

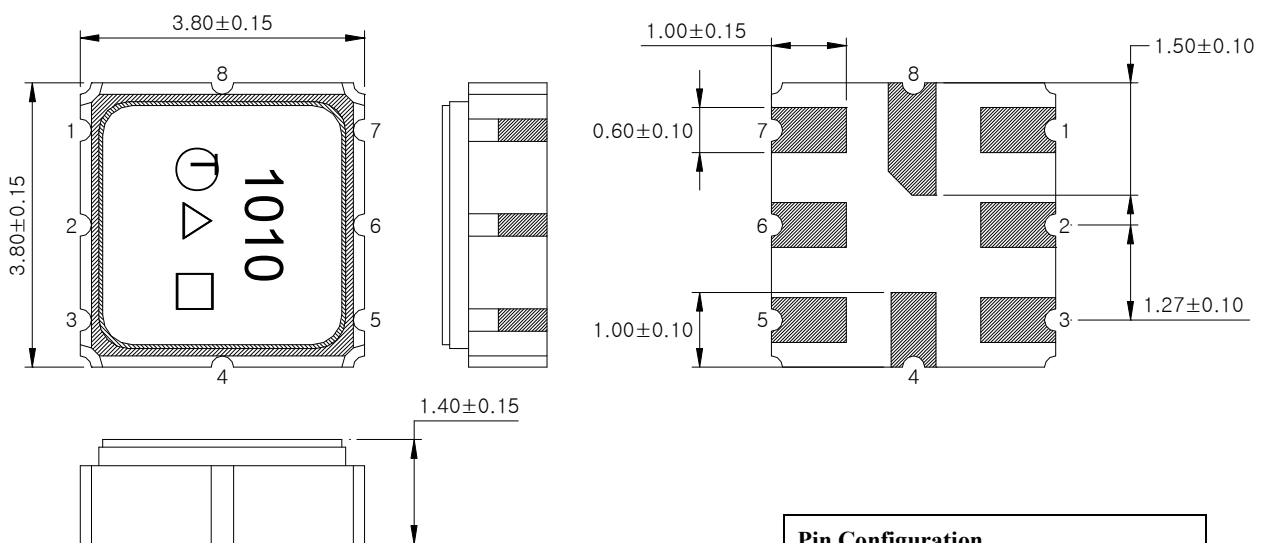
# SAW Bandpass Filter F4602



## Features

- RF bandpass filter
- High attenuation
- No matching 50Ω single-ended operation
- Ceramic Surface Mounted Device (SMD)
- RoHS Compliant

## Package Dimension



Dimensions shown are nominal in millimeters

Body :  $\text{Al}_2\text{O}_3$  Ceramic

Lid : Kovar, Ni Plated

Terminations : Au plating 0.3 ~ 1.0  $\mu\text{m}$ , Over a 1.27 ~ 8.89  $\mu\text{m}$   
Ni Plating

### Pin Configuration

2	Input
6	Output
1, 3, 4, 5, 7, 8	Case ground

## Maximum Ratings

Parameter	Unit	Minimum	Typical	Maximum
Operating Temperature Range	$^{\circ}\text{C}$	-30	25	60
Storage Temperature Range	$^{\circ}\text{C}$	-40	25	85
Power Handling Capability	dBm	-	-	10

Electrostatics Sensitive Device (ESD)

	<b>ITF Co., Ltd.</b> 102-901, Bucheon Technopark 364, Samjeong-Dong, Ojeong-Gu, Bucheon-City, Gyeonggi-Do, Korea 421-809	Part No.	F4602	
		Rev. Date	2016-10-21	
		Rev.	AS 02	1/7

# SAW Bandpass Filter F4602




## Specifications

Fc = 460 MHz

	Minimum	Typical	Maximum	Unit
Center Frequency ( Fc )	-	460	-	MHz
Insertion Loss (450 ~ 470 MHz)	-	2.6	3.2	dB
Amplitude Ripple (450 ~ 470 MHz)	-	1.2	2.4	dBp-p
Return Loss (450 ~ 470 MHz)	7	8.2	-	dB
Attenuation				
0.3 ~ 300 MHz	30	58	-	dB
300 ~ 380 MHz	24	56	-	
380 ~ 430 MHz	15	54	-	
504.825 ~ 524.825 MHz	12	44	-	
559.65 ~ 579.65 MHz	28	56	-	
669.3 ~ 689.3 MHz	24	54	-	
689.3 ~ 1000 MHz	26	44	-	
Input/Output Impedance		50		Ohms

### 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 )




## Marking Configuration

1010 <sup>1)</sup>  
Ⓡ <sup>2)</sup> △ <sup>3)</sup> □

- 1) Series Number
- 2) Date Code(Year)
- 3) Date Code(Month)

