

**SAW Filter 279.880MHz**  
**Part No: MP03531**

**Model: TB0786A**  
**Rev No: 2**

**A. MAXIMUM RATING:**

1. Operating Temperature: -30°C ~ +85°C
2. Storage Temperature: -40°C ~ +85°C
3. Input power: 10dBm

**B. CHARACTERISTICS:**

Ambient Temperature: 25°C

| Item                           | Unit | Min. | Typ.   | Max. |
|--------------------------------|------|------|--------|------|
| Center Frequency               | MHz  | -    | 279.88 | -    |
| Insertion Loss (Fc ± 3.5MHz)   | dB   | -    | 10.4   | 15   |
| Passband Ripple (Fc ± 3.5 MHz) | dB   | -    | 0.6    | 1.0  |
| 1dB BW                         | MHz  | 7    | 8.6    | -    |
| 45dB BW                        | MHz  | -    | 15.6   | 18   |
| Attenuation 1 @ 10 ~ 270MHz    | dB   | 40   | 43     | -    |
| Attenuation 2 @ 291 ~ 600MHz   | dB   | 38   | 42     | -    |

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**C. FREQUENCY CHARACTERISTICS:**

1. S21 Response (span: 80MHz)

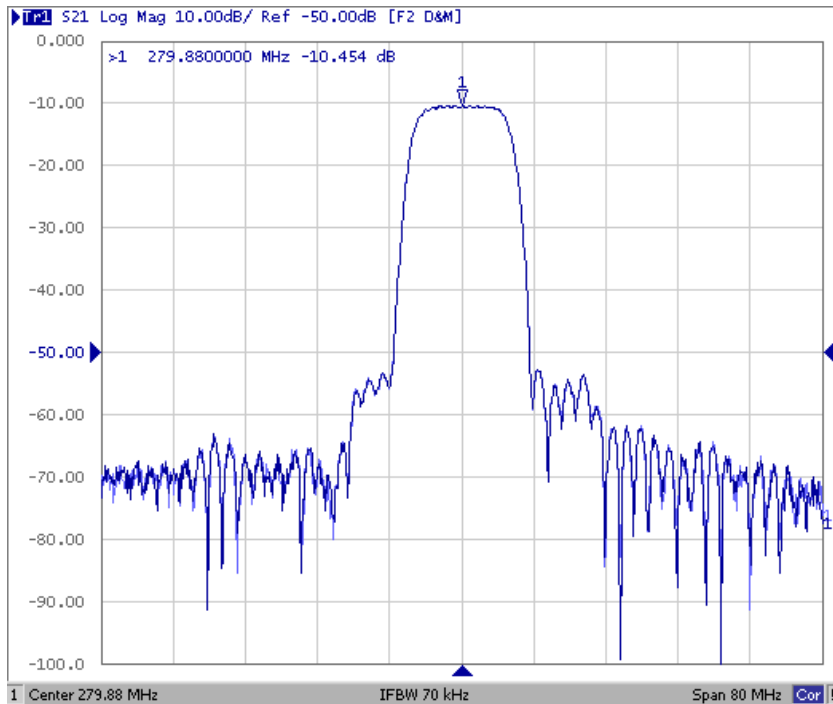


Fig. 1. Horizontal: 8MHz/Div, Vertical: 10dB/Div

2. Group-Delay Ripple (span: 15MHz)

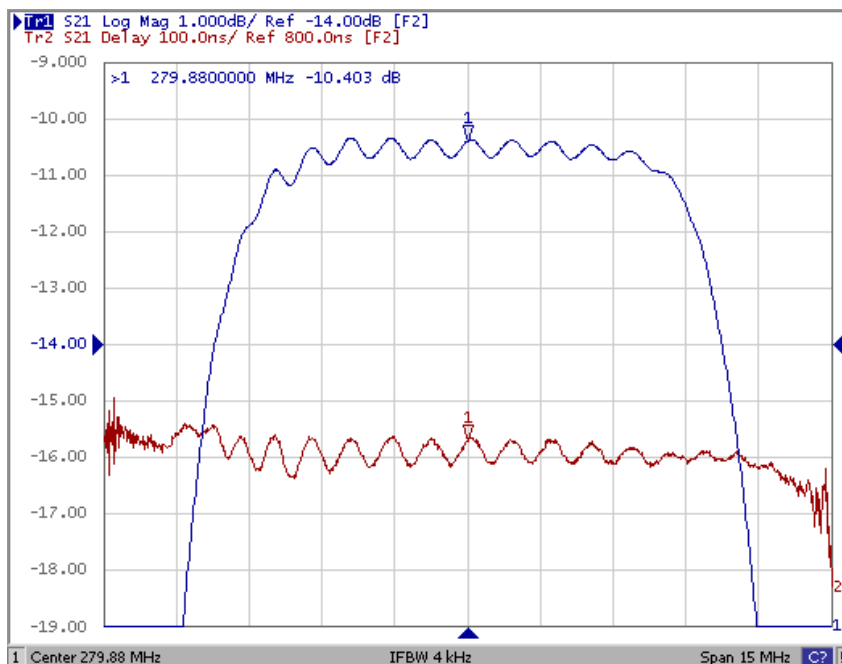
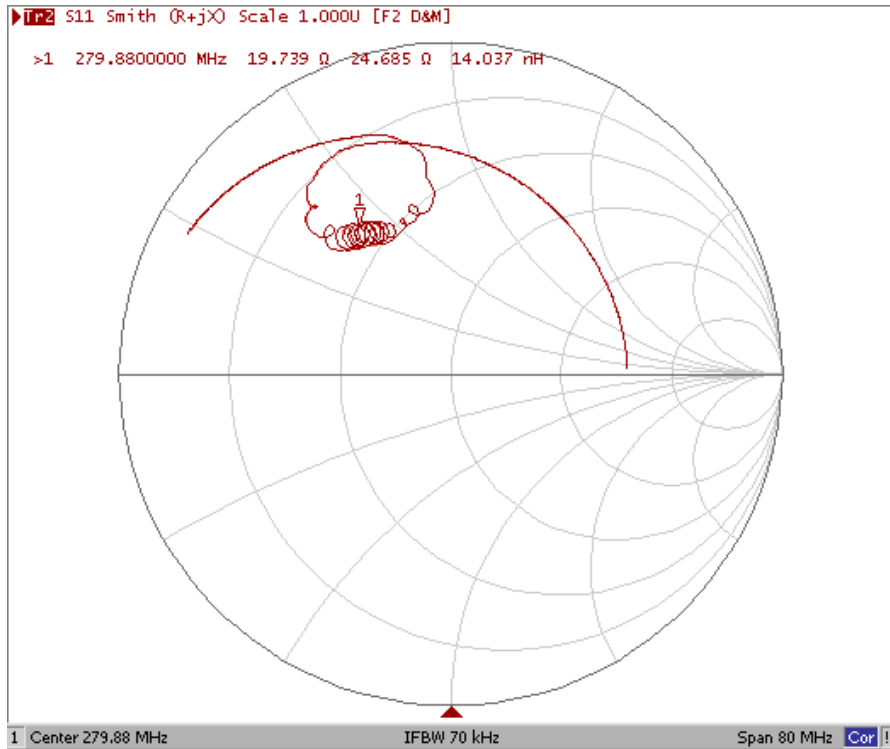


Fig. 2. Horizontal: 1.5MHz/Div, Vertical: 100nec/Div

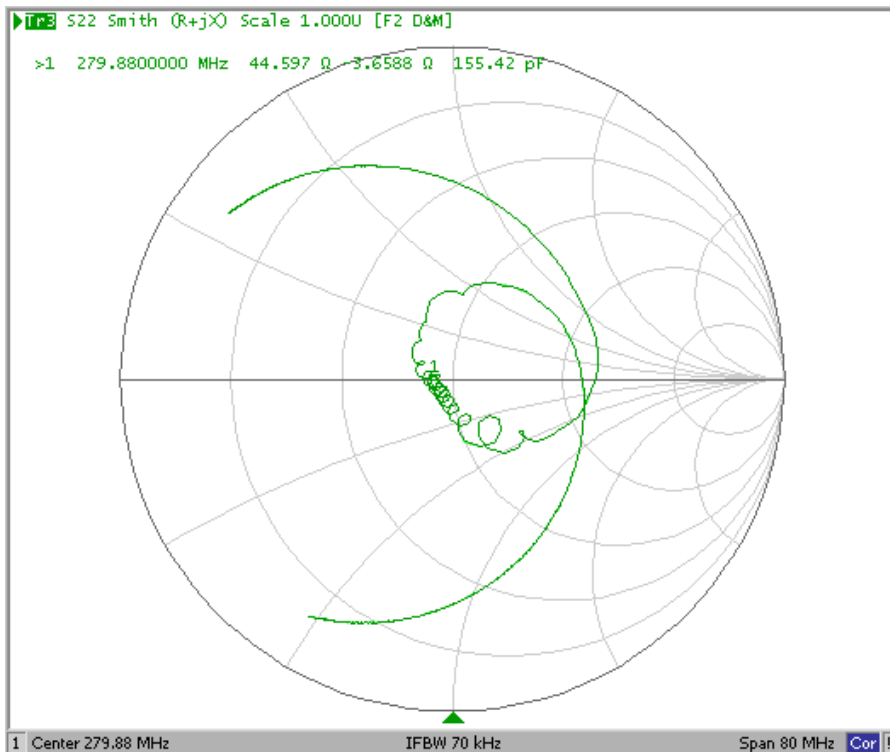
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### 3. S11 Smith Chart (span: 80MHz)



