

SPECIFICATION

SHEET FOR APPROVAL

(Revision: R: A1)

	CUSTOMER(客户名称)	Anker	
	CS P/N(客户机种)	T8S10	T810
	PART NAME(品名)	ANT1 ASSY	
	FREQUENCY(频率)	2400~2500MHz	
	ZTX NO.(物料编号)	2.00005594	A04-32002000099
	DATE(日期)	2022-12-01	

CUSTOMER			
QA CHECKED	ME CHECKED	RF CHECKED	MANAGER CHECKED

Remark(备注):

Sign(客户确认签字盖章):

MANAGER CHECKED	MANAGER CHECKED	ME CHECKED	RF CHECKED	LISTER
		LIPING. LIU	YIQING. LIN	

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ANTENNA SPECIFICATION

CUS P/N :T8S10 ANT1 ASSY

ApplicationDate:Dec,01,2022

Rev: R:A1

ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 1 of 8

Revision history

Rev	Date	Description
A1	2022-12-01	FIRST ISSUE

ANTENNA SPECIFICATION

CUS P/N :T8S10 ANT1 ASSY

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ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 2 of 8

Index

		Revision history	1
		Index	2
1		Mechanical Specification	3
	1-1	Mechanical Specification (T8S10 ANT1 ASSY)	3
2		Test equipment	4
3		Test Results Summary	5
	3-1	Active Test	5
	3-2	Passive Test	5
	3-2-1	VSWR	6
	3-2-2	Efficiency and Gain	6
	3-2-3	2D/3D Radiation Pattern Results	7
	3-2-4	Environment treatment	7
4		Test Report	8~9
5		The packing way	10

ANTENNA SPECIFICATION

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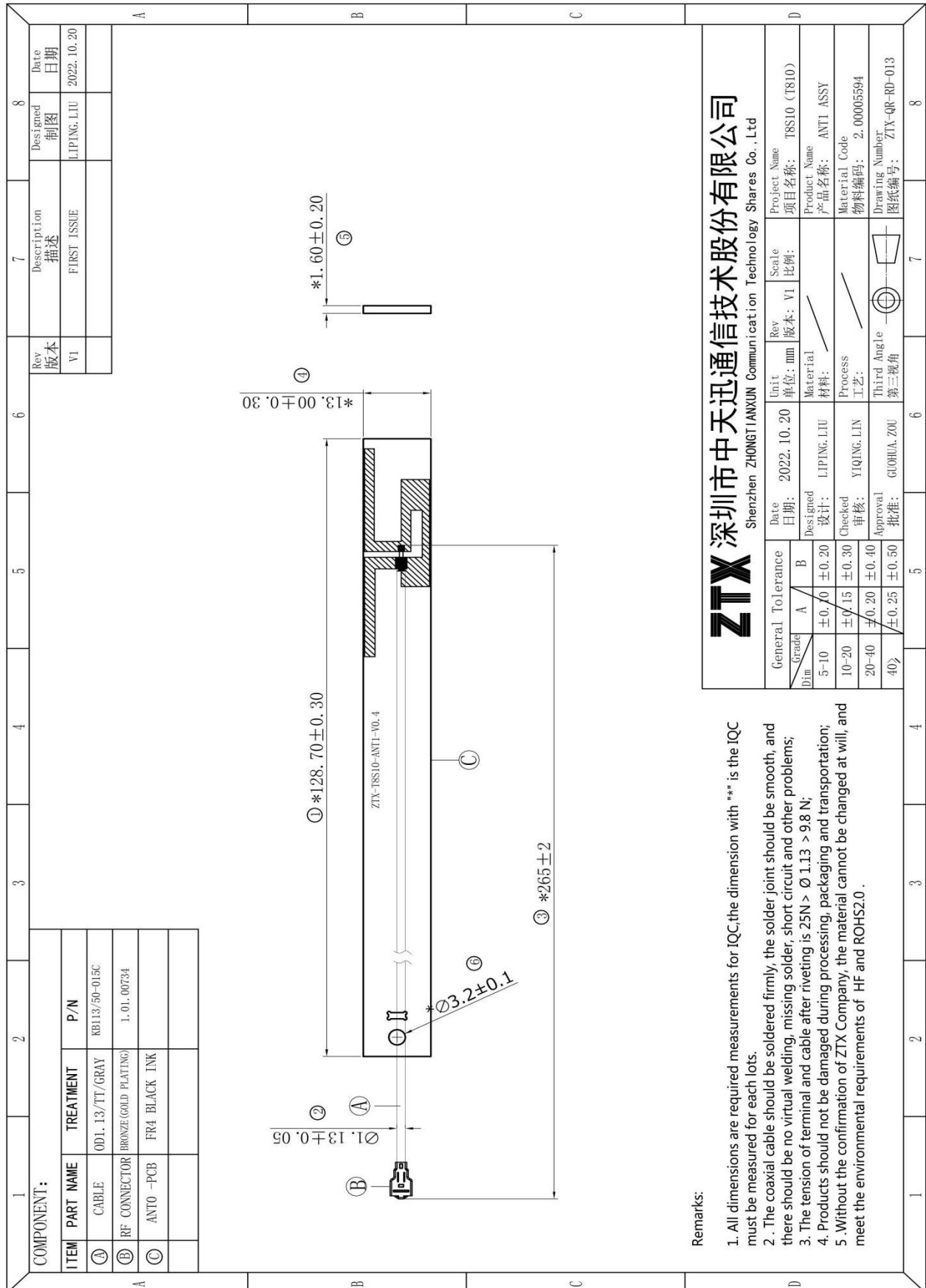
ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 3 of 10

