

Specification for a Bandpass LC Filter MtronPTI P/N: LF9415

I. General & Electrical Requirements:

1. Center Frequency (F_{ON}): 3300MHz
2. 1dB Passband: 3100MHz to 3500MHz (BW1: 400MHz minimum)
3. Insertion Loss (@ F_{ON}): ≤ 2.0 dB
4. VSWR: 1.5:1 maximum
5. Rejection (ref. to IL @ F_{ON})
 - 500MHz to 2750MHz: 50dB minimum
 - @ 2950MHz: 15dB minimum
 - @ 3700MHz: 50dB minimum
 - 4000MHz to 7000MHz: 50dB minimum
6. Power Handling (no damage): + 30dBm CW
7. Z_{IN}/Z_{OUT} : 50 Ω nominal

II. Environmental & Physical Requirements:

1. Temperature Range:
 - Operating: -40°C to +85°C
 - Storage: -45°C to +90°C
2. Shock (operating without damage): Per MIL-STD-202G, Method 213B, Test Condition J
3. Vibration (operating without damage): Per MIL-STD-202G, Method 214A, Test Condition I Letter C
4. Altitude: Per MIL-STD-202G, Method 105C, Test Condition A
 - Storage: 33,000-ft (MSL)
 - Operating: 10,000-ft (MSL)
5. Humidity: 95% maximum relative humidity, non-condensing
6. Package Type: SMD

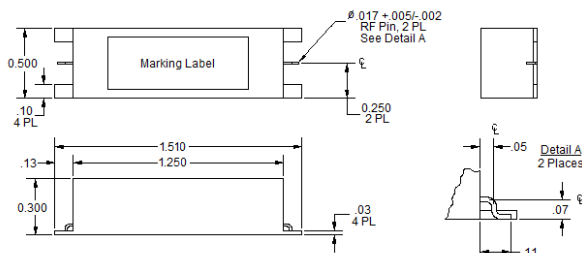
Overall Size: 1.510" (L) x 0.500" (W) x 0.300" (H) SMD (ref. Figure 1)

Process Compatibility:

Solderability: This filter shall be constructed utilizing Sn10 high temperature solder throughout its construction and shall support automated assembly processing, including reflow soldering. Reference the recommended maximum reflow profile (Figure 2)

Post Reflow Wash: This filter shall be solder sealed and shall be compatible with post reflow aqueous and non-aqueous wash processes.

Conformal Coating Compatibility: This filter shall meet all performance requirements after a conformal coating is applied.



Note 1: The Gull Wing Input & output Pins and Bottom Surface of the Package Shall be Coplanar to Within $\pm 0.005^\circ$
 Note 2: All Dimensions are in inches. Unless Otherwise Cited all Tolerances are: .xxx ± 0.02 ; .xxxx ± 0.010
 Note 3: Dimensions for the filter's overall length, Width and Height are all Maximums

Figure 1: Package Outline Drawing

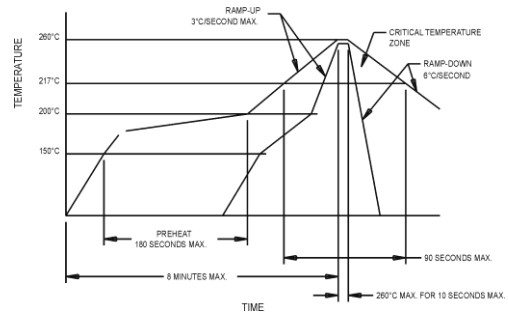
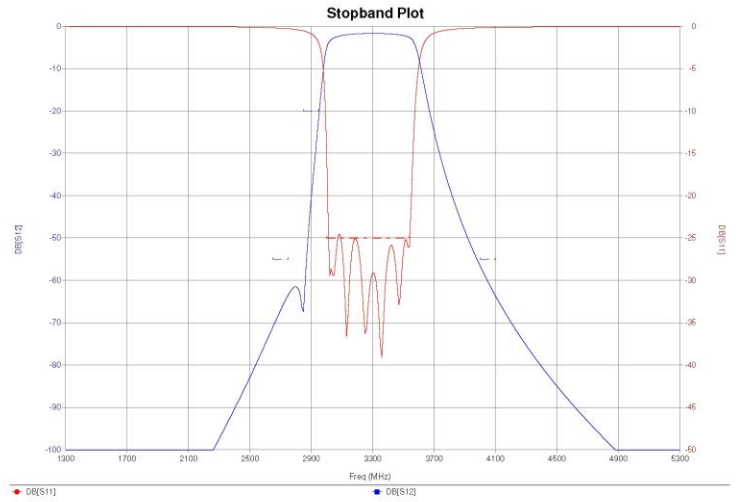
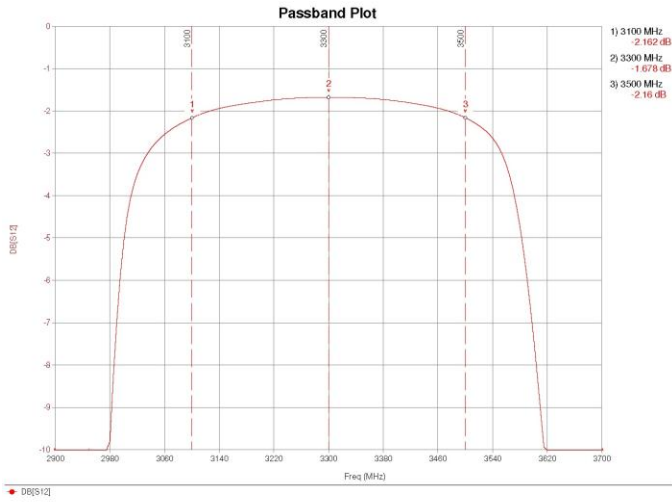


Figure 2: Maximum Reflow Profile

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III. Design Simulation Plots:



IV. Data Sheet Revision Table:

Date	Rev.	Author	Details of Revision
11/08/12	0	BRM	Initial Release.