

SAW Filter 1583MHz

MODEL NO.:TA1785A

REV. NO.:6.0

A. MAXIMUM RATING:

1. Input Power Level: 15 dBm
2. DC Voltage : 0V
3. Operating Temperature: -40 °C to +105 °C
4. Storage Temperature: -40 °C to +105 °C
5. Moisture Sensitivity Level: Level 1(MSL1)

RoHS Compliant
Lead free
Lead-free soldering

Electrostatic Sensitive Device (**ESD**)

Moisture Sensitivity Level: 1

B. ELECTRICAL CHARACTERISTICS:

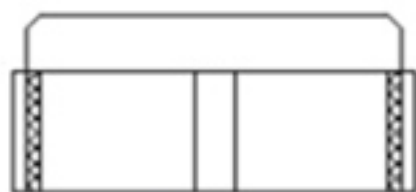
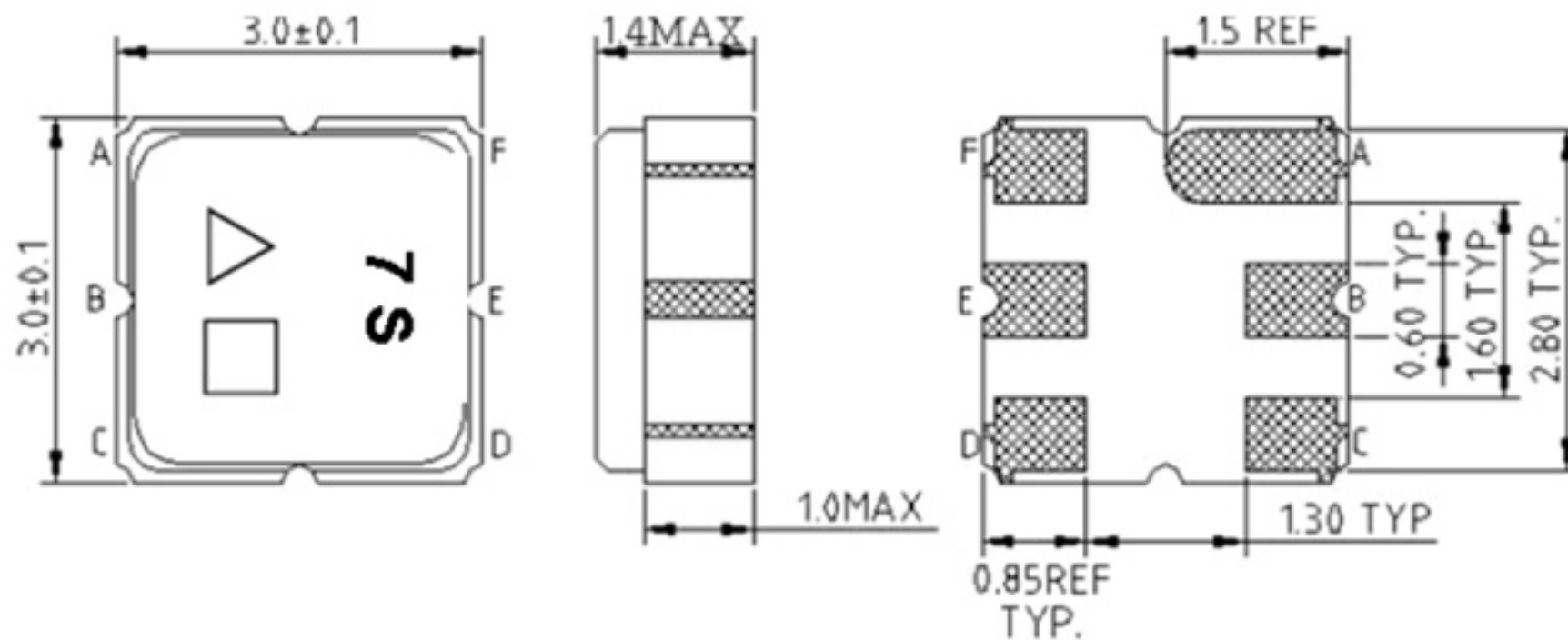
Terminating source impedance (single) : $Z_s = 50 \Omega$

