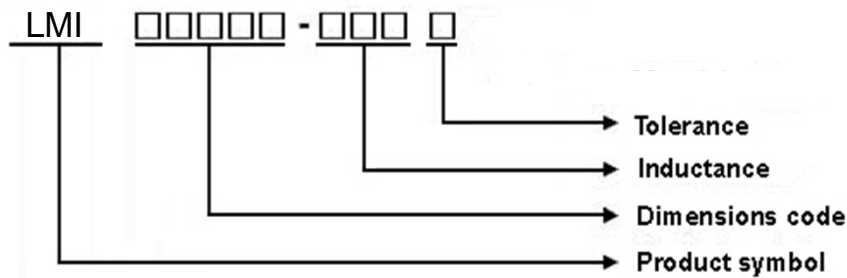


1 Scope: This specification applies to large current and low loss SMD shielding power inductor.

2 Part Numbering:

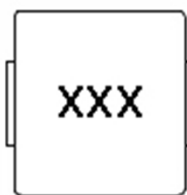


3 Rating:

Operating Temperature: $-55^{\circ}\text{C} \sim 125^{\circ}\text{C}$ (Including self - temperature rise)

Storage Temperature: (on tape & reel): -20°C to $+40^{\circ}\text{C}$; 75% RH max.

4 Marking:



Ex : LMI06024-1R0M

Marking : 1R0

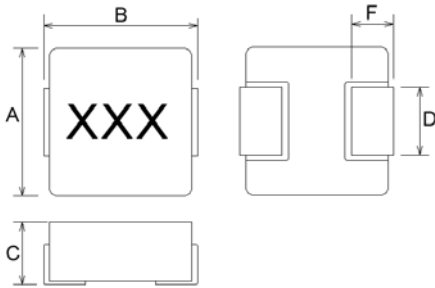
Marking color : Black

5 Standard Testing Condition

	Unless otherwise specified	In case of doubt
Temperature	Ordinary Temperature(15 to 35°C)	20 to 30°C
Humidity	Ordinary Humidity(25 to 85% RH)	50 to 80 %RH

6 Configuration and Dimensions:

Shape and Dimensions



Dimensions in mm

TYPE	A	B Max	C Max	D	F
06024	6.6±0.2	7.0±0.3	2.4	2.9±0.3	1.6±0.5

7 Electrical Characteristics:

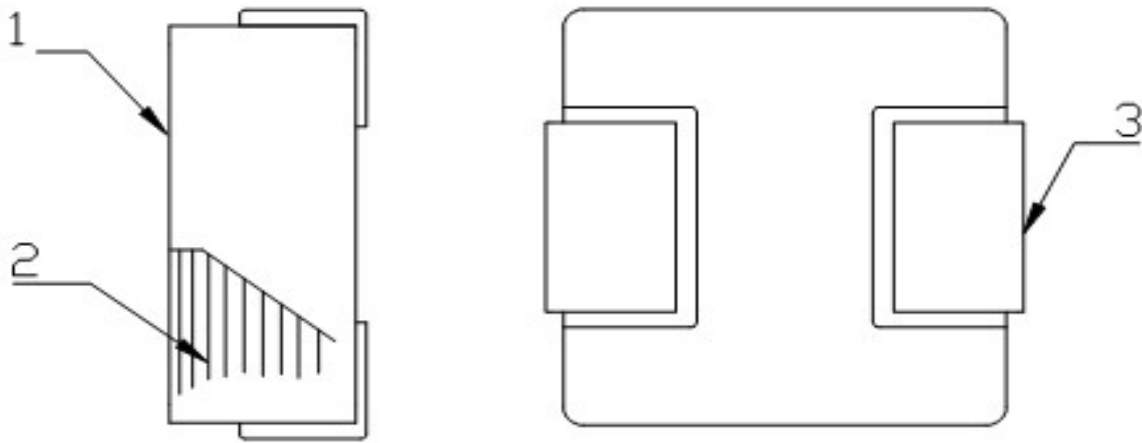
Part No.	Inductance (uH)	Tolerance (±%)	Test Freq.	I _{rms} (A) Typ.	I _{sat} (A) Typ.	RDC(mΩ) Max.	Marking
LMI06024-R22M	0.22	20	100kHz,0.5V	21	34	3.2(2.6typ)	R22
LMI06024-R33M	0.33	20	100kHz,0.5V	18	24.5	4.1(3.5typ)	R33
LMI06024-R47M	0.47	20	100kHz,0.5V	15	22	5.1(4.5typ)	R47
LMI06024-1R0M	1	20	100kHz,0.5V	9	16	13.5(11.2typ)	1R0
LMI06024-1R5M	1.5	20	100kHz,0.5V	9	15	20.0(17.0typ)	1R5
LMI06024-2R2M	2.2	20	100kHz,0.5V	7	11	28.0(23.0typ)	2R2
LMI06024-3R3M	3.3	20	100kHz,0.5V	5.5	10	39.0(31.0typ)	3R3
LMI06024-4R7M	4.7	20	100kHz,0.5V	5	10	50.0(41.0typ)	4R7
LMI06024-6R8M	6.8	20	100kHz,0.5V	4	6	70.0(57.0typ)	6R8
LMI06024-100M	10	20	100kHz,0.5V	3.1	4	101(92typ)	100
LMI06024-150M	15	20	100kHz,0.5V	2.5	3.3	160(145typ)	150

Note:

1. Operating temperature range -55°C~125°C (Including self - temperature rise)
2. I_{sat} for Inductance drop 30% from its value without current.
3. I_{rms} for a 40°C temperature rise from 25°C ambient.
4. The part temperature (ambient + temp rise) should not exceed 125°C under worst case operating conditions.
Circuit design 125°C under worst case operating conditions. Component placement, PWB trace size and thickness, airflow and other cooling provisions all affect the part temperature. Part temperature should be verified in the end application.
5. Absolute maximum voltage 30V DC. (Based on test method, it may not be the same under different application, it is recommended to verify first.)

8 LMI06024 Series

8.1 Construction:



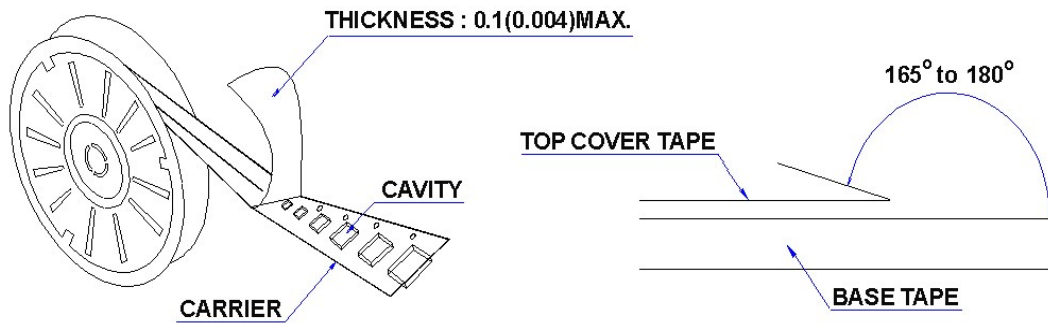
8.2 Material List:

No	Part	Material
1	Core	Magnetic Metal Powder
2	Wire	Copper Wire
3	Terminal	Terminal Copper

9 Packaging:

9.1 Packaging -Cover Tape

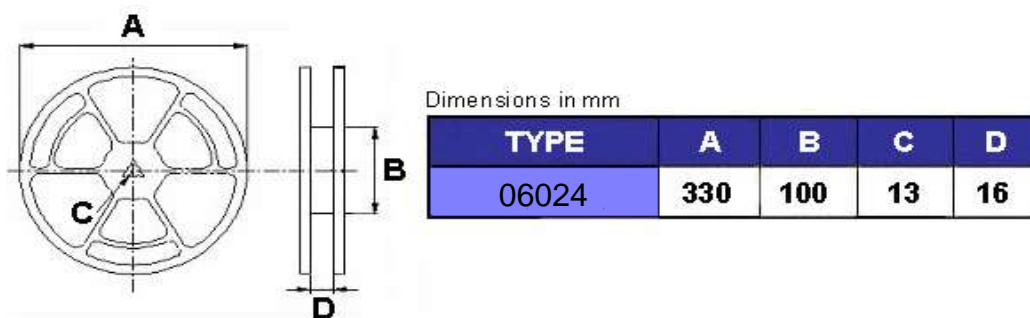
The force for tearing off cover tape is 10 to 130 grams in the arrow direction.



9.2 Packaging Quantity

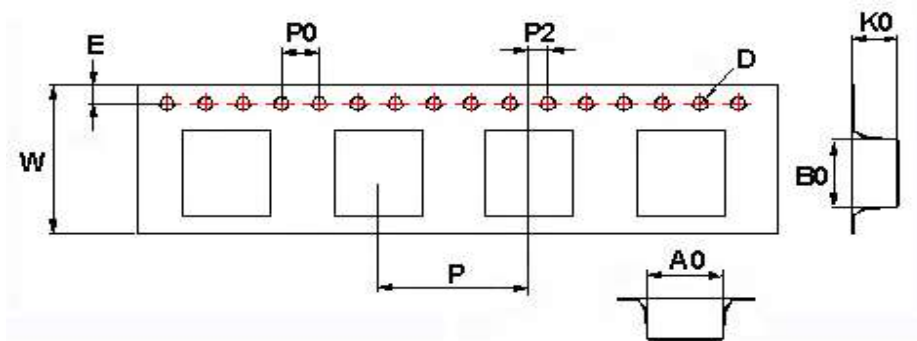
TYPE	PCS/REEL
06024	1000

9.3 Reel Dimensions



9 Packaging:

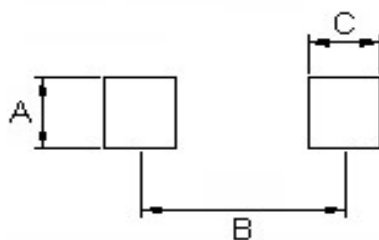
9.4 Tape Dimensions in mm



TYPE	A0	B0	K0	D	E	W	P	P0	P2
06024	7.0	7.6	2.7	1.55	1.75	16	12	4	2

10 Recommended Land Pattern:

PAD LAYOUT



Dimensions in mm

TYPE	A(in/mm)	B(in/mm)	C(in/mm)
06024	0.138/3.5	0.238/6.05	0.093/2.35

11 Note:

1. Please make sure that your product has been evaluated and confirmed against your specifications when our product is mounted to your product.
2. Do not knock nor drop.
3. All the items and parameters in this product specification have been prescribed on the premise that our product is used for the purpose, under the condition and in the environment agreed upon between you and us. You are requested not to use our product deviating from such agreement.
4. Please keep the distance between transformer/coil and other components (refer to the standard IEC 950)
5. The moisture sensitivity level (MSL) of products is classified as level 1.

12 Graph: LMI06024-4R7M

