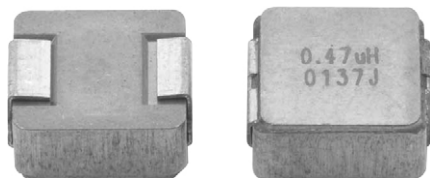


IHLP® Automotive Inductors, Low DCR Series



LINKS TO ADDITIONAL RESOURCES



STANDARD ELECTRICAL SPECIFICATIONS				
L_0 INDUCTANCE $\pm 20\%$ AT 100 kHz, 0.25 V, 0 A (μH)	DCR TYP. 25 °C (m Ω)	DCR MAX. 25 °C (m Ω)	HEAT RATING CURRENT DC TYP. (A) ⁽¹⁾	SATURATION CURRENT DC TYP. (A) ⁽²⁾
1.0	7.6	8.0	12.5	9.5
2.2	15.7	16.5	9.0	7.0
3.3	24.8	26.0	7.0	6.5
4.7	31.8	33.4	6.0	4.0
6.8	44.6	46.8	5.5	4.0
8.2	52.3	54.9	5.0	4.0
10	67.8	71.2	4.0	3.5
15	88.4	95.0	3.7	3.2
22	128.9	135.0	2.9	2.5

Notes

- All test data is referenced to 25 °C ambient
- Operating temperature range -55 °C to +125 °C
- The part temperature (ambient + temp. rise) should not exceed 125 °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
- Rated operating voltage (across inductor) = 50 V
- (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 %

FEATURES

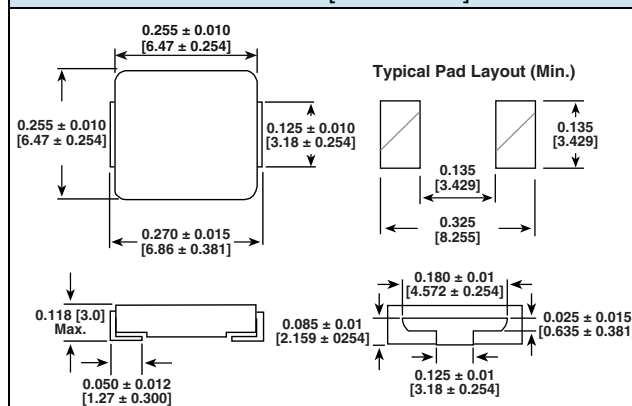
- Shielded construction
- Frequency range up to 1.0 MHz
- Lowest DCR/ μH , in this package size
- Powered iron composition provides soft saturation
- Handles high transient current spikes without hard saturation
- Ultra low buzz noise, due to composite construction
- AEC-Q200 qualified
- IHLP design; PATENT(S): www.vishay.com/patents
- Material categorization: for definitions of compliance please see www.vishay.com/doc?99912



APPLICATIONS

- Engine and transmission control units
- Diesel injection drivers
- DC/DC converters for entertainment / navigation systems
- Noise suppression for motors: windshield wipers / power seats / power mirrors / heating and ventilation blower / HID lighting
- LED drivers

DIMENSIONS in inches [millimeters]



DESCRIPTION

IHLP-2525CZ-1A	1.0 μH	$\pm 20\%$	EK	e3
MODEL	INDUCTANCE VALUE	INDUCTANCE TOLERANCE	PACKAGE CODE	JEDEC® LEAD (Pb)-FREE STANDARD

GLOBAL PART NUMBER

I	H	L	P	2	5	2	5	C	Z	E	K	1	R	0	M	1	A
PRODUCT FAMILY				SIZE						PACKAGE CODE		INDUCTANCE VALUE			TOL.	SERIES	

PATENT(S): www.vishay.com/patents

This Vishay product is protected by one or more United States and international patents.

