

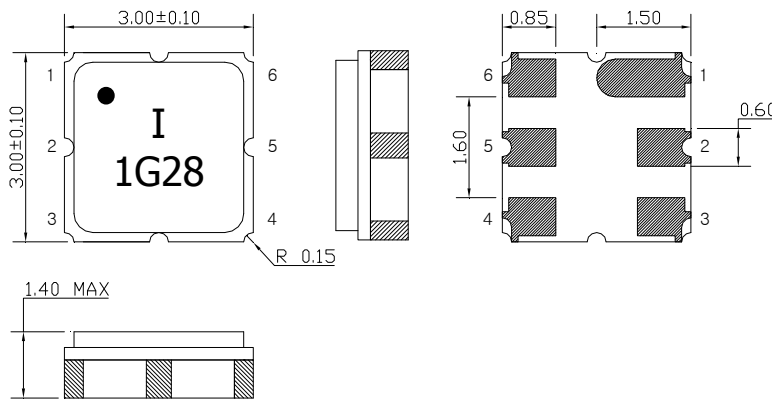
# SAW Bandpass Filter F1G28



## Features

- RF bandpass filter
- Usable bandwidth 62.0 MHz
- Ceramic Surface Mounted Device (SMD) Package (3.0mm × 3.0mm)
- RoHS/RoHS2 (2015/863/EU) Compliant
- This part is compliant with AEC-Q200

## Package Dimensions



Dimensions shown are nominal in millimeters

Body : Al<sub>2</sub>O<sub>3</sub> Ceramic

Lid : Kovar, Ni Plated

Terminations : Au plating 0.3 ~ 1.0 um, Over a 1.27 ~ 8.89 um  
Ni Plating

Pin Configuration	
2	Input
5	Output
1, 3, 4, 6	Ground

## Maximum Ratings

Parameter	Unit	Minimum	Typical	Maximum
Operating Temperature Range	°C	-40	25	110
Storage Temperature Range	°C	-45	-	125
Power Handling Capability	dBm	-	-	10

Electrostatics Sensitive Device (ESD)

	<b>ITF Co., Ltd.</b> 102-901, 22, Samjak-ro, Ojeong-gu, Bucheon-si, Gyeonggi-do, Korea, 14501	Part No.	F1G28	
		Rev. Date	2019-07-22	
		Rev.	NRUG02-AS02	1/7

# SAW Bandpass Filter F1G28




## Specifications

Fc = 1253.0 MHz

		Minimum	Typical	Maximum
Center Frequency ( Fc )	MHz	-	1253.0	-
Insertion Loss				
1222.0 ~ 1245.0 MHz	dB	-	0.9	1.5
1266.0 ~ 1284.0 MHz		-	0.8	1.5
Amplitude Ripple				
1222.0 ~ 1245.0 MHz	dB	-	0.2	0.5
1266.0 ~ 1284.0 MHz		-	0.1	0.5
VSWR				
1222.0 ~ 1245.0 MHz	dB	-	1.7	2.0
1266.0 ~ 1284.0 MHz		-	1.8	2.0
Absolute attenuation				
~ 1190.0 MHz	dB	4	6	-
1320.0 MHz ~		5	7	-
Input/Output impedance	Ohm	-	50	-

### Notes :

- 1) All specifications are based on the matching schematic shown below, measured by Agilent Network analyzer and full 2 port calibration.
- 2) Electrical margin has been built into the design to account for the variations due to temperature drift and manufacturing tolerances

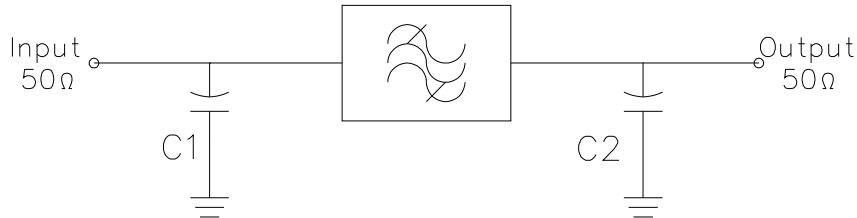
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## Matching Schematic