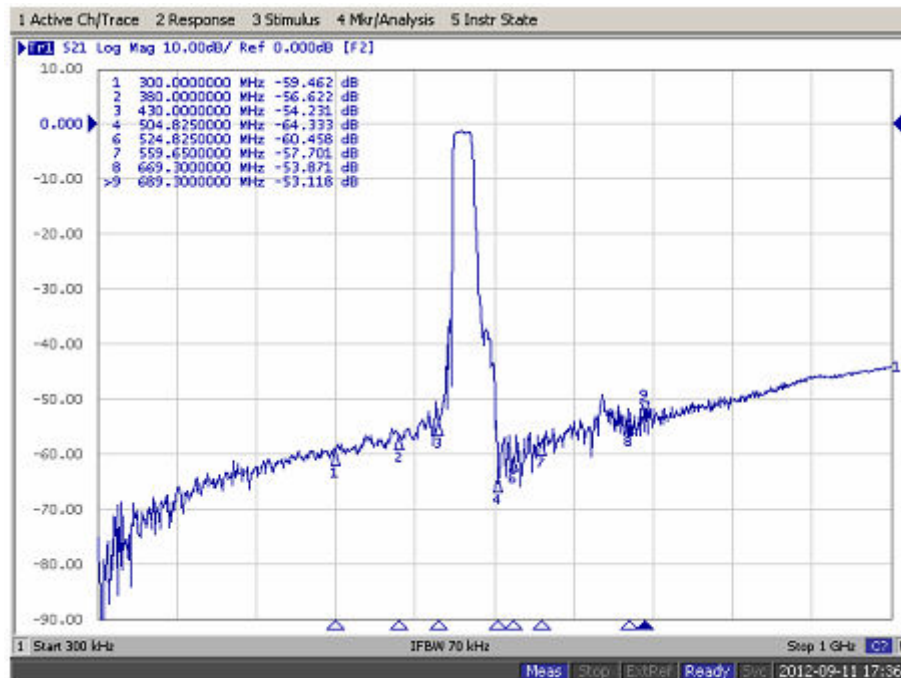
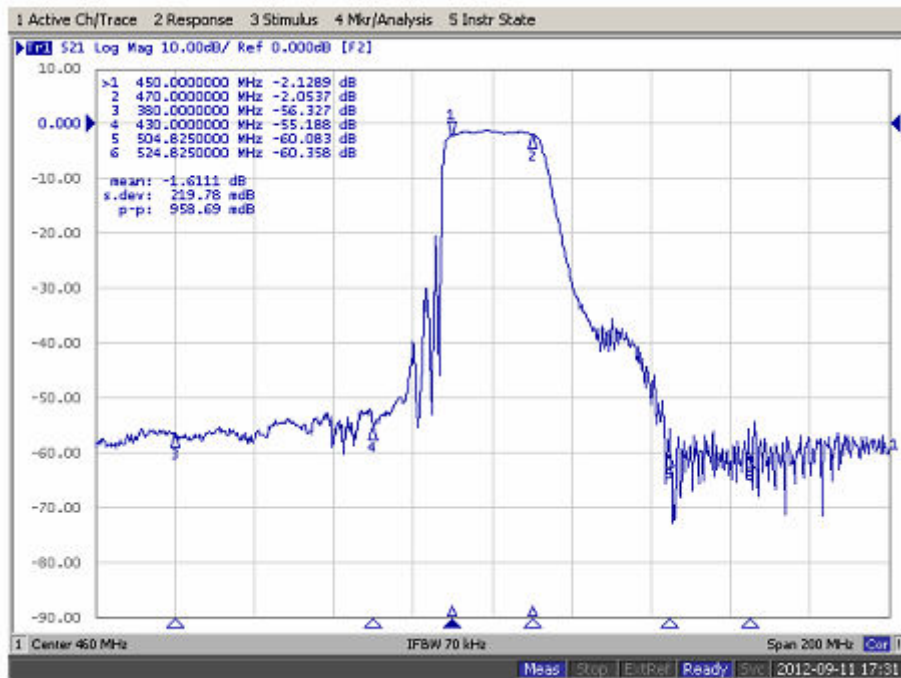
\* Ink or Laser Marking available

 Integrated Technology Future	<b>ITF Co., Ltd.</b> 102-901, Bucheon Technopark 364, Samjeong-Dong, Ojeong-Gu, Bucheon-City, Gyeonggi-Do, Korea 421-809	Part No.	F4602	
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## Typical Performance ( at 25 °C )

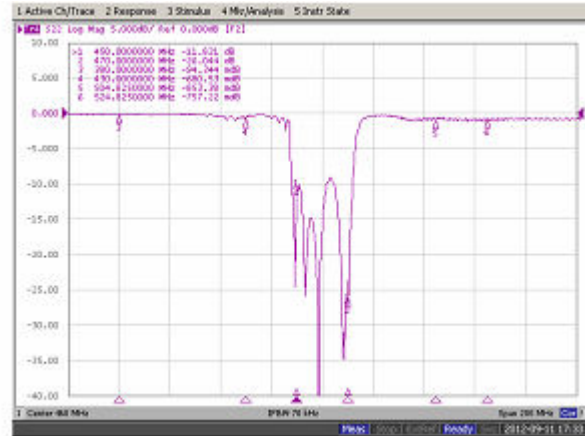
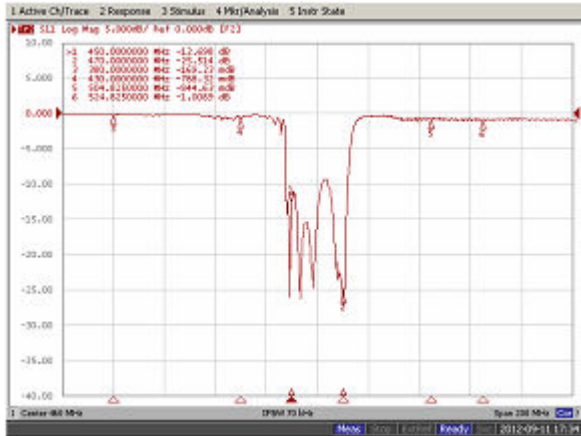


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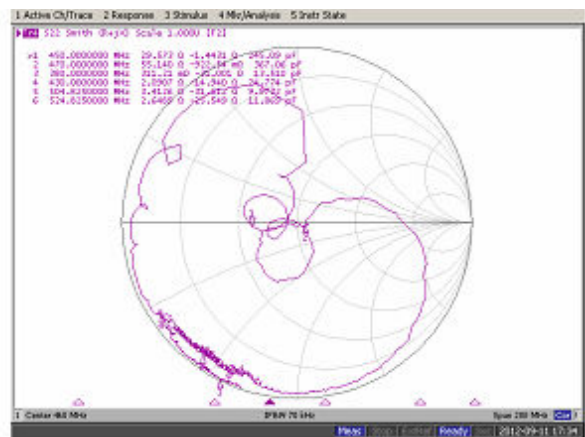
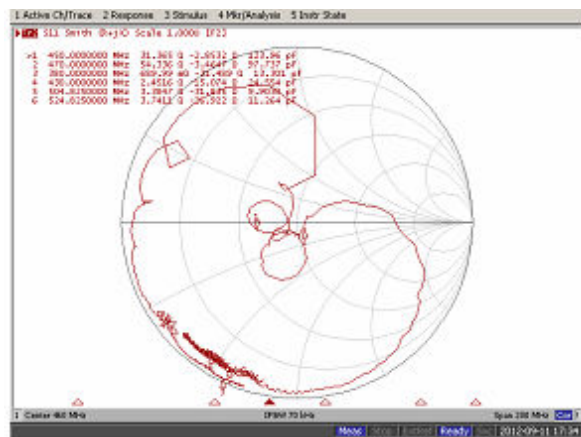
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## Input / Output VSWR Charts



## Input / Output Smith Charts



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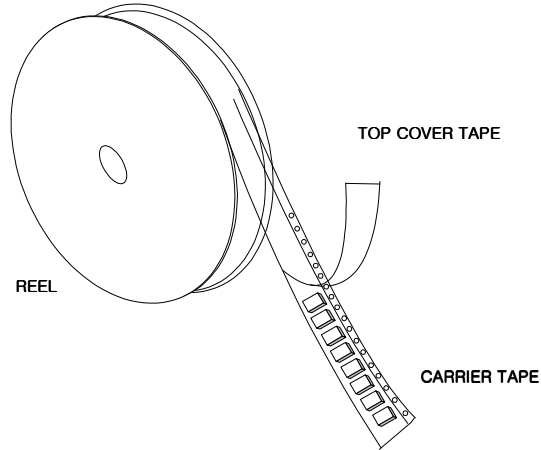
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## Packing Specification

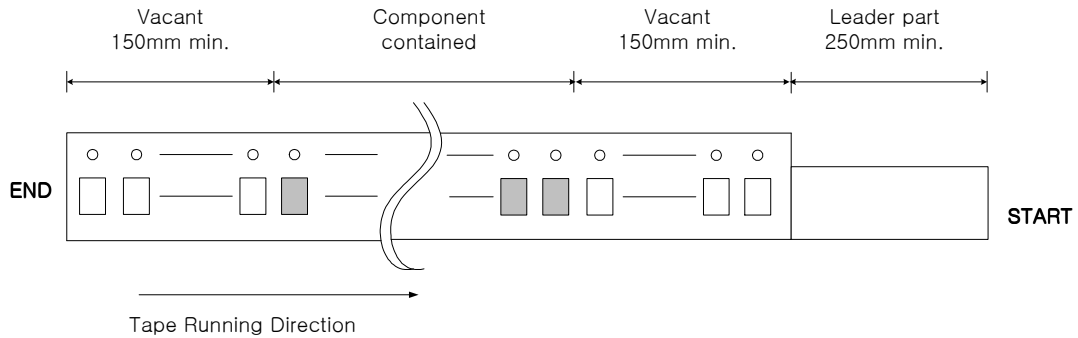
1. Reeling Quantity : 1000 pcs / reel

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

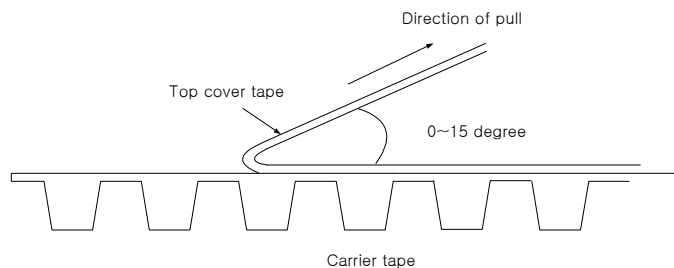
4.4N/mm width

3. Top cover tape adhesion

1) pull off angle : 0~15

2) speed : 300mm/min

force : 20~70g

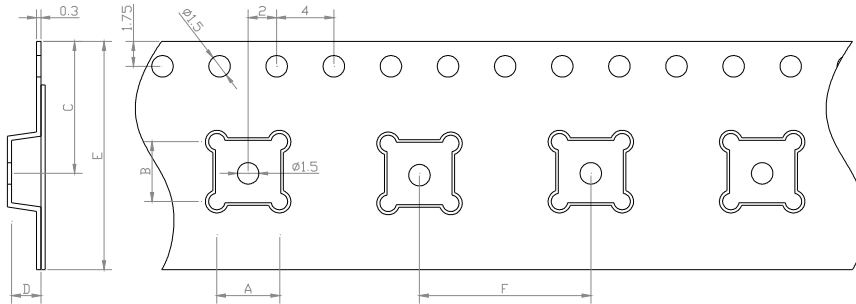


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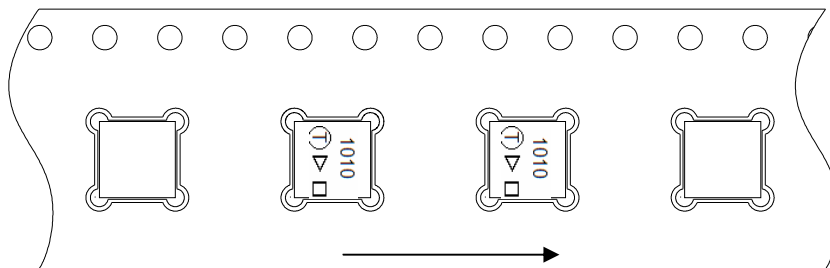


## Carrier Tape Dimensions [unit : mm]

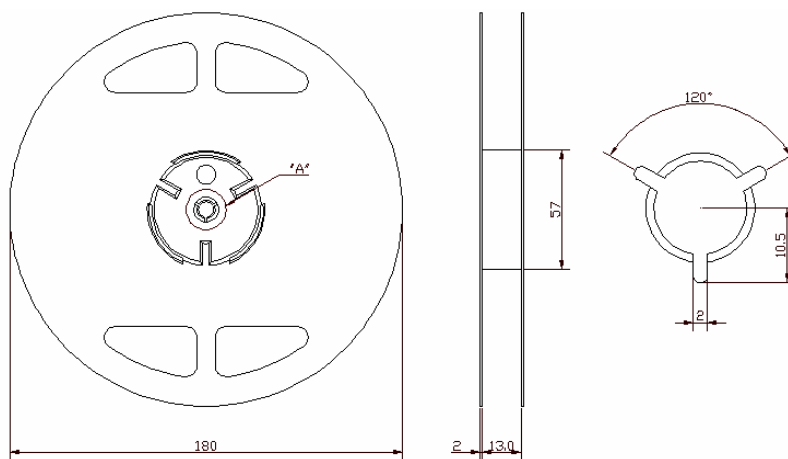


A	3.40 ± 0.1
B	3.40 ± 0.1
C	7.25 ± 0.1
D	1.70 ± 0.1
E	12.00 ± 0.1
F	8.00 ± 0.1

## Part Direction



## Reel Dimensions [unit : mm]



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