

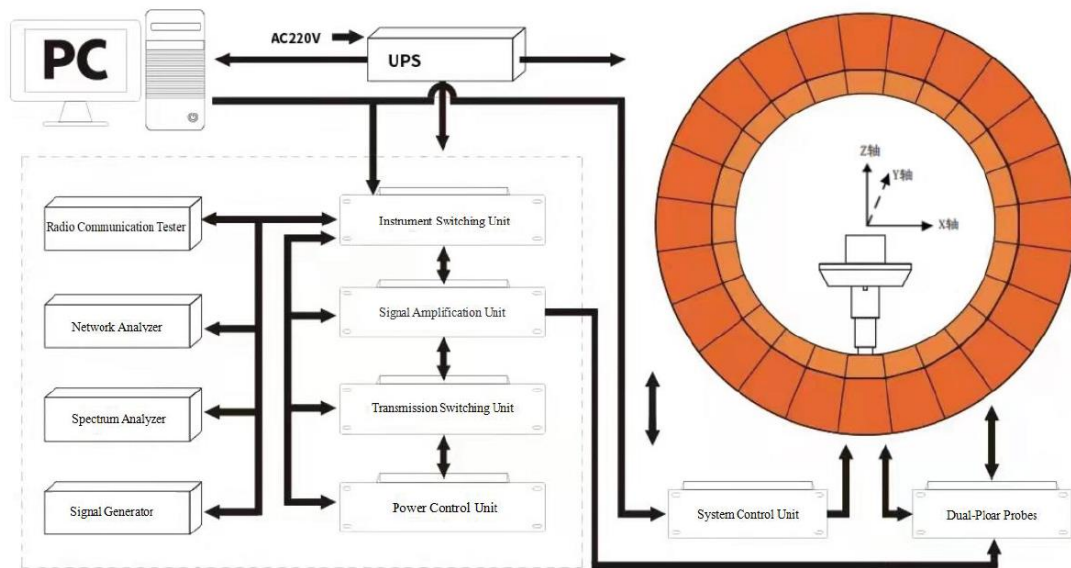
Antenna Specification

1、Design objective:

Frequency band	2.412~2.482GHz
Antenna radiation efficiency	>60%
Gain value	1.5dBi
Isolation	<-10dB
Manufacturer	ShenZhen Dibet Technology Co. ,Ltd
Address	Room 101, 1st Floor, Block D, No. 1 Chuangjin, Block 28, Dalang Community, Xin'an Street, Bao'an District, Shenzhen, Guangdong

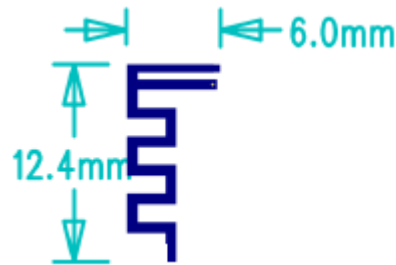
2、Test Equipment:

Test System	TEM 24 Multi-probe Microwave Chamber
Test Instrument	Agilent E5071B

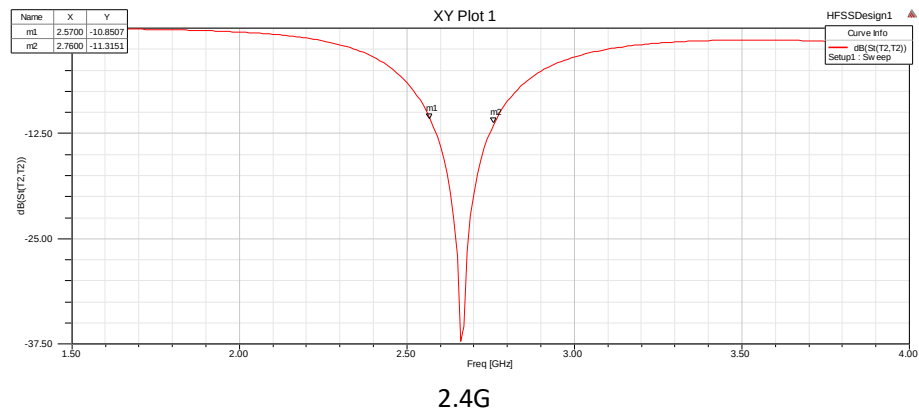


3、Antenna Design Specifications

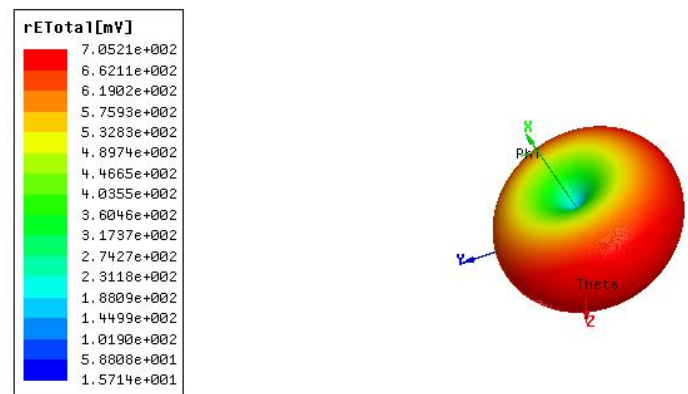
1. Taking into account the product's usage environment and design constraints, an approximately omnidirectional planar IFA antenna is adopted. And the simulation and modeling are carried out based on HFSS.
2. Design Specifications



3. S parameters



4. Radiation chart



Passive Test 2.4GHz											
Fre.(MHz)	2400	2410	2420	2430	2440	2450	2460	2470	2480	2490	2500
Effi(%)	34.61	34.86	33.63	33.26	34.52	32.99	32.53	31.19	29.28	25.31	26.10
Gain(dBi)	1.10	1.13	1.24	1.20	1.24	1.50	1.44	1.42	1.48	1.36	1.26

2.4G

5. Radiation parameters

Antenna Parameters:				
	Quantity	Freq	Value	
	Max U	2.4GHz	0.00065957 W/sr	
	Peak Directivity		1.6417	
	Peak Gain		1.5012	
	Peak Realized Gain		0.82886	
	Radiated Power		0.0050487 W	
	Accepted Power		0.0055214 W	
	Incident Power		0.01 W	
	Radiation Efficiency		0.91439	
	Front to Back Ratio		1.0304	
	Decay Factor		0	

2.4G

4、 Sample test

After prototyping, passive testing was conducted based on network analysis, with the following test results:

