# **Preliminary**

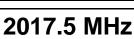


- Low-loss SAW Filter
- No Matching Required for 50 ohm Operation
- Excellent Out-of-band Rejection
- 1.45 x 1.15 mm Surface-Mount Case
- Complies with Directive 2002/95/EC (RoHS)

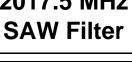


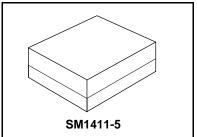
**Absolute Maximum Ratings** 

- to o o to					
Rating	Value Units				
Maximum Incident Power in Passband	+10	dBm			
Maximum DC Voltage On any Non-ground Terminal	3	VDC			
Operating Temperature Range	-30 to +85	°C			
Storage Temperature Range in Tape and Reel	-40 to +85	°C			
Maximum Soldering Temerature Profile (5 cycles maximum)	265 °C for 10 s				



**SF2213K** 





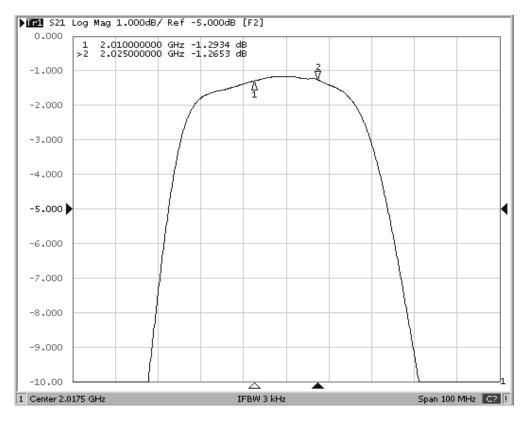
#### **Electrical Characteristics**

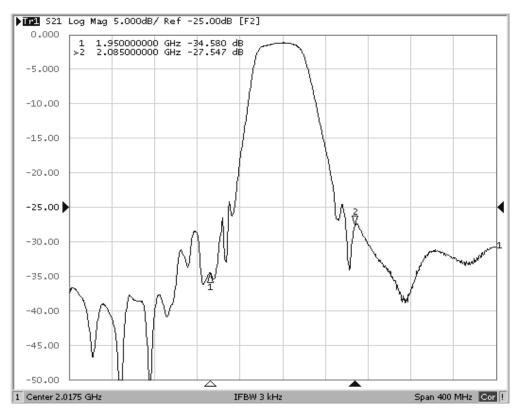
Characteristic	Sym	Notes	Min	Тур	Max	Units
Center Frequency	f <sub>C</sub>			2017.5	•	MHz
Insertion Loss, 2010 to 2025 MHz	IL <sub>MAX</sub>			1.3	2.1	dB
Amplitude Ripple, 2010 to 2025 MHz				0.2	1.0	dB <sub>P-P</sub>
Rejection Referenced to 0 dB						
1 to 1020 MHz			26	29		
1220 to 1570 MHz			20	30		
1570 to 1590 MHz			30	32		
1590 to 1820 MHz			20	34		
1820 to 1850 MHz			31	36		
1850 to 1950 MHz			20	28		
2085 to 2400 MHz			19	27		dB
2400 to 2430 MHz			29	32		
2430 to 2790 MHz			25	32		
2790 to 2820 MHz			30	36		
2820 to 3000 MHz			25	38		
3000 to 4010 MHz			20	36		
4010 to 4060 MHz			25	35		
4060 to 6000 MHz			10	25		
VSWR, 2010 to 2025 MHz				1.2 :1	1.9:1	
Terminating Source impedance	Z <sub>S</sub>			50		Ω
Terminating Load impedance	Z <sub>L</sub>			50		Ω
Case Style		SM1411-5				
Lid Symbolization (V = week character)		8V				

