

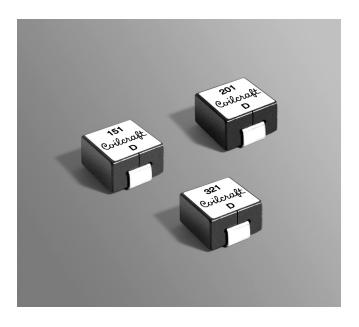








Shielded Power Inductors – SLC1480



- · Requires a mere quarter square inch of board space
- Handles current as high as 130 A.
- Ideal for use in multi-phase VRM/VRD regulators

Designer's Kit C467 contains 3 each of select values.

Core material Ferrite

Terminations RoHS compliant matte tin over nickel over copper. Other terminations available at additional cost.

Weight 5.25 g

Ambient temperature -40°C to +85°C with (40°C rise) Irms current. Maximum part temperature +125°C (ambient + temp rise). Derating. Storage temperature Component: -40°C to +125°C.

Tape and reel packaging: -40°C to +80°C

Resistance to soldering heat Max three 40 second reflows at +260°C, parts cooled to room temperature between cycles

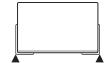
Moisture Sensitivity Level (MSL) 1 (unlimited floor life at <30°C / 85% relative humidity)

Packaging 500/13" reel; Plastic tape: 24 mm wide, 0.4 mm thick, 16 mm pocket spacing, 8.1 mm pocket depth

PCB washing Tested to MIL-STD-202 Method 215 plus an additional aqueous wash. See Doc787_PCB_Washing.pdf.

| | Inductance ² | DCR ³ | SRF typ ⁴ | Isat (A) ⁵ | | | Irms (A) ⁶ | |
|--------------------------|-------------------------|------------------|----------------------|-----------------------|----------|----------|-----------------------|-----------|
| Part number ¹ | ±20% (nH) | ±17% (mOhms) | (MHz) | 10% drop | 20% drop | 30% drop | 20°C rise | 40°C rise |
| SLC1480-111MLD | 110 | 0.18 | 130 | 110 | 128 | 130 | 64 | 83 |
| SLC1480-131MLD | 130 | 0.18 | 110 | 97 | 110 | 112 | 64 | 83 |
| SLC1480-151MLD | 150 | 0.18 | 108 | 88 | 95 | 97 | 64 | 83 |
| SLC1480-171MLD | 170 | 0.18 | 75 | 80 | 87 | 90 | 64 | 83 |
| SLC1480-201MLD | 200 | 0.18 | 68 | 65 | 72 | 76 | 64 | 83 |
| SLC1480-231MLD | 230 | 0.18 | 59 | 57 | 64 | 67 | 64 | 83 |
| SLC1480-261MLD | 260 | 0.18 | 50 | 50 | 57 | 61 | 64 | 83 |
| SLC1480-301MLD | 300 | 0.18 | 46 | 42 | 49 | 52 | 64 | 83 |
| SLC1480-321MLD | 320 | 0.18 | 42 | 38 | 44 | 48 | 64 | 83 |
| SLC1480-441MLD | 440 | 0.18 | 35 | 28 | 32 | 35 | 64 | 83 |

- 1. Packaging: D = 13" machine-ready reel. EIA-481 embossed plastic tape (500 per full reel). Quantities less than full reel available: in tape (not machine ready) or with leader and trailer (\$25 charge).
 - **B** = In an effort to simplify our part numbering system, Coilcraft is eliminating the need for multiple packaging codes. When ordering, simply change the last letter of your part number from B to D.
- 2. Inductance tested at 100 kHz, 0.1 Vrms using an Agilent/HP 4284.
- 3. DCR is measured between the two points indicated below.



▲ Points used for measuring DCR

- 4. SRF measured using an Agilent/HP 8753ES network analyzer or equivalent.
- 5. DC current at 25°C that causes the specified inductance drop from its value without current. Click for temperature derating information.

- 6. Current that causes the specified temperature rise from 25°C ambient. This information is for reference only and does not represent absolute maximum ratings. Click for temperature derating information.
- 7. Electrical specifications at 25°C.

Refer to Doc 362 "Soldering Surface Mount Components" before soldering.

Irms Testing

Irms testing was performed on 0.75 inch wide \times 0.25 inch thick copper traces in still air.

Temperature rise is highly dependent on many factors including pcb land pattern, trace size, and proximity to other components. Therefore temperature rise should be verified in application conditions



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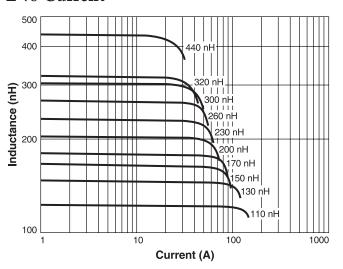
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This product may not be used in medical or high risk applications without prior Coilcraft approval Specification subject to change without notice Please check web site for latest information

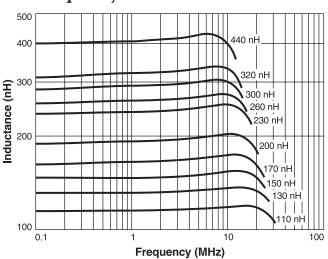


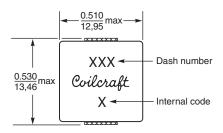
Shielded Power Inductors – SLC1480 Series

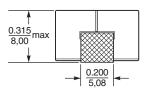
L vs Current

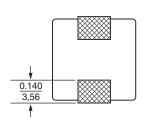


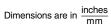
L vs Frequency

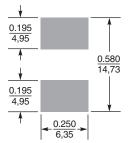












Recommended Land Pattern

