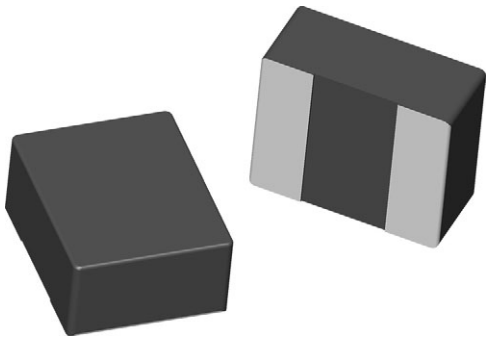
Commercial Power Inductor, Low DCR



FEATURES

- 2.0 mm x 1.6 mm x 1.0 mm SMD package
- Handles high transient current spikes without saturation
- Magnetically shielded composite construction
- Bottom plated terminals allow for a smaller pad layout for compact board spacing
- Packaging information: SMD packaging
- Material categorization: for definitions of compliance please see www.vishay.com/doc?99912

Pb-free

RoHS COMPLIANT

HALOGEN FREE GREEN (5-2008)

LINKS TO ADDITIONAL RESOURCES

Product Page

APPLICATIONS

- SSD modules
- DC/DC converter for CPU
- Noise suppression and filtering
- Data networking and storage systems

STANDARD ELECTRICAL SPECIFICATIONS

PART NUMBER	L_0 INDUCTANCE ± 20 % AT 0 A (µH)	DCR TYP. 25 °C (mΩ)	DCR MAX. 25 °C (mΩ)	HEAT RATING CURRENT DC TYP. (A) [1]	SATURATION CURRENT DC TYP. (A)	
					20 % DROP [2]	30 % DROP [3]
IHLL0806AZEZR24M1Z	0.24	16.0	20.0	6.3	6.5	7.2
IHLL0806AZEZR33M1Z	0.33	21.0	26.0	4.7	4.5	6.1
IHLL0806AZEZR47M1Z	0.47	26.0	32.0	4.6	4	5.3
IHLL0806AZEZR68M1Z	0.68	36.0	43.0	4.2	3.5	4.2
IHLL0806AZEZ1R0M1Z	1.00	50.0	60.0	3.4	3.5	4.5
IHLL0806AZEZ1R5M1Z	1.50	68.0	82.0	3.1	2.5	3.2
IHLL0806AZEZ2R2M1Z	2.20	100.0	120.0	2.3	2.2	2.7
IHLL0806AZEZ4R7M1Z	4.70	240.0	288.0	1.3	1.5	1.8

Notes

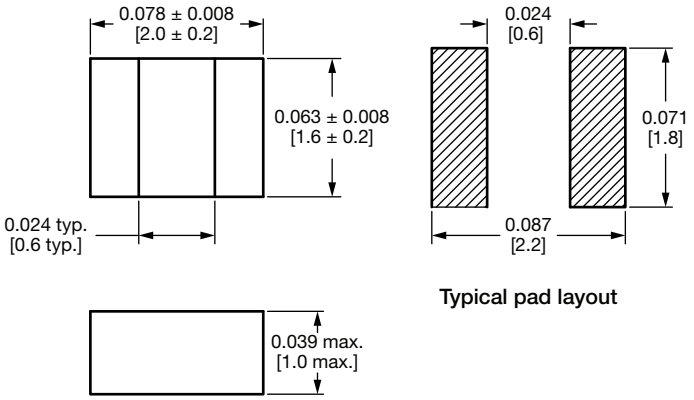
- All test data is referenced to 25 °C ambient
- Test condition: 1 MHz, 1 V
- Operating temperature range -55 °C to +125 °C
- The part temperature (ambient + temp. rise) should not exceed 155 °C under worst case operating conditions. Circuit design, component placement, PWB trace size and thickness, airflow and other cooling provisions all affect the part temperature. Part temperature should be verified in the end application

(1) DC current (A) that will cause an approximate ΔT of 40 °C

(2) DC current (A) that will cause L_0 to drop approximately 20 %

(3) DC current (A) that will cause L_0 to drop approximately 30 %

DIMENSIONS in inches [millimeters]



Typical pad layout

No part marking

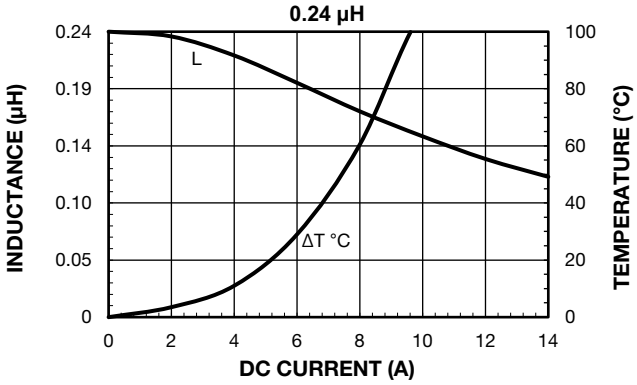
DESCRIPTION

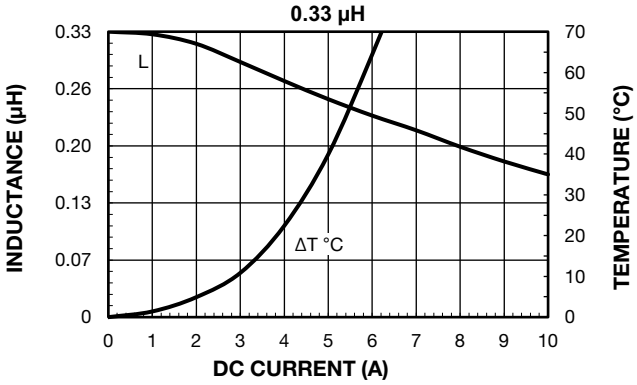
IHLL-0806AZ-1Z	2.2 µH	± 20 %	EZ	e3
MODEL	INDUCTANCE VALUE	INDUCTANCE TOLERANCE	PACKAGE CODE	JEDEC® LEAD (Pb)-FREE STANDARD

