

Antenna Test Report

For

Project BP71

Version:

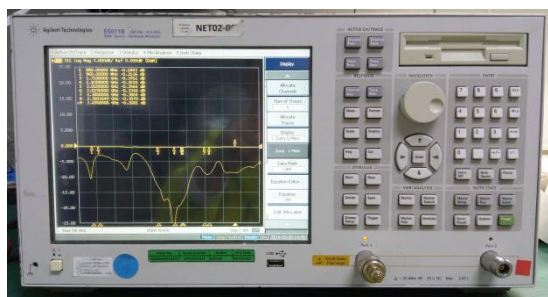
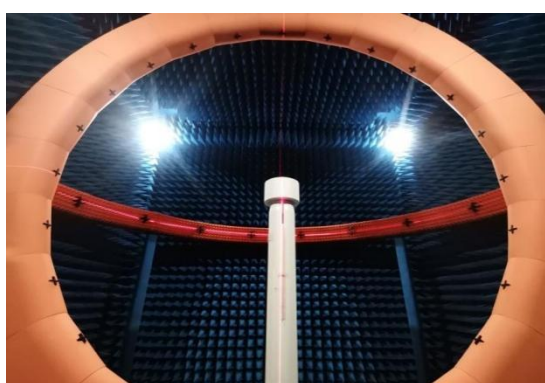
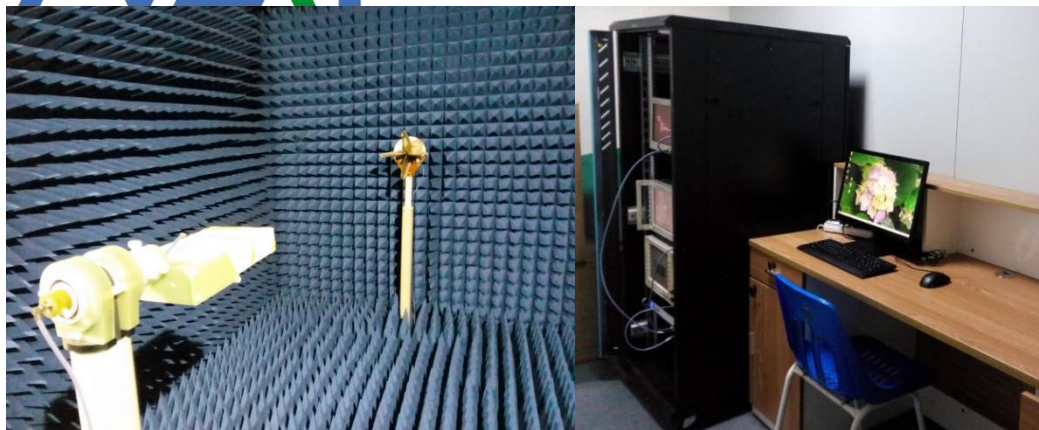
Customer	联雅	Project	BP71
Band	BT	Color	
Issued by	LH	Checked by	
Confirmed by		Date	2024.08.22

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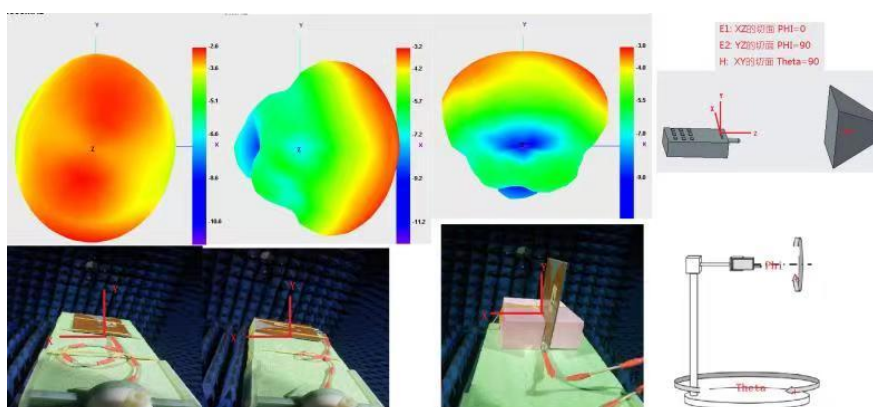


一. Test Instrumentation and item(测试设备及项目)

