

SAW Rx Filter 881.5MHz LTE Band 5 SMD 1109 (BW=25 MHz)

MODEL NO.: TA1690D

REV. No.: 3.0

A. MAXIMUM RATING:

1. Maximum Input Power: 15 dBm
2. DC voltage: 0 V
3. Operating Temperature: -30 °C to +85 °C
4. Storage Temperature: -40 °C to +85 °C
5. Moisture Sensitivity Level: Level 3
6. ESD 50V(MM) 100V(HBM)

RoHS Compliant
Lead free
Lead-free soldering

Electrostatic Sensitive Device (ESD)

B. ELECTRICAL CHARACTERISTICS:

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

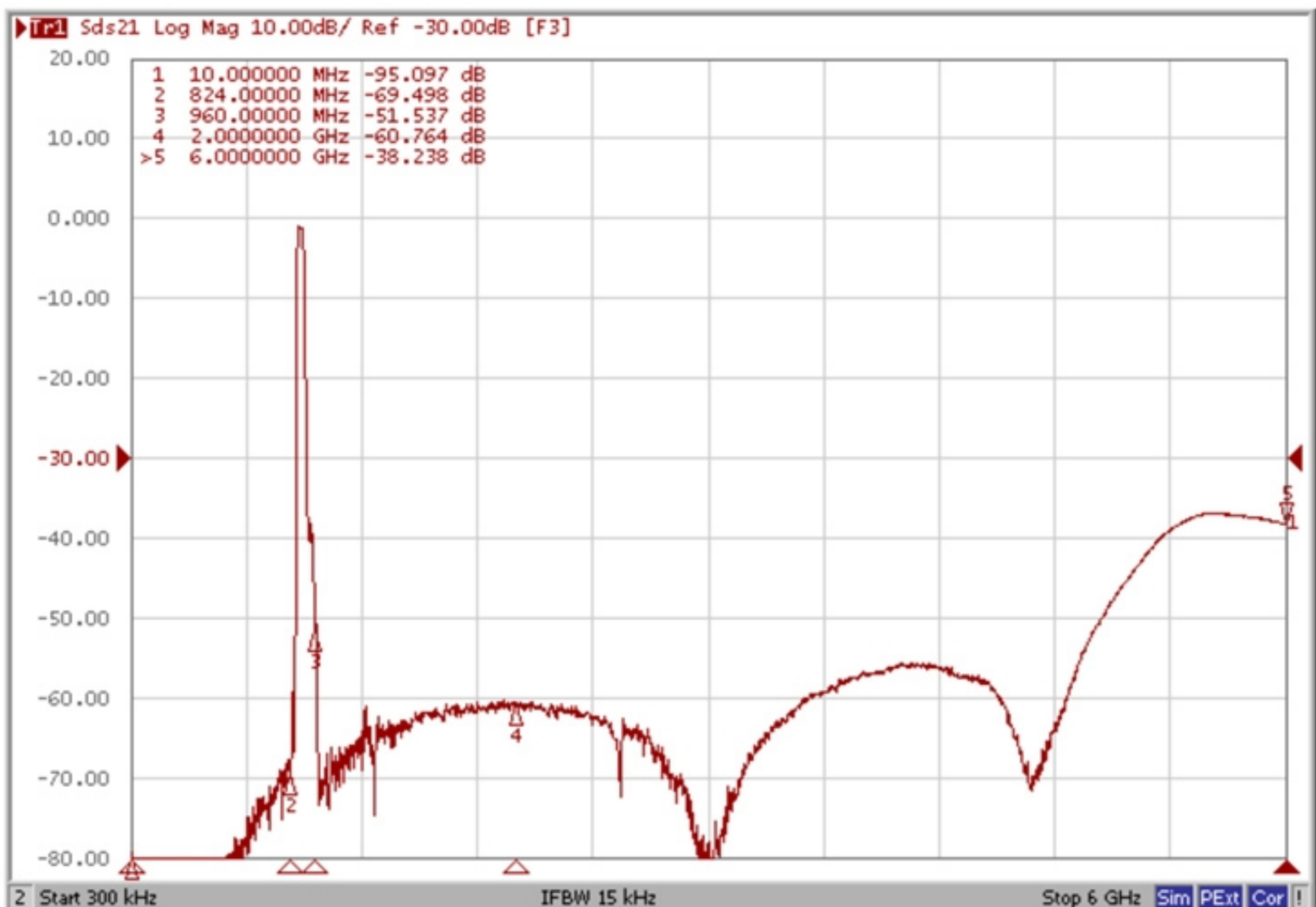
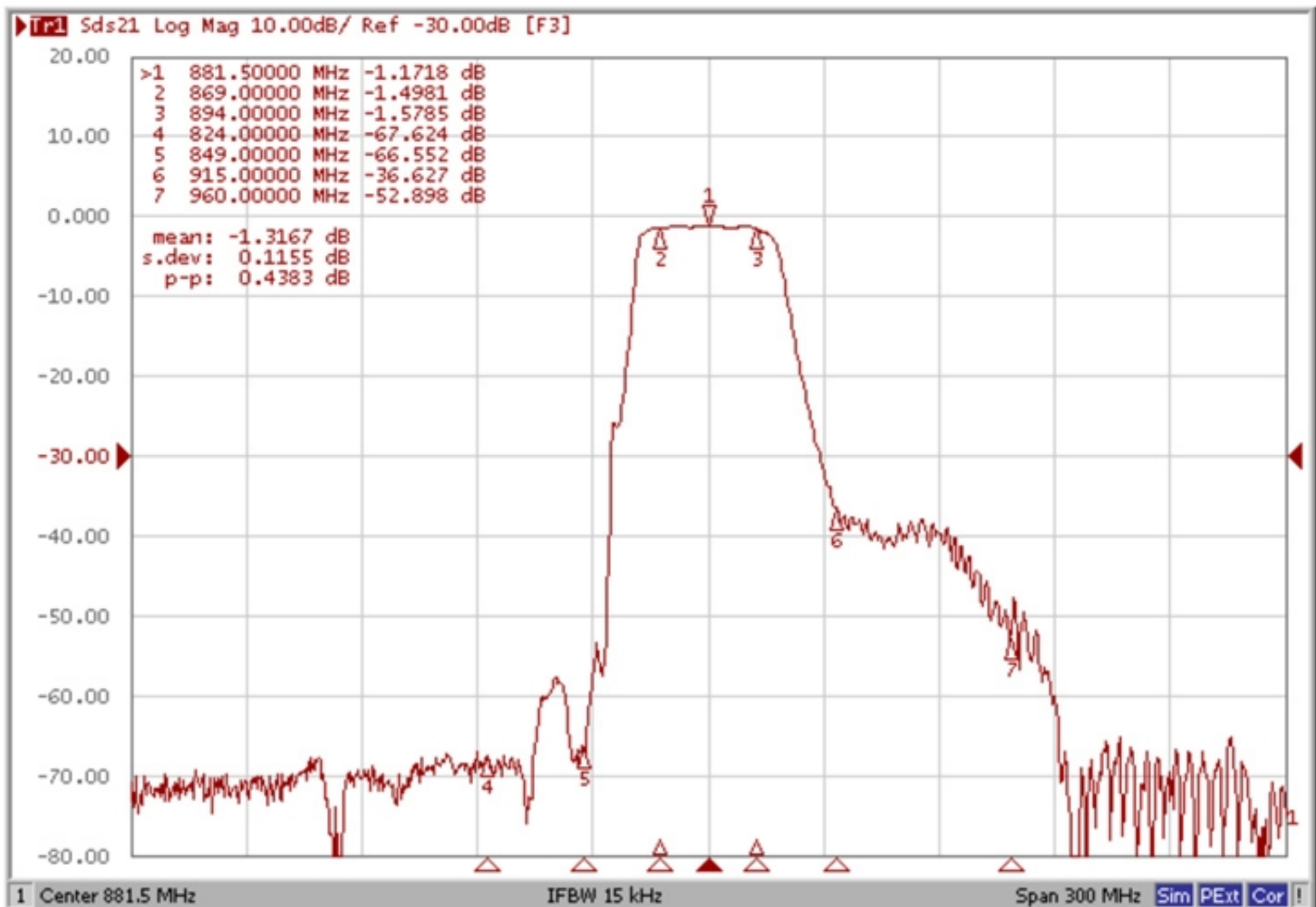
Terminating load impedance: $Z_L = 100 \Omega$ (balance)

