

**SAW Filter 480.0MHz**  
**Part No: MP02645**

**Model: TB0590A**  
**Rev No: 1B**

**A. MAXIMUM RATING:**

1. Operating Temperature: -30°C ~ 70°C
2. Storage Temperature: -40°C ~ +85°C

**B. CHARACTERISTICS:**

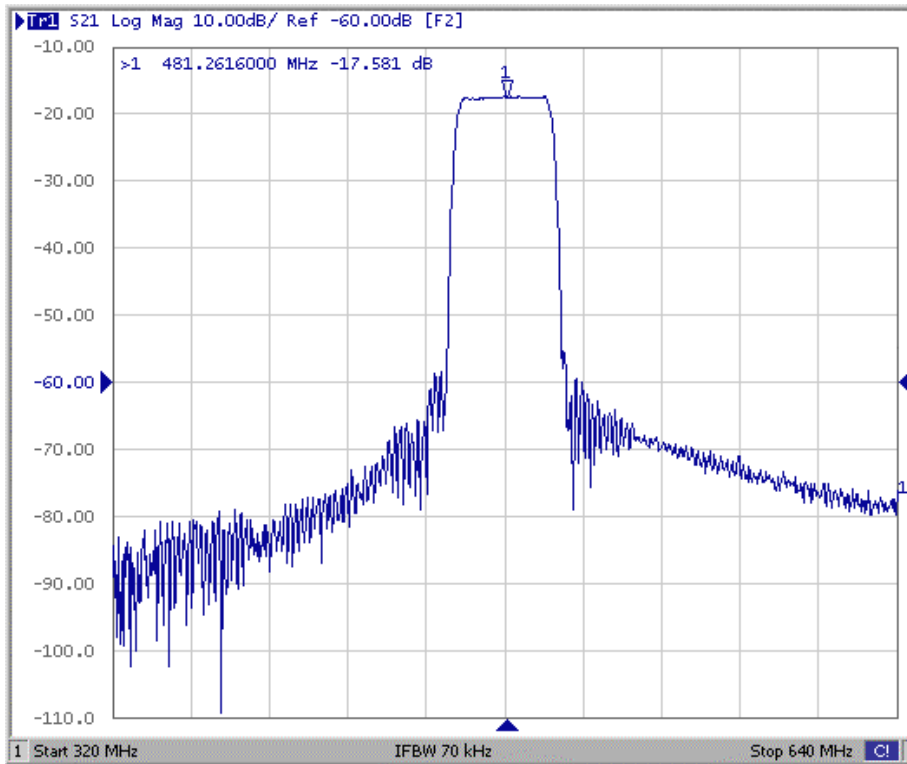
Item	Unit	Min.	Typ.	Max.
Center frequency Fc	MHz	479.5	480	480.5
Max Insertion Loss	dB	-	17.5	19.5
1dB Bandwidth	MHz	-	35.7	-
3dB Bandwidth	MHz	36	38.3	-
Pass band Ripple Fc ± 13.5MHz	dB	-	0.5	1.0
Group delay 462 ~ 498MHz	ns		27	50
Relative Attenuation: (Reference level from Max IL)				
320MHz to 454MHz	dB	35	52	-
506MHz to 640MHz	dB	35	48	-
Matching: 1. The input of the filter will be matched to 50ohm 2. The output of the filter will be matched to 50ohm				

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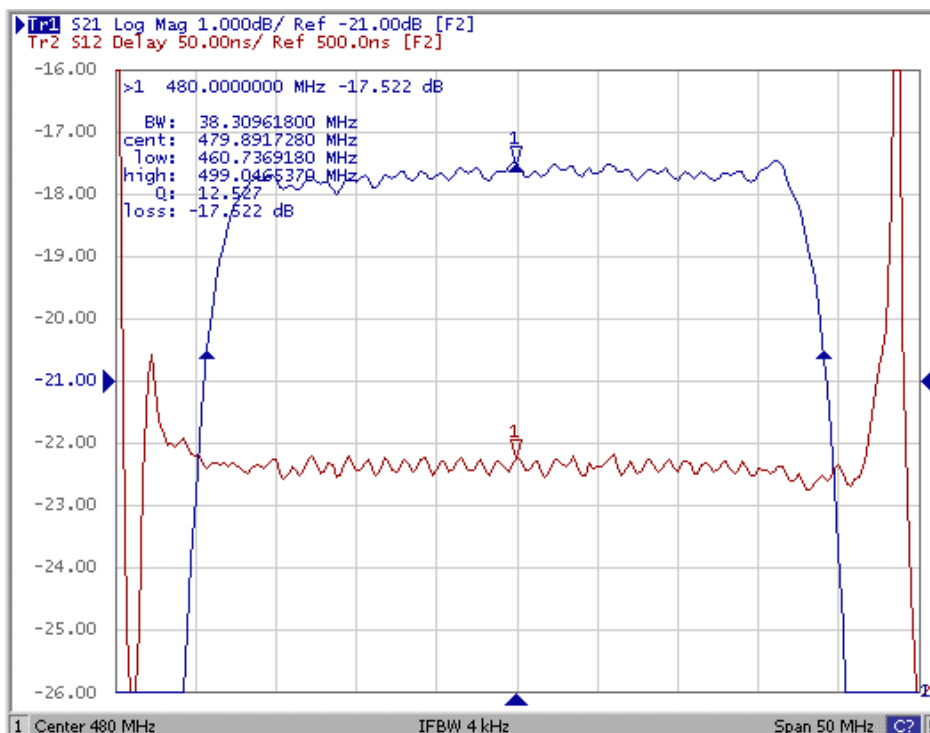
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**C. FREQUENCY CHARACTERISTICS:**

1. S21 Response: (span 330MHz)



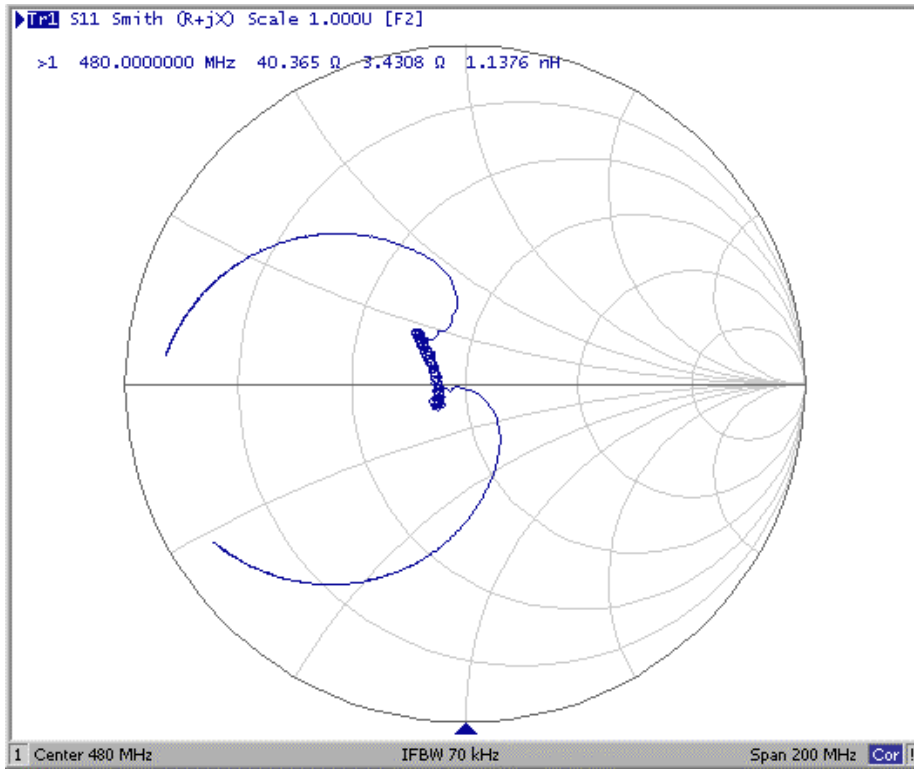
2. Passband of Response: (span: 50MHz)



