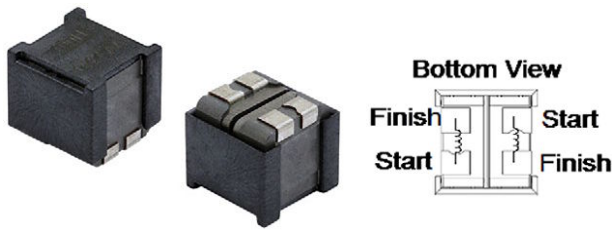


Low Profile, High Current Dual Inductors



DESIGN SUPPORT TOOLS click logo to get started



| STANDARD ELECTRICAL SPECIFICATIONS | | | | | |
|--|--|--|--|--|----------------------|
| L_0 INDUCTANCE $\pm 20\%$ AT 100 kHz, 0.25 V, 0 A (μH) | DCR TYP. 25 °C ($\text{m}\Omega$) | DCR MAX. 25 °C ($\text{m}\Omega$) | HEAT RATING CURRENT DC TYP. (A) ⁽¹⁾ | SATURATION CURRENT DC TYP. (A) ⁽²⁾ | SRF TYP. (MHz) |
| 5 | 27.3 | 29.2 | 6.0 | 8.5 | 18.0 |
| 10 | 50.0 | 53.50 | 5.0 | 5.2 | 13.0 |
| 15 | 62.0 | 66.34 | 4.2 | 3.5 | 10.0 |
| 22 | 103.0 | 110.21 | 3.3 | 2.9 | 9.0 |
| 33 | 149.0 | 159.43 | 2.4 | 2.9 | 6.1 |

Notes

- All test data is referenced to 25 °C ambient
- Operating temperature range -55 °C to +155 °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
- 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

- Two inductors in one package
- High temperature, up to 155 °C
- Shielded construction
- Optimal design realizes high quality sound and low distortion
- Low coupling for minimal cross-talk between inductors
- Frequency range up to 1 MHz
- Lowest DCR/ μH , in this package size
- Handles high transient current spikes without 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

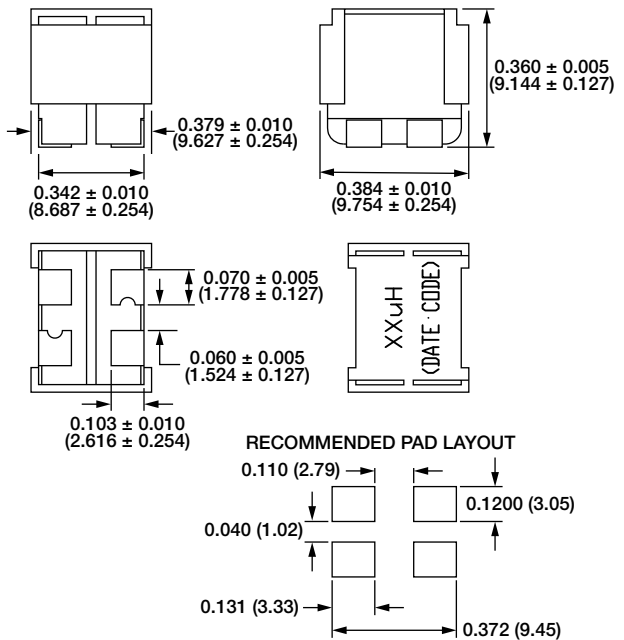
 AUTOMOTIVE
GRADE

RoHS
COMPLIANT

APPLICATIONS

- Class D audio amplifiers

DIMENSIONS in inches [millimeters]



DESCRIPTION

| | | | | |
|----------------|------------------|----------------------|--------------|--------------------------------|
| IHLD-3232HB-5A | 10 μH | $\pm 20\%$ | ER | e3 |
| MODEL | INDUCTANCE VALUE | INDUCTANCE TOLERANCE | PACKAGE CODE | JEDEC® LEAD (Pb)-FREE STANDARD |

GLOBAL PART NUMBER

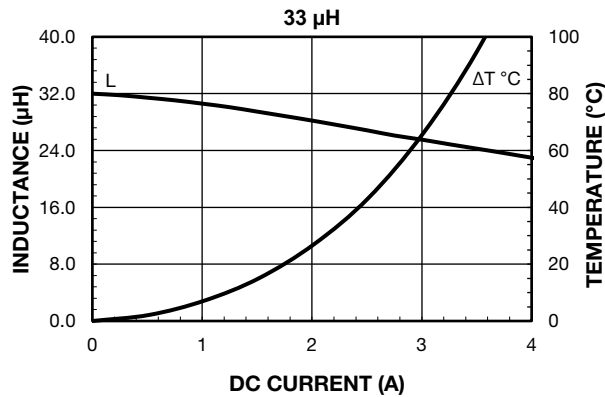
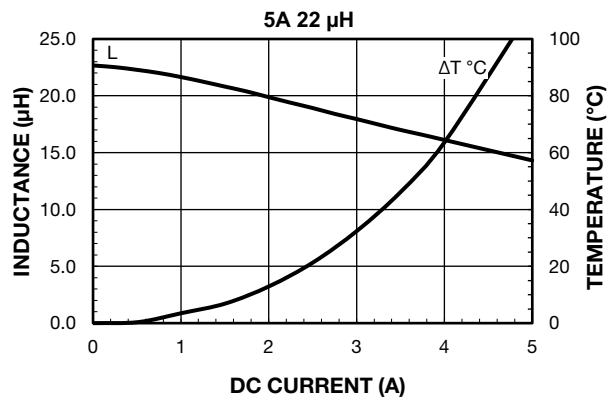
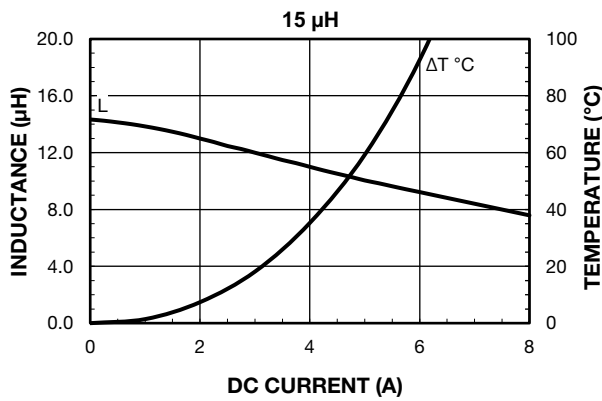
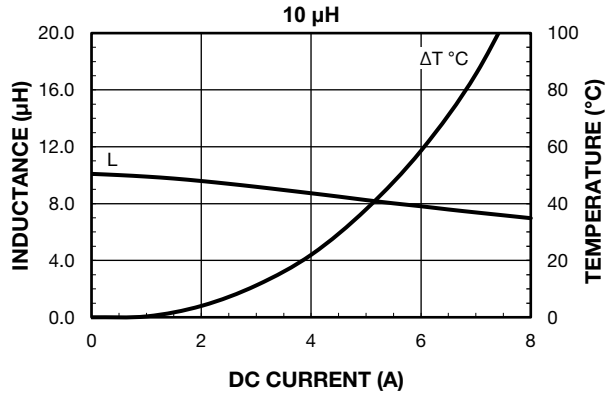
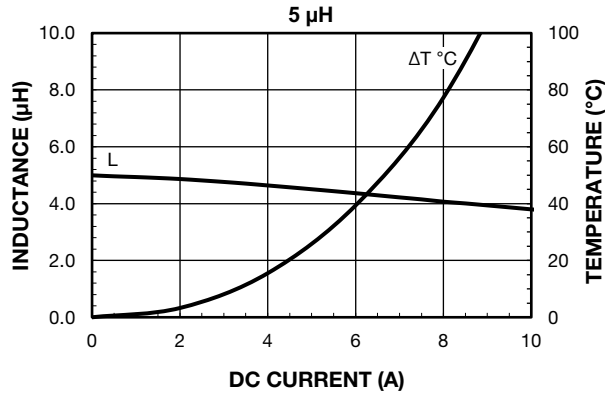
| | | | | | | | | | | | | | | | | | |
|----------------|---|---|---|------|---|---|---|--------------|---|------------------|---|---|------|--------|---|---|---|
| I | H | L | D | 3 | 2 | 3 | 2 | H | B | E | R | 1 | 0 | 0 | M | 5 | A |
| PRODUCT FAMILY | | | | SIZE | | | | PACKAGE CODE | | INDUCTANCE VALUE | | | TOL. | SERIES | | | |

