

SPECIFICATION

Shenzhen Guandetong Electronic Limited

*Shenzhen Guandetong Electronic Co., Ltd.*2.4G antenna with copper tube 1.13 black wire with terminals 75MM

Product Specification

connection		frequency range	2400-2500MHz
Frequency band wire name		edition	A1
Customer part number	48109075000	Guandetong part number	
Guandeton g No			
R F design	XIAO	RF Manager	LI
Structural design	WU	Structure Manager	HUANG
Technical Director	ADD	Date	2026-06-27

Customer confirmation:

Does the assembly meet your company's requirements: ☐OK ☐NG

catalogue

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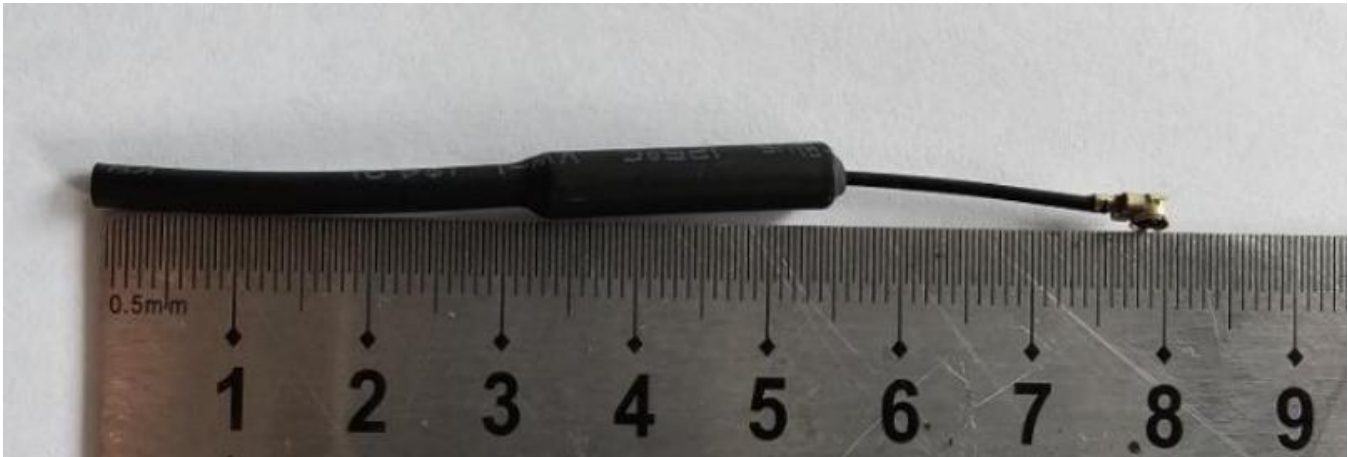
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一、 Product pictures



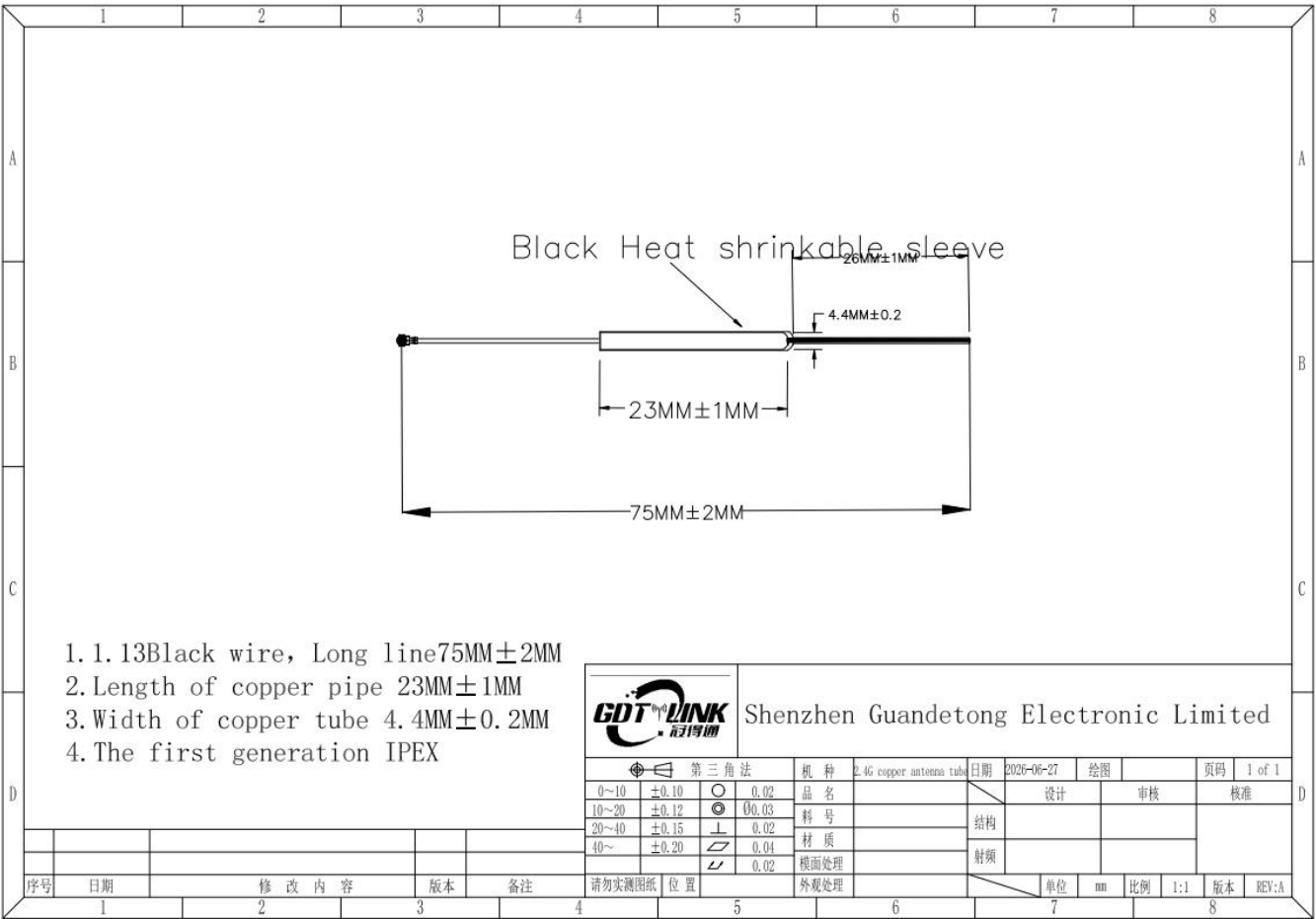
二、 Product parameters

Product testing parameters			
Product name	Internal Antenna	(Model Type)	GDT-P2.4--L75
(Electrical Specifications)			
(Frenquency Range)	2400-2500MHz	(Polarization)	perpendicular
(Impedance)	50Ω	Radiation	QXCOMM
(VSWR)	≦2.0	(Power)	50W
(Gain)	2.29dBi	(Bandwidth	100M
(Mechanical Specifications)			
(Dimensions)	4.4*23	(Chassis Color)	black
(Connector)	IPEX	(Cable Length)	75±2MM
(Wire)	1.13black		
(Working Temperature)	-40℃--+85℃	(Limit Temperature)	-40℃--+85℃

三、S11(VSWR、Return、Smith)

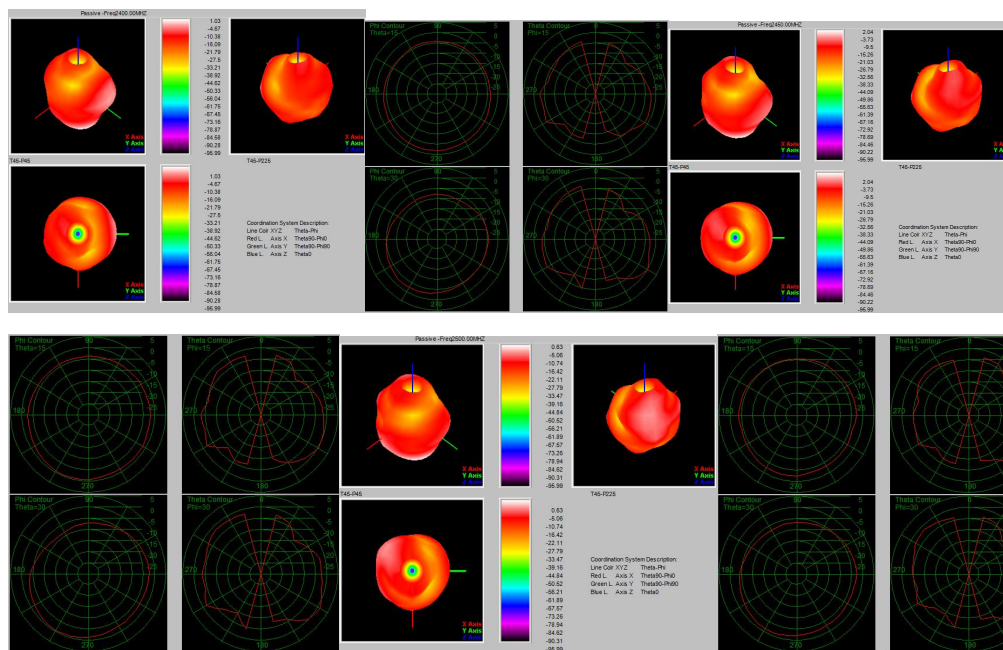


四、Structural drawings



五、Antenna gain and efficiency&Apple in 3D

Test Point ID	Freq. (MHz)	TRP (dBm)	Gain (dBi)	Directivity (dBi)	Efficiency (%)	Efficiency (dB)	Max (dBi)	Theta of Max	Phi of Max	Min (dBi)	Theta of Min	Phi of Min	AVG (dBi)	Max/Min (dB)	Max/AVG (dB)	Min/AVG (dB)
1	2400.0	2400.00	1.03	5.42	36.5%	-4.38	1.03	120	60	-95.99	0	0	-4.49	97.02	5.52	-91.50
2	2410.0	2410.00	1.31	5.70	36.4%	-4.39	1.31	120	60	-95.99	0	0	-4.26	97.30	5.57	-91.73
3	2420.0	2420.00	1.74	6.01	37.4%	-4.27	1.74	120	60	-95.99	0	0	-3.88	97.73	5.62	-92.11
4	2430.0	2430.00	2.29	6.21	40.6%	-3.92	2.29	120	60	-95.99	0	0	-3.40	98.28	5.69	-92.59
5	2440.0	2440.00	2.20	6.20	39.8%	-4.00	2.20	120	60	-95.99	0	0	-3.56	98.19	5.76	-92.43
6	2450.0	2450.00	2.04	6.04	39.8%	-4.00	2.04	120	60	-95.99	0	0	-3.59	98.03	5.63	-92.40
7	2460.0	2460.00	1.97	5.90	40.5%	-3.93	1.97	120	60	-95.99	0	0	-3.54	97.96	5.51	-92.45
8	2470.0	2470.00	1.64	5.55	40.7%	-3.91	1.64	120	60	-95.99	0	0	-3.74	97.63	5.39	-92.25
9	2480.0	2480.00	1.03	5.02	39.9%	-3.99	1.03	120	60	-95.99	0	0	-4.20	97.02	5.23	-91.79
10	2490.0	2490.00	0.84	4.97	38.6%	-4.14	0.84	120	60	-95.99	0	0	-4.43	96.83	5.27	-91.56
11	2500.0	2500.00	0.63	4.80	38.3%	-4.17	0.63	120	60	-95.99	0	0	-4.54	96.62	5.17	-91.45



六、Environmental performance test

project	Project test conditions	Specifications
Storage environment	The test temperature, humidity and air pressure are as follows when there is no specific condition: 1. The temperature is - 30 °C~+80 °C 2. Relative humidity: 45% - 85% 3. The air pressure is 86kpa-106kpa	Normal electrical and mechanical performance
High and low temperature test	5 cycles between 70 ° C and 40 ° C, then under normal conditions1-2H, check the appearance quality.	The size shall meet the requirements and Mechanical and electrical performance
Constant damp heat resistance test	Relative humidity: 95 ± 3%, test temperature: 40 °C. After lasting for 2h, The electrical performance shall be measured within 5 minutes after the test object is taken out, and the test object shall be within the normal range Part 1-2H, check the appearance quality	The size shall meet the requirements and Mechanical and electrical performance
vibration test	Vibration frequency range: 10-55HZ, displacement amplitude: 0.35MM, acceleration amplitude: 50.0M/s, frequency sweep cycles: 30 times	Normal electrical and mechanical performance
Drop test	Free fall for 3 times in the direction of mutually perpendicular axes at a height of 1M	Normal electrical and mechanical performance