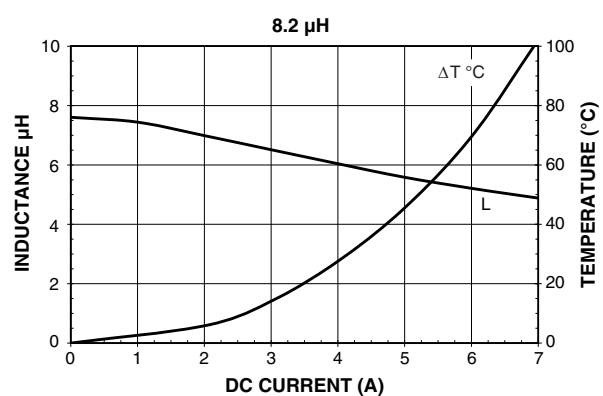
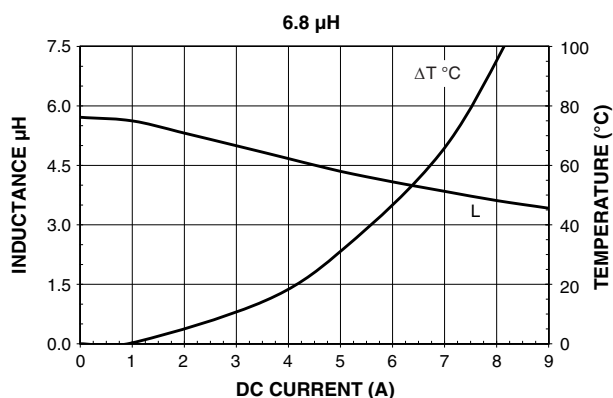
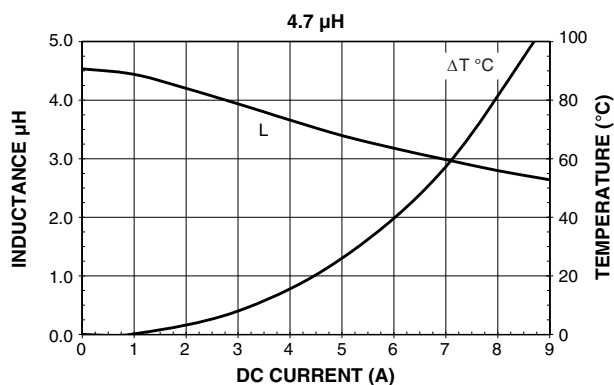
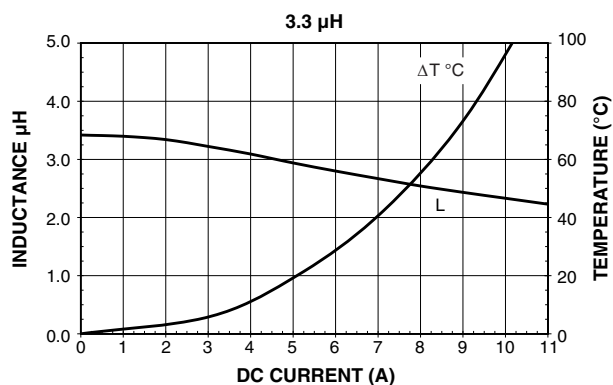
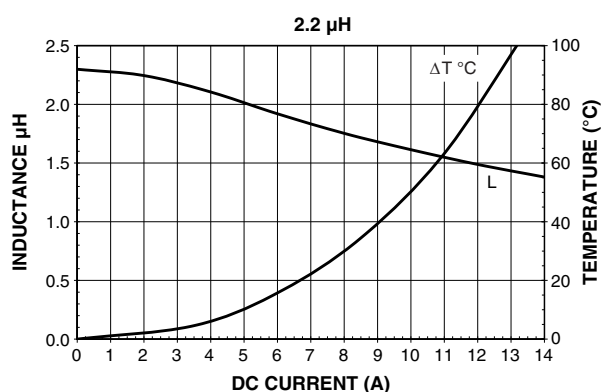
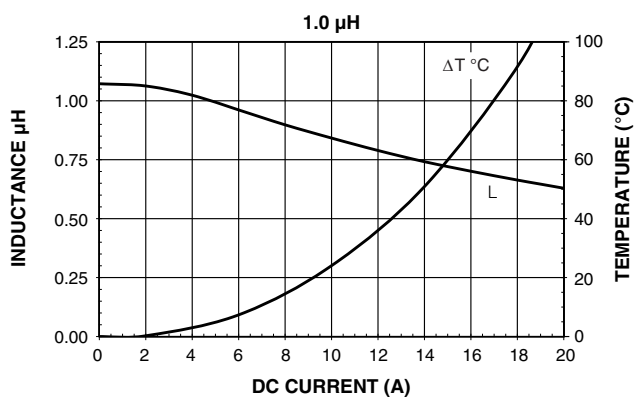


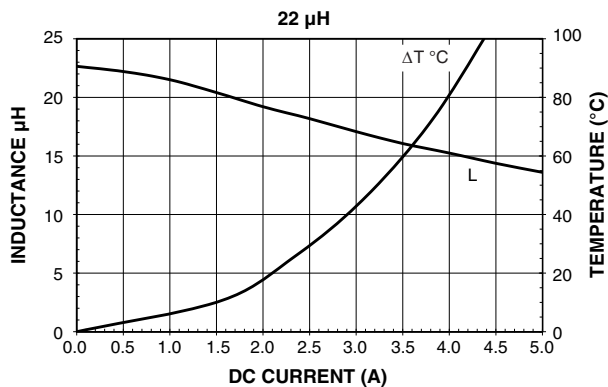
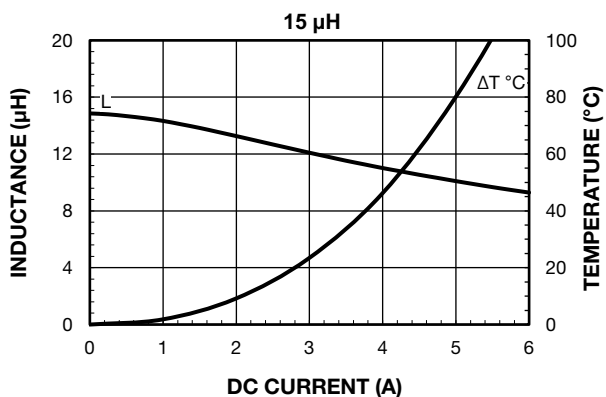
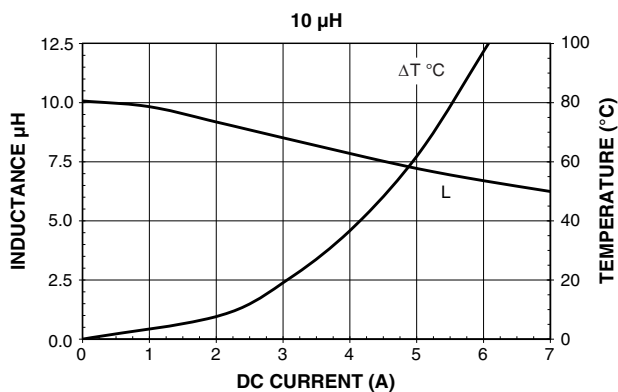
PACKAGE CODE OPTIONS

EK = tape and reel packaging (2500 pcs on 13-inch reel)

ER = tape and reel packaging (2000 pcs on 13-inch reel)

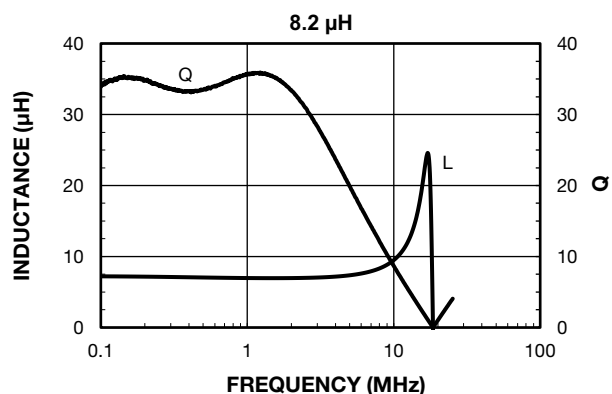
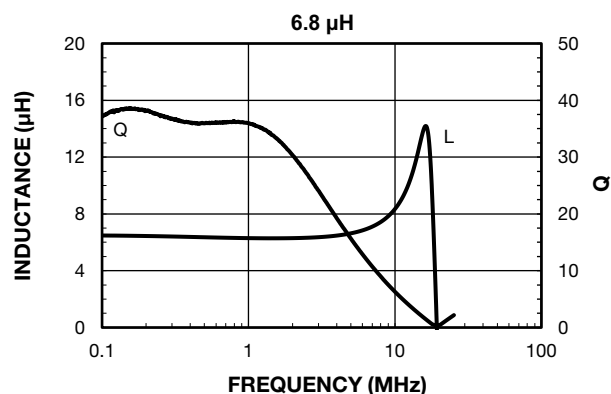
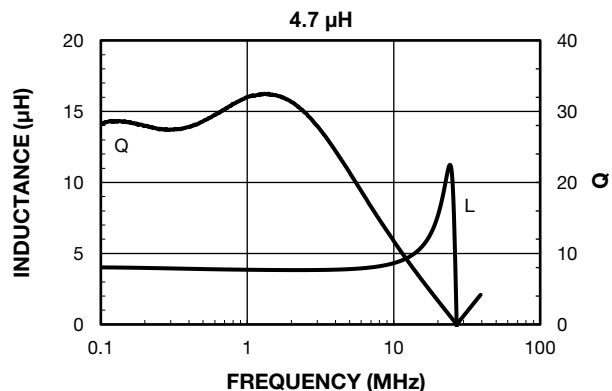
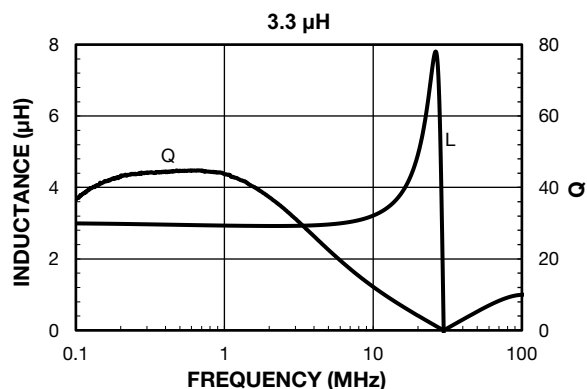
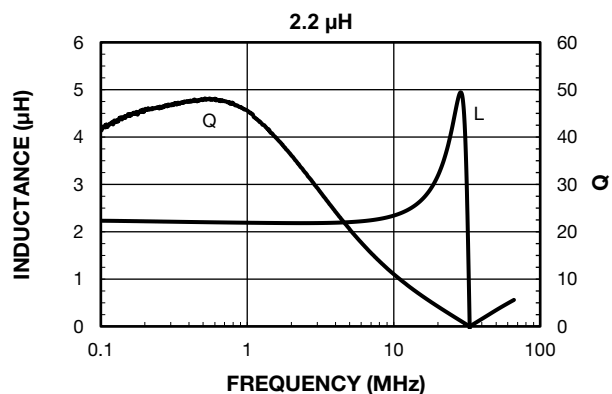
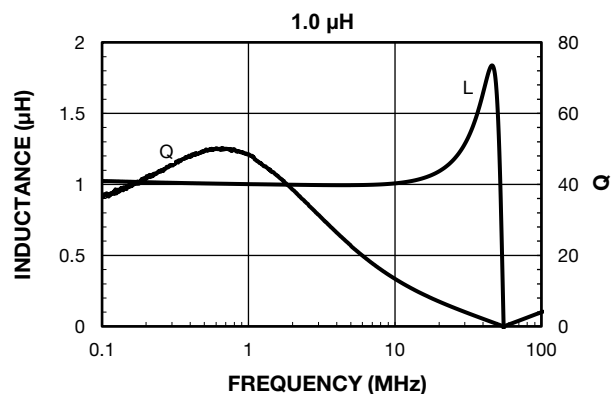
PERFORMANCE GRAPHS

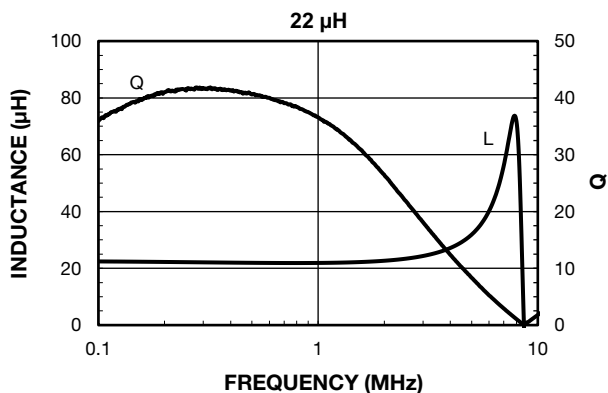
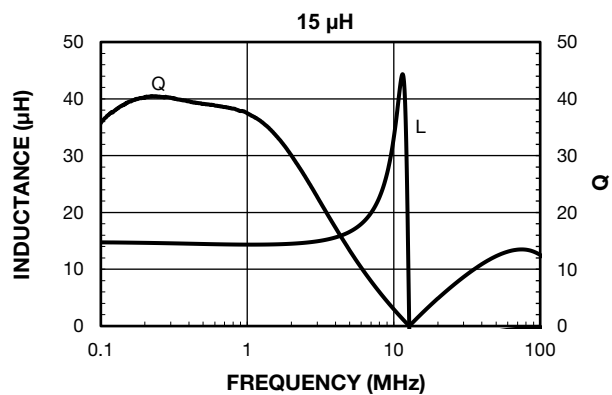
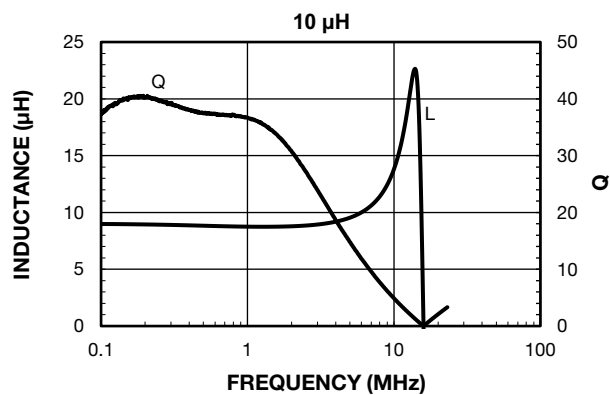


PERFORMANCE GRAPHS




PERFORMANCE GRAPHS: INDUCTANCE AND Q VS. FREQUENCY



PERFORMANCE GRAPHS: INDUCTANCE AND Q VS. FREQUENCY




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