

Customer:	XIN DI
Project:	T68DL
Antenna modification:	A0
Compilation project:	Guo Xi (18970988655)
Reviewer:	Guo Xi (18970988655)
Date:	2025.06.23

This report is to debug the performance of the T68DL. The antenna operates at a frequency of 915MHz to test the following content.

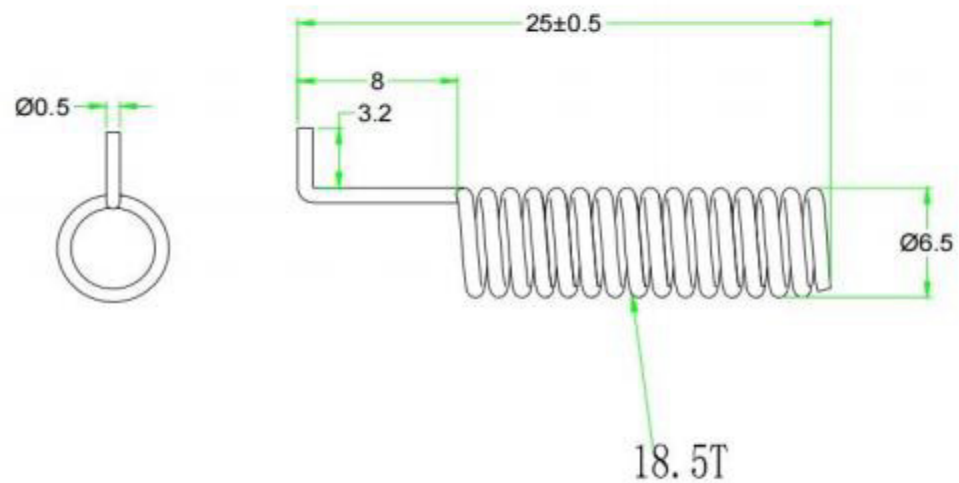
- 1、 The graphics of the product
- 2、 Test system
- 3、 Antenna matching
- 4、 The test results of the antenna
 - 4.1 S11 parameter
 - 4.2 Efficiency gain
 - 4.3 li. Three-dimensional graphics
 - 4.4 Smith

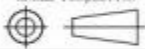
1、The graphics of the product

Front view



Manufacturer: Shenzhen Feisheng Electronics Co., Ltd
Address: 3rd Floor, Building A8, Guangxingteng Industrial Park, Jinjing Road, Longdong community, Baolong Street, Longgang District, Shenzhen
Tel: 0755-85218289 Fax: 0755-85223184

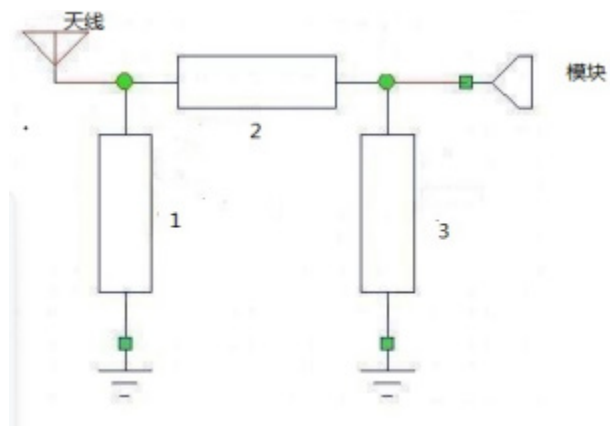


ANGLE PROJECTION  GENERAL TOLERANCE 100~200 : ± 3.00 50~100 : ± 2.00 25~50 : ± 0.20 10~25 : ± 0.15 1~10 : ± 0.1	产品名称 (PRODUCT NAME)				
	单位 (UNIT)	M M	比例 (SIZE)	1:3	
	页数 (PAGE)	1 OF 1	幅面 (FORNMT)	A4	

2、 Test system

Serial number	Testing instrument
S11	Agilent 5071B
OTA	Agilent 5071B & CMW500 & Agilent 8960
Gain and efficiency	Agilent 5071B

3、Antenna matching

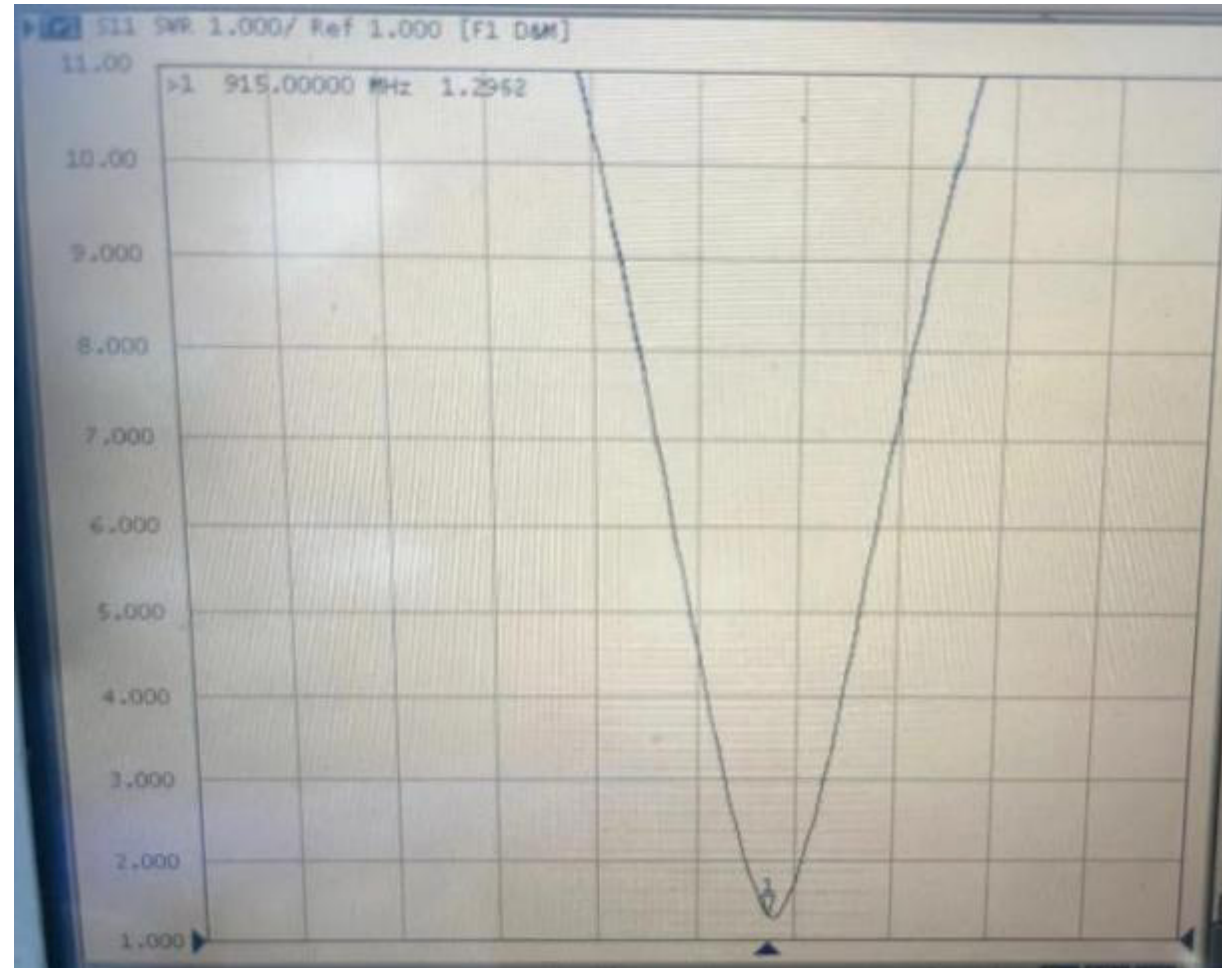


Serial number	Capacitor	Inductance
1	N/A	N/A
2	N/A	15NH
3	7.5PF	N/A

The PCB board end matching circuit is connected in parallel with 15NH and in series with 7.5PF as shown in the above figure

4、 The test results of the antenna

4.1 S11 parameter



Frequency	915
VSWR	1.29

4、Antenna test result

4.2 Efficiency gain

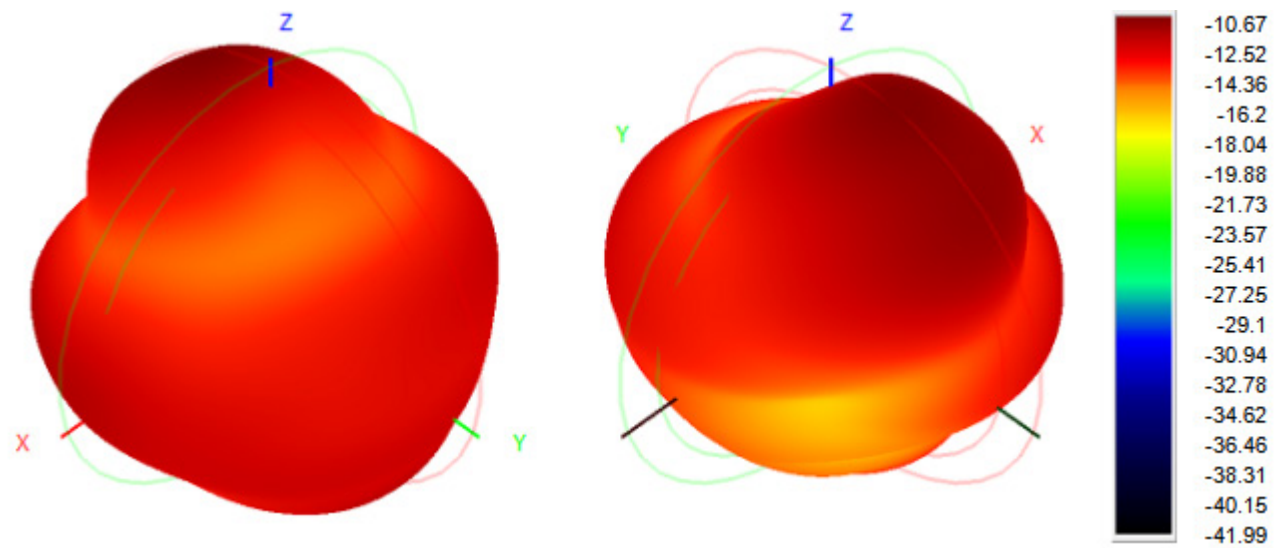
Frequency (MHz)	Efficiency (%)	Peak GAIN (dBi)
902	2.99	-10.67
904	3.68	-9.70
906	4.60	-8.71
908	5.74	-8.71
910	6.98	-6.81
912	8.14	-6.13
914	9.05	-5.76

