and halogen free\*

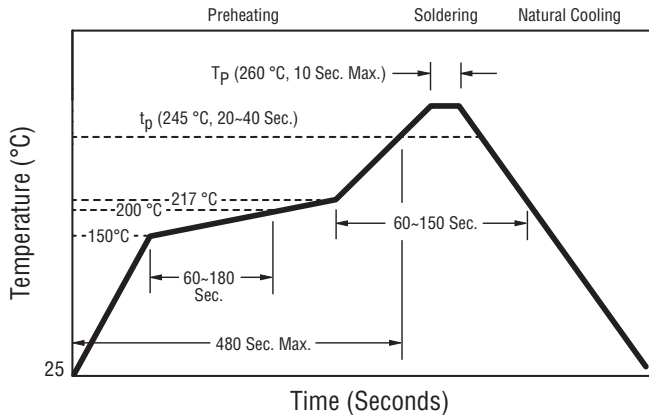
 This series is currently available but not recommended for new designs. A possible alternative is the [Model SRN4018BTA](#).

## SRN4018TA Series - Semi-shielded Power Inductors

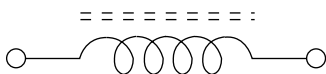
### Electrical Specifications @ 25 °C

Bourns Part No.	Inductance @ 100 kHz / 1 V		SRF (MHz) Typ.	DCR ( $\Omega$ ) $\pm 20$ %	Irms (A) Typ.	Isat (A) Typ.
	L ( $\mu$ H)	Tol. %				
SRN4018TA-1R0M	1.0	$\pm 20$	160	0.027	3.7	4
SRN4018TA-1R2M	1.2	$\pm 20$	150	0.028	3.5	3.6
SRN4018TA-1R5M	1.5	$\pm 20$	110	0.032	3.3	3.3
SRN4018TA-2R2M	2.2	$\pm 20$	70	0.042	2.9	3
SRN4018TA-3R3M	3.3	$\pm 20$	60	0.055	2.3	2.3
SRN4018TA-4R7M	4.7	$\pm 20$	50	0.07	2	2
SRN4018TA-6R8M	6.8	$\pm 20$	40	0.098	1.7	1.7
SRN4018TA-100M	10	$\pm 20$	35	0.15	1.5	1.5
SRN4018TA-150M	15	$\pm 20$	25	0.19	1.1	1.1
SRN4018TA-220M	22	$\pm 20$	20	0.29	0.9	0.9
SRN4018TA-330M	33	$\pm 20$	12	0.405	0.75	0.75
SRN4018TA-470M	47	$\pm 20$	10	0.55	0.6	0.6
SRN4018TA-680M	68	$\pm 20$	10	0.89	0.55	0.55
SRN4018TA-101M	100	$\pm 20$	8	1.38	0.45	0.45
SRN4018TA-151M	150	$\pm 20$	5	1.97	0.35	0.35
SRN4018TA-221M	220	$\pm 20$	5	3	0.3	0.3

### Soldering Profile



### Electrical Schematic



### How to Order

**SRN4018TA - 100M**

Model \_\_\_\_\_  
Value Code (see table) \_\_\_\_\_



**WARNING Cancer and Reproductive Harm - [www.P65Warnings.ca.gov](http://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 (Cl) 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. 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](http://www.bourns.com/docs/legal/disclaimer.pdf).

