

OTA TEST REPORT

Applicant Shenzhen General Test System Co., Ltd
Product RayZone1800
Issue Date January 15, 2026

Shenzhen Fu Bang Wireless Technology Co., Ltd. tested the above equipment in accordance with the requirements in **ANTI/IEEE Std 149-2008**. The test results show that the equipment tested is capable of demonstrating compliance with the Requirements as documented in this report.

Prepared by: Lunkang Yan

Approved by: Jibo zhang

Shenzhen Fu Bang Wireless Technology Co., Ltd.

Room 302, lianjian Industry Part, Huarong road, Longhua District, Shenzhen, P.R. China

1. Test Laboratory

1.1 Notes of the Test report

This report shall not be reproduced in full or partial. The results documented in this report apply only to the tested sample, under the conditions and modes of operation as described herein. Measurement Uncertainties were not taken into account and are published for informational purposes only. This report is written to support regulatory compliance of applicable standards stated above.

1.2 Test facility

GTS1800 Microwave Anechoic Chamber : testing frequency ranges from 600MHz to 6GHz .

1.3 Testing Location

Company: Shenzhen Fu Bang Wireless Technology Co., Ltd
Address: Room 302, Lianjian Industry Part, Huarong road, Longhua District,
Shenzhen, P.R. China
Contact: Iunkang Yan
Telephone: 13760182610
E-mail: 646363118@qq.com

1.4 Laboratory Environment

Temperature	Min.= 19°C, Max.=25°C	
Relative humidity	Min.=40%, Max.=72%	
Shield effect	0.6-7GHz	>100dB
Ground resistance	<0.5 Ω	

2. General Description of Equipment under Test

2.1 Applicant and Manufacturer information

Applicant Name	Shenzhen General Test System Co., Ltd
Applicant address	Building C-A7 Suite 805,2190 Liuxian Avenue, Nanshan District, Shenzhen, P.R. China
Manufacturer Name	Shenzhen General Test System Co., Ltd
Manufacturer address	Building C-A7 Suite 805,2190 Liuxian Avenue, Nanshan District, Shenzhen, P.R. China

2.2 General information

EUT Description	
Product Name	RayZone1800
Model	GTS-ANT D-H
HW Version	RayZone1800 V1.0
SW Version	MaxSign 100
Antenna Type	FPC Antenna
Antenna Manufacturer	Shenzhen General Test System Co., Ltd
Test Frequency	600MHz-5.8GHz

2.3 Applied Standards

According to the specifications of the manufacturer, it must comply with the requirements of the following standards:

Test Method: **ANSI/IEEE Std 149-2008**

3. Test Conditions

3.1 Test Configuration

The method is used to measure the antenna 3D GAIN of EUT in OTA qualified anechoic chamber. Equipment Under Test (EUT) geometry centre vertical projection at the centre of platform, the distance from EUT to measurement antenna is 1m.

3.2 Test Measurement

Spherical coordinate system

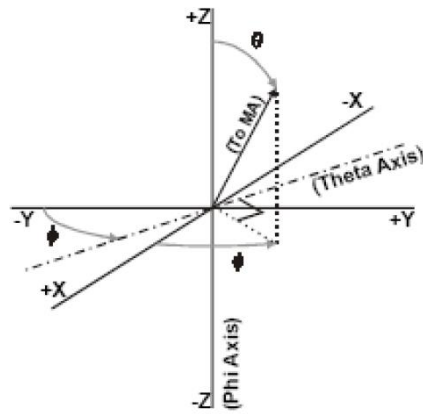
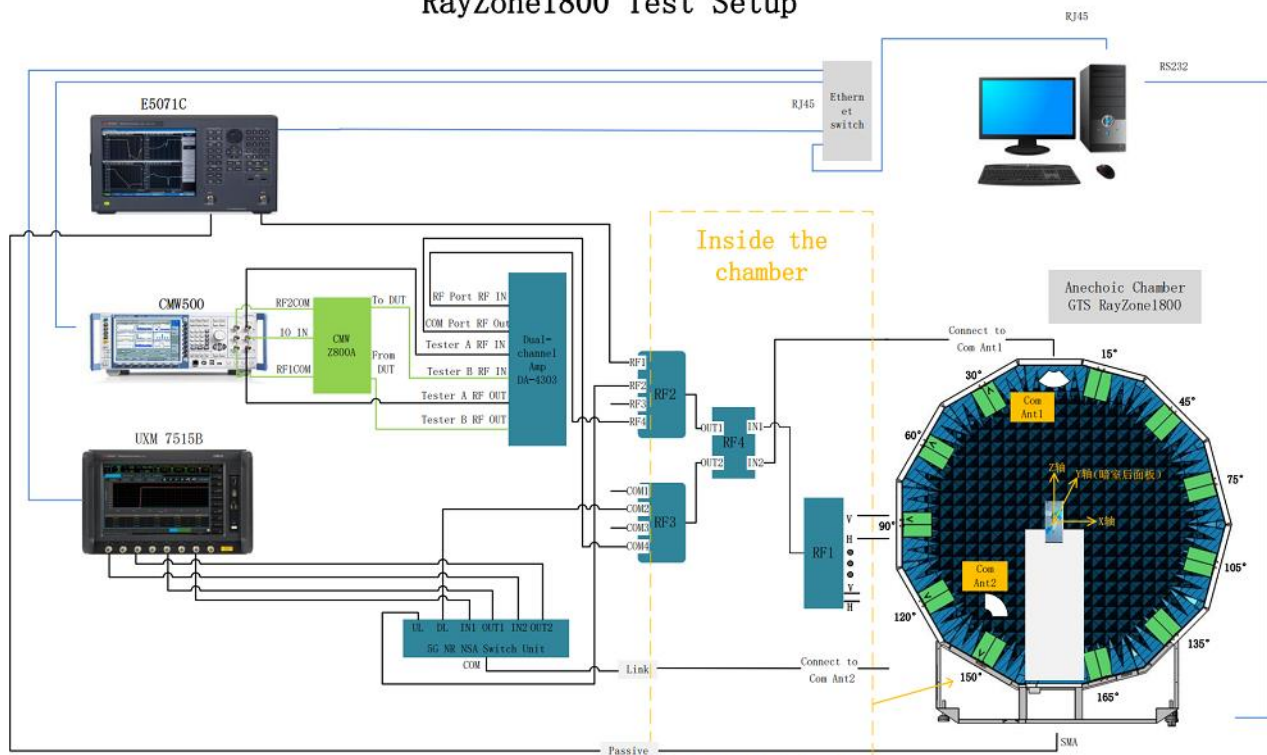


Figure 1 Test coordinate system

Note: Theta is from 0-180degree. Phi is from EUT and record the Date, the step of rotation is 15 degree.

Test Setup

RayZone1800 Test Setup



4. Test Results

4.1 Gain and Efficiency

Shenzhen Fu Bang Wireless Technology Co., Ltd.

This report shall not be reproduced except in full, without the written approval of Shenzhen Fu Bang Wireless Technology Co., Ltd.

OTA Test Report

Model	Test State	Frequency (MHz)	Efficiency (%)	Gain (dBi)	Frequency (MHz)	Efficiency (%)	Gain (dBi)	Note
	Free Space	620	14.2	-6.5	1820	32.6	-0.5	
		630	14.5	-6.3	1840	34.7	-0.4	
		640	15.0	-5.9	1860	36.8	-0.3	
		650	15.5	-5.5	1880	38.6	-0.2	
		660	15.9	-5.1	1900	40.4	-0.1	
		670	15.4	-5.1	1920	42.5	-0.1	
		680	14.8	-6.1	1940	43.3	-0.1	
		690	14.4	-6.4	1960	43.1	-0.1	
		700	16.0	-4.5	1980	39.4	-0.1	
		710	16.9	-4.3	2000	35.7	-0.4	
		720	17.4	-4.3	2020	33.0	-0.5	
		730	17.6	-4.6	2040	30.5	-0.8	
		740	17.5	-4.7	2060	29.4	-0.9	
		750	17.5	-4.7	2080	29.5	-0.9	
		760	16.3	-5.1	2100	30.1	-0.9	
		770	15.5	-5.3	2120	30.1	-0.9	
		780	15.0	-5.3	2140	30.2	-0.9	
		790	14.3	-5.5	2160	29.1	-1.0	
		800	13.2	-5.8	2180	27.4	-1.2	
		810	15.9	-4.6	2200	26.1	-1.3	
		820	18.1	-4.2	2300	25.4	-1.4	
		830	19.4	-3.6	2320	24.5	-1.4	
		840	20.2	-3.4	2340	26.3	-1.2	
		850	20.4	-3.3	2360	27.0	-1.2	
		860	19.3	-3.5	2380	25.0	-1.5	
		870	17.2	-4.0	2400	25.5	-1.5	
		880	14.3	-4.5	2420	28.8	-1.1	
		890	11.7	-5.3	2440	28.0	-1.1	
		900	15.9	-4.6	2460	27.5	-1.2	
		910	18.4	-3.2	2480	27.7	-1.2	
		920	21.9	-2.3	2500	28.4	-1.1	
		930	24.8	-1.8	2520	29.3	-1.0	
		940	26.2	-1.8	2540	30.4	-0.9	
		950	24.1	-2.3	2560	30.9	-0.9	
		960	19.4	-3.4	2580	31.1	-0.8	
		1700	19.3	-2.1	2600	32.6	-0.7	
		1720	21.2	-2.0	2620	32.1	-0.7	
		1740	24.1	-1.6	2640	31.5	-0.8	
		1760	26.4	-1.2	2660	31.9	-0.8	
		1780	28.0	-0.9	2680	32.6	-0.7	
		1800	29.8	-0.8	2700	33.0	-0.6	

Model	Test State	Frequency (MHz)	Efficiency (%)	Gain (dBi)	Frequency (MHz)	Efficiency (%)	Gain (dBi)	Note
	Free Space	1550	24.3	-2.9	5540	30.8	-0.6	
		1560	25.3	-2.7	5580	31.6	-0.7	
		1570	25.7	-2.6	5620	30.5	-1.1	
		1580	25.7	-2.5	5660	32.4	-1.0	
		1590	26.1	-2.5	5700	30.7	-1.1	
		1600	26.5	-2.3	5740	30.1	-1.1	
		2400	21.9	-0.2	5780	27.9	-1.4	
		2410	22.7	0.0	5800	29.7	-1.0	
		2420	23.6	0.1	5820	27.8	-1.4	
		2430	24.7	0.4	5840	26.3	-1.5	
		2440	25.4	0.6	5860	25.5	-1.7	
		2450	25.8	0.6				
		2460	26.3	0.7				
		2470	26.6	0.7				
		2480	26.8	0.8				
		2490	26.8	0.6				
		2500	26.3	0.5				
		5100	29.5	-0.9				
		5140	28.5	-1.5				
		5180	26.3	-1.4				
		5220	27.0	-0.4				
		5260	26.9	-0.7				
		5300	27.8	-0.8				
		5340	29.1	-0.2				
		5380	31.0	0.0				
		5420	30.7	-0.3				
		5460	30.8	-0.3				
		5500	29.6	-0.6				

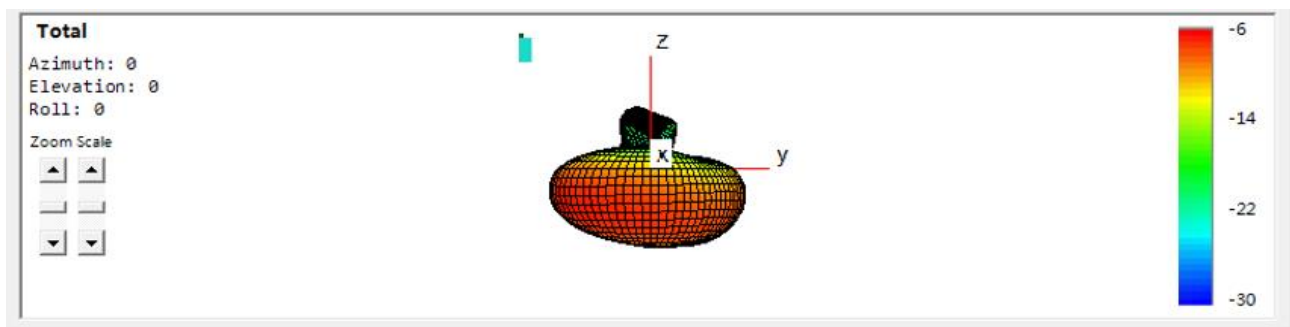
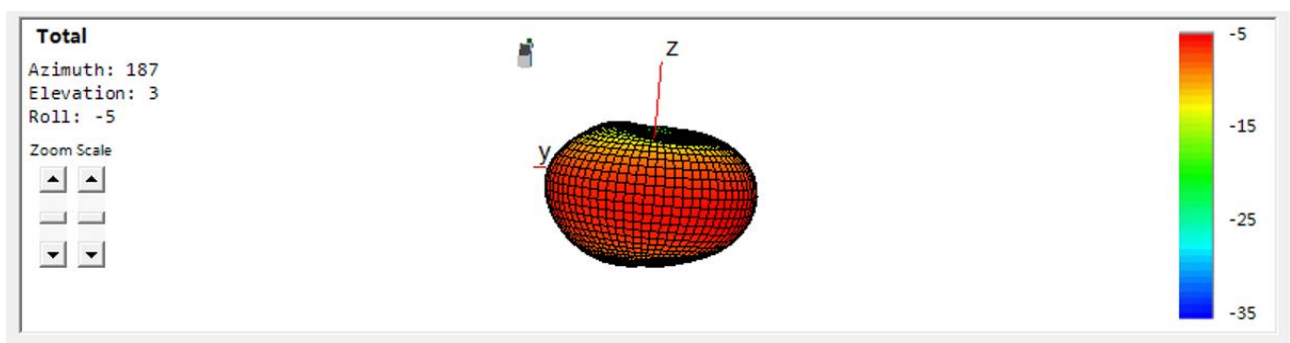
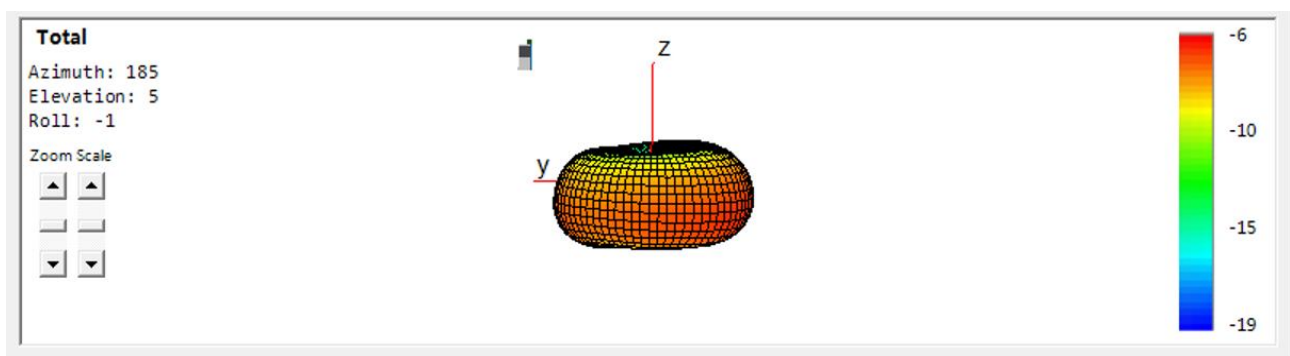
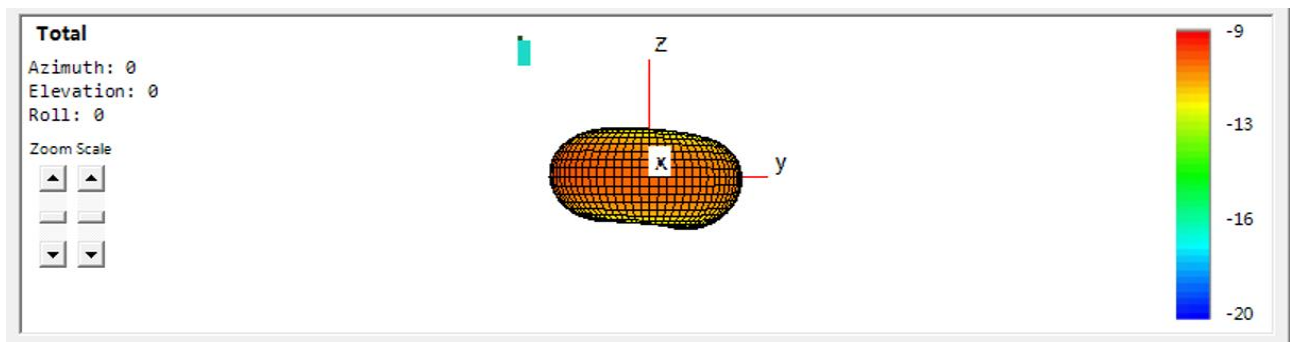
5. Equipment List

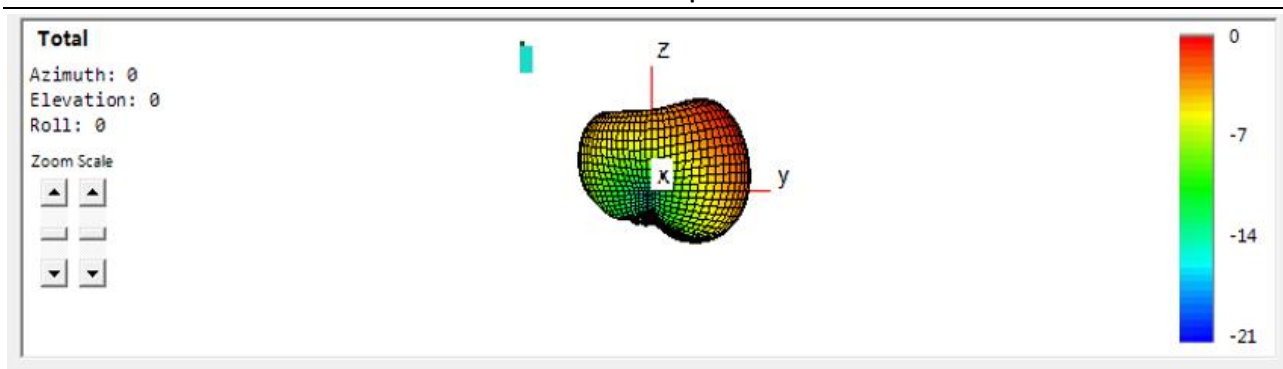
Type of Equipment	Manufacture	Model Number
Network Analyzer	Key sight	E5071C
Switch control System	GTS	RayZone1800
Software	GTS	MaxSign 100 Patten Measurement software

Shenzhen Fu Bang Wireless Technology Co., Ltd.

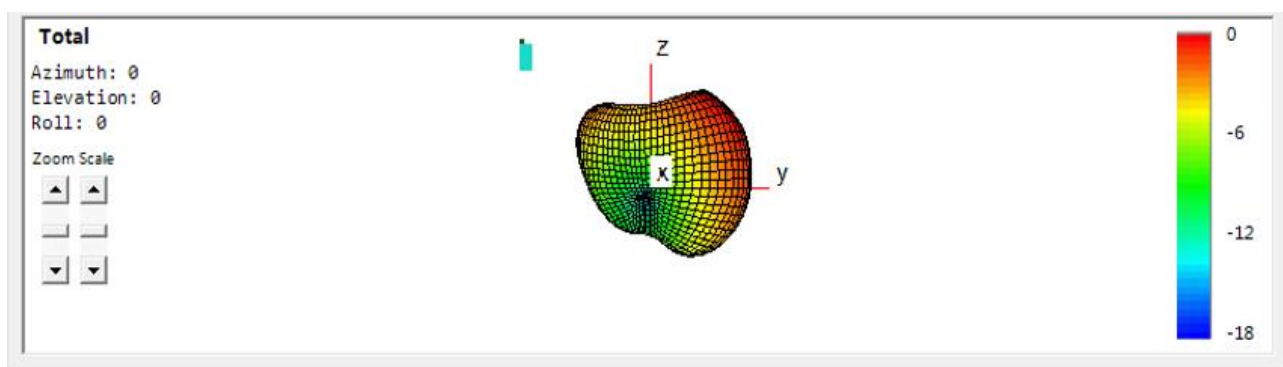
This report shall not be reproduced except in full, without the written approval of Shenzhen Fu Bang Wireless Technology Co., Ltd.

