

产品规格承认书

Product specifications
acknowledgment

承认厂商: _____

(Recognized manufacturers)

制造厂商: _____

深圳市蝙蝠无线技术有限公司
Shenzhen Bat Wireless Technology Co., Ltd.

(Manufacturer)

产品名称: _____

2.4G 软板天线
2.4G FPC Antenna

(Description)

产品选型表:

(Product Type

型号(model)	说明(illustrate)	备注(Remark)
BW2.4FNX42-12AL120	焊接接口线长 120mm	参数均可订制
BW2.4FNX42-12B1L120	IPEX1 接口线长 120mm	参数均可订制
BW2.4FNX42-12B4L120	IPEX4 接口 线长 120mm	参数均可订制

供应商承认签栏 supplier acknowledgment

制表者(tabulator)	审核者(Inspector)	核准者(approver)

客户承认栏 client acknowledges

审核者(Inspector)	核准者(approver)

1.1 Specifications

天线型号 Antennas Type	BW2.4FNX42-12B1
频率范围 Frequenc Range (MHz)	2400-2500
输入阻抗 Input Impendence (Ω)	50 Ω
电压驻波比 V. S. W. R	<2
增益 Gain (dBi)	2.22dBi
极化形式 Polarization Type	垂直 Vertical
功率容量 Power Capacity (w)	50
雷电保护 Lingtning Protection	None
工作电压 DC Voltage (V)	None
天线尺寸 Dimension (mm)	42x12
接口形式/Connector Type:	IPEX-1
电缆型号 Cable type (mm)	ϕ 1.13
电缆长度 Cable length(mm)	120
辐射体 Radiator	None
天线颜色 Color	黑色 Black
重量 Weight(g)	None
工作温度 Operating Temperature ($^{\circ}\text{C}$)	-40~80
储藏温度 Storage Temperature ($^{\circ}\text{C}$)	-20~85

*注：以上数据仅供参考；因天线功能较为敏感，主体周边机构有变更请通知我们评估。

* Note: The above data are for reference only; as the antenna function is more sensitive, please inform us for evaluation if there is any change in the surrounding institutions of the main body.

1.2 Antenna Picture



The above model: BW2.4FNX42-12B1 The picture is for reference only

(Customize the length of the middle connecting line of the customer, and the shape of the antenna)



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* Note: Due to the sensitivity of the antenna function, please inform us for evaluation if there is any change in the surrounding institutions of the main body.

2. Electrical Specification

2.1 Test Equipment

- A. VSWR and input impedance: Agilent 8753/E5071 Network Analyzer
- B. Antenna gain and efficiency: ETS three-dimensional anechoic chamber

2.2 Test Setup

2.2.1 Frequency Range

2.2.2 VSWR

Step 1: The antenna is arranged on the customer provided test fixture.

Step 2: The VSWR of the antenna is measured via Agilent 8720/8753 Network Analyzer (see figure. 1).

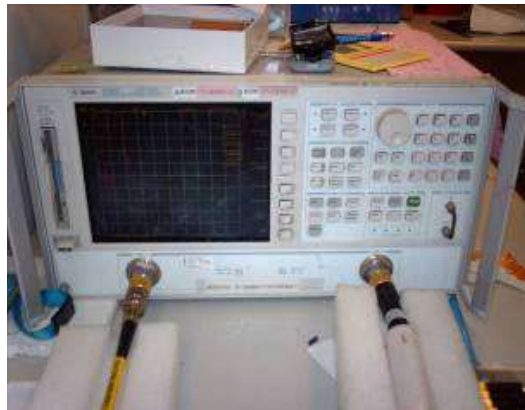


Figure.1

2.2.3 Radiation pattern and Gain

- A. The 3D chamber provides less than -40dB reflectivity from 800MHz to 6GHz and a 40cm diameter spherical quiet zone. The measurement results are calibrated using both dipoles and standard gain horns (see figure. 2).
- B. The antenna under tested is arranged in the turned table and a decoupling sleeve is used to reduce feed line radiation (see figure. 3).
- C. The measured results of the radiation patterns and antenna gain are obtained from the control system and showed on the monitor (see figure. 4 and 5).

