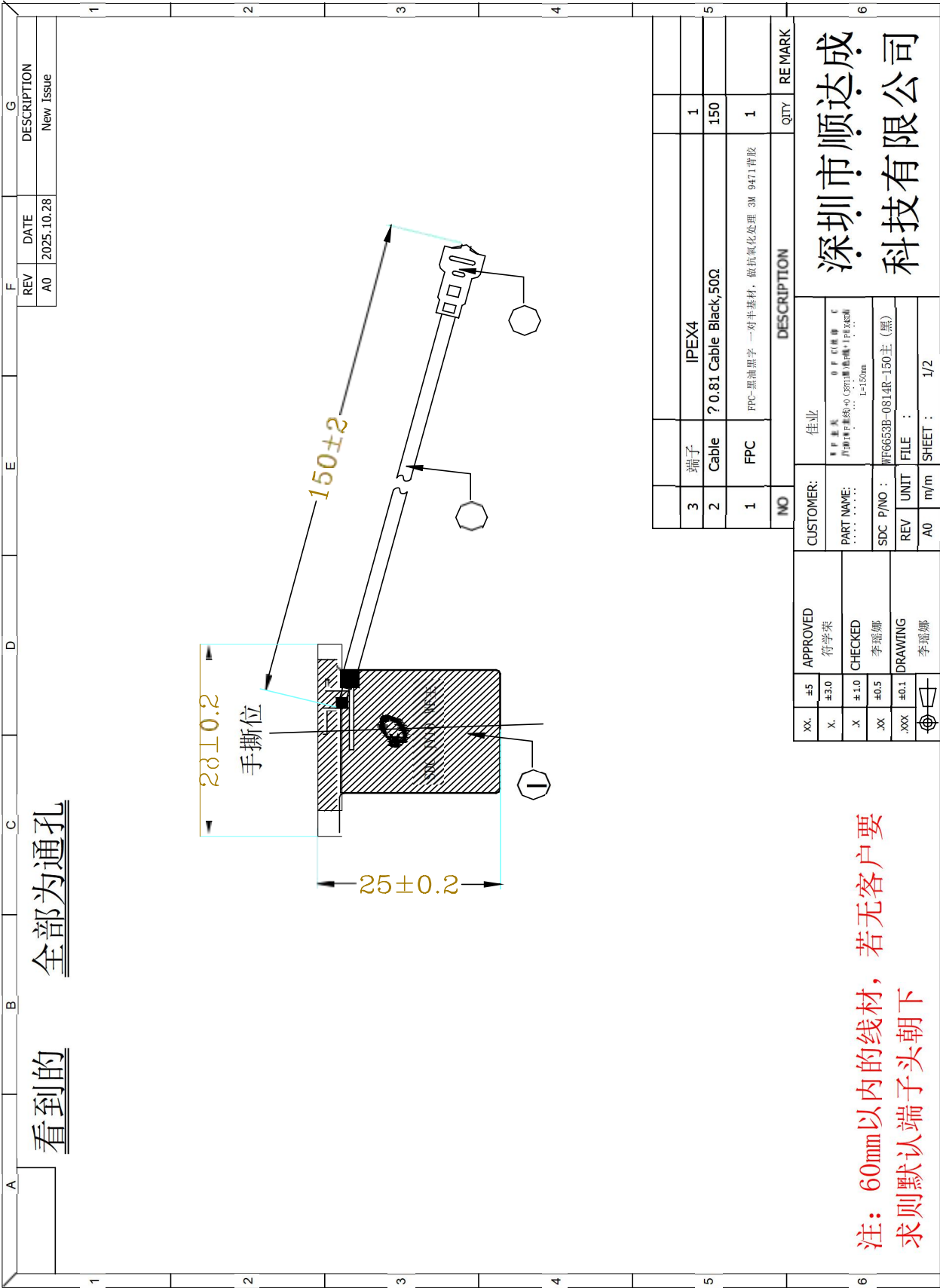




产品图纸或实物图片

Drawing or Product Image





射频性能测量报告

RF Performance Test Report

天线测试设备简介

Antenna Test Equipment Introduction

测试天线输入特性使用 **Agilent E5071C** and **Agilent 5062A** 矢量网络分析仪；辐射特性利用广屏三维近场暗室进行测试，并分别使用8960 E5515 和 Agilent E4438C 进行了分析。暗房的测试坐标如下：

