



Shenzhen Tianwei Xun Wireless
Technology Co., Ltd.



Antenna Design and Data Report

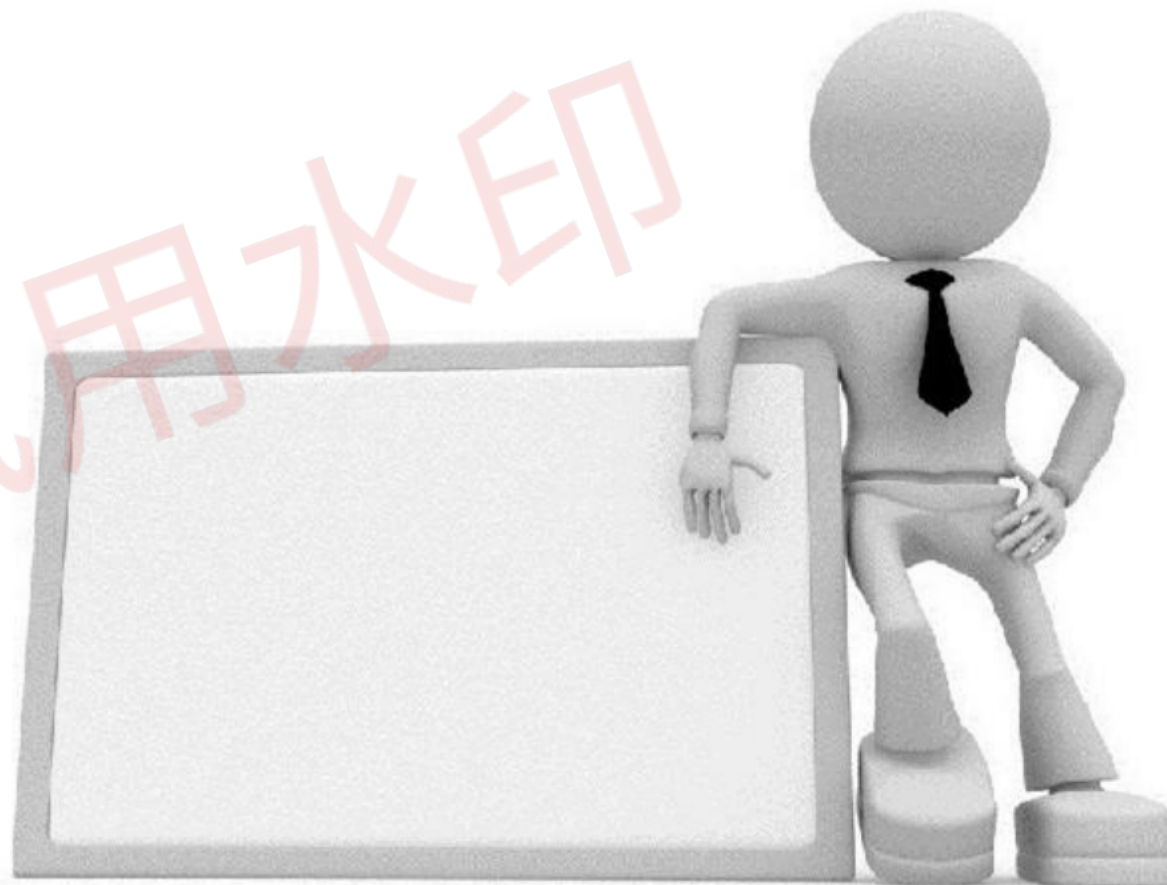
Client Name: Gold East

Project Name: B594

Required Frequency Band:
GPS

Tester: George Qin

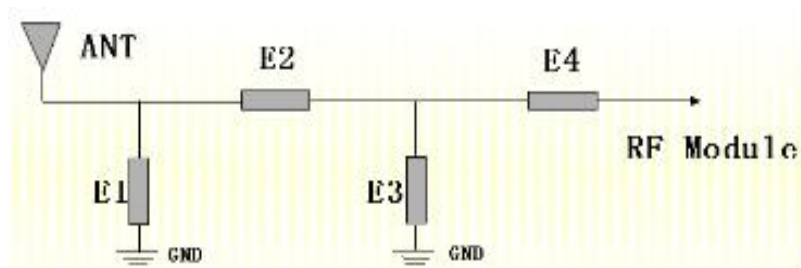
Completion Date: August 1,
2025



Antenna Matching Circuit

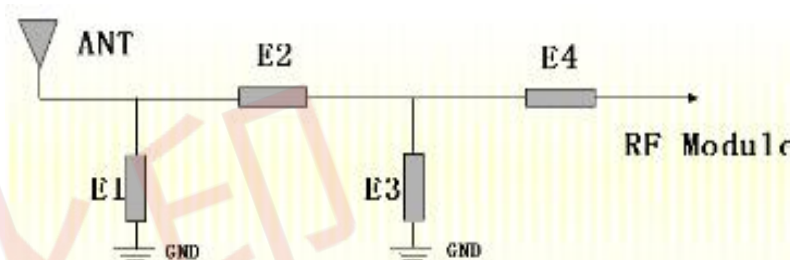


Antenna circuit matching description



Element	Capacitor	Inductor
E1(0201)		20nH
E2(0201)	1.0pF	
E3(0201)		
E4(0201)		

