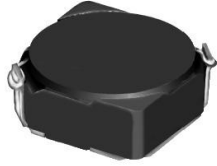




**THE DATASHEET OF  
CDRH6D28NP-3R0NC**



# SMD Power Inductor CDRH6D28



## Description

- Ferrite drum core construction.
- Magnetically shielded.
- L × W × H: 7.0 × 7.0 × 3.0 mm Max.
- Product weight: 0.44g(Ref.)
- Moisture Sensitivity Level: 1
- RoHS compliance.

## 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.

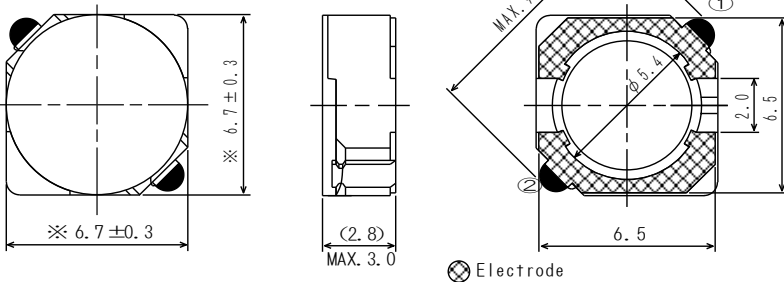
## Packaging

- Carrier tape and reel packaging
- 13" diameter reel
- 1500pcs per reel

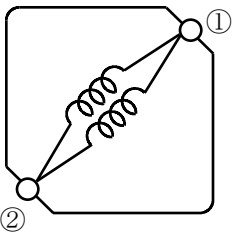
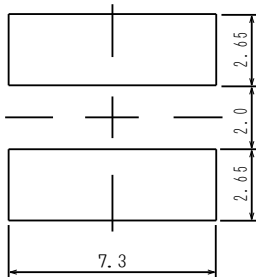
## Applications

- Ideally used in MP3, PDA, HDD, DSC/DVC, Notebook PC etc as DC-DC converter inductors.

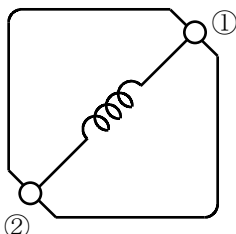
## Dimension - [mm]



## Land pattern and Schematics - [mm]



(3.0μH ~ 6.0μH)



(7.3μH ~ 100μH)

# SMD Power Inductor

## CDRH6D28



### Electrical Characteristics

Part Name	Stamp	Inductance ( $\mu\text{H}$ ) [within] ※1	D.C.R.( $\Omega$ ) Max. (Typ.) (at 20°C)	Rated Current (A) ※2
CDRH6D28NP-3R0NC	3R0	3.0 $\pm$ 30%	24m (18m)	3.00
CDRH6D28NP-3R9NC	3R9	3.9 $\pm$ 30%	27m (20m)	2.60
CDRH6D28NP-5R0NC	5R0	5.0 $\pm$ 30%	31m (23m)	2.40
CDRH6D28NP-6R0NC	6R0	6.0 $\pm$ 30%	35m (26m)	2.25
CDRH6D28NP-7R3NC	7R3	7.3 $\pm$ 30%	54m (40m)	2.10
CDRH6D28NP-8R6NC	8R6	8.6 $\pm$ 30%	58m (43m)	1.85
CDRH6D28NP-100NC	100	10 $\pm$ 30%	65m (48m)	1.70
CDRH6D28NP-120NC	120	12 $\pm$ 30%	70m (52m)	1.55
CDRH6D28NP-150NC	150	15 $\pm$ 30%	84m (62m)	1.40
CDRH6D28NP-180NC	180	18 $\pm$ 30%	95m (70m)	1.32
CDRH6D28NP-220NC	220	22 $\pm$ 30%	128m (95m)	1.20
CDRH6D28NP-270NC	270	27 $\pm$ 30%	142m(105m)	1.05
CDRH6D28NP-330NC	330	33 $\pm$ 30%	165m(122m)	0.97
CDRH6D28NP-390NC	390	39 $\pm$ 30%	210m(156m)	0.86
CDRH6D28NP-470NC	470	47 $\pm$ 30%	238m(176m)	0.80
CDRH6D28NP-560NC	560	56 $\pm$ 30%	277m(205m)	0.73
CDRH6D28NP-680NC	680	68 $\pm$ 30%	304m(225m)	0.65
CDRH6D28NP-820NC	820	82 $\pm$ 30%	390m(290m)	0.60
CDRH6D28NP-101NC	101	100 $\pm$ 30%	535m(397m)	0.54

※1. Inductance measuring condition: at 100kHz.

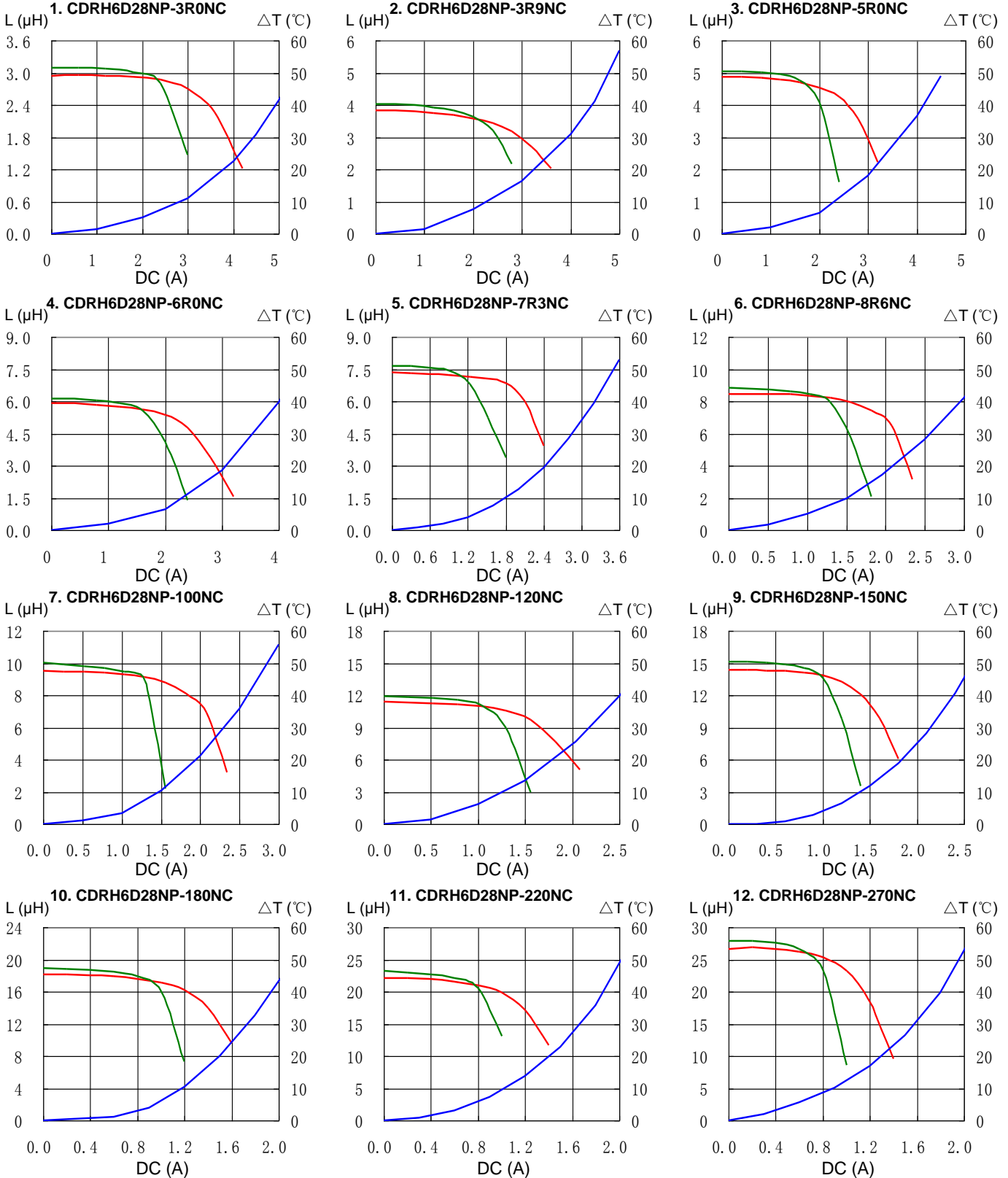
※2. Rated current: The DC current at which the inductance decreases to 65% of its nominal value or when  $\Delta t=30^\circ\text{C}$ , whichever is lower ( $T_a=20^\circ\text{C}$ ).

# SMD Power Inductor CDRH6D28



## Saturation Current & Temperature Rise Graph

— L (20°C) — L (105°C) —  $\Delta T$

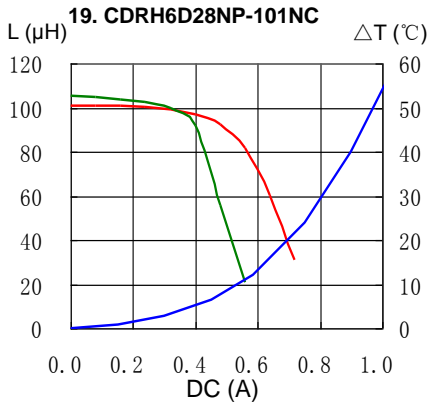
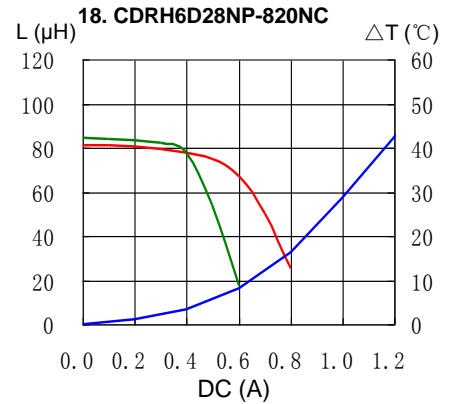
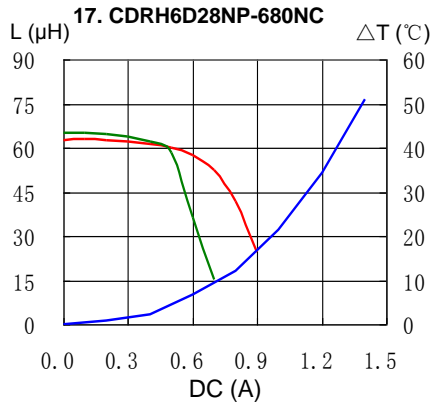
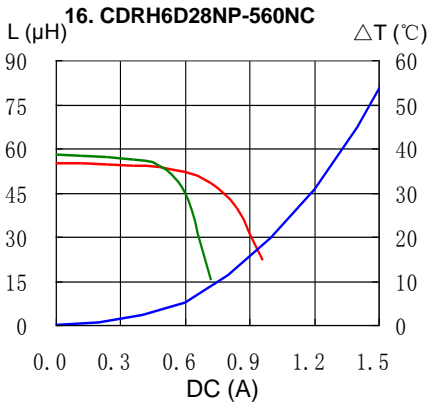
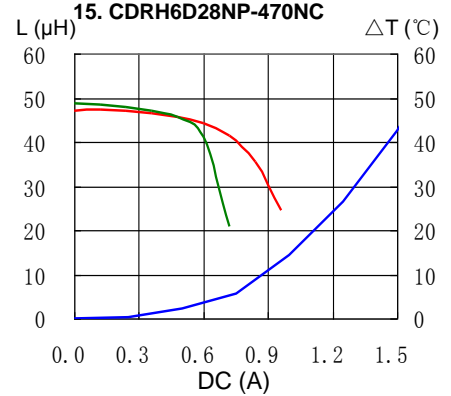
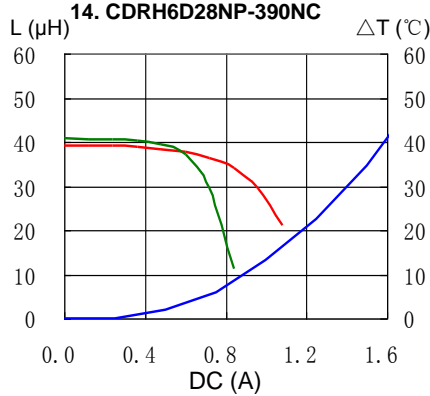
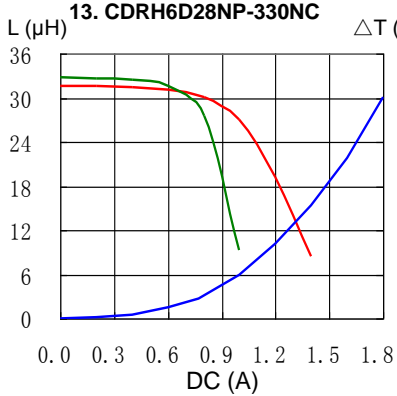


# SMD Power Inductor CDRH6D28



## Saturation Current & Temperature Rise Graph

— L (20°C) — L (105°C) —  $\Delta T$

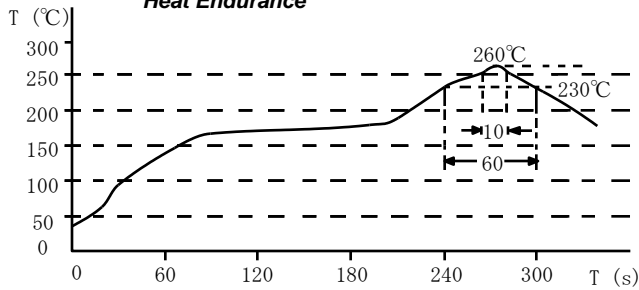


# SMD Power Inductor CDRH6D28

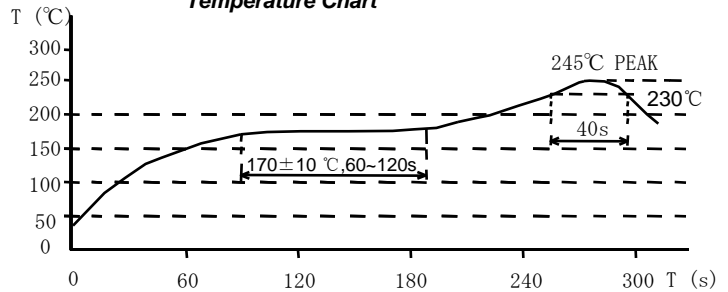


## Solder Reflow Condition

Heat Endurance



Temperature Chart



Please refer to the sales offices on our website - <http://www.sumida.com>

### Hong Kong

Tel.+852-2880-6781  
FAX.+852-2565-9600  
[sales@hk.sumida.com](mailto:sales@hk.sumida.com)

### Saitama(Japan)

Tel.+81-48-691-7300  
FAX.+81-48-691-7340  
[sales@jp.sumida.com](mailto:sales@jp.sumida.com)

### Chicago

Tel.+1-847-545-6700  
FAX. +1-847-545-6720  
[sales@us.sumida.com](mailto:sales@us.sumida.com)

### Shanghai

Tel.+86-21-5836-3299  
FAX.+86-21-5836-3266  
[shanghai.sales@cn.sumida.com](mailto:shanghai.sales@cn.sumida.com)

### Seoul

Tel.+82-2-6237-0777  
FAX.+82-2-6237-0778  
[sales@kr.sumida.com](mailto:sales@kr.sumida.com)

### Obernzell

Tel.+49-8591-937-0  
FAX. +49-8591-937-103  
[contact@eu.sumida.com](mailto:contact@eu.sumida.com)

### Shenzhen

Tel.+86-755-8291-0228  
FAX.+86-755-8291-0338  
[shenzhen.sales@cn.sumida.com](mailto:shenzhen.sales@cn.sumida.com)

### Singapore

Tel.+65-6296-3388  
FAX.+65-6841-4426  
[sales@sg.sumida.com](mailto:sales@sg.sumida.com)

### Neumarkt

Tel.+49-9181-4509-110  
FAX. +49-9181-4509-310  
[infocomp@eu.sumida.com](mailto:infocomp@eu.sumida.com)

### Taipei

Tel.+886-2-8751-2737  
FAX.+886-2-8751-2738  
[sales@tw.sumida.com](mailto:sales@tw.sumida.com)

### San Jose

Tel.+1-408-321-9660  
FAX.+1-408-321-9308  
[sales@us.sumida.com](mailto:sales@us.sumida.com)

## Looking for pricing, stock, or lifecycle information?

Click below to explore more details on WIN SOURCE:

- ⊖ [View CDRH6D28NP-3R0NC on WIN SOURCE](#)
- ⊖ [Sumida America Components Inc. Information](#)

## Optimize Your Supply Chain with WIN SOURCE Solutions

- ✓ Global Sourcing Solution
- ✓ Obsolete Management
- ✓ Cost Control Management
- ✓ Shortage Management
- ✓ Alternative Solution
- ✓ Excess Inventory Management