



FEATURES

- Low-profile surface-mount design
- Inductance Range from 80nH to 200nH
- Rated current up to 57A_{pk}
- Materials meet UL94V-0
- Custom inductance values available
- RoHS compliant
- J-STD-020 D.1 reflow

PRODUCT OVERVIEW

The 3000A series are a range of high-current, surface-mount bead inductors, suited to a variety of applications. The products are designed for noise suppression in high-frequency, high-current switching power supplies, DC-DC converters, DC-AC inverters and VRMs.

SELECTION GUIDE

Order Code	Inductance (1MHz, 0.1V)		I _{DC} ³	I _{SAT} (Typ.) ⁴		DC Resistance	
	±20%	Typ. @ I _{DC}		25°C	100°C	Typ.	Max.
	nH	nH	A	A	A	mΩ	mΩ
30800AC	80	82	37	57	47	0.19	0.35
30101AC	97	105	36	48	41	0.20	0.35
30151AC	145	120	29	33	29	0.19	0.35
30201AC	191	162	22	24	22	0.21	0.35

ABSOLUTE MAXIMUM RATINGS

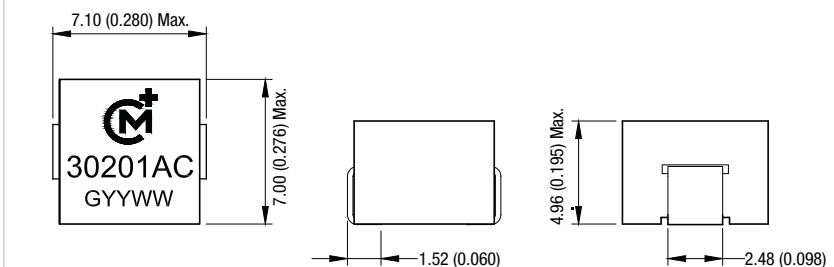
Operating temperature range	-40°C to +130°C
Storage temperature range	-40°C to +155°C

SOLDERING INFORMATION¹

Peak reflow solder temperature	250°C
Pin finish	SAC305
Moisture sensitivity level ²	1

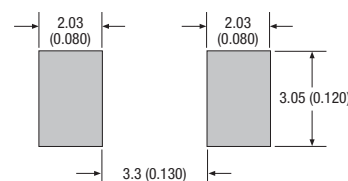
Mechanical Dimensions

Mechanical Dimensions



Weight Typ. = 0.94g

Recommended Pad Layout



Unless otherwise stated, all dimensions in mm (inches) ± 0.25 (0.010).

Specifications typical at T_a = 25°C

¹ For further information, please visit www.murata-ps.com/rohs

² Representative samples of the product were subjected to the conditioning described in IPC/JEDEC J-STD-020D and passed electrical testing, package coplanarity and visual inspection which revealed no external cracks or changes in package body flatness.

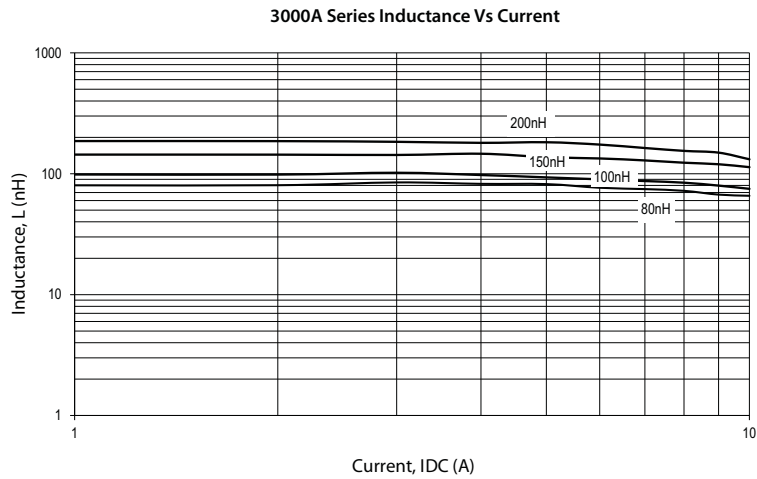
³ I_{DC} is the value at which the inductance falls to 80% of its nominal value or when its temperature reaches 40°C, whichever ever is sooner.

⁴ I_{SAT} is the value at which the inductance falls to 80% of its nominal value.

