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

Issued Date: Feb, 06, 2012

Product Description: SAW Filter 869.6MHz SMD 3.0X3.0 mm(BW=1MHz)

TST Part No.: TA1457A

Customer Part No.:_____

Customer signature required

Company:_____

Division:_____

Approved by :_____

Date:_____

Checked by: Paul Ni Paul Ni

Approved by: Francis Chen

Date: 2012/02/06

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 Filter 869.6 MHz

MODEL NO.:TA1457A REV. NO：1.0

A. MAXIMUM RATING:

1. Input Power Level: 10 dBm
2. DC Voltage : 6V
3. Operating Temperature: -40°C to +85°C
4. Storage Temperature: -40°C to +85°C

RoHS Compliant
Lead free
Lead-free soldering

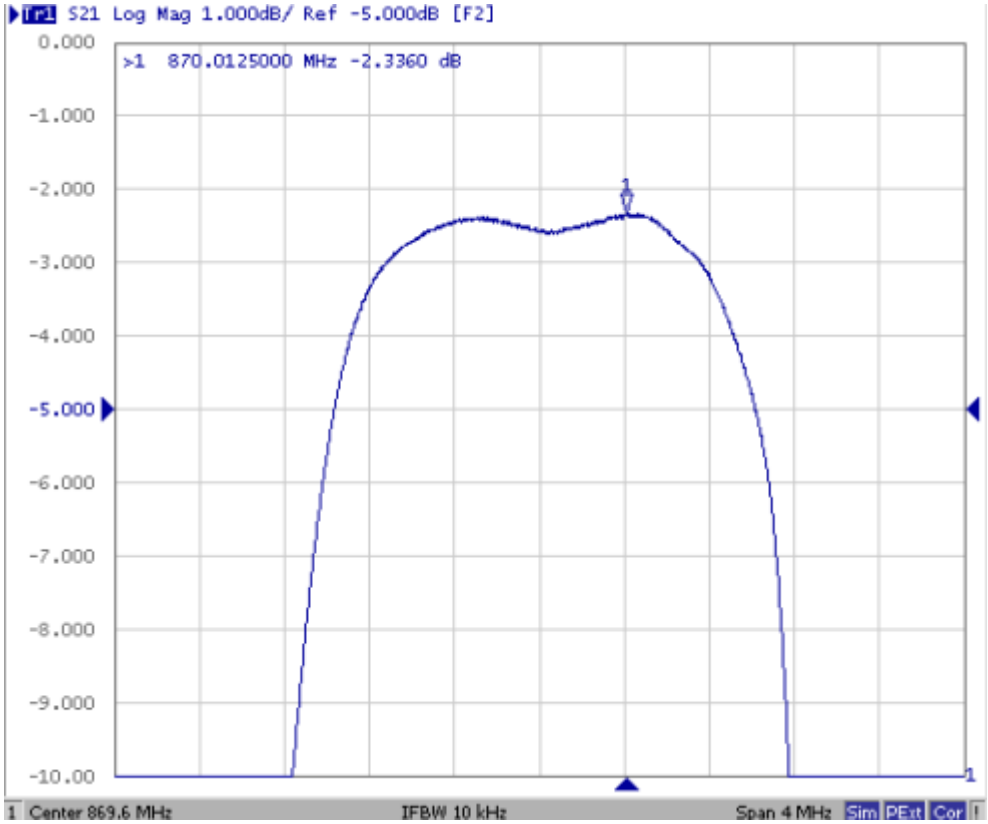
Electrostatic **S**ensitive **D**evice

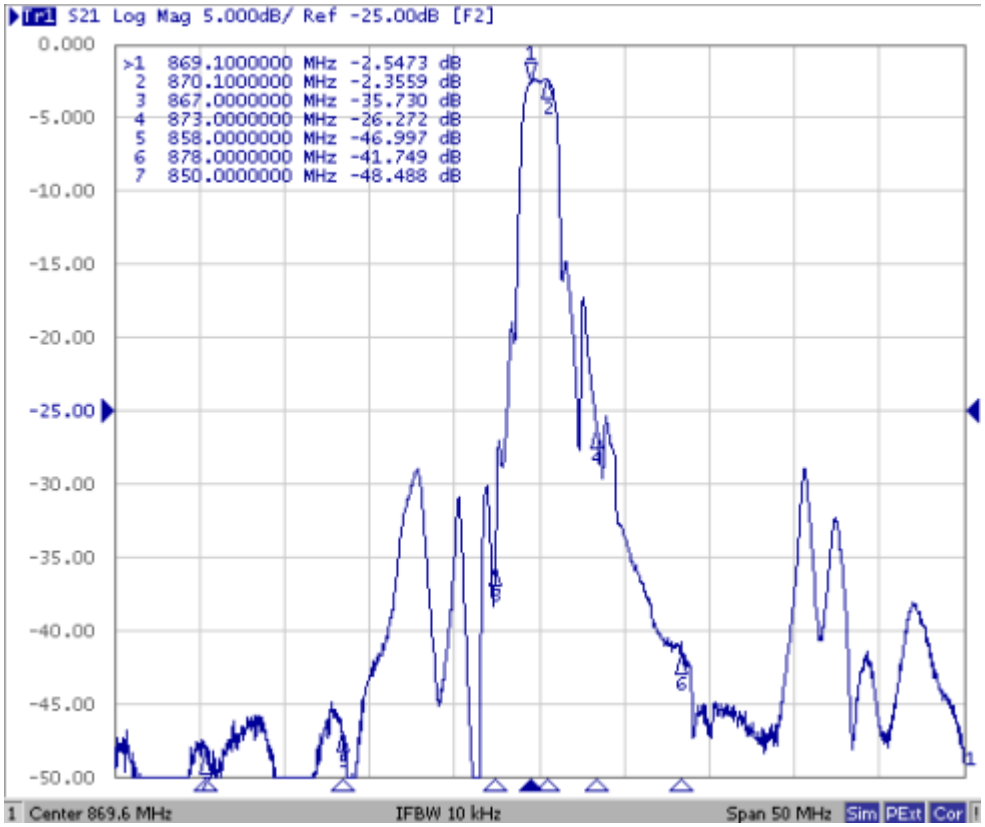
B. ELECTRICAL CHARACTERISTICS:

Item		Unit	Min.	Typ.	Max.
Center frequency	**Fc**	MHz	-	869.6	-
3dB BW		MHz	-	2.0	-
Minimum insertion loss	**IL(min)**				
Exclude loss in matching elements *1)		dB	-	2.4	3.4
Incl. loss of matching elements(Q=91) *2)		dB	-	2.7	3.7
Passband (relative to IL_{min}) *1)					
869.10 ~ 870.1 MHz		dB	-	0.4	3.0
Attenuation (relative to IL_{min}) *1)					
15.000 ~ 785.00	MHz	dB	45	52	-
785.00 ~ 850.00	MHz	dB	38	46	-
850.00 ~ 858.00	MHz	dB	36	42	-
858.00 ~ 867.00	MHz	dB	16	26	-
873.00 ~ 878.00	MHz	dB	16	23	-
878.00 ~ 896.00	MHz	dB	20	26	-
896.00 ~ 912.00	MHz	dB	36	42	-
912.00 ~ 1000.0	MHz	dB	39	45	-
1000.0 ~ 2000.0	MHz	dB	40	46	-
2000.0 ~ 2500.0	MHz	dB	55	72	-
Impedance at Fc, Input *1) **Zin = Rin//Cin**	Zs	Ω		568Ω//1.12pF	
Impedance at Fc, Output *1) **Zout = Rout//Cout**	ZL	Ω		568Ω//1.12pF	

*1)： The matching circuit is ideal by simluation.
*2)： The matching circuit is real by actual passive components.
0805 Coillcraft CS series chip conductor is used for inductor.
0402 muRata GRM series is used for capacitor.

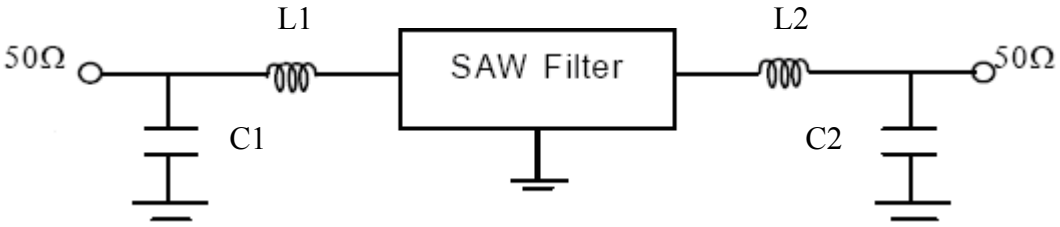
C. Frequency Characteristics :





D. MEASUREMENT CIRCUIT:

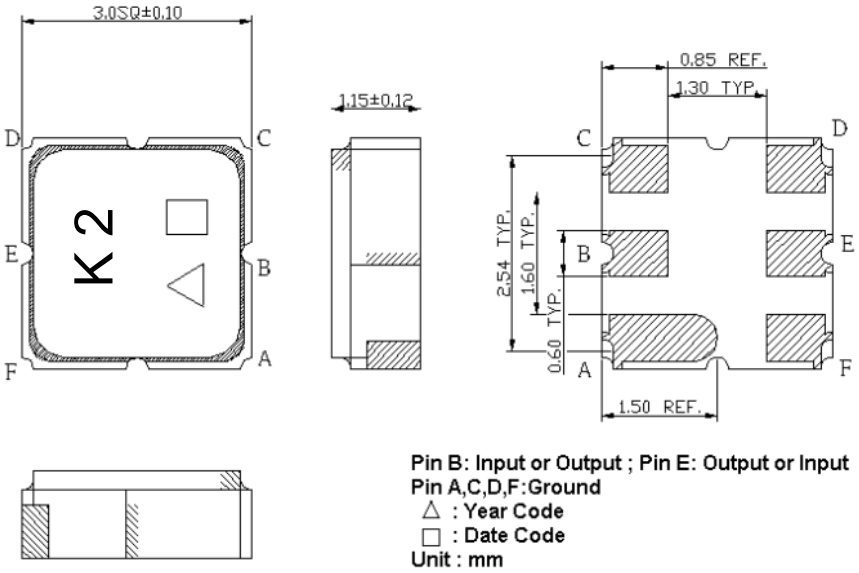
The matching circuit is ideal by simulation



