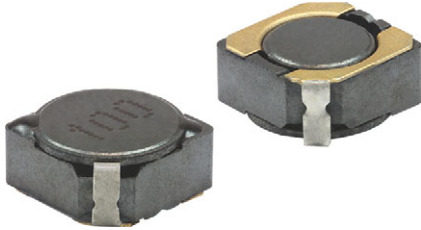


## Ferrite Power Inductor, Shielded Drum Core



### FEATURES

- 6.0 mm x 6.0 mm x 3.0 mm max. SMD package
- Shielded drum core ferrite construction to reduce leakage flux
- Low profile inductors from 2.2  $\mu\text{H}$  to 470  $\mu\text{H}$
- Material categorization: for definitions of compliance please see [www.vishay.com/doc?99912](http://www.vishay.com/doc?99912)



**RoHS**  
COMPLIANT  
HALOGEN  
**FREE**  
**GREEN**  
(5-2008)

### LINKS TO ADDITIONAL RESOURCES



[Product Page](#)

### ELECTRICAL SPECIFICATIONS

#### Operating temperature:

-40 °C to +105 °C (temperature rise included)

#### Resistance to solder heat:

255 °C for 10 s (2 times max. through reflow)

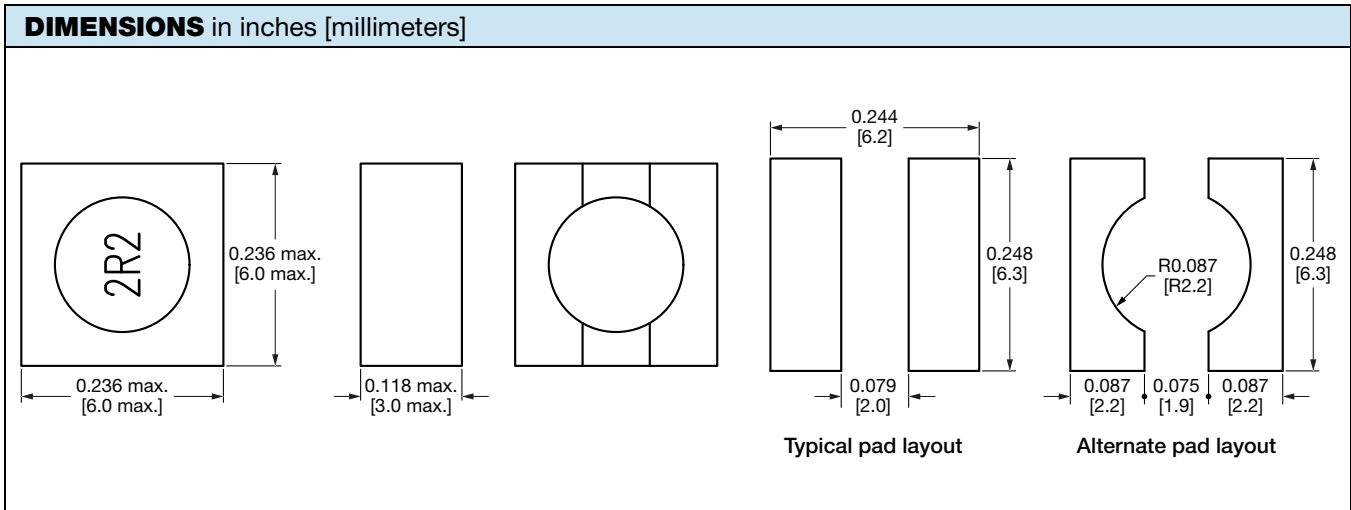
### APPLICATIONS

- DC/DC power supplies
- Noise suppression and filtering

STANDARD ELECTRICAL SPECIFICATIONS				
PART NUMBER	L <sub>0</sub> INDUCTANCE ( $\mu\text{H}$ )	INDUCTANCE TOLERANCE (%)	DCR MAX. ( $\text{m}\Omega$ )	HEAT RATING CURRENT DC TYP. (A) <sup>(1)</sup>
IFDC2020CZER2R2N	2.2	30	17	2.60
IFDC2020CZER3R3N	3.3	30	29	2.40
IFDC2020CZER4R2N	4.2	30	39	2.30
IFDC2020CZER4R7N	4.7	30	39	2.10
IFDC2020CZER6R8N	6.8	30	48	1.85
IFDC2020CZER8R2N	8.2	30	57	1.58
IFDC2020CZER100M	10	20	65	1.30
IFDC2020CZER120M	12	20	76	1.20
IFDC2020CZER150M	15	20	95	1.10
IFDC2020CZER180M	18	20	110	1.00
IFDC2020CZER220M	22	20	122	0.90
IFDC2020CZER270M	27	20	180	1.00
IFDC2020CZER330M	33	20	189	0.75
IFDC2020CZER470M	47	20	250	0.62
IFDC2020CZER560M	56	20	305	0.58
IFDC2020CZER680M	68	20	355	0.52
IFDC2020CZER820M	82	20	463	0.46
IFDC2020CZER101M	100	20	520	0.42
IFDC2020CZER121M	120	20	560	0.40
IFDC2020CZER151M	150	20	680	0.35
IFDC2020CZER181M	180	20	930	0.32
IFDC2020CZER221M	220	20	1150	0.30
IFDC2020CZER271M	270	20	1560	0.27
IFDC2020CZER331M	330	20	1980	0.25
IFDC2020CZER471M	470	20	2700	0.20

### Notes

- All test data is referenced to 25 °C ambient
  - Test condition: 100 kHz, 0.3 V for 8.2  $\mu\text{H}$  and below, and 1 kHz, 0.3 V for 10  $\mu\text{H}$  and above
  - Storage condition: -40 °C to +105 °C (on board); and -10 °C to +40 °C and < 70 % RH (in component packaging)
- <sup>(1)</sup> DC current (A) that will cause an approximate  $\Delta\text{T}$  of 40 °C or cause L<sub>0</sub> to drop by 35 %, whichever is lower



DESCRIPTION				
<b>IFDC2020CZ</b>	<b>2.2 <math>\mu</math>H</b>	<b><math>\pm 30\%</math></b>	<b>ER</b>	<b>e3</b>
MODEL	INDUCTANCE VALUE	INDUCTANCE TOLERANCE	PACKAGE CODE	JEDEC® LEAD (Pb)-FREE STANDARD

GLOBAL PART NUMBER				
<b>I F D C</b>	<b>2 0 2 0 C Z</b>	<b>E R</b>	<b>2 R 2</b>	<b>N</b>
PRODUCT FAMILY	SIZE	PACKAGE CODE	INDUCTANCE VALUE	INDUCTANCE TOLERANCE
		<b>ER =</b> tape and reel	<b>2R2 = 2.2 <math>\mu</math>H</b>	<b>M = <math>\pm 20\%</math></b> <b>N = <math>\pm 30\%</math></b>



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