( Actual matching values may vary due to PCB layout and parasitics )



$$C1 = C2 = 0.5\text{pF}$$

## Marking Configuration


- <sup>1)</sup>  
I<sup>2)</sup>  
1G28<sup>3)</sup>

1) Pad Number 1 Index

2) Manufacturer name

3) Marking Number

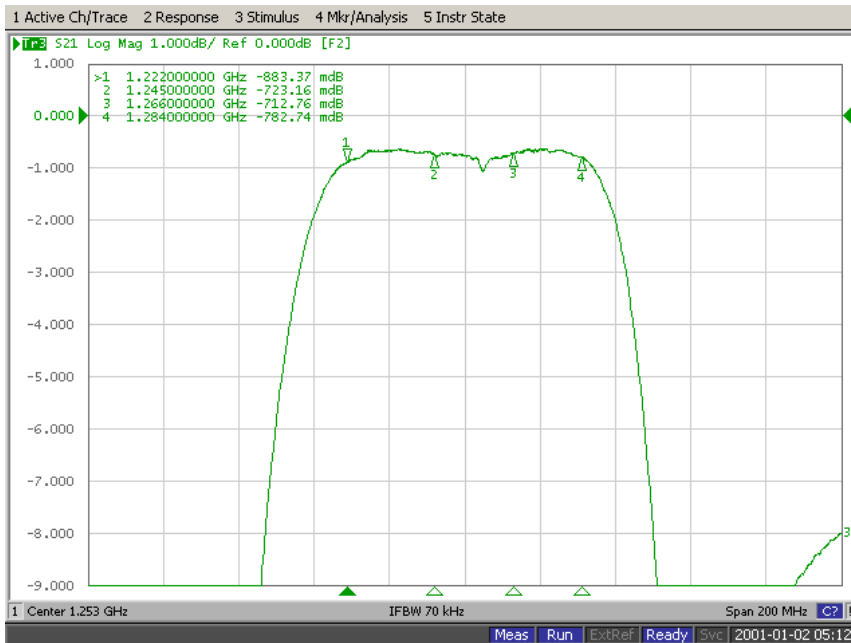
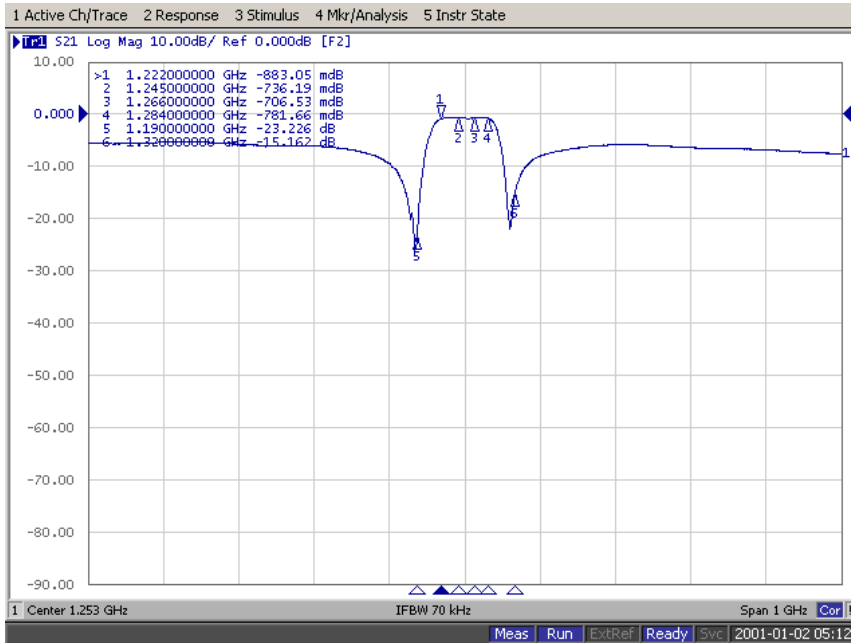
\* Ink or Laser Marking available

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## Typical Performance ( at 25°C )

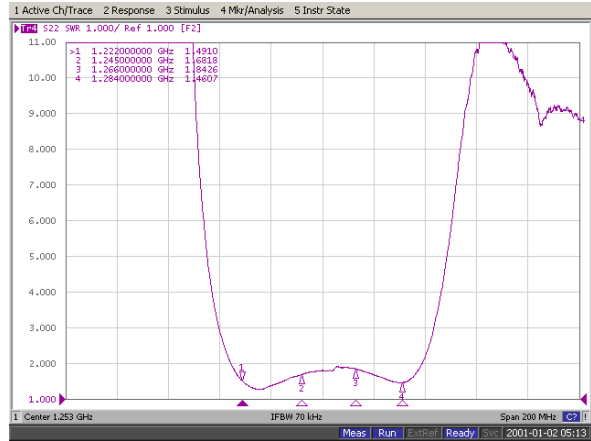
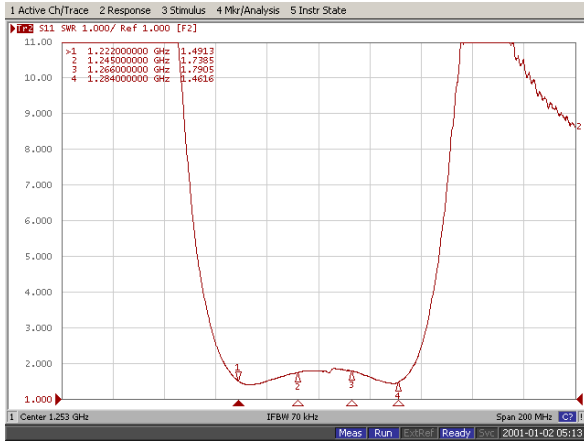


