

Shenzhen Yishengbang Technology Co., LTD

The Holy bond Electronics Co., Ltd.  
Antenna Test Report

Customer: NaSida

Project: NI20151

Product: WIFI+BT Antenna—FPC

Report date: 2022-11-25

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Checked by : Eason Huang

Approved by :

# ***Purpose***

This report is to measure the performance of SLK for Master Antenna on NaSida. All measure data are showed below.

## ***Content***

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2.1 WIFI Antenna VSWR

2.2 WIFI active test

2.3 WIFI Antenna Gain/Efficiency/3D DATE

3. Drawing of dimensions

4. Environmental treatment

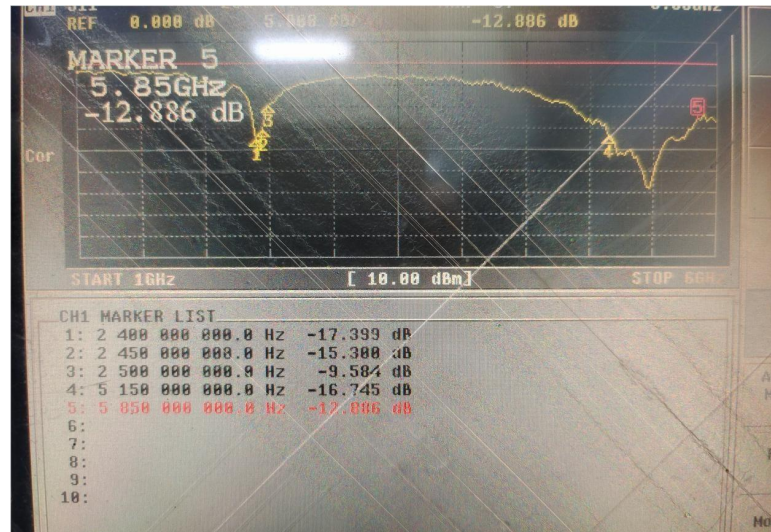
5. Conclusions

# 1. Product Overview & Dimension



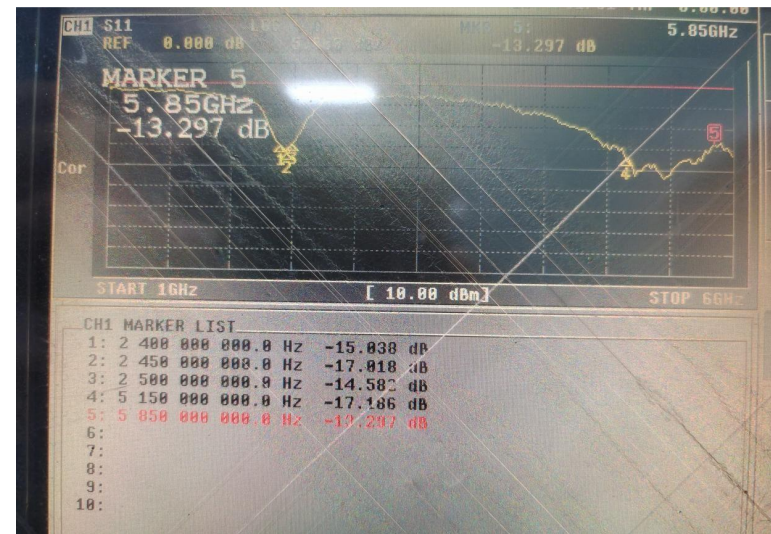
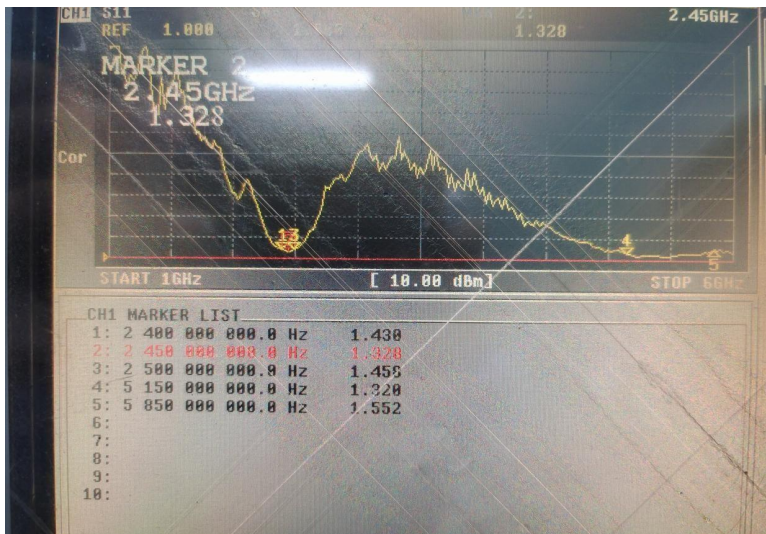
## 2. Test Result

