



REV A January 2011

Oscilent Controlled Document

Ordering Code / Part Number	Product Description
813-SL75.0M-10B	75.0 MHz IF SAW Filter 10.17 MHz Bandwidth

Specification Contents

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

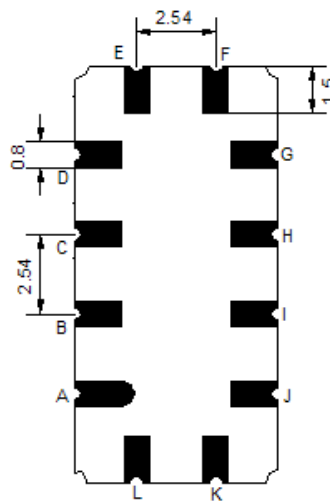
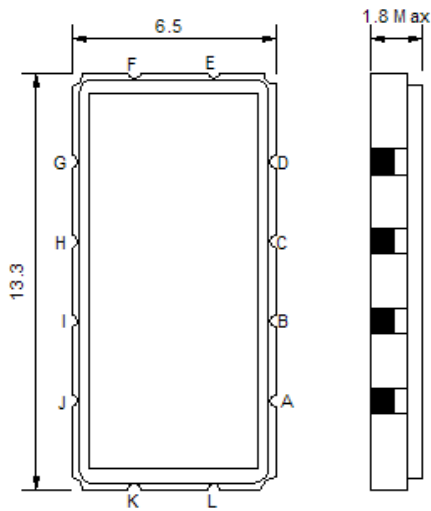
Notes

- 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)



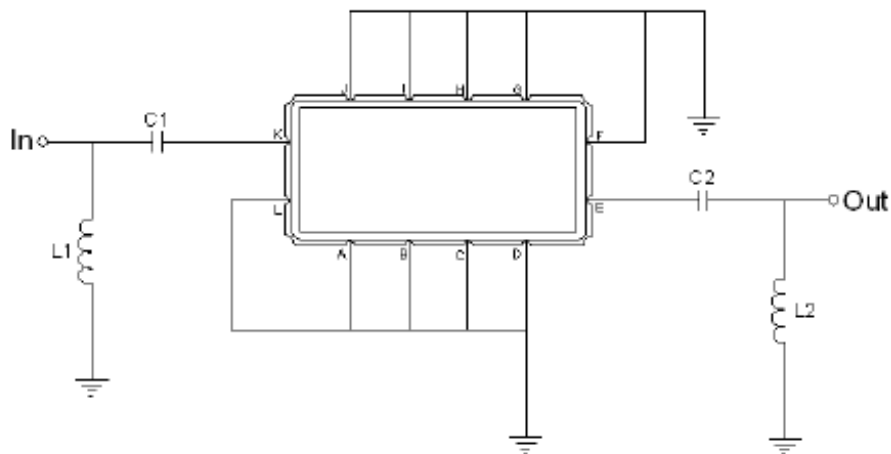


Mechanical Dimensions (mm)



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

Test Circuit



Test Fixture & Values	
Input	L1 = 82 nH, C1 = 200 pF
Output	L2 = 68 nH, C2 = 200 pF
Source/Load Impedance	50 Ω

**Maximum Ratings**

Parameters Description	Unit	Minimum	Typical	Maximum
Operating Temperature Range	°C	-20	-	60
Storage Temperature Range	°C	-40	-	85
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.

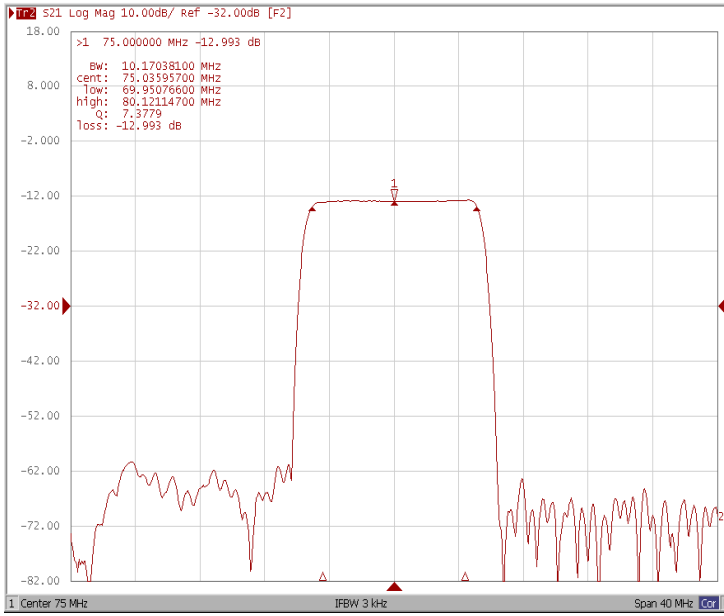
Electrical Specification

Parameters Description	Unit	Minimum	Typical	Maximum
Center Frequency (Fo)	MHz	-	75.0	-
Insertion Loss at Fo	dB	-	13.0	15.0
Group Delay Variation at Fo ± 4.42 MHz	nsec	-	35	60
Absolute Delay at Fo	usec	-	1.55	-
Passband Ripple Variation at Fo ± 4.42 MHz	dB	-	0.3	0.8
Bandwidth at -1dB	MHz	9.80	10.17	-
Bandwidth at -3dB	MHz	-	10.64	-
Bandwidth at -30dB	MHz	-	12.28	-
Bandwidth at -40dB	MHz	-	12.53	12.80
Ultimate Rejection	dB	43	48	-
Temperature Coefficient	ppm/°C	-	-86	-

