## Shielded Power Inductors – RFS1113

- Low cost, high current power inductors
- 6.8 µH to 2.7 mH inductance range

### Core material
Ferrite

### Terminations
Tin-silver (96.5/3.5) over tin over copper over steel. Other terminations available at additional cost.

### Weight
4.1 – 4.7 g

### Ambient temperature
–40°C to +85°C with Irms current

### Maximum part temperature
+125°C (ambient + temp rise)

### Storage temperature
Component: –40°C to +125°C.
Tray packaging: –40°C to +80°C

### Moisture Sensitivity Level (MSL)
1 (unlimited floor life at <30°C / 85% relative humidity)

### Packaging
169 parts per tray

### PCB washing
Tested with pure water or alcohol only. For other solvents, see Doc787_PCB_Washing.pdf.

### Specifications

<table>
<thead>
<tr>
<th>Part number1</th>
<th>Inductance2 ±20% (µH)</th>
<th>DCR (Ohms) typ</th>
<th>max</th>
<th>SRF typ3 (MHz)</th>
<th>Isat (A)4 10% drop</th>
<th>20% drop</th>
<th>30% drop</th>
<th>Irms (A)5</th>
<th>20°C rise</th>
<th>40°C rise</th>
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<tbody>
<tr>
<td>RFS1113-682ME</td>
<td>6.8</td>
<td>0.014</td>
<td>0.016</td>
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1. When ordering, please specify termination code: **RFS1113-105M**
   - **E** = Tin-silver over tin over copper over steel.
   - **T** = RoHS tin-silver-copper (95.5/4/0.5) or **S** = non-RoHS tin-lead (63/37).

2. Inductance tested at 100 kHz, 0.1 Vrms, 0 Adc on an Agilent/HP 4284A LCR-meter or equivalent.

3. SRF measured using Agilent/HP 4191A or equivalent.

4. DC current that causes the specified inductance drop from its value without current.

5. Current that causes the specified temperature rise from 25°C ambient.

6. Electrical specifications at 25°C.
Shielded Power Inductors – RFS1113 Series

Typical L vs Current

Typical L vs Frequency

Dimensions are in inches/mm

Dot indicates pin 1

Recommended PC Board Layout