ANNEX A 3-D Patten Plots

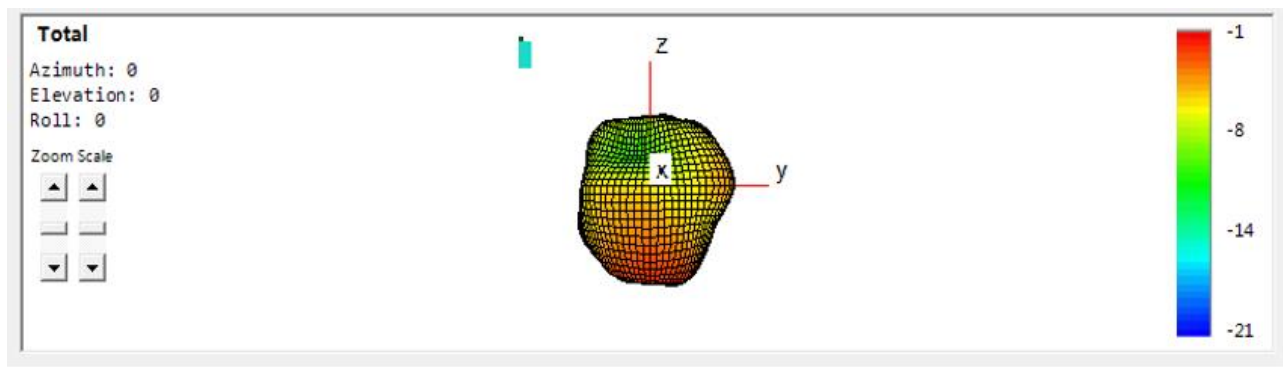




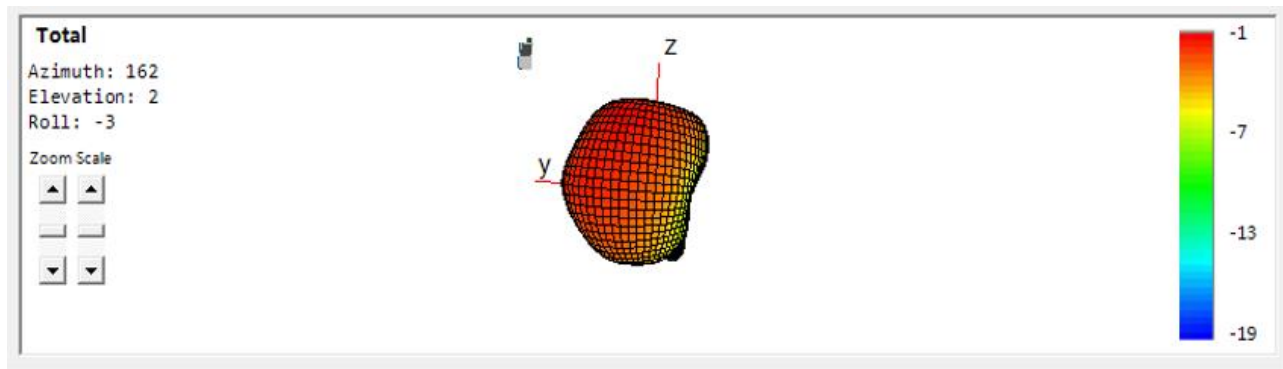
1800MHz



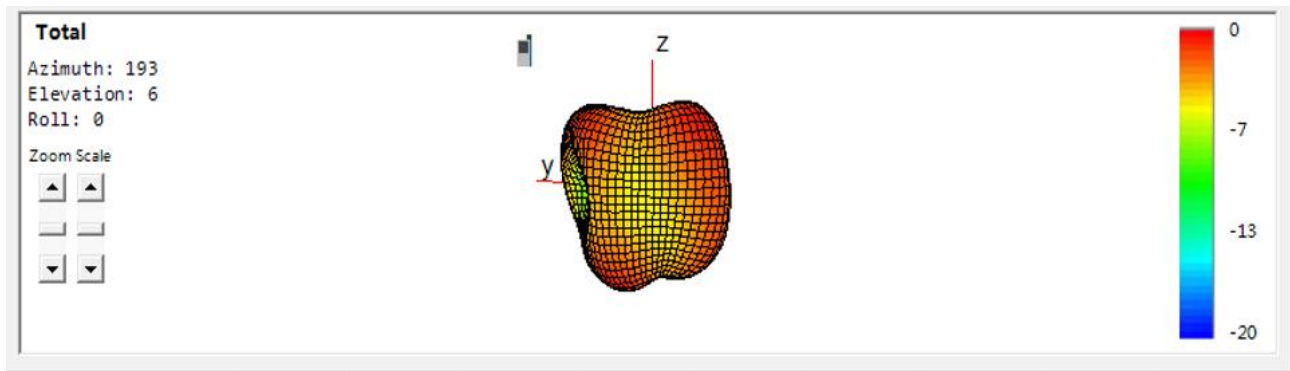
1900MHz



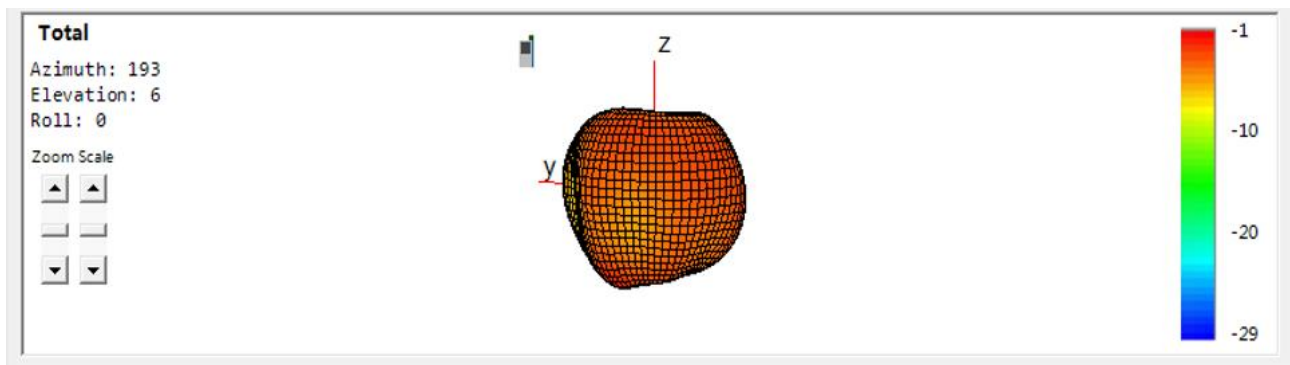