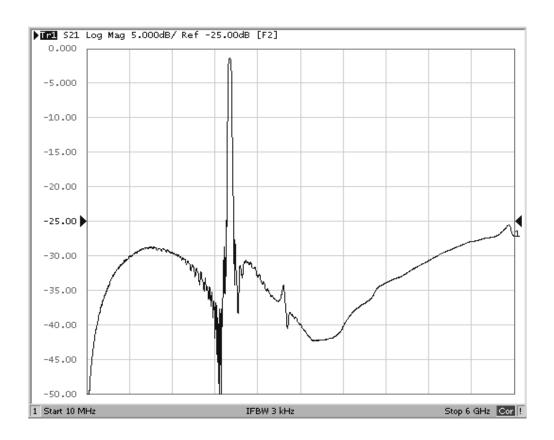
**CAUTION: Electrostatic Sensitive Device. Observe precautions for handling.** Notes:

- US and international patents may apply. RFM, stylized RFM logo, and RF Monolithics, Inc. are registered trademarks of RF Monolithics, Inc.

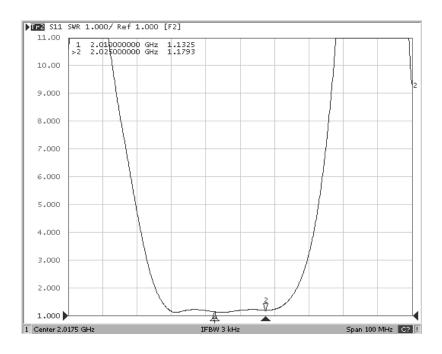
### **Frequency Response Plots**



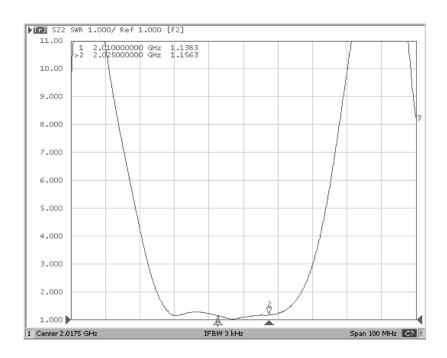




### **Input VSWR**



## **Output VSWR**



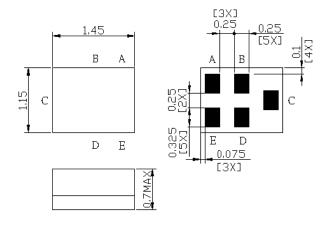
## **SM1411-5 Case**

## 5-Terminal Surface-Mount Case 1.45 X 1.15- mm Nominal Footprint

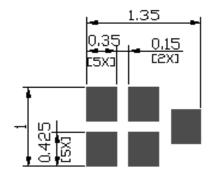
#### **Electrical Connections**

Connection	Terminals		
Input	С		
Output	A		
Ground	B, D, E		

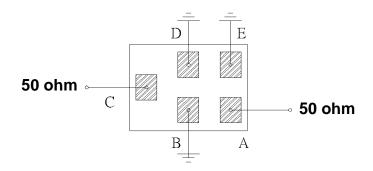
#### **Package Dimensions**



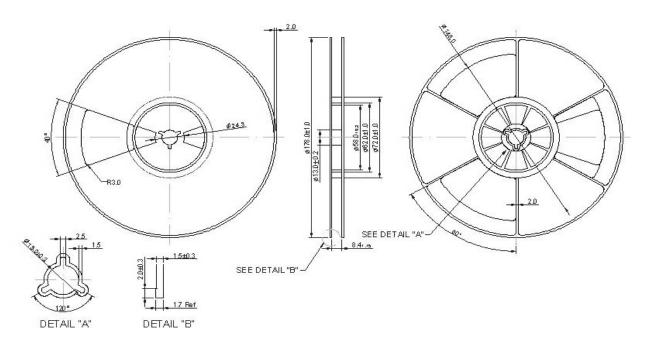
#### **Circuit Board Footprint**



#### **Test Circuit**



## Reel Dimensions - 7 inch Reel, 3000 Filters



## **Tape Dimensions**