Terminating load impedance(single) : $Z_L = 50 \Omega$

Item		MIN	Type.	MAX	Note
Center Frequency	Fc	MHz	-	1583	
Insertion Loss (1559.1~1563.1 MHz)	IL	dB		1.9	2.1
Insertion Loss (1573.42~1577.42 MHz)	IL	dB		1.5	2.0
Insertion Loss (1597.55~1605.89 MHz)	IL	dB		1.8	2.5
VSWR (1559.1~1563.1 MHz)				1.5	2.0
VSWR (1573.42~1577.42 MHz)				1.7	2.5
VSWR (1597.55~1605.89 MHz)				1.7	2.2
Amplitude ripple					
(1559.1~1563.1 MHz)		dB		0.6	1.0
(1573.42~1577.42 MHz)		dB		0.3	0.9
(1597.55~1605.89 MHz)		dB		0.5	1.2
Attenuation					
100 ~ 824 MHz		dB	40	46	
824 ~ 925 MHz		dB	40	46	
925 ~ 960 MHz		dB	40	46	
1427 ~ 1463 MHz		dB	36	39	
1525 ~ 1530 MHz		dB	9	20	
1638 ~ 1642 MHz		dB	20	45	
1710 ~ 1785 MHz		dB	36	40	
1850 ~ 1980 MHz		dB	36	40	
2400 ~ 2570 MHz		dB	31	35	
2570 ~ 2690 MHz		dB	28	30	
2690 ~ 3000 MHz		dB	28	30	
Package size		mm	SMD3030		

* The PCB lose for demo-B is -0.2dB

C.OUTLINE DRAWING:



- #B: Input
- #E: Output
- # A.C.D.F Ground
- △:Year code (ex 2008→8)
- : Date code
- Unit: mm

