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**SAW Filter 138.0MHz****Model: TB0614A****Part No: MP01882****REV. NO.: 1**

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**A. MAXIMUM RATING:**

1. Operating temperature range: -10°C to 80°C
2. Storage temperature range: -40°C to 85°C

**B. CHARACTERISTICS:**

Item	Unit	Min.	Typ.	Max.
Center frequency, <b>F<sub>c</sub></b>	MHz	-	138	-
Insertion Loss, <b>IL</b>	dB	-	21.6	24
Upper -1dB frequency	MHz	173.6	174.8	-
Lower -1dB frequency	MHz	-	99.5	102.7
Upper -40dB frequency	MHz	-	182.8	184
Lower -40dB frequency	MHz	92	94.2	-
Ultimate rejection	dB	35	39	
Passband Ripple in 1.25 MHz BW	dB	-	0.35	0.5
Passband Ripple to 1dB frequencies	dB	-	1.0	1.5
Temperature Coefficient	ppm/°C	-	-72	-
Source Impedance (Balanced)	Ohm	-	50	-
Load Impedance (Balanced)	Ohm	-	50	-

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**C. FREQUENCY CHARACTERISTICS:**

(1) Narrow band Response:(span 200MHz)

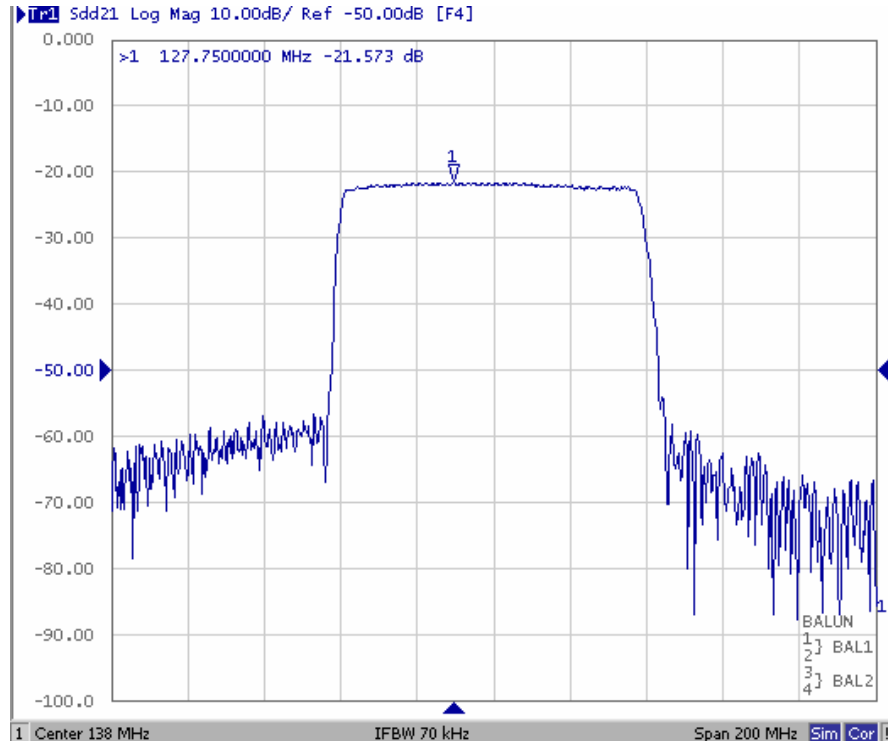


Fig1. Horizontal: 20MHz/Div Vertical: 10dB/Div

(2) Pass band Response and Group Time Delay response:

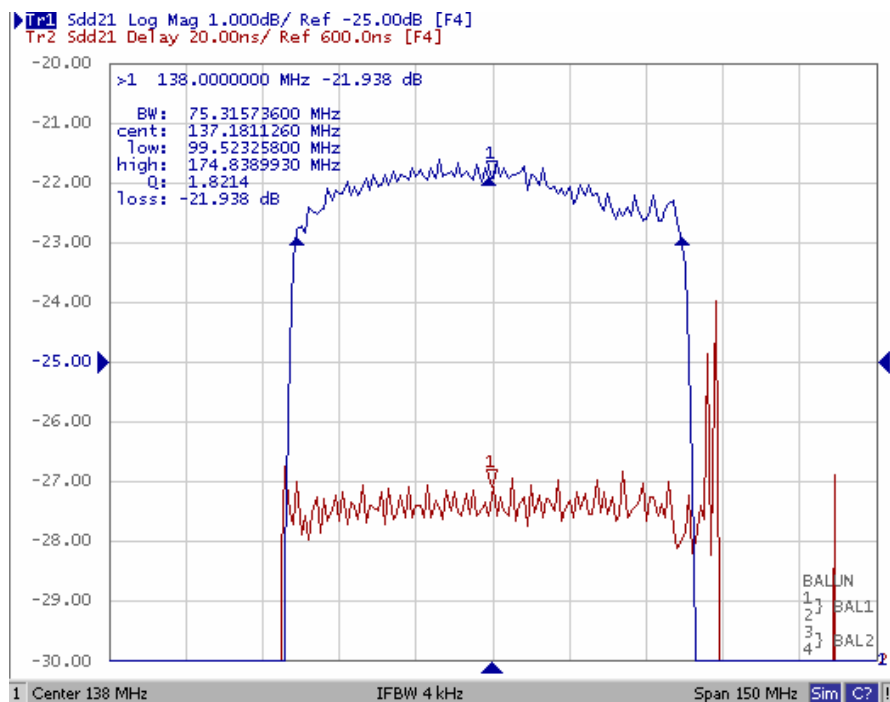


Fig2. Horizontal: 15MHz/Div Vertical: 1dB/Div. Vertical: 20ns/Div

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(3) Wide band Response:(span 600MHz)

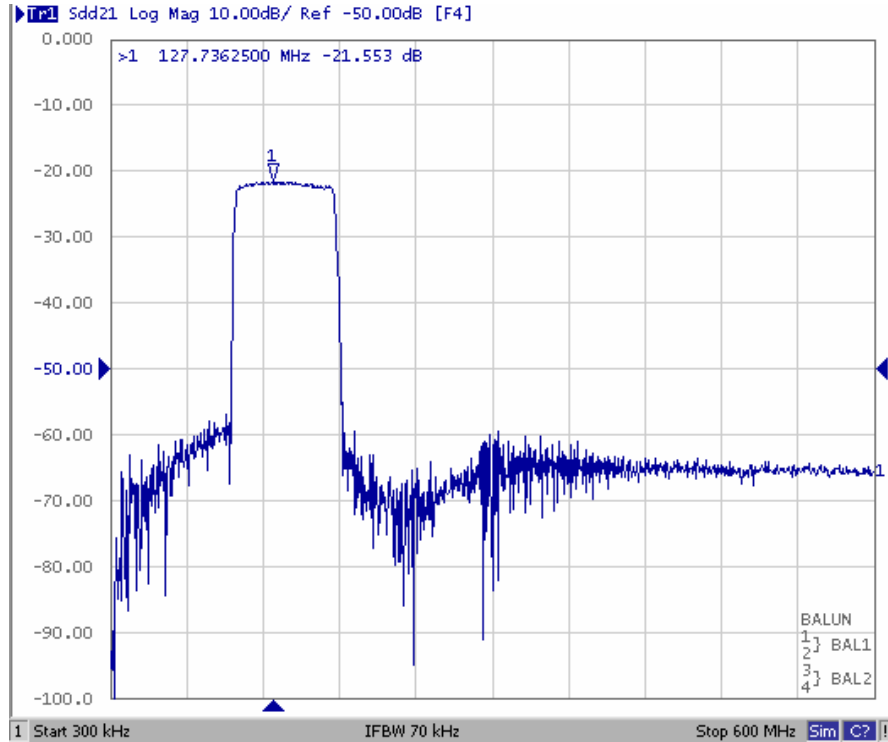


Fig3. Horizontal: 60MHz/Div Vertical: 10dB/Div

(4) Return Loss Response:(span 200MHz)

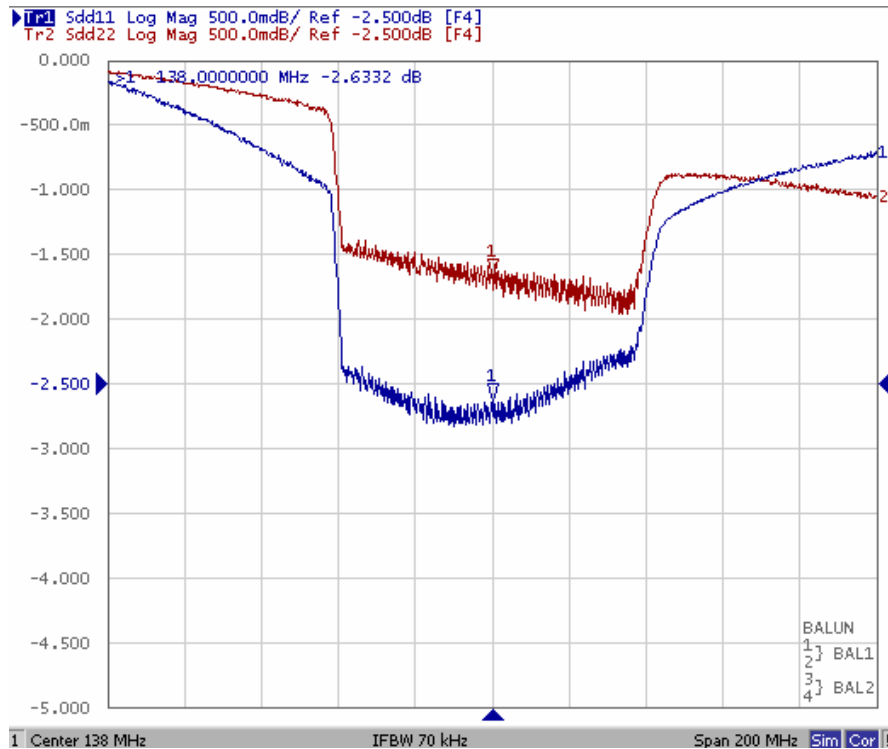
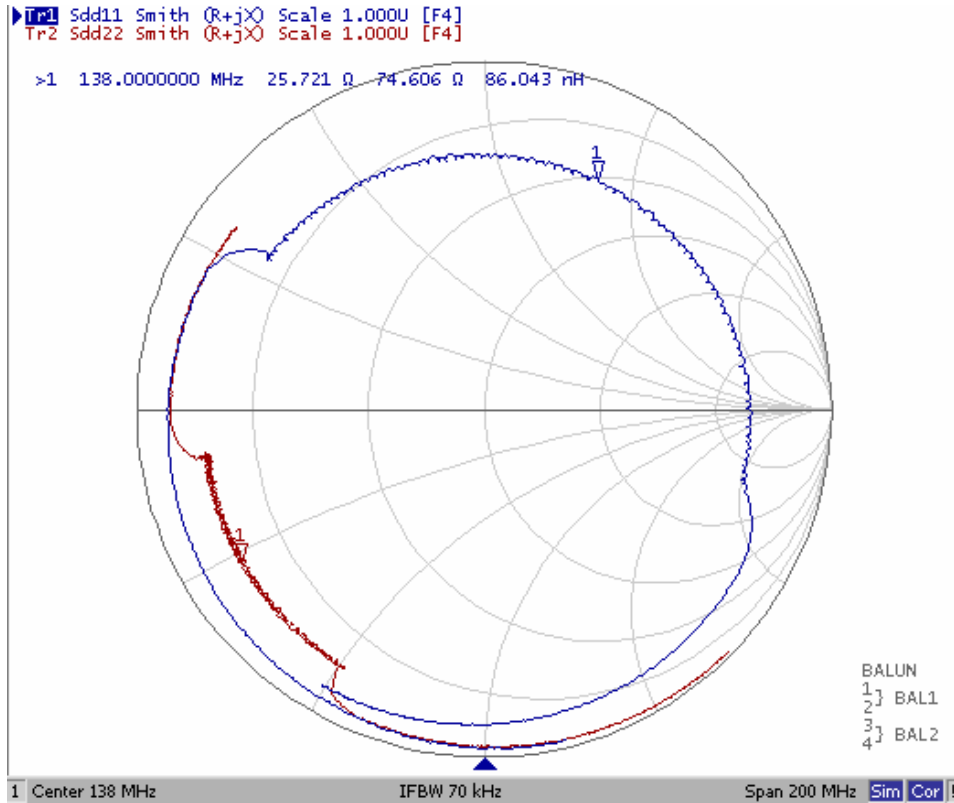


Fig4. Horizontal: 20MHz/Div Vertical: 0.5dB/Div

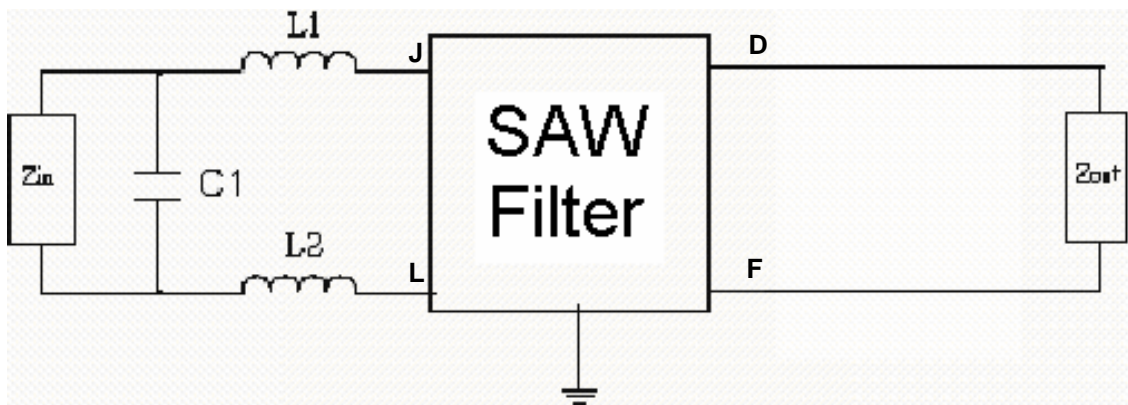
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(5) Smith Chart:



**D. Matching Circuit:**



**L1=L2=27nH C1=18pF**  
**Zin=50ohm Zout=50ohm**

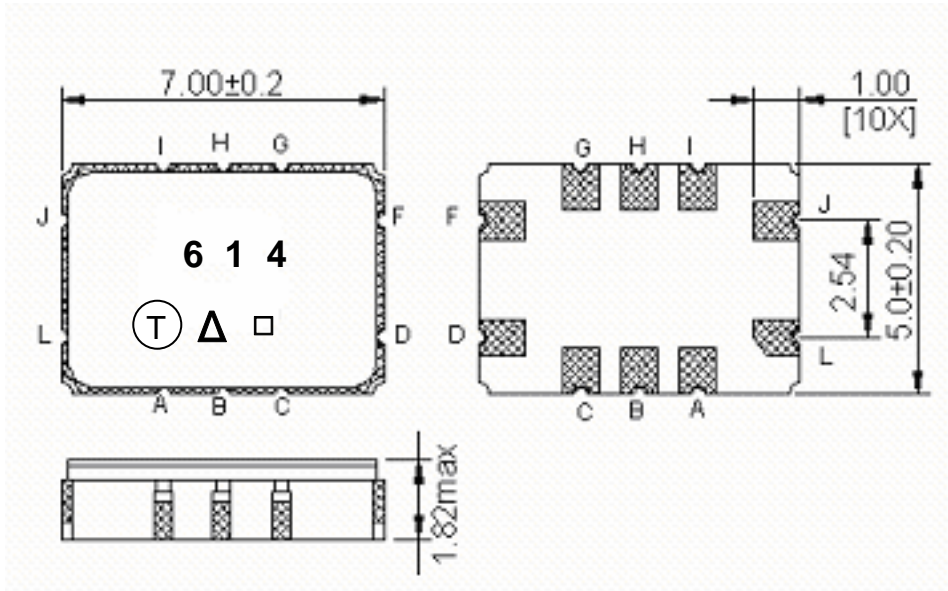
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**E. OUTLINE DRAWING:**



Pin J –RF input

Pin L –RF balance input or to be ground

Pin D –RF output

Pin F –RF balance output or to be ground

Pin A,B,C,G,H,I - Ground

Unit : mm

**SAW Filter 138.0MHz**

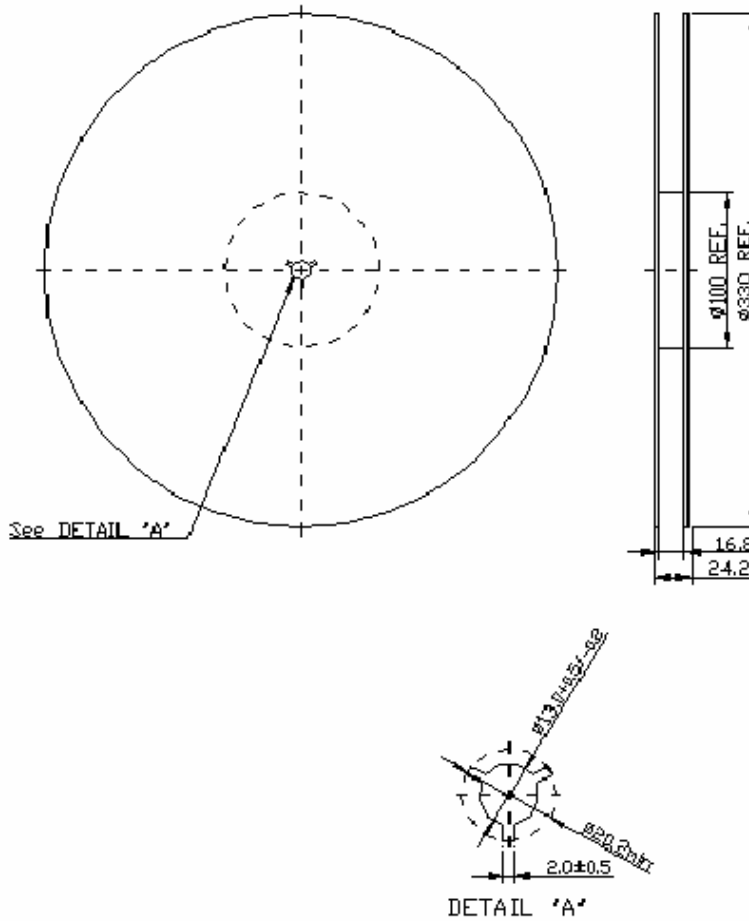
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**F. PACKING:**

**1. REEL DIMENSION**



**2. TAPE DIMENSION**