GPS



Element	Capacitor	Inductor
E1(0201)		
E2(0201)		
E3(0201)		
E4(0201)		

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Passive Antenna Testing



Frequency (MHz)	Gain (dBi)	Efficiency (%)
1550.0	-6.61	5.1%
1555.0	-6.54	5.2%
1560.0	-6.56	5.1%
1565.0	-6.49	5.2%
1570.0	-6.53	5.2%
1575.0	-6.66	5.0%
1580.0	-6.63	5.0%
1585.0	-6.64	5.0%
1590.0	-6.56	5.0%
1595.0	-6.50	5.1%
1600.0	-6.46	5.1%

GPS

Frequency (MHz)	Gain (dBi)	Efficiency (%)
2400.00	-9.32	3.2%
2410.00	-9.21	3.1%
2420.00	-8.52	3.3%
2430.00	-8.81	2.9%
2440.00	-8.65	3.0%
2450.00	-8.72	3.0%
2460.00	-8.93	2.9%
2470.00	-8.88	2.9%
2480.00	-8.77	2.9%
2490.00	-8.81	2.8%
2500.00	-9.01	2.7%

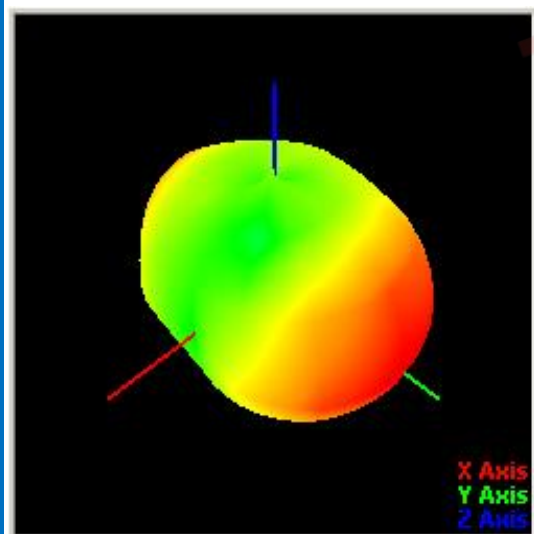
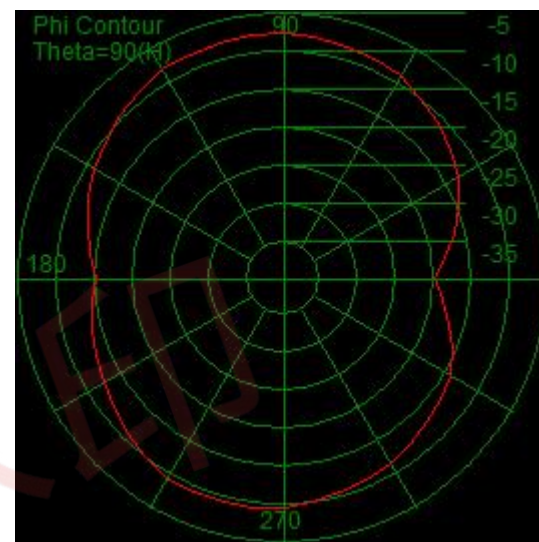
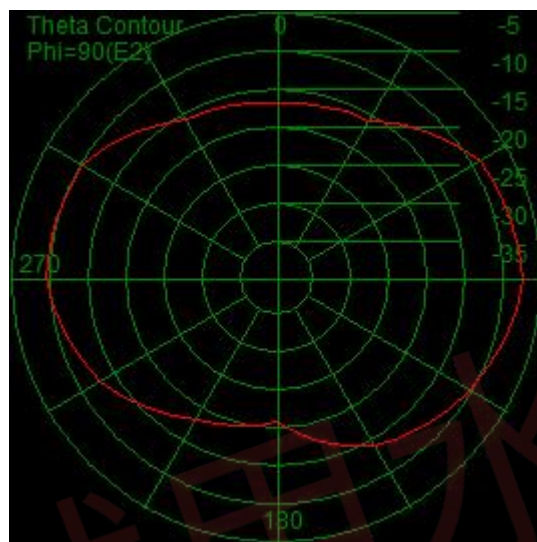
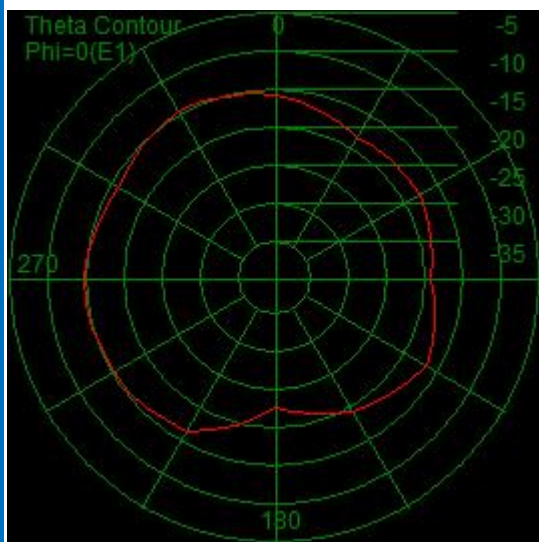
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Direction Chart and Apple Chart

