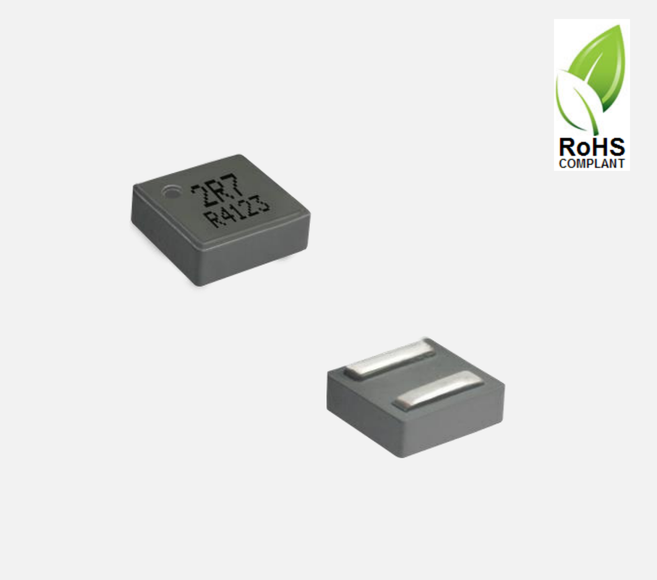
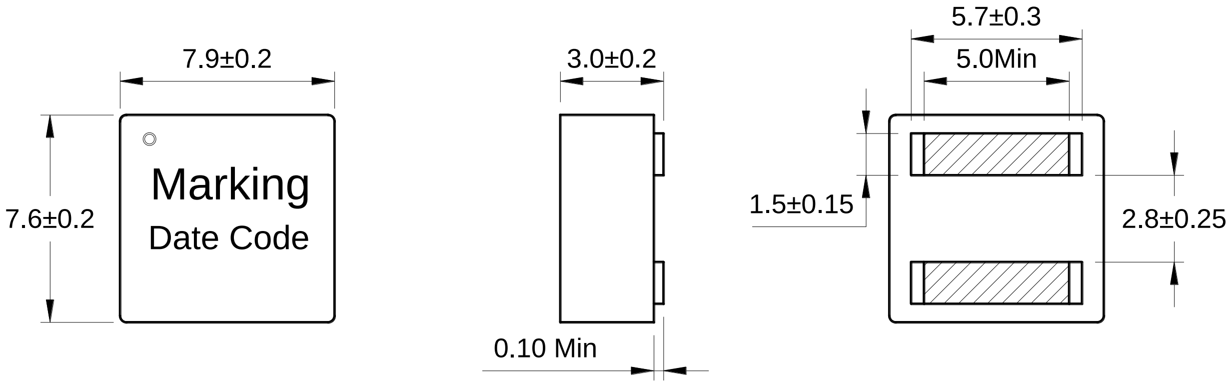
Molding Power Choke
- CSEB0730 Series



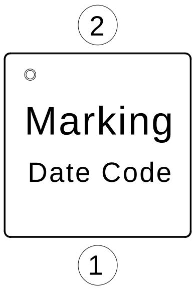
Outline:
产品概要

- Magnetic shielded structure: excellent resistance to electro magnetic interference(EMI).
  磁屏蔽结构：抗电磁干扰(EMI)性能强。
- A composite structure, ultra low buzz noise.
  一体成型结构，超低蜂鸣噪音。
- Low loss, high efficiency, wide application frequency.
  低损耗，高效率，应用频率宽。
- Lightweight design, save space, suitable for high density SMT.
  轻薄型设计，节省空间，适合高密度贴装。
- Die-casting by low loss alloy powder: low impedance, small parasitic capacitance.
  低损耗合金粉末压铸：低阻抗，寄生电容小。
- Operating temperature : -40℃ ~ +125℃ (Including coil's temperature rise)
  工作温度：-40℃ ~ +125℃（包含线圈发热）

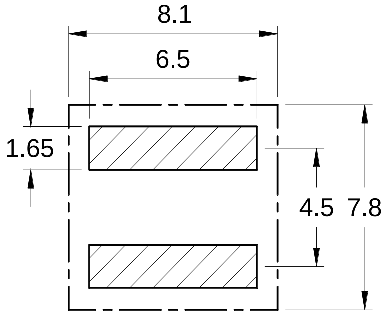
1 Appearance and dimensions (mm)
外形尺寸



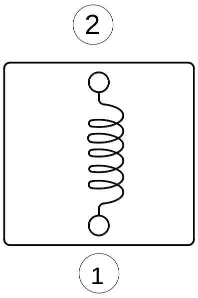
2 Marking
印字标识



3 Reference land pattern (mm)
参考基板尺寸



4 Schematic
原理图



5 Electrical characteristics
电气特性

Part No. 品　名	Inductance (μH) 电感值 ※1	D.C.R. (mΩ) 直流电阻		Saturation current (A) 饱和电流 ※2	Temperature rise current (A) 温升电流 ※3
	±20%	Typical	Max	Typical	Typical
CSEB0730-R16M	0.16	1.37	1.60	60.0	32.5
CSEB0730-R30M	0.30	1.92	2.20	41.0	27.6
CSEB0730-R60M	0.60	3.44	4.00	36.0	23.0
CSEB0730-1R0M	1.00	5.27	6.10	28.0	21.8
CSEB0730-1R5M	1.50	7.98	9.20	23.5	15.0
CSEB0730-2R2M	2.20	11.0	12.6	18.0	12.9
CSEB0730-2R7M	2.70	12.8	14.7	13.0	11.4
CSEB0730-3R3M	3.30	20.5	23.5	12.3	10.0
CSEB0730-4R7M	4.70	27.0	31.0	12.0	9.00
CSEB0730-5R6M	5.60	28.7	33.0	11.5	7.30
CSEB0730-6R8M	6.80	30.4	35.0	10.7	6.80

■ All data is tested based on 25℃ ambient temperature.
所有数据基于环境温度 25℃条件下测试。

※1 Inductance measure condition at 100kHz, 0.1V.
电感测试条件为 100kHz, 0.1V。

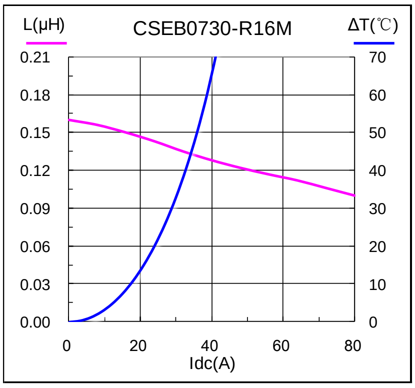
※2 Saturation current：the actual value of DC current when the inductance decrease 30% of its initial value.
饱和电流：电感值下降其初始值的 30%时所加载的实际直流电流值。

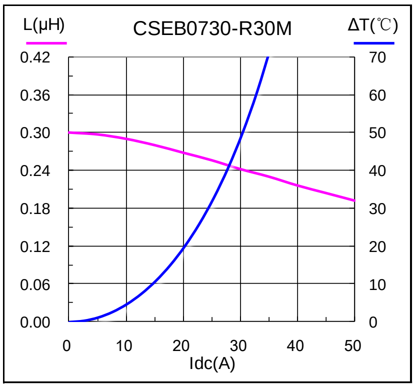
※3 Temperature rise current：the actual value of DC current when the temperature rise is ΔT40℃(Ta=25℃).
温升电流：使产品温度上升到 ΔT40℃时所加载的实际直流电流值(Ta=25℃)。

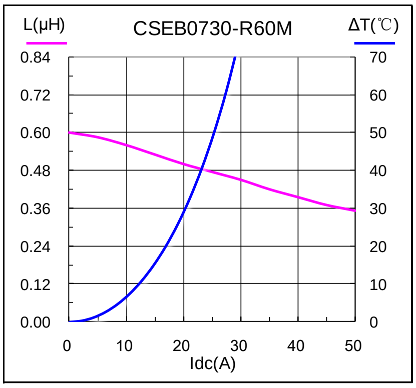
※ Special remind：Circuit design, component placement, PWB size and thickness, cooling system and etc. all will affect the product temperature. Please verify the product temperature in the final application.
特别提醒：线路设计，组件布局，印刷线路板(PWB)尺寸及厚度，散热系统等均会影响产品温度。
请务必在最终应用时，验证产品发热状况。

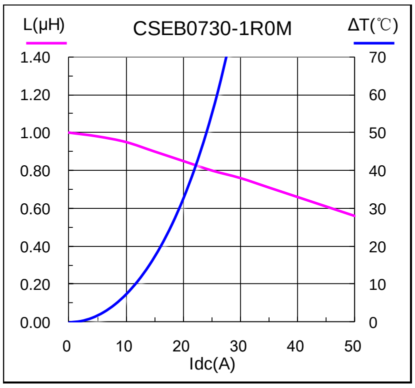
6 Saturation current VS temperature rise current curve

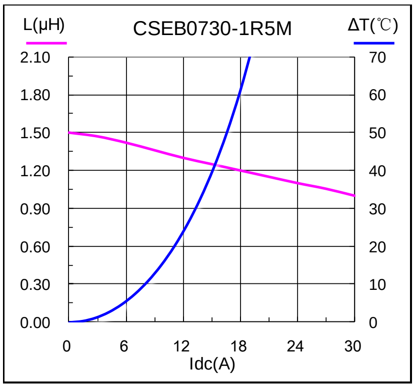
饱和电流 VS 温升电流曲线

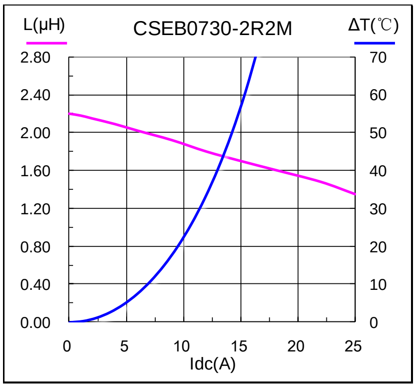


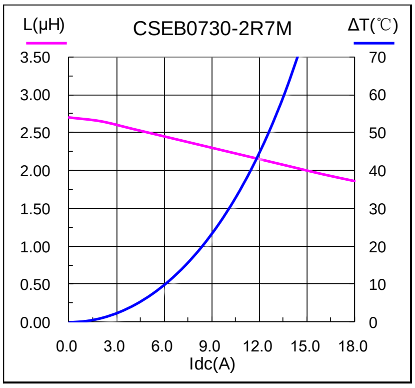


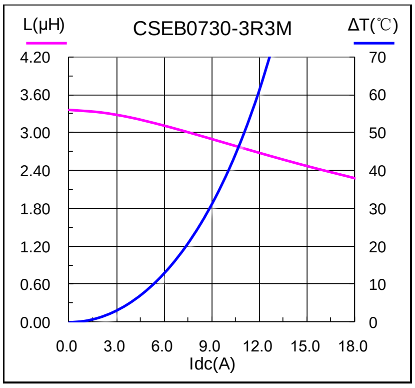


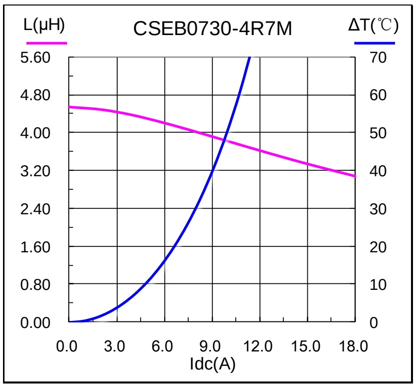


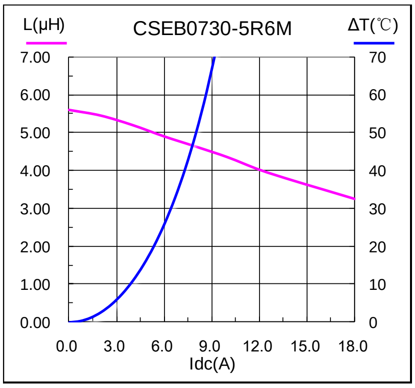


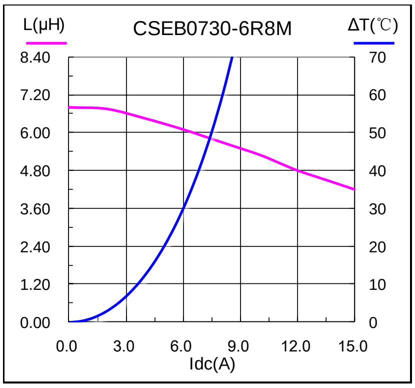






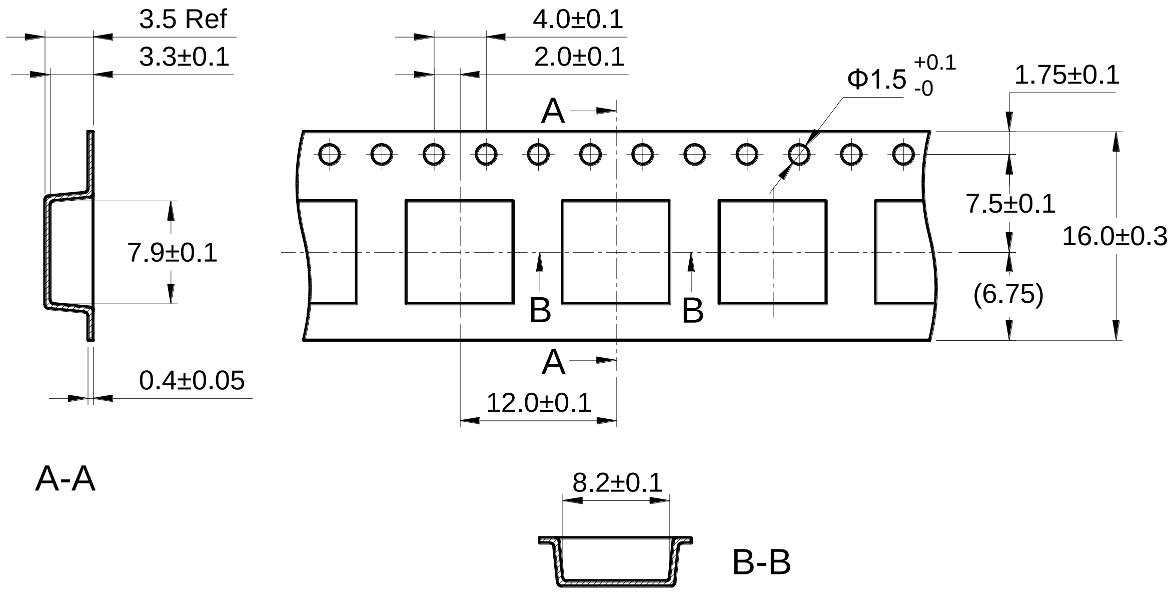






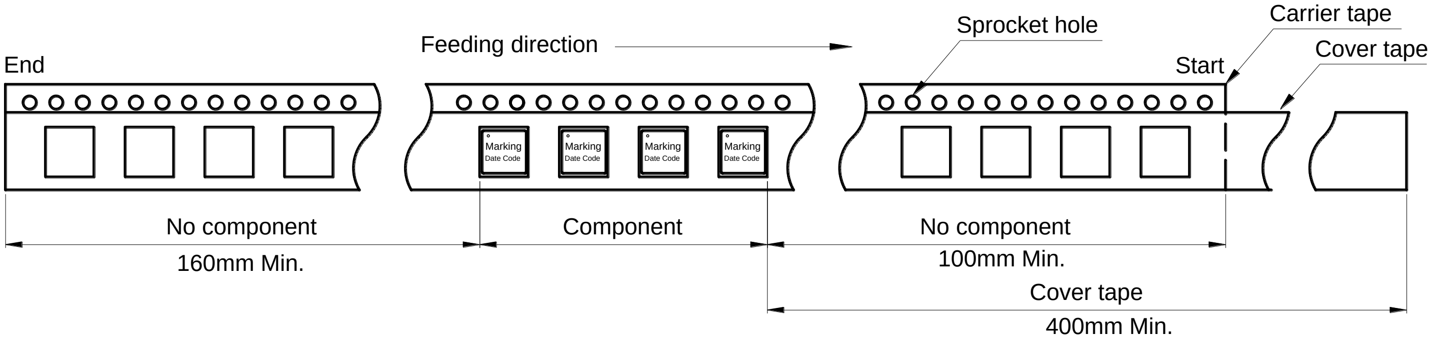
7 Packing specification
包装规格

7.1 Carrier tape dimensions (mm)
载带尺寸



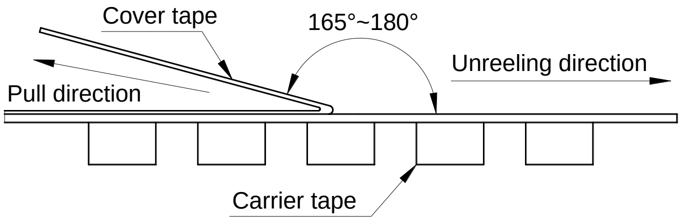
※ Packing is referred to the international standard IEC 60286-3.
包装参照国际标准 IEC 60286-3。

7.2 Tape direction
捆包方向

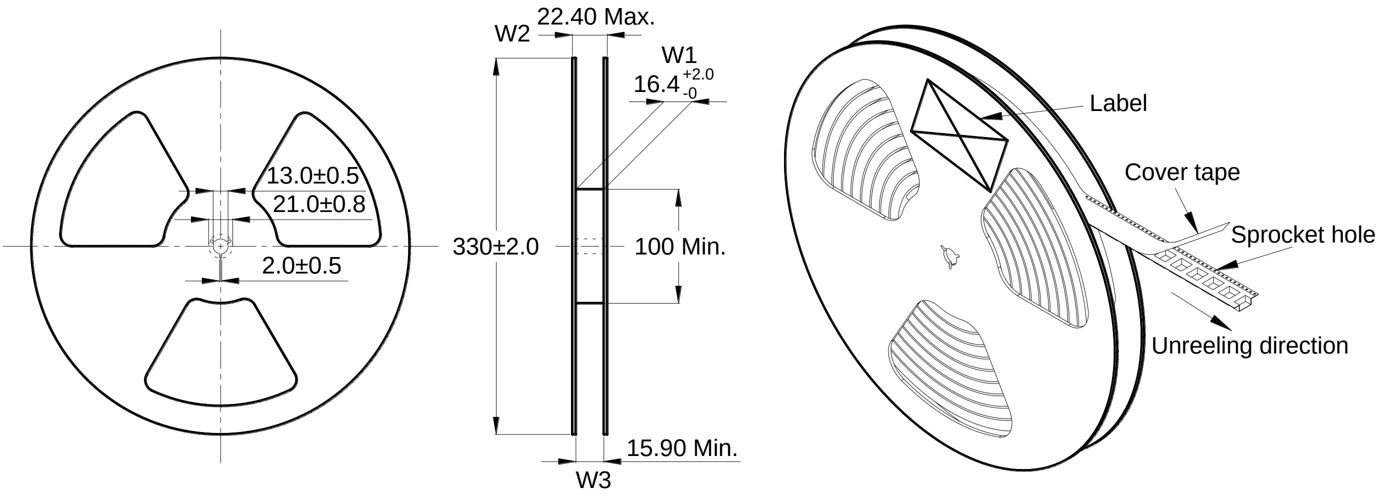


7.3 Cover tape peel off condition
盖带剥离条件

- Cover tape peel force shall be 0.1 to 1.3N.
  盖带剥离力度为 0.1～1.3N。
- Reference peel speed 300±10mm/min.
  参考剥离速度 300±10mm/分钟。



7.4 Reel dimensions (mm)
卷盘尺寸



7.5 Carton dimensions and packing quantity
包装箱尺寸和包装数量

- ■ Inner Carton：340×340×95mm
  内包装盒
- ■ Out Carton ：355×355×385mm
  外包装箱

Product Series 产品系列	Quantity / Reel 数量 / 卷	Inner Carton Quantity 内盒 包装数量	Out Carton Quantity 外箱 包装总数量
CSEB0730	1000pcs	(1000×3) = 3000pcs	(3000×3) = 9000pcs

7.6 Label making
标签标识

The following items will be marked on the reel of product label and shipping label.
以下项目将明确标识于产品卷盘标签以及运输标签上。

Production Label
产品标签

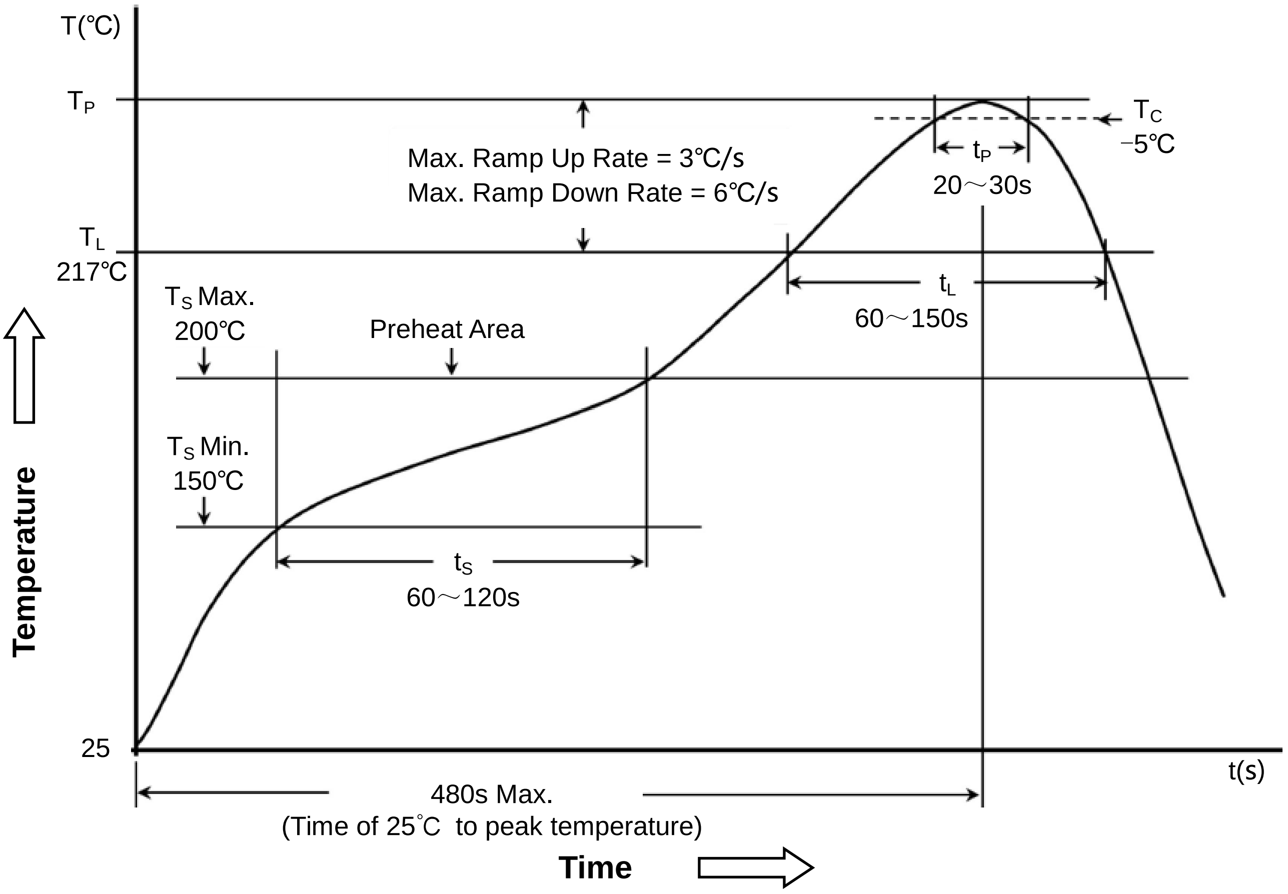
- ■ Part No.
  产品型号
- ■ Electrical Information
  产品电性信息
- ■ Quantity
  数 量
- ■ Packing No.
  包装流水号

Shipping Label
运输标签

- ■ Customer Name
  客户名称
- ■ Customer Part No.
  客户型号
- ■ Supplier Part No.
  供应商型号
- ■ Supplier Name
  供应商名称
- ■ Country of origin
  产品产地

8 Soldering specification
焊接规格

8.1 Reflow profile for SMT components
SMT 回流焊温度曲线



8.2 Classification of peak package body temperature (T_P)
封装体峰值温度(T_P)分类

	Package Thickness 封装厚度	Package Volume 封装体积		
		<350 mm^3	350 ~ 2000 mm^3	>2000 mm^3
PB-Free Assembly 无铅装配	<1.6mm	260℃	260℃	260℃
	1.6 ~ 2.5mm	260℃	250℃	245℃
	≥2.5mm	250℃	245℃	245℃

※ Reflow is referred to standard IPC/JEDEC J-STD-020D.
回流焊参照标准 IPC/JEDEC J-STD-020D。