Parameters Description		Unit	Mini	Typical	Max
Center Frequency (Fo)		MHz	-	881.5	
Insertion Loss	869.0 ~ 894.0 MHz	dB	-	1.5	2.0
Amplitude Ripple		dB _{p-p}	-	0.5	1.0
VSWR		-	-	1.7	2.0
Amplitude balance		dB	-1.0	-0.4 ~ +0.2	+1.0
Phase balance		deg	-10	-0.3 ~ +3.7	+10
Attenuation:					
DC ~ 824.0 MHz		dB	50	65	-
824.0 ~ 849.0 MHz		dB	50	57	-
914.0 ~ 960.0 MHz		dB	25	36	-
960.0 ~ 2000.0 MHz		dB	40	51	-
2000.0 ~ 6000.0 MHz		dB	30	37	-

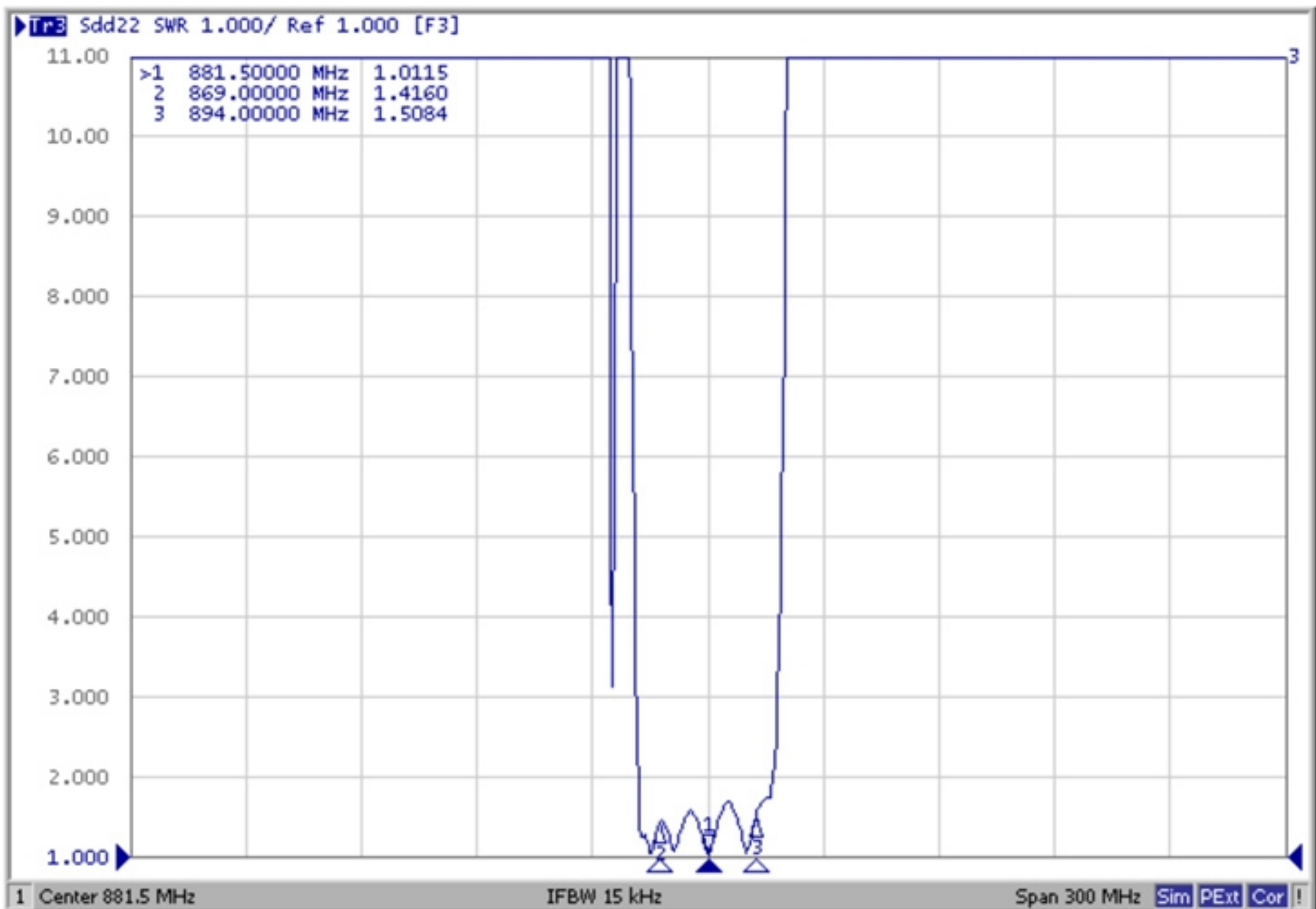
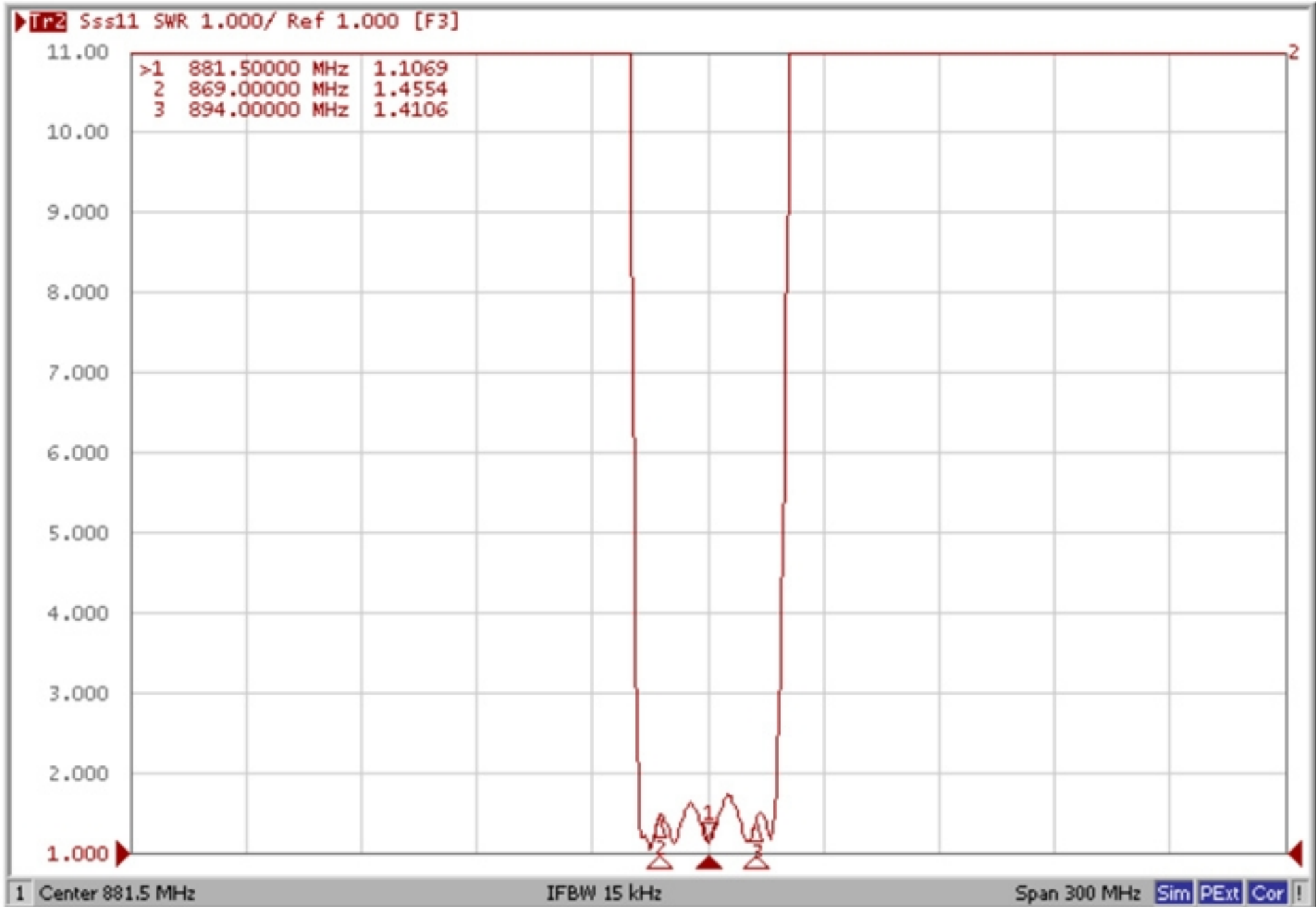
Notes : (1) No Matching Network .