Test of antenna input characteristics using **Agilent E5071C** and **Agilent 5062A** vector network analyzer ; The radiation pattern of the antenna are tested using the guangping 3D near field Anechoic Chamber, and the instrument is used to agilent8960 E5515 and Agilent E4438C. The test coordinates of the darkroom are as follows :

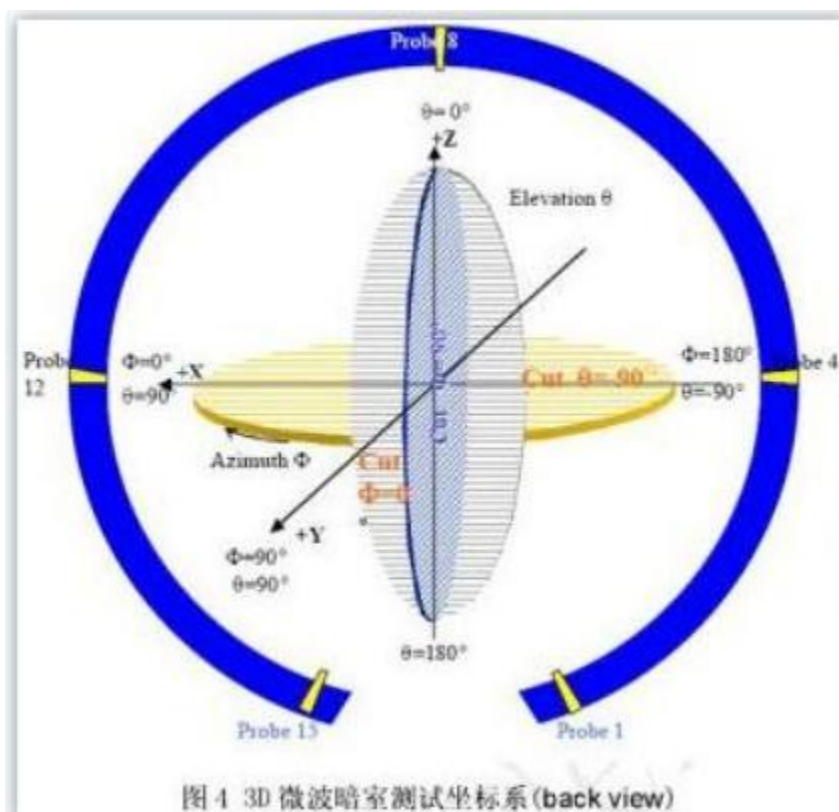


图 4 3D 微波暗室测试坐标系 (back view)

1. S11 参数测量 / **S11 Parameter-VSWR**

使用一根 $50\ \Omega$ 同轴电缆连接到天线，然后该电缆连接到网络分析仪测量 S11 参数，被测量产品远离金属至少 20 厘米。

Measuring Method is a $50\ \Omega$ coaxial cable is connected to the antenna. Then this cable is connected to a network analyzer to measure the S11 parameter, Keeping this fixture away from metal at least 20cm.