1. Mechanical Specification

1-1 Mechanical Configuration (T8S10 ANT1 ASSY)



ANTENNA SPECIFICATION

CUS P/N :T8S10 ANT1 ASSY

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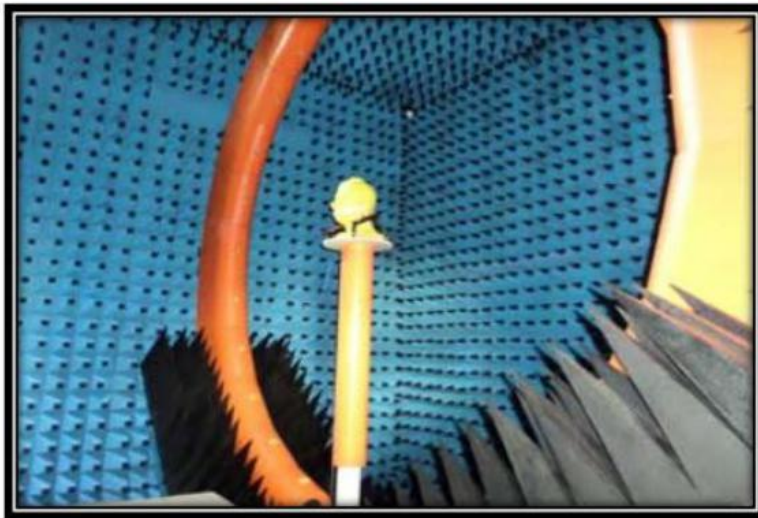
Rev: R:A1

ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 4 of 10

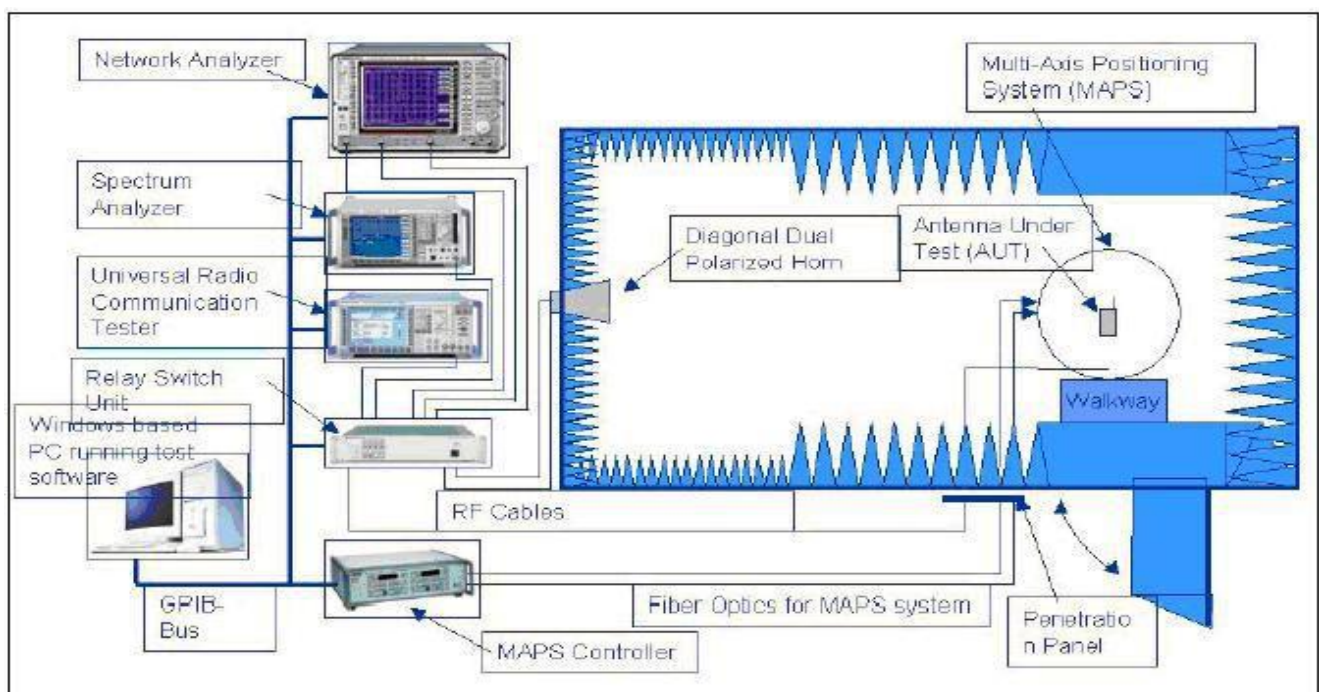
2.Test equipment



Owned 6 microwave dark room, equipped 2 sets world leading France Satimo SG24 OTA certification test systems (one in SHENZHEN, another one in Shanghai), ETS OTA Standard test system, Blue test reverberation test system which is High repeatability, high accuracy and high resolution. It can quickly provide accurate test reports, fully meet the CTIA standards.

Testing range:

Support active, passive testing of
GSM/CDMA/WCDMA/TD-
SCDMA/LTE/WIFI/WLAN/WiMax/BT
/GPS/MIMO/UWB within 0.4-6G.



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CUS P/N :T8S10 ANT1 ASSY

ApplicationDate:Dec,01,2022

Rev: R:A1

ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 5 of 10

3.Test Results Summary

3-1 Active Test

	11B	11M		11M
	Channels	TRP	Channels	TIS
1	2.412 GHz	27.42	2.412 GHz	-87.83
6	2.437 GHz	27.3	2.437 GHz	-87.51
11	2.462 GHz	27.39	2.462 GHz	-86.37

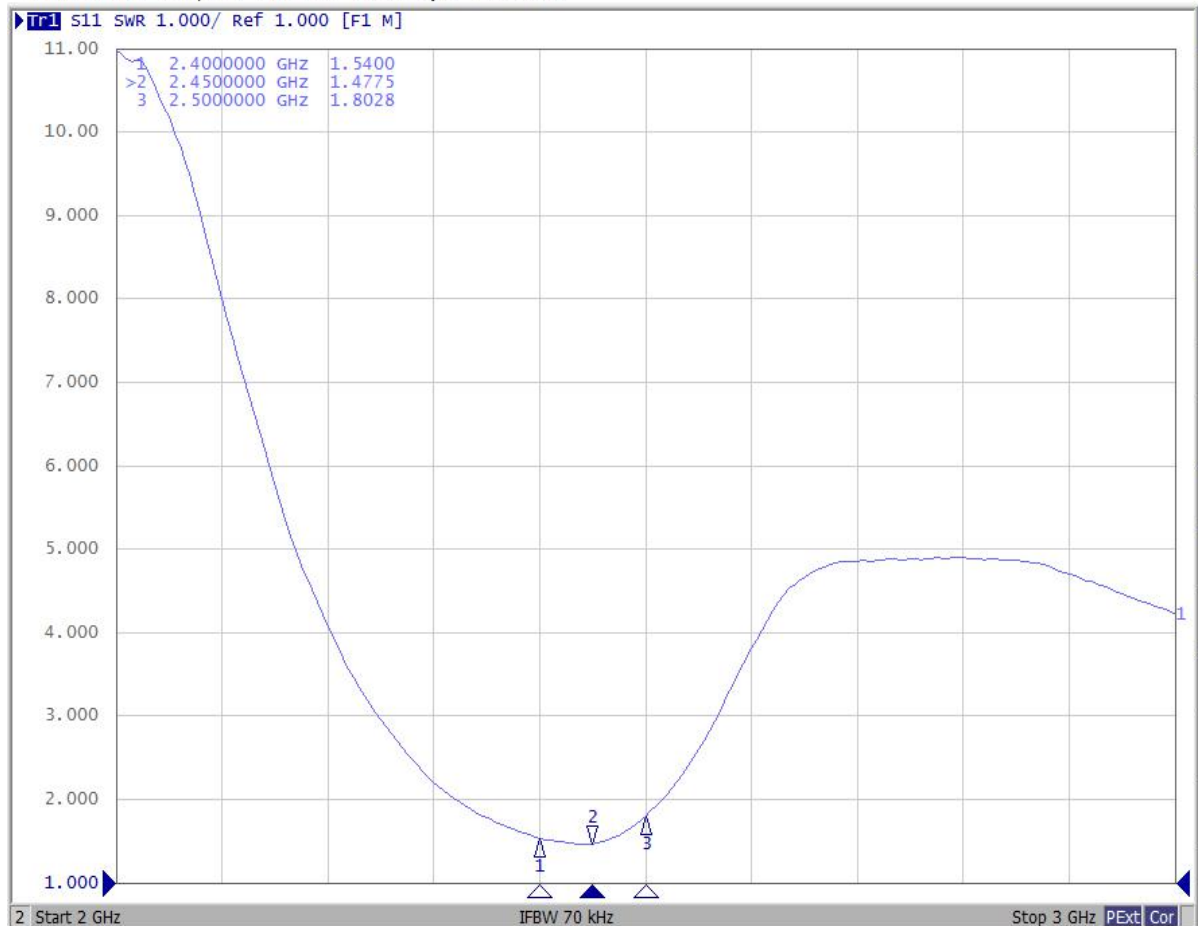
	11N	6.5M		6.5M
	Channels	TRP	Channels	TIS
1	2.412 GHz	26.02	2.412 GHz	-93.26
6	2.437 GHz	25.99	2.437 GHz	-92.75
11	2.462 GHz	25.91	2.462 GHz	-92.18

3-2 Passive Test

3-2-1 VSWR

E5071C Network Analyzer

1 Active Ch/Trace 2 Response 3 Stimulus 4 Mkr/Analysis 5 Instr State



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ApplicationDate:Dec,01,2022

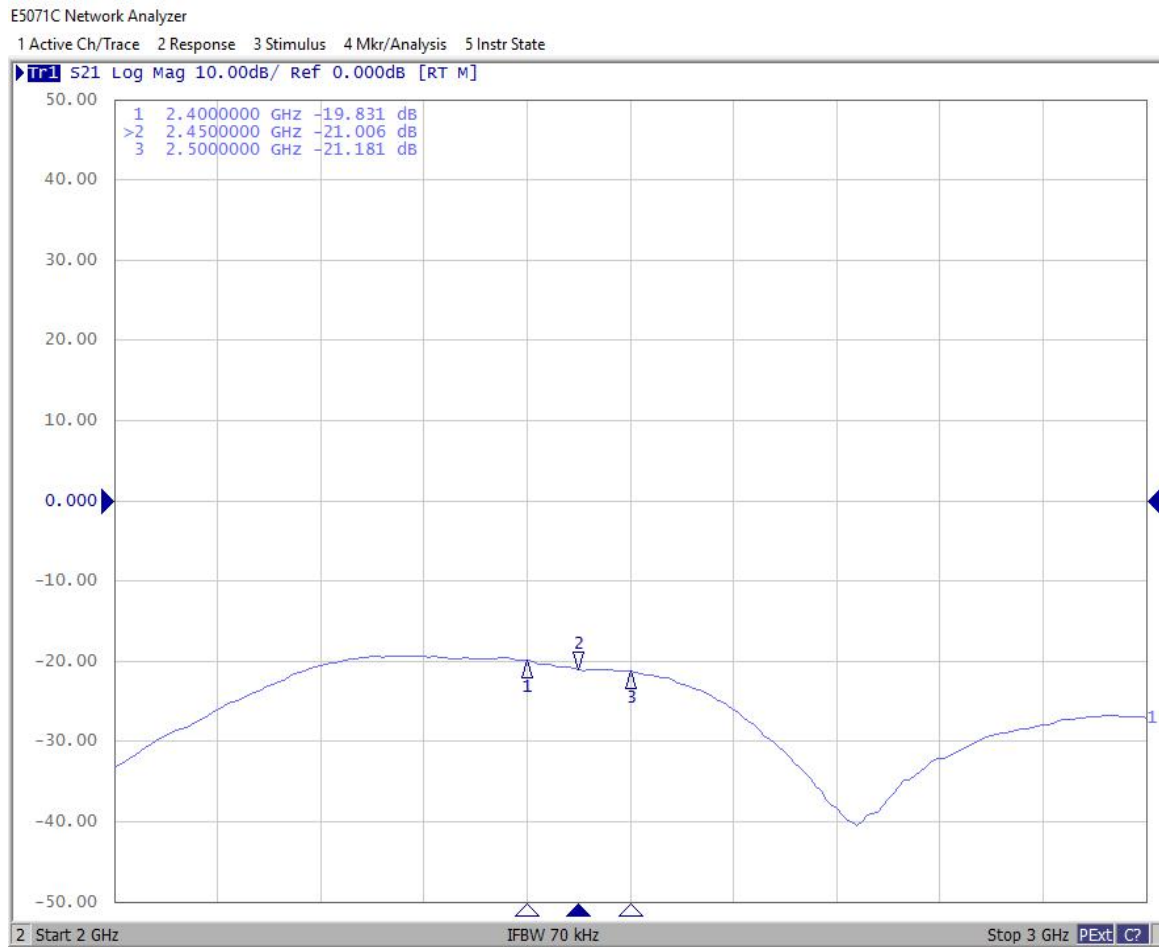
Rev: R:A1

ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 6 of 10

3-2-2 Isolation



3-2-3 Efficiency and Gain

Frequency (MHz)	Efficiency	Efficiency.dB	Gain . dBi
2400	62%	-2.10	2.40
2410	61%	-2.18	2.45
2420	61%	-2.14	2.46
2430	62%	-2.08	2.41
2440	62%	-2.10	2.34
2450	59%	-2.32	2.20
2460	59%	-2.29	2.18
2470	58%	-2.35	2.56
2480	59%	-2.31	2.72
2490	56%	-2.51	2.95
2500	58%	-2.35	2.79

ANTENNA SPECIFICATION

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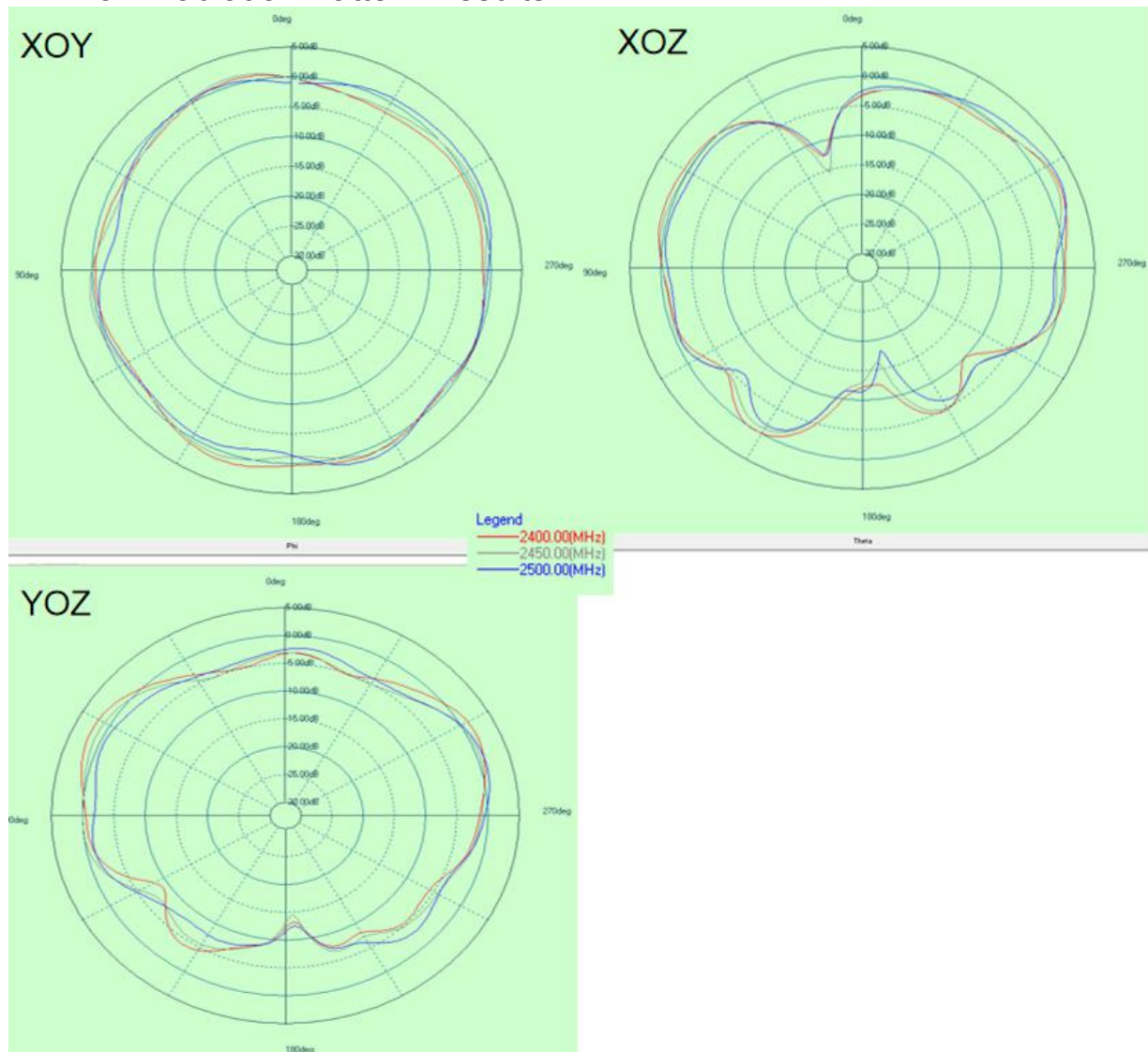
Rev: R:A1

ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 7 of 10

3-2-4 2D/3D Radiation Pattern Results



3-3 Environment treatment

Please refer to ANT Report-Photo for details.

4.Test Report

ANTENNA SPECIFICATION

CUS P/N :T8S10 ANT1 ASSY

ApplicationDate:Dec,01,2022

Rev: R:A1

ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 8 of 10

FAI

customer name		Anker			Product name		T8S10 (T810) ANT1 ASSY								amount		10PCS	
product material		coaxial line+PCB			Color of material		gray								date		2022/10/27	
product type: ☒ New appearance product ☐ Modified shape product ☐ Production ☐ Product style																		
NO	type	Required size	+Tolerance	-Tolerance	measured size										Decision	comment		
					1	2	3	4	5	6	7	8	9	10				
1		128.70	0.30	0.30	128.74	128.69	128.74	128.76	128.75	128.78	128.77	128.70	128.72	128.68	OK			
2	ø	1.13	0.05	0.05	1.12	1.12	1.11	1.12	1.13	1.12	1.13	1.12	1.12	1.11	OK			
3		265.00	2.00	2.00	265.00	265.00	265.00	265.00	265.00	265.00	265.00	265.00	265.00	265.00	OK			
4		13.00	0.30	0.30	13.07	13.05	13.11	13.09	13.06	13.08	13.08	13.12	13.10	13.07	OK			
5		1.60	0.20	0.20	1.55	1.57	1.64	1.60	1.58	1.59	1.60	1.55	1.56	1.54	OK			
6		3.20	0.10	0.10	3.19	3.18	3.22	3.24	3.20	3.22	3.19	3.24	3.23	3.21	OK			
7																		
8																		
9																		
10																		
11																		
12																		
Total judgment: ☒ OK ☐ NG																		
ratify: XIAOHUA DENG check: AILING YI make: LIHUA LI																		
comment:																		

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Rev: R:A1

ZTX P/N :T8S10 ANT1 ASSY

Editor:

Page 9 of 10

测试报告(Test Report)							
样品名称 (Product name)	ANT1 ASSY	样品型号 (Part Model)	T8S10 (T810)	环境温度 (Ambient temperature)	20±5℃	测试日期 (Date of test)	2022/10/28
样品数量 (Specimens)	12PCS	客户料号 (Customer number)	A04-32002000099	相对湿度 (Relative humidity)	50-60%RH	委托单位 (Client/Dept)	quality department
测试原因 (Test reasons)	■ New model/material verification			测试依据 (Test documentation)	☐ product drawing ☒ Reference book for antenna reliability inspection ☐ else:		
序号 (NO)	测试项目 (Test project)	样品数 (Samples Qty.)	测试仪器 (Test equipment)	测试条件与要求 (Test condition and note)	测试结果 (Test result)	结论 (Conclude) (Pass/Fail)	样品图片/实测值 (Sample picture/measured value)
1	Salt Spray Test	3	Salt spray testing machine	Conditions: 1. Place the product in the test chamber at 30 ° ±5 ° 2. Adjust the parameters of the test chamber: NaCl (no water); Concentration 5%±1%; pH value: 6.5 ~ 7.2; Laboratory temperature: 32-38℃; Compressed air pressure :1.0±0.01 (KG/M2) spray volume :1.0 ~ 2.0ML/80CM2/H. Relative humidity :85%±2%; Test product placement Angle :30 degrees +/-10 degrees 3. The storage time is 48 hours. 4. After cleaning, place in room temperature for 2 hours for observation. Requirements: plating (coating) layer without falling off, foaming, corrosion, oxidation and other adverse phenomena; The surface of the product shall not have rust spots and other undesirable phenomena	No coating shedding and oxidation occurred.	Pass	
2	high temperature test	3	High and low temperature alternating humidity and heat test chamber	1. Put the sample into a high temperature environment of 85 °C for 48 hours and take it out 2. Store at room temperature for 2 hours.	After the test, the product has no deformation, no discoloration, no warping, no falling off, and the electrical function is intact	Pass	
3	low temperature test	3	cryogenic refrigerator	1. Put the sample into a low temperature -40 °C environment for 48 hours and take it out 2. Store at room temperature for 2 hours.	After the test, the product has no deformation, no discoloration, no warping, no falling off, and the electrical function is intact	Pass	
4	High temperature and high humidity storage test	3	High and low temperature alternating humidity and heat test chamber	1. Sample 3pcs 2. Put the test sample in the test chamber (temperature 70±2℃, humidity 90% ~ 95%RH), and take it out for inspection after 48H.	After the test, the product has no deformation, no discoloration, no warping, no falling off, and the electrical function is intact	Pass	

备注(Comments):

核准(Approved by): XIAOHUA DENG 审核(Checked by): AILING YI 测试(Name of operator): LIHUA LI

5.The packing way

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ZTX P/N :T8S10 ANT1 ASSY

ApplicationDate:Dec,01,2022
Editor:

Rev: R:A1
Page 10 of 10

SOP

Product model	Product name	Version	Operation serial number / name	Working Hours (S)	Document number	Instrument calibration and requirements:
T8S10 (T810)	ANT1 ASSY	A1	SOP	/	ZTX-QD-WI-ASSY-386	1. The test equipment must be grounded; 2. After reconnecting the interface or when the connection test is unstable, the instrument shall be corrected; 3. When testing the products, ensure that the antenna is suspended and over 30cm away from the human body or metal devices.
    						Operational protection requirements: 1. Operators should wear finger covers for operation, (special products with cotton gloves); 2. Take the testing products lightly during the testing process; 3. When operating and testing the treatment tools, use them in strict accordance with the operation specifications to avoid hand injury.
6S Requirements: 1. Keep the test site table clean, free of dust, water and oil; 2. Materials are neatly placed and clearly marked.						
Note: 1. Whether the customer material code and quantity are correct, the label must be printed by machine; 2. Internal label, outside label, shipping report and delivery note should be consistent; 3. If the trial production materials or change, the corresponding identification, the mantissa box should be affixed with the mantissa identification, and the inspection report should be attached						
name of material	Material code	dosage	remark			
pearl wool						
elastic						
label						
PE open the pocket	1. 12. 000030	240*160*0. 05mm	1/50			
PE seal pocket	1. 12. 000023	330*230*mm	1/300			
cardboard	1. 13. 000003	42*30cm	1/1500			
carton	1. 12. 000086	45*32. 5*21cm	1/3000			
version	Revised content		Revised date	Revised		
A1	The first edition was released		2022/11/4	HENG FENG XIANG		
Formulate	HENG FENG XIANG	Ailing Yi	Ratify	FEIFEI DANG		



Figure 1: Product picture

Figure 2: Seal PE bag packaging / labeling (picture for reference)



Figure 4: External box label / attached shipment inspection report



Figure 3: Packing (pictures are for reference only)



Figure 5: Seal the box