### 2.1 WIFI MAIN Antenna VSWR/S11



## 2. Test Result

### 2.1 WIFI AUX Antenna VSWR/S11



## 2. Test Result

### 2.2 WIFI active test

WIFI Active testing			
spectrum	1	6	11
B-TRP-11Mbps	16.12	16.02	16.13
B-TIS-11Mbps	-79.5	-79.5	-78.28
G-TRP-54Mbps	16.14	15.85	15.58
G-TIS-54Mbps	-66.81	-67.02	-66.72
N-TRP-MCS7	16.08	15.62	15.15
N-TIS-MCS7	-64.14	-64.9	-64.73
spectrum	36	149	165
A-TRP-54Mbps	13.17	12.71	12.87
A-TIS-54Mbps	-65.85	-69.13	-71.16

## 2. Test Result

### 2.3 WIFI Antenna Gain/Efficiency/3D DATE

#### WIFI main antenna

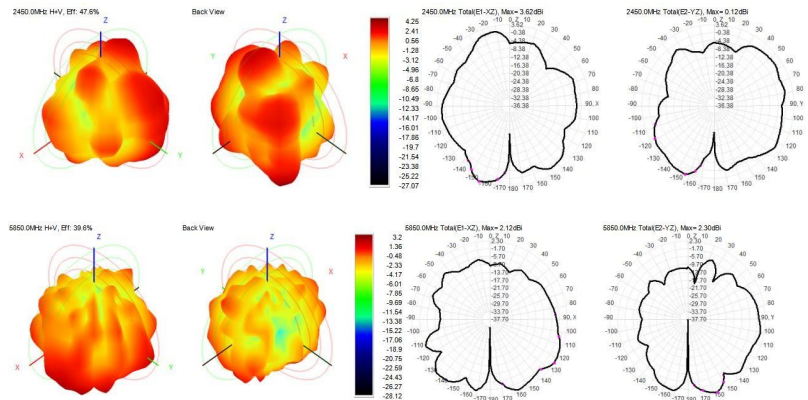
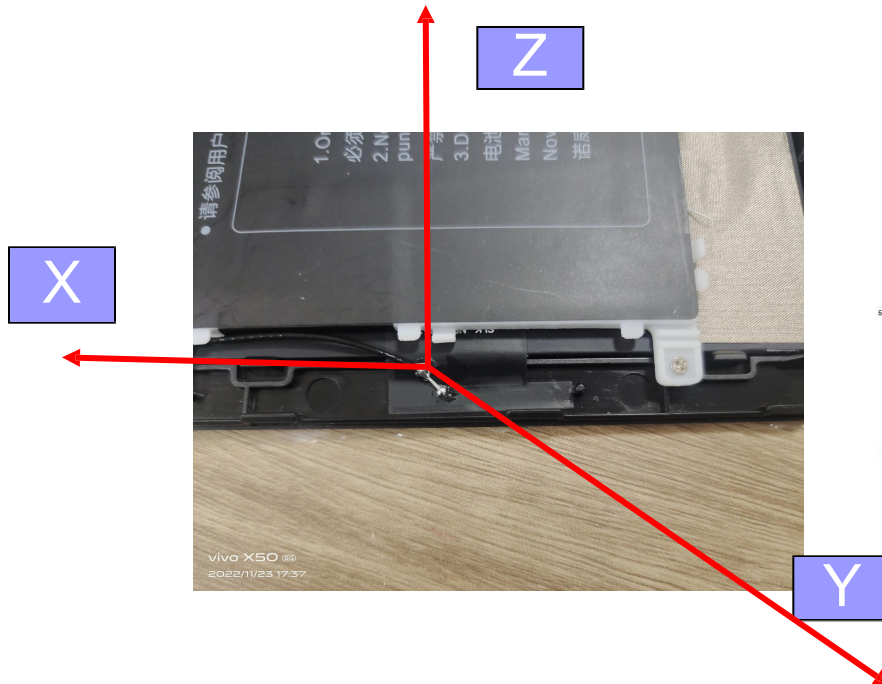
Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)
2400.0	-3.67	3.23	42.94
2410.0	-3.44	3.69	45.32
2420.0	-3.32	3.96	46.51
2430.0	-3.30	4.00	46.73
2440.0	-3.31	4.06	46.68
2450.0	-3.23	4.25	47.57
2460.0	-3.09	4.43	49.14
2470.0	-2.92	4.68	51.08
2480.0	-2.93	4.81	50.95
2490.0	-3.10	4.75	49.01
2500.0	-3.14	4.71	48.50
5150.0	-4.03	3.82	39.51
5300.0	-3.54	3.57	44.22
5550.0	-3.71	3.55	42.59
5750.0	-3.93	3.80	40.50
5850.0	-4.03	3.20	39.57

