Inductors

For Power Line
SMD

MLZ Series MLZ2012 Type

This is a multilayered inductor primarily designed for choking power lines. With one of the best resistance performance in the industry, this product delivers a significantly lower DC resistance value compared to our previous products. This reduces the loss at the power supply and contributes to power conservation.

FEATURES

- Significantly reduced Rdc.
- An inductance value of 4.7μH was realized at a thickness of 0.85mm. This contributes to space saving.
- Automatic mounting in tape and reel package.
- The products contain no lead and also support lead-free soldering.

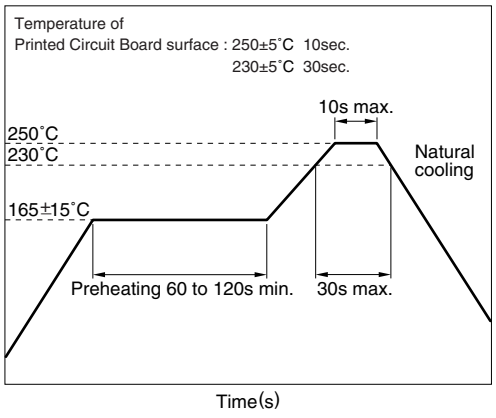
APPLICATIONS

DVC, DSC, Tuner, LCD panel, MD, HDD, etc.

SPECIFICATIONS

Operating temperature range	–55 to +125°C
Storage temperature range	–55 to +125°C[Unit of products]

RECOMMENDED REFLOW SOLDERING CONDITIONS



PRODUCT IDENTIFICATION

MLZ	2012	A	1R0	P	T
(1)	(2)	(3)	(4)	(5)	(6)

(1) Series name

(2) Dimensions L×W

2012	2.0×1.25mm

(3) Material code

(4) Inductance value

1R0	1.0 μH
100	10.0 μH

(5) Inductance tolerance

M	±20%
P	±25%

(6) Packaging style

T	Taping [reel]

PACKAGING STYLE AND QUANTITIES

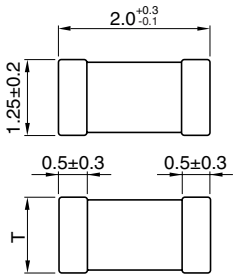
Packaging style	Thickness	Quantity
Taping	0.85mm	4000 pieces/reel
	1.25mm	2000 pieces/reel

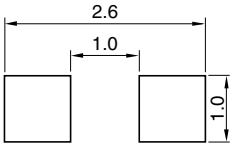
Inductors

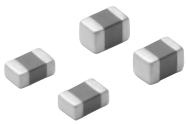
For Power Line
SMD

MLZ Series MLZ2012 Type

SHAPES AND DIMENSIONS/RECOMMENDED PC BOARD PATTERN







Dimensions in mm

ELECTRICAL CHARACTERISTICS

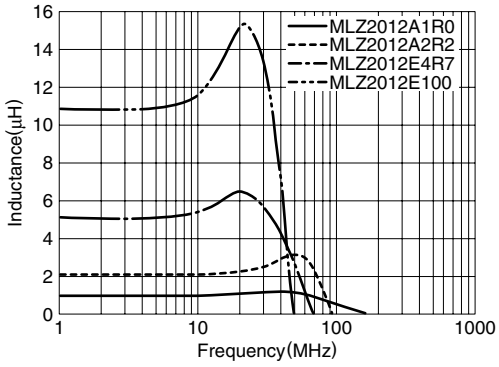
Part No.	Inductance (μH)	Inductance tolerance	Thickness (mm)	Self-resonant frequency (MHz)typ.	DC resistance (Ω)±30%	Rated current (mA)
MLZ2012A1R0X*T	1.0	±20, ±25%	0.85	160	0.12	220
MLZ2012A2R2XT	2.2	±20, ±25%	0.85	100	0.20	160
MLZ2012E4R7XT	4.7	±20, ±25%	0.85	70	0.30	80
MLZ2012E100XT	10.0	±20, ±25%	1.25	30	0.40	60

* X: Please specify inductance tolerance, M(±20%) or P(±25%)

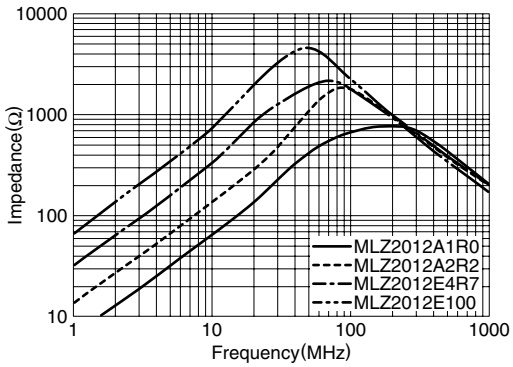
- Test equipment
  Inductance, Q: HP4291B-16192A

TYPICAL ELECTRICAL CHARACTERISTICS

INDUCTANCE vs. FREQUENCY CHARACTERISTICS



IMPEDANCE vs. FREQUENCY CHARACTERISTICS



INDUCTANCE CHANGE vs. DC SUPERPOSITION CHARACTERISTICS