Gao chang electronic technology co. LTD

SPECIFICATION FOR APPROVAL

File No. 2024101101

Rev ision 1.0

CUSTOMER: _____

CUSTOMER NO: _____

PART NAME: **2.4G Antenna L=25MM**

GC-ML18 L=25MM

SUPPLIER NO: _____

Date: Q'TY: PCS

CUSTOMER APPROVED BY		
APPROVAL	CHIEF	SUPERVISOR

SUPPLIER SIGNATURE		
APPROVAL	CHECK	DESIGN

SH-RD-F04-A

The project table

NO.	（Contents）	（Number of Page）	（Page Code）
1	（Spec Cover）	1	1
2	（Spec Item）	1	2
3	（Drawing）	1	3
4	（Test Reports）	1	4
5	（S Parameter）	1	5
6	（Gain Test）	1	6
7			
8			
9			
10	-	-	-
11	-	-	-
12	-	-	-

0.5mm
cm
1
2
3
4
mm

Test Reports

Electrical Properties

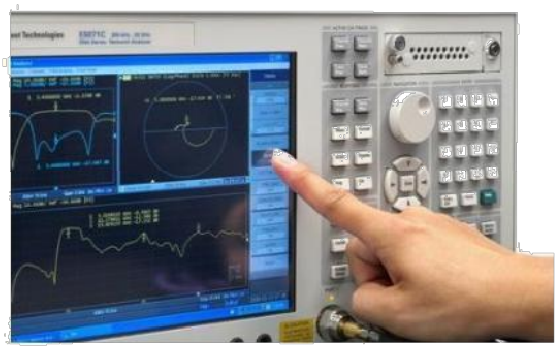
Frequency	2.4GHz
Impedance	50 0hm Nominal
V.S.W.R	1.92 : 1 Max
Return Loss	-10 dB Max
Radiation	Omni-directional
Gain (Peak)	0.5 dBi
Cable Loss	3.2 dB / m Max @ 2450 MHz
Polarization	Linear, Vertical
Admitted Power	1 W
Connector	

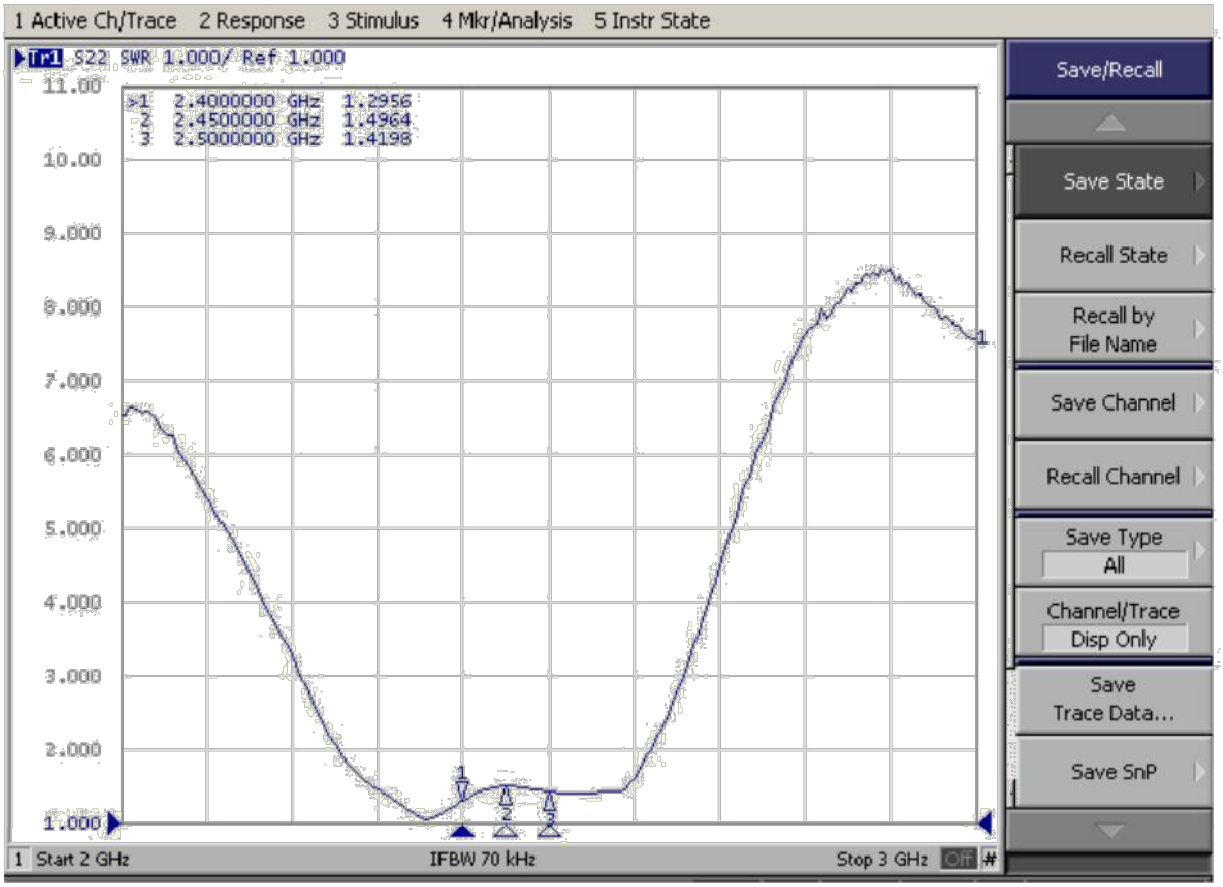
Physical Properties

Antenna Material	TUBE
Cable Type	The wire// L=25mm
Operating Temp.	-10 ~ +60 ˚C
Storage Temp.	-10 ~ +70 ˚C
Cable Color	BLACK

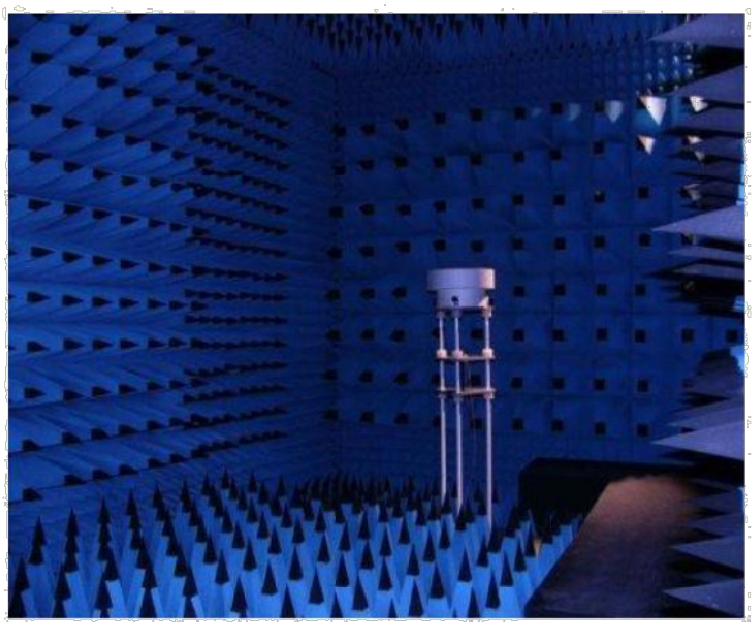
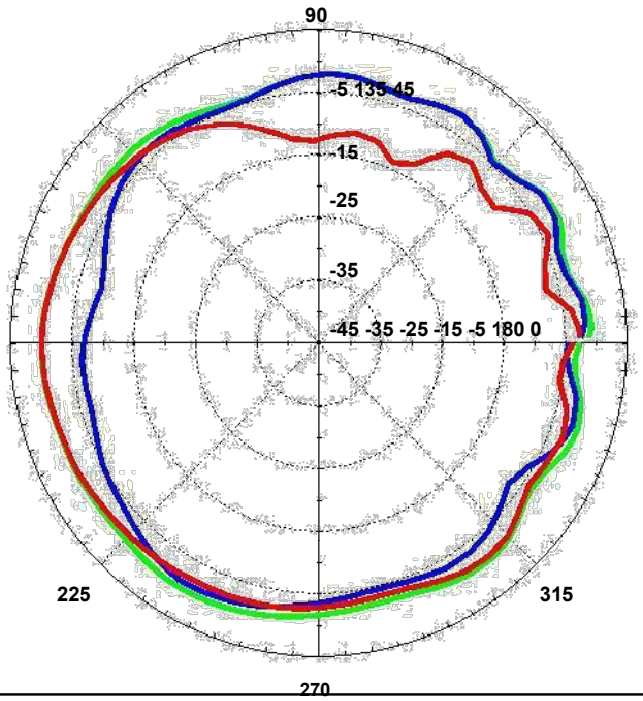
S Parameter Test

Agilent E5071C





Gain Test

Antenna Radiation Pattern VS Gain	
	

Efficiency

Passive Test For 2.4								
Freq (MHz)	Effi (%)	Effi (dB)	Gain (dBi)	Gain (dBd)	UHIS (%)	DHIS (%)	Max (dB)	Min (dB)
2400	59.52	-2.25	1.74	2.59	17.404	42.116	1.74	-15.98
2410	57.06	-2.44	1.61	2.46	16.988	40.071	1.61	-16.43
2420	58.9	-2.3	1.82	2.67	17.853	41.047	1.82	-14.86
2430	60.98	-2.15	1.94	2.79	19.046	41.929	1.94	-15.28
2440	60.05	-2.22	0.5	2.89	18.929	41.118	0.5	-16.06
2450	57.65	-2.39	1.92	2.77	18.834	38.812	1.92	-16.28
2460	51.21	-2.91	1.49	2.34	17.497	33.715	1.49	-16.08
2470	49.05	-3.09	1.23	2.08	17.954	31.101	1.23	-15.57
2480	48.59	-3.13	1.16	2.01	18.701	29.889	1.16	-15.69
2490	49.17	-3.08	1.09	1.94	19.826	29.349	1.09	-15.38
2500	43.12	-3.65	1.47	1.32	17.831	25.29	1.47	-15.29