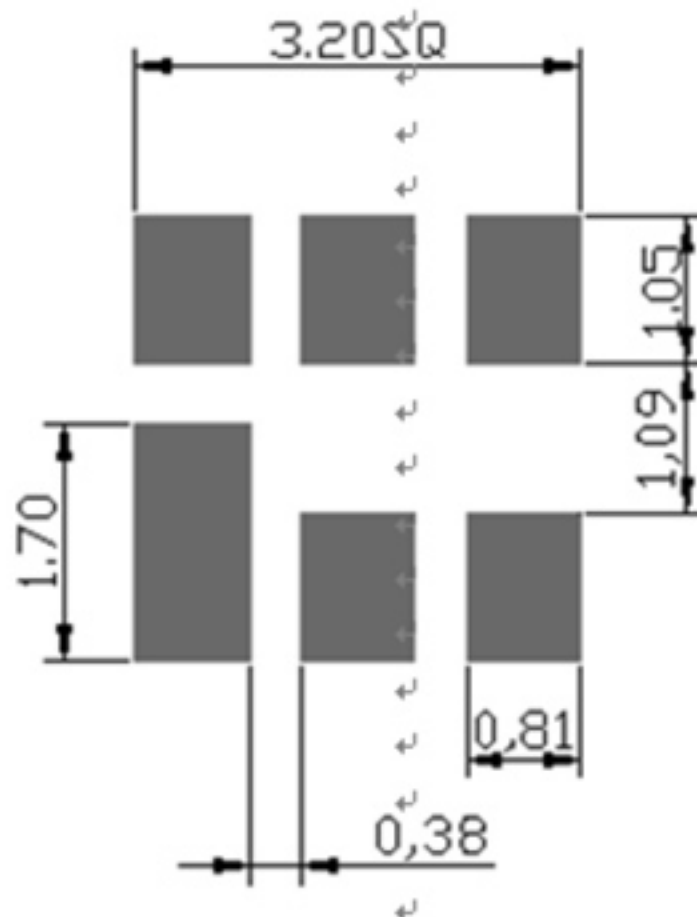
Data code : See the table

WK	01	02	...	26	27	28	...	52
Code	A	B	...	Z	a	b	...	z

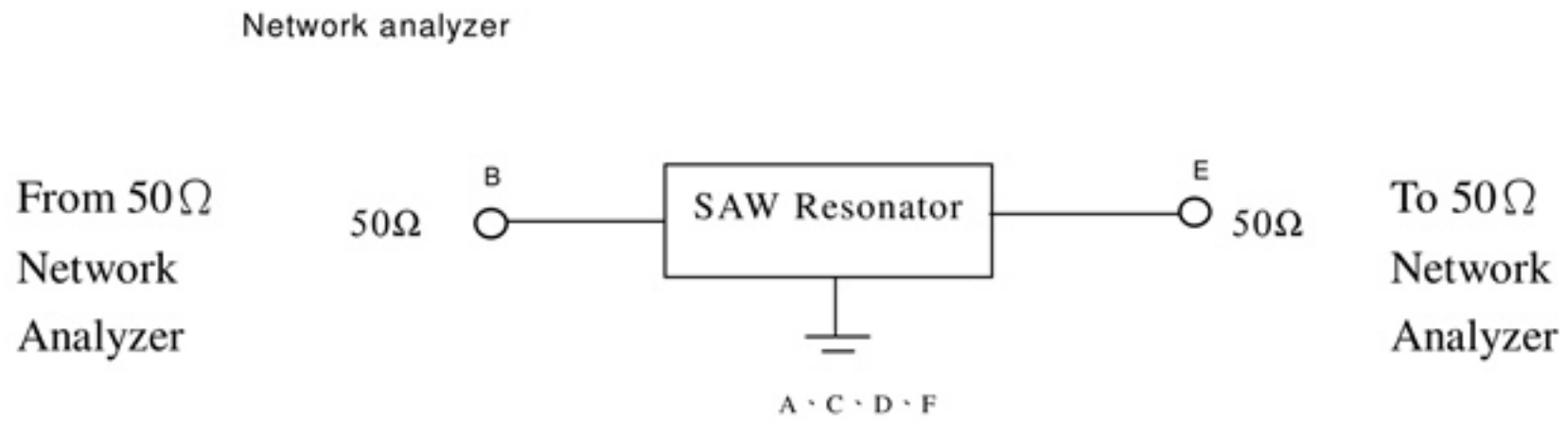
△ Year code : See the table

Year	2008	2009	2010	2011	...	2019	2020
Code	8	9	0	1	...	9	0

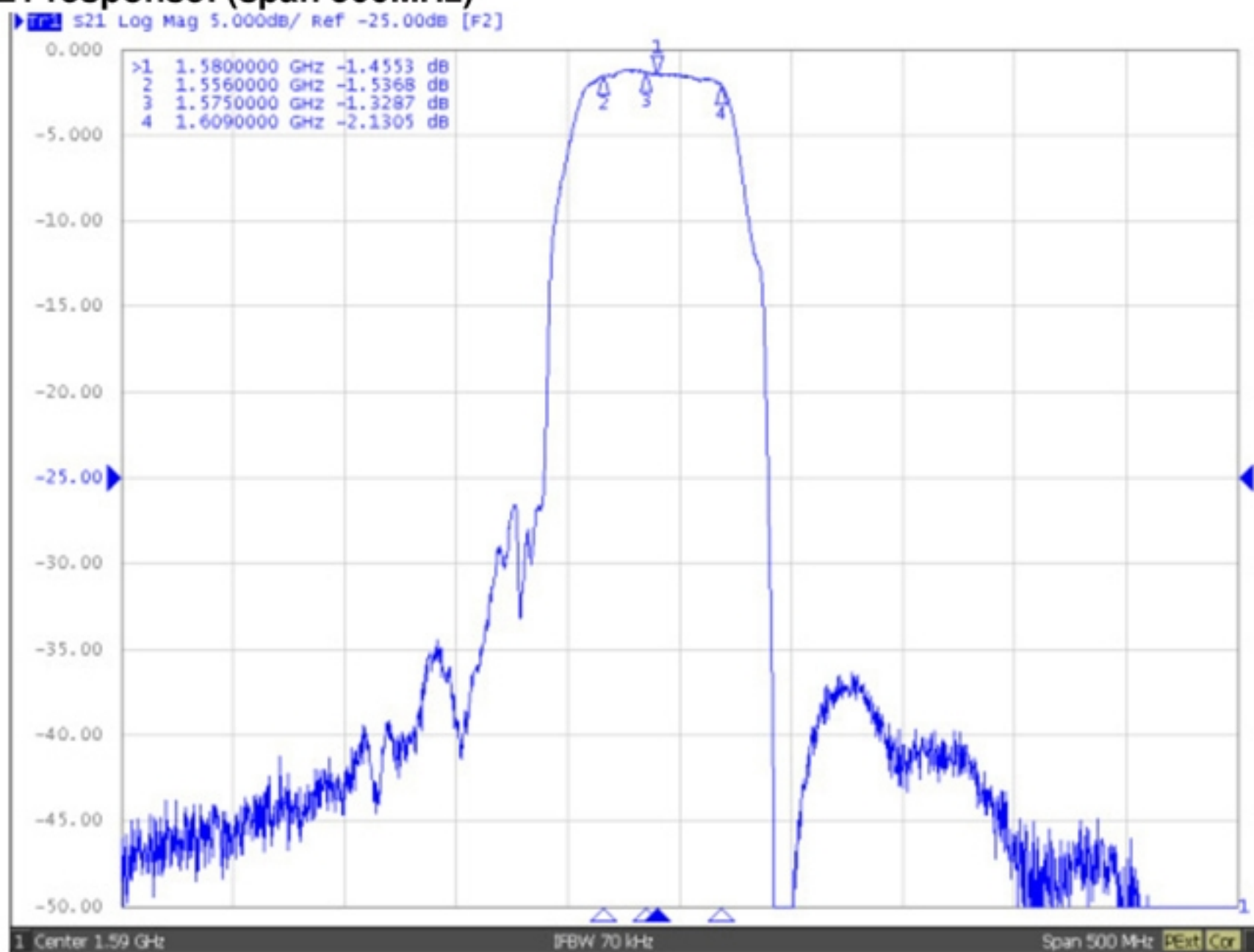
D.FOOT PRINT:



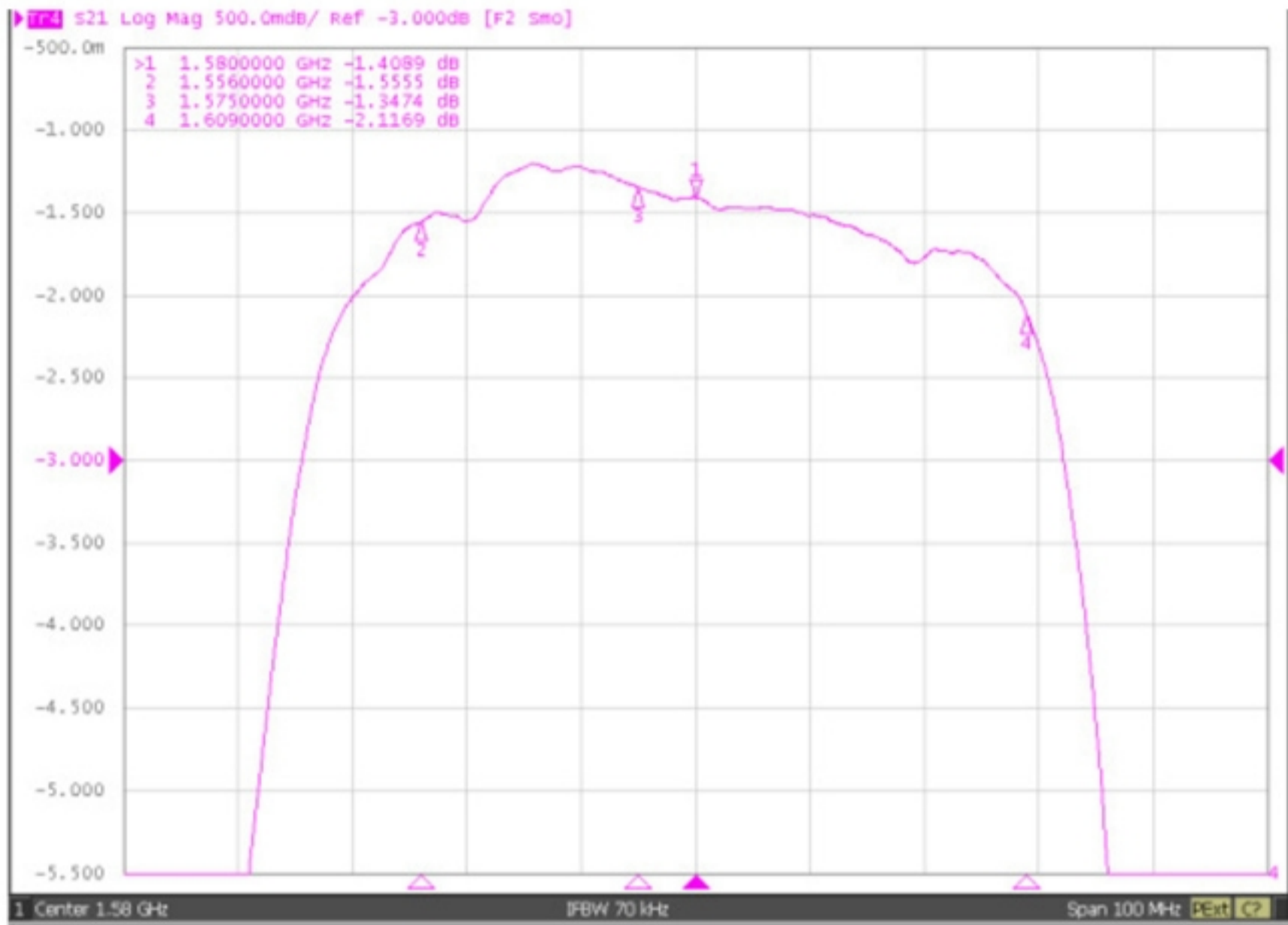
E. TEST CIRCUIT:



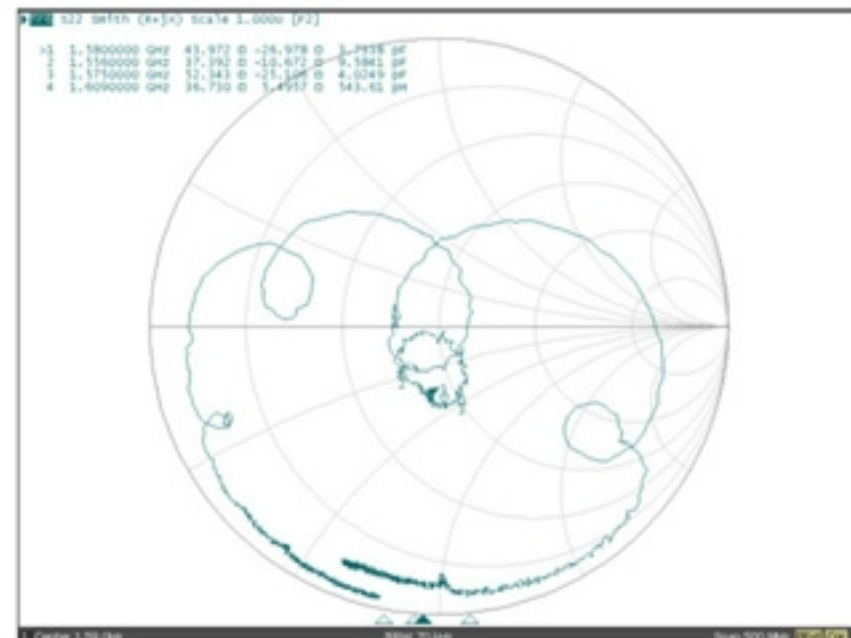
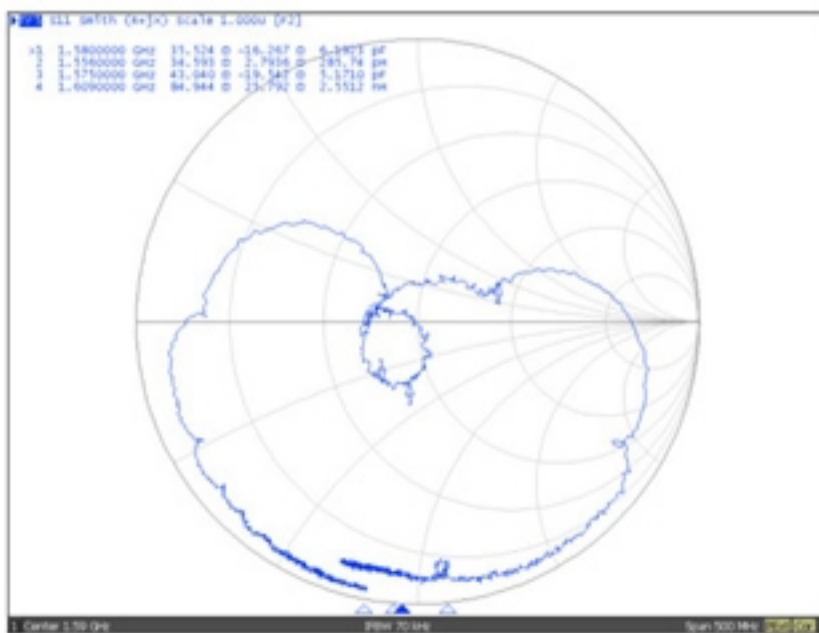
F. Frequency Characteristics: S21 response: (span 500MHz)