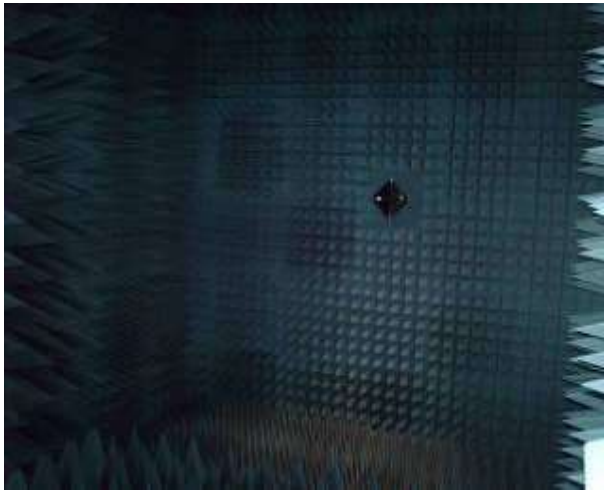


Figure.2



Figure.3

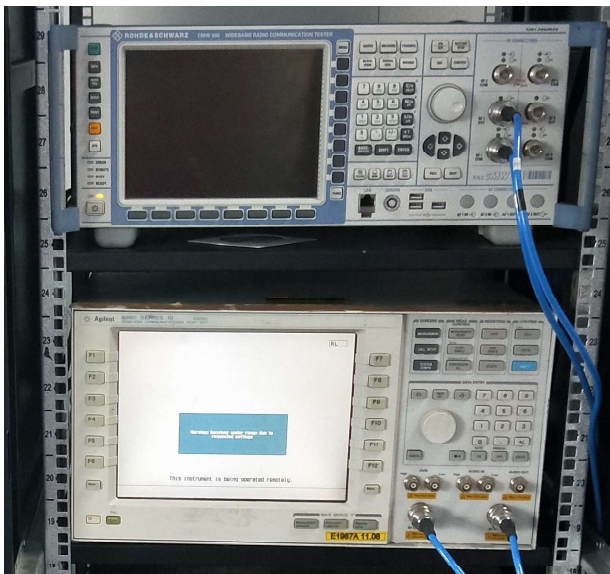


Figure.4

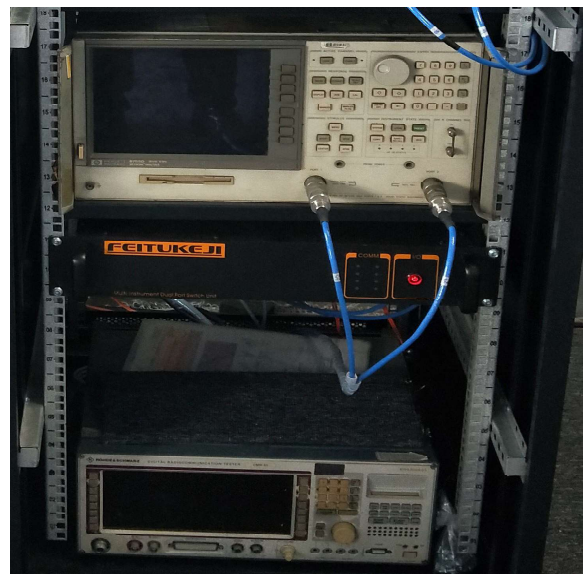


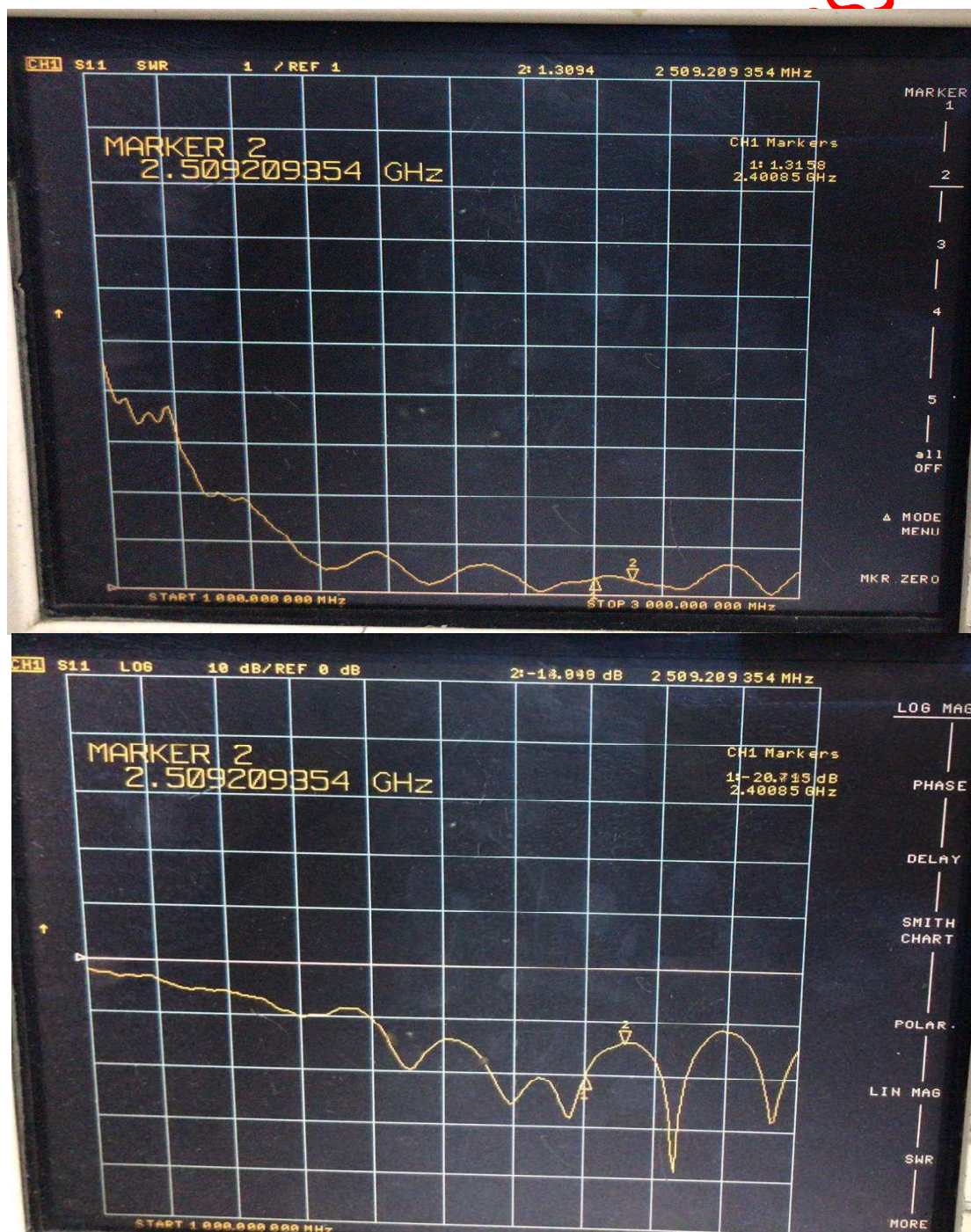
Figure.5

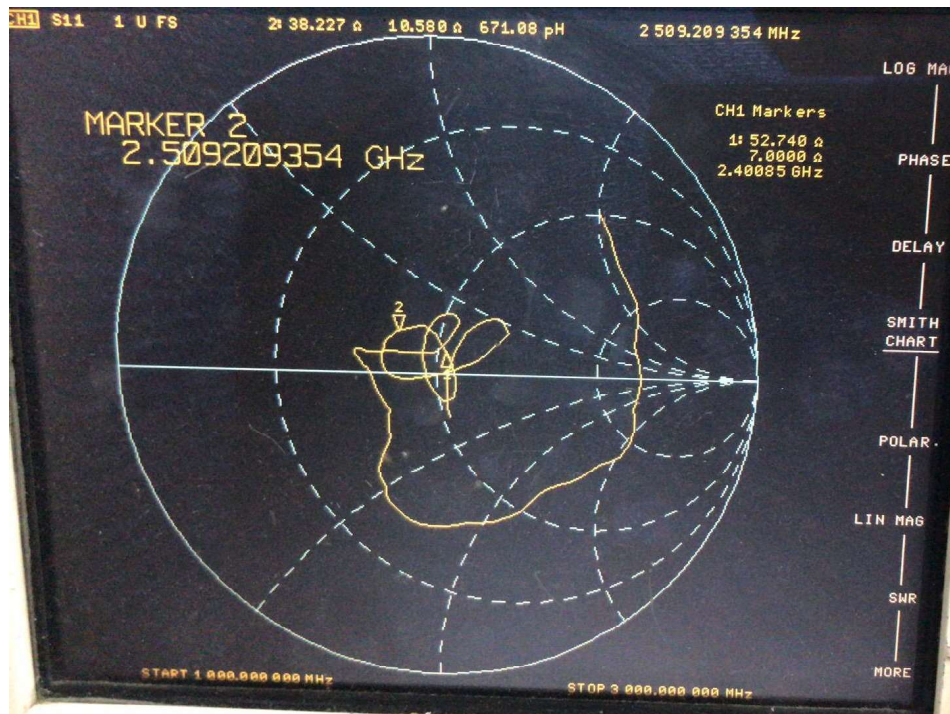


