

Shenzhen HamyWe Technology Co., Ltd.

A3512 Edition
V1

Testing Report

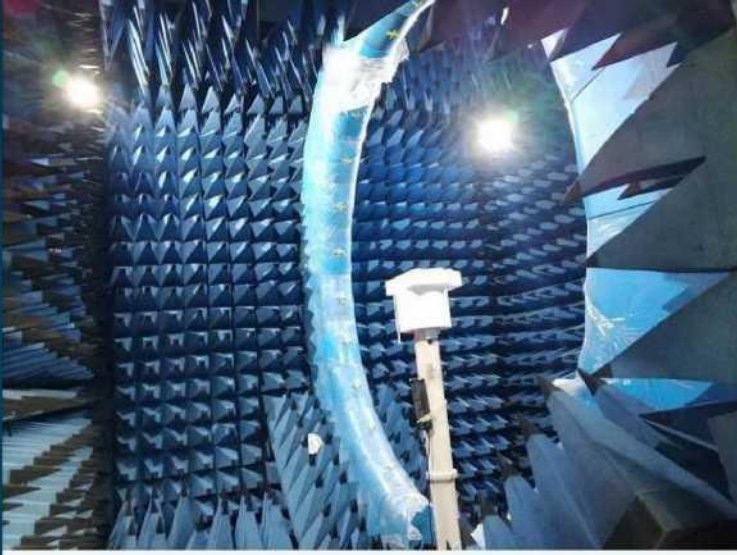
Principal: Zhang-lin CAI
Phone:18718796107
Date: 2022/6/20

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Tester Machine

SG24



GTS



Agilent 8960



CMW 500



Agilent E5071B

Test system

SG24

GTS

Testing environment

Temperature: $22^{\circ}\text{C} \pm 3^{\circ}\text{C}$
Humidity: $50\% \pm 15\%$

Active test

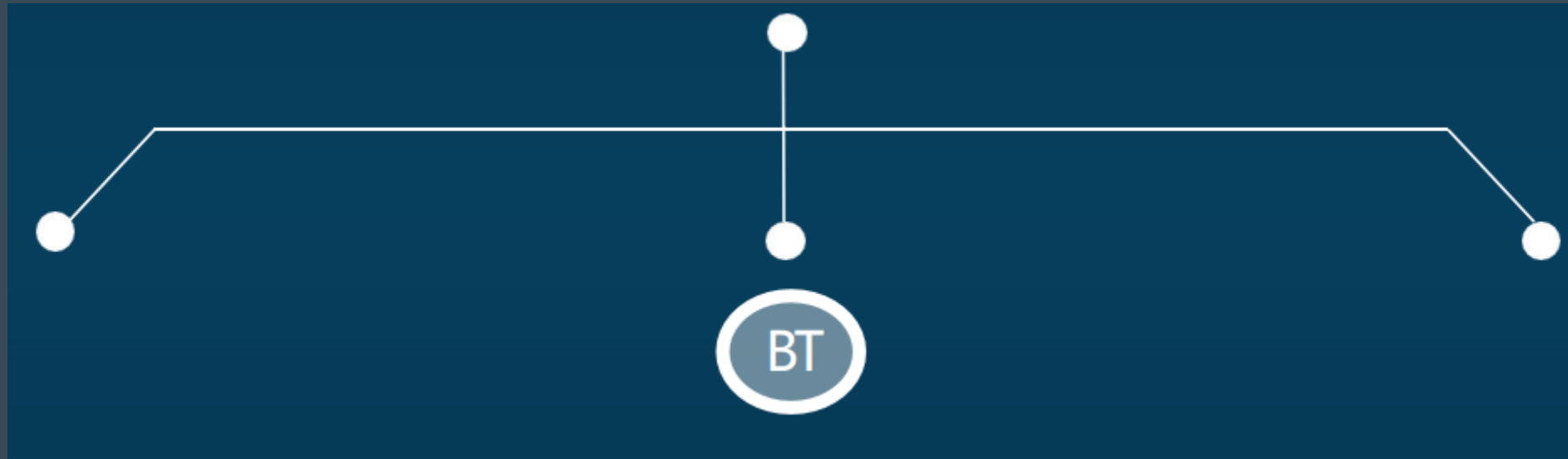
Support 2G/3G/4G
Support BT/WIFI/GPS

Active test

600MHZ—6G

Item Description

A3512



Machine type: Earphone

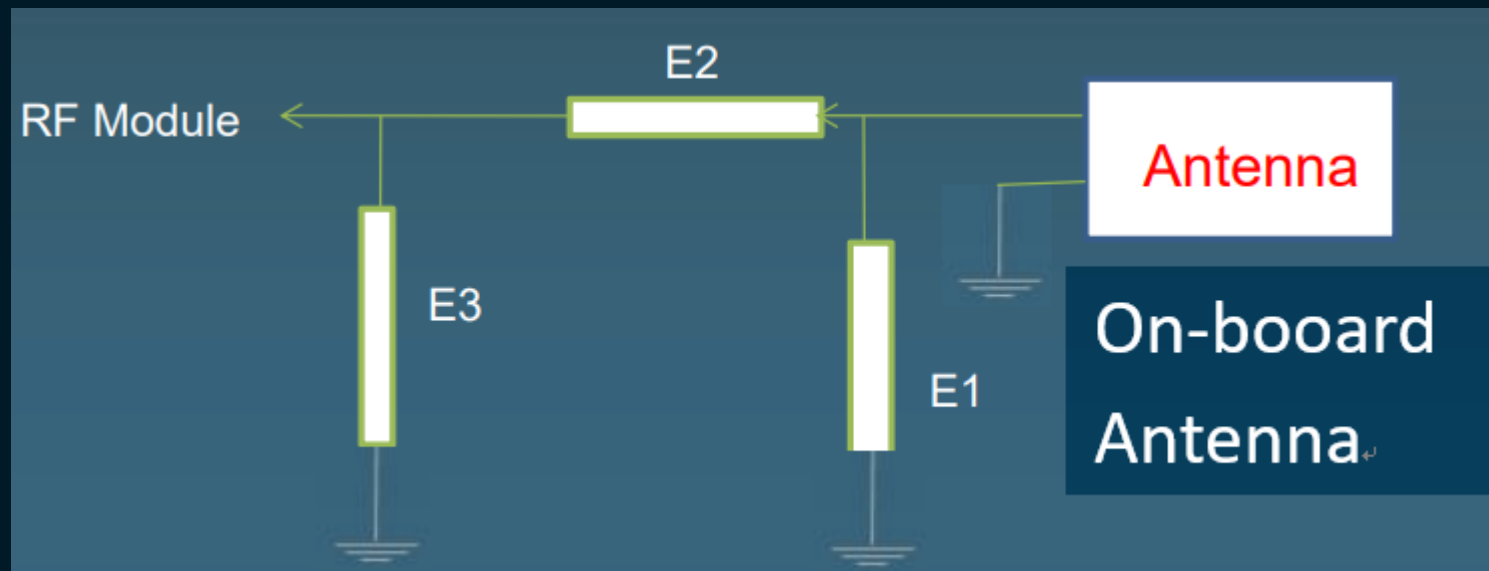
Antenna mode: Onboard

Program

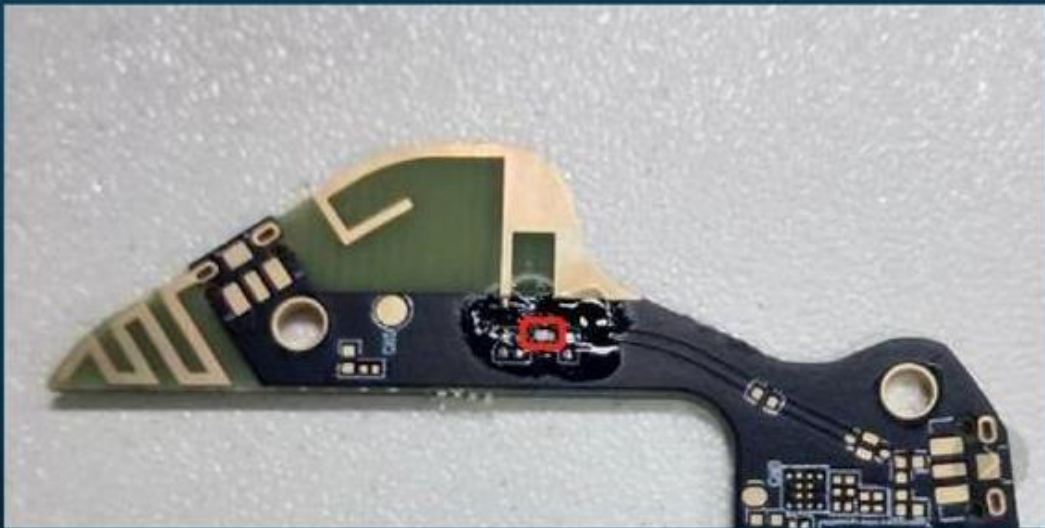
Test version Record

[illegible]