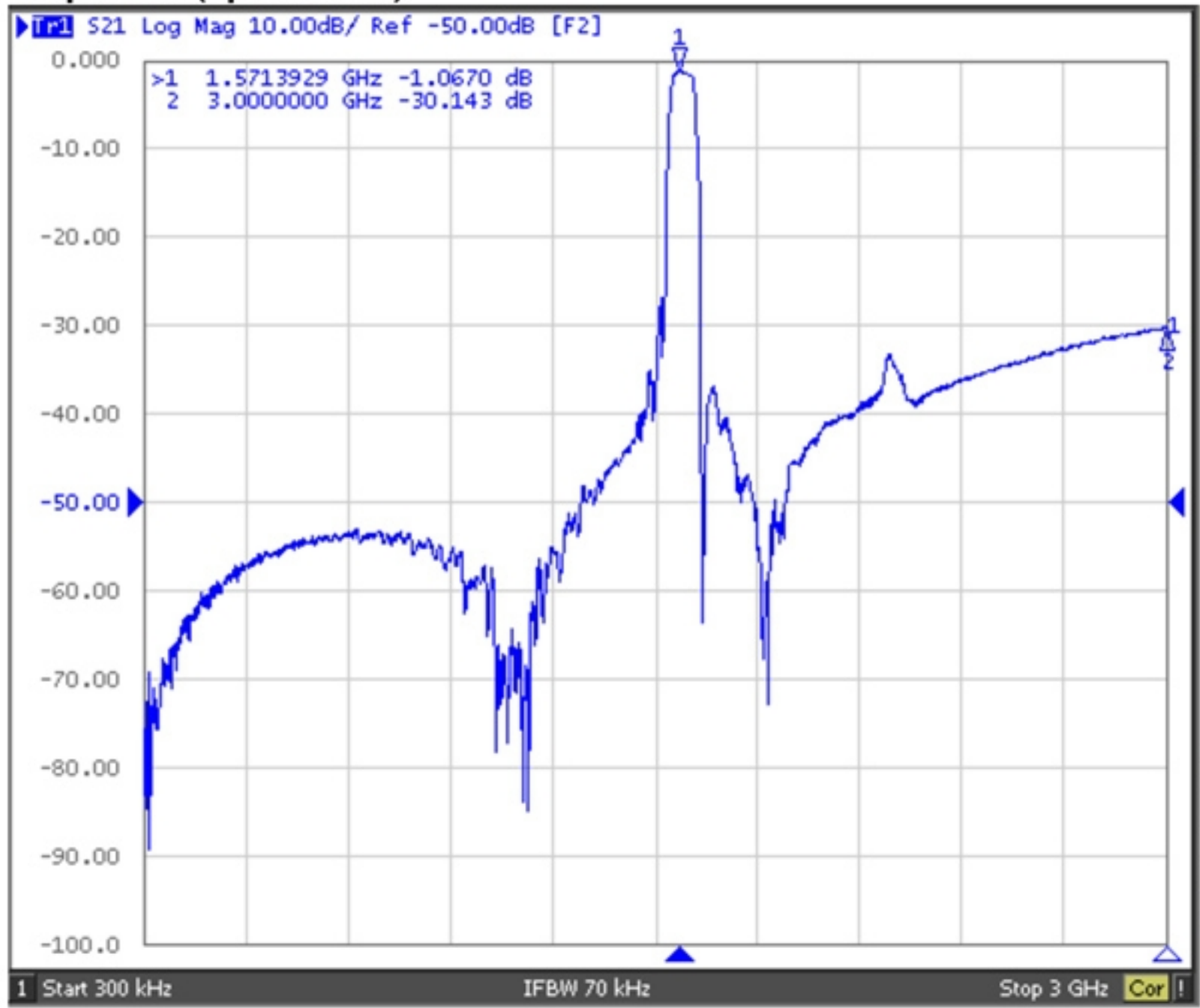
S21 response: (span 100MHz)



S11/S22 response :



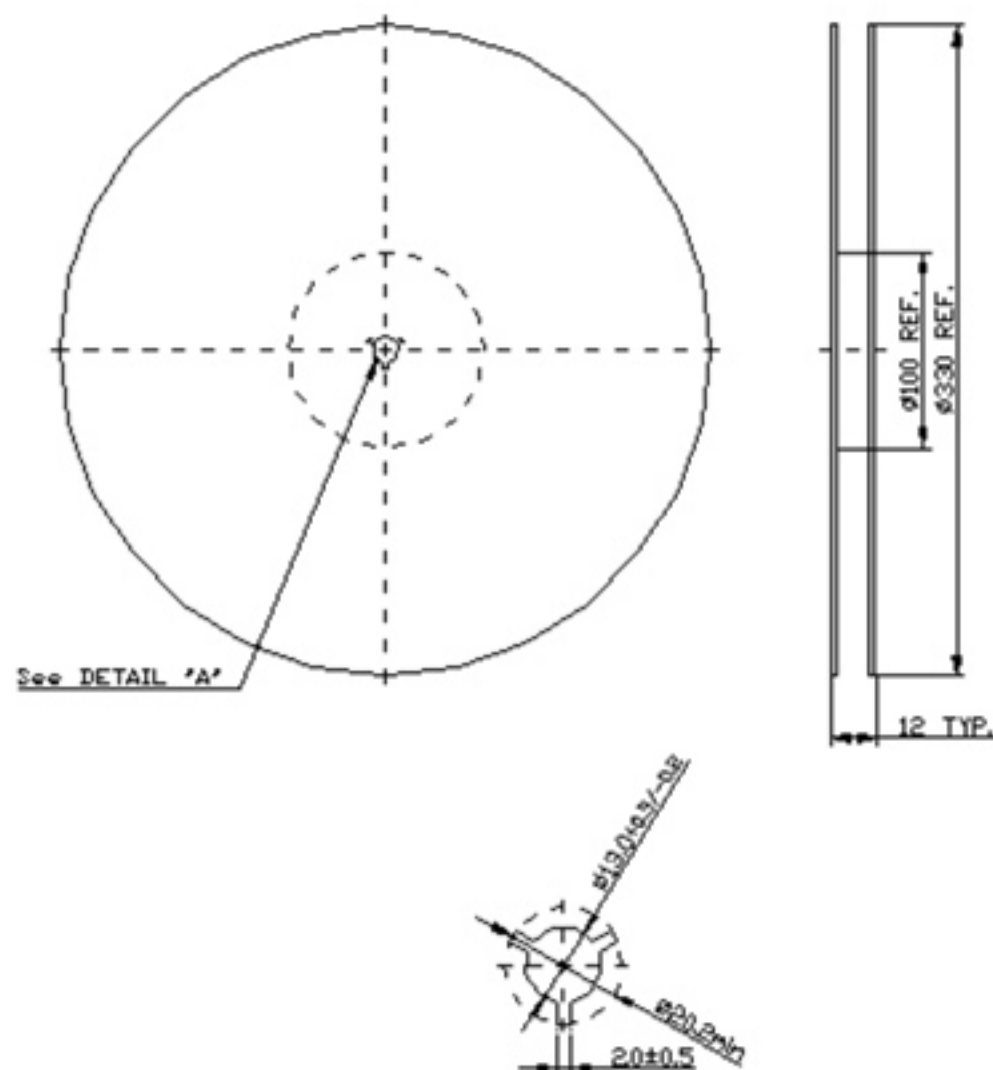
S21 response: (span 3GHz)



