

## New Product

### FEATURES

- RoHS compliant
- Shielded
- Low profile
- Ideal for use in LCD drivers, notebook computers, digital cameras, TV, mobile devices and DC-DC converters

### SURFACE MOUNT SHIELDED POWER INDUCTOR SERIES SDC5530

### ELECTRICAL SPECIFICATIONS

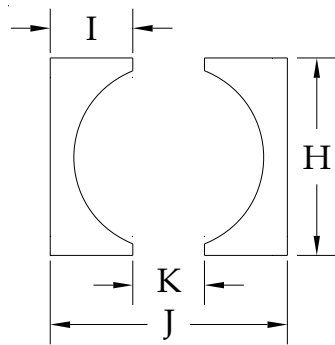
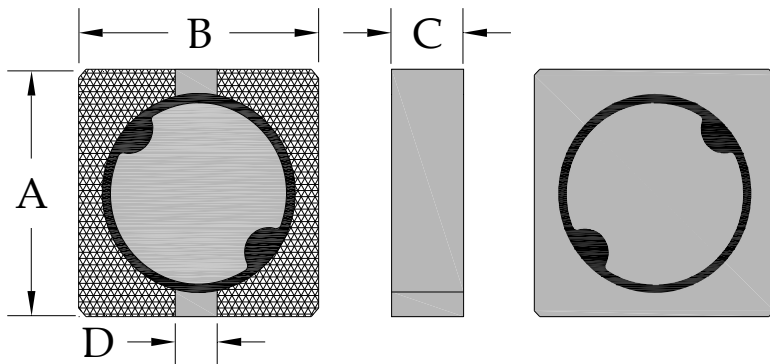
- Inductance range 1uH to 2.5mH
- Test condition (1uH - 8.2uH) 100kHz @ 0.25Vrms
- Test condition (10uH - 2.5mH) 1kHz @ 0.25Vrms
- Test equipment Quadtech 1750 LCR Meter

### PHYSICAL SPECIFICATIONS

- Operating temp. -25°C to +105°C
- Core Ferrite
- Packaging T & R 2500 pieces per reel
- Tape & reel spec. Tape 12 mm embossed carrier
- Reel 330 mm

### Dimensions in millimeters

- Length A 5.3 max
- Width B 5.3 max
- Height C 3.0 max
- Terminal pitch D 2.0 ref



### Suggested PCB land pattern

- H = 5.9
- I = 2.0
- J = 5.9
- K = 1.9

### SPECIFICATIONS

| Part Number  | L(uH) | Tol<br>% ± | DCR<br>(ohms)<br>max | Rated<br>Current (A)<br>(Note 1) |
|--------------|-------|------------|----------------------|----------------------------------|
| SDC5530-1R0M | 1.0   | 20         | 0.015                | 4.00                             |
| SDC5530-1R1M | 1.1   | 20         | 0.020                | 3.87                             |
| SDC5530-1R2M | 1.2   | 20         | 0.022                | 3.80                             |
| SDC5530-2R0M | 2.0   | 20         | 0.027                | 2.92                             |
| SDC5530-2R2M | 2.2   | 20         | 0.029                | 2.41                             |
| SDC5530-3R3M | 3.3   | 20         | 0.034                | 2.36                             |
| SDC5530-4R7M | 4.7   | 20         | 0.045                | 1.87                             |
| SDC5530-5R6M | 5.6   | 20         | 0.052                | 1.60                             |
| SDC5530-6R8M | 6.8   | 20         | 0.068                | 1.51                             |
| SDC5530-8R2M | 8.2   | 20         | 0.084                | 1.38                             |
| SDC5530-100M | 10    | 20         | 0.090                | 1.33                             |
| SDC5530-150M | 15    | 20         | 0.142                | 1.05                             |
| SDC5530-220M | 22    | 20         | 0.208                | 0.86                             |
| SDC5530-270M | 27    | 20         | 0.222                | 0.75                             |
| SDC5530-330M | 33    | 20         | 0.257                | 0.72                             |
| SDC5530-470M | 47    | 20         | 0.352                | 0.62                             |
| SDC5530-680M | 68    | 20         | 0.525                | 0.51                             |
| SDC5530-101M | 100   | 20         | 0.80                 | 0.43                             |
| SDC5530-121M | 120   | 20         | 0.85                 | 0.34                             |
| SDC5530-151M | 150   | 20         | 1.10                 | 0.26                             |
| SDC5530-181M | 180   | 20         | 1.19                 | 0.24                             |
| SDC5530-221M | 220   | 20         | 1.53                 | 0.20                             |
| SDC5530-331M | 330   | 20         | 2.03                 | 0.19                             |
| SDC5530-391M | 390   | 20         | 3.00                 | 0.16                             |
| SDC5530-471M | 470   | 20         | 3.50                 | 0.15                             |
| SDC5530-561M | 560   | 20         | 4.45                 | 0.14                             |
| SDC5530-122M | 1200  | 20         | 8.50                 | 0.07                             |
| SDC5530-152M | 1500  | 20         | 10.00                | 0.065                            |
| SDC5530-182M | 1800  | 20         | 13.15                | 0.062                            |
| SDC5530-222M | 2200  | 20         | 19.00                | 0.050                            |
| SDC5530-252M | 2500  | 20         | 20.00                | 0.045                            |

#### Notes:

1. Based on  $\Delta L$  of 30% max or  $\Delta T$  of 40°C max, whichever occurs first
2. All test data based on 25°C ambient. Part temperature (max ambient + temp rise) must not exceed 105°C under worst case operating conditions. Circuit design, other components, PCB trace size and thickness, airflow and other cooling provisions all effect the part temperature.