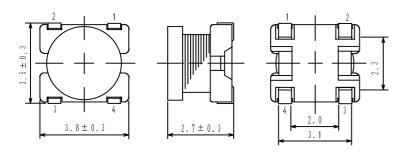
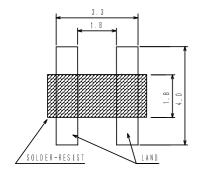


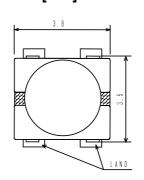


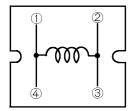
### Dimension - [mm]



#### Land pattern and Schematics - [mm]







#### **Description**

- Ferrite drum core construction.
- Magnetically unshielded.
- L × W × H: 4.1 × 3.8 × 3.0 mm Max.
- Product weight: 85mg(Ref.)
- Moisture Sensitivity Level: 1
- RoHS compliance.
- Halogen Free available.

#### **Environmental Data**

- Operating temperature range: -40°C ~+100°C (including coil's self temperature rise)
- Storage temperature range: -40°C~+100°C
- Solder reflow temperature: 260 °C peak.

#### **Packaging**

- · Carrier tape and reel packaging
- 11.8"diameter reel
- 2000pcs per reel

#### **Applications**

 Ideally used in A/V equipment, LCD TV, DSC/DVC, Game Machine, DVC, HDD, Notebook PC, etc as DC-DC converter inductors.

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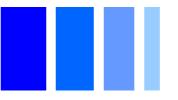
#### **Electrical Characteristics**

Part Name	Stamp	Inductance $(\mu \ {\rm H})$ [ within ] $\stackrel{*}{\times} 1$	D.C.R. (m $\Omega$ ) [ Max. ] at 20 $^\circ \! \mathbb{C}$	Rated Current (mA) ※ 2
CR32NP-1R0MC	<u>A</u>	1.0 ± 20%	72	2100
CR32NP-1R2MC	<u>B</u>	1.2 ± 20%	78	1700
CR32NP-1R5MC	<u>C</u>	1.5 ± 20%	85	1500
CR32NP-1R8MC	<u>D</u>	1.8 ± 20%	91	1320
CR32NP-2R2MC	<u>E</u>	2.2 ± 20%	104	1280
CR32NP-2R7MC	<u>F</u>	2.7 ± 20%	111	1240
CR32NP-3R3MC	<u>G</u>	3.3 ± 20%	137	1180
CR32NP-3R9MC	<u>H</u>	3.9 ± 20%	143	1150
CR32NP-4R7MC	L	4.7 ± 20%	170	1040
CR32NP-5R6MC	<u>K</u>	5.6 ± 20%	176	1000
CR32NP-6R8MC	L	6.8 ± 20%	202	880
CR32NP-7R4MC	<u>M</u>	7.4 $\pm$ 20%	215	840
CR32NP-8R2MC	<u>N</u>	8.2 $\pm$ 20%	228	780
CR32NP-100KC	A	10 ± 10%	230	760
CR32NP-120KC	В	12 $\pm$ 10%	270	685
CR32NP-150KC	С	15 $\pm$ 10%	310	635
CR32NP-180KC	D	18 ± 10%	410	525
CR32NP-220KC	Е	<b>22</b> ± 10%	470	500
CR32NP-270KC	F	27 ± 10%	660	405
CR32NP-330KC	G	33 $\pm$ 10%	760	380
CR32NP-390KC	Н	39 ± 10%	850	355
CR32NP-470KC	J	47 ± 10%	970	330
CR32NP-560KC	K	56 ± 10%	1250	290
CR32NP-680KC	L	68 ± 10%	1450	275
CR32NP-820KC	M	82 ± 10%	1850	235
CR32NP-101KC	N	100 $\pm$ 10%	2200	220
CR32NP-121KC	Р	120 ± 10%	2900	185
CR32NP-151KC	Q	150 $\pm$ 10%	3400	170
CR32NP-181KC	R	180 ± 10%	3900	165
CR32NP-221KC	S	220 $\pm$ 10%	4500	155
CR32NP-271KC	Т	270 $\pm$ 10%	6000	135
CR32NP-331KC	U	330 $\pm$ 10%	7000	125
CR32NP-391KC	V	390 ± 10%	7800	115

<sup>%</sup> 1.Inductance measuring frequency:  $~1.0\,\mu$  H  $\sim$  8.2  $\mu$  H ~ ; at 7.96 MHz ~ 10  $\mu$  H  $\sim$  390  $\mu$  H ~ ; at 100 kHz

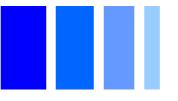
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<sup>&</sup>amp;2. Rated current: The D.C. current at which the inductance decreases to 90% of it's initial value or when  $\triangle$ t=40 $^{\circ}$ C, whichever is lower (Ta=20 $^{\circ}$ C).

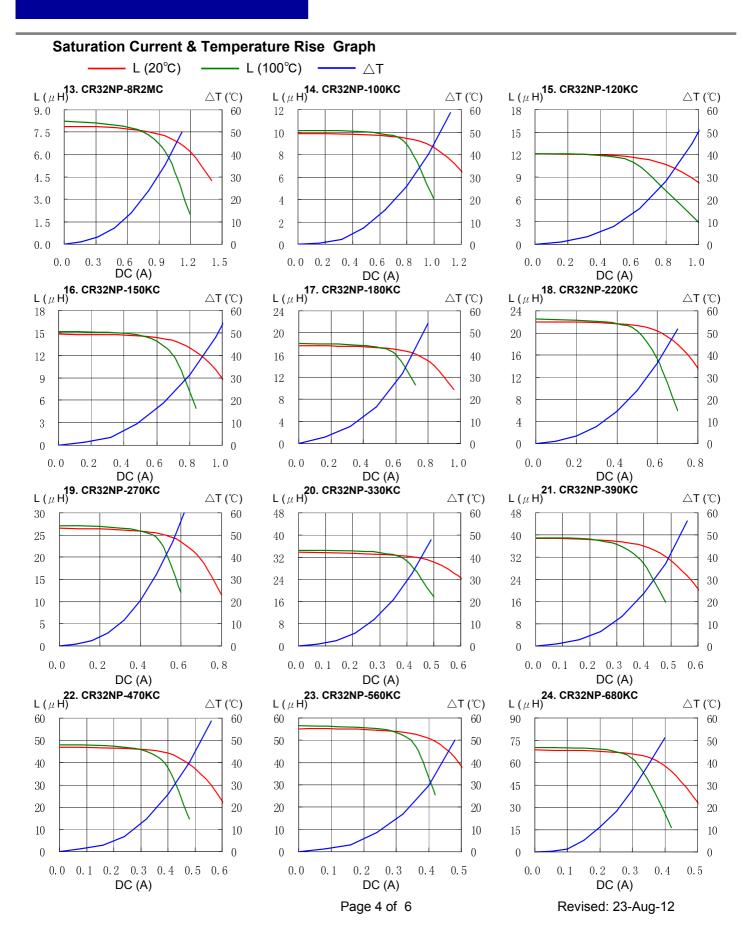


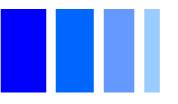


#### **Saturation Current & Temperature Rise Graph** - L (20°C) — L (100°C) 1. CR32NP-1R0MC L (μH) 2. CR32NP-1R2MC L (μH)<sup>3.</sup> CR32NP-1R5MC $\triangle T (\mathcal{C})$ $\triangle T$ (°C) $\triangle T$ (°C) 1. 2 60 1.2 60 1.8 60 1.0 50 1.0 50 1.5 50 0.8 0.8 40 40 1.2 400.6 30 0.6 30 0.9 30 20 0.4 20 0.4 0.6 20 0.20.2 10 0.3 10 10 0.0 0.0 0 0.0 $0. \ 0 \ \ 0.6 \ \ 1. \ 2 \ \ 1. \ 8 \ \ 2. \ 4 \ \ 3. \ 0 \ \ 3. \ 6$ 0.01.6 2.4 3.2 0.0 0.5 1.0 1.5 2.0 2.5 3.0 DC (A) DC (A) DC (A) 4. CR32NP-1R8MC L (μH) 6. CR32NP-2R7MC L (μ H) 5. CR32NP-2R2MC L (μ H) $\triangle T$ (°C) $\triangle T$ (°C) $\triangle T$ (°C) 3.0 2.4 2.4 60 60 60 2.5 2.0 50 50 2.0 50 40 2.0 40 1.6 1.6 40 30 30 1 2 1.5 1. 2 30 0.8 20 0.8 20 1.0 20 10 0.4 10 0.5 10 0.4 0.0 0.5 1.0 1.5 2.0 2.5 3.0 2.5 $0. \ 0 \ 0.4 \ 0.8 \ 1.2 \ 1.6 \ 2.0 \ 2.4$ 0.5 1.0 1.5 2.0 DC (A) DC (A) DC (A) 7. CR32NP-3R3MC 8. CR32NP-3R9MC L (μ H) 9. CR32NP-4R7MC L (μ H) $\triangle T$ (°C) $\triangle T$ (°C) $\triangle T$ (°C) 3.6 60 4.8 60 6 60 4.0 3.0 50 50 5 50 2.4 40 3.2 40 4 40 1.8 30 2.4 30 3 30 1.2 20 20 1.6 2 20 0.6 0.8 10 10 0.0 0.0 0.0 0.4 0.8 1.2 1.6 2.0 0.0 0.4 0.8 1.2 1.6 2.0 0.0 0.3 0.6 0.9 1.2 1.5 1.8 DC (A) DC (A) DC (A) 12. CR32NP-7R4MC L (μH) 11. CR32NP-6R8MC L (μ H) **10. CR32NP-5R6MC** L (μ H) $\triangle T$ (°C) $\triangle T (\mathbb{C})$ $\triangle T (^{\circ}C)$ 6 60 9.0 60 9.0 60 5 7.5 50 7. 5 50 50 6.0 4 40 6.0 40 40 3 30 4.5 30 4.5 30 2 20 3.0 20 3.0 20 10 10 1 1.5 10 1.5 0 0 0.0 Ω 0.0Ω 0.0 0.3 0.6 0.9 1.2 1.5 0.0 0.3 0.6 0.9 1.2 1.5 0.0 0.3 0.6 0.9 1.2 DC (A) DC (A) DC (A) Page 3 of 6 Revised: 23-Aug-12

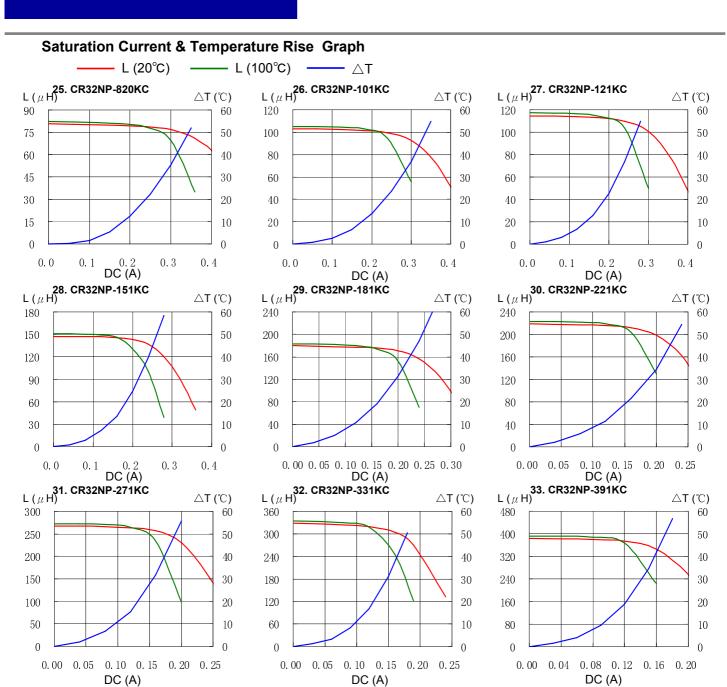










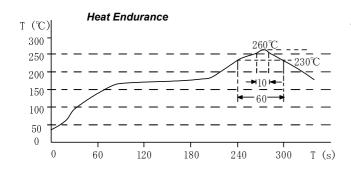


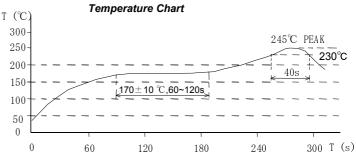
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#### **Solder Reflow Condition**





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Revised: 23-Aug-12