C. Frequency Characteristics :

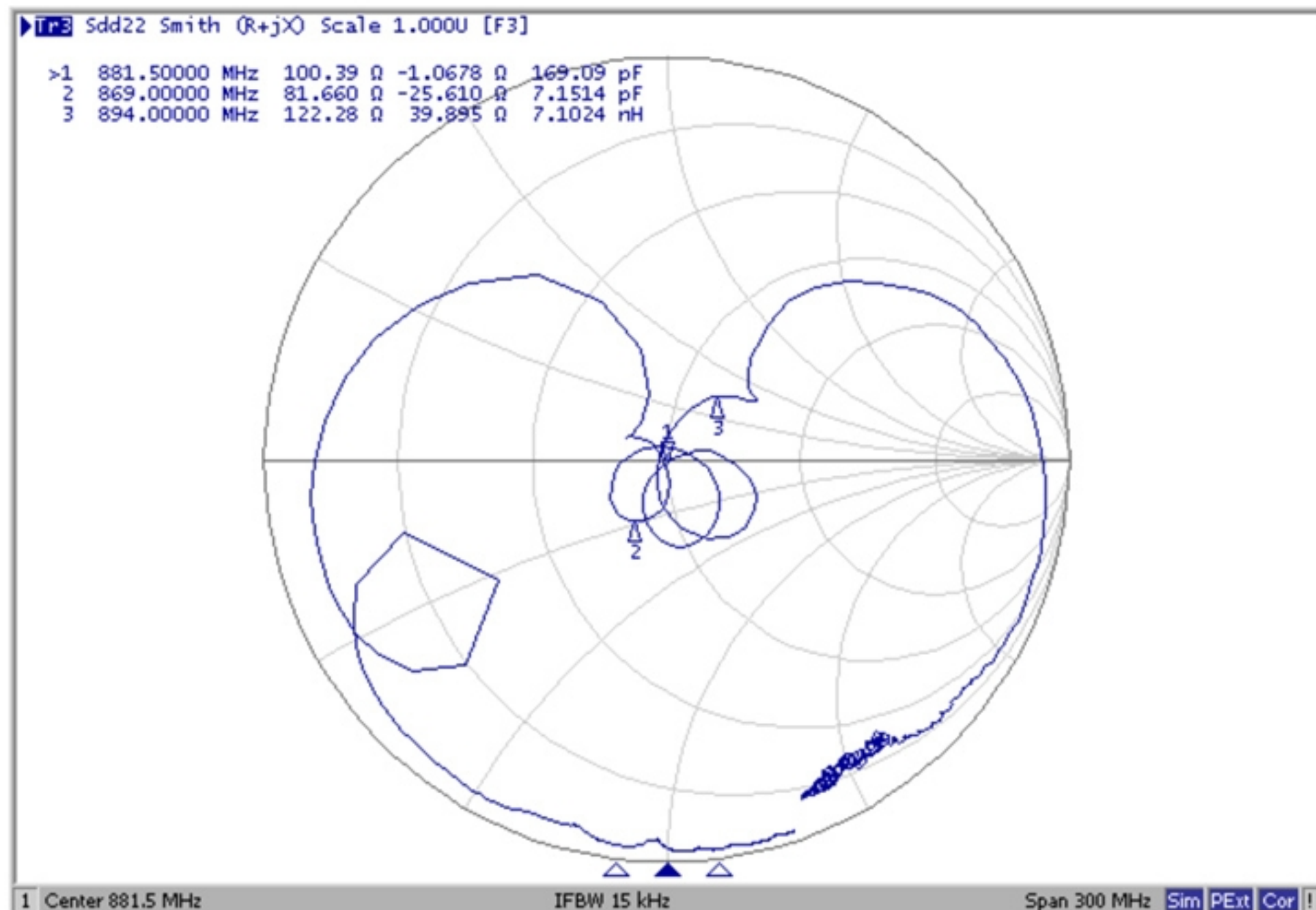
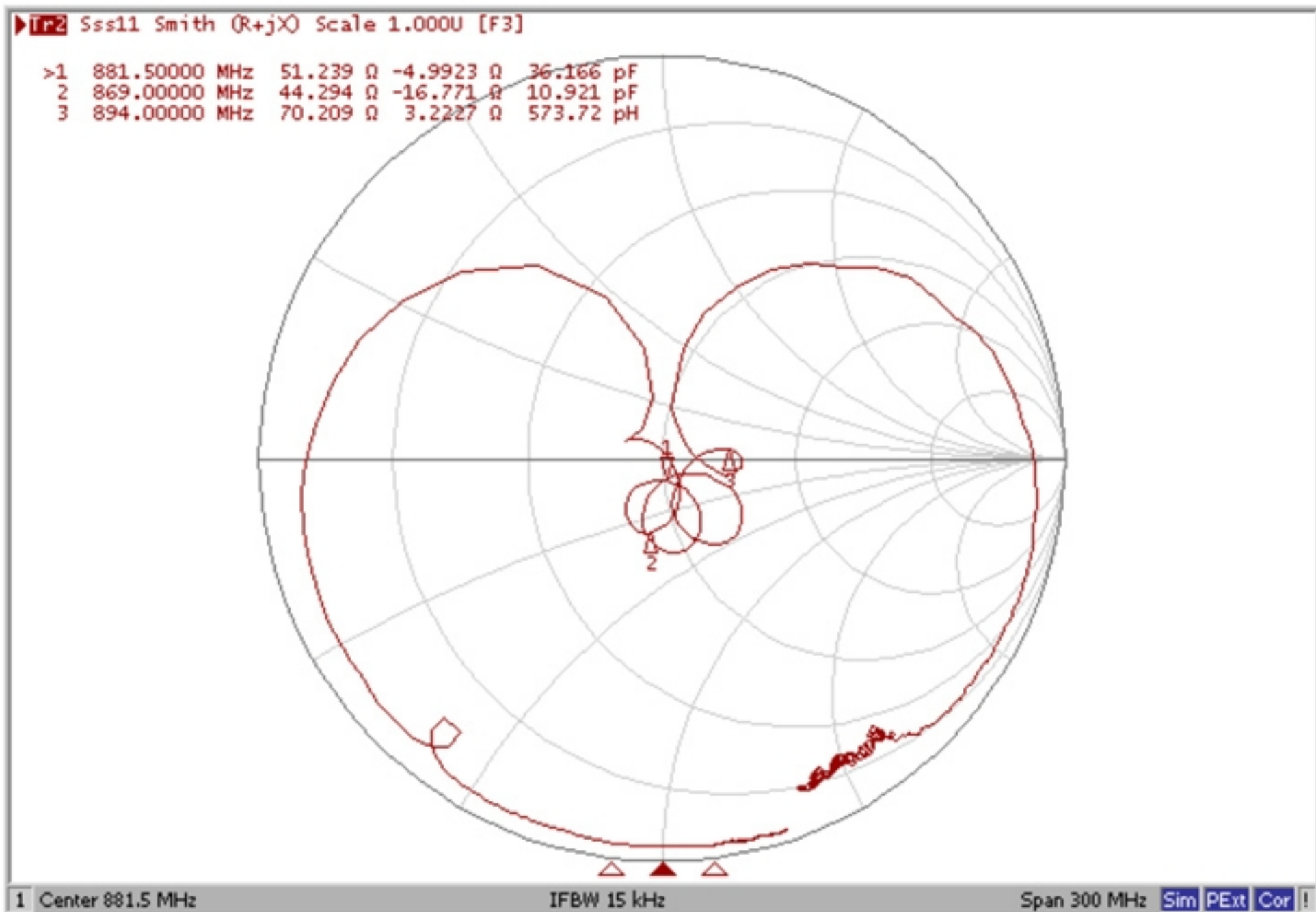
Frequency Response



VSWR



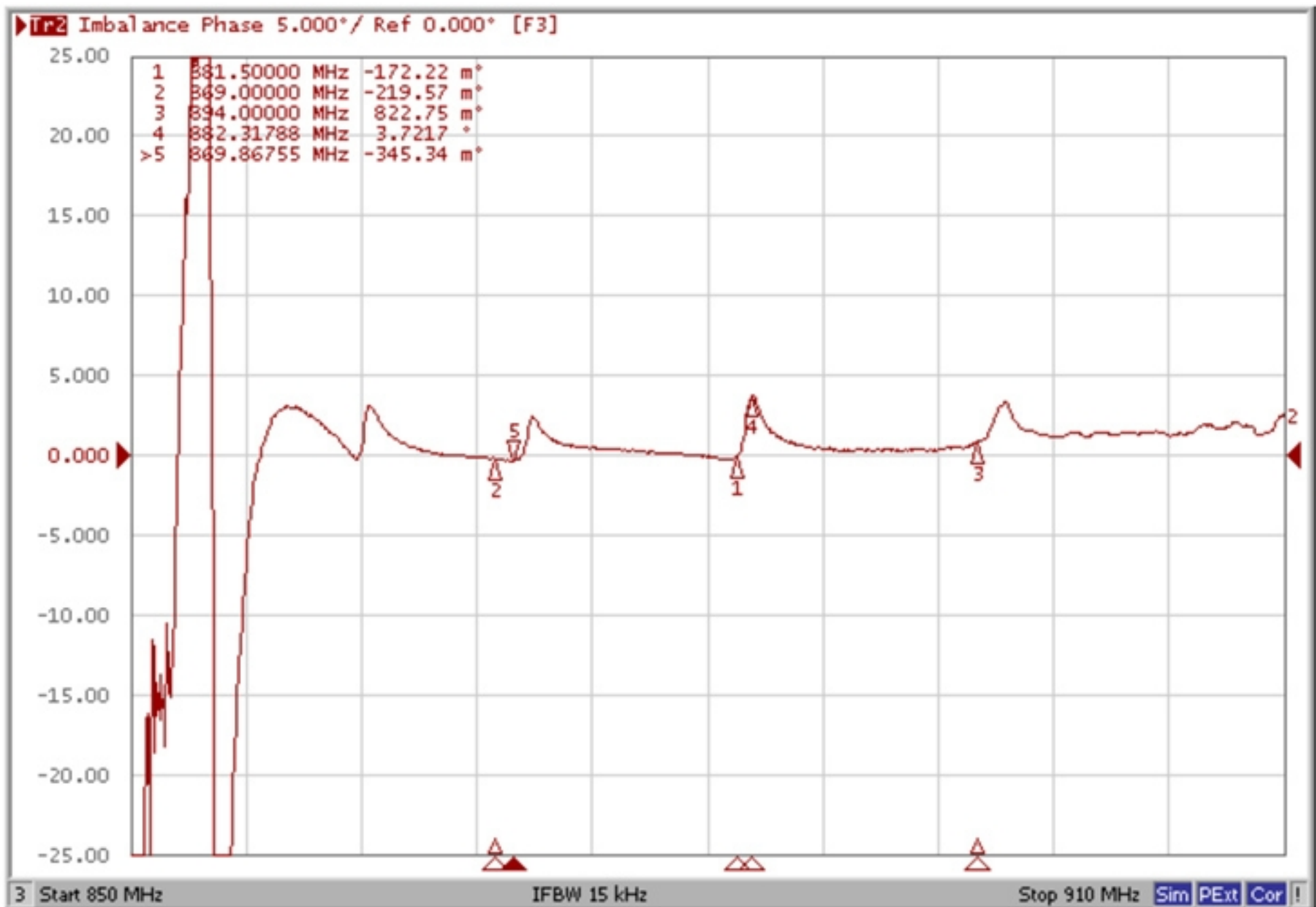
Smith Chart



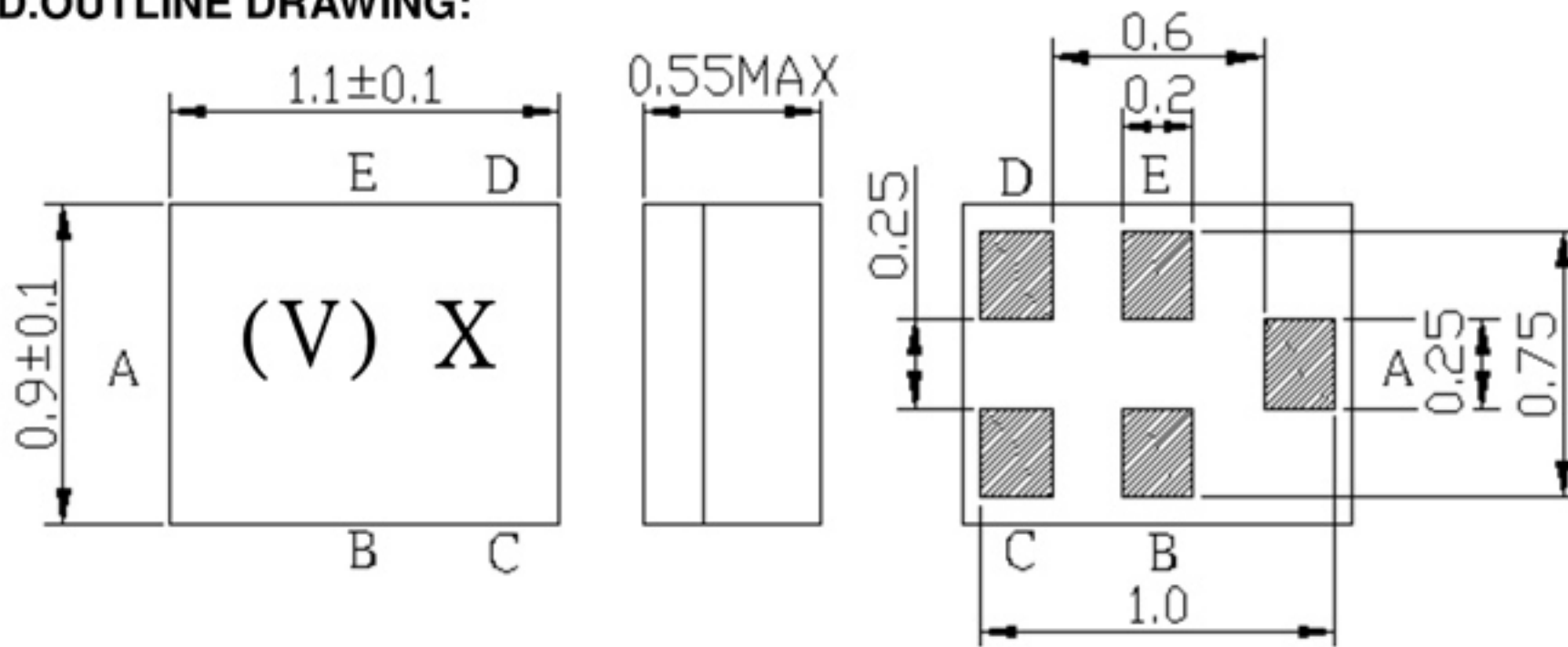
Amplitude balance



Phase balance



D.OUTLINE DRAWING:



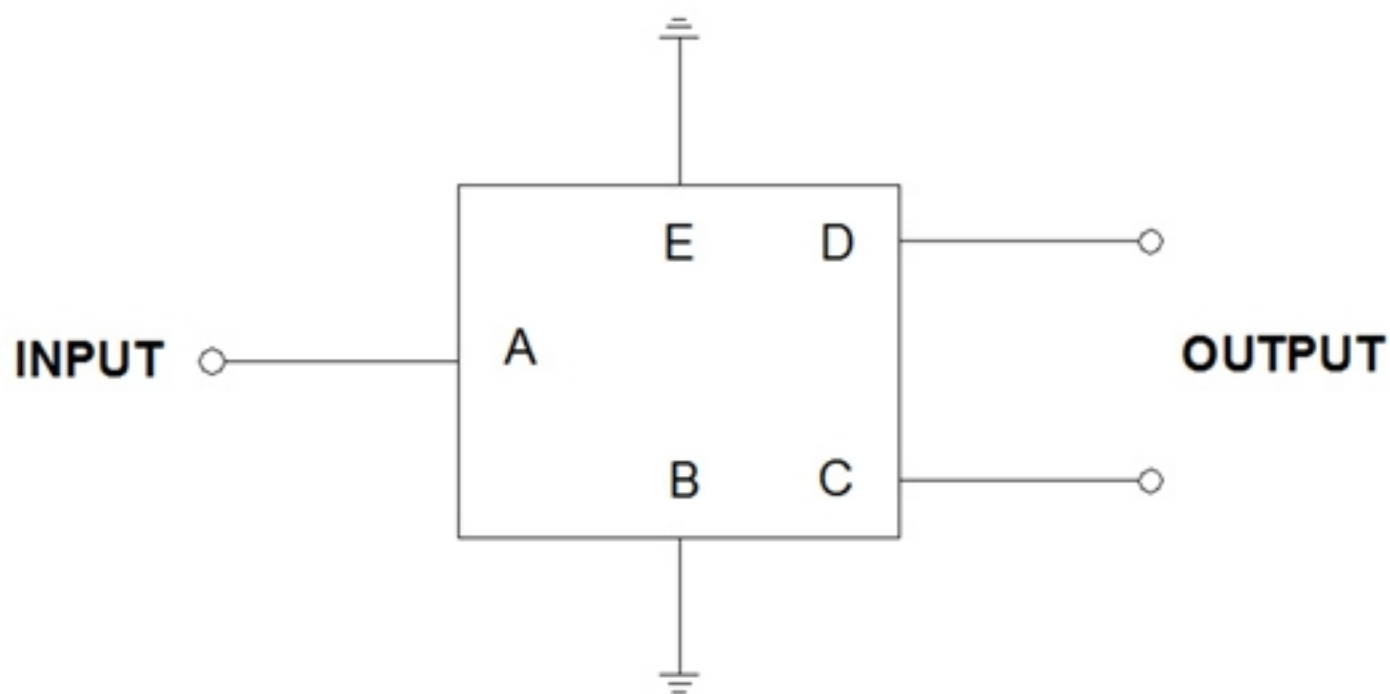
Marking Descriptions	
(V)	Series Number
X	Date Code(Year+Month)

Pin Description	
B, E	Ground
A	Input
C, D	Balanced Output

Product date Code:

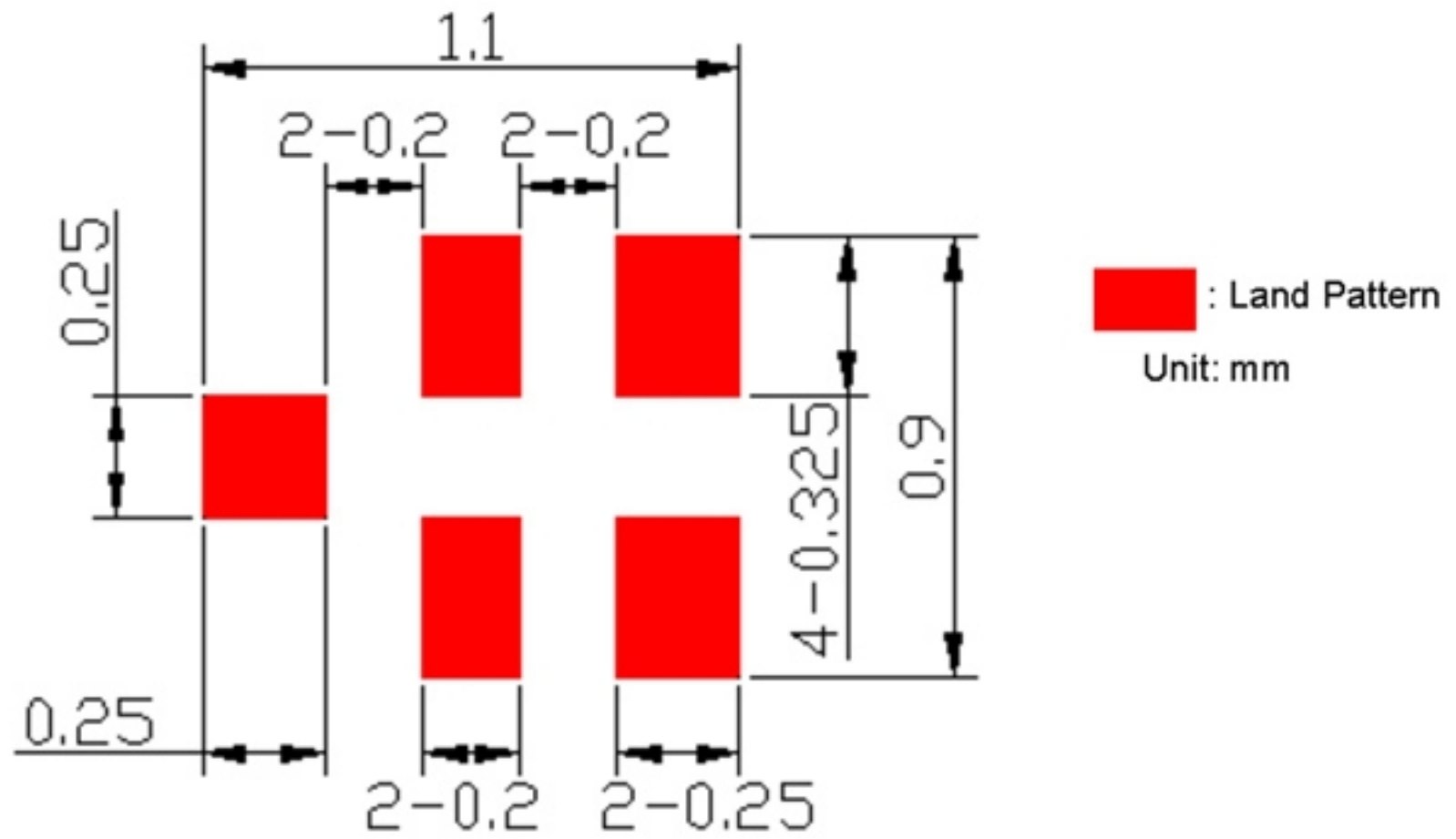
YEAR/Month	1	2	3	4	5	6	7	8	9	10	11	12
2013	A	B	C	D	E	F	G	H	J	K	L	M
2014	N	P	Q	R	S	T	U	V	W	X	Y	Z
2015	a	b	c	d	e	f	g	h	j	k	l	m
2016	n	p	q	r	s	t	u	v	w	x	y	z
2017	<u>A</u>	<u>B</u>	<u>C</u>	<u>D</u>	<u>E</u>	<u>F</u>	<u>G</u>	<u>H</u>	<u>J</u>	<u>K</u>	<u>L</u>	<u>M</u>
2018	<u>N</u>	<u>P</u>	<u>Q</u>	<u>R</u>	<u>S</u>	<u>T</u>	<u>U</u>	<u>V</u>	<u>W</u>	<u>X</u>	<u>Y</u>	<u>Z</u>
2019	<u>a</u>	<u>b</u>	<u>c</u>	<u>d</u>	<u>e</u>	<u>f</u>	<u>g</u>	<u>h</u>	<u>j</u>	<u>k</u>	<u>l</u>	<u>m</u>
2020	<u>n</u>	<u>p</u>	<u>q</u>	<u>r</u>	<u>s</u>	<u>t</u>	<u>u</u>	<u>v</u>	<u>w</u>	<u>x</u>	<u>y</u>	<u>z</u>