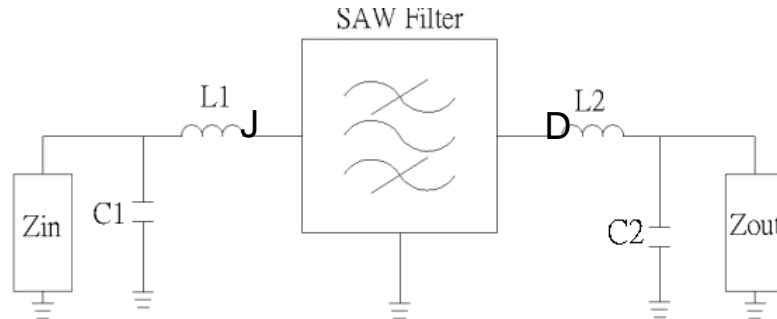
### 4. S22 Smith Chart (span: 80MHz)



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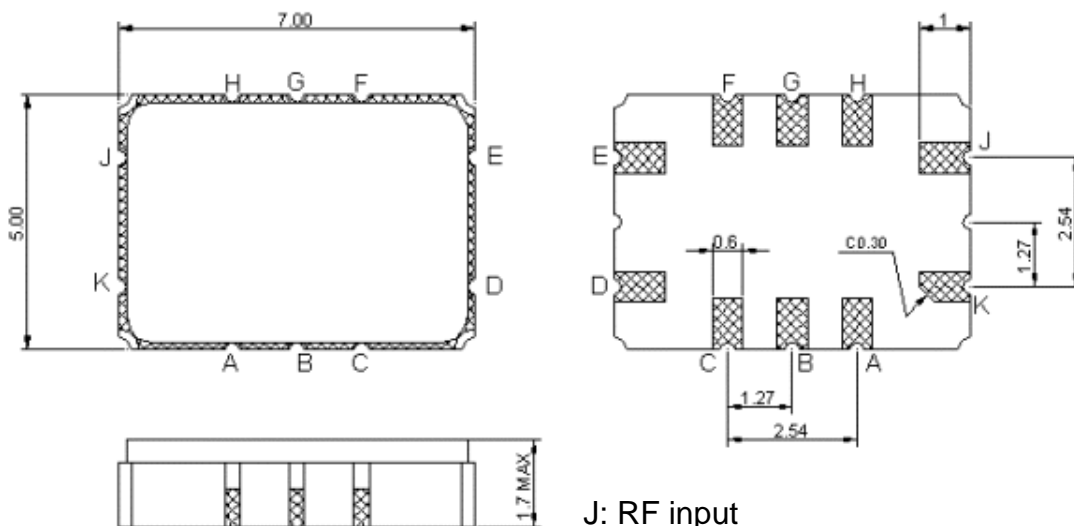
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**D. MEASUREMENT CIRCUIT:**



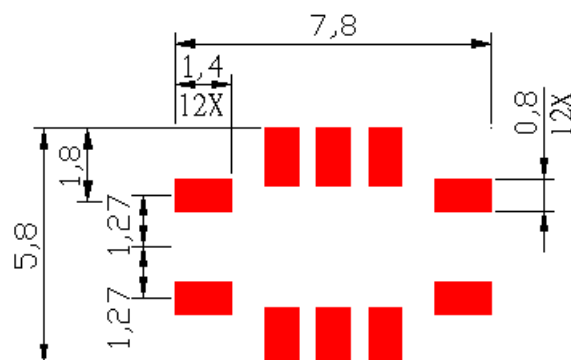
$Z_{in}$  and  $Z_{out}$  are  $50\ \Omega$ .  
 $L1=8.6\text{nH}$ ,  $C1=22\text{pF}$ ,  $L2=12\text{nH}$ ,  $C2=30\text{pF}$

**E. OUTLINE DRAWING:**



J: RF input  
 D: RF output  
 K, E: Case Ground  
 A, B, C, F, G, H: Ground  
 Unit: mm

**F. PCB FOOTPRINT:**

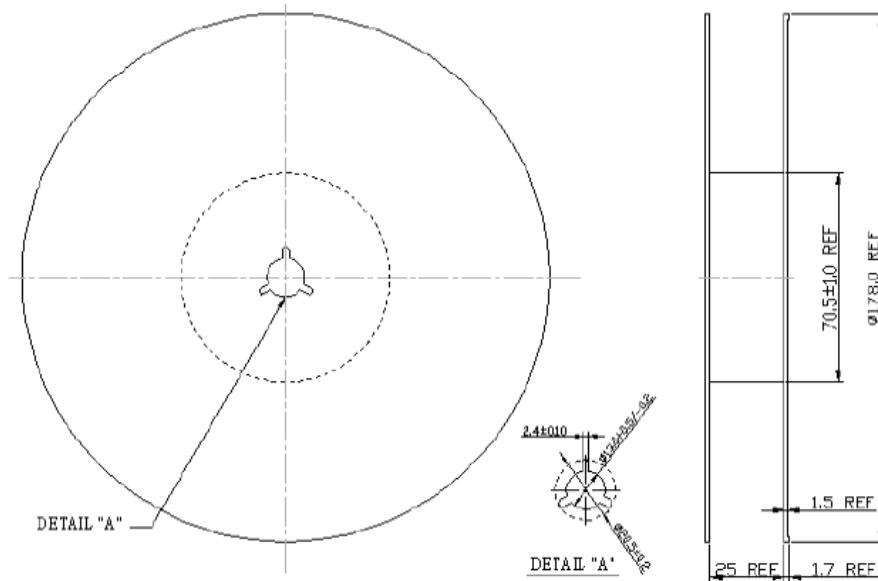


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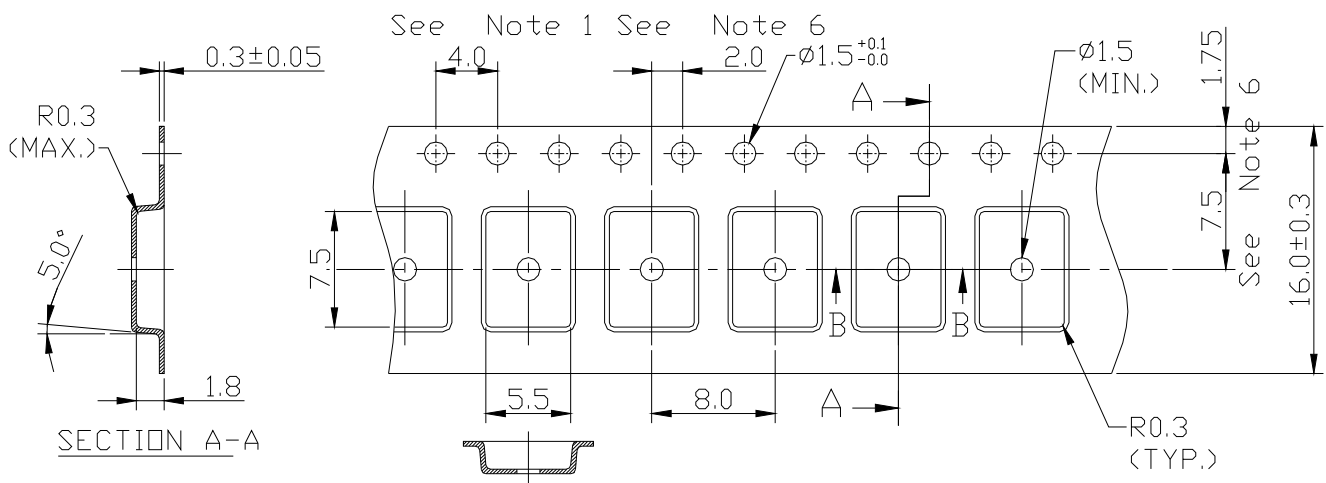
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**G. PACKING:**

**1. REEL DIMENSION**



**2. TAPE DIMENSION**



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**H. RECOMMENDED REFLOW PROFILE:**