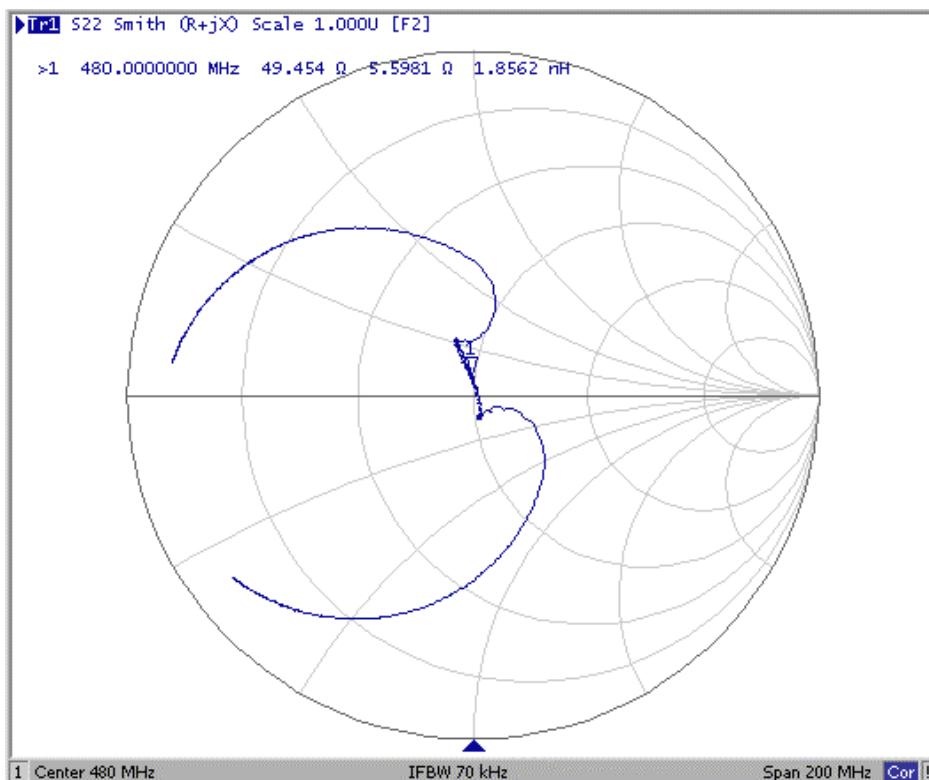
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3. S11 Smith Chart: (span 200MHz)



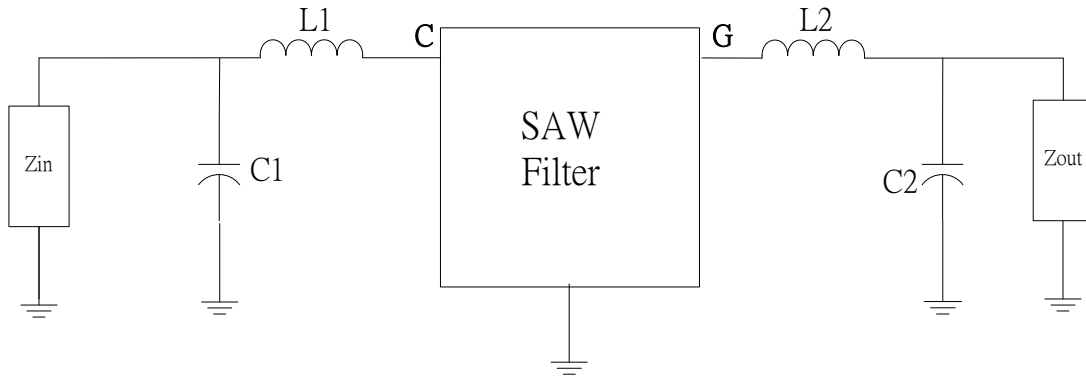
4. S22 Smith Chart: (span 200MHz)



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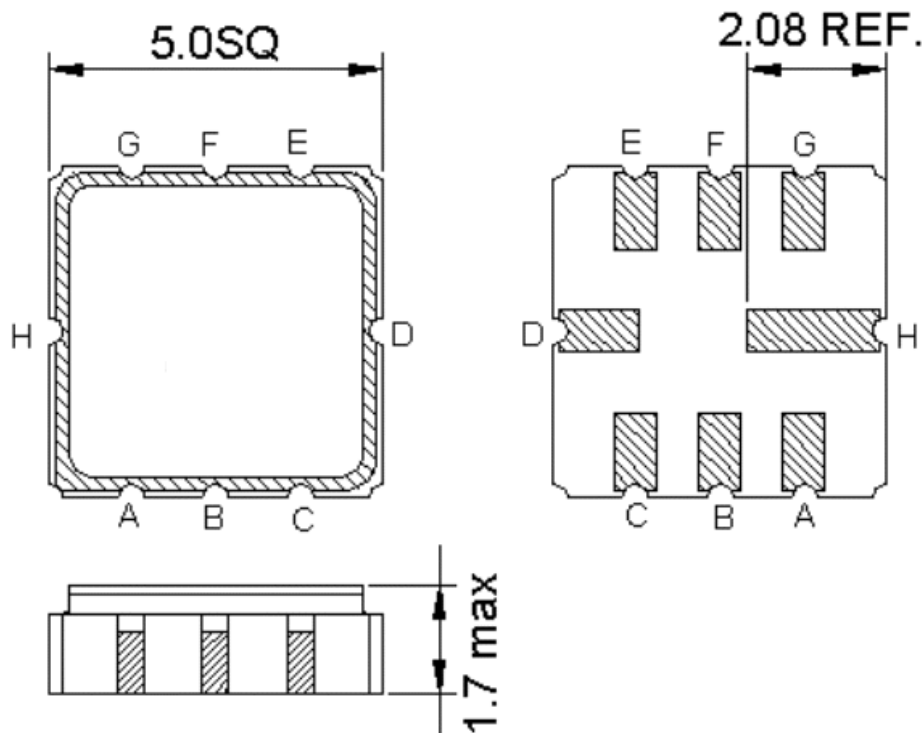
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**D. TEST CIRCUIT:**



$Z_{IN}$  and  $Z_{OUT}$  are  $50\Omega$   
 $L1 = 12nH$ ,  $C1 = 15pF$ ,  $L2 = 15nH$ ,  $C2 = 12pF$