Frequency (MHz)	Efficiency (%)	Peak GAIN (dBi)
916	9.59	-5.60
918	9.46	-5.76
920	8.47	-6.46
922	7.02	-7.44
924	5.64	-8.39
926	4.58	-9.21
928	3.82	-9.85

4、 Antenna test result

4.3 li. Three-dimensional

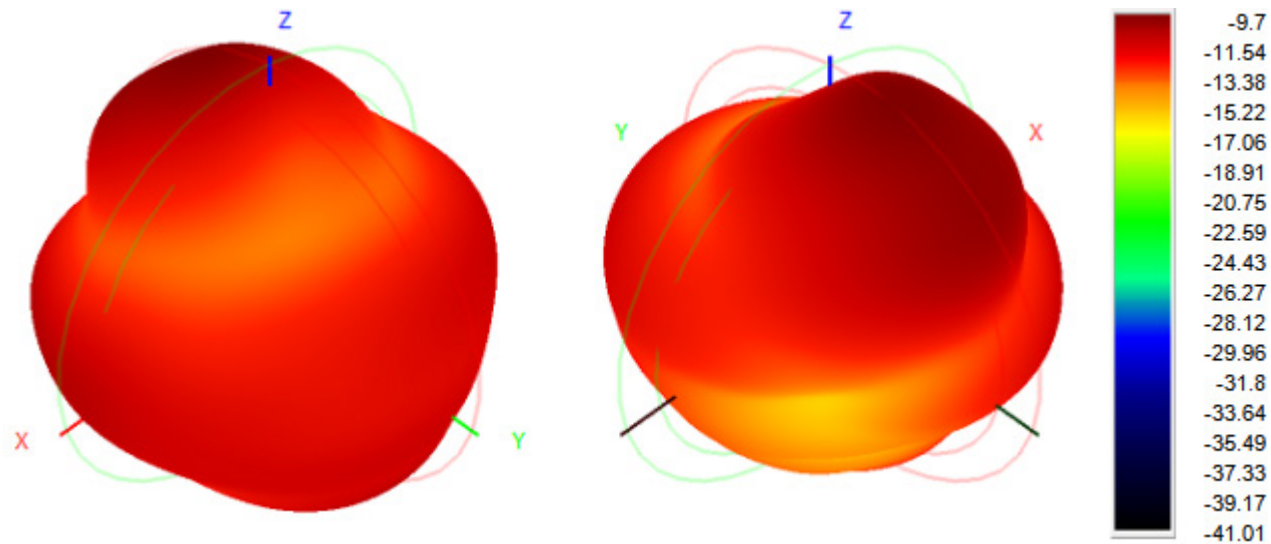
Graphics 902MHz