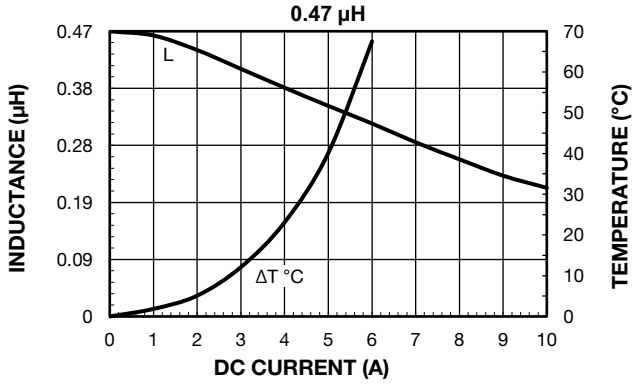
GLOBAL PART NUMBER

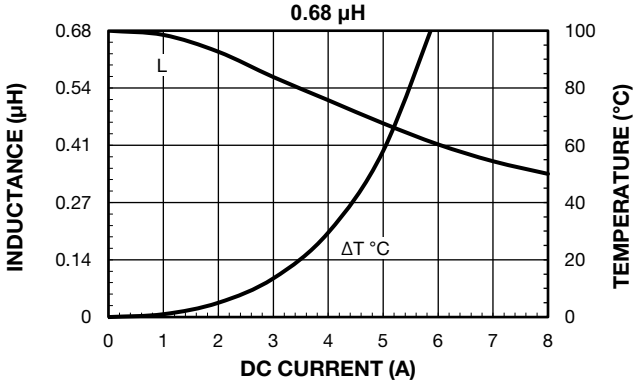
I H L L	0 8 0 6 A Z	E Z	2 R 2	M	1 Z
PRODUCT FAMILY	SIZE	PACKAGE CODE	INDUCTANCE VALUE	INDUCTANCE TOLERANCE	SERIES
		EZ = tape and reel	**2R2** = 2.2 µH	**M** = ± 20 %	

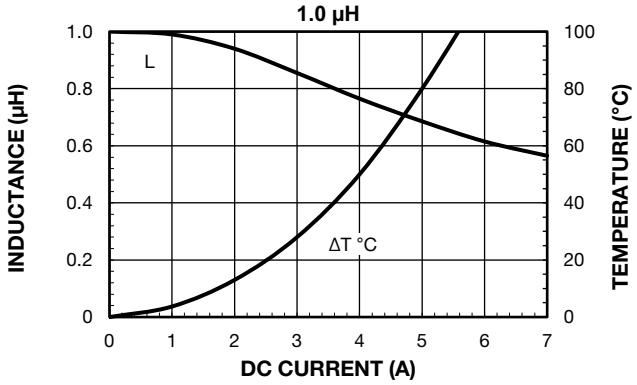
PERFORMANCE GRAPHS

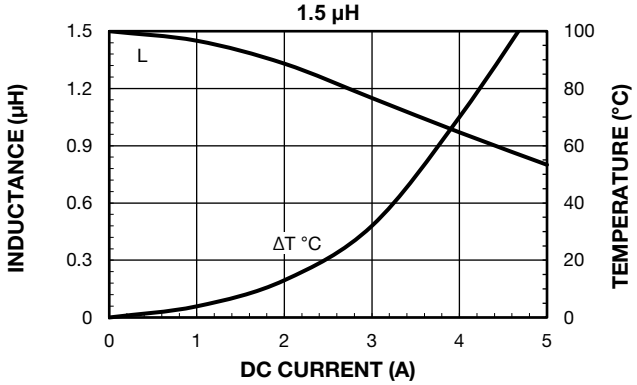


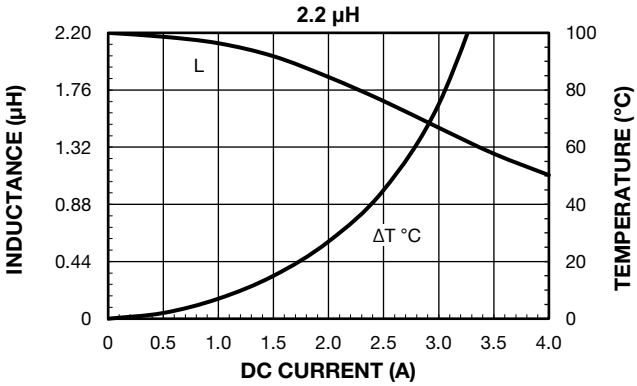


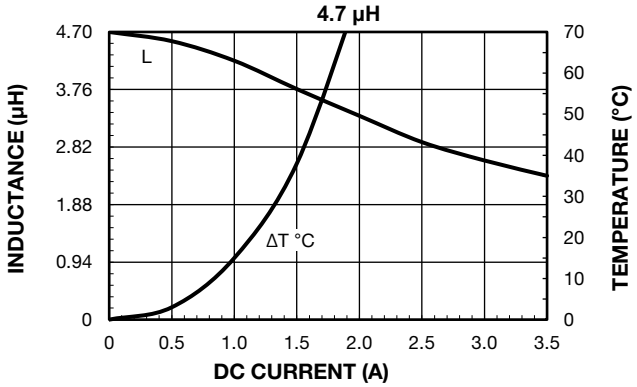












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