SAW Filter

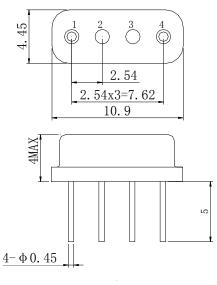
Application

- Low-loss SAW component
- Low amplitude ripple
- Sharp rejections at both out-bands
- Usable passband 0.2 MHz

Features

- **RoHS** compatible
- Package size 10.9x4.45x5.00mm³
- Package Code SC04-06
- Electrostatic Sensitive Device(ESD)

Package Dimensions (Unit: mm)





Test Circuit

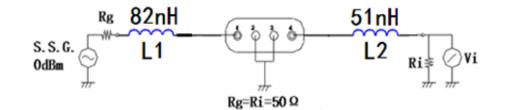
Pin Configuration

Pin No.	Description
1	Input
4	Output
2,3	Case Ground

Marking Description

	R	Trademark&	
RF		Manufacturer	
	F	SAW Filter	
1008	Part Number		
	Pin 1		
YYWW	Year Code & Week Code		

*Fig: If the products produced in 06th week of 2015, The year code & week code is 1506.



Performance

Maximum Rating

Item		Value	Unit
DC Voltage	V _{DC}	3	V
Operation Temperature	т	-40 ~ +85	°C
Storage Temperature	T _{stg}	-55 ~ +125	°C
RF Power Dissipation	Р	15	dBm

Electronic Characteristics

Test Temperature: 25℃±2℃

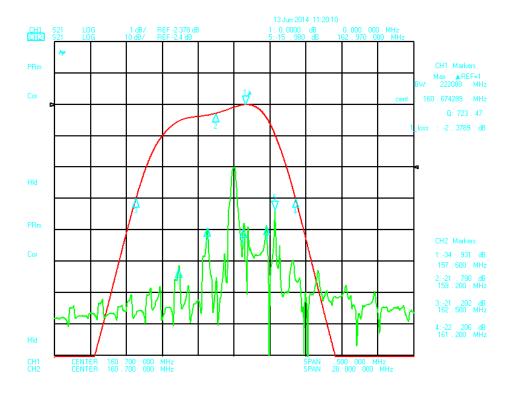
Terminating source impedance: 50Ω

Terminating load impedance: 50Ω

Item		Minimum	Typical	Maximum	Unit
Center Frequency	fc		160.70		MHz
Insertion Loss(min)	IL		2.3	4.0	dB
Amplitude Ripple (p-p)	∆a		0.5	1.0	dB
3 dB Bandwidth	BW3dB	0.18	0.2		MHz
Absolute Attenuation	α				
DC-155.70 MHz		50.0	55.0		dB
155.70-157.60 MHz		30.0	32.0		dB
159.20 MHz		18.0	21.0		dB
161.20 -162.50 MHz		16.0	18.0		dB
162.97.00 MHz			15.0		dB
163.50 -170.70 MHz		28.0	30.0		dB
170.70 -210.70 MHz		40.0	45.0		dB

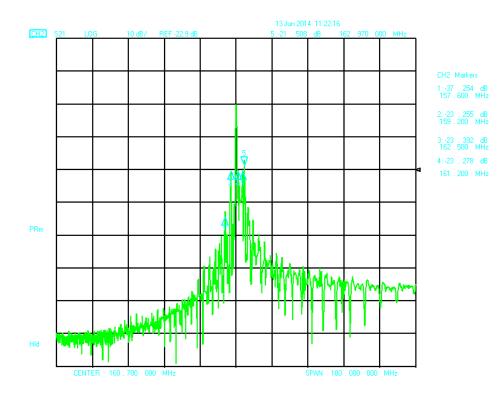
SAW Filter

Frequency Characteristics



Frequency Response

Frequency Response (wideband)



REYCONNS CHINA LIMITED

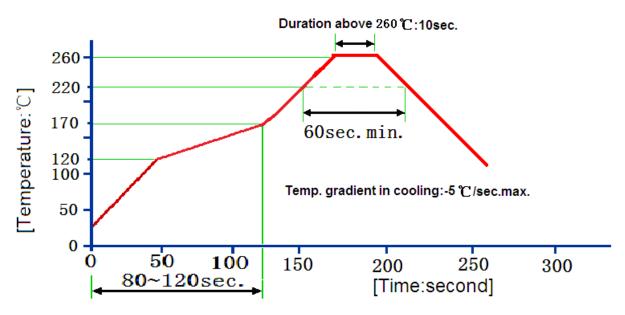
SAW Filter

RF1008

Reliability (The SAW components shall remain electrical performance after tests)

No.	Test item	Test condition	
1	Temperature Storage	 (1) Temperature: 85℃±2℃, Duration: 250h, Recovery time: 2h±0.5h (2) Temperature: -55℃±3℃, Duration: 250h, Recovery time: 2h±0.5h 	
2	Humidity Test	Conditions: $60^{\circ}C \pm 2^{\circ}C$, $90 \sim 95\%$ RHDuration: 250h	
3	Thermal Shock	Heat cycle conditions: TA=-55℃±3℃, TB=85℃±2℃, t1=t2=30min, Switch time: ≤3min, Cycle time: 100 times, Recovery time: 2h±0.5h.	
4	Vibration Fatigue	Frequency of vibration: 10~55HzAmplitude:1.5mmDirections: X,Y and ZDuration: 2h	
5	Drop Test	Cycle time: 10 times Height: 1.0m	
6	Solder Ability Test	Temperature: 245 °C ±5 °C Duration: 3.0s5.0s Depth: DIP2/3 , SMD1/5	
7	Resistance to Soldering Heat	 (1)Thickness of PCB:1mm , Solder condition: 260°C±5°C , Duration: 10±1s (2)Temperature of Soldering Iron: 350°C±10°C , Duration: 3~4s , Recovery time : 2 ± 0.5h 	

Recommended Reflow Soldering Diagram



Reflow cycles:3 cycles max.

Notes

- 1. As a result of the particularity of inner structure of SAW products, it easy to be breakdown by electrostatic, so we should pay attention to **ESD protect** in the test.
- 2. **Static voltage** between signal load and ground may cause deterioration and destruction of the component. Please avoid static voltage.
- 3. **Ultrasonic cleaning** may cause deterioration and destruction of the component. Please avoid ultrasonic cleaning.
- 4. Only leads of component may **be soldered**. Please avoid soldering another part of component.
- 5. There is a close relationship between the device's performance and **matching network**. The specifications of this device are based on the test circuit shown above. L and C values may change depending on board layout. Values shown are intended as a guide only.