4、 Antenna test result

4.3 li. Three-dimensional

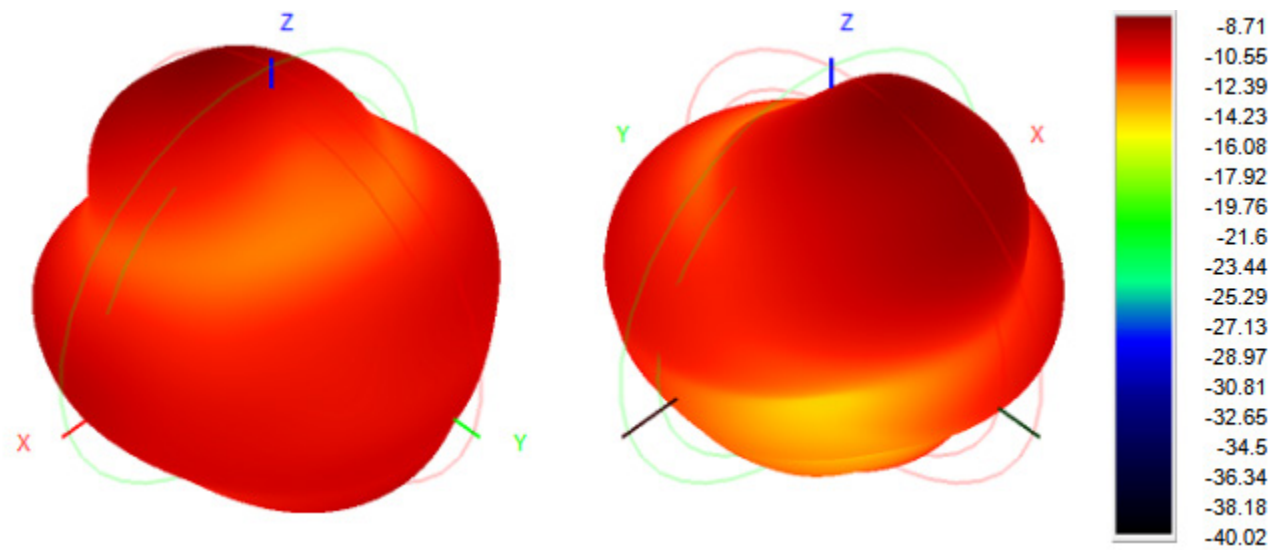
Graphics 904MHz



4、 Antenna test result

4.3 li. Three-dimensional

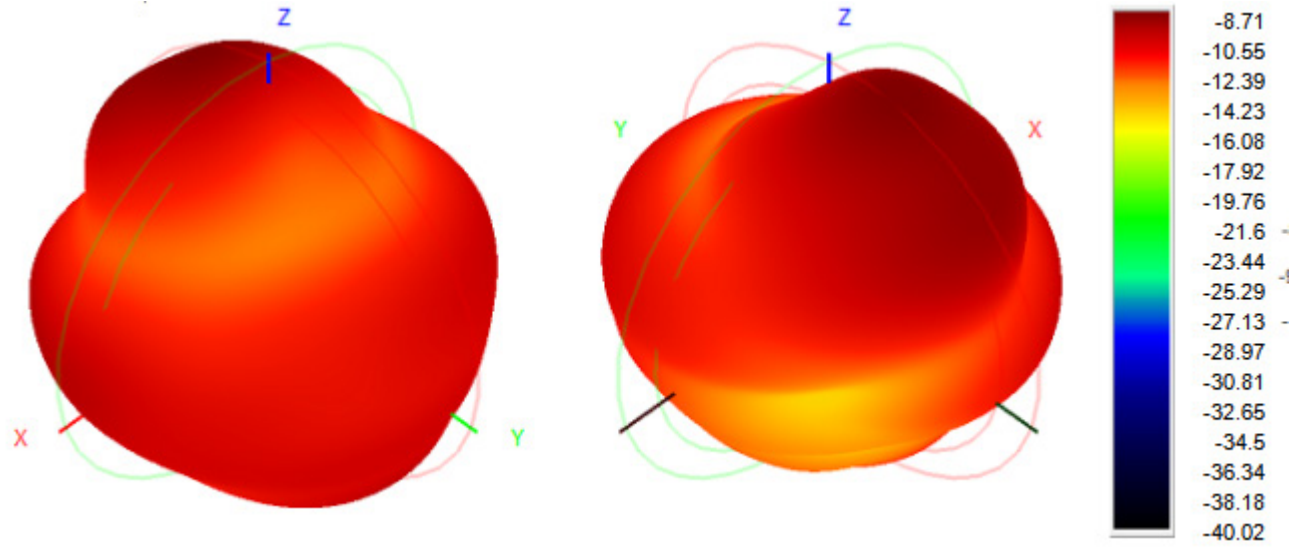
Graphics 906MHz



4、 Antenna test result

4.3 li. Three-dimensional

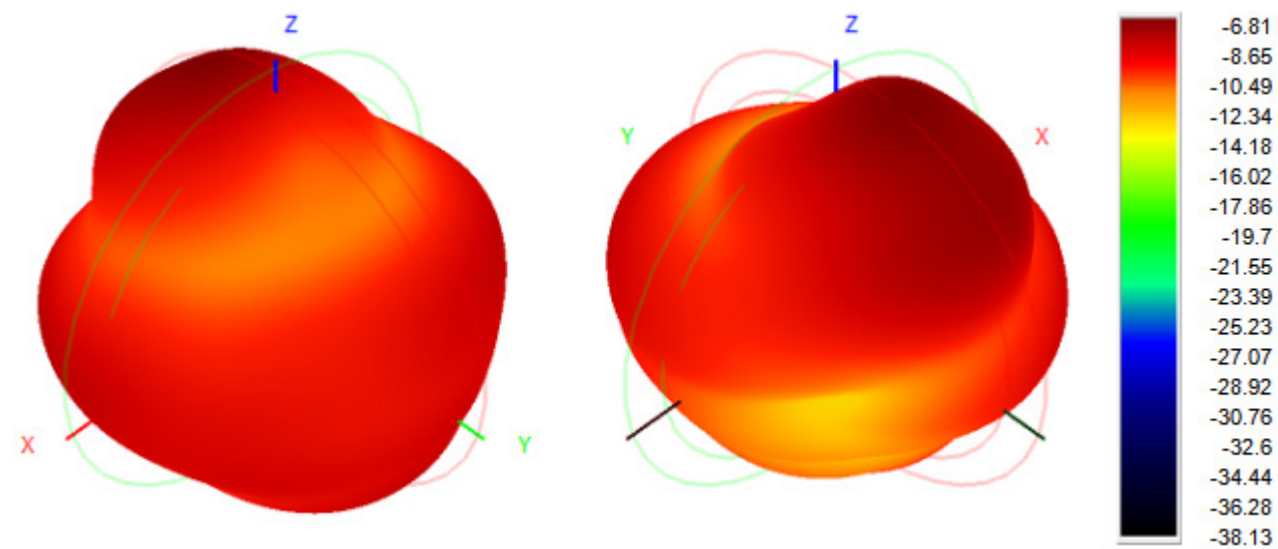
Graphics 908MHz



4、 Antenna test result

4.3 li. Three-dimensional

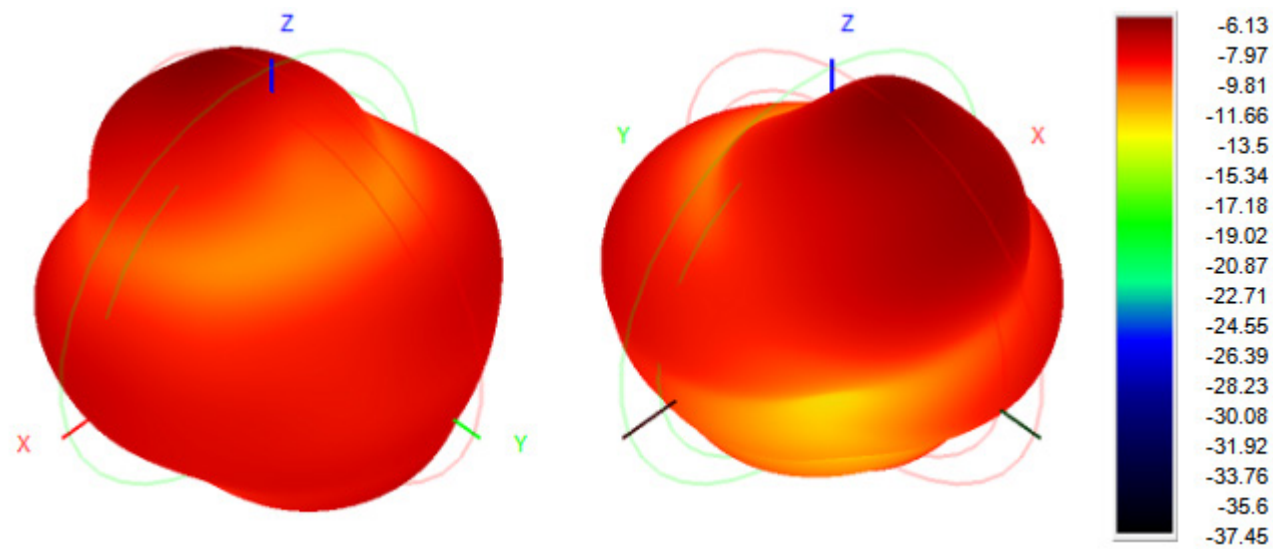
Graphics 910MHz



4、 Antenna test result

4.3 li. Three-dimensional

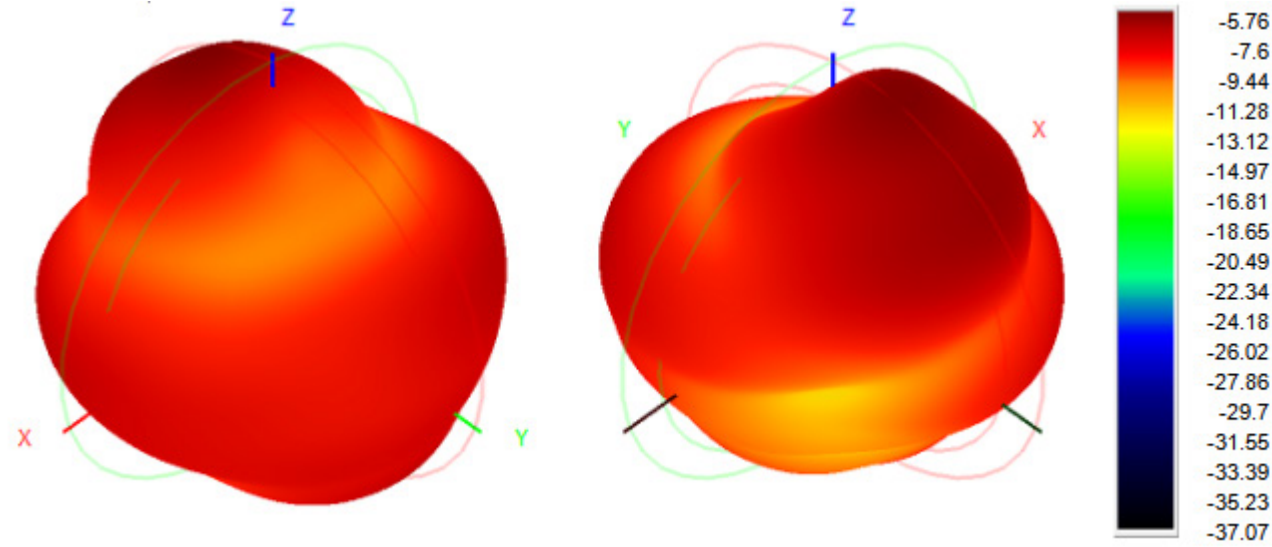
Graphics 912MHz



4、 Antenna test result

4.3 li. Three-dimensional

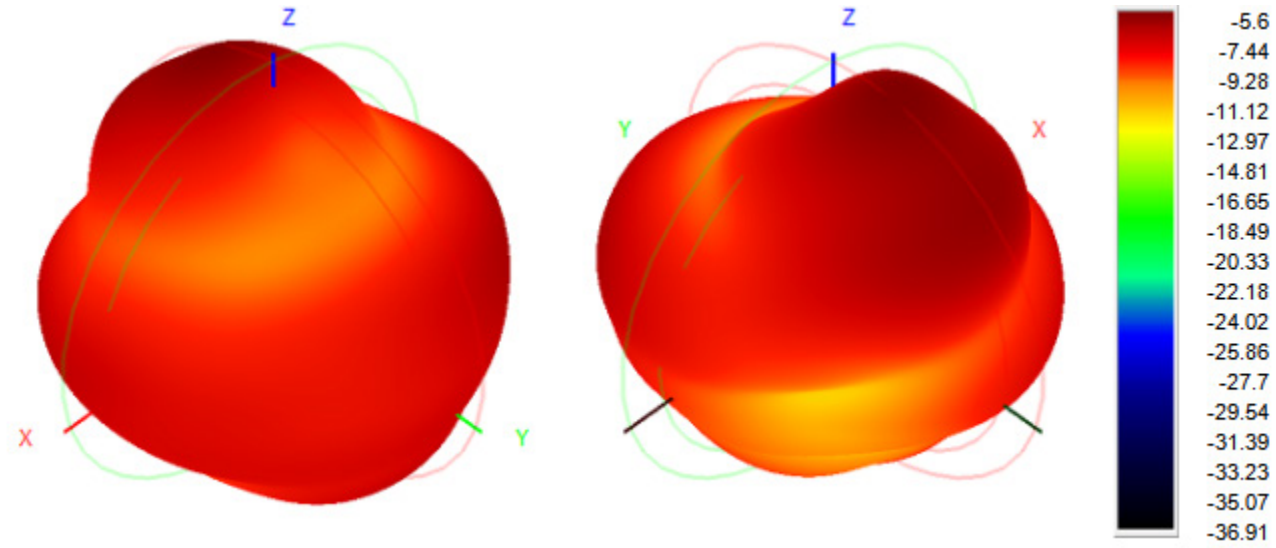
Graphics 914MHz



4、 Antenna test result

4.3 li. Three-dimensional

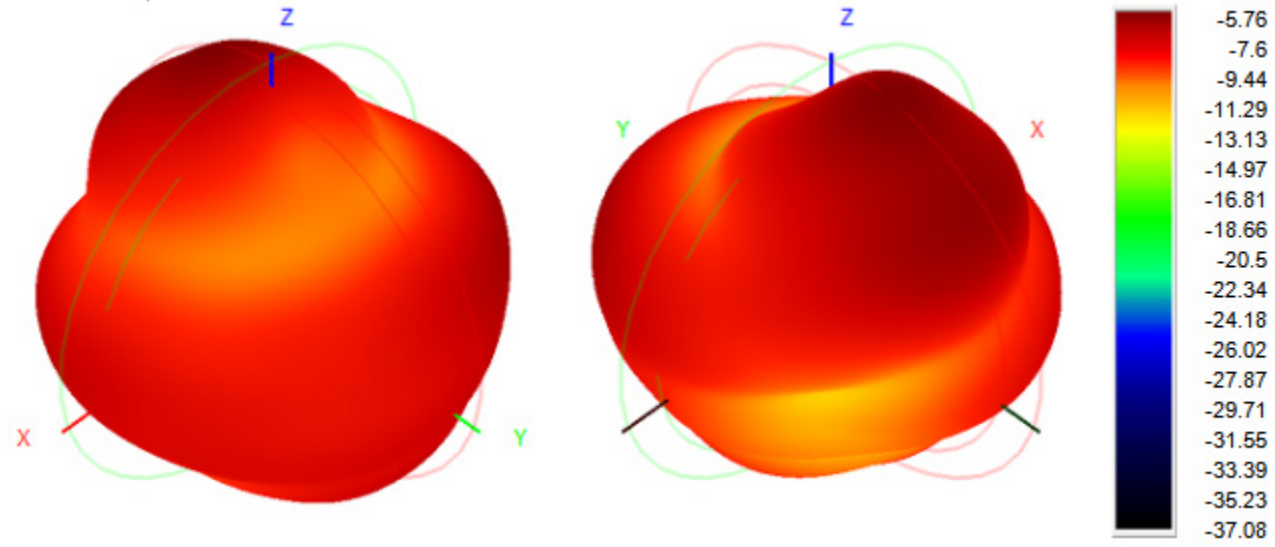
Graphics 916MHz



4、 Antenna test result

4.3 li. Three-dimensional

