



Antenna Specification

Manufacture: TUYA Product

Name: T1-U-HL Antenna

Antenna Type: PCB

Test Date: 2023.11.28 Tested

by: Yinhua Zhang Approved

by: Licco



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1.General Description

Manufacturer	Hangzhou Tuya Information Technology Co.,Ltd
Address	Room 301,Building 1,Huace Center,Xihu District,Hangzhou City,Zhejiang Province, China
Test Location	Room 106, Building 3, Letong Science Park, No. 500, Qiuyi Road, Binjiang District, Hangzhou
Product Name	WiFi and Bluetooth module
Product model	T1-U-HL
Antenna Type	PCB Antenna
Test Items	Gain; Efficiency; Radiation Pattern
Test Frequency	2400-2500MHz
Test Standard	ANSI/IEEE Std 149-1979

2. Test Configurations

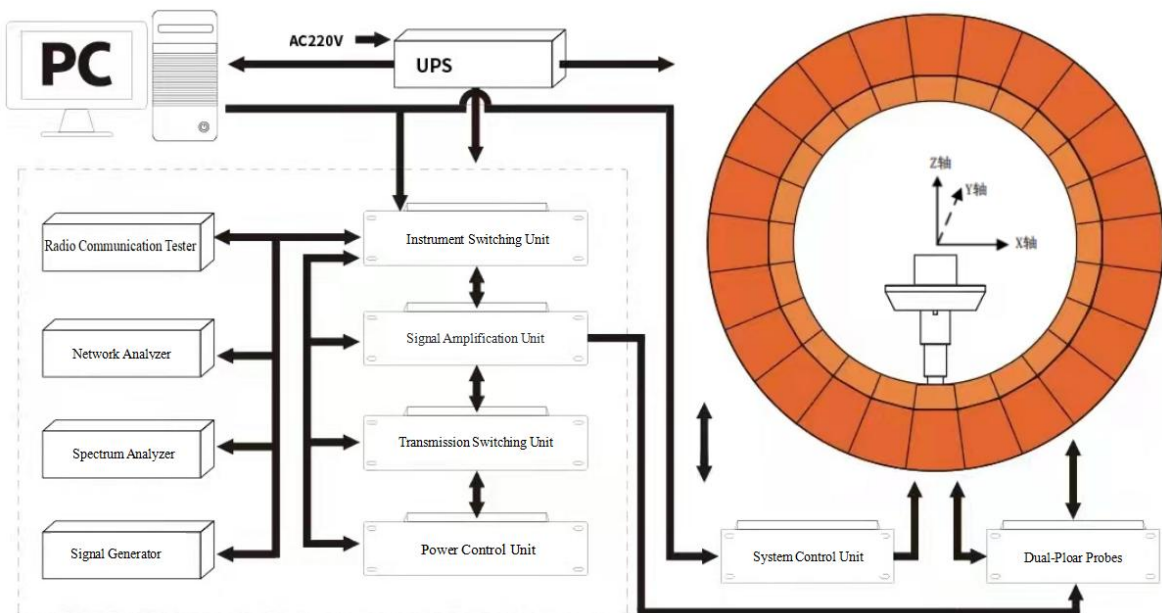
2.1 Test Environment

Temperature (°C)	25
Humidity (%RH)	60
Atmospheric Pressure (kPa)	100.5

2.2 Test Equipment

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

2.3 Test Principle



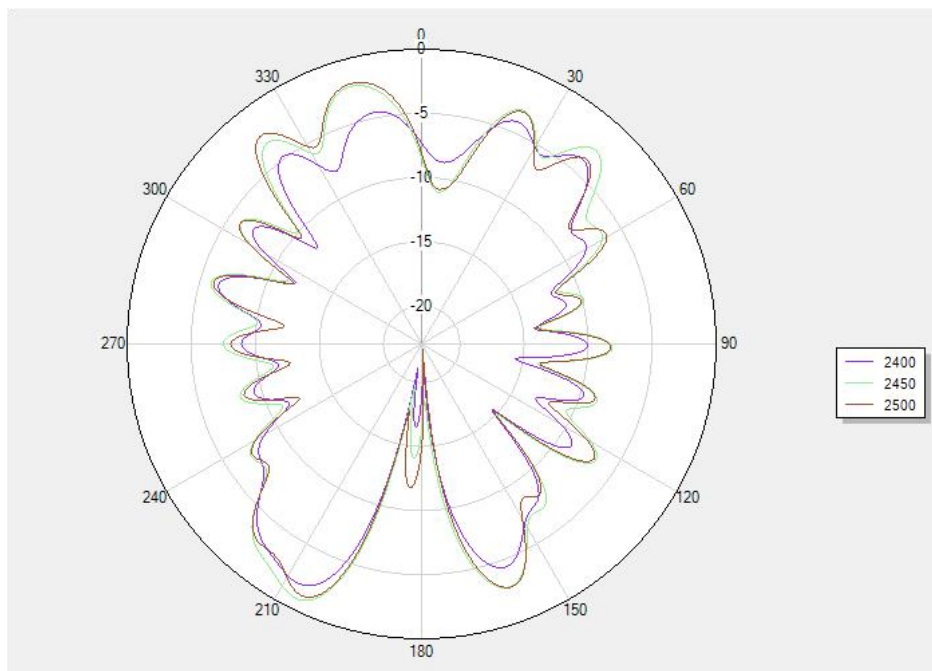
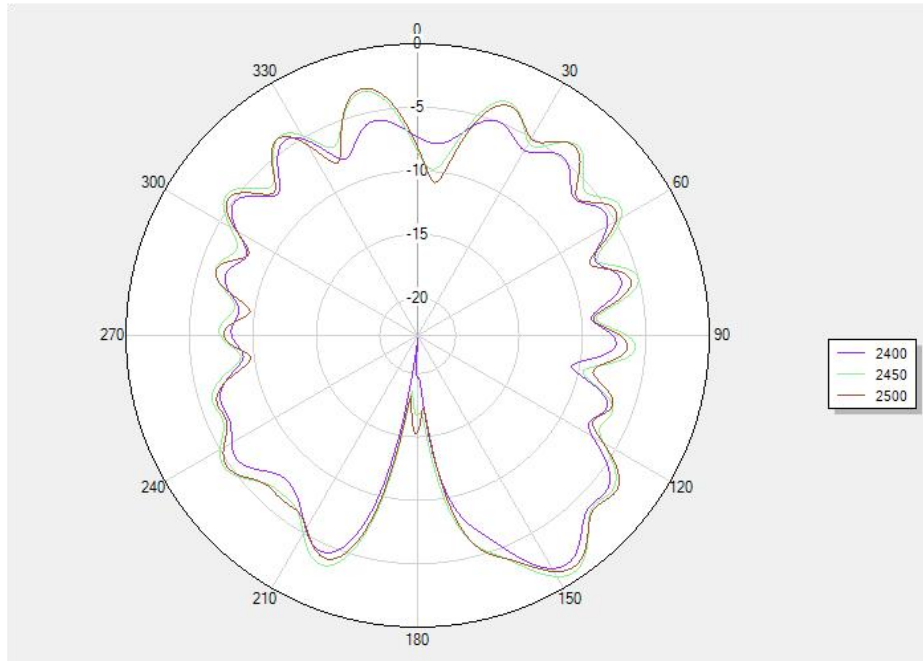


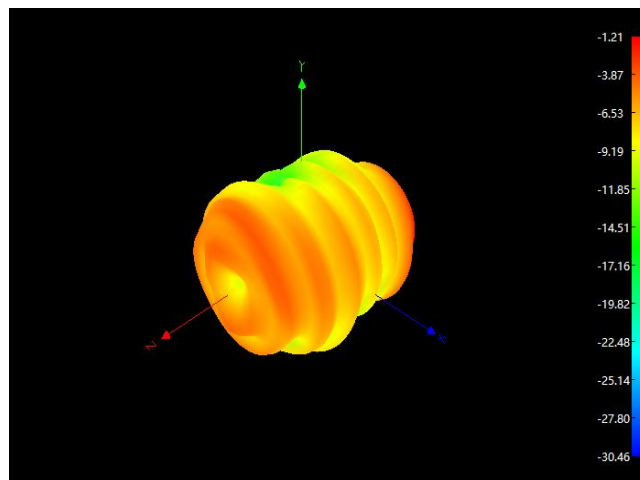
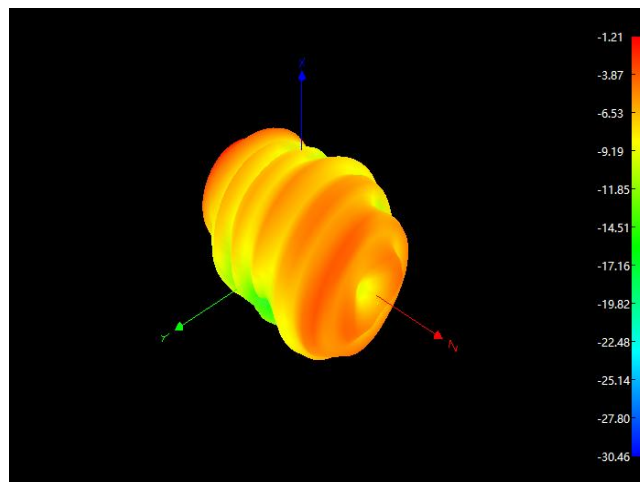
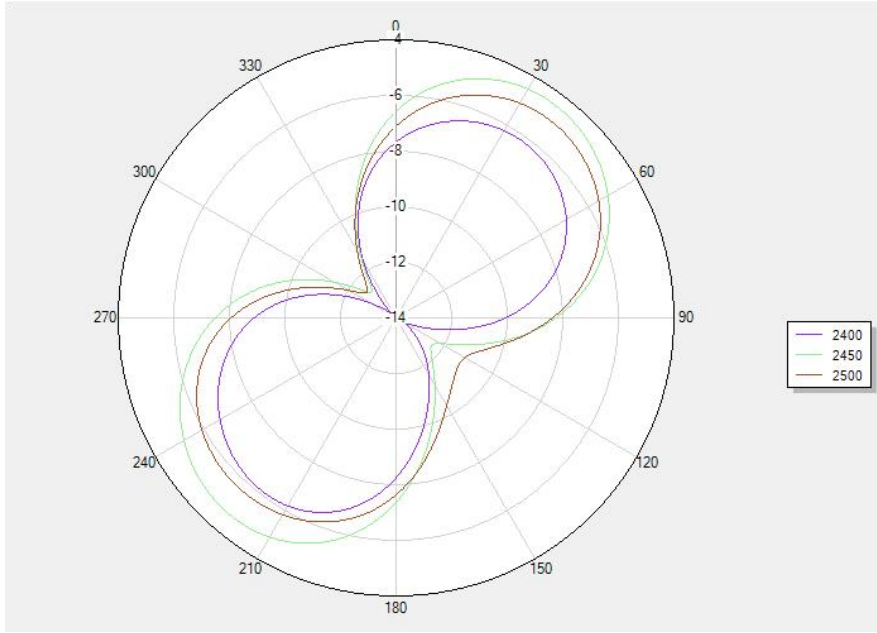
3.Test Results