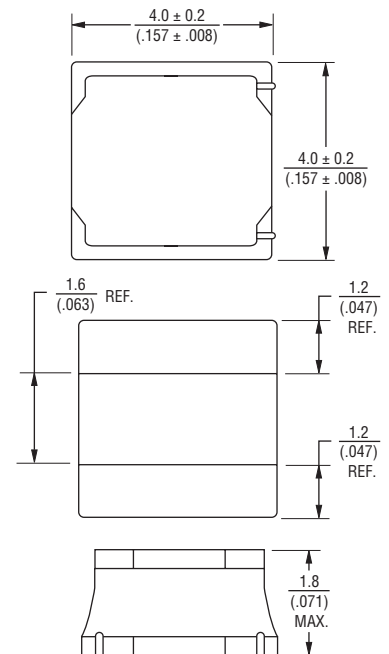
### General Specifications

Operating Temperature ..... -55 °C to +125 °C  
 (Temperature rise included)  
 Storage Temperature .. -55 °C to +125 °C  
 Temperature Rise ..... 40 °C at rated Irms  
 Rated Current  
 ..... Inductance drops 30 % at Isat  
 Failure In Time (FIT) ..... 24.7/10<sup>9</sup> hours  
 Mean Time Between Failures (MTBF)  
 ..... 40.4 x 10<sup>6</sup> hours

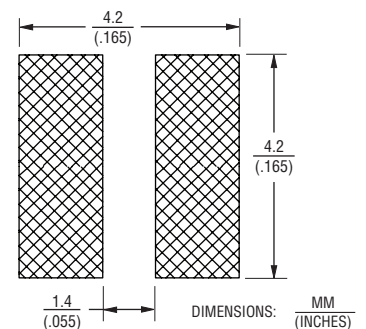
### Materials

Core ..... Ferrite  
 Wire ..... Enameled copper  
 Terminal Finish ..... Sn  
 Coating ..... Magnetic epoxy resin  