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

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

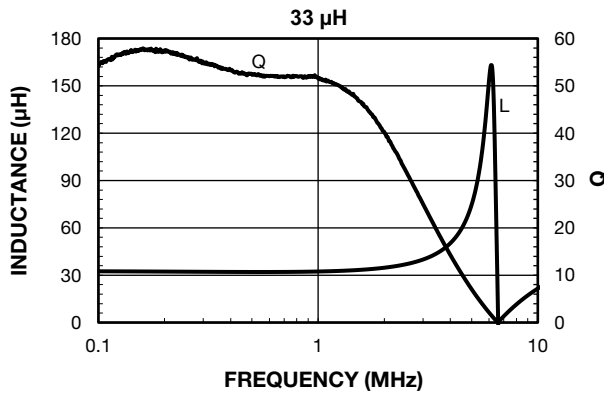
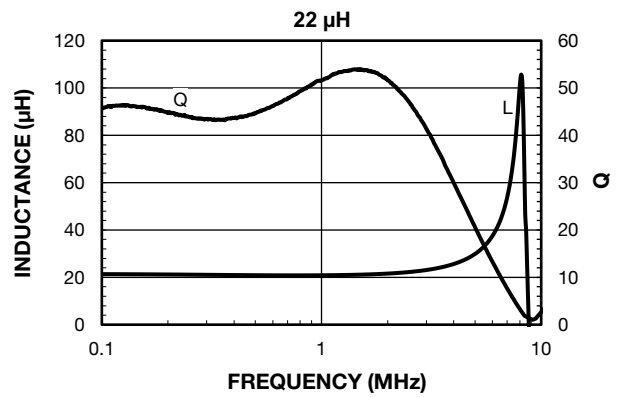
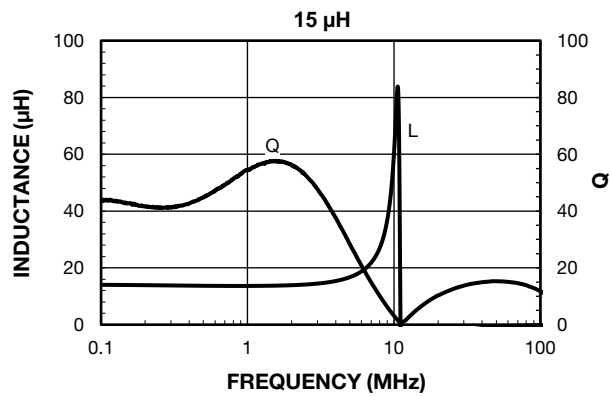
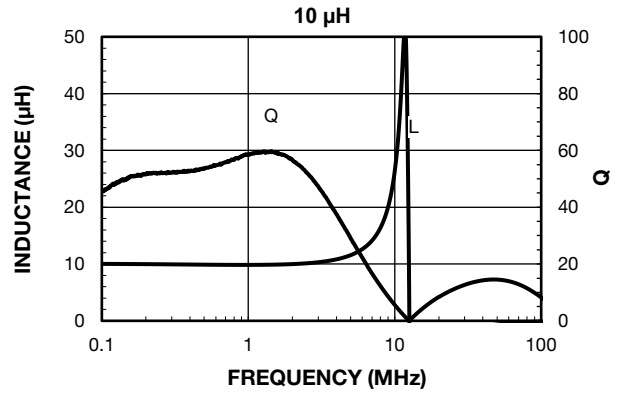
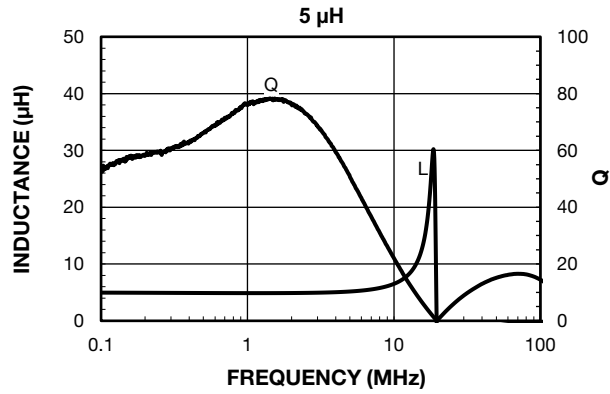


PERFORMANCE GRAPHS





PERFORMANCE GRAPHS: INDUCTANCE AND Q VS. FREQUENCY





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