



Caper Shopping cart

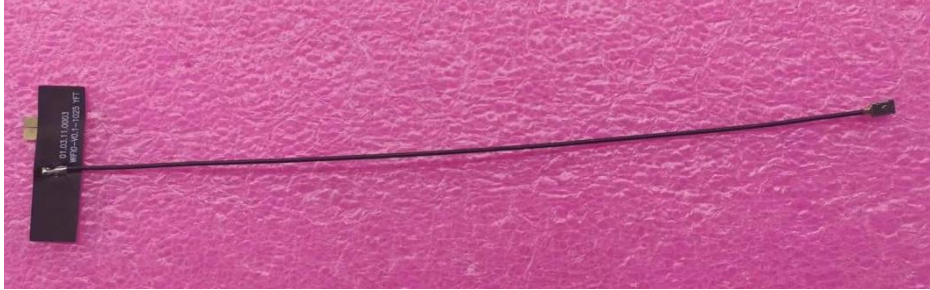
WIFI0/BT antenna specification

Project name:	Shopping cart II		Freq:	2400-2500MHz;5200-5850Mhz	
Internal material number:	Y07100203KA		Version number:	A.0	
Data:	2023/02/15				
Futen technology （Shanghai）CO.,LTD					
Audit	RF	Frank wu	Design	RF	Frank wu
	ME	Xiaofang wu		ME	Xiaofang wu
	quality	Shengbin wang			
	Sales	Qiao wang			
Data:	2023-02-15				
confirm	RF				
	ME				
remarks					

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1. Project picture



Ant picture

2. Antenna specifications

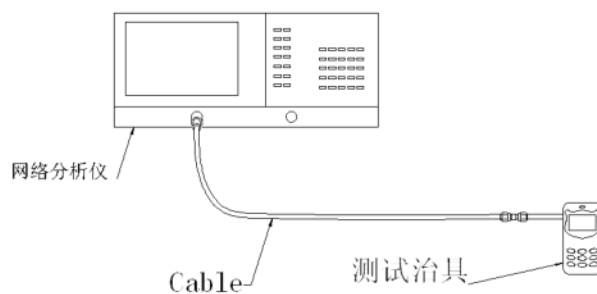
Antenna Type	Antenna structure	Antenna mounting	wire diameter and color	Total length (mm)	Connector type
WIFI0/BT Ant	FPC+Cable+Connector	The antenna is attached to the housing	Φ1.13 black	208	Ipex1 terminal with buckle

3. Matching the circuit

NO Matching

4. S11 test

4.0 S11Test method



测试示意图

4.1 S11 Parameters

Freq (MHZ)	2400	2500	5200	5880
VSWR	1.30	1.20	1.49	1.27
RL	-17.6	-20.6	-14.1	-18.3

4.2 Parameters picture

4.2.1 Return loss



4.2.2 V.S.W.R



5. Darkroom test data

5.0 Testing Devices

Test equipment

Test system: shielded darkroom

Test environment: Temperature $22^{\circ}\text{C} \pm 3^{\circ}\text{C}$, humidity $50\% \pm 15\%$

Test equipment: When testing passive data, use network analyzer

Agilent E5071C

5.1 Active Data

There is no

5.2 Passive Data

Gain&Efficiency 增益和效率					
frequency 频率 (MHz)	gain 增益 (dBi)	efficiency 效率(%)	frequency 频率(MHz)	gain 增益 (dBi)	efficiency 效率(%)
2400	6.07	51.46	5150	4.48	37.86
2410	6.22	54.59	5200	4.02	39.40
2420	5.97	51.91	5250	3.12	36.50
2430	5.74	48.66	5300	2.88	35.48
2440	5.6	46.23	5350	2.16	30.10
2450	5.31	44.56	5400	1.88	25.75
2460	5.03	44.40	5450	2.07	30.57
2470	5.3	48.84	5500	0.83	26.66
2480	4.96	46.15	5550	2.1	31.36
2490	4.75	45.83	5600	2.95	32.18
2500	4.65	46.49	5650	3.04	34.52
			5700	2.06	32.06
			5750	1.9	34.75
			5800	1.74	37.07
			5850	1.78	37.21
			5900	2.02	35.14

6.Ground the prototype

No processing

7. Antenna surface