 Packaging ..... 3000 pcs. per 13-inch reel

### Product Dimensions



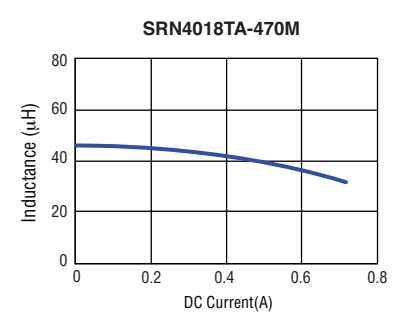
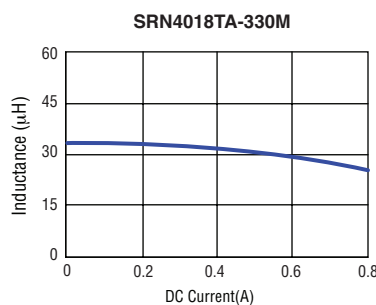
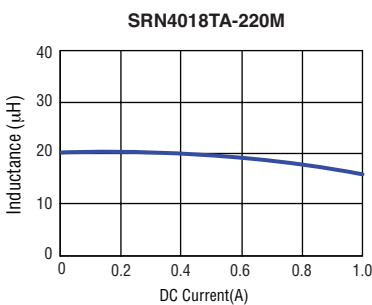
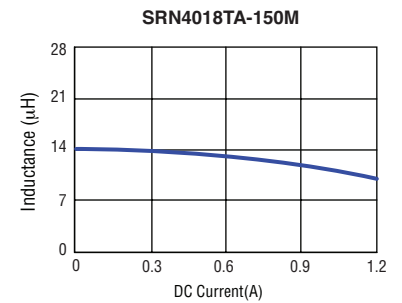
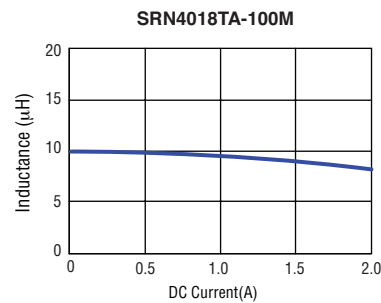
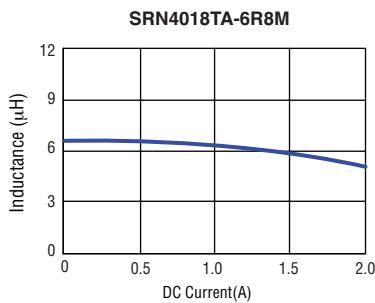
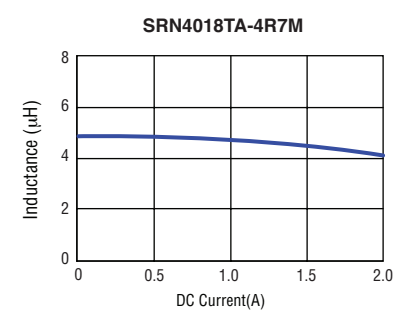
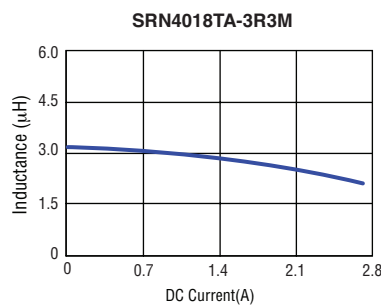
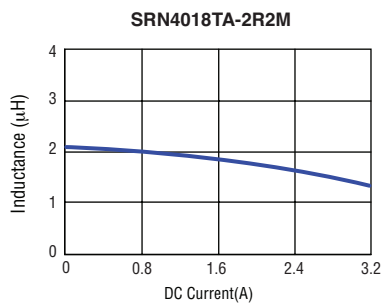
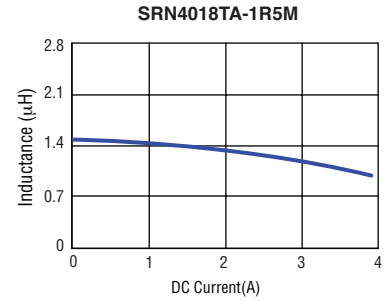
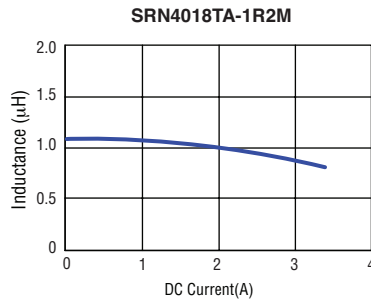
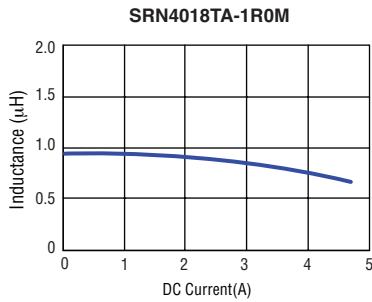
### Recommended Layout



# SRN4018TA Series - Semi-shielded Power Inductors



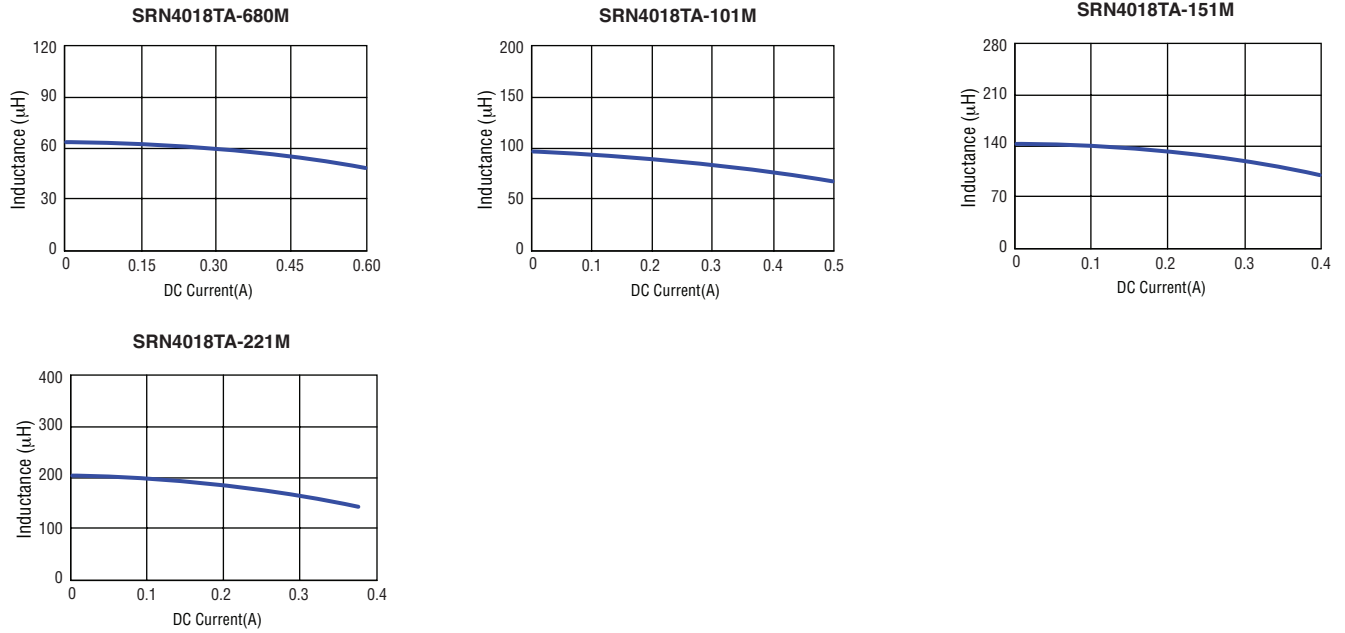
## Inductance vs. Current



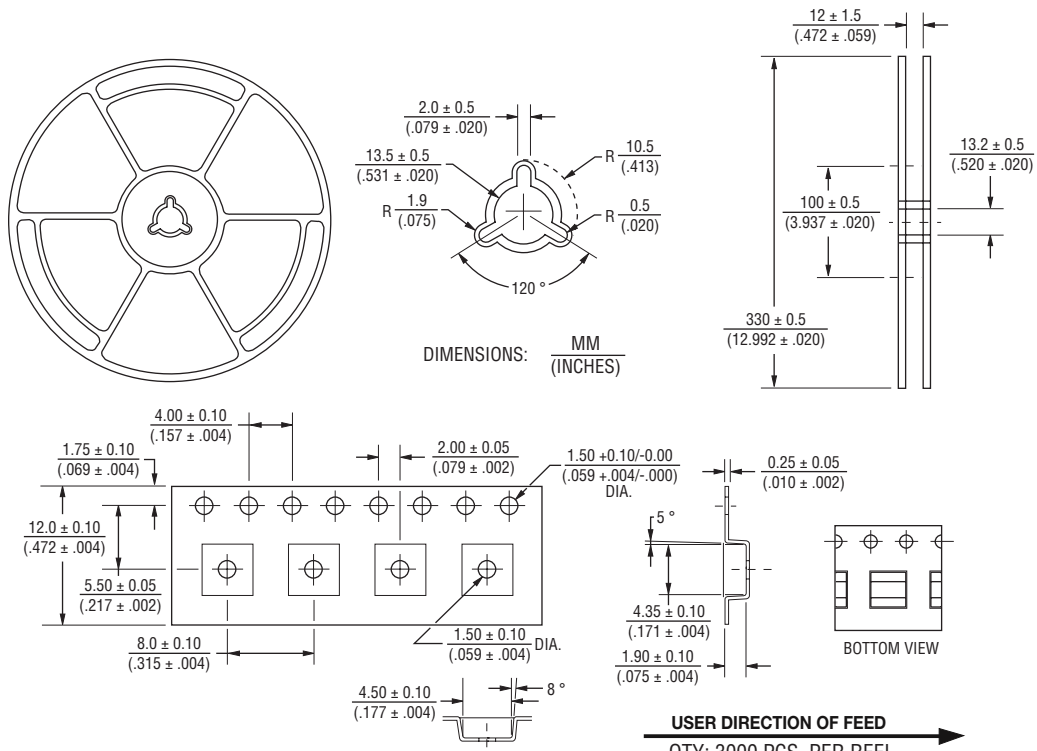
# SRN4018TA Series - Semi-shielded Power Inductors

**BOURNS®**

## Inductance vs. Current



## Packaging Specifications



REV. 07/22

Specifications are subject to change without notice.

Users should verify actual device performance in their specific applications.

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