Applicable to UN20 project External LTE antenna

Electrical Specifications:

