芯芒微电子

XINMANG MICROELECTRONICS

POWERHEN

Electronics

产品规格书

PR1590

贴片大电流功率电感

联系我们 / CONTACT

电话：0755-28088656

手机 / 微信：13823685284

地址：深圳市龙华新区观澜深粮汽车电子特色工业园A2栋3楼

样品申请 · 替代选型 · 批量报价，欢迎来函来电

HIGH CURRENT POWER INDUCTOR 大电流功率电感

■PR1590 Series

Features 特点

- Susing flat wire, and SMD type. 采用扁平线，贴片类型
- Low radiation noise by magnetically shielded construction
  闭合磁路封装，低辐射
- High current, Low resistance. 大电流，低电阻
- Operating temperature : -40℃~+125℃. 工作温度：-40℃~+125℃
- Tape and reel packaging: -40°C to +80°C 卷带包装：－40° C 至 +80° C
- Resistance to soldering heat Max three 40 second reflows at +260°C, parts cooled to room temperature between cycles
  耐焊接热 最多三个 40 秒回流 +260° C，部件在循环之间冷却至室温
- Moisture Sensitivity Level (MSL) 1 (unlimited floor life at <30°C / 85% relative humidity)
  湿气敏感度等级 (MSL) 1（在 <30° C/ 85% 相对湿度时的无限制）



Applications 应用

- high efficiency DC/DC converters. 高效 DC/DC 转换器
- Single and polyphase buck converters. 单相、多相降压转换器
- Filter for audio applications. 音频滤波应用
- Optimized for high current boost applications. 大电流升压应用优化

Electrical characteristics 电气特性

Part number 料号	Inductance① 电感量 μH±20%	DCR② 直流电阻 mΩ Typ	DCR② 直流电阻 mΩ Max	SRF③ 自谐频率 MHz typical	Isat④ 饱和电流 A typical 10% drop	Isat④ 饱和电流 A typical 20% drop	Isat④ 饱和电流 A typical 30% drop	Irms⑤ 温升电流 A typical 20℃rise	Irms⑤ 温升电流 A typical 40℃rise
PR1590-301ML	0.3	0.66	0.75	200	53	56	57	23	32
PR1590-501ML	0.5	0.87	0.94	200	39	43	44	18	27
PR1590-601ML	0.6	0.87	0.94	182	33	35	36	18	27
PR1590-681ML	0.68	0.87	0.94	165	30	32	33	18	27
PR1590-801ML	0.8	0.87	0.94	123	25	26	27	18	27
PR1590-901ML	0.9	1.05	1.15	160	27	28	29	16	22
PR1590-102ML	1.0	0.87	0.94	115	20	22	23	18	27
PR1590-122ML	1.2	1.05	1.15	90	20	22	23	16	22
PR1590-152ML	1.5	1.05	1.15	73	17	18	19	16	22

Remark

①Inductance is measured with a LCR meter Agilent 4284A or equivalent.
Test frequency at 100kHz 0.1V

②DC resistance is measured with keithley 580 Milliohm Meter , or equivalent.
Reference ambient temperature 25°C

③SRF measured using an Agilent 4395A network analyzer and an Agilent 16193A test fixture.

④DC current at 25°C that causes the specified inductance drop from its value without current.

⑤Current that causes the specified temperature rise from 25°C ambient. This information is for reference only and does not represent absolute maximum ratings.

⑥Electrical specifications at 25°C

备注

①电感量测试采用 Agilent 4284A 数字电桥或同等仪器；
测试频率 100KHz 0.1V

②直流电阻测试采用 keithley 580 毫欧表或同等仪器；环境温度 25° C

③SRF 使用 Agilent 4395A 网络分析仪和 Agilent 16193A 测试夹具测量。

④直流电流在 25° C，加载导致指定电感从没有电流的值下降。

⑤导致指定温度从 25° C 环境温度上升的电流。 此信息仅供参考，不代表绝对最大额定值。

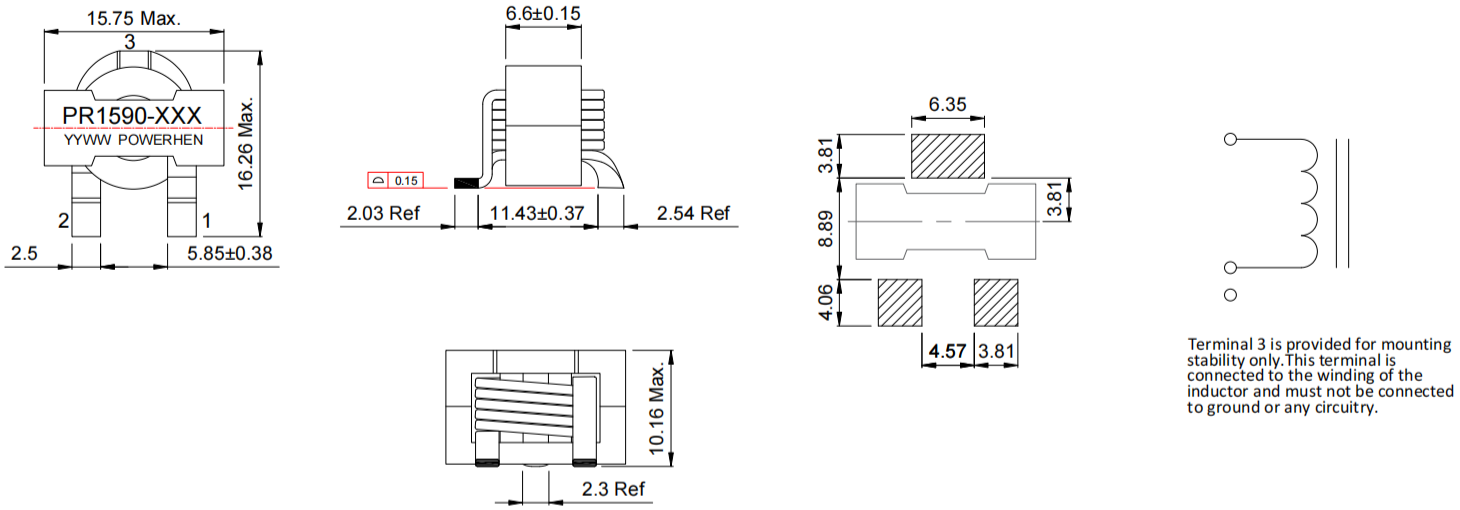
⑥25° C 时的电气规格

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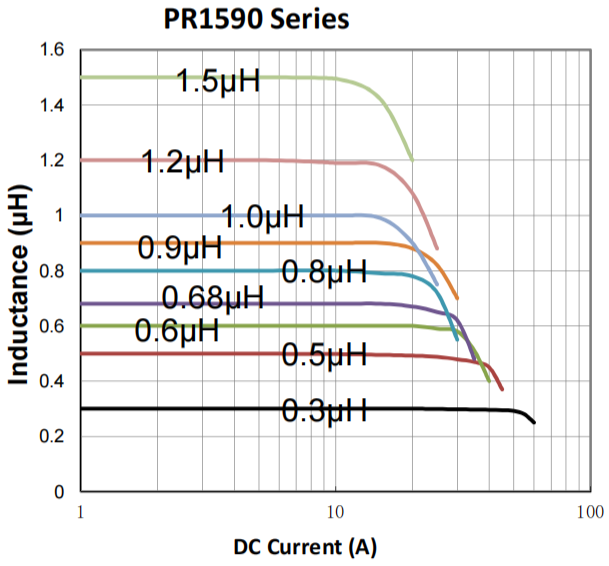
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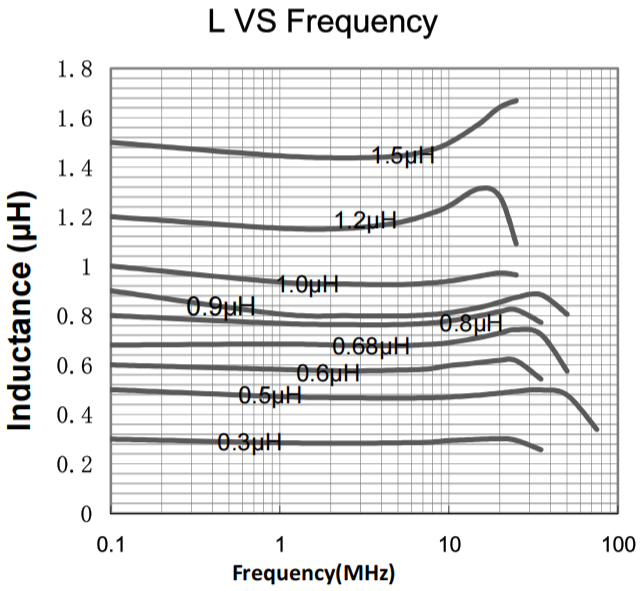
Tel:0755-23570708 E-Mail:sales@powerhen.com

Dimensions 结构尺寸



■ Electrical Characteristic Curve 电气性能曲线





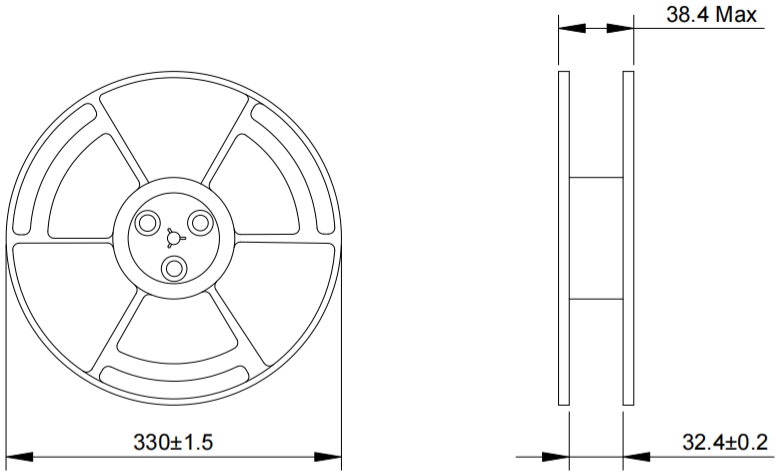
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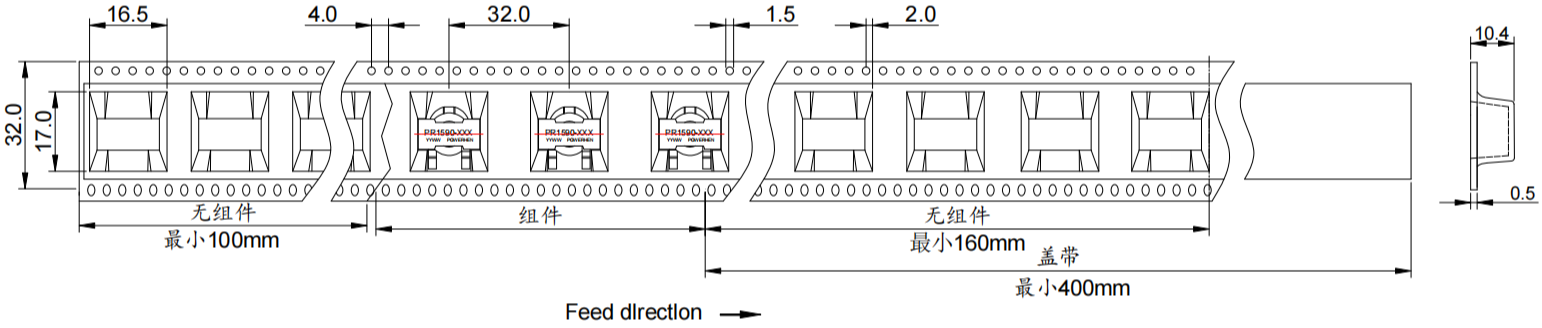
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■Packaging Specification - Tape and Reel: [mm]

包装规格 - 卷带包装：[mm]





Weight 重量: 4.12-5.15g/PCS

Packaging 包装数量:250 PCS/Reel

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