

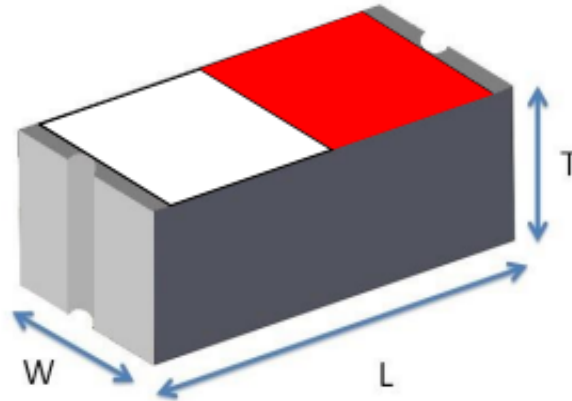
Antenna Test Report

Headphone V1.0

Customer	Dongguan Chuangxin Microelectronics Technology Co., Ltd.
Agent	LeiMeng
Project name	Headphone
Model. IC	
Model. ANT	KBAN3216D245H06

Jun 2024/01/09

Antenna Dimension:



P/N: KBAN3216D245H06

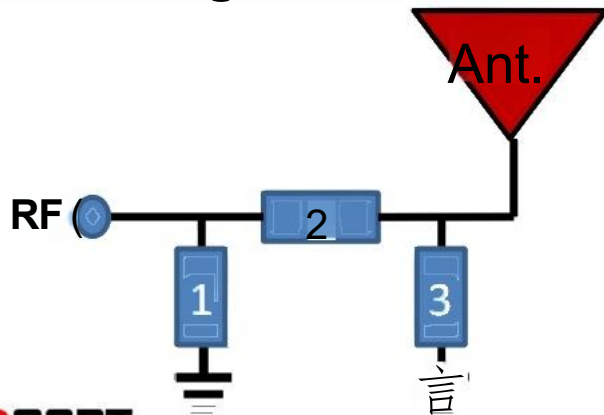
	Dimension (mm)
L	3.23 ± 0.20
W	1.66 ± 0.20
T	1.13 ± 0.20