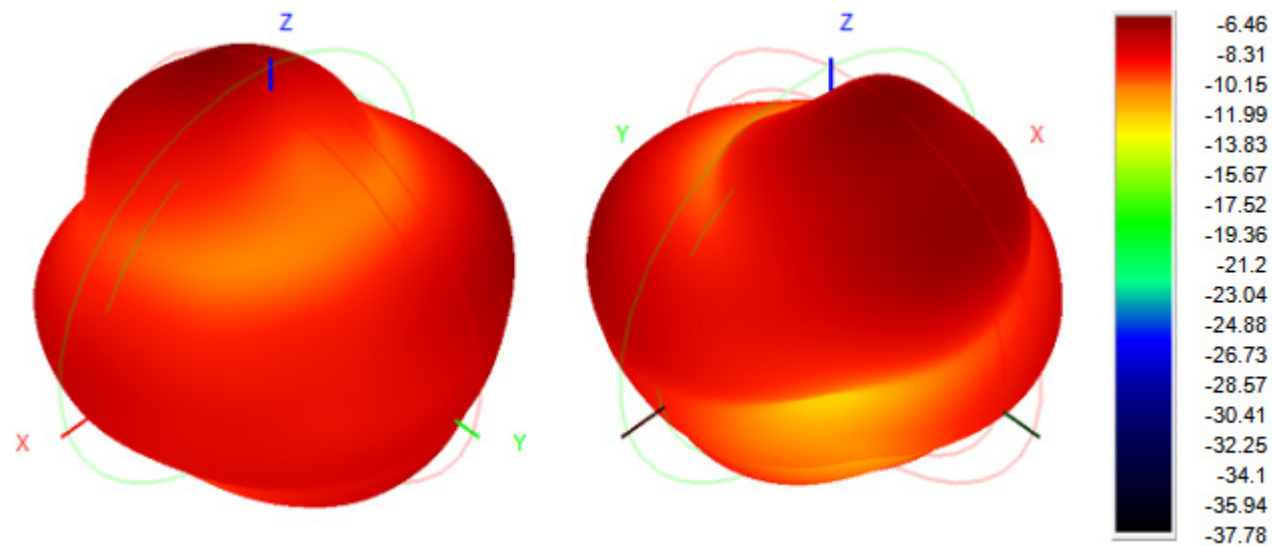
Graphics 918MHz



4、 Antenna test result

4.3 li. Three-dimensional

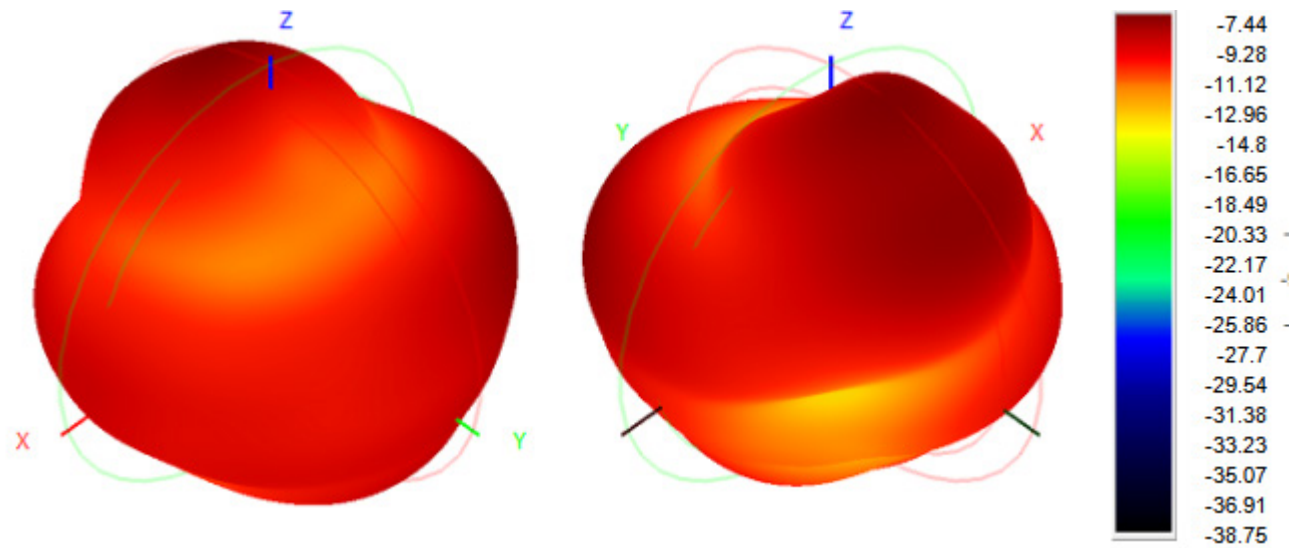
Graphics 920MHz



4、 Antenna test result

4.3 li. Three-dimensional

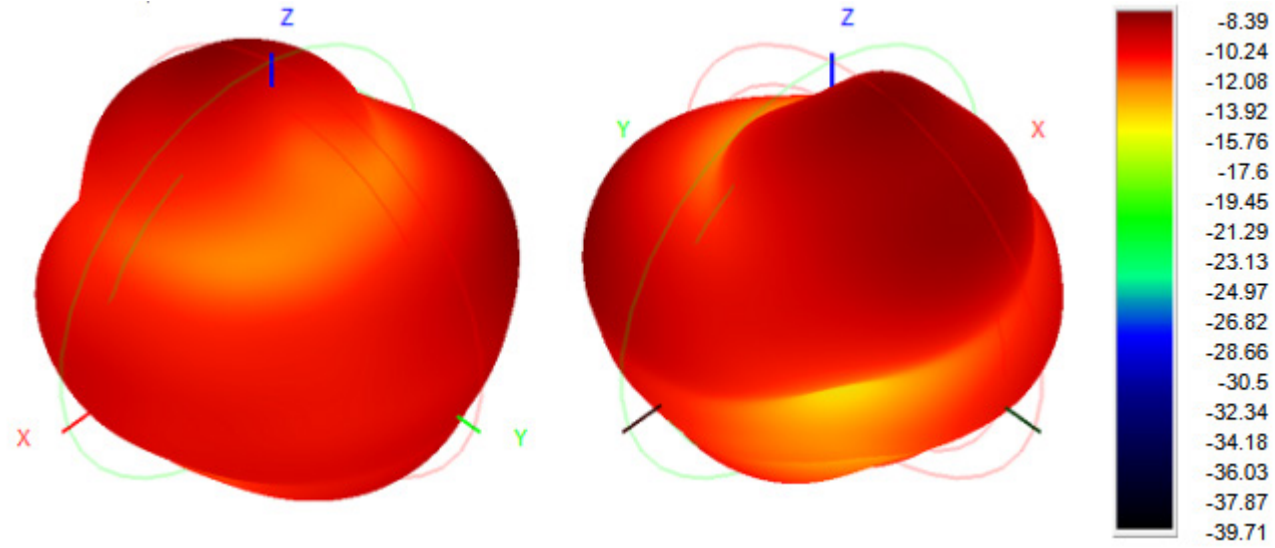
Graphics 922MHz



4、 Antenna test result

4.3 li. Three-dimensional

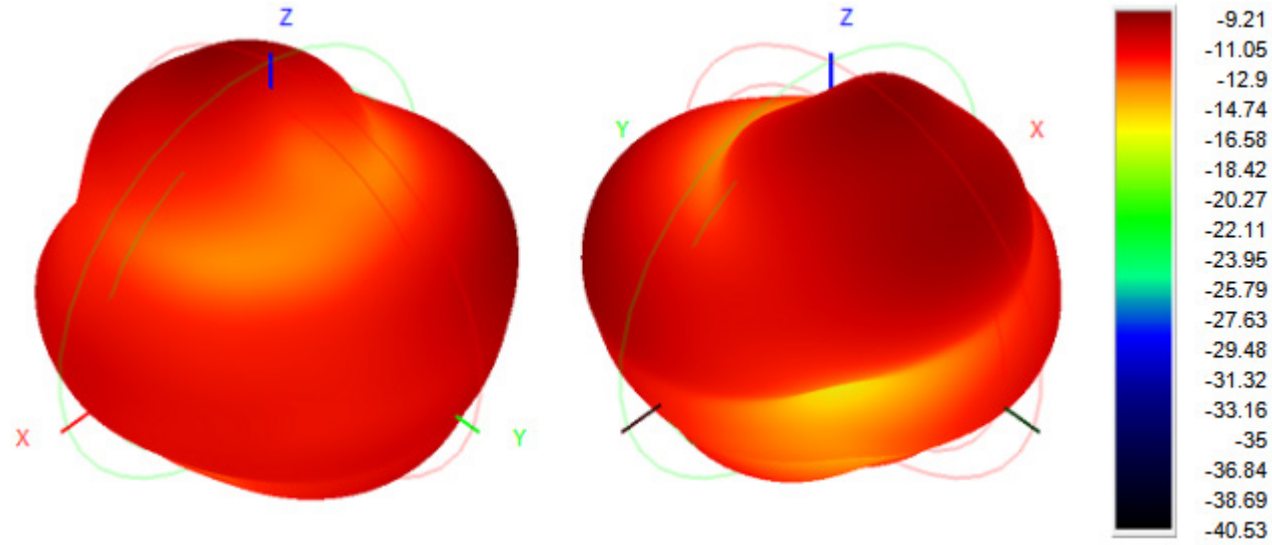
Graphics 924MHz



4、 Antenna test result

4.3 li. Three-dimensional

Graphics 926MHz



4、 Antenna test result

4.3 li. Three-dimensional

Graphics 928MHz

