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
E-mail: tstsales@mail.taisaw.com Web: www.taisaw.com

Approval Sheet For Product Specification

Issued Date: Jun, 5, 2007

Product Name: SAW Filter 1747.5 MHz for Mobile Communication

TST Parts No.: TA0685A

Customer Parts No.:_____

Company:_____

Division:_____

Approved by :_____

Date:_____

Checked by:_____Bob Chau_____

Approval by:_____Francis Chen_____

Date:_____6,5,2007_____

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
E-mail: tstsales@mail.taisaw.com Web: www.taisaw.com

SAW Filter 1747.5 MHz for Mobile Communication

MODEL NO.: **TA0685A** REV. NO.:1

A. MAXIMUM RATING:

1.Operating Temperature: -20°C ~ +75°C

2.Storage Temperature: -30°C ~ +85°C

RoHS Compliant
Lead free
Lead-free soldering

B. ELECTRICAL CHARACTERISTICS :

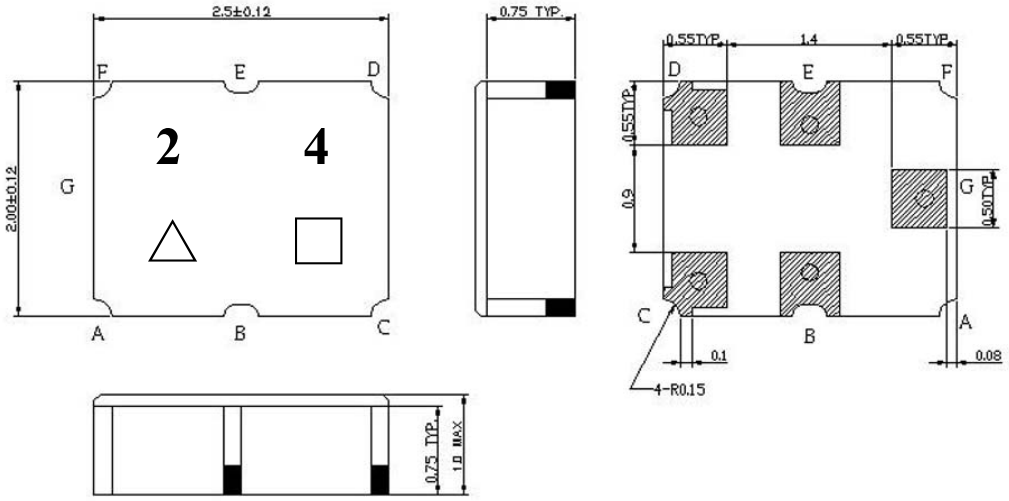
Singled to Balanced operation

Terminating source impedance : Zs = 50 Ω

Terminating load impedance : Z_L = 150 Ω// 22 nH

Item	Value			Note
	Min.	Typ.	Max.	
Center frequency F_C (MHz)	-	1747.5	-	-
Insertion loss(1710~1785 MHz) **I.L.** (dB)	-	3	4	-
Ripple (1710~1785 MHz) (dB)	-	0.9	2.1	-
Input VSWR (1710~1785 MHz)	-	2.1	2.7	-
Output VSWR (1710~1785 MHz)	-	2.3	2.7	-
Attenuation:(Reference level from 0 dB)				
0 ~ 1200 MHz (dB)	40	43	-	-
1200 ~ 1600 MHz (dB)	30	33	-	-
1600 ~ 1690 MHz (dB)	9	15	-	-
1825 ~ 1890 MHz (dB)	10	19	-	-
1890 ~ 2200 MHz (dB)	20	26	-	-
2200 ~ 3000 MHz (dB)	30	35	-	-
3000 ~ 4000 MHz (dB)	40	50	-	-
Symmetry in band (referenced to the matched operating condition)				
Output amplitude balance ($\|S_{31}/S_{21}\|$) (1805~1880 MHz) (dB)	-2	0	2	-
Output phase balance ($\Phi(S_{31})-\Phi(S_{21})+180^\circ$) (1805~1880 MHz) degree	-12	0	12	-