**E. OUTLINE DRAWING:**



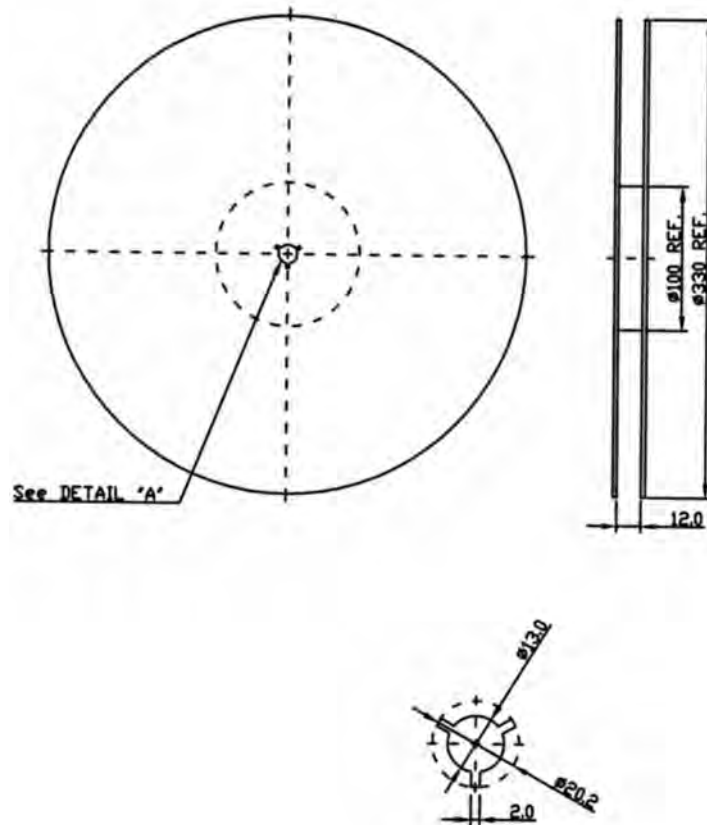
- C: RF input
- G: RF output
- H, D: Case Ground
- A, B, E, F: Ground

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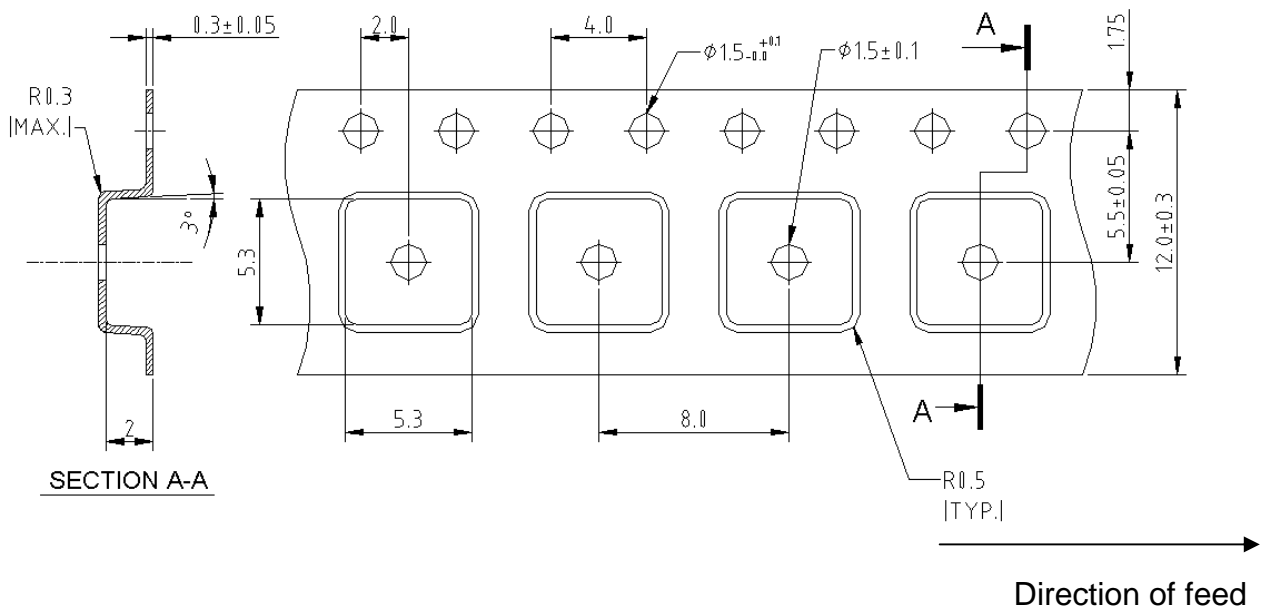
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**F. PACKING:**

1. Reel Dimension



2. Tape Dimension



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**G. RECOMMENDED REFLOW PROFILE:**

