

SPECIFICATIONS FOR APPROVAL

Customer Name: 中山市久康电子科技有限公司

Product Name: WIFI 天线

Product Model: C50

Part Number: LJF02-22082908-R0A

Write By : 付 强

Issued Date: 2022-08-29

CUSTOMER

ENGINEER R&D DEPT	BUSSINESS DEPT	APPROVAL

LEJIN

R&D DEPT	ENGINEER DEPT	APPROVAL

REV	MODIFIED DESCRIPTION	DATE	REMARK
V1.0	Initial Draft Release	2022/08/29	

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三、规格(Product Specification)

A. Electrical Characteristics	
Frequency	2400MHz ~2500 MHz
VSWR	<2.0
Efficiency	>40%
Impedance	50Ohm
Polarization	Linear
Gain	≅2.08dBi
B. Material & Mechanical Characteristics	
Material of Radiator	FPC(P1)
Cable Type	Φ0.81mm,Black,L50mm
Connector Type	Wire soldering(2-3-1)
Dimension	26.0*7.2mm
C. Environmental	
Operation Temperature	- 30 °C ~ + 80 °C
Storage Temperature	- 30 °C ~ + 85 °C
Humidity	40%~95%

四、测试设备(Test Equipment & Conditions)

- 1.Network Analyzers Agilent 8753D/5071C
- 2.HSPA+和LTE协议测试仪 R&S CMW500 -PT
- 3.Communications Test Set Agilent 8960
- 4.3D Chamber Test System

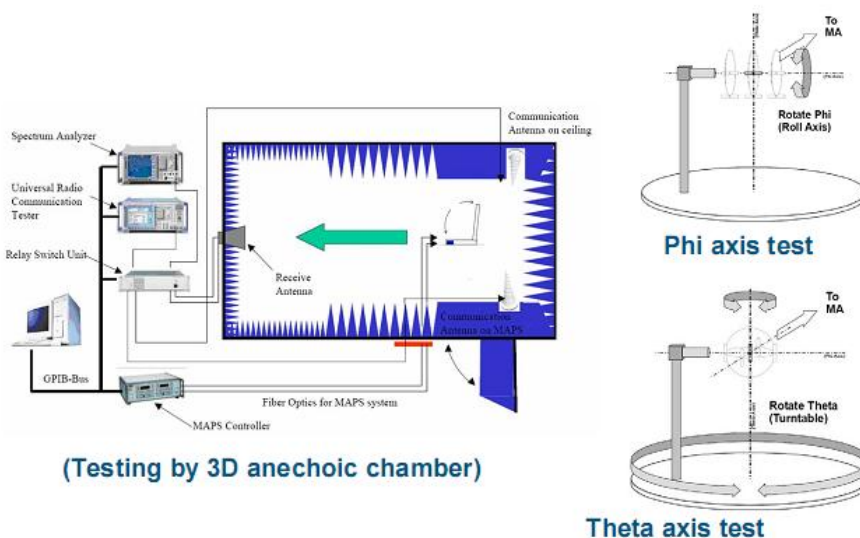
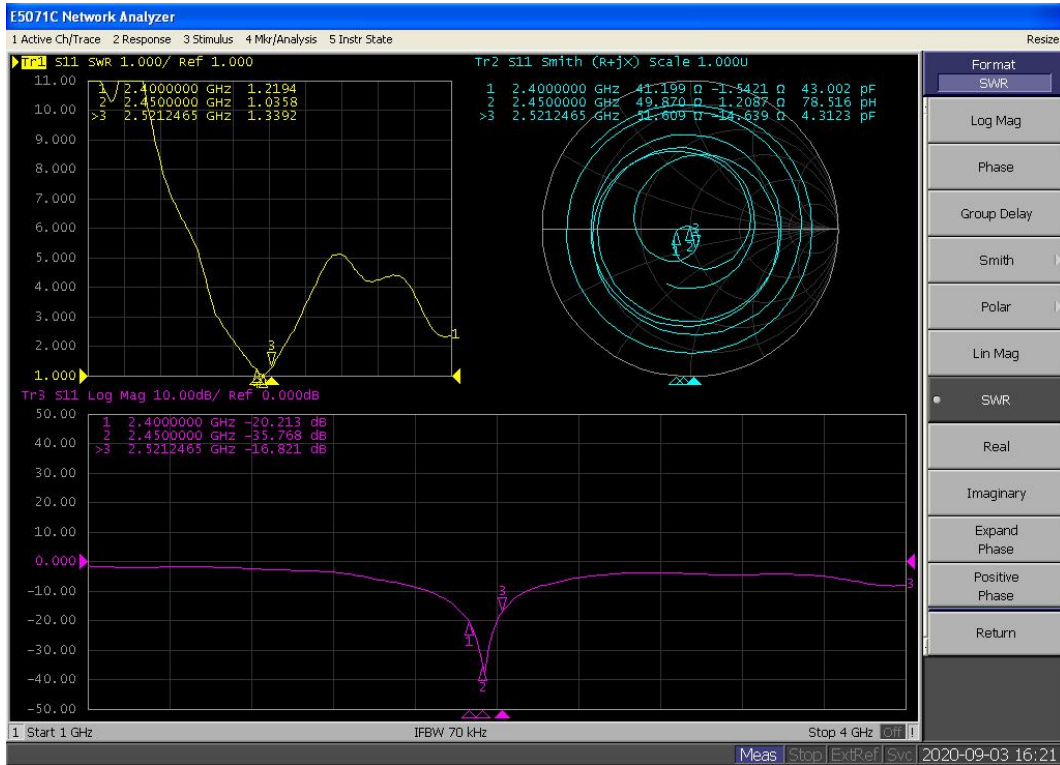