类别 (Class)	测试项目 (Test item)	设备 (Equipment)
1. S parameter	1. 回波损耗(RL) 2. 驻波比 (VSWR) 3.斯密斯原图(Smith chart)	网分 (VNA) : Agilent E5071B R&S ZVB8 Protek A333
2. 耦合测试 (Coupling testing)	1. 发射功率 (MAX Power) 2. 接收灵敏度 (MIN Sens)	1.2G/3G Tester: Agilent 8960 2.The coupling box: TESCOM TC-5060A 3. 3D Chamber: ETS 3D Chamber (5x3x3)
3. 3D 无源测试 (Passive Test)	1. 效率 (Effeciency) 2. 增益 (Gain) 3.辐射方向图 (radiation pattern)	1. 3D Chamber: TEM24 3D Chamber (5x5x5) ETS 3D Chamber (5x3x3) 2. 网分 (VNA) : Agilent E5071B R&S ZVB8
4.3D 有源测试 (Active Test)	1. 3D 功率 (TRP) 2. 3D 灵敏度 (TIS) 3.吞吐率 (Throughput rate)	1. 3D Chamber: TEM24 3D Chamber (5x5x5) ETS 3D Chamber (5x3x3) 2.2G/3G Tester: Agilent 8960 3.4G Tester: MT8820C/CMW500 4.WIFI/BT/NB-iot Tester: CMW500 5. 5G Tester: SP9500-CTS 6.Head: HEAD-P10 (FACE-P10)



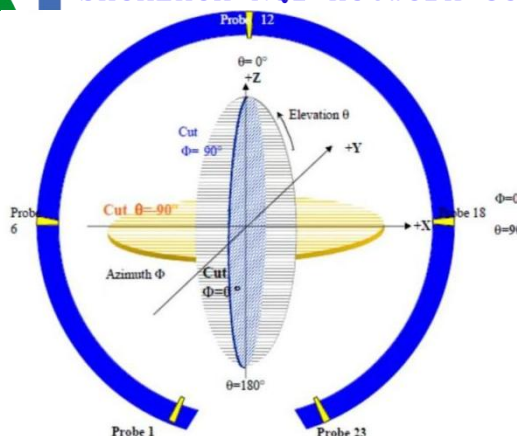
二. Chamber coordinate axis (暗室坐标)



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深圳市国质信网络通讯有限公司
ShenZhen NQI network communication ltd



三. Definitions (定义)

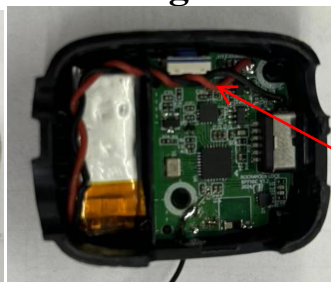
VSWR: Voltage Standing Wave Rate

RL: Return loss

TRP: total radiated power

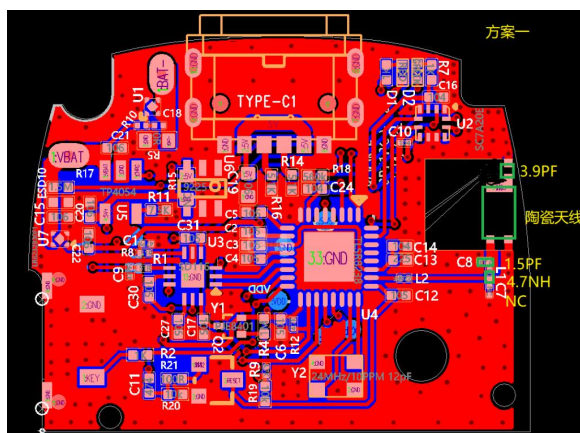
TIS: total isotropic sensitivity

四. Cell-Phone Photo and Dealing Method (手机图片及环境处理)



喇叭线纹线如图所示摆放

五. Matching Circuit Description (匹配描述)



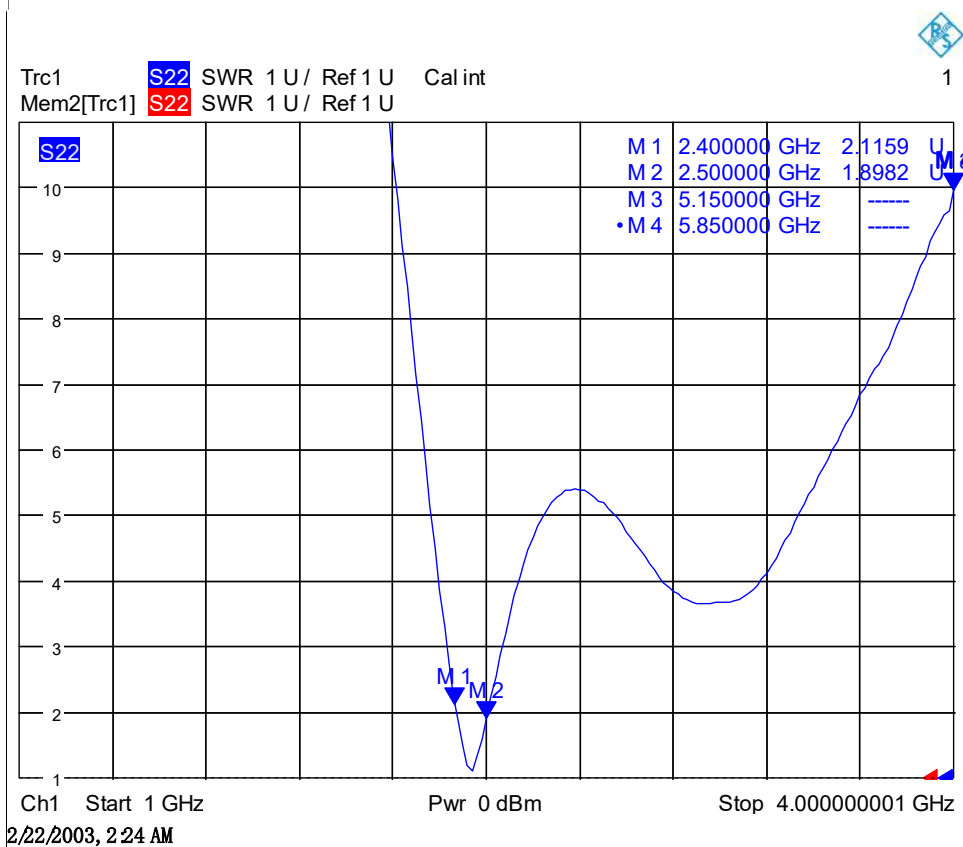
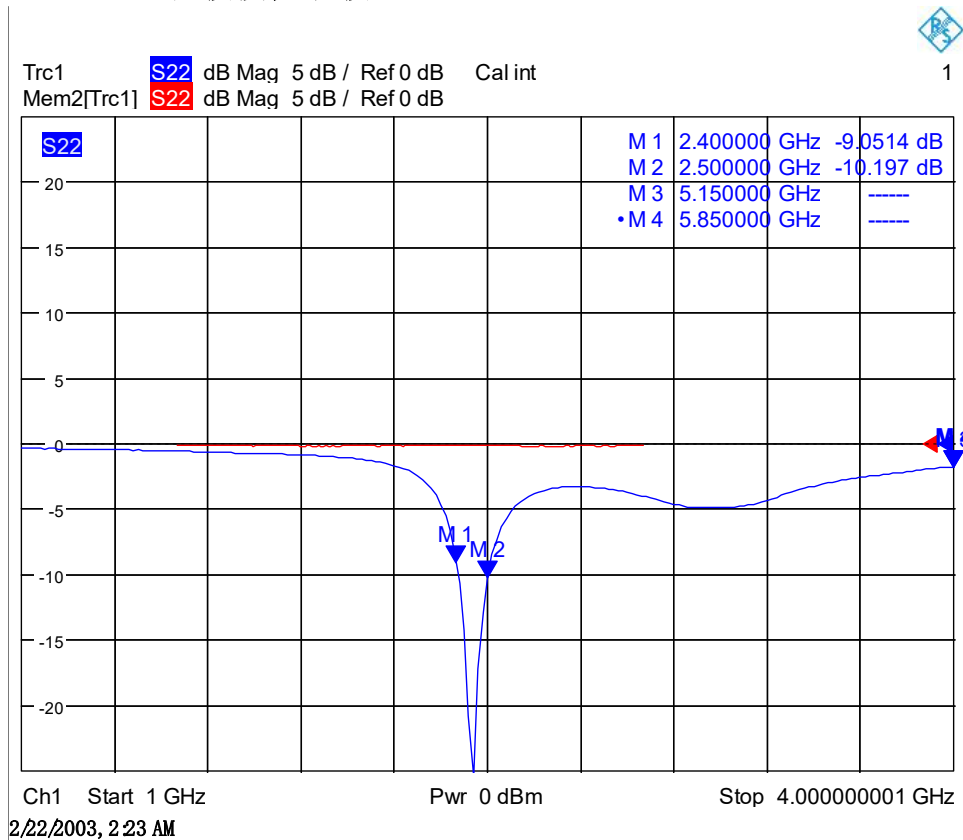
Gain: 2.34dBi

