

Features

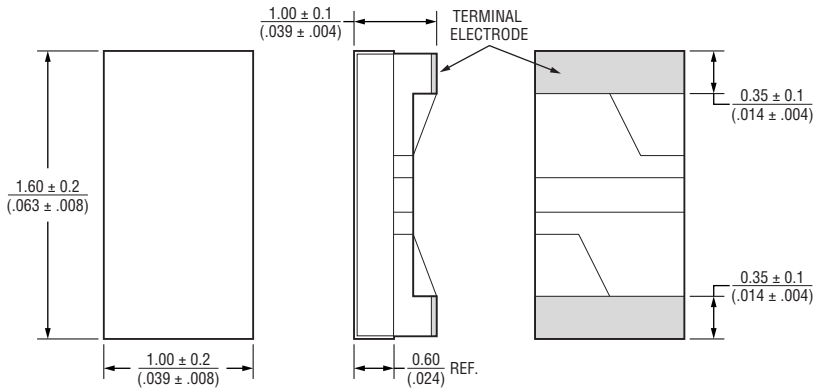
- Miniature size
- High Q value
- High self-resonant frequency
- Low DCR
- RoHS compliant* and halogen free**

CWF1610 Series - 0603 Chip Inductors

Electrical Specifications @ 25 °C

Bourns Part No.	Inductance L (µH)	Inductance Tol. %	Q Typ.	L & Q Test Freq. / Voltage	SRF (MHz) Typ.	DCR (Ω) ±30 %	Irms (mA) Typ.	Isat (mA) Typ.
CWF1610-1R0K	1.0	10	16	7.9 MHz / 0.5 V	390	0.32	700	860
CWF1610-2R2K	2.2	10	16	7.9 MHz / 0.5 V	103	0.56	580	600
CWF1610-3R3K	3.3	10	16	7.9 MHz / 0.5 V	66	0.7	500	500
CWF1610-4R7K	4.7	10	16	7.9 MHz / 0.5 V	51	0.97	420	400
CWF1610-6R8K	6.8	10	16	7.9 MHz / 0.5 V	43	1.5	340	340
CWF1610-100K	10	10	14	2.5 MHz / 0.5 V	36	1.85	280	280
CWF1610-150K	15	10	14	2.5 MHz / 0.5 V	29	2.6	240	240
CWF1610-180K	18	10	14	2.5 MHz / 0.5 V	28	2.9	220	220
CWF1610-220K	22	10	14	2.5 MHz / 0.5 V	24	3.61	200	200

Product Dimensions



DIMENSIONS: MM (INCHES)

Additional Information

Click these links for more information:

PRODUCT | TECHNICAL LIBRARY | INVENTORY | SAMPLES | CONTACT

General Specifications

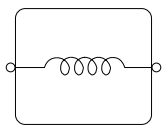
Operating Temperature
..... -40 °C to +125 °C
(Temperature rise included)
Storage Temperature (Component)
..... -40 °C to +125 °C
Temperature Rise .... 40 °C at rated Irms[1]
Rated Current
..... Inductance drops 20 % at Isat
Moisture Sensitivity Level 1
ESD Classification (HBM) ..... N/A

Note 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 ..... Ferrite
Wire ..... Enameled copper
Terminal Finish ..... Sn
Packaging ..... 4000 pcs. per 7-inch reel

Electrical Schematic



How to Order

CWF1610 - 1R0K

Model
Value Code (see table)

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

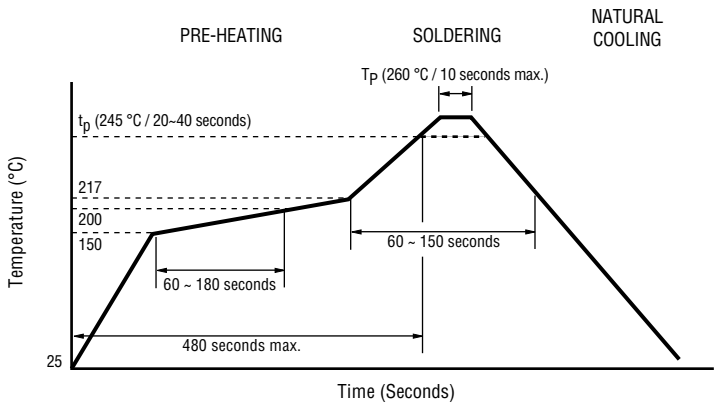
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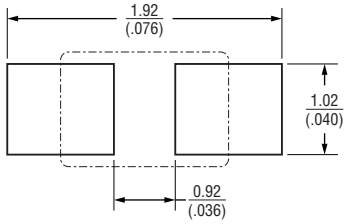
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Soldering Profile



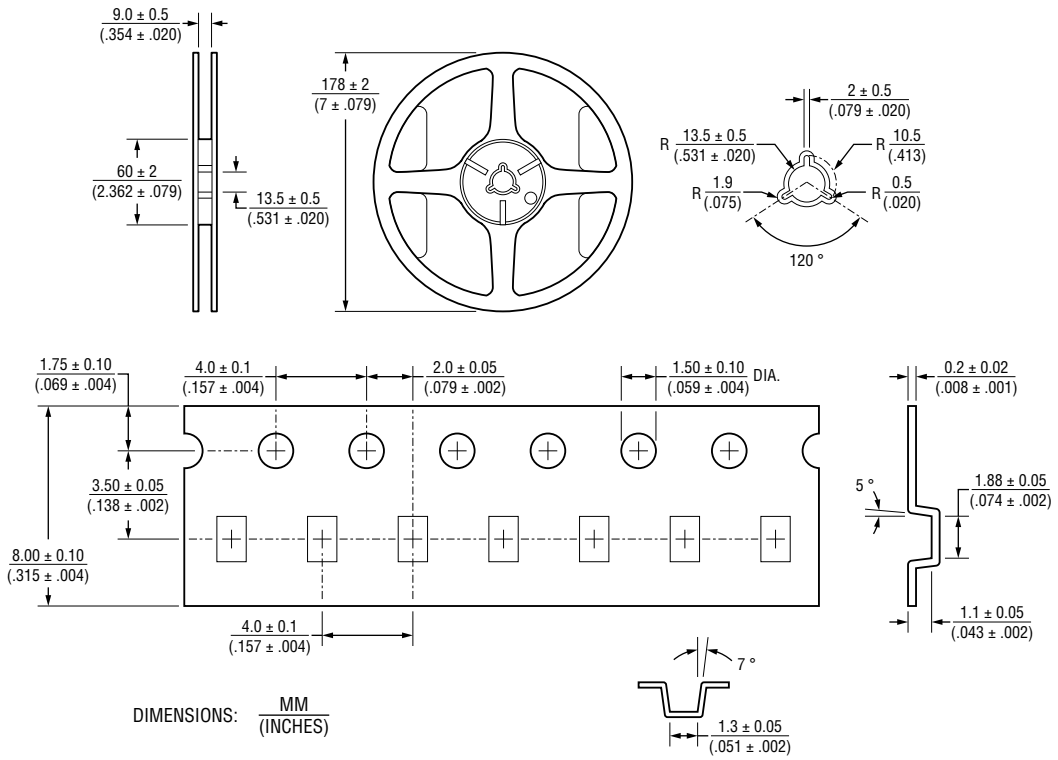
REFLOW TIMES: 3 MAX.

Recommended Layout



DIMENSIONS: MM (INCHES)

Packaging Specifications



DIMENSIONS: MM (INCHES)

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