L1：30nH , L2：30nH (Ideal value)

C1：2pF , C2：2pF (Ideal value)

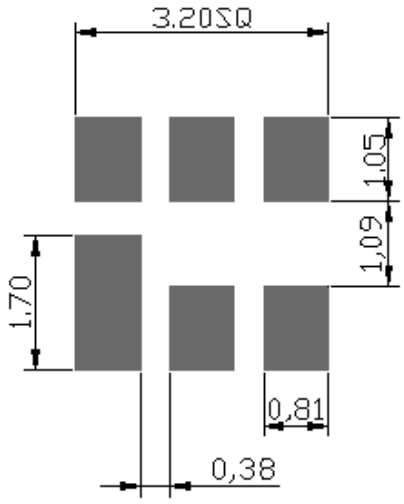
E.OUTLINE DRAWING:



△ : Year Code (2012->2, …, 2019->9)

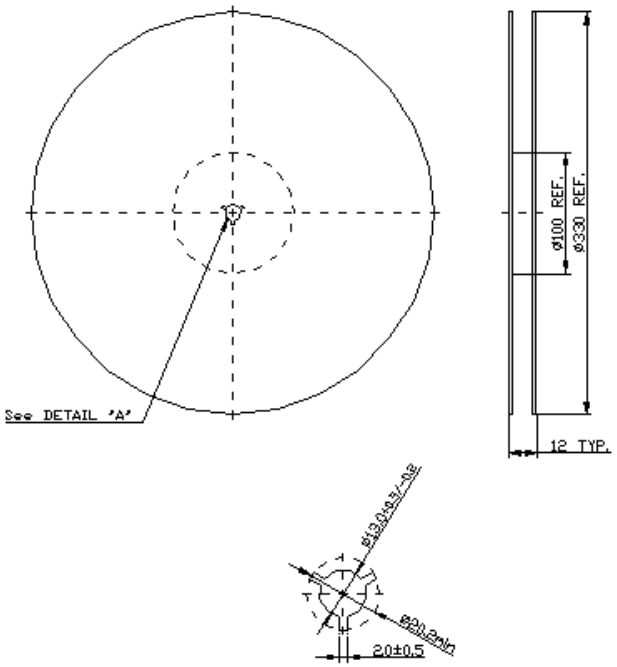
□ : Date Code (Follow the table from planner each year)

F. PCB Footprint:

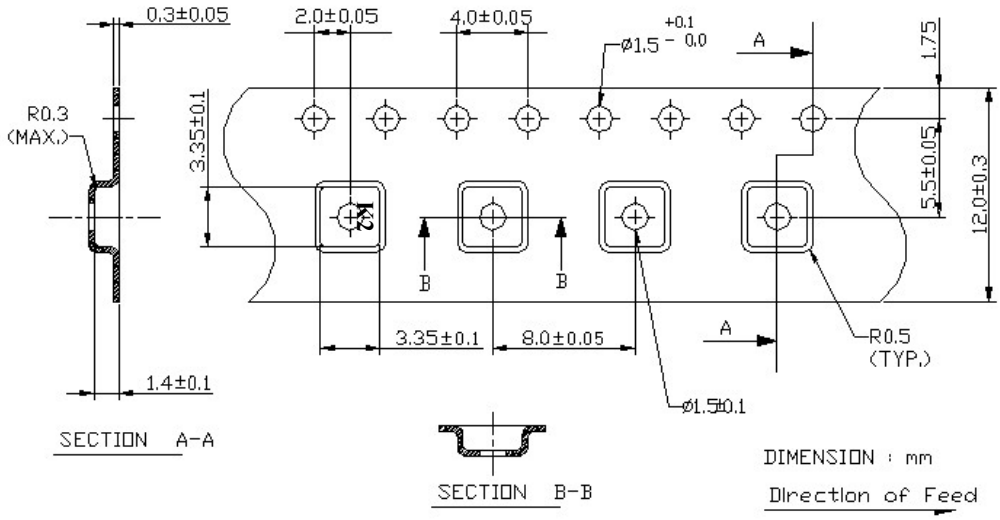


G. PACKING:

1. REEL DIMENSION



2. TAPE DIMENSION



H. RECOMMENDED REFLOW PROFILE :