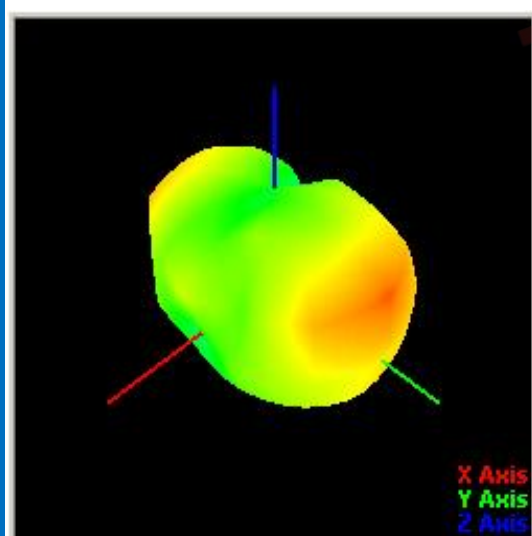
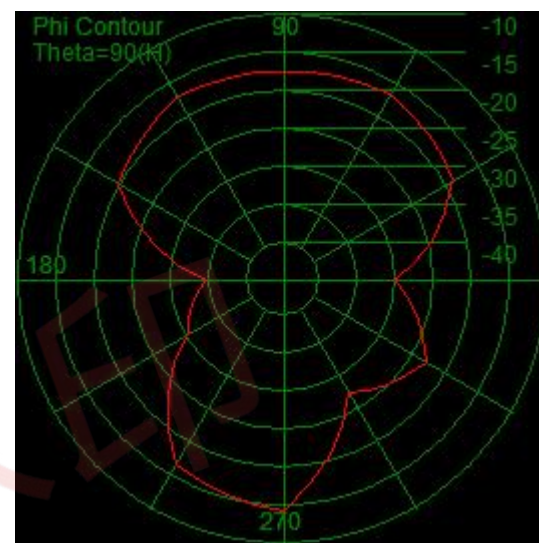
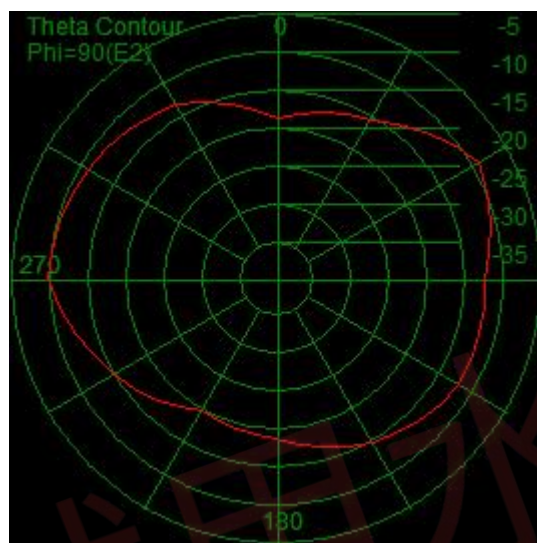
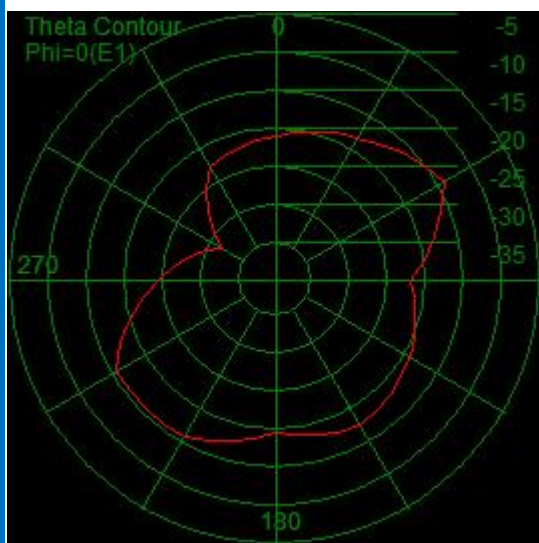


