

### Description

- High performance, ferrite-based, low profile, surface mount inductors
- Small footprint and closed magnetic field construction allow for low EMI
- Low DCR and high efficiency
- Ferrite core material



### Applications

- PC cards, cellular telephones, pagers, and disk drives
- GPS systems

### Environmental Data

- Storage temperature range: -40°C to +125°C
- Operating ambient temperature range: -40°C to +85°C (range is application specific).
- Solder reflow temperature: +260°C max. for 10 seconds max.



### Packaging

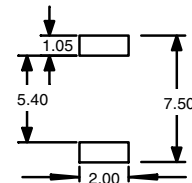
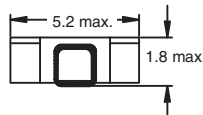
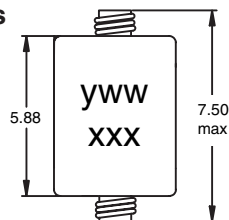
- Supplied in tape and reel packaging, 3900 per reel

| Part Number | Inductance $\mu\text{H}$ | OCL (1) $\mu\text{H} \pm 20\%$ | I <sub>rms</sub> (2) Amperes (Typ.) | I <sub>sat</sub> (3) Amperes (Typ.) | DCR (4) Ohms (Max.) | Q (5) (Typ.) | SRF MHz (Typ.) |
|-------------|--------------------------|--------------------------------|-------------------------------------|-------------------------------------|---------------------|--------------|----------------|
| MP2-R47-R   | 0.47                     | 0.40                           | 2.02                                | 3.40                                | 0.075               | 10           | 300            |
| MP2-1R0-R   | 1.0                      | 1.02                           | 1.67                                | 2.10                                | 0.103               | 20           | 160            |
| MP2-1R5-R   | 1.5                      | 1.59                           | 1.51                                | 1.70                                | 0.118               | 25           | 155            |
| MP2-2R2-R   | 2.2                      | 2.29                           | 1.39                                | 1.40                                | 0.130               | 32           | 150            |
| MP2-3R3-R   | 3.3                      | 3.58                           | 1.25                                | 1.10                                | 0.156               | 42           | 140            |
| MP2-4R7-R   | 4.7                      | 4.60                           | 1.18                                | 1.00                                | 0.180               | 46           | 130            |
| MP2-6R8-R   | 6.8                      | 7.02                           | 1.06                                | 0.80                                | 0.202               | 46           | 110            |
| MP2-100-R   | 10.0                     | 9.95                           | 0.98                                | 0.68                                | 0.240               | 55           | 100            |
| MP2-150-R   | 15.0                     | 15.30                          | 0.88                                | 0.54                                | 0.300               | 65           | 60             |
| MP2-220-R   | 22.0                     | 21.80                          | 0.80                                | 0.45                                | 0.360               | 65           | 45             |
| MP2-330-R   | 33.0                     | 33.70                          | 0.64                                | 0.37                                | 0.556               | 65           | 35             |
| MP2-470-R   | 47.0                     | 46.40                          | 0.52                                | 0.31                                | 0.833               | 65           | 28             |

1) Open Circuit Inductance Test Parameters: 100kHz, 0.250 Vrms, 0.0 Adc  
 2) RMS current, delta temp. of 40° C ambient temperature of 85° C  
 3) Peak current for approximately 30% roll-off

4) Values @ 20° C  
 5) Measured @ 300KHz

### Mechanical Diagrams



Dimensions in Millimeters.  
 Specifications are subject to change without notice.

yww = Date Code  
 xxx = Inductance value per family chart

### Inductance Characteristics