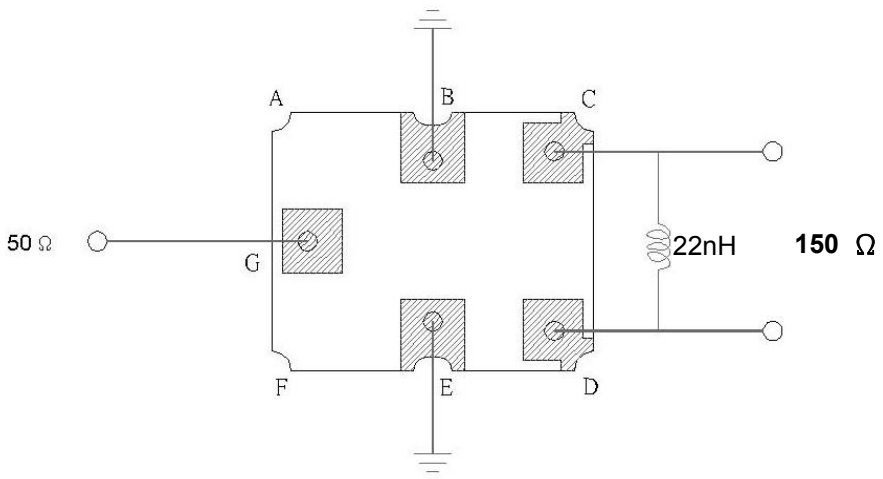
C. OUTLINE DRAWING:



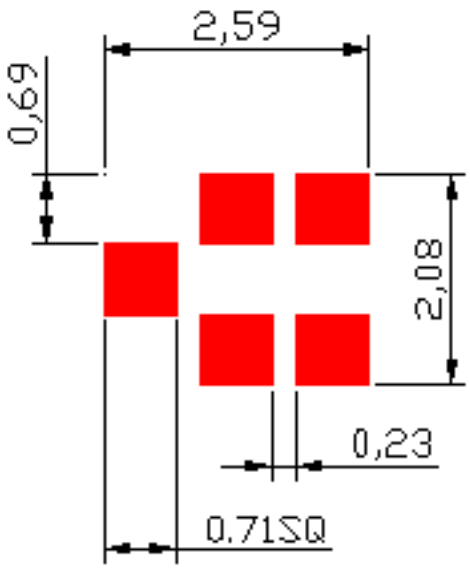
Pin configuration

G : Unbalance input
C,D : Balance output
B,E : Ground
△ : Year code
□ : Date code
Unit : mm

D. MEASUREMENT CIRCUIT:

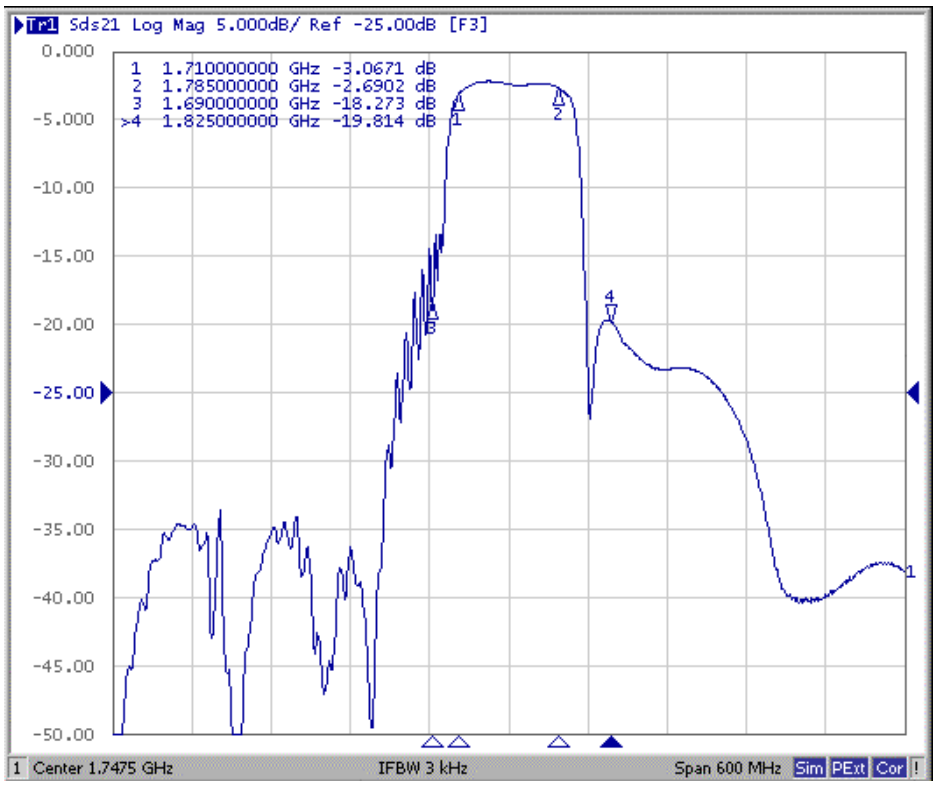


E. PCB Footprint:



F. FREQUENCY CHRACTERISTICS:

1. Transfer function (25 ℃)

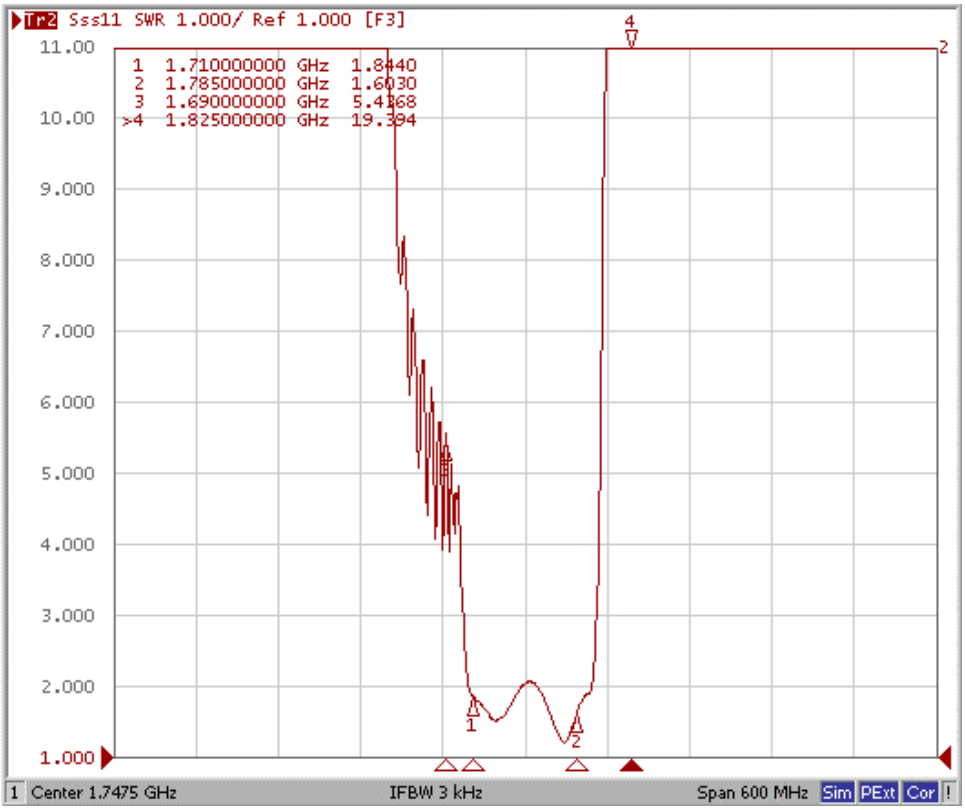


(wideband)