Ant. Matching

- Antenna Placement

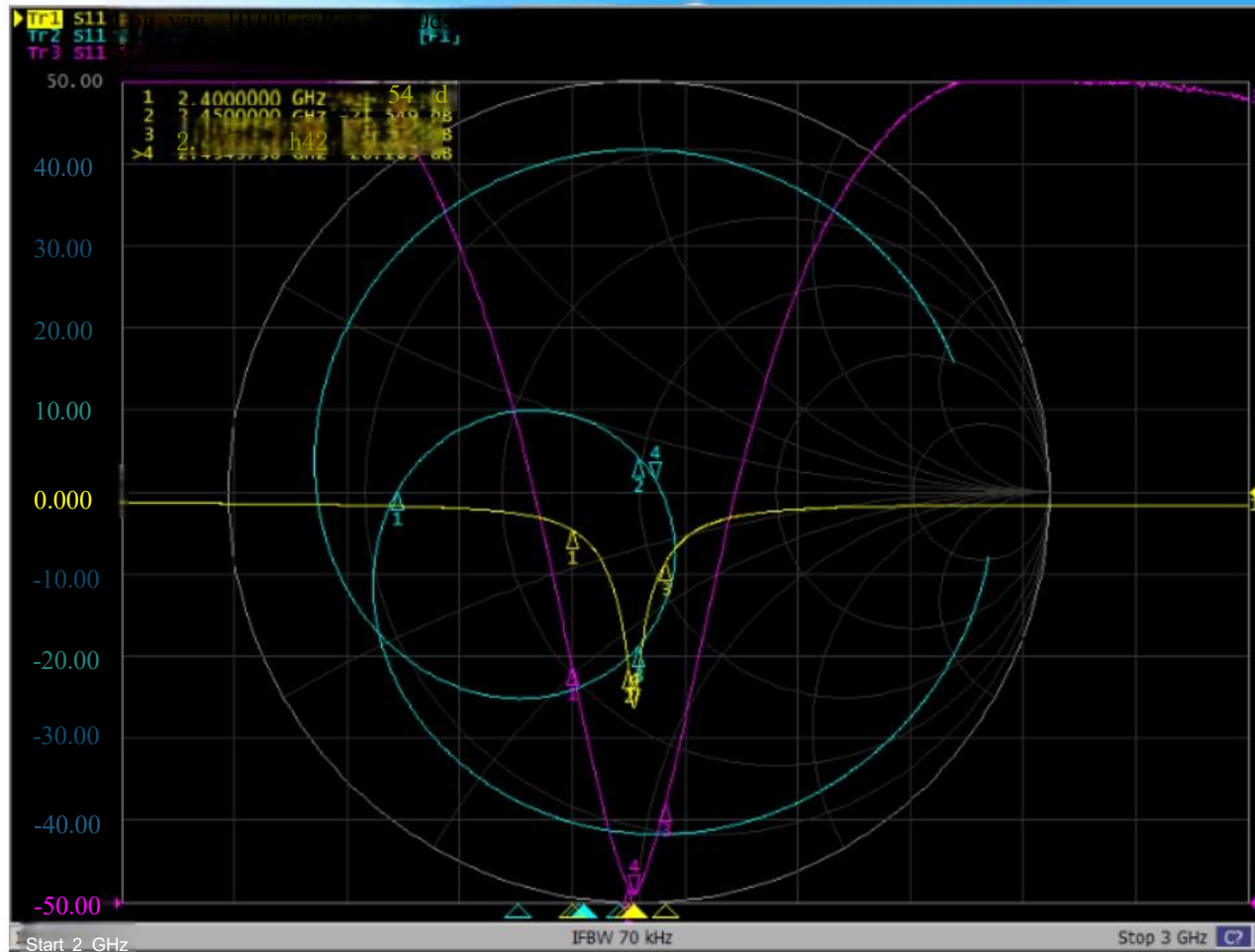


Matching Circuit



	LC	P/N
Ant.	KBAN3216D245H06	
1	1.5PF	Murata
2	OR	Murata
3	NC	--

Ant.S11 Parameter



Fre. (MHz)	2400	2450	2483
S11(dB)	-4.5	-21.5	-8.4

Real test

• Test environment : empty parking lot

• Test Cell Phone: Redmi K30

Test distance: Outdoor test distance 13 meters (music distance)



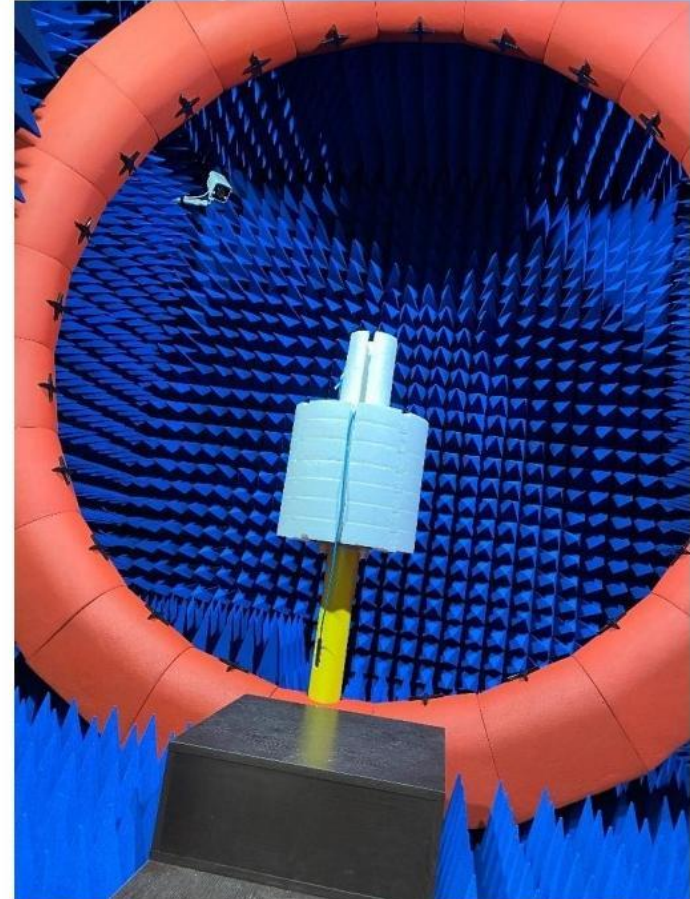
Equipment of OTA test



Network Analyzer **E5071C**



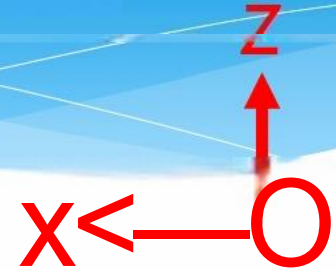
Comprehensive Tester **CMW500**



Microwave darkroom FTM-24D Multi-probe

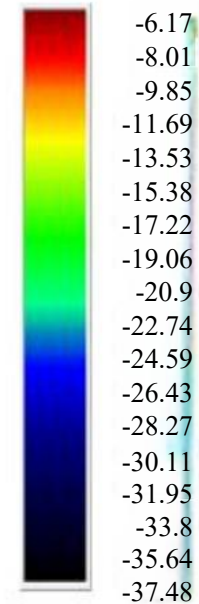
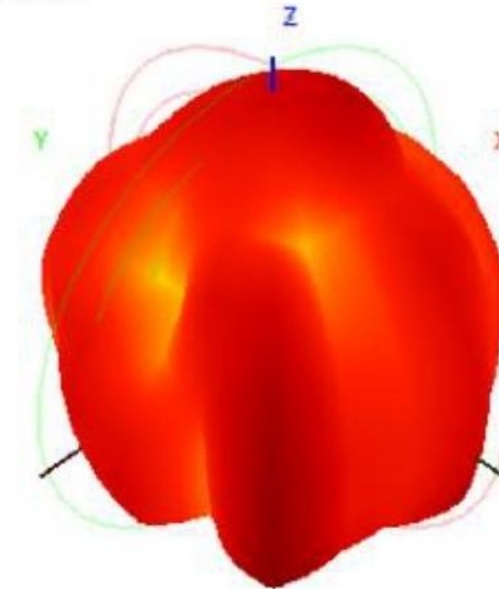
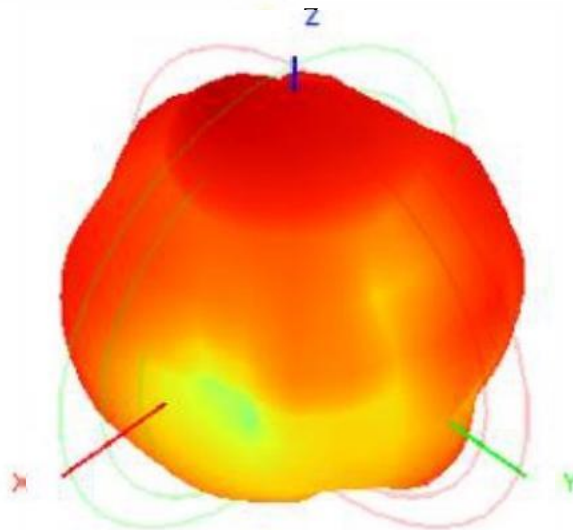
Ant.Gain Pattern @2.45GHz

Active Test(Free Space)



2450.0MHz H+V, Eff: 6.8%

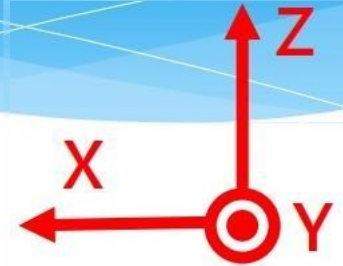
Back View



Frequency (MHz)	2400.0	2410.0	2420.0	2430.0	2440.0	2450.0	2460.0	2470.0	2480.0	2490.0	2500.0
Efficiency (dBi)	-13.88	-13.14	-12.56	-12.05	-11.76	-11.69	-11.95	-12.51	-13.28	-14.05	-15.03
Gain (dBi)	-8.63	-7.84	-7.16	-6.52	-6.13	-6.17	-6.39	-6.86	-7.57	-8.28	-9.21
Efficiency (%)	4.09	4.85	5.54	6.23	6.67	6.78	6.38	5.61	4.70	3.93	3.14

Ant GainPattern@2.45GHz (Active)

. Active Test(Free Space)



	CH.	TIS (dBm)	TRP (dBm)
BT	0	-80.58	-9.86
	39	-81.69	-6.40
	78	-80.14	-8.17