2100MHz



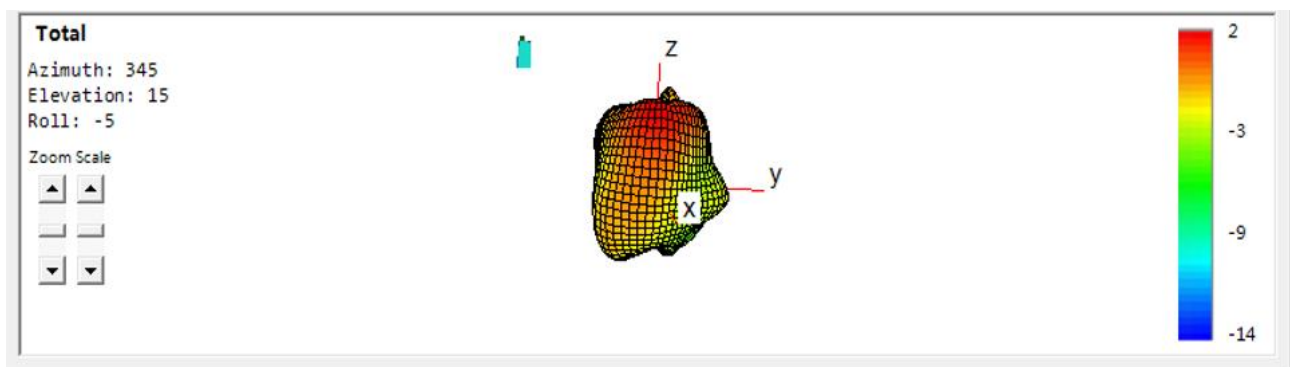
2700MHz



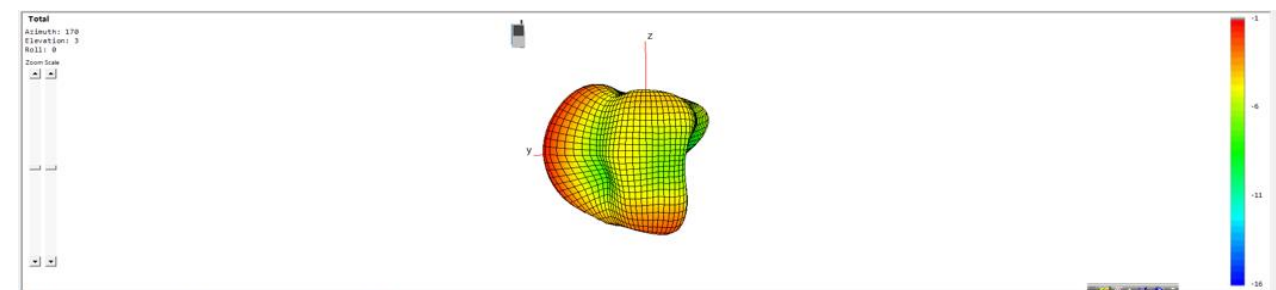
1575MHz



2400MHz



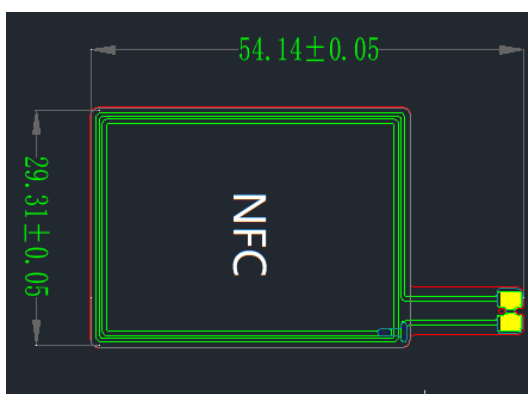
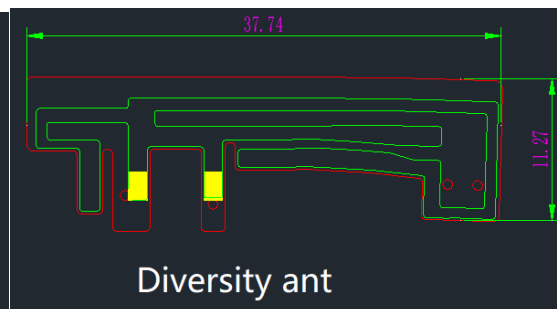
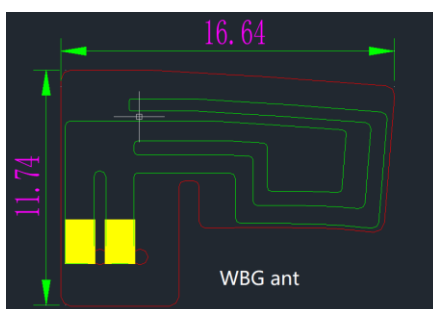
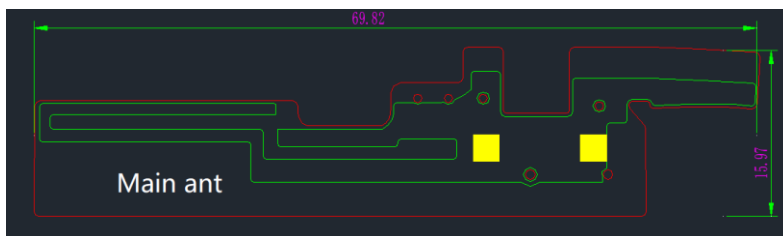
5100MHz



5800MHz

ANNEX B: The EUT Appearance and Test Configuration

B.1 EUT Appearance



B.2 Test Configuration