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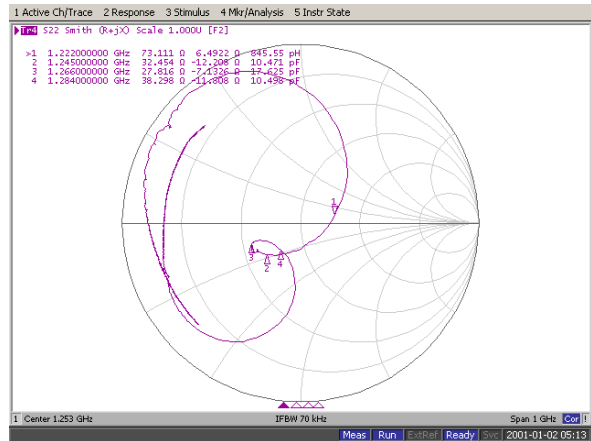
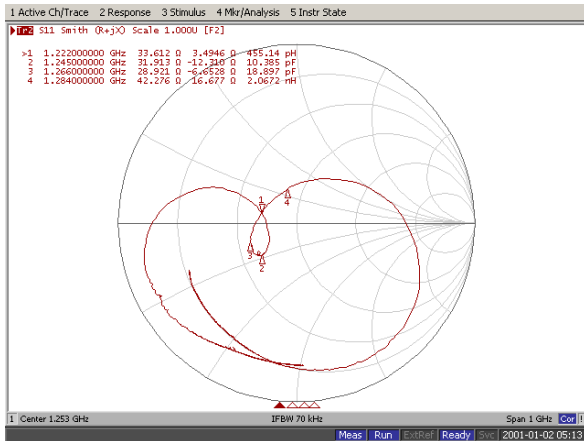
# SAW Bandpass Filter F1G28




## Input / Output VSWR Charts



## Input / Output Smith Charts



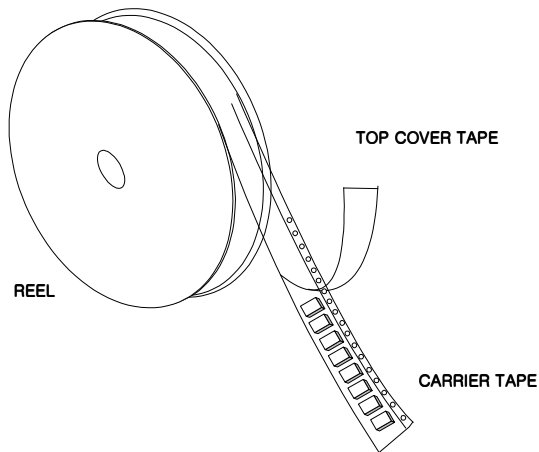
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# SAW Bandpass Filter F1G28



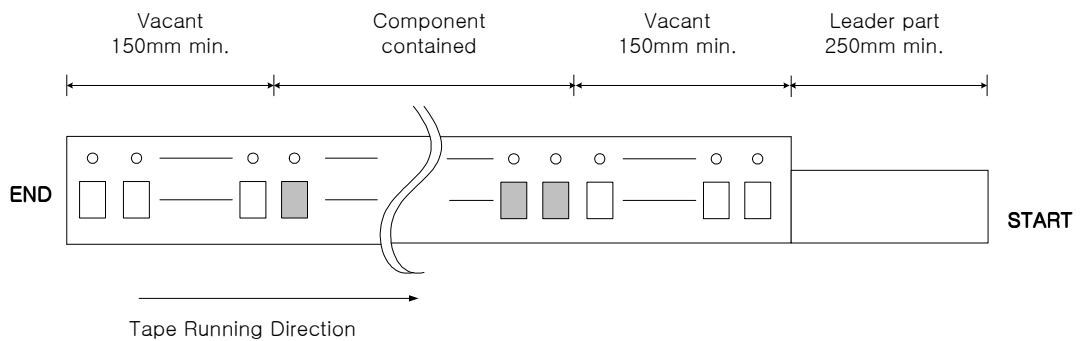
## Packing Specification

1. Reeling Quantity : 1000 pcs / reel
2. Taping Structure : The tape shall be wound around the reel in the direction shown below.



## Tape Specification

1. Leader part and vacant position specification

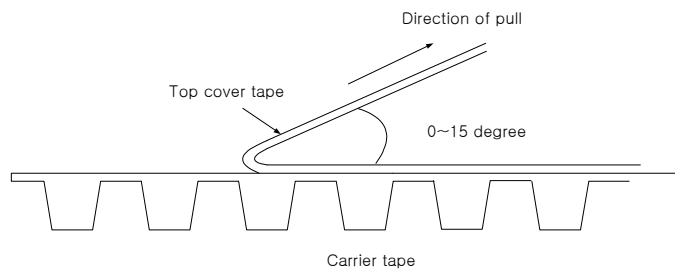


2. Tensile strength of carrier tape

4.4N/mm width

3. Top cover tape adhesion

- 1) pull off angle : 0~15°
- 2) speed : 300mm/min
- 3) force : 20~70g

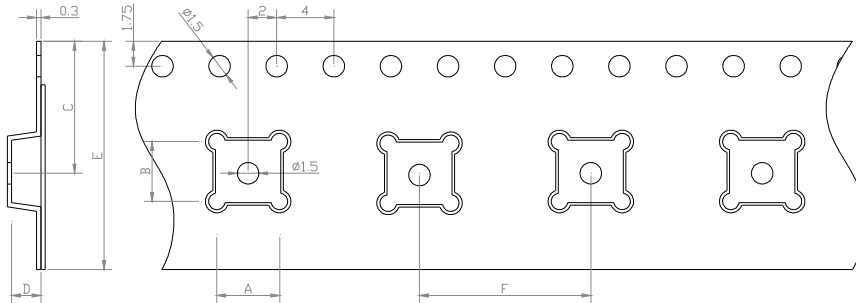


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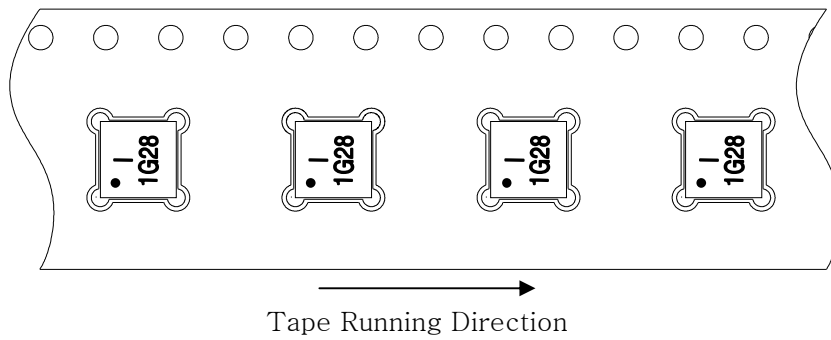


## Carrier Tape Dimensions [unit : mm]

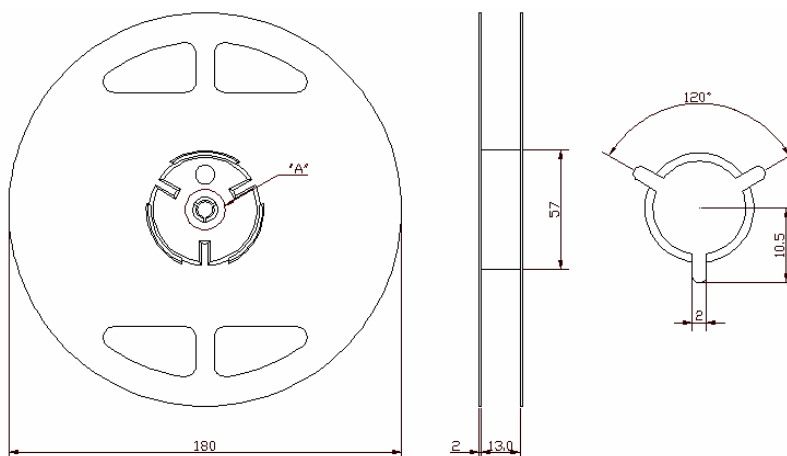


A	3.40 ± 0.1
B	3.40 ± 0.1
C	7.25 ± 0.1
D	1.70 ± 0.1
E	12.00 ± 0.1
F	8.00 ± 0.1

## Part Direction



## Reel Dimensions [unit : mm]



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