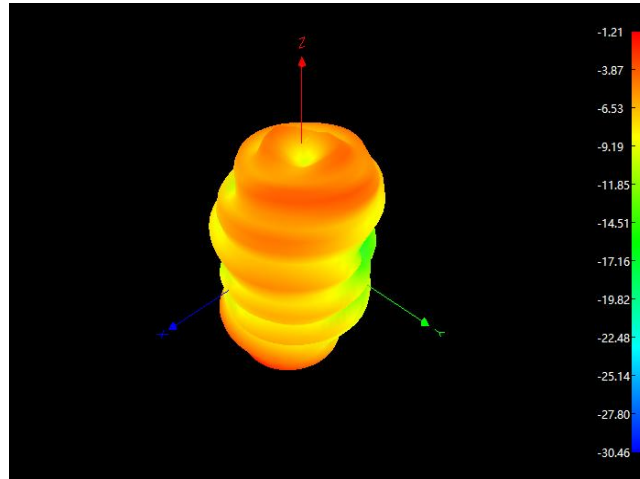
3.1 Gain and Efficiency

Frequency (MHz)	Efficiency(%)	Gain (dBi)
2400	22.39%	-1.21
2410	23.07%	-1.01
2420	23.71%	-0.55
2430	24.43%	-0.39
2440	25.12%	-0.28
2450	25.64%	-0.26
2460	25.41%	-0.32
2470	25.59%	-0.23
2480	25.06%	-0.53
2490	24.95%	-0.48
2500	23.5%	-0.96

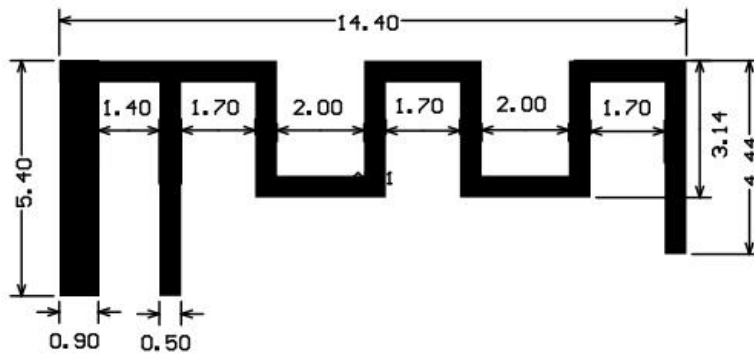
3.2 Radiation Pattern





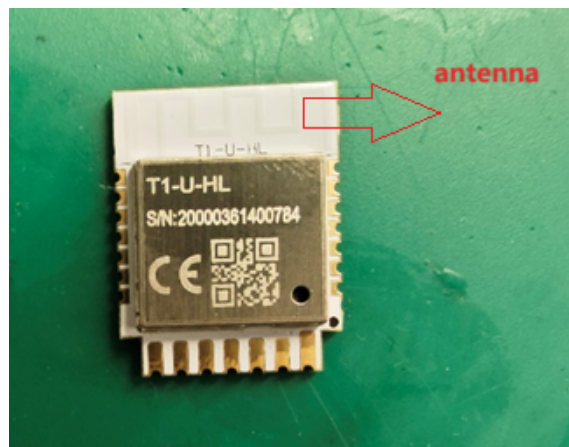


4. Antenna Dimensions



单位: mm

5. EUT Photo



6.Test Setup Photo

