

MOX-SPI-0602



MoxiE[®]
INDUCTOR CORPORATION

Surface Mount Shielded Power Inductors

MoxiE's SPI-0602 series of surface mount shielded power inductors are widely used in PDA's, notebooks, LCD televisions and digital cameras. MoxiE offers a ultra low profile magnetically shielded package that offer high inductance & high power.

Features:

- Low cost.
- Operating temperature: -40°C to +85°C.
- High current rating.
- RoHS compliant.
- Magnetically shielded applications.



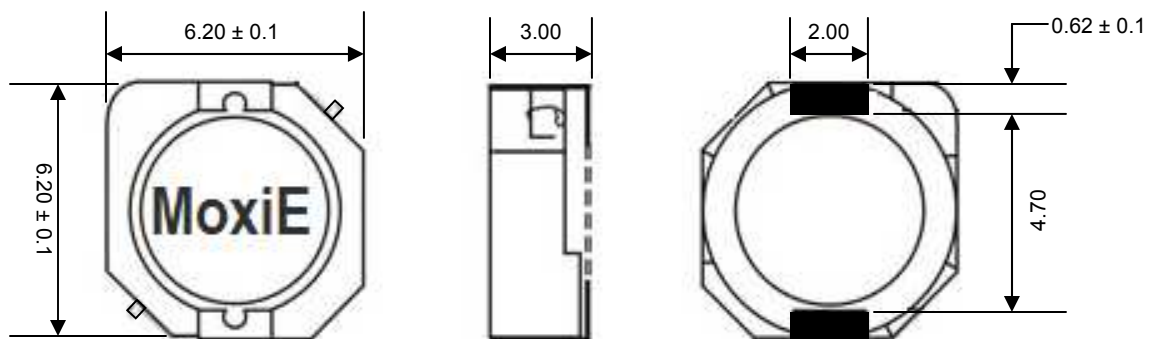
NOTES

- Measuring Frequency (L) 100kHz/0.1V.
- Available Tolerances: M= ±20%.
- Storage temperature range: -40°C to +125°C.
- Operating ambient temperature range: -40°C to +85°C .
- DC current at which the inductance drops 35% (typical) from its value without current.
- Solder reflow temperature: +260°C max. for 10 seconds max.
- Open circuit inductance test parameters: 100kHz, 0.25Vrms, 0.0Adc.
- RMS current for an approximate AT of 40°C without core loss. It is recommended that the temperature of the part not exceed 130°C.
- Peak current for approximate 30% roll off at 20°C.
- Temperature rise of 40°C maximum.
- DCR limits @ 20°C.
- MoxiE Inductor Corporation specifications are subject to change without notice.



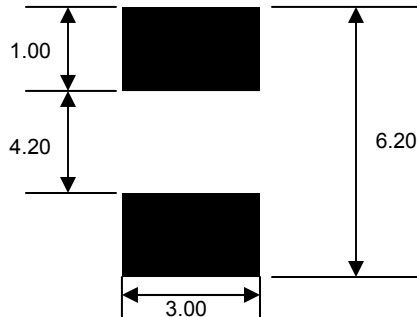
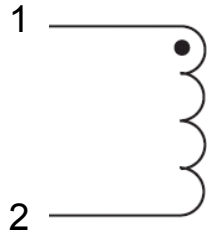
MECHANICAL DIMENSIONS

MoxiE Note: All dimensions in mm





LANDING PATTERN & SCHEMATIC



ELECTRICAL SPECIFICATIONS

| MoxiE Part Number | Rated Inductance (μH) | Test Condition | Tolerance (%) | DC Resistance (Ω) Max. | Rated Current (A) Max. |
|-------------------|-----------------------|----------------|---------------|------------------------|------------------------|
| MOX-SPI-0602-2R7M | 2.70 | 100KHz / 0.1V | ±20 | 0.018 | 2.70 |
| MOX-SPI-0602-3R3M | 3.30 | 100KHz / 0.1V | ±20 | 0.020 | 2.45 |
| MOX-SPI-0602-5R0M | 5.00 | 100KHz / 0.1V | ±20 | 0.031 | 1.95 |
| MOX-SPI-0602-8R0M | 8.00 | 100KHz / 0.1V | ±20 | 0.050 | 1.60 |
| MOX-SPI-0602-100M | 10.00 | 100KHz / 0.1V | ±20 | 0.054 | 1.40 |
| MOX-SPI-0602-120M | 12.00 | 100KHz / 0.1V | ±20 | 0.072 | 1.25 |
| MOX-SPI-0602-150M | 15.00 | 100KHz / 0.1V | ±20 | 0.082 | 1.15 |
| MOX-SPI-0602-180M | 18.00 | 100KHz / 0.1V | ±20 | 0.102 | 1.10 |
| MOX-SPI-0602-220M | 22.00 | 100KHz / 0.1V | ±20 | 0.119 | 1.00 |
| MOX-SPI-0602-270M | 27.00 | 100KHz / 0.1V | ±20 | 0.146 | 0.95 |
| MOX-SPI-0602-330M | 33.00 | 100KHz / 0.1V | ±20 | 0.183 | 0.78 |
| MOX-SPI-0602-390M | 39.00 | 100KHz / 0.1V | ±20 | 0.210 | 0.75 |
| MOX-SPI-0602-470M | 47.00 | 100KHz / 0.1V | ±20 | 0.230 | 0.65 |
| MOX-SPI-0602-560M | 56.00 | 100KHz / 0.1V | ±20 | 0.305 | 0.60 |
| MOX-SPI-0602-680M | 68.00 | 100KHz / 0.1V | ±20 | 0.351 | 0.55 |
| MOX-SPI-0602-820M | 82.00 | 100KHz / 0.1V | ±20 | 0.419 | 0.49 |
| MOX-SPI-0602-101M | 100.00 | 100KHz / 0.1V | ±20 | 0.520 | 0.44 |