

New Product

SURFACE MOUNT SHIELDED POWER INDUCTOR SERIES SDB8450

FEATURES

- RoHS compliant
- High current handling capacity in a shielded package
- Easy to use in any design
- Ideal for use in laptops, communication systems and MP3 players

ELECTRICAL SPECIFICATIONS

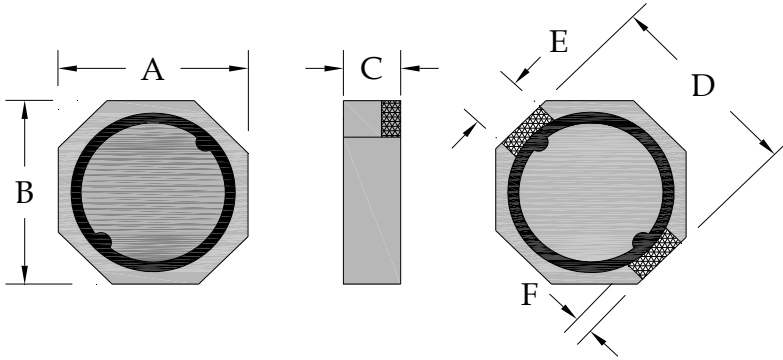
- Inductance range 1uH to 47mH
- Test condition (1uH - 8.2uH) 100kHz @ 0.25Vrms
- Test condition (10uH - 47mH) 1kHz @ 0.25Vrms
- Test equipment Quadtech 1750 LCR Meter

PHYSICAL SPECIFICATIONS

- Operating temp. -25°C to +105°C
- Core Ferrite
- Packaging T & R 350 or 1500 pieces per reel
- Tape & reel spec. Tape 12 mm embossed carrier
- Reel 178 or 330 mm dia

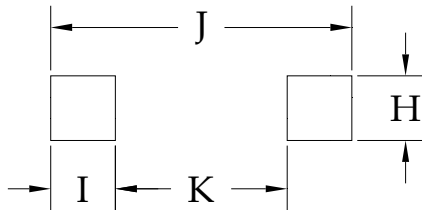
Dimensions in millimeters

- Length A 8.3 max
- Width B 8.3 max
- Height C 4.5 max
- D 8.9 ± 0.3
- Term width E 2.5 ref
- Term length F 0.8 ref



Suggested PCB land pattern

- H = 2.8
- I = 1.7
- J = 9.5
- K = 6.1



Notes:

1. Based on ΔL of 30% max or ΔT 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)
SDB8450-1R0M	1.0	20	0.010	8.71
SDB8450-1R5M	1.5	20	0.012	7.78
SDB8450-2R2M	2.2	20	0.015	6.15
SDB8450-3R0M	3.0	20	0.016	5.45
SDB8450-3R3M	3.3	20	0.017	5.10
SDB8450-3R9M	3.9	20	0.019	5.00
SDB8450-4R7M	4.7	20	0.022	4.60
SDB8450-5R6M	5.6	20	0.024	4.30
SDB8450-6R8M	6.8	20	0.025	4.20
SDB8450-8R2M	8.2	20	0.031	3.70
SDB8450-100M	10	20	0.036	3.60
SDB8450-120M	12	20	0.046	2.70
SDB8450-150M	15	20	0.053	2.60
SDB8450-180M	18	20	0.073	2.15
SDB8450-220M	22	20	0.075	2.10
SDB8450-270M	27	20	0.110	1.70
SDB8450-330M	33	20	0.125	1.60
SDB8450-390M	39	20	0.14	1.50
SDB8450-470M	47	20	0.15	1.40
SDB8450-560M	56	20	0.21	1.20
SDB8450-680M	68	20	0.23	1.15
SDB8450-820M	82	20	0.28	1.03
SDB8450-101M	100	20	0.36	0.94
SDB8450-121M	120	20	0.44	0.86
SDB8450-151M	150	20	0.49	0.78
SDB8450-181M	180	20	0.60	0.72
SDB8450-221M	220	20	0.76	0.62
SDB8450-271M	270	20	0.87	0.56
SDB8450-331M	330	20	1.05	0.52
SDB8450-391M	390	20	1.22	0.47
SDB8450-471M	470	20	1.53	0.44
SDB8450-561M	560	20	1.86	0.41
SDB8450-681M	680	20	2.10	0.37
SDB8450-821M	820	20	2.61	0.33
SDB8450-102M	1000	20	3.34	0.30
SDB8450-122M	1200	20	3.74	0.28
SDB8450-152M	1500	20	4.92	0.25
SDB8450-222M	2200	20	7.89	0.19
SDB8450-272M	2700	20	8.96	0.17
SDB8450-332M	3300	20	10.0	0.16
SDB8450-392M	3900	20	12.3	0.15
SDB8450-472M	4700	20	14.8	0.12
SDB8450-562M	5600	20	17.1	0.11
SDB8450-682M	6800	20	23.3	0.10
SDB8450-822M	8200	20	28.4	0.096
SDB8450-103M	10000	20	35.8	0.084
SDB8450-123M	12000	20	44.8	0.082
SDB8450-153M	15000	20	50.8	0.074
SDB8450-183M	18000	20	65.9	0.068
SDB8450-223M	22000	20	85.4	0.064
SDB8450-273M	27000	20	112.4	0.060
SDB8450-333M	33000	20	146.0	0.050
SDB8450-393M	39000	20	150.0	0.047
SDB8450-473M	47000	20	198.0	0.042