



SC4013 and SC4025



1. Features of SC4018 Series :

- 0.40" Package SMD Power Inductor
- Ideal for DC to DC converter & High density board design
- Operating frequency of up to 3 Mhz
- Low leakage flux
- Low profile 3.6 – 6.35mm maximum height
- Suitable for IR reflow and wave solder process
- Tight DCR tolerance features for current sensing application
- RoHS and HF Compliant.
- T & R Qty: 800pcs, 13" Reel



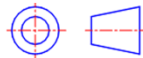
2. Electrical Characteristics of SC4013 and SC4025 Series:

ITG Part Number	L $\pm 20\%$ (μH)	DCR $\pm 7\%$ ($\text{m}\Omega$)	I _{rms} (A)	L @ I _{rms} (μH)	I _{max} (A)	L @ I _{max} (μH)	C (mm)
SC4013-R75MHF	0.75	3.25	20.0	0.63	25.0	0.58	3.60
SC4025-R47MHF	0.47	0.75	30.0	0.38	45.0	0.33	6.35

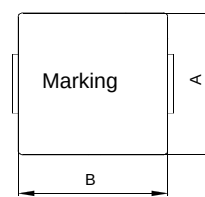
3. Mechanical Dimensions (unit:mm):

Part Number	A ± 0.4	B ± 0.4	C Max	D Max	E Ref.	F Ref.	G Ref.
SC40XX	10.0	10.0	See table above	11.0	5.60	2.00	2.35

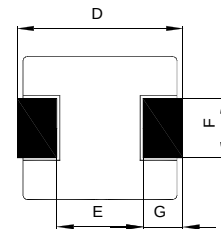
Third Angle Projection:



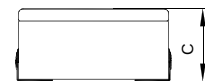
Part Marking:
Rxx x: xx is inductance value in μH (R:decimal point),
x is special code.
YYWW: Date Code



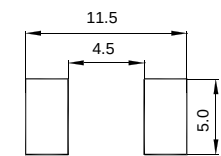
Top view



Bottom View



Side View



Suggest PCB Layout

Test Condition:

1. Test condition: 300KHz, 0.25Vrms, 0 Amp at 25°C.
2. I_{rms}: DC current rating at 40°C temperature raise (typical)
3. I_{max}: DC current rating with maximum of 100°C temperature rise
4. L@I_{rms} & L@I_{max} are measured at 300Khz, 0.25V.
5. DCR tolerance of $\pm 5\%$ is available upon request
6. Operating temperature -40°C ~ 150°C

● New York 1 914 347 2474 ● Taipei 886 2 2698 8669 ● Kaohsiung 886 7 350 2275
● Tokyo 81 568 85 2830 ● Shenzhen 86 755 8418 6263 ● Shanghai 86 21 5424 5141 ● Hong Kong 852 9688 9767
● sales@ITG-Electronics.com ● www.ITG-Electronics.com Revision L: February 8, 2016

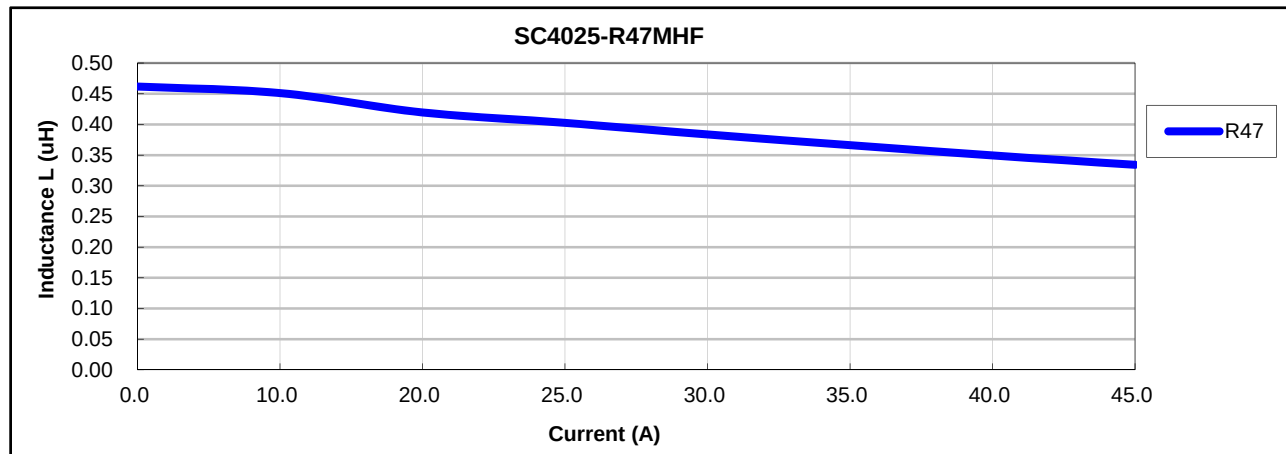
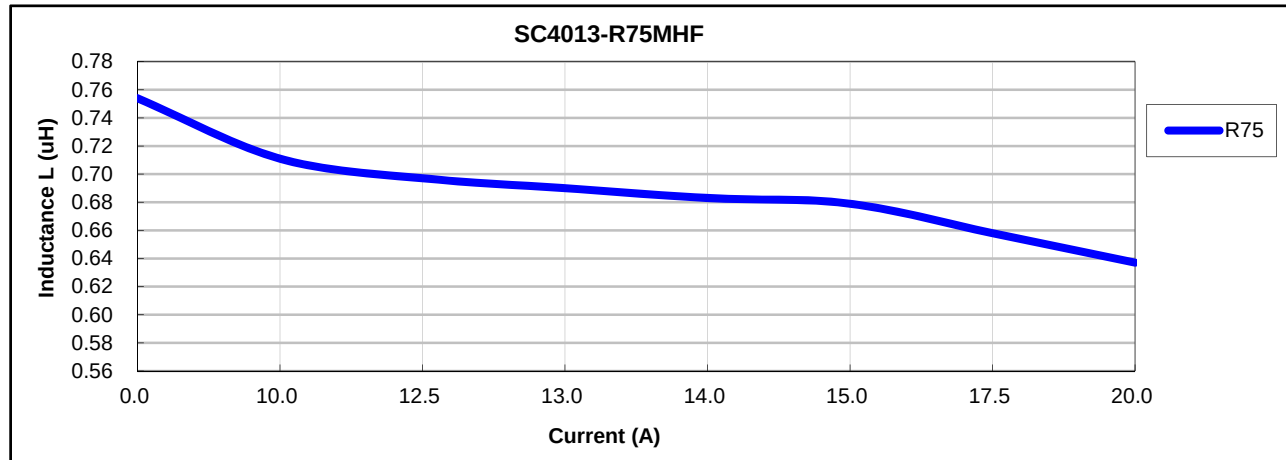
*Due to continuous product improvement, all specifications are subject to change without prior notice. Kindly contact an ITG field application engineer or a sales representative prior to purchase.



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4. SC4013 and SC4025 DC Bias Curve



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