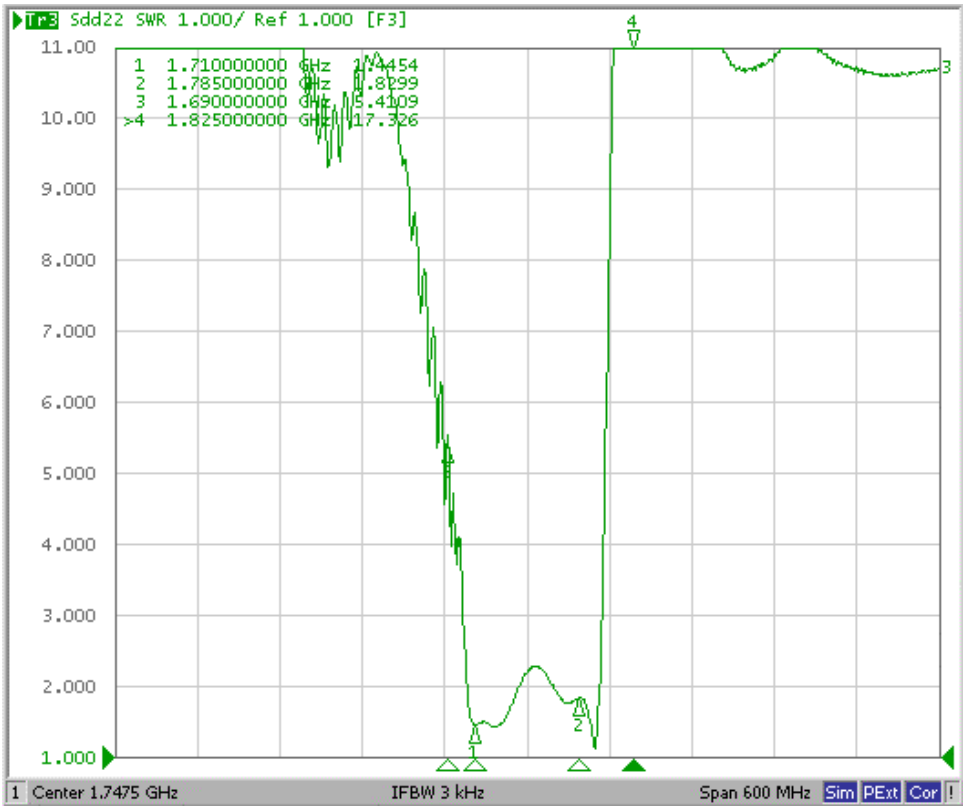


2. VSWR (25 ℃)

Unbalance Input

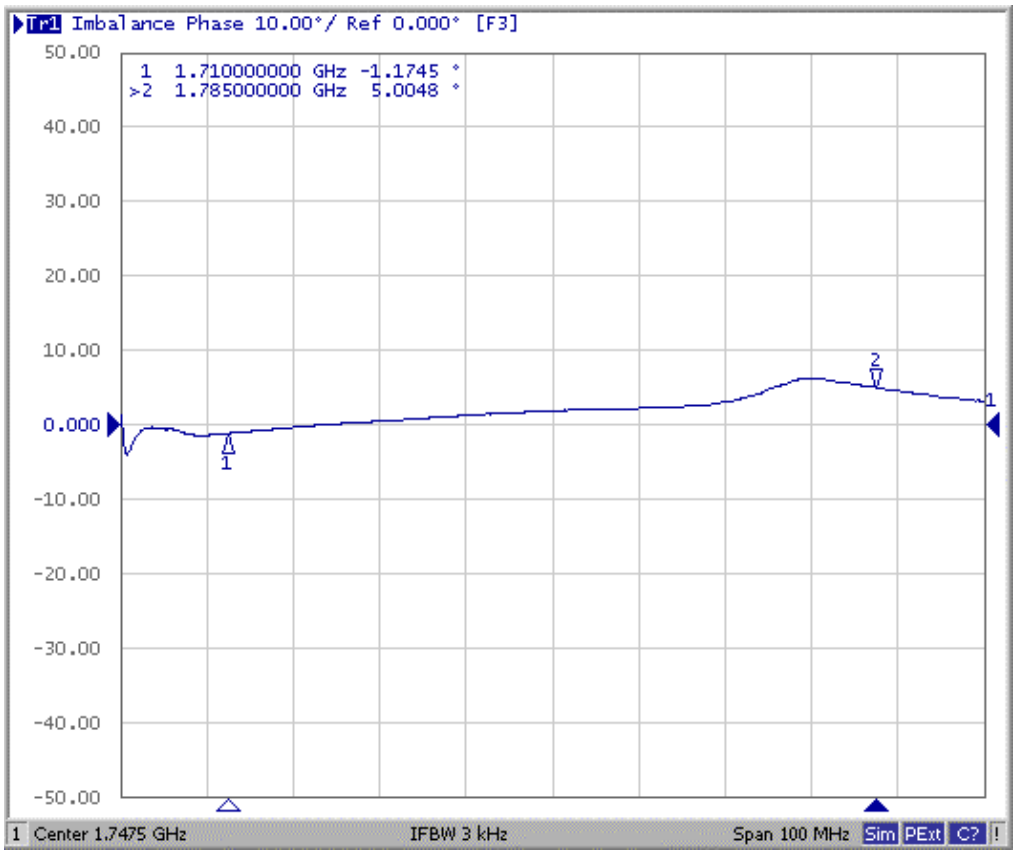


Balance Output



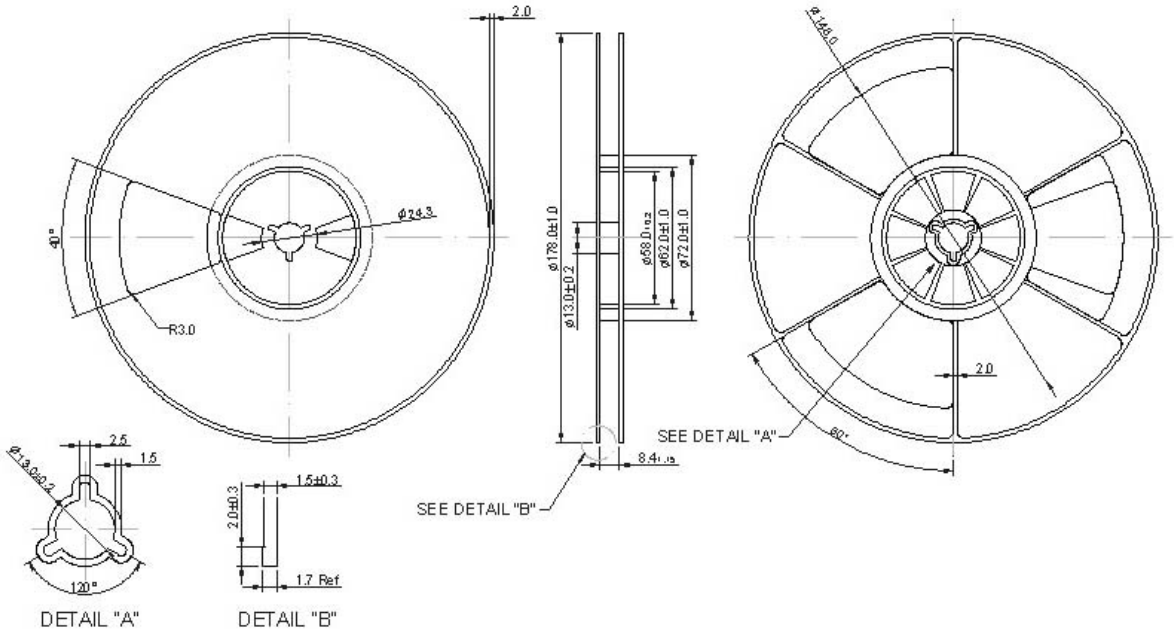
3. Imbalance


Tr1 Imbalance Log Mag 1.000dB/ Ref 0.000dB [F3]
1 1.710000000 GHz 632.00 mdB