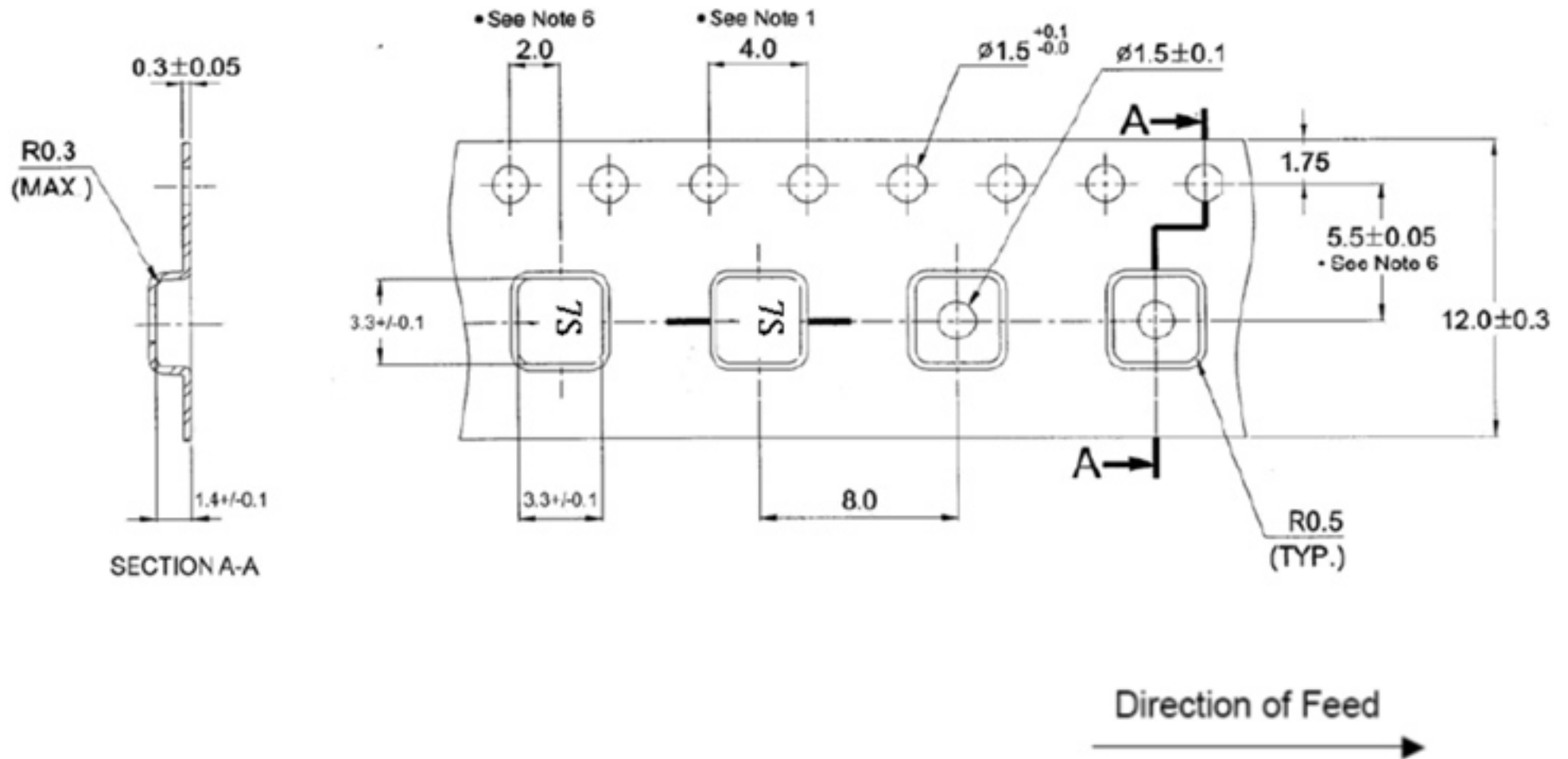
G. PACKING:

1. REEL DIMENSION

(Please refer to FR-75D10 for packing quantity)



2. TAPE DIMENSION



H. Recommended Reflow Profile:

1. Preheating shall be fixed at $150 \sim 180^\circ\text{C}$ 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 $260^\circ\text{C} +0/-5^\circ\text{C}$ peak (20~40sec).
4. Time: 2 times.