1575MHz:



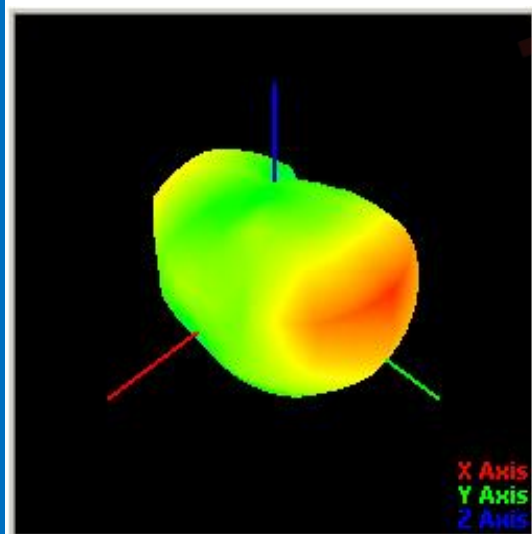
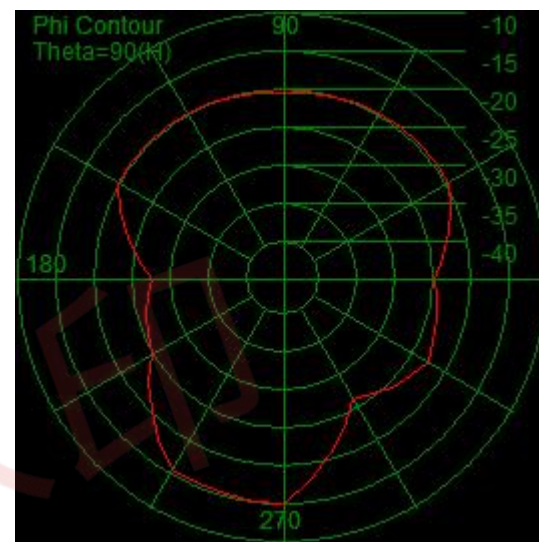
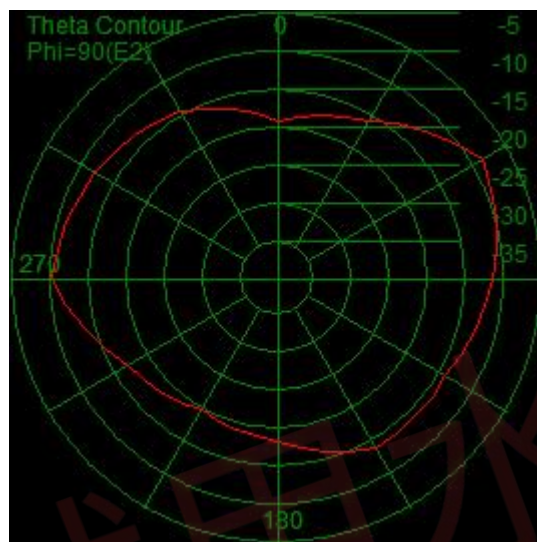
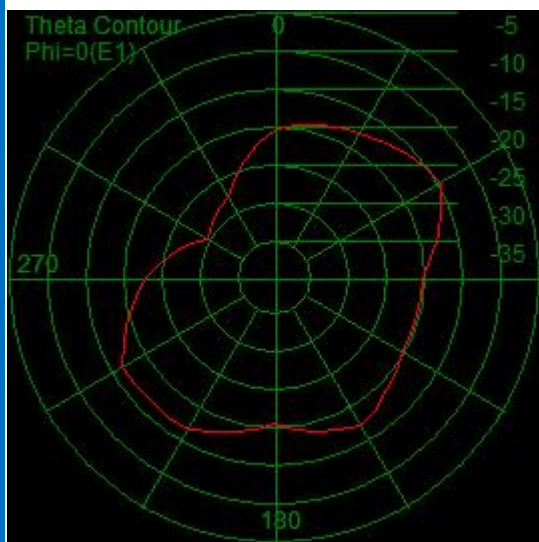


2400MHz:





2450MHz:





2500MHz:

