增 益 实 业

零 件 承 认 书

SPECIFICATION FOR APPROVAL

客户名称: 0001

规格描述: ZNR6045磁胶电感规格书

日　　期: 2023/10/10

增益签核:

制订	审核	核准
夏琳	陈雨	李万

客户签核:

工程	审核	核准

东莞市增益实业有限公司
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传真：0769-87891229

物料类型：	磁胶电感
日　　期:	2023/10/10
版　　本:	A

◆特征：

- 磁性胶水涂敷结构极大减少了蜂鸣声
- 大电流低直流阻抗
- 直接在磁芯上金属化电极,抗跌落冲击强
  经久耐用
- 闭合磁路结构设计,漏磁少,抗 EMI 能力强
- 省空间,更省电
- 符合 RoHS,无卤和 REACH

Features:

- Magnetic-resin shielded construction reduces buzz Noise to ultra-low levels
- Large Current and Low DCR
- Metallization on Ferrite Core results in excellent shock Resistance and damage-free durability
- Closed magnetic circuit design reduces leakage Flux and Electro Magnetic Interference (EMI)
- Takes up less PCB real estate and save more power Small parasitic capacitance
- RoHS, Halogen Free and REACH Compliance

◆用途：

- 广泛应用于 LED 背光板、平板电视、
  蓝光 DVD 机顶盒、笔记本电脑、台式电脑、
  服务器、显卡、便携式游戏机、个人导航系统、
  多媒体、汽车产品 、通信设备、直流转换.

Applications:

- LED backlight、Flat-screen TVs, blue-ray disc Set top box、Notebooks, desktop computers, servers, Graphic cards、Portable gaming devices, personal Navigation systems, personal multimedia devices, Automotive systemsTelecomm base station、DC-DC Converter

◆环境：

- 工作温度：-40℃ 至+125℃
  （包括线圈自身温升）

Environmental Data:

- Operating Temperature: -40℃ to +125℃
  (Including coils self-temperature rise)

◆试验设备：

- 电感值:HP4284A, HP4285A 或同等仪器
- 电流:HP4284+42841A
- 直流电阻: Chroma 16502 或同等仪器

Test Equipment：

- L:HP4284A or HP4285A LCR meter or equivalent
- Isat & Irms: HP4284+42841A
- DCR:Chroma 16502 or equivalent

◆产品型号：

Product Identification：

ZNR	8040	S	100	M	T
①	②	③	④	⑤	⑥

①

类型 Type	
ZNR	闭磁路贴片磁胶电感 Shielded SMT Power Inductors

②

外形尺寸(L×W×H) (mm) External Dimensions (L×W×H) (mm)	
8040	8.0×8.0×4.2

④

Inductance
10 uH

③ Feature Type S:Standard

⑤

公差 Inductance Tolerance
K: ±10%, M: ±20%, N: ±30%

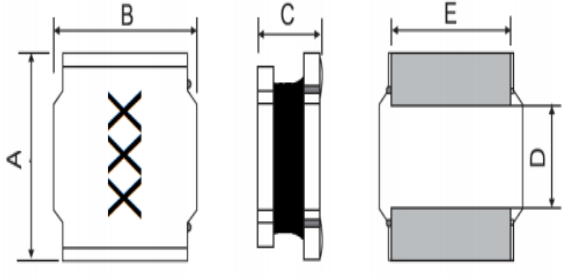
⑥

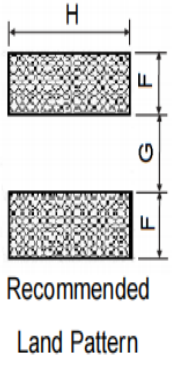
包装 Packing	
T	编带Tape & Reel

◆外观尺寸：

Shape and Dimensions(dimensions are in mm)：

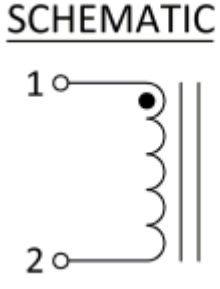
Fig.2





Recommended

Land Pattern



Part No	ITEM								
	Shap	A	B	C	D	E	F	G	H
ZNR6045S	Fig.2	6.0±0.3	6.0±0.3	4.5 Max	2.9±0.3	4.9±0.3	1.7 Typ	2.8 Typ	5.7 Typ

◆规格特性：　　Specifications：

● ZNR6045 Series

Part Number	Inductance (uH) @100KHz	DC Resistance (Ω)		额定电流 Current (A)	饱和电流 Current (A)
		Typ.	Max.		
ZNR6045SR47NT	0.47	0.006	0.008	6.60	16.500
ZNR6045SR56NT	0.56	0.006	0.008	7.50	15.000
ZNR6045SR68NT	0.68	0.006	0.008	6.50	12.000
ZNR6045SR82NT	0.82	0.008	0.010	6.50	11.000
ZNR6045S1R0MT	1.00	0.011	0.014	5.60	10.000
ZNR6045S1R5MT	1.50	0.012	0.016	5.40	9.700
ZNR6045S1R8NT	1.80	0.012	0.016	5.40	8.400
ZNR6045S2R2MT	2.20	0.014	0.018	5.00	7.400
ZNR6045S2R7NT	2.70	0.015	0.020	4.70	6.300
ZNR6045S3R0NT	3.00	0.020	0.026	4.20	6.200
ZNR6045S3R3NT	3.30	0.021	0.027	4.00	6.200
ZNR6045S3R6NT	3.60	0.021	0.027	4.00	5.700
ZNR6045S4R7MT	4.70	0.026	0.034	3.60	5.500
ZNR6045S5R6MT	5.60	0.029	0.038	3.40	4.600
ZNR6045S6R2MT	6.20	0.031	0.040	3.30	4.800
ZNR6045S6R8MT	6.80	0.031	0.040	3.30	4.300
ZNR6045S7R5MT	7.50	0.034	0.044	3.20	3.800
ZNR6045S8R2MT	8.20	0.043	0.056	2.80	4.300
ZNR6045S9R1MT	9.10	0.043	0.056	2.80	3.700
ZNR6045S100MT	10.0	0.048	0.062	2.70	3.500
ZNR6045S120MT	12.0	0.058	0.075	2.40	3.000
ZNR6045S150MT	15.0	0.068	0.088	2.20	2.700
ZNR6045S180MT	18.0	0.081	0.105	2.00	2.400

◆规格特性：　　Specifications：

● ZNR6045 Series

Part Number	Inductance (uH) @100KHz	DC Resistance (Ω)		额定电流 Current (A)	饱和电流 Current (A)
		Typ.	Max.		
ZNR6045S220MT	22.0	0.089	0.116	2.00	2.200
ZNR6045S270MT	27.0	0.102	0.133	1.80	2.100
ZNR6045S300MT	30.0	0.132	0.172	1.60	1.800
ZNR6045S330MT	33.0	0.137	0.178	1.60	1.800
ZNR6045S360MT	36.0	0.173	0.225	1.50	1.800
ZNR6045S390MT	39.0	0.180	0.234	1.40	1.600
ZNR6045S430MT	43.0	0.200	0.260	1.30	1.800
ZNR6045S470MT	47.0	0.200	0.260	1.30	1.500
ZNR6045S510MT	51.0	0.207	0.269	1.20	1.500
ZNR6045S560MT	56.0	0.221	0.287	1.20	1.400
ZNR6045S620MT	62.0	0.235	0.306	1.20	1.400
ZNR6045S680MT	68.0	0.289	0.376	1.10	1.300
ZNR6045S750MT	75.0	0.305	0.397	1.00	1.200
ZNR6045S820MT	82.0	0.341	0.443	0.99	1.100
ZNR6045S910MT	91.0	0.359	0.467	0.94	1.100
ZNR6045S101MT	100	0.433	0.563	0.88	1.000
ZNR6045S121MT	120	0.484	0.629	0.85	0.940
ZNR6045S151MT	150	0.580	0.754	0.77	0.880
ZNR6045S221MT	220	0.834	1.084	0.65	0.770
ZNR6045S271MT	270	1.096	1.425	0.63	0.650
ZNR6045S331MT	330	1.270	1.651	0.63	0.630
ZNR6045S391MT	390	1.800	2.340	0.48	0.560
ZNR6045S471MT	470	1.800	2.340	0.48	0.560

◆规格特性：　　Specifications：

● ZNR6045 Series

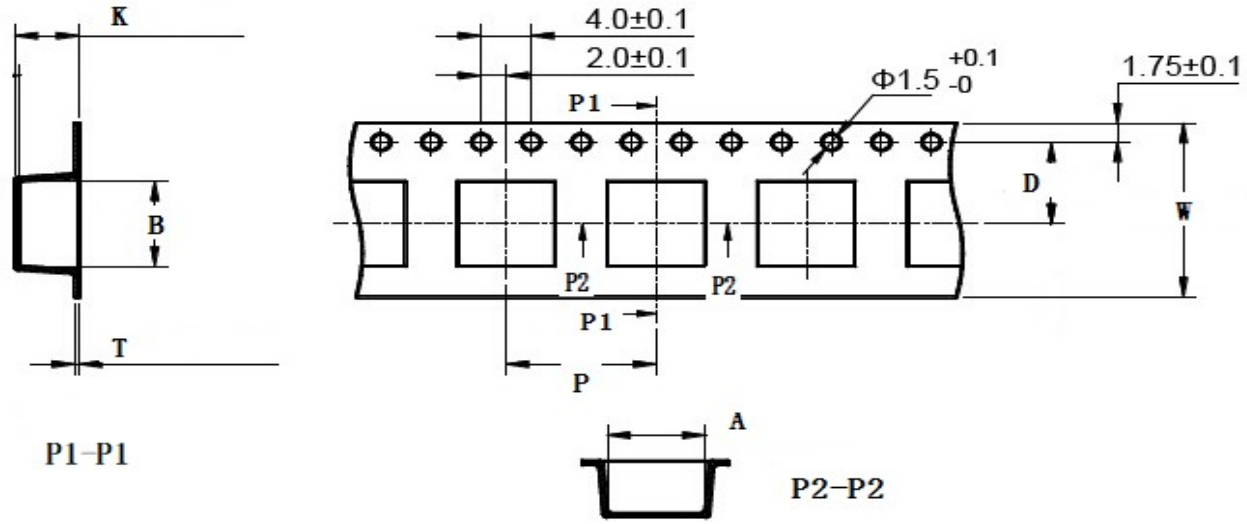
Part Number	Inductance (uH) @100KHz	DC Resistance (Ω)		额定电流 Current (A)	饱和电流 Current (A)
		Typ.	Max.		
ZNR6045S561MT	560	2.480	3.224	0.38	0.460
ZNR6045S681MT	680	2.500	3.250	0.38	0.460
ZNR6045S751MT	750	3.700	4.810	0.35	0.400
ZNR6045S821MT	820	3.700	4.810	0.35	0.360
ZNR6045S102MT	1000	4.500	5.850	0.35	0.350
ZNR6045S152MT	1500	6.750	8.100	0.24	0.270
ZNR6045S202MT	2000	9.700	11.640	0.200	0.230
ZNR6045S222KT	2200	10.000	12.000	0.200	0.230
ZNR6045S252MT	2500	10.570	12.680	0.170	0.200
ZNR6045S332KT	3300	13.000	15.300	0.170	0.200
ZNR6045S472KT	4700	18.750	22.500	0.140	0.170
ZNR6045S502MT	5000	20.000	24.000	0.110	0.140
ZNR6045S602MT	6000	30.000	36.000	0.110	0.140
ZNR6045S682KT	6800	31.200	37.400	0.110	0.140
ZNR6045S702MT	7000	33.000	39.600	0.100	0.120
ZNR6045S802MT	8000	35.500	42.600	0.100	0.120
ZNR6045S103KT	10000	40.000	48.000	0.10	0.120
ZNR6045S123KT	12000	62.000	74.400	0.080	0.110
ZNR6045S143KT	14000	63.500	76.200	0.070	0.100
ZNR6045S153KT	15000	70.000	84.000	0.070	0.100

※ The saturation current value is the DC current value having inductance decrease down to 30%.(at 20℃)

※ The temperature rise current value is the DC current value having temperature increase up to 40℃. (at 20℃)

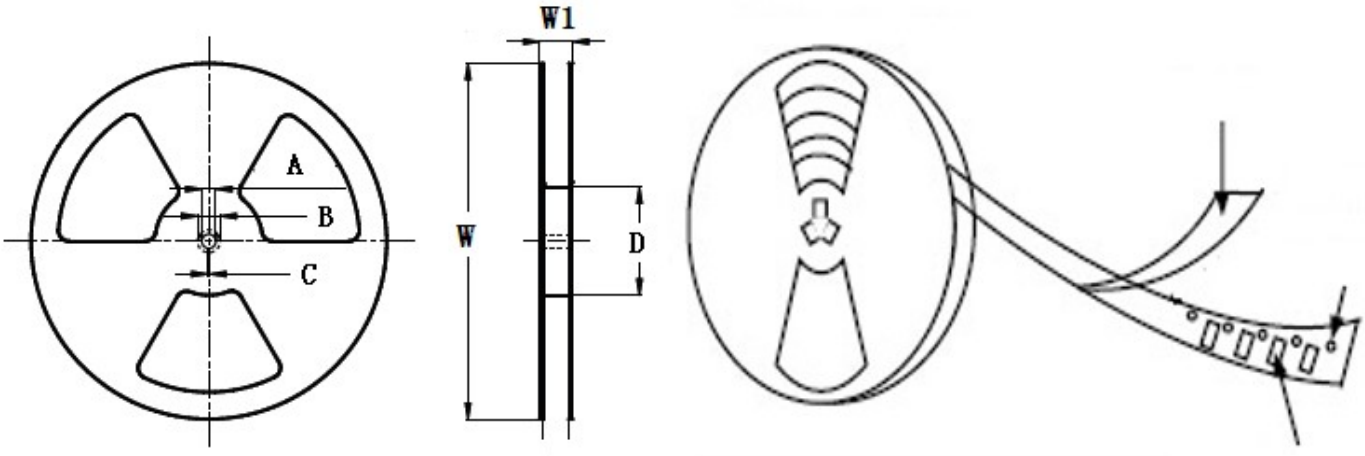
※ The rated current is the DC current value that satisfies both of current value saturation current value and temperature rise current value.

■ Taping Dimensions(Unit:mm)



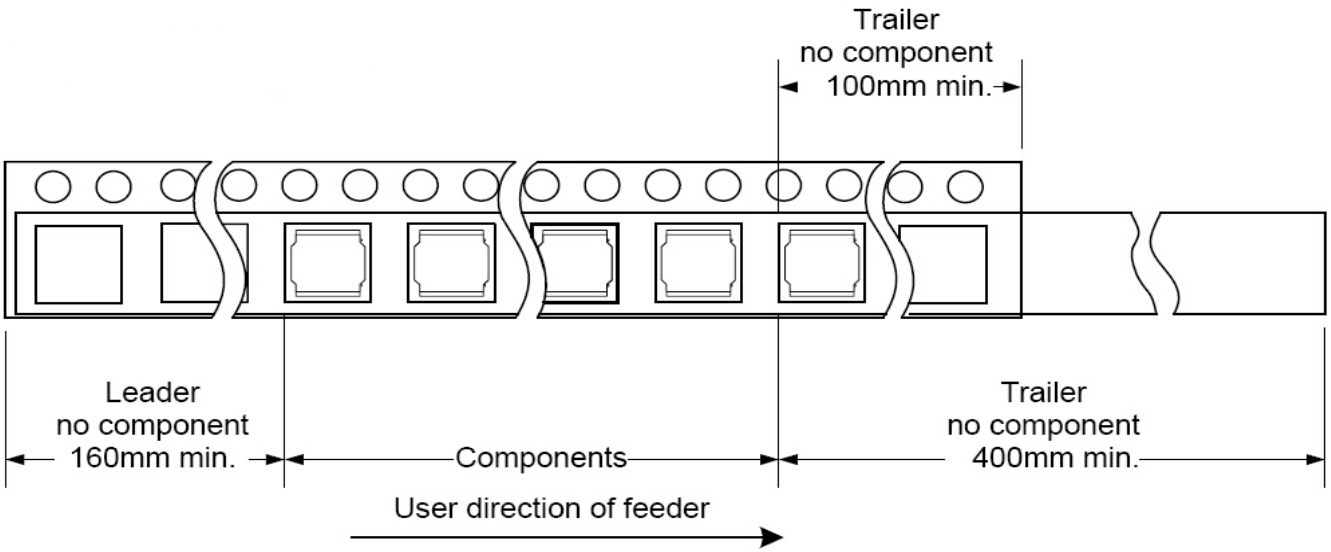
TYPE	Chip Thickness	W	A	B	D	P	K Max	T Max	MPQ
ZNR6045	4.50	16.0	6.40	6.40	7.50	8.00	4.70	0.40	1500

■ Reel Dimensions(Unit:mm)

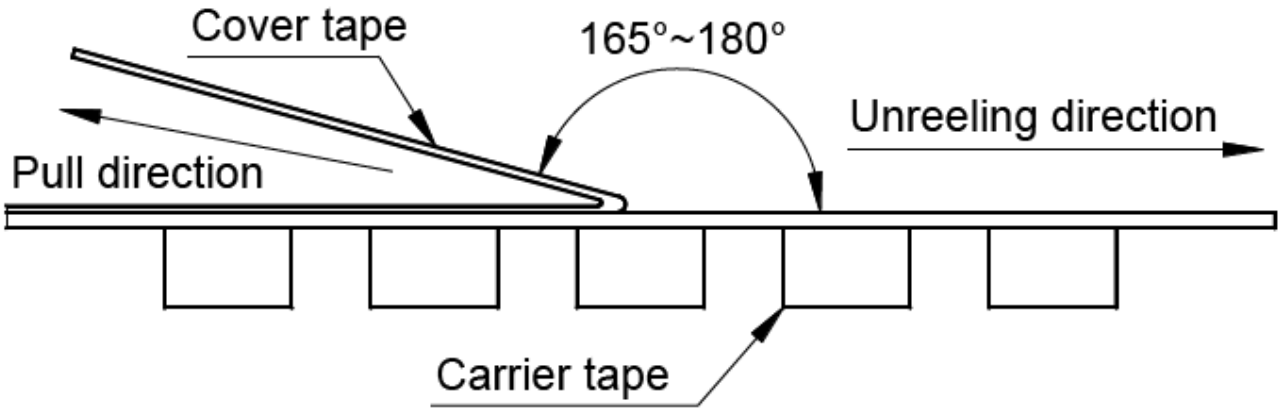


TYPE	W	W1	A	B	C	D
ZNR6045	330±2.0	16.5±1.50	13.0±0.50	21.0±0.80	2.0±0.50	100 Min

■ Direction of rolling



■ Cover tape peel off condition



Cover tape peel force shall be 0.1N to 1.3N.

Reference peel speed 300±10mm/min.

使用注意事项
REMINDERS FOR USING THESE PRODUCTS

- 保存时间为12 个月以内，保存条件（温度5~40°C以下、湿度35 ～ 66%RH 以下），需充分注意。
  若超过保存时间，端子电极的可焊性将可能老化。
  The storage period is within 12 months. Be sure to follow the storage conditions (temperature: 5~40°C, humidity: 35 to 65% RH or less). If the storage period elapses, the soldering of the terminal electrodes may deteriorate。
- 请勿在气体腐蚀环境（盐、酸、碱等）下使用和保存。
  Do not use or store in locations where there are conditions such as gas corrosion (salt, acid, alkali, etc.).
- 手上的油脂会导致可焊性降低，应避免用手直接接触端子。
  Don't touch electrodes directly with bare hands as oil secretions may inhibit soldering Always ensure optimum conditions for soldering。
- 请小心轻拿轻放,避免由于产品的跌落或取出不当而导致的损坏。
  Please always handle products carefully to prevent any damage caused bydropping down or inappropriate removing。
- 端子过度弯曲会导致断线,请不要过度弯曲端子。
  Don't bend the terminals with excessive stress in case of any wire fracture。
- 不要清洗产品，如需要清洗时请联系我司。
  Don’t rinse coils by yourself and please contact ZE if necessary。
- 请勿将本产品靠近磁铁或带有磁力的物体
  Don’t expose the products to magnets or magnetic fields
- 在实施焊接前，请务必进行预热。预热温度与焊接温度及芯片温度的温度差要在150°C 以内。
  Before soldering, be sure to preheat components. The preheating temperature should be set so that the temperature difference between the solder temperature and chip temperature does not exceed 150°C.
- 安装后的焊接修正应在规格书规定的条件范围内。若加热过度可能导致短路、性能降低、寿命减少。
  Soldering corrections after mounting should be within the range of the conditions determined in the specifications. If overheated, a short circuit, performance deterioration, or lifespan shortening may occur.
- 装置会因通电而自我发热（温度上升），因此在热设计方面需留有充分余地。
  Self heating (temperature increase) occurs when the power is turned ON, so the tolerance should be sufficient for the set thermal design.
- 非磁屏蔽型在基板设计时需注意配置线圈，受到电磁干扰可能会导致误动作。
  Carefully lay out the coil for the circuit board design of the non-magnetic shield type. A malfunction may occur due to magnetic interference.
- 当本公司产品使用在一般电子设备以外的场合,如:车载,医疗设备,军用,航空航天等,请务必联繫本公司营业部门,如超出本公司产品使用条件而引起的机器故障时,本公司概不负责。
  If ZE product will be applied in area like automotive product, medical equipment, military and aerospace except generalelectronic device, please keep ZE sales informed in advance. ZE shall not be held liable for any malfunction or breakdowncaused by using product in the condition which is inconsistent with that recommended by ZE。