



Shenzhen Yishengbang Technology Co., Ltd.

Shenzhen Yishengbang Technology Co., Ltd Antenna Test Report

Customer:DBG

Project:AT100U

Product: xCL_AT-100-U-14,xCL_AT-100-U-18E

Report date: 2026-05-22

Prepared by :Zhao Yousheng

Checked by : Huang Zhen

Approved by : Lin Meicai

2. Test Result

1.1 LTE Antenna TRP/TIS

4G	LTE-L	LTE-R	TIS
LTE-2	15.16	15.31	-88.69
LTE-4	15.82	16.51	-90.03
LTE-5	15.55	16.90	-89.64
LTE-7	14.50	15.81	-89.23
LTE-12	16.58	16.60	-90.31
LTE-13	16.83	16.35	-89.30
LTE-17	15.48	15.87	-88.91
LTE-25	15.25	14.95	-89.06
LTE-26	15.89	16.27	-88.86
LTE-66	16.20	16.28	-90.02
LTE-41	17.16	17.30	-89.88
LTE-71	16.57	16.11	-90.14

1. Test Result

1.2 WIFI Antenna TRP/TIS

WIFI-OTA			
WIFI-2.4G	1	6	11
B-TRP-11MBps	12.11	12.36	12.45
B-TIS-11MBps	-80.33	-80.12	-80.31
G-TRP-54MBps	11.30	12.24	12.61
G-TIS-54MBps	-68.75	-69.33	-69.48
N-TRP-MCS7	11.18	12.20	12.37
N-TIS-MCS7	-66.55	-66.74	-66.30
WIFI-5G	36	149	165
A-TRP-54MBps	10.09	10.20	10.19
A-TIS-54MBps	-69.33	-69.31	-69.54

1. Test Result

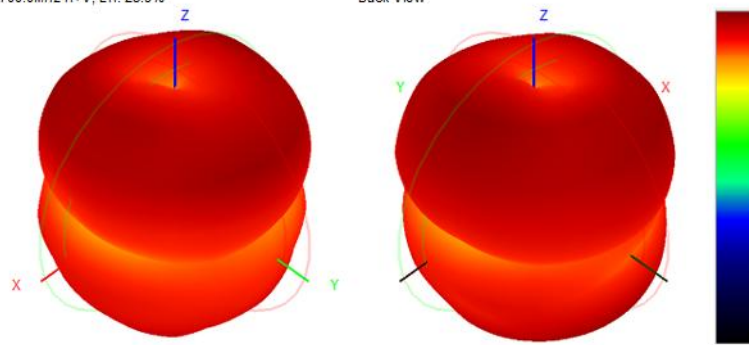
1.3 LTE Antenna Gain/Efficiency/3D DATA

Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)	Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)
700	-5.39	1.09	28.92	1710	-6.58	1.59	21.97
710	-4.94	1.56	32.08	1720	-6.37	1.33	23.06
720	-6.02	1.23	25.00	1730	-6.76	1.60	21.07
730	-5.43	1.14	28.67	1740	-7.01	1.68	19.92
740	-5.26	1.78	29.76	1750	-6.71	1.28	21.31
750	-4.54	1.89	35.13	1760	-6.55	1.04	22.13
760	-5.06	1.07	31.18	1770	-6.58	1.11	22.00
770	-4.03	1.75	39.50	1780	-6.81	1.28	20.83
780	-3.46	1.04	45.11	1790	-6.93	1.32	20.29
790	-3.57	1.02	43.92	1800	-6.83	1.16	20.73
800	-3.08	1.38	49.24	1810	-6.65	1.00	21.65
810	-3.00	1.38	50.09	1820	-6.72	1.22	21.28
820	-2.93	1.54	50.92	1830	-6.92	1.66	20.32
830	-2.44	1.38	57.05	1840	-6.64	1.63	21.69
840	-2.96	1.87	50.61	1850	-6.73	1.89	21.22
850	-3.23	1.64	47.53	1860	-6.05	1.13	24.82
860	-3.07	1.89	49.32	1870	-6.08	1.31	24.66
870	-4.38	1.57	36.50	1880	-6.18	1.57	24.10
880	-4.17	1.18	38.32	1890	-6.70	1.89	21.36
890	-4.57	1.51	34.89	1900	-6.93	1.76	20.28
900	-4.94	1.86	32.05	1910	-6.72	1.81	21.27
910	-5.36	1.31	29.11	1920	-6.52	1.34	22.25
920	-5.65	1.52	27.20	1930	-6.77	1.32	20.99
930	-6.00	1.87	25.10	1940	-6.76	1.57	21.08
940	-5.48	1.36	28.33	1950	-6.57	1.79	22.00
950	-5.49	1.56	28.26	1960	-6.62	1.64	21.76
960	-5.59	1.44	27.62	1970	-6.59	1.40	21.92

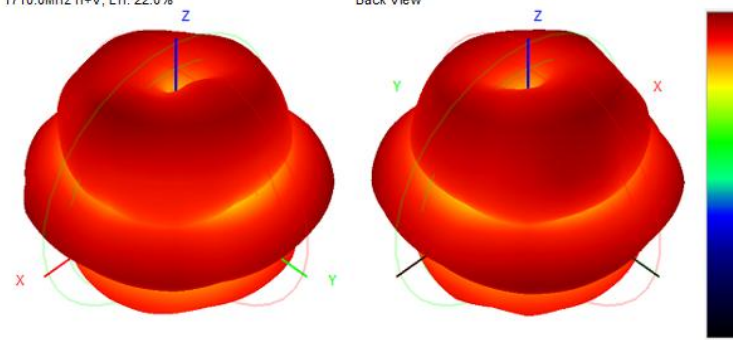
1. Test Result

1.3 LTE Antenna Gain/Efficiency/3D DATA

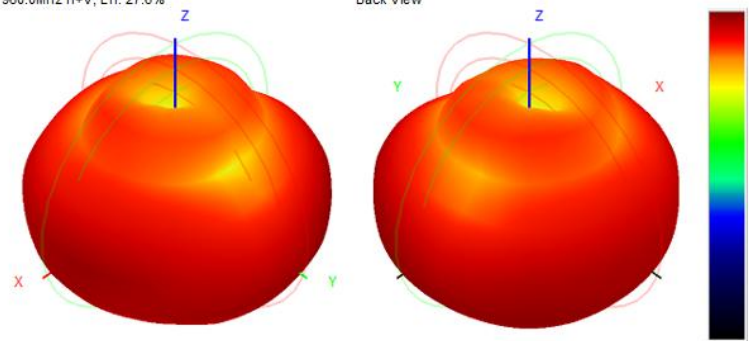
700.0MHz H+V, Eff: 28.9%



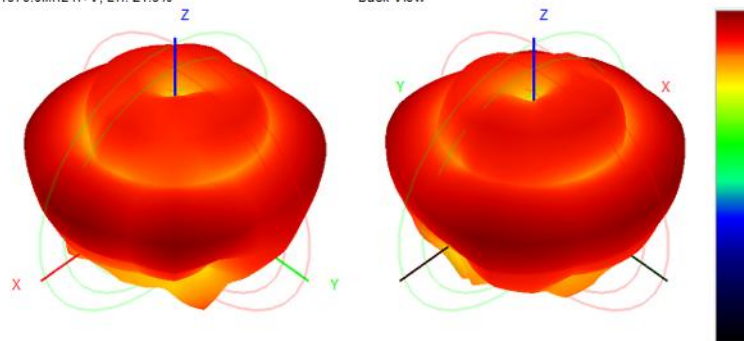
1710.0MHz H+V, Eff: 22.0%



960.0MHz H+V, Eff: 27.6%



1970.0MHz H+V, Eff: 21.9%



1. Test Result

1.3 LTE Antenna Gain/Efficiency/3D DATA

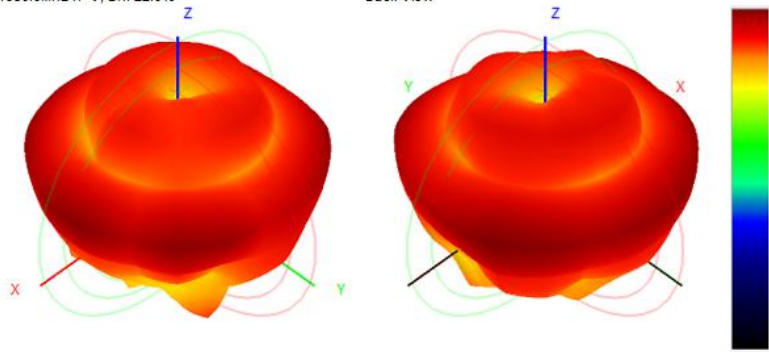
Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)	Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)
1980	-6.57	1.25	22.02	2250	-6.98	1.02	20.00
1990	-6.77	1.52	21.00	2260	-6.84	1.33	20.70
2000	-6.50	1.62	22.38	2270	-6.68	1.08	21.45
2010	-6.91	1.33	20.34	2280	-6.25	1.78	23.66
2020	-6.73	1.95	21.19	2290	-6.41	1.12	22.82
2030	-6.74	1.19	21.15	2300	-6.59	1.21	21.88
2040	-6.61	1.60	21.82	2310	-6.97	1.35	20.07
2050	-6.58	1.62	21.93	2320	-6.59	1.00	21.89
2060	-6.95	1.59	20.17	2330	-6.87	1.53	20.54
2070	-6.74	1.90	21.17	2340	-6.69	1.59	21.42
2080	-6.70	1.94	21.36	2350	-6.60	1.54	21.83
2090	-6.38	1.99	22.98	2360	-6.58	1.96	21.93
2100	-6.37	1.44	23.06	2370	-6.98	1.12	20.03
2110	-6.67	1.29	21.51	2380	-6.45	1.97	22.63
2120	-6.87	1.90	20.55	2390	-6.26	1.58	23.63
2130	-6.86	1.52	20.57	2400	-6.43	1.29	22.74
2140	-6.92	1.69	20.31	2410	-6.33	1.37	23.26
2150	-6.59	1.81	21.92	2420	-6.70	1.98	21.35
2160	-6.94	1.47	20.23	2430	-6.74	1.50	21.15
2170	-6.54	1.30	22.16	2440	-6.59	1.38	21.91
2180	-6.60	1.61	21.84	2450	-6.75	1.53	21.11
2190	-6.85	1.91	20.63	2460	-6.44	1.78	22.69
2200	-6.58	1.02	21.93	2470	-6.91	1.77	20.35
2210	-6.66	1.74	21.56	2480	-6.77	1.25	20.99
2220	-6.80	1.44	20.86	2490	-6.61	1.38	21.81
2230	-6.69	1.48	21.40	2500	-6.36	1.32	23.08
2240	-6.24	1.99	23.76	2510	-6.57	1.13	22.01

1. Test Result

1.3 LTE Antenna Gain/Efficiency/3D DATA

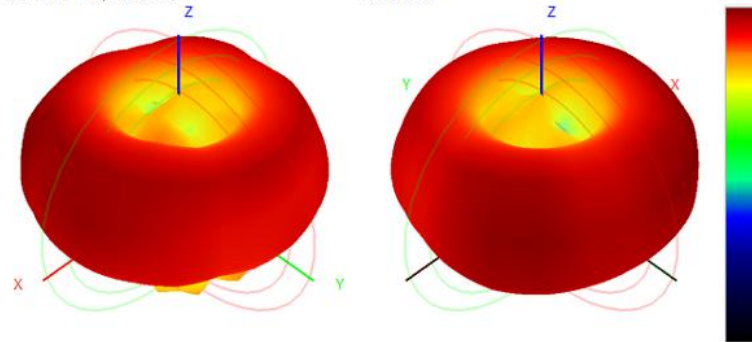
1980.0MHz H+V, Eff: 22.0%

Back View



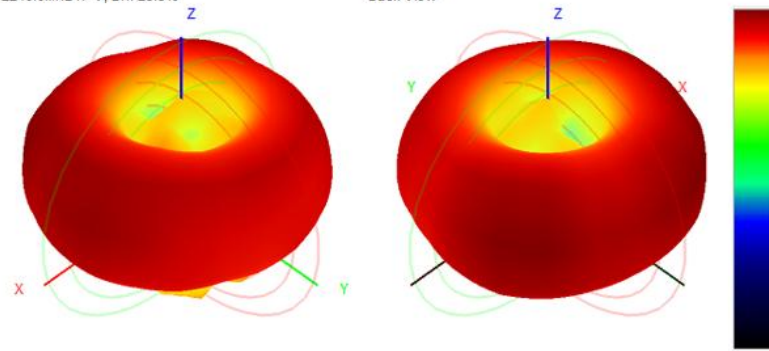
2250.0MHz H+V, Eff: 20.0%

Back View



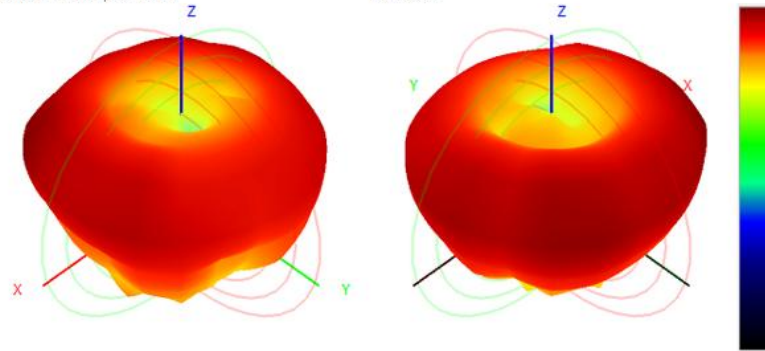
2240.0MHz H+V, Eff: 23.8%

Back View



2510.0MHz H+V, Eff: 22.0%

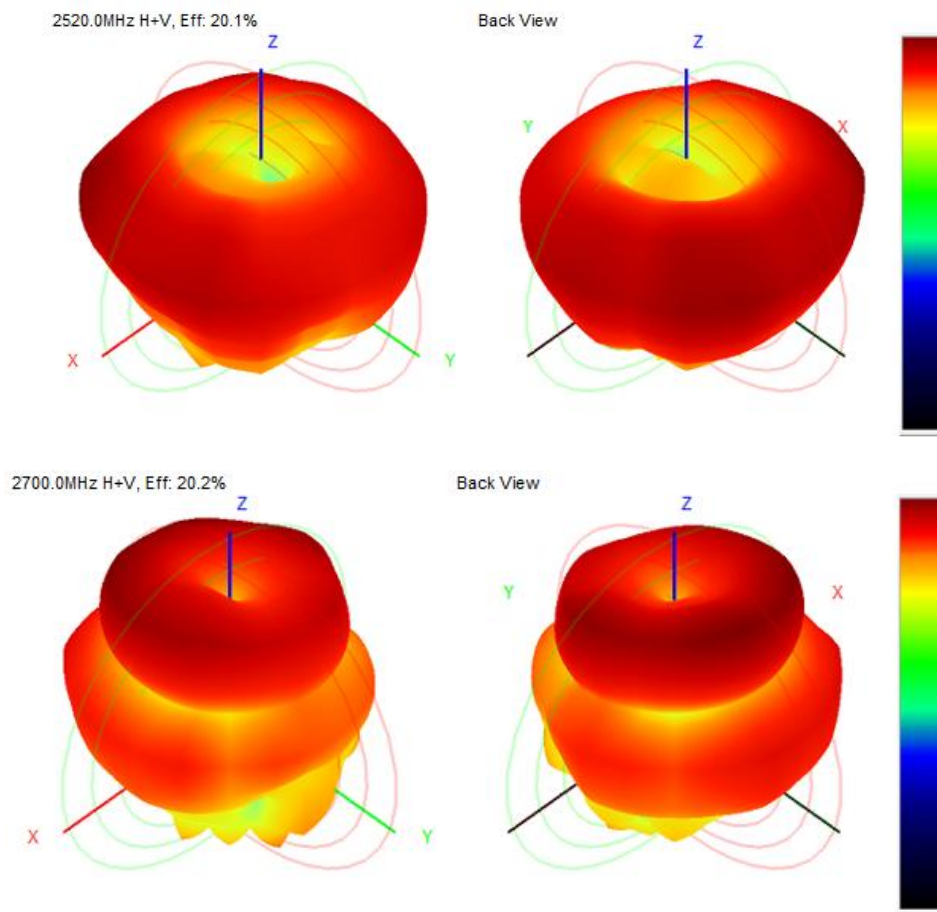
Back View



1. Test Result

1.3 LTE Antenna Gain/Efficiency/3D DATA

Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)
2520	-6.96	1.95	20.12
2530	-6.65	1.21	21.60
2540	-6.71	1.37	21.33
2550	-6.57	1.61	22.02
2560	-6.32	1.67	23.33
2570	-6.66	1.41	21.55
2580	-6.68	1.26	21.43
2590	-6.95	1.29	20.15
2600	-6.61	1.06	21.80
2610	-6.97	1.07	20.07
2620	-6.74	1.18	21.17
2630	-6.67	1.19	21.50
2640	-6.28	1.06	23.53
2650	-6.33	1.21	23.24
2660	-6.39	1.41	22.94
2670	-6.38	1.13	22.97
2680	-6.85	1.56	20.62
2690	-6.97	1.08	20.07
2700	-6.94	1.66	20.20



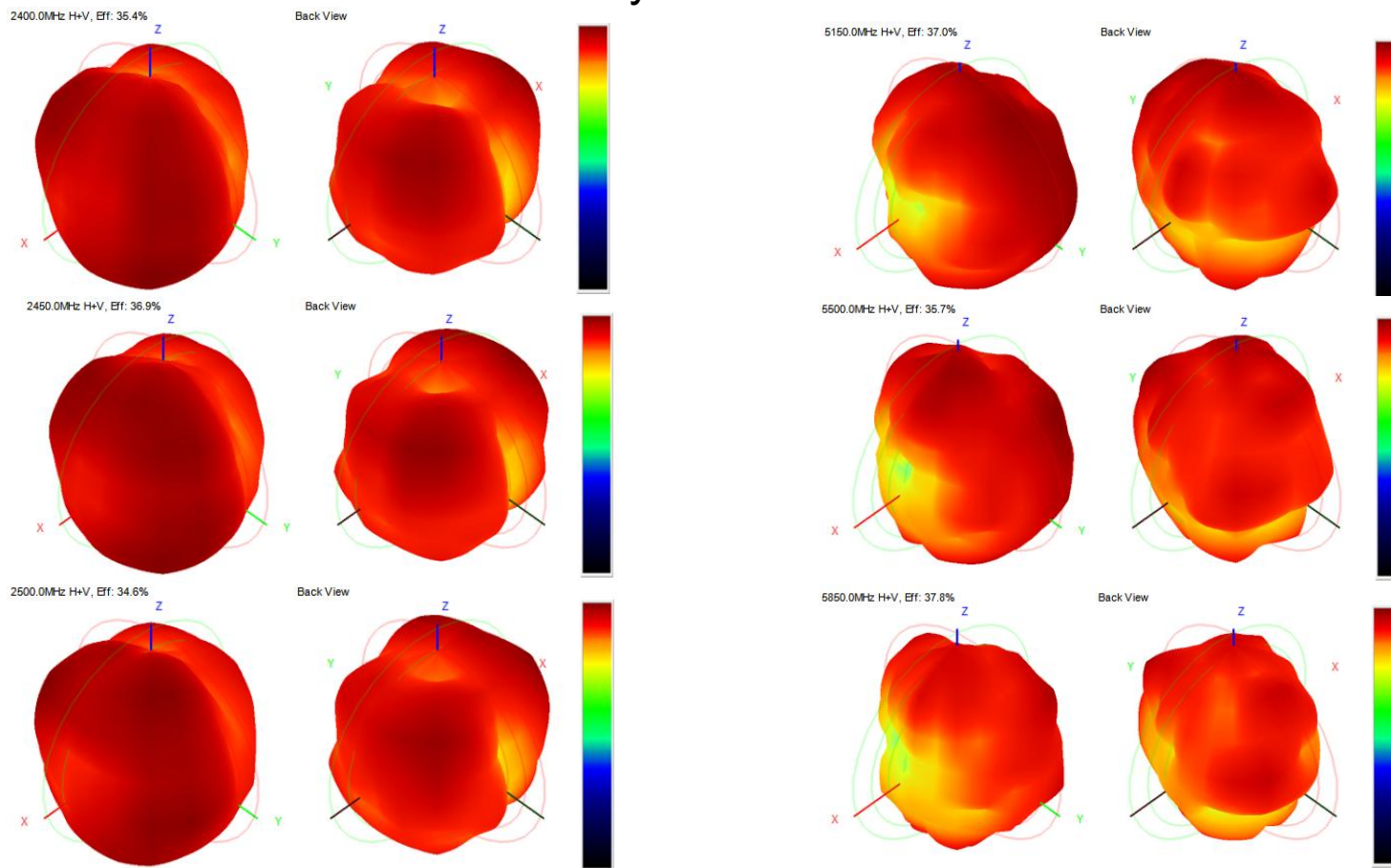
1. Test Result

1.4 WIFI Antenna Gain/Efficiency/3D DATA

Frequency (MHz)	Efficiency (dBi)	Gain (dBi)	Efficiency (%)
2400	-4.51	0.35	35.39
2410	-4.42	0.07	36.12
2420	-4.41	0.22	36.20
2430	-4.25	0.15	37.53
2440	-4.34	0.09	36.75
2450	-4.32	0.34	36.91
2460	-4.28	0.35	37.25
2470	-4.44	0.79	35.95
2480	-4.39	0.39	36.34
2490	-4.48	0.32	35.62
2500	-4.61	0.50	34.58
5150	-4.32	1.75	36.97
5200	-4.29	1.62	37.19
5250	-4.33	1.84	36.84
5300	-4.33	1.77	36.84
5350	-4.37	1.66	36.48
5400	-4.36	1.73	36.61
5450	-4.47	1.82	35.69
5500	-4.47	1.97	35.70
5550	-4.47	1.88	35.70
5600	-4.50	1.81	35.48
5650	-4.28	1.98	37.28
5700	-4.01	1.84	39.66
5750	-4.10	1.80	38.88
5800	-4.24	1.93	37.67
5850	-4.22	1.82	37.82

1. Test Result

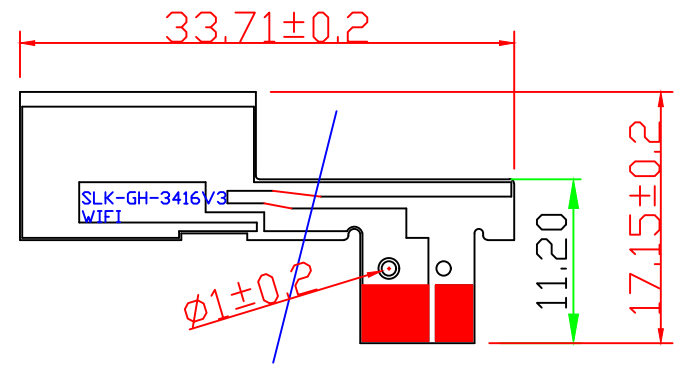
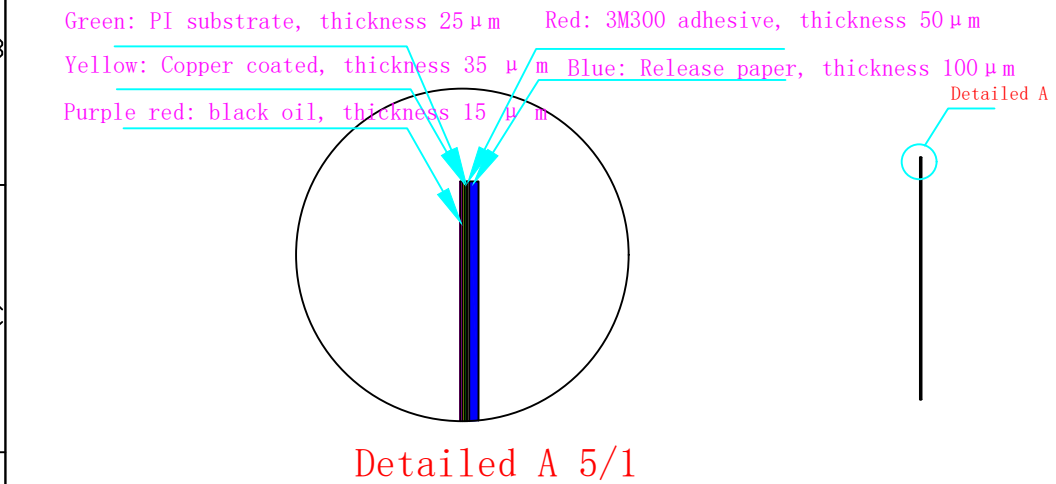
1.4 WIFI Antenna Gain/Efficiency/3D DATA





2. Conclusions

Thank you!



Technical Requirements:

- FPC substrate: PI, with copper foil in the shaded area and black oil on the front surface.
- Adhesive model: 3M300, gold-plated.
- Copper is exposed in the red area; The surface is free of oil stains, impurities, burrs, etc.
- Cut the release paper by hand without damaging the circuit.
- Important dimensions are marked with "*" (mold production must be controlled, mold acceptance must be measured);

Design	Liang Cai Liu				Name	
To examine	Tao Luo				Customer item No	
Approval	Zhen huang	weight	quantity	proportion		
				1:1		
		Sheet 1 of 1				
		Shenzhen Yishengbang Electronics Co., Ltd				