



PRODUCT SPECIFICATION

REV A January 2011

Oscilent Controlled Document

Ordering Code / Part Number	Product Description
813-SL147.0M-04A	147MHz IF SAW Filter 4.0 MHz Bandwidth

Specification Contents

- o Mechanical Dimensions
- o Test Circuit
- o Maximum Ratings
- o Electrical Specification
- o Frequency Response

Notes

- o Electrostatic Sensitive Device (ESD) 
- o Avoid excessive ultrasonic exposure
- o Solderability compatible with JEDEC J-STD-020C Pb-free process, 260°C peak reflow temperature
- o This product complies with EU directive 2002/95/EC (RoHS compliance)



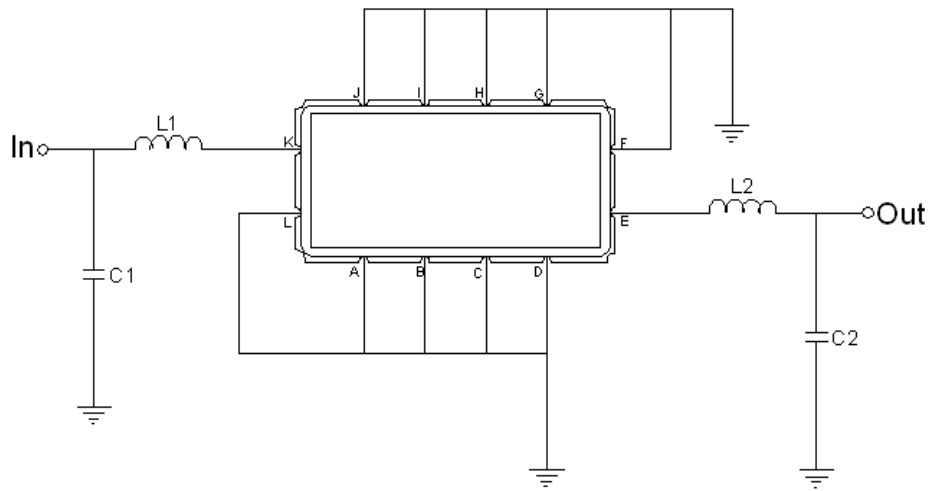


Mechanical Dimensions (mm)



Pin Description	
A, B, C, D, F, G, H, I, J, L	Ground
K	Input
E	Output

Test Circuit



Test Fixture & Values	
Input	L1=4.7+33 nH, C1=47 pF
Output	L2=39 nH, C2=36 pF
Source/Load Impedance	50 Ω

**Maximum Ratings**

Parameters Description	Unit	Minimum	Typical	Maximum
Operating Temperature Range	°C	0	-	80
Storage Temperature Range	°C	-40	-	55
Maximum DC Voltage	V	-	-	10
Maximum Input Power	dBm	-	-	10
Source Impedance (single ended) ⁽¹⁾	Ω	-	50	-
Load Impedance (single ended) ⁽¹⁾	Ω	-	50	-

Notes: With Matching Network (Ref. Testing Environment Circuit as shown above).

Those impedances could be modified with different impedance values and/or structures, if necessary.

Electrical Specification

Parameters Description	Unit	Minimum	Typical	Maximum
Center Frequency (Fo)	MHz	146.6	147.0	147.4
Insertion Loss at Fo	dB	-	10.8	12.5
Amplitude Ripple Variation at Fo ± 1.6 MHz	dB _{p-p}	-	0.4	1.0
Group Delay Variation at Fo ± 1.6 MHz	ns	-	60	100
Absolute Delay at Fo	μs	-	0.96	-
Temperature Coefficient	ppm/°C	-	-20	-
Bandwidth at -1.0 dB	MHz	3.5	4.0	-
Bandwidth at -3.0 dB	MHz	4.6	4.9	-
Bandwidth at -40.0 dB	MHz	-	7.5	9.0
Relative Attenuation				
Lower Sidelobe	dB	42	45	-
Upper Sidelobe	dB	42	45	-



Frequency Response