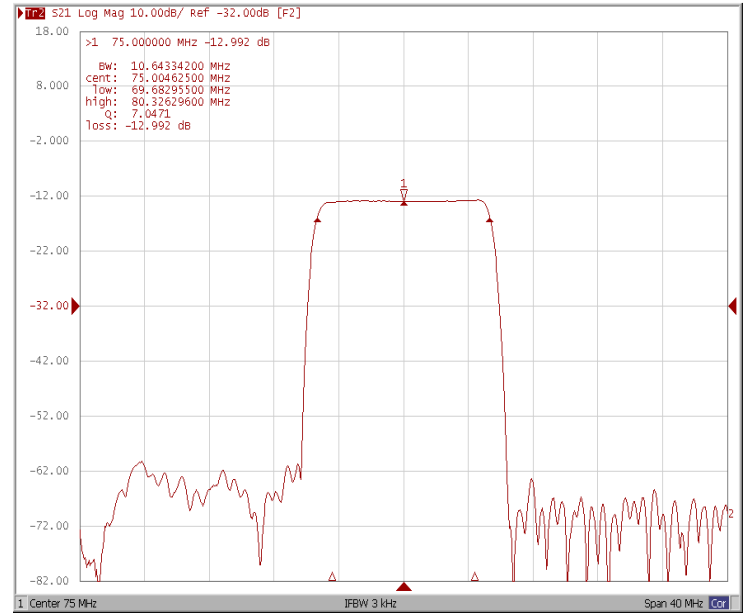


Frequency Response

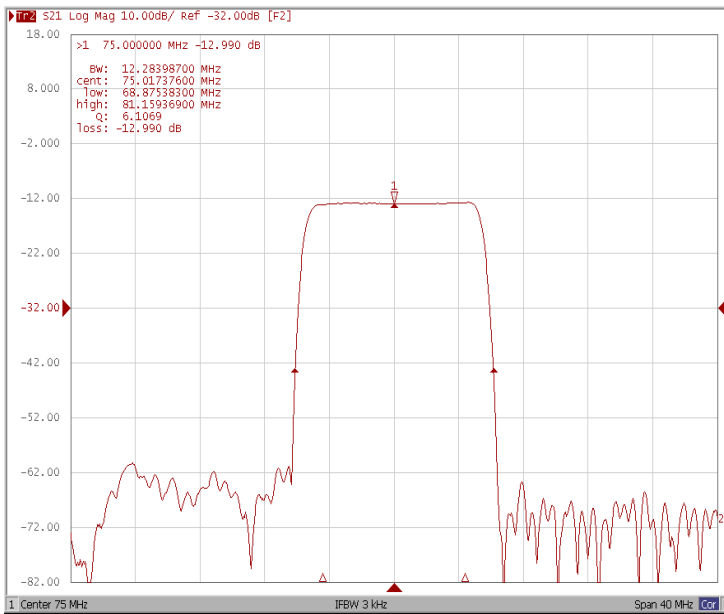
Bandwidth at -1.0 dB



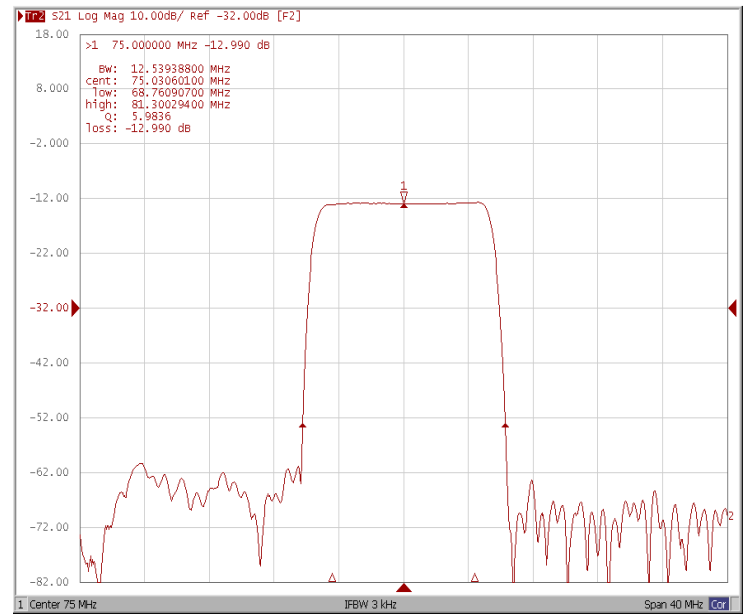
Bandwidth at -3.0 dB



Bandwidth at -30 dB