图 { SEQ 图 * ARABIC } 测试拓扑图

五、性能测试报告(Test Report)

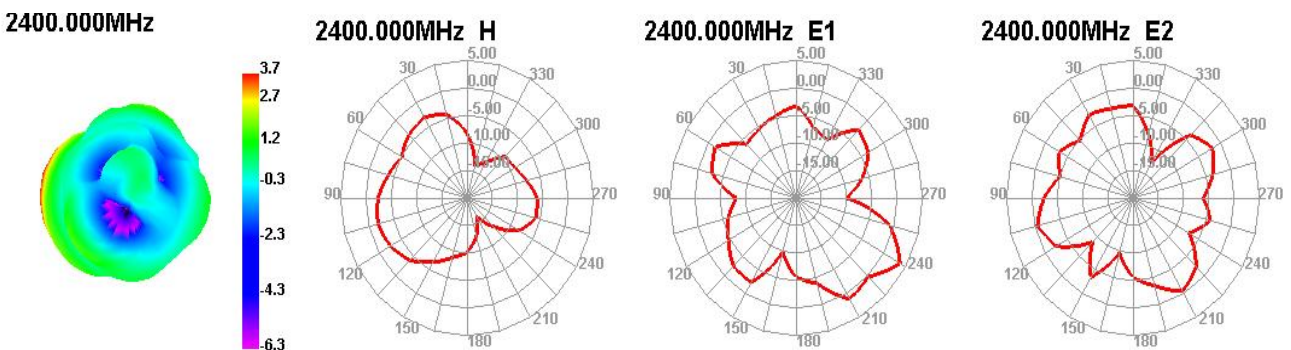
5.1 电压驻波比(VSWR)

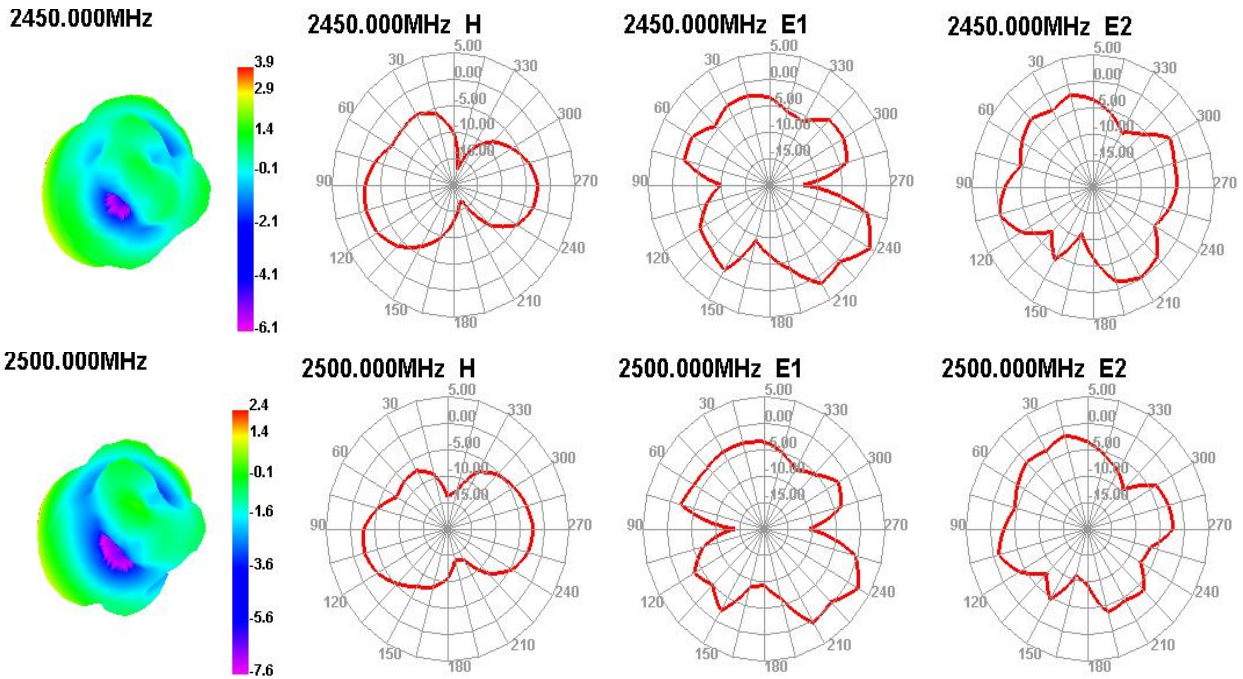


5.2 效率及增益(Efficient and Gain)

Passive Test For WIFI 2.4G	Freq(MHz)	2400	2410	2420	2430	2440	2450	2460	2470	2480	2490	2500
	Effi(%)	39.38	43.61	45.82	45.01	46.82	50.13	46.04	45.28	45.26	45.60	40.75
	Gain(dBi)	1.76	2.02	2.00	2.06	2.03	2.08	2.08	2.06	2.03	1.94	1.64

5.3 Radiation pattern.



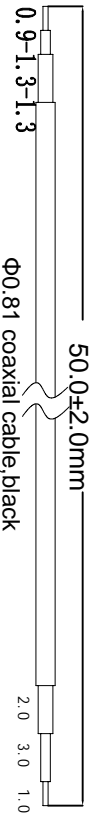
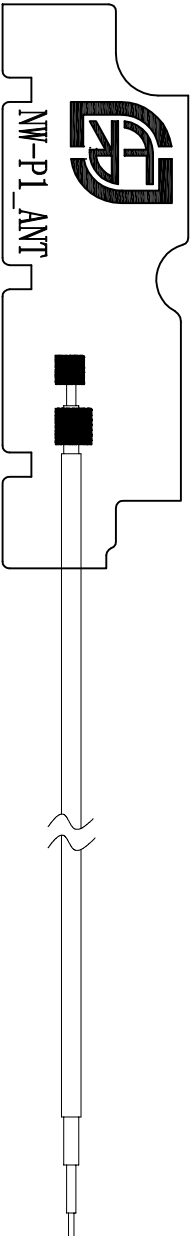
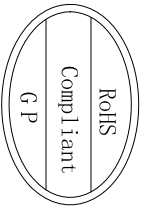


六、可靠性测试(Reliability Test)

Test Item	Test condition	Equipment	Specification	Result
1 Low Temp. Storage Test	Temperature: -30℃, Time:48hrs Test condition: Placing antenna in a Low/High Temperature Chamber, keep the temp is 25℃ and humidity is 65% for one hour, then step-down the temp. to -30℃ in one hour, store antenna for 44 hours; step-up temp to 25℃, test antenna after 2 hours.	Temp.&Hu mi. Tester	No material deformation is allowed. Electronic Performance is ok.	PASS
2 High Temp./High Humid Storage Test	Temperature: 85℃ Humidity: 85% RH Time:48hrs Test condition: Placing antenna in a Low/High Temperature Chamber, keep the temp is 25℃ and humidity is 65% for one hour, then step-up the temp. to 80℃ and the humidity up to 85% in one hour, store antenna for 44 hours; step-down temp to 25℃, test antenna after 2 hours.	Temp.&Hu mi. Tester	No material deformation is allowed. Electronic Performance is ok.	PASS
3 Salt-Spray 6 pray Test	Placing antenna in the Salt-Spray Tester, set the test condition, Temp: 35±2℃ Humidity: 85% NaCl salt spray :5±1%.PH value :6.5~7.2 Testtime:24hours	Salt-Spray Tester	No color change No appear rusting	PASS

七、装配方式(Assemble type)-Omit

八、工程图纸(Product Drawing)



Remark:

- 1.FPC material:Electrolytic copper.
- 2.Backing in behind:3M300LSE.
- 3.Tolerance: Cutting die:±0.1mm;Circuit on FPC:±0.05mm; others are ±0.05mm.
- 4.ROHS:(Pb,Hg,Cr+6,PBBs,PBDEs),<1000ppm; Cd,<100ppm.

Revise record	1	2	3

SHEN ZHEN LEJIN RADIO FREQUENCY CO., LTD

Third Angle	Project	久康电子	Date	2022-12-21
0~10 ±0.05	Part Name	WiFi ANT	Designed by	
10~18 ±0.10	Part No.	C50	Checked by	MD
18~30 ±0.12	Material		RF	
30~40 ±0.15	Treatment	LF02-22082908-R0A	Approved by	
40~ ±0.20	Location		Unit	mm
Angle ±0.5°			Scale	FIT

Rev	Description	Date	Remark
A	New drawing		

1	2	3	4	5	6	7	8
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