3. Performance Data

3.1 Passive data

VSWR (电压驻波比) / Return Loss (回波损耗) / Smith Chart (史密斯圆图)

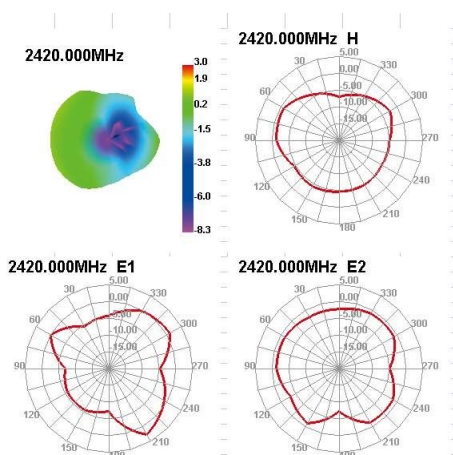




*注：以上为实测数据，仅供参考；因天线功能较为敏感，主体周边机构有变更请通知我们评估。

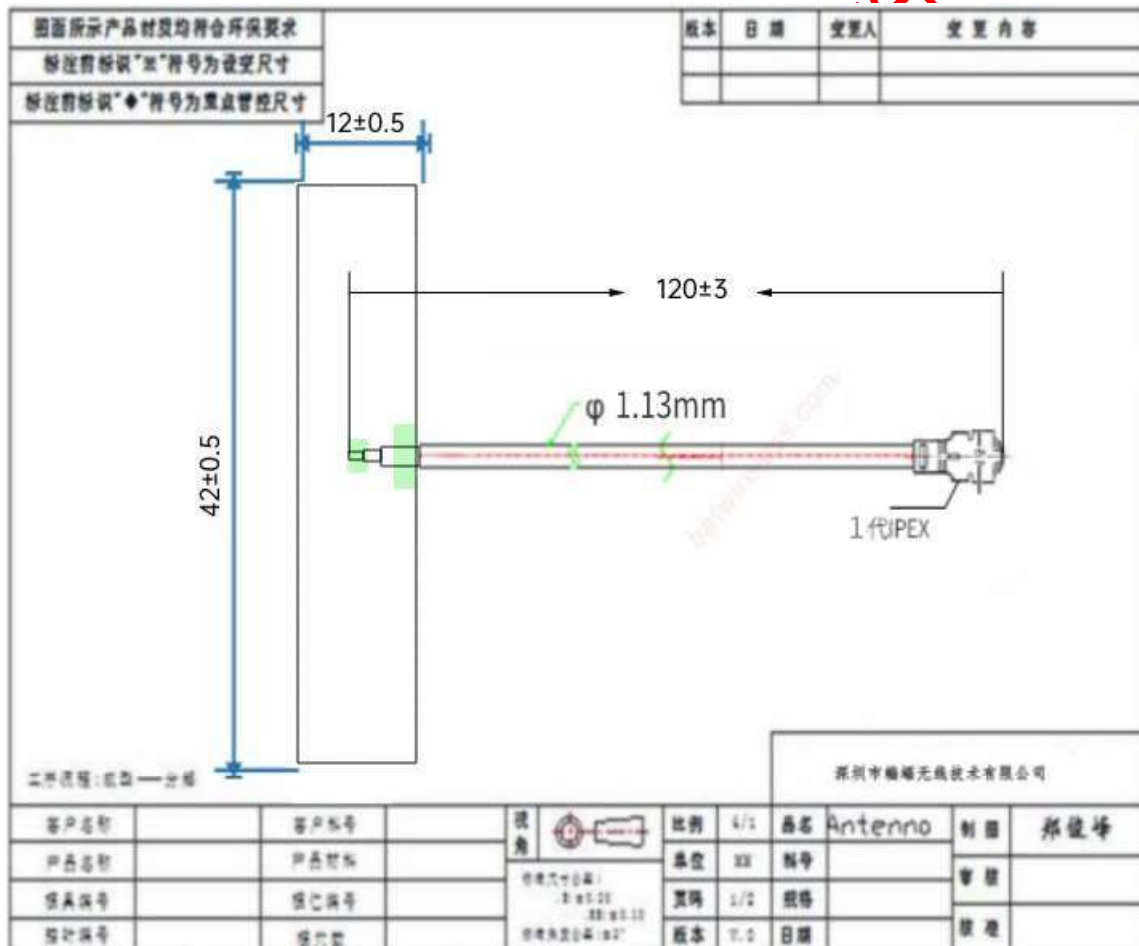
* Note: The above data are actual measurements and are for reference only; as the antenna function is more sensitive, please inform us for evaluation if there are any changes in the surrounding institutions of the main body.

