

## New Product

### SURFACE MOUNT SHIELDED POWER INDUCTOR SERIES SDA4430

#### FEATURES

- RoHS compliant
- High current handling capacity
- Ultra thin
- Low profile
- A perfect fit for various applications including DC-DC converters, laptops and mobile devices.

#### ELECTRICAL SPECIFICATIONS

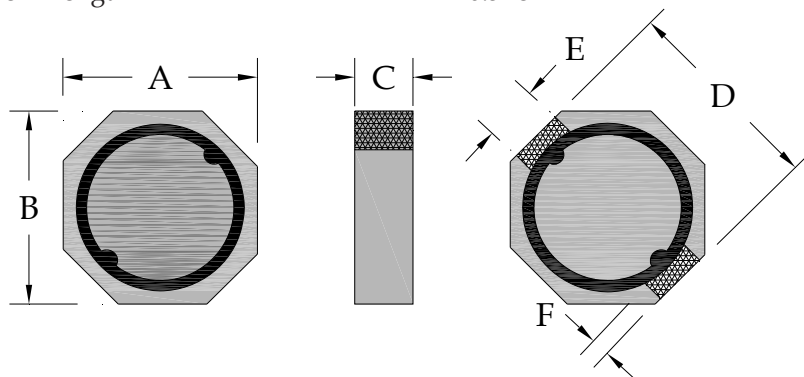
- Inductance range 1uH to 6.8mH
- Test condition (1uH - 8.2uH) 100kHz @ 0.25Vrms
- Test condition (10uH - 6.8mH) 1kHz @ 0.25Vrms
- Test equipment Quadtech 1750 LCR Meter

#### 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

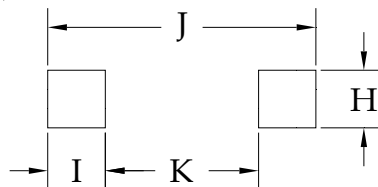
#### Dimensions in millimeters

|               |                 |
|---------------|-----------------|
| Length A      | $3.85 \pm 0.30$ |
| Width B       | $3.85 \pm 0.30$ |
| Height C      | 3.0 max         |
| D             | $4.4 \pm 0.4$   |
| Term width E  | 1.6 ref         |
| Term length F | 0.5 ref         |



#### Suggested PCB land pattern

H = 1.9  
I = 0.8  
J = 4.6  
K = 3.0



#### 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.

#### SPECIFICATIONS

| Part Number  | L(uH) | Tol % $\pm$ | DCR (ohms) max | Rated Current (A) (Note 1) |
|--------------|-------|-------------|----------------|----------------------------|
| SDA4430-1R0M | 1.0   | 20          | 0.009          | 1.90                       |
| SDA4430-1R2M | 1.2   | 20          | 0.010          | 1.75                       |
| SDA4430-1R5M | 1.5   | 20          | 0.013          | 1.45                       |
| SDA4430-2R0M | 2.0   | 20          | 0.016          | 1.25                       |
| SDA4430-2R2M | 2.2   | 20          | 0.017          | 1.15                       |
| SDA4430-2R5M | 2.5   | 20          | 0.018          | 1.05                       |
| SDA4430-2R7M | 2.7   | 20          | 0.020          | 1.00                       |
| SDA4430-3R3M | 3.3   | 20          | 0.024          | 0.96                       |
| SDA4430-3R5M | 3.5   | 20          | 0.025          | 0.95                       |
| SDA4430-3R9M | 3.9   | 20          | 0.033          | 0.87                       |
| SDA4430-4R7M | 4.7   | 20          | 0.039          | 0.78                       |
| SDA4430-5R6M | 5.6   | 20          | 0.044          | 0.74                       |
| SDA4430-6R8M | 6.8   | 20          | 0.051          | 0.68                       |
| SDA4430-8R2M | 8.2   | 20          | 0.065          | 0.57                       |
| SDA4430-100M | 10    | 20          | 0.092          | 0.43                       |
| SDA4430-120M | 12    | 20          | 0.100          | 0.38                       |
| SDA4430-150M | 15    | 20          | 0.113          | 0.33                       |
| SDA4430-180M | 18    | 20          | 0.125          | 0.30                       |
| SDA4430-220M | 22    | 20          | 0.146          | 0.28                       |
| SDA4430-270M | 27    | 20          | 0.176          | 0.26                       |
| SDA4430-330M | 33    | 20          | 0.214          | 0.23                       |
| SDA4430-390M | 39    | 20          | 0.225          | 0.21                       |
| SDA4430-470M | 47    | 20          | 0.304          | 0.19                       |
| SDA4430-560M | 56    | 20          | 0.324          | 0.17                       |
| SDA4430-680M | 68    | 20          | 0.472          | 0.156                      |
| SDA4430-820M | 82    | 20          | 0.539          | 0.142                      |
| SDA4430-101M | 100   | 20          | 0.608          | 0.128                      |
| SDA4430-121M | 120   | 20          | 0.757          | 0.116                      |
| SDA4430-151M | 150   | 20          | 0.882          | 0.106                      |
| SDA4430-181M | 180   | 20          | 1.13           | 0.095                      |
| SDA4430-221M | 220   | 20          | 1.27           | 0.087                      |
| SDA4430-271M | 270   | 20          | 1.57           | 0.080                      |
| SDA4430-331M | 330   | 20          | 1.93           | 0.078                      |
| SDA4430-391M | 390   | 20          | 2.36           | 0.073                      |
| SDA4430-471M | 470   | 20          | 2.77           | 0.068                      |
| SDA4430-561M | 560   | 20          | 3.52           | 0.065                      |
| SDA4430-681M | 680   | 20          | 4.25           | 0.056                      |
| SDA4430-821M | 820   | 20          | 4.83           | 0.050                      |
| SDA4430-102M | 1000  | 20          | 6.26           | 0.047                      |
| SDA4430-122M | 1200  | 20          | 7.86           | 0.043                      |
| SDA4430-152M | 1500  | 20          | 9.98           | 0.039                      |
| SDA4430-182M | 1800  | 20          | 12.17          | 0.036                      |
| SDA4430-272M | 2700  | 20          | 16.12          | 0.029                      |
| SDA4430-332M | 3300  | 20          | 22.04          | 0.026                      |
| SDA4430-392M | 3900  | 20          | 27.50          | 0.022                      |
| SDA4430-472M | 4700  | 20          | 30.80          | 0.020                      |
| SDA4430-562M | 5600  | 20          | 35.94          | 0.019                      |
| SDA4430-682M | 6800  | 20          | 44.01          | 0.017                      |