#### WIFI diversity antenna

Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)
2400.0	-3.53	1.76	44.39
2410.0	-3.47	1.65	44.97
2420.0	-3.50	1.49	44.65
2430.0	-3.63	1.27	43.30
2440.0	-3.79	0.79	41.73
2450.0	-3.82	0.56	41.50
2460.0	-3.81	0.67	41.58
2470.0	-3.80	0.61	41.66
2480.0	-3.95	0.12	40.24
2490.0	-4.28	-0.19	37.28
2500.0	-4.47	-0.26	35.74
5150.0	-3.61	0.04	43.53
5350.0	-3.60	0.35	43.64
5550.0	-3.90	0.36	40.72
5750.0	-4.11	0.38	38.78
5850.0	-4.28	-0.22	37.35

# 2. Test Result

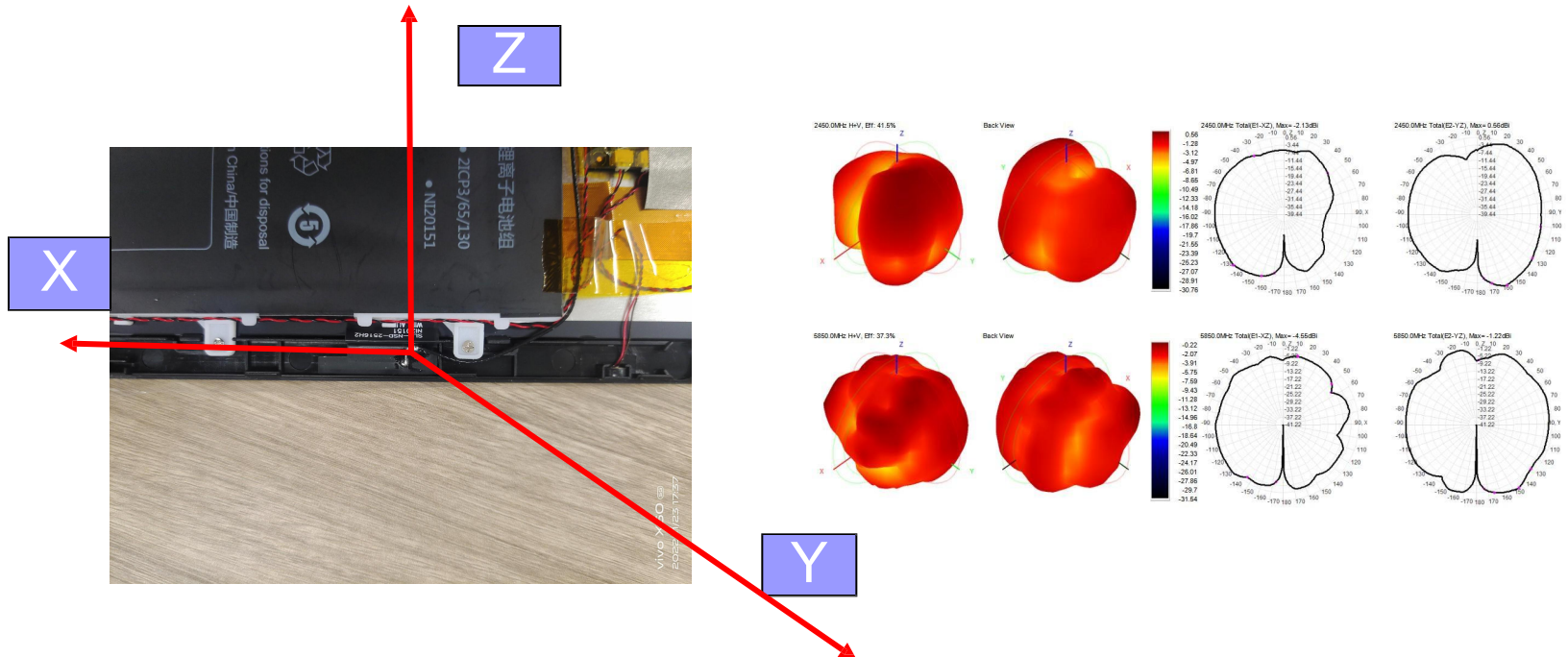
## 2.3 WIFI Antenna Gain/Efficiency/3D DATE