Passive Test For WIFI						
Freq (MHz)	Effi (%)	Effi (dB)	Gain (dBi)	Gain (dBd)	UHS (%)	DHIS (%)
2400	54.51	-2.64	1.93	-1.22	27.374	27.137
2410	53.12	-2.75	1.97	-1.18	26.984	26.137
2420	54.92	-2.6	2.22	-0.93	28.175	26.746
2430	53.16	-2.74	2.04	-1.11	27.347	25.813
2440	52.85	-2.77	1.9	-1.25	27.092	25.756
2450	54.93	-2.6	1.95	-1.2	27.939	26.992
2460	56.27	-2.5	1.99	-1.16	28.379	27.893
2470	56.58	-2.47	2.06	-1.09	28.364	28.212
2480	60.33	-2.19	1.44	-0.71	30.169	30.16
2490	65.91	-1.81	1.97	-0.18	32.97	32.943
2500	63.79	-1.95	1.9	-0.25	32.048	31.746



4. Mechanical Specification

4.1 Assembly Drawing



Note: The above size product model is:: BW2.4FNX42-12B1L120

5. RF113

1. 适用范围

本规格书制定了电线的结构和电气特性

同轴线
AWG 32

1. Scope

This specification covers the construction and the electrical properties of wire.

Coaxial Wire
AWG 32

2. 结构/Construction

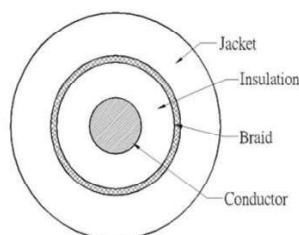
单位/Unit: mm

项目/Item	单位/Unit	详细资料/Details
Conductor 导体	材料/Material	- 绞合镀银铜丝 Silver-coated copper wire
	构成/Composition	(No./mm) 7/0.08
	外径/OD.	mm 0.24
	绞向/Orientation	- S
Insulation 绝缘层	材料/Material	- FEP(进口料)
	绝缘颜色/Insulation color	- 本色/Natural
	标称绝缘厚度/ Nom. Thickness	mm 0.22
	绝缘线径/OD.	mm 0.69
Braid Shield 编织	材料/Material	- 镀锡铜丝 Tinned copper wire
	构成/Composition	(No./mm) 16/4/0.05
	编织密度/Coverage	(%) ≥90
Jacket 外被	材料/Material	- FEP
	标称绝缘厚度/ Nom. Thickness	mm 0.12
	外径/OD.	mm 1.13±0.10

3. Electrical Properties (at 20℃) / 电气特性 (20℃时)

项目/Item	单位/Unit	详细资料/Details
导体电阻/Conductor Resistance	Ω/km	571 (Max.)
绝缘电阻/Insulation Resistance	MΩ • km	100 (Min.)
耐压强度 (AC) /Dielectric Strength (AC)	V/ 1 Min	500
特性阻抗/Impedance	Ω	50±3
耐温等级/ Temperature	℃	200
额定电压/rated voltage	V	30

4. 电线截面图示如下:



6.免责声明(Disclaimer):

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