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六. Passive Test (无源测试)

6.1. RL/VSWR (回波损耗/驻波比)



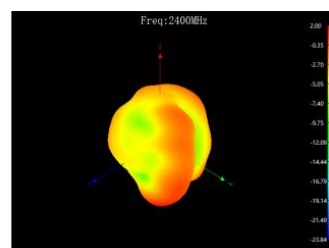
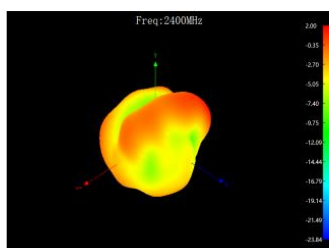
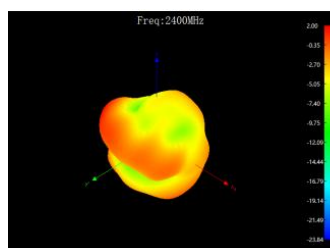
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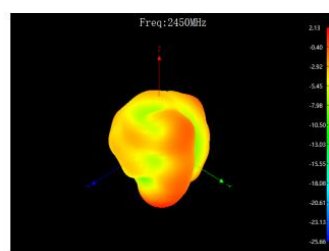
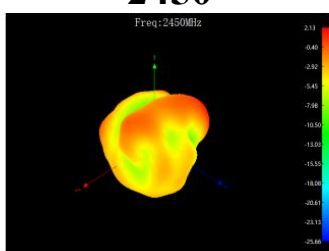
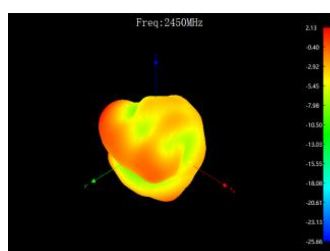
6.2.Effeciency、Gain、 Radiation pattern

Freq (MHz)	Effi (%)	Gain (dBi)
2400	44.87	2
2410	43.65	1.73
2420	45.71	2.34
2430	43.45	1.96
2440	44.06	1.94
2450	42.66	2.13
2460	44.16	2.26
2470	43.75	2.34
2480	40.64	1.96
2490	41.3	2.5
2500	41.02	2.32

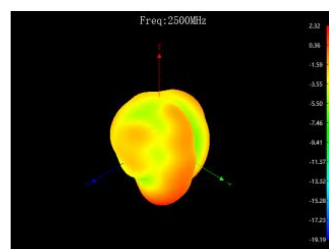
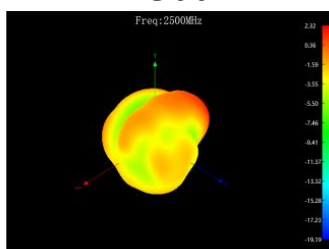
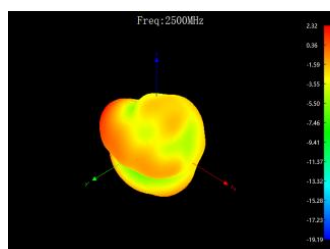
2400



2450



2500



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七. TRP&TIS

NQI ANT TRP&TIS parameter Summary of BP71				
BLE	Test	Bluetooth TRP		
	Result	0	19	39
	TRP (dBm)	2.54	1.49	-0.76
	TIS (dBm)	-86.84	-86.99	-85.99

八. Field testing (场测或实测)

field test result (场测结果)	
Test site (测试场地): Vacant lot outside the company gate (国质信门口空地)	
Cell-phone (测试手机): 苹果 8plus	
The teser (测试员): LH	
Height of mobile phone stand (手机支架高度): 1.2m	
测试结果	
	Actual test distance (实测测试距离)
	暂未场测
备注:	