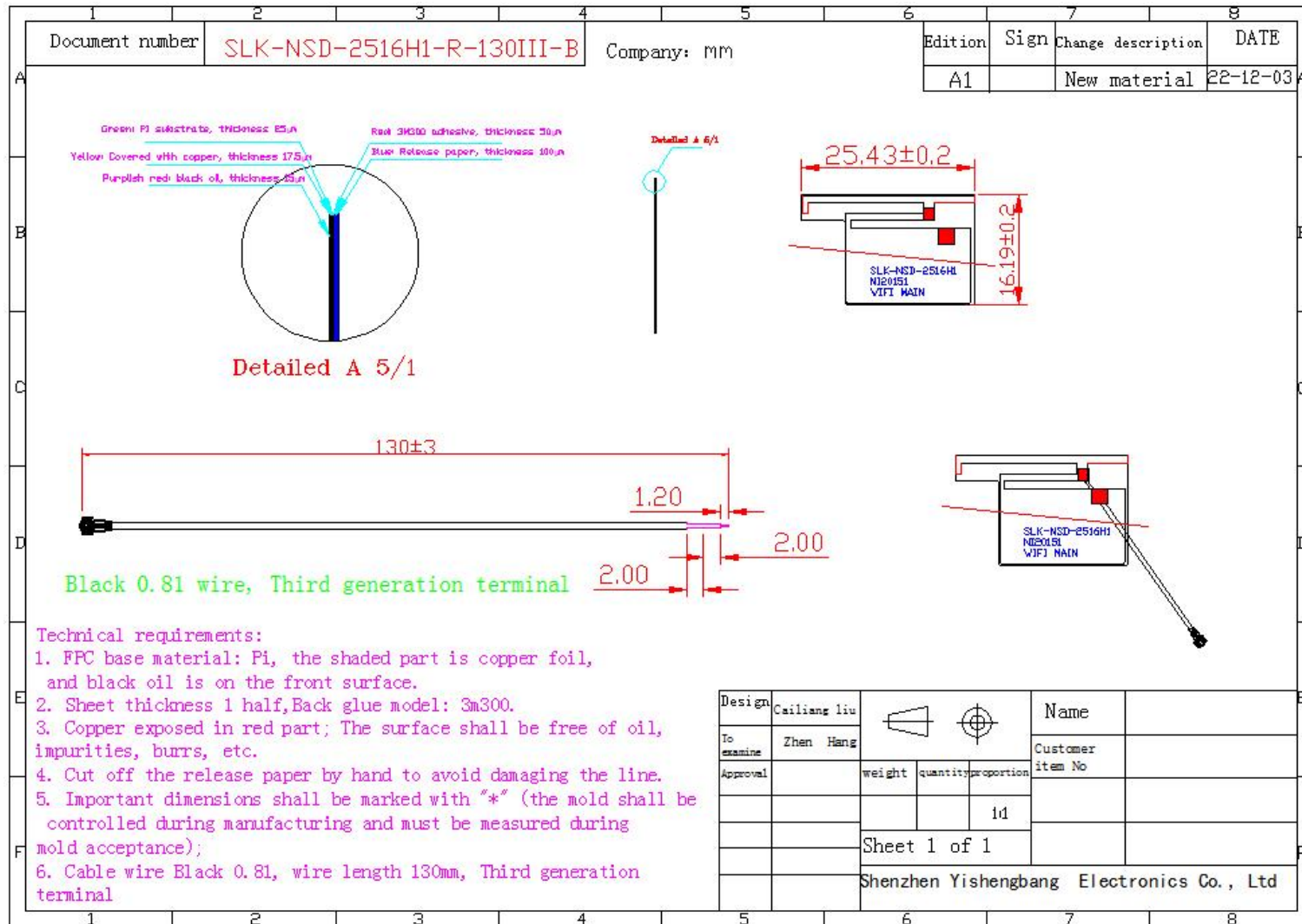


# 2. Test Result

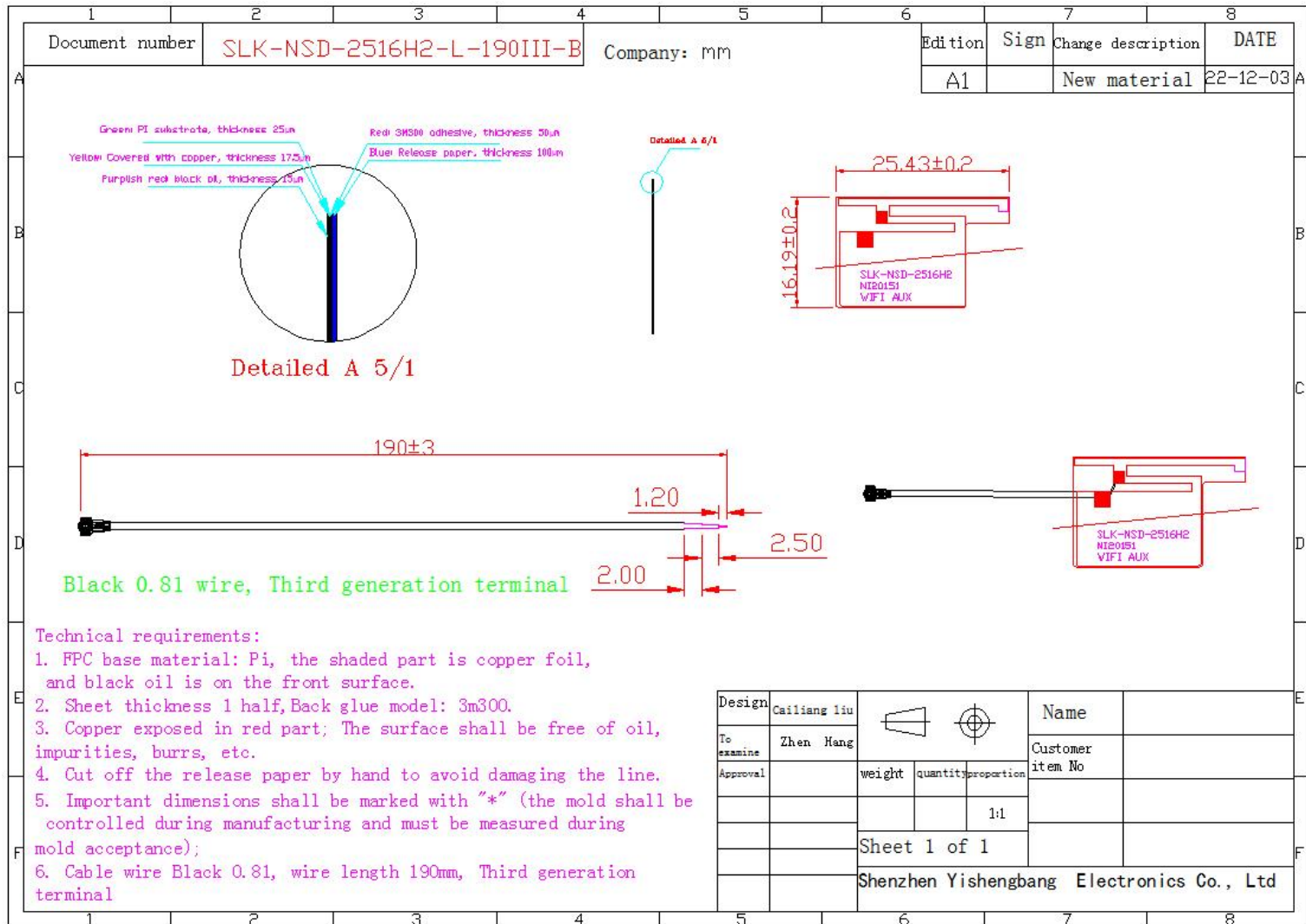
## 2.4 WIFI Antenna Gain/Efficiency/3D DATE



# 3. Drawing of dimensions



# 3. Drawing of dimensions



## 4. Environmental treatment



### Environmental treatment:

1. Attach a conductive sponge to the copper leakage area at the bottom of the motherboard and contact the screen
2. Pull a conductive cloth on the motherboard shield and contact the screen
3. Screen line pull a conductive cloth wrapped shielding processing
4. TP line is wrapped with a conductive cloth for shielding processing



## 5. Conclusions

THANK YOU