Match Circui



Antenna	
Element	Value-A
E1 (0402)	NC
E2 (0402)	1NH
E3 (0402)	NC

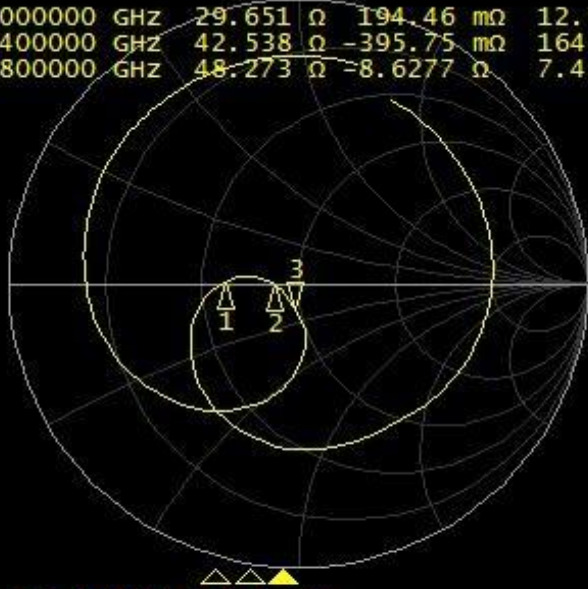


The photograph shows the physical implementation of the matching circuit on a printed circuit board (PCB). The PCB is dark green with gold-colored conductive traces. A small, curved, gold-colored antenna element is visible on the left. A small, rectangular, yellow component (E2) is mounted in the center, connected to the ground plane by two vertical gold traces (E3 and E1). The PCB is mounted on a white surface.

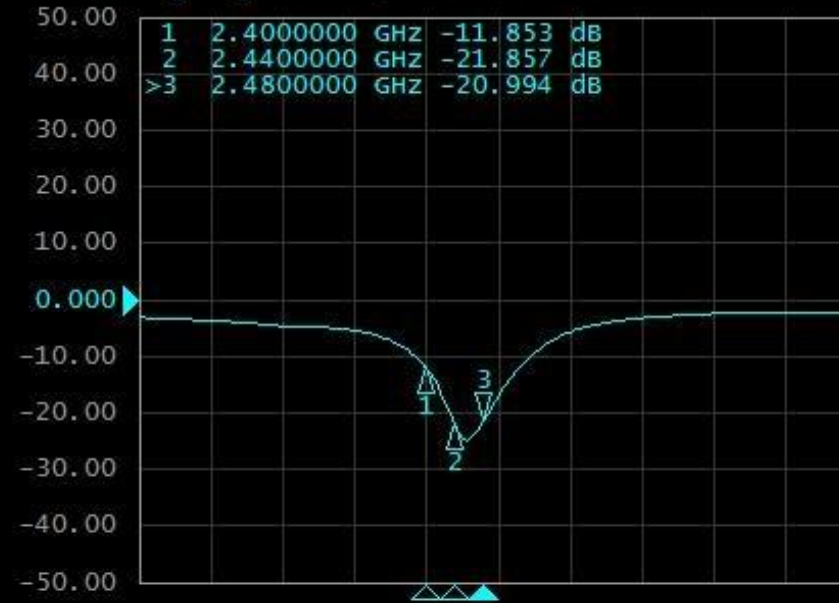
S11 Test Data

Tr1 S11 Smith (R+jX) Scale 1.000U

1	2.4000000	GHz	29.651	Ω	194.46	m Ω	12.896	pH
2	2.4400000	GHz	42.538	Ω	-395.75	m Ω	164.82	pF
>3	2.4800000	GHz	48.273	Ω	-8.6277	Ω	7.4383	pF

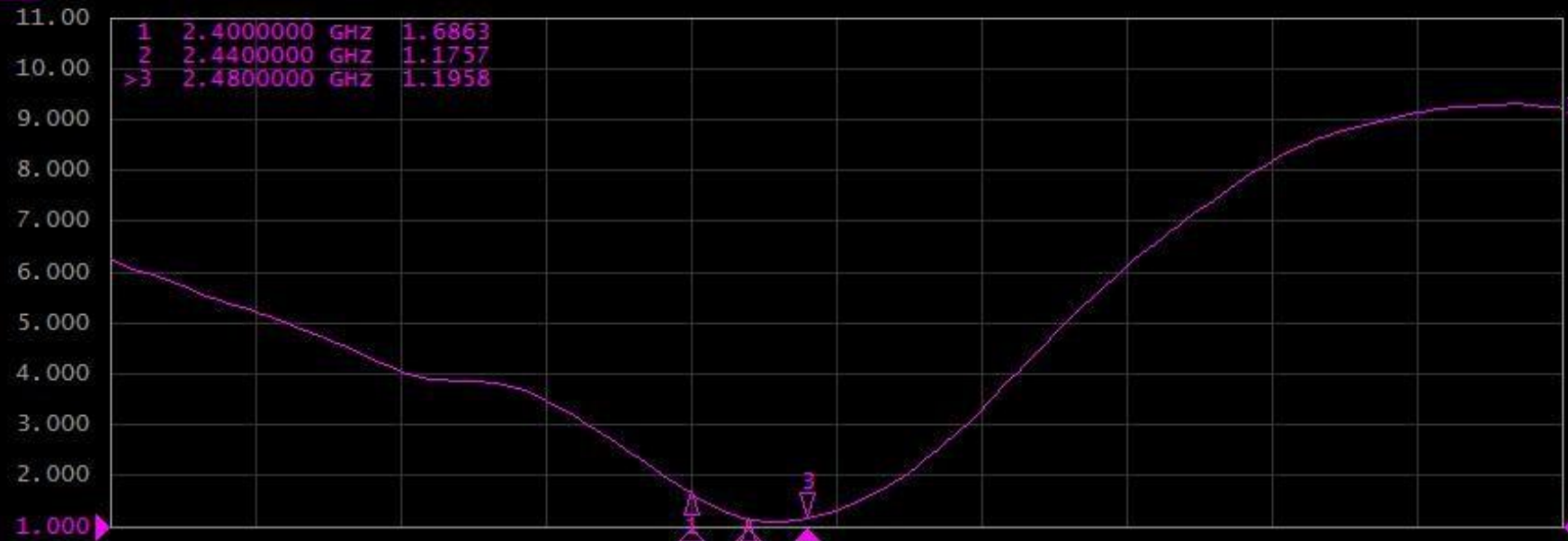


Tr2 S11 Log Mag 10.00dB/ Ref 0.000dB



Tr3 S11 SWR 1.000/ Ref 1.000

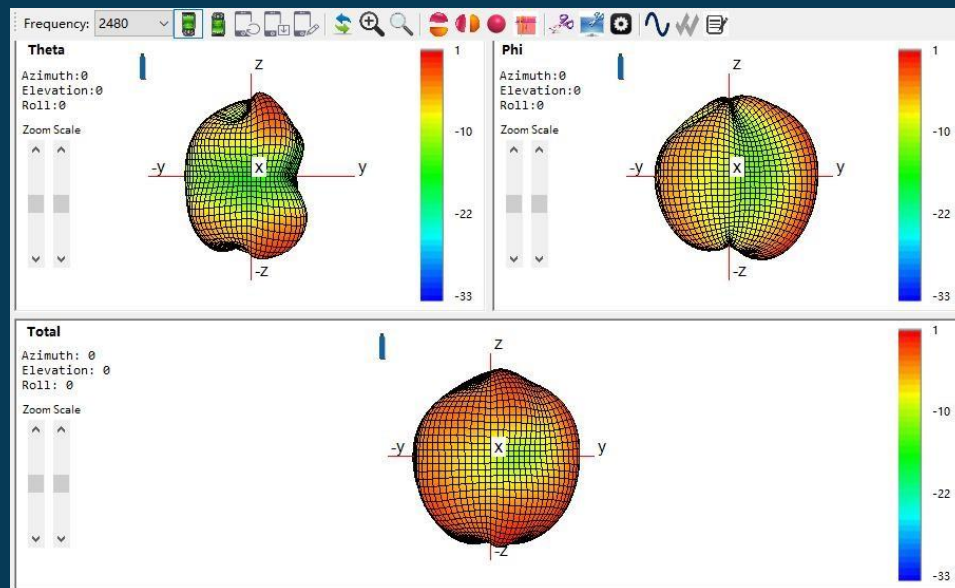
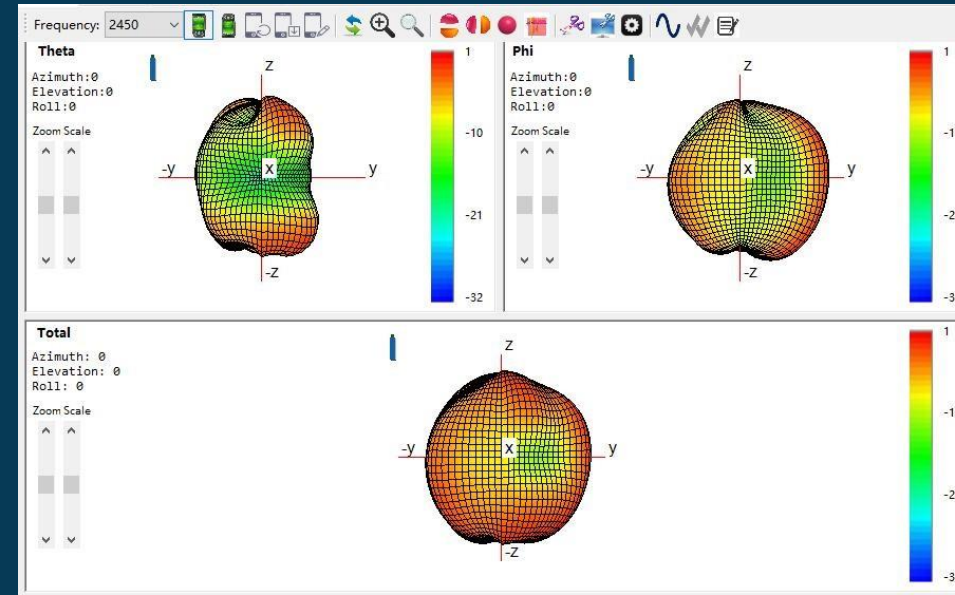
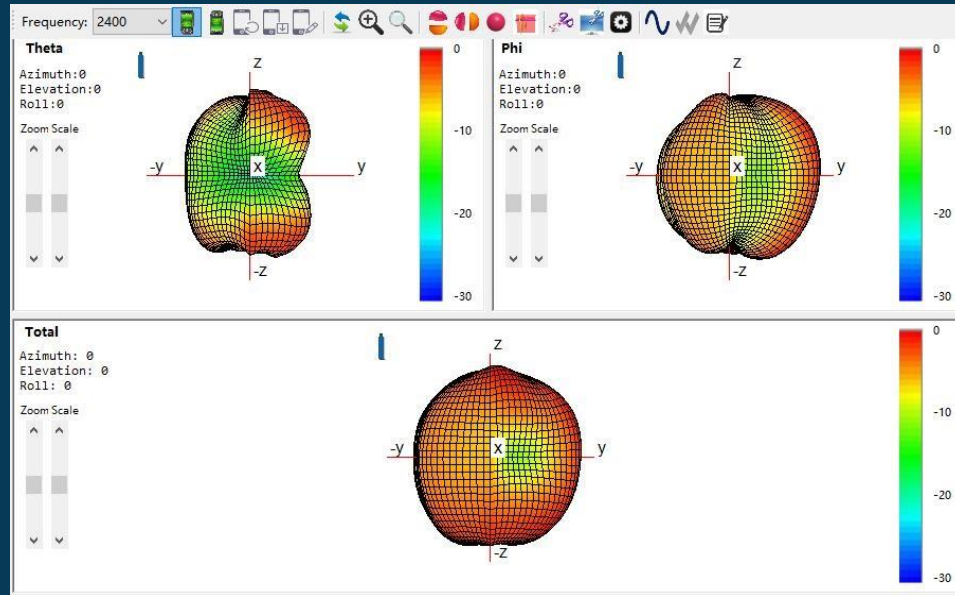
1	2.4000000	GHz	1.6863
2	2.4400000	GHz	1.1757
>3	2.4800000	GHz	1.1958



GAIN & Efficiency Data

Frequency (MHz)	Gain (dB)	Efficiency (%)
2400	-0.02	45.9
2402	-0.42	44.33
2410	-0.17	43.37
2420	0.1	42.25
2430	-0.13	26
2440	0.21	42.89
2450	0.27	42.6
2460	0.02	42.22
2470	0.58	44.13
2480	0.42	44.88

3D Radiation pattern



Antenna Size & Lenght

Antenna Size: 8.9*17.4mm