>2 1.785000000 GHz -1.2470 dB
5.000
4.000
3.000
2.000
1.000
0.000
-1.000
-2.000
-3.000
-4.000
-5.000
1 Center 1.7475 GHz
IFBW 3 kHz
Span 100 MHz
Sim PExt C? !

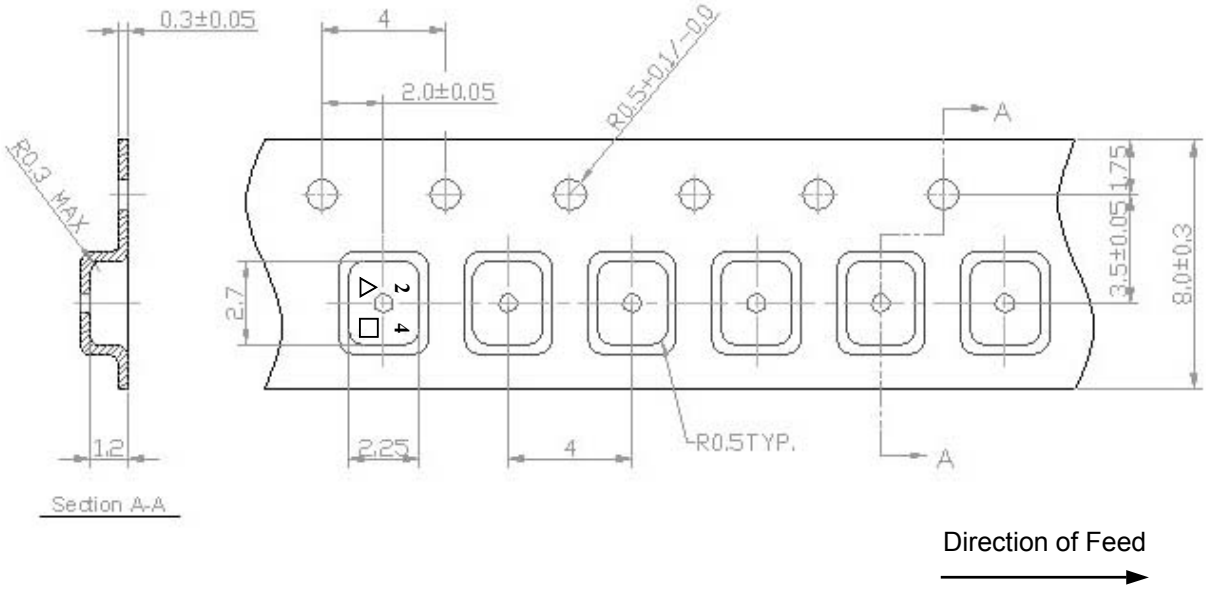

Tr1 Imbalance Phase 10.00°/ Ref 0.000° [F3]
1 1.710000000 GHz -1.1745 °
>2 1.785000000 GHz 5.0048 °
50.00
40.00
30.00
20.00
10.00
0.000
-10.00
-20.00
-30.00
-40.00
-50.00
1 Center 1.7475 GHz
IFBW 3 kHz
Span 100 MHz
Sim PExt C? !

G. PACKING:

1. REEL DIMENSION



2. TAPE DIMENSION



H. RECOMMENDED REFLOW PROFILE :