E. MEASUREMENT CIRCUIT:



Source Impedance: 50 Ω
 Load Impedance: 100 Ω

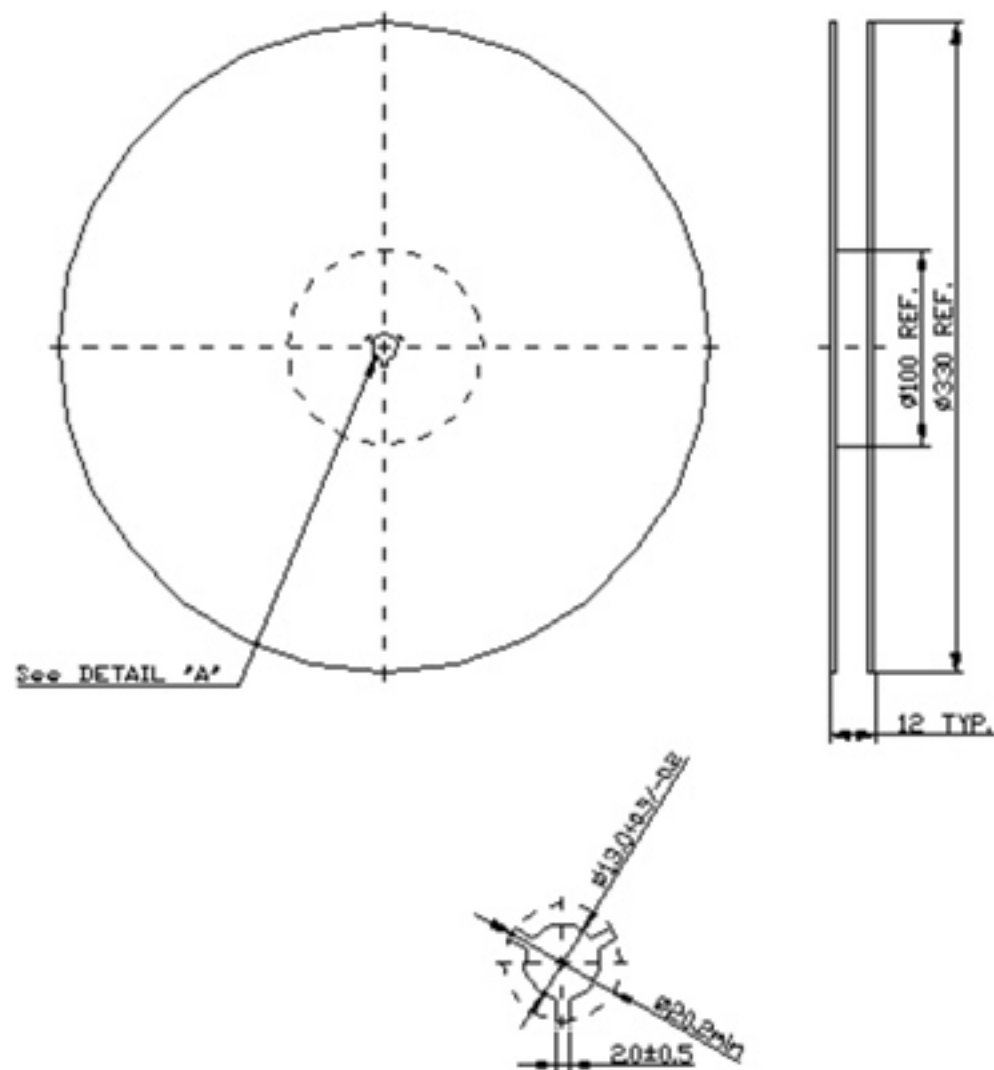
F. PCB Footprint :



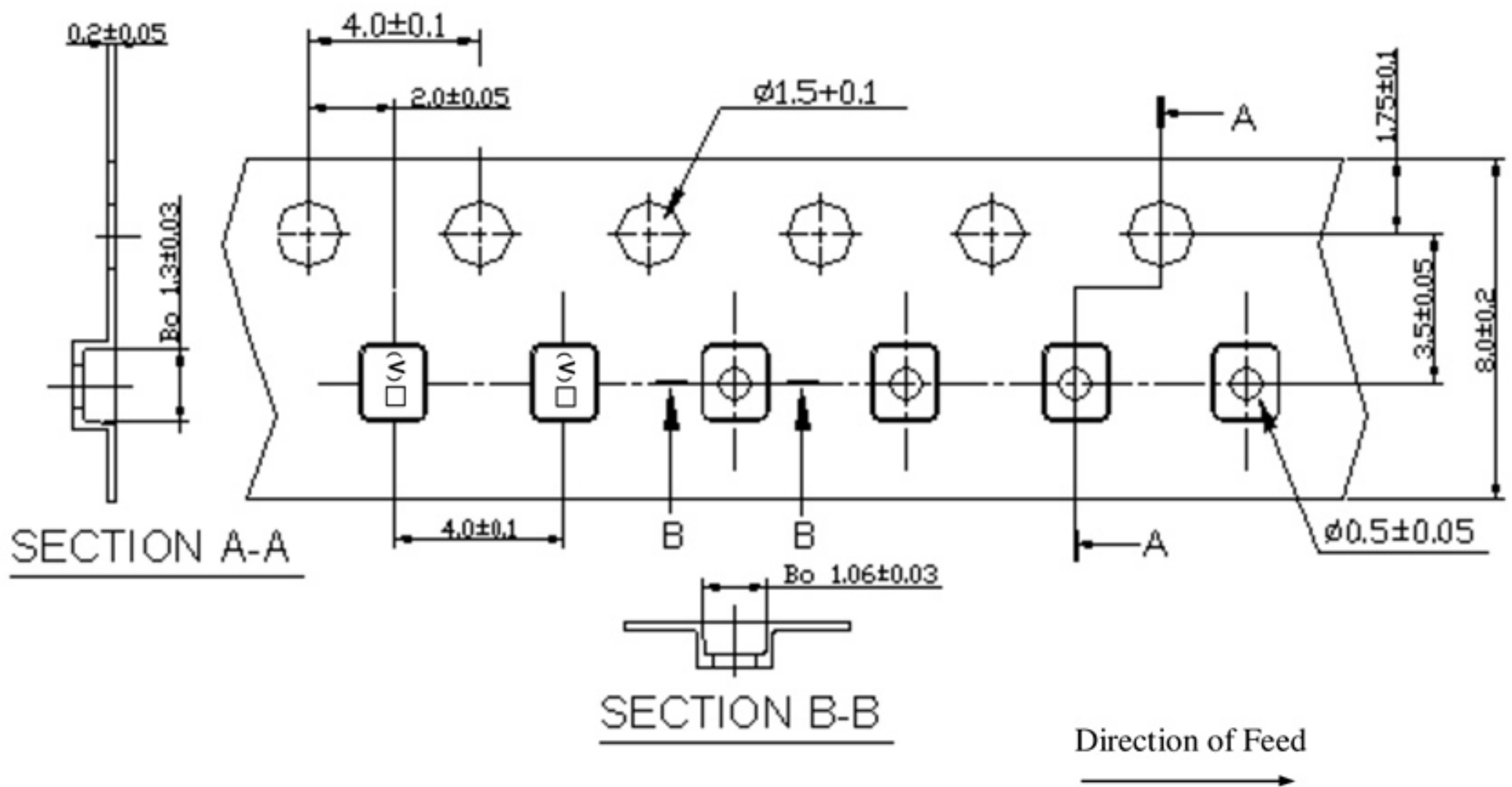
G. PACKING:

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 $60\sim 90$ seconds.
2. Ascending time to preheating temperature 150°C shall be 30 seconds min.
3. Heating shall be fixed at 220°C for $50\sim 80$ seconds and at $245\sim 260^{\circ}\text{C}$ peak (min. 10sec).
4. Time : 2 times.

