



# TAI-SAW TECHNOLOGY CO., LTD.

No. 3, Industrial 2nd Rd., Ping-Chen Industrial District,  
Taoyuan, 324, Taiwan, R.O.C.

TEL: 886-3-4690038 FAX: 886-3-4697532

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## Product Specifications Approval Sheet

Product Description: SAW Resonator 304 MHz SMD 5.0×3.5mm

TST Parts No.:TC0540A

Customer Parts No.:\_\_\_\_\_

Customer signature required
Company:_____
Division:_____
Approved by :_____
Date:_____

Checked by:\_\_\_\_\_ Hongpu Lin *Hong Pu Lin*

Approval by:\_\_\_\_\_ Andy Yu *Andy Yu*

Date:\_\_\_\_\_ 2019/04/25

1. Customer signed back is required before TST can proceed with sample build and receive orders.
2. Orders received without customer signed back will be regarded as agreement on the specifications.
3. Any specifications changes must be approved upon by both parties and a new revision of specifications shall be released to reflect the changes



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## SAW Resonator 304 MHz

MODEL NO.: TC0540A

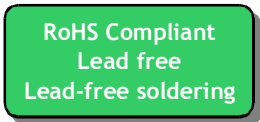
REV. 2.0

### A. FEATURES:

- 1-Port Resonator.

### B. MAXIMUM RATING:

1. Input Power Level: 0 dBm
2. DC Voltage : 5 V
3. Operating Temperature:-40°C to +85°C
4. Storage Temperature: -40°C to +85°C
5. Moisture Sensitive Level (MSL): Level 1

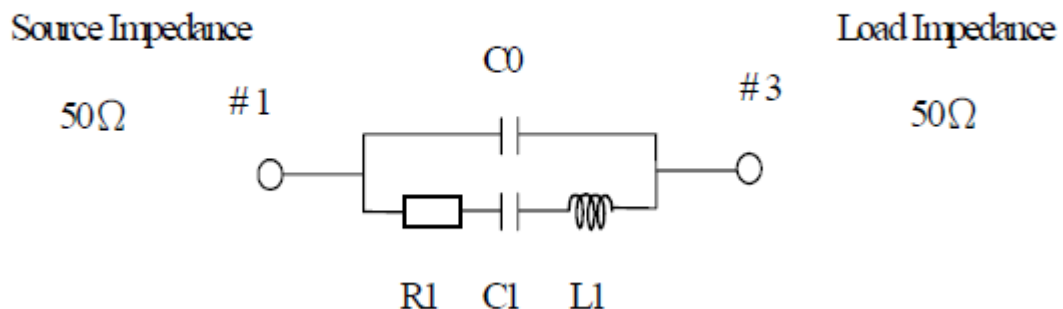


### C. ELECTRICAL CHARACTERISTICS:

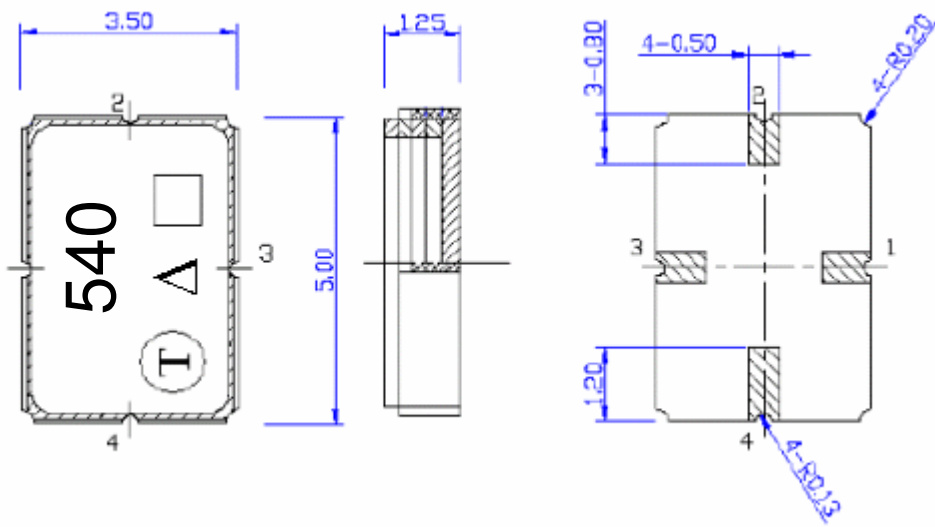
Characteristic	Units	Minimum	Typical	Maximum
Center frequency <b>Fr</b>	<b>MHz</b>	303.925	304	304.075
Insertion Loss <b>IL</b>	<b>dB</b>	-	1.23	2.0
Equivalent Elements				
Motional capacitance <b>C1</b>	<b>fF</b>	-	2.94	-
Motional inductance <b>L1</b>	$\mu$ <b>H</b>	-	93.20	-
Motional resistance <b>R1</b>	<b>Ohm</b>	-	14.26	-
Parallel capacitance <b>Co</b>	<b>pF</b>	-	4.50	-
Temp.coeff.	<b>ppm/c*2</b>	-	0.032	-
Turnover To	<b>deg.C</b>	-	25	-
Package size		SMD 5.0X3.5X1.4mm		

### D. EQUIVRENT CIRCUIT:

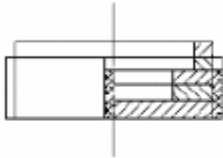
One-Port Resonator:



**E. OUTLINEDRAWING:**



**Pin 1 : Input**  
**Pin 3 : Output**  
**Pin 2,4 : Ground**

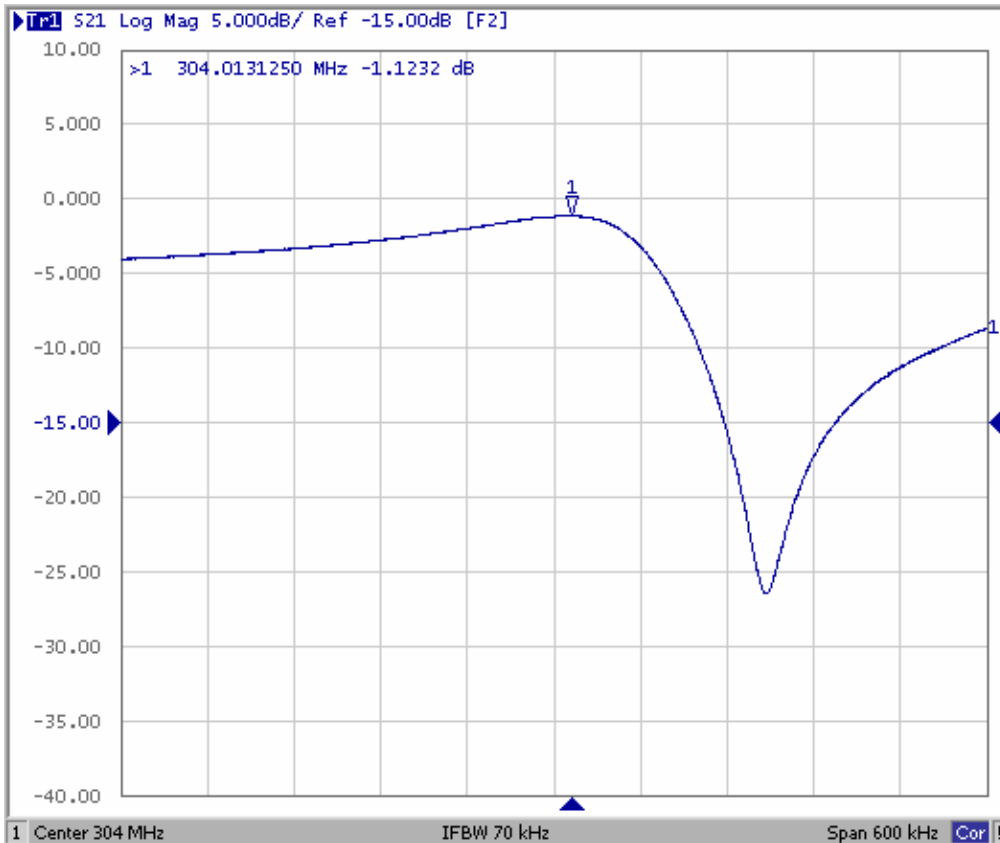


Year	2009 2011	2010 2012
Year Code	C	c

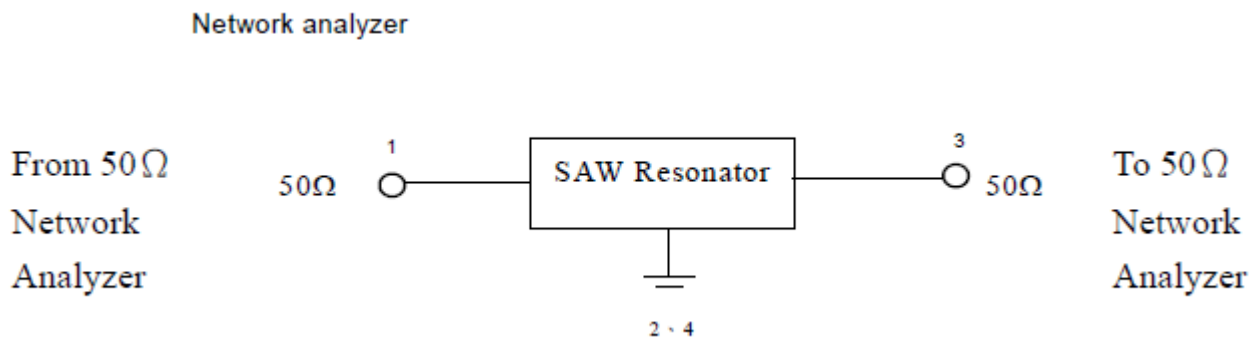
$\Delta$  : Year Code

$\square$  : Data Code( provided by planer each year )

**F.FREQUENCY CHARACTERISTICS:**

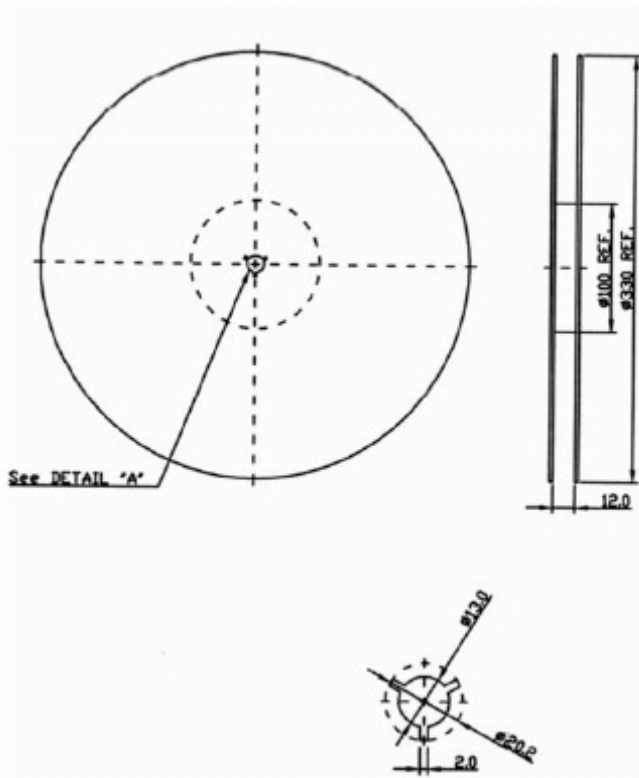


**G.TEST CIRCUIT:**

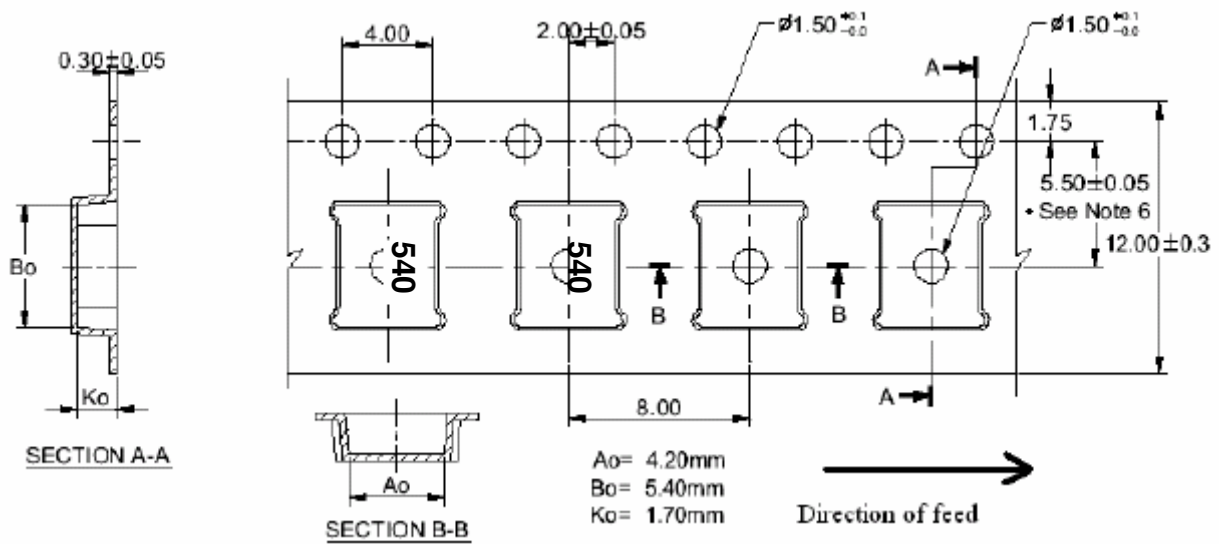


## H. PACKING:

### 1. REEL DIMENSION



### 2. TAPE DIMENSION



### **I. RECOMMENDED REFLOW PROFILE:**

1. Preheating shall be fixed at 150~180°C for 60~90 seconds.
2. Ascending time to preheating temperature 150°C shall be 30 seconds min.
3. Heating shall be fixed at 220°C for 50~80 seconds and at 260°C +0/-5°C peak (20~40sec).
4. Time: 2 times.