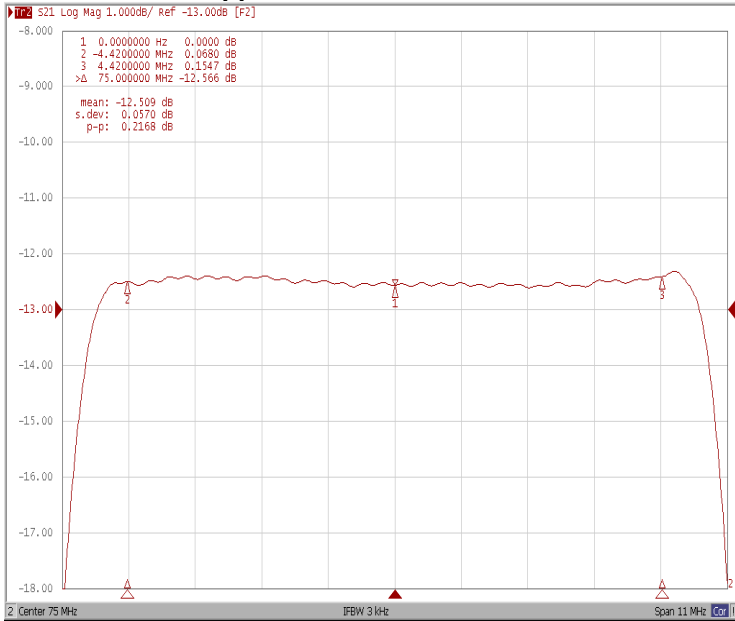


Bandwidth at -40 dB

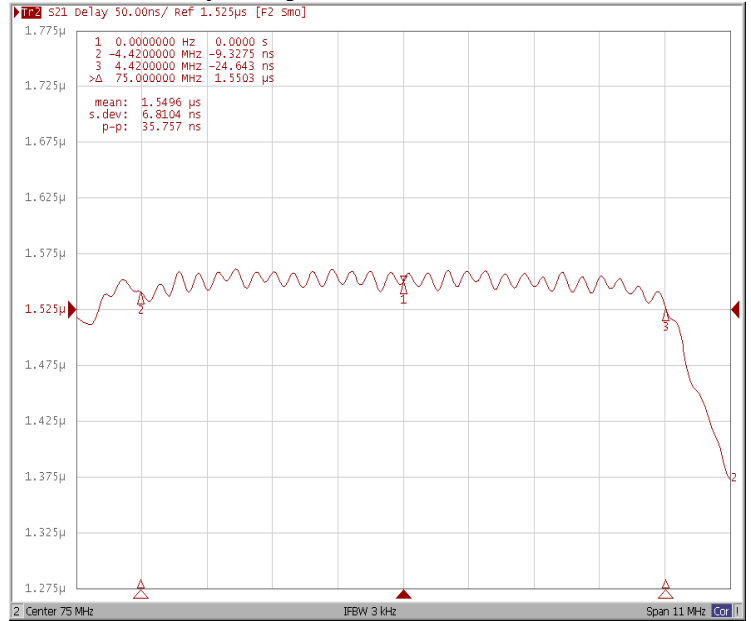




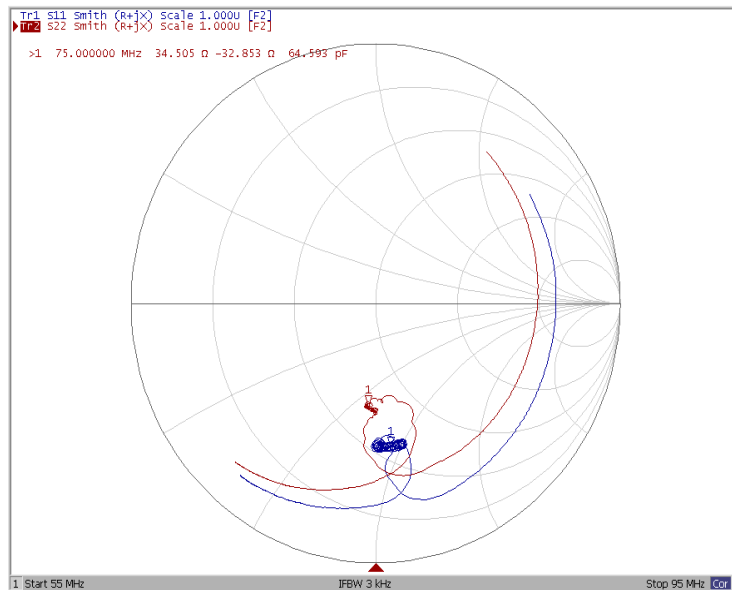
Ripple Variation Fo±4.42 MHz



Group Delay Variation Fo±4.42 MHz



Smith Chart





VSWR