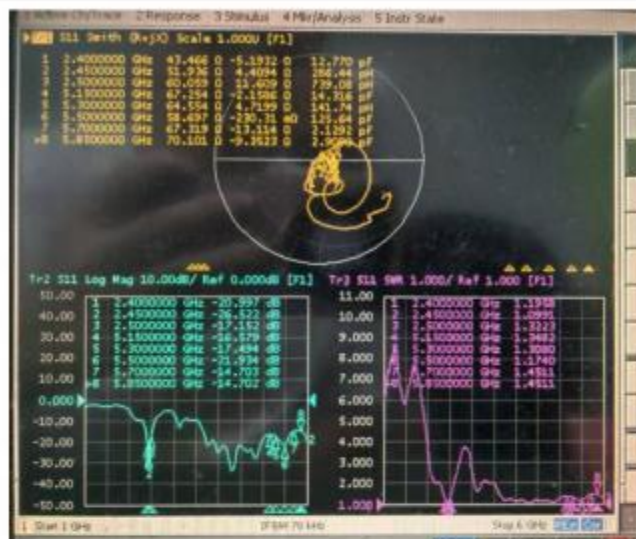


深圳市顺达成科技有限公司

SHUN DA CHENG TECHNOLOGY CO., LTD

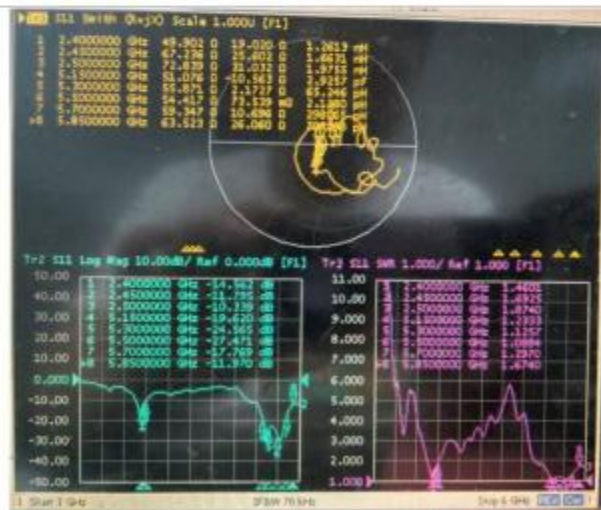
S11 Parameter-VSWR

S11 SWR /Smith/ Log Mag--WIFI



频率 (MHZ)	2400	2450	2500	5150	5300	5500	5700	5850
驻波比	1.1	1	1.3	1.3	1.3	1.1	1.4	1.4
阻抗	43.4 Ω	51.9 Ω	60 Ω	67.2 Ω	64.5 Ω	58.6 Ω	67.3 Ω	70.1 Ω
回损	-20.9	-26.5	-17.1	-16.5	-17.4	-21.9	-14.7	-14.7

S11 SWR /Smith/ Log Mag--BT



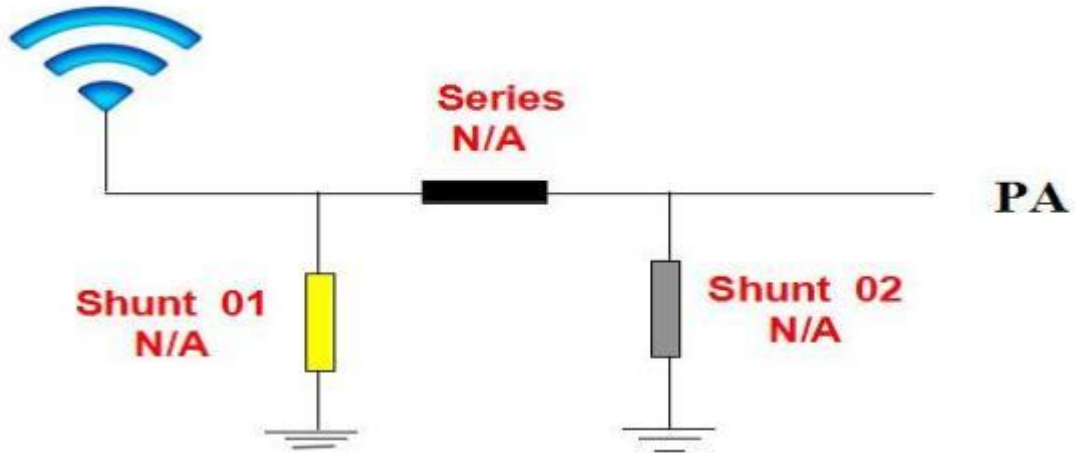
频率 (MHZ)	2400	2450	2500	5150	5300	5500	5700	5850
驻波比	1.4	1.6	1.8	1.2	1.1	1	1.3	1.6
阻抗	49.9 Ω	67.2 Ω	72.8 Ω	51 Ω	55.8 Ω	54.4 Ω	59.3 Ω	63.5 Ω
回损	-14.5	-11.7	-10.3	-19.6	-24.5	-27.4	-17.7	-11.9