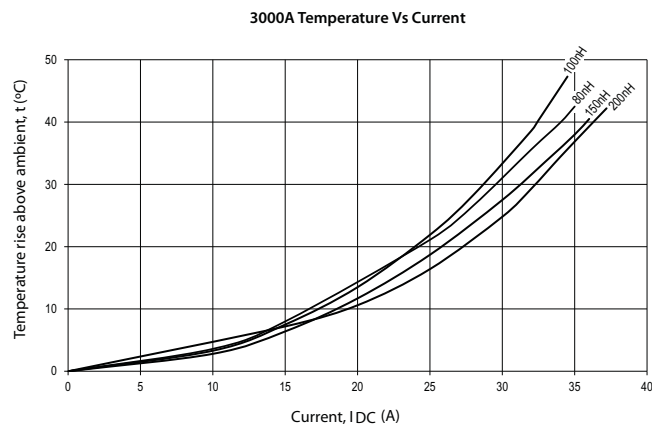


For full details go to
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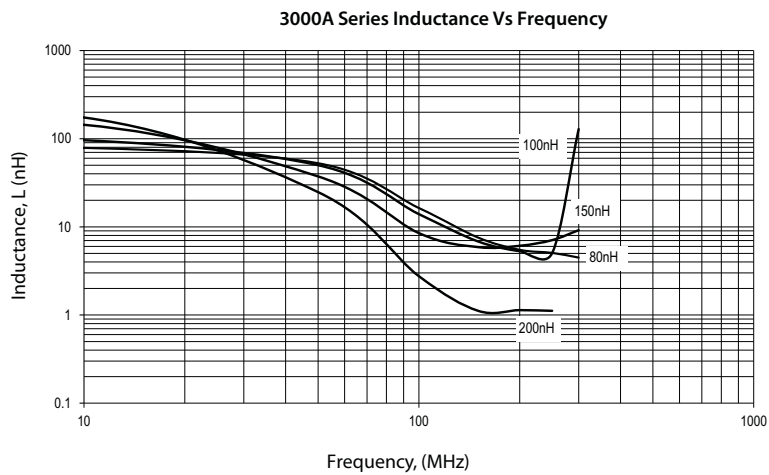
INDUCTANCE Vs CURRENT



TEMPERATURE Vs CURRENT

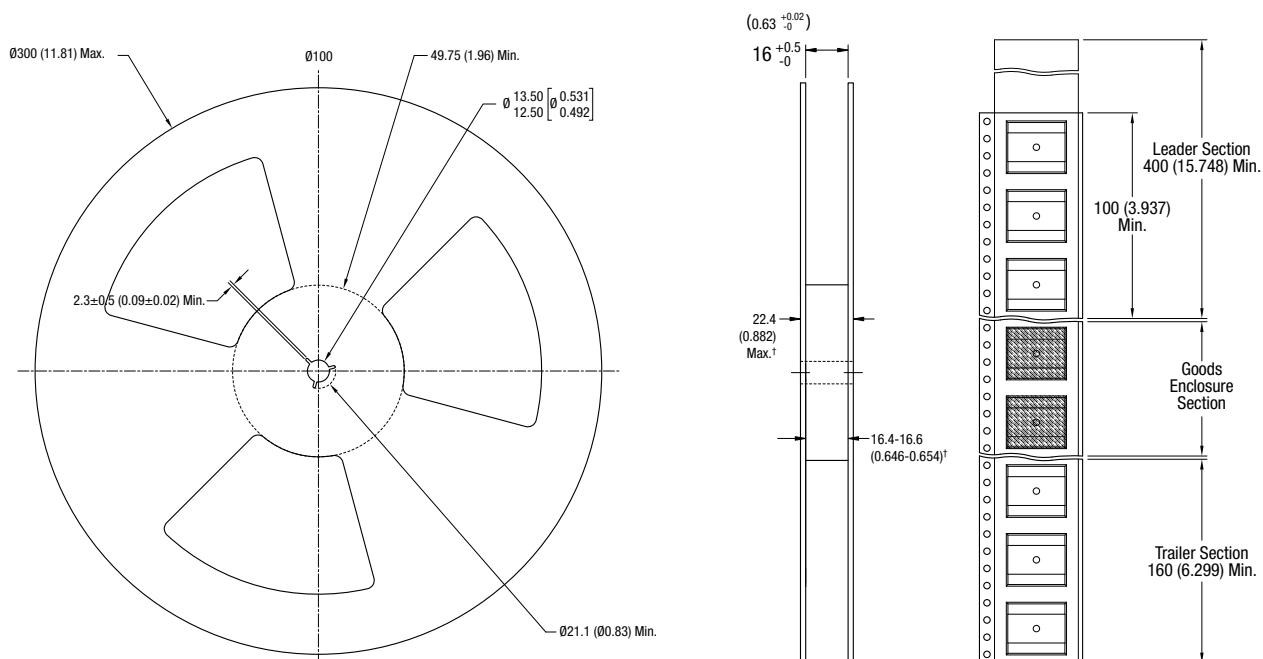


INDUCTANCE Vs FREQUENCY

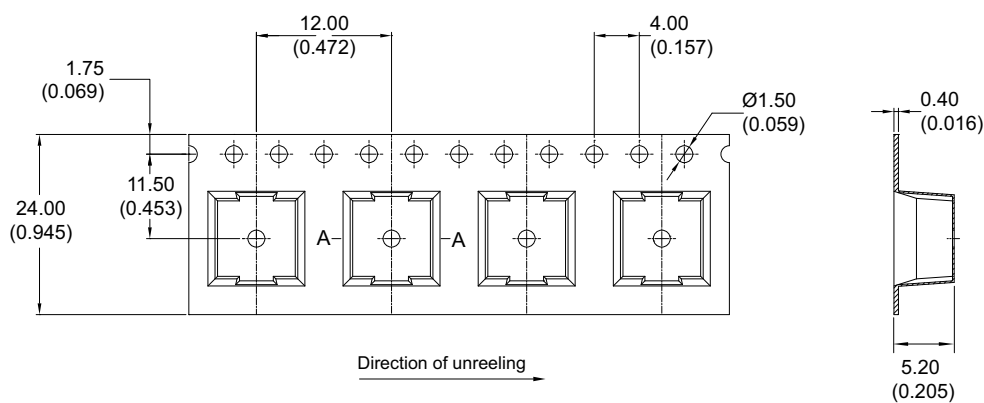


PACKAGE SPECIFICATIONS

Reel Dimensions



Reel Dimensions



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ISO 9001 and 14001 REGISTERED

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