

# shenzhenTian Wei xun Wireless technology co., ltd.

#### Product performance and specification

MATERIAL NO:	NO:TWX-137-002				
CUSTOMER NAME:	Myzi	Intelligence Co., Ltd.			
PRODUCT NAME:	M25	BOARD MODEL: CW031-03			

Client	Admit manufacturing party			
Customers confirmation	Quality department R&D Approval			
		ME:		
		RF:		
Date:	Wednesday, 21 December, 2022			

# Shenzhen Tianweixun Wireless Technology Co.,Ltd.

Address: 4th Floor, Building A1, Rixin Technology Park, No.528 Huarong Road, Dalang Street, Longhua New District, Shenzhen.

 $\texttt{Tel: 86-755-29361726} \ / \texttt{85268343} \ \texttt{Fax: 86-755-23732325}$ 

#### ${\bf Confidentiality} \ {\bf Requirement}$

#### Product Name: BT Antenna

# Shenzhen Tianweixun Wireless Technology Co.,Ltd.

Formulation	Wang Yaojie	Product	Version	Aı
Issuing Department	R&D Center	Specifications	Issue Date	2022-12-21

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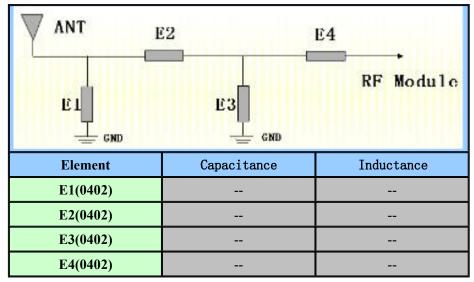
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### 1.1 Project Diagram



**M25** 

#### 1.1.1 Antenna Matching Diagram



Matchinginstruction: Matching according to the original motherboard matching, no changes

### 2. 1 Purpose

To regulate the specifications and test methods of mobile communication terminal ante nna products produced by Shenzhen Tian wei xun WirelessTechnology Co., Ltd.To avoid the error caused by the different test conditions and methods.

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#### Product Name: BT Antenna

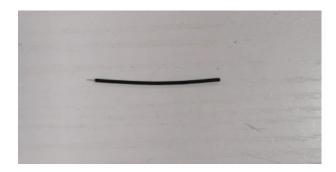
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#### 3. 1 Antenna

#### 3.1.1 Antenna Electrical Specifications and Material

This report mainly provides the test status of the structural performance parameters of  $\frac{M25}{2}$  antenna



The physical view of the antenna designed by Tianweixun

#### 3.1.2 Antenna Form:

Realization Type: PIFA antenna Antenna Material: BlueTooth Antenna

#### 3.1.3 Antenna Design Operating Frequency Band:

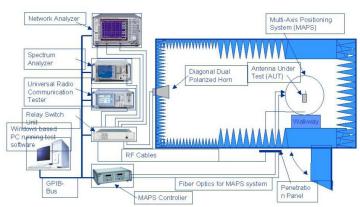
Antenna operating frequency band in <u>2402MHz~2480MHz</u>

#### Product Name: BT Antenna

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#### 3.1.4 Main Antenna Measurement Data in ETS-SG24SYSTEM 3D Test System



Picture (1) ETS Test System



Picture ( 2 ) Cell phone 3D positioning device in dark room

The following table shows the passive performance indicators of Tianweixun design:

Frequency (MHz)	Gain (dBi)	Efficiency (%)
2400	-1.79	13.9
2410	-1.63	14.5
2420	-1.46	14.9
2430	-1.27	15.4
2440	-0.95	16.2
2450	-0.21	17.4
2460	-0.42	16.3
2470	-0.76	15.3
2480	-0.81	14.8
2490	-0.96	14.2
2500	-1.15	13.5

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 $3.1.5\,\mathrm{Data}$  measured by the main antenna in the network analyzer (antenna passive standing wave and return loss)





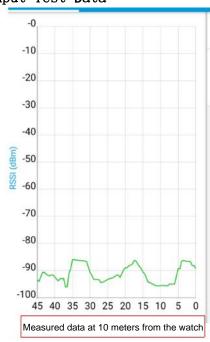


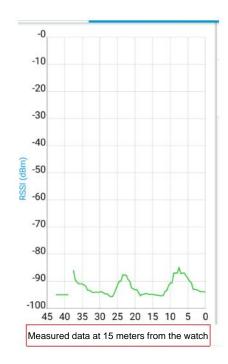
(SWR)

(Return loss)

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#### 3.1.6 Throughput Test Data





### 4.1 Assembly method



## 5.1 Product Design Diagram

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