2. 天线匹配网络/Antenna Matching Network



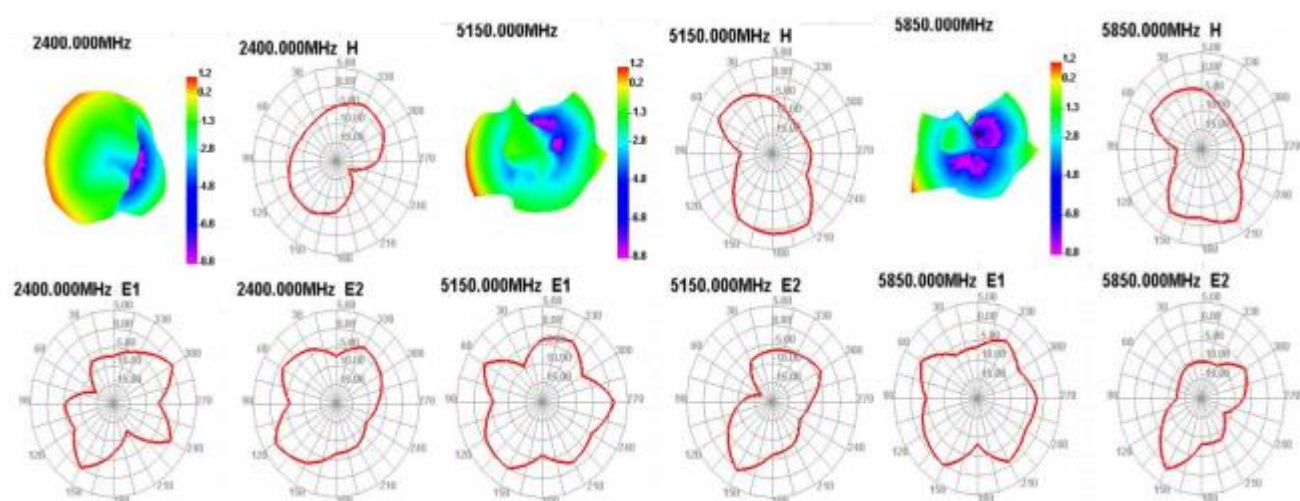
深圳市顺达成科技有限公司 SHUN DA CHENG TECHNOLOGY CO., LTD

Antenna



3. Gain & Efficiency-WIFI

Frequency (MHz)	Efficiency (%)	Peak GAIN (dBi)
2400	37.67	1.19
2450	38.15	1.26
2500	37.39	1.28
5150	41.36	1.07
5350	41.62	1.26
5550	41.77	1.28
5850	42.38	1.36





4. WIFI OTA Data

2. 4G WIFI	TRP			TIS		
Channel	CH1	CH6	CH11	CH1	CH6	CH11
802.11 b , 11M	13.52	13.47	13.63	-77.15	-78.63	-77.29
802.11 g , 54M	12.67	12.26	12.34	-66.56	-66.41	-66.53
802.11 n , MCS7 (65M)	12.44	12.61	12.57	-65.28	-65.39	-65.18

5. 8G WIFI	TRP			TIS		
Channel	CH36	CH60	CH165	CH36	CH60	CH165
802.11 A , 54M	11.12	10.73	10.51	-70.63	-70.27	-69.59



深圳市顺达成科技有限公司

SHUN DA CHENG TECHNOLOGY CO., LTD

安装过程:

取 1PCS 产品, 用手撕下 FPC 背面的离型纸, 然后将 FPC 定位孔位置与外壳定位孔位置 (定位筋位或定位线) 对齐, 平整的贴附与外壳上, 具体位置如下图所示:

安装过程注意事项:

- ☐ 粘贴天线后保证 FPC 完整贴附于外壳;
- ☐ 定位孔与外壳定位柱位置对齐;
- ☐ FPC 边缘与外壳边缘对齐;
- ☒ 带端子天线在将端子扣合到主板 PCBA 端时请首先对齐端子, 然后垂直扣合;

