

1. Features of SLA5038A Series:

- Ferrite based SMD inductor with lower core loss.
- Inductance range: 150.0 nH to 270.0 nH , custom values are welcomed.
- High current output chokes, up to 102.0 Amp with approx. 20% roll off.
- Low profile 9.50 mm Max. height.
- 12.50 x 8.70/8.90 mm Foot Print.
- Ideal for Buck Converter, VRM & High Density Board Design.
- Operating frequency of up to 1.0MHz.
- Operating temperature range of -55° C to + 130° C.
- RoHS & HF compliant.
- T & R Qty's: 400pcs, 13" Reel.



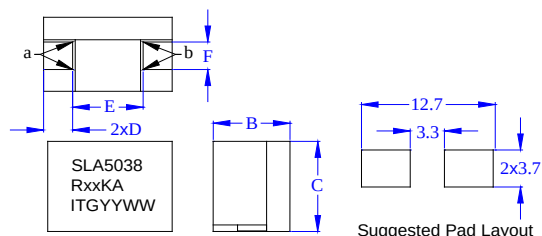
2. Electrical Characteristics of SLA5038A Series:

ITG Part Number	OCL ¹ (nH) ± 10%	L @ Isat1 ² (nH) Typ. @25°C	DCR ³ (mΩ) ± 5.0%	Isat1 ⁴ (A) @25°C	Isat2 ⁴ (A) @75°C	Isat3 ⁴ (A) @100°C	Irms ⁵ (A) @25°C	Dim. B Max.
SLA5038A-R15KHF	150.00	120.00	0.37	102.00	95.00	90.00	41.00	8.90
SLA5038A-R18KHF	180.00	144.00	0.37	87.00	82.00	78.00	41.00	8.90
SLA5038A-R22KHF	220.00	176.00	0.37	76.00	72.00	67.00	41.00	8.70
SLA5038A-R27KHF	270.00	216.00	0.37	72.00	62.00	58.00	41.00	8.70

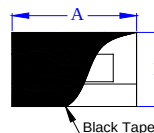
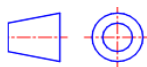
3. Mechanical Dimension of SLA5038A Series

(Unit:mm):

A Max.	B Max.	C Max.	D ± 0.30	E (Nom.)	F ± 0.20
12.50	See above table	9.50	3.00	5.80	2.80



First Angle Projection:



Part Marking:
SLA5038: SLA5038 is part size
RxxKA: Rxx is inductance value in uH(R:decimal point),
K is tolerance, A is special code.
ITGYWW: ITG logo, YYYW=date code

Notes:

1. Open Circuit Inductance (OCL) test condition: 100KHz, 1.0Vrms, 0A DC at 25°C.
2. L @ Isat and L @ Irms Test condition: 100KHz, 1.0Vrm (Ta=25°C).
3. The nominal DCR is measured from point "a" to point "b" as shown above in the mechanical drawing (Ta=25°C).
4. Isat1, Isat2 & Isat3: DC current that will cause inductance to drop approximately by 20%.
5. Irms: DC current for an approximate temperature rise of 40°C without core loss.
6. Derating is necessary for AC currents. Verify and check PCB pad layout, trace thickness, width, air-flow and proximity of other heat generating components as it will have an effect on the temperature rise.
7. It is recommended that the part temperature should not exceed 130° C under worst operating conditions.

4. Inductance Characteristics of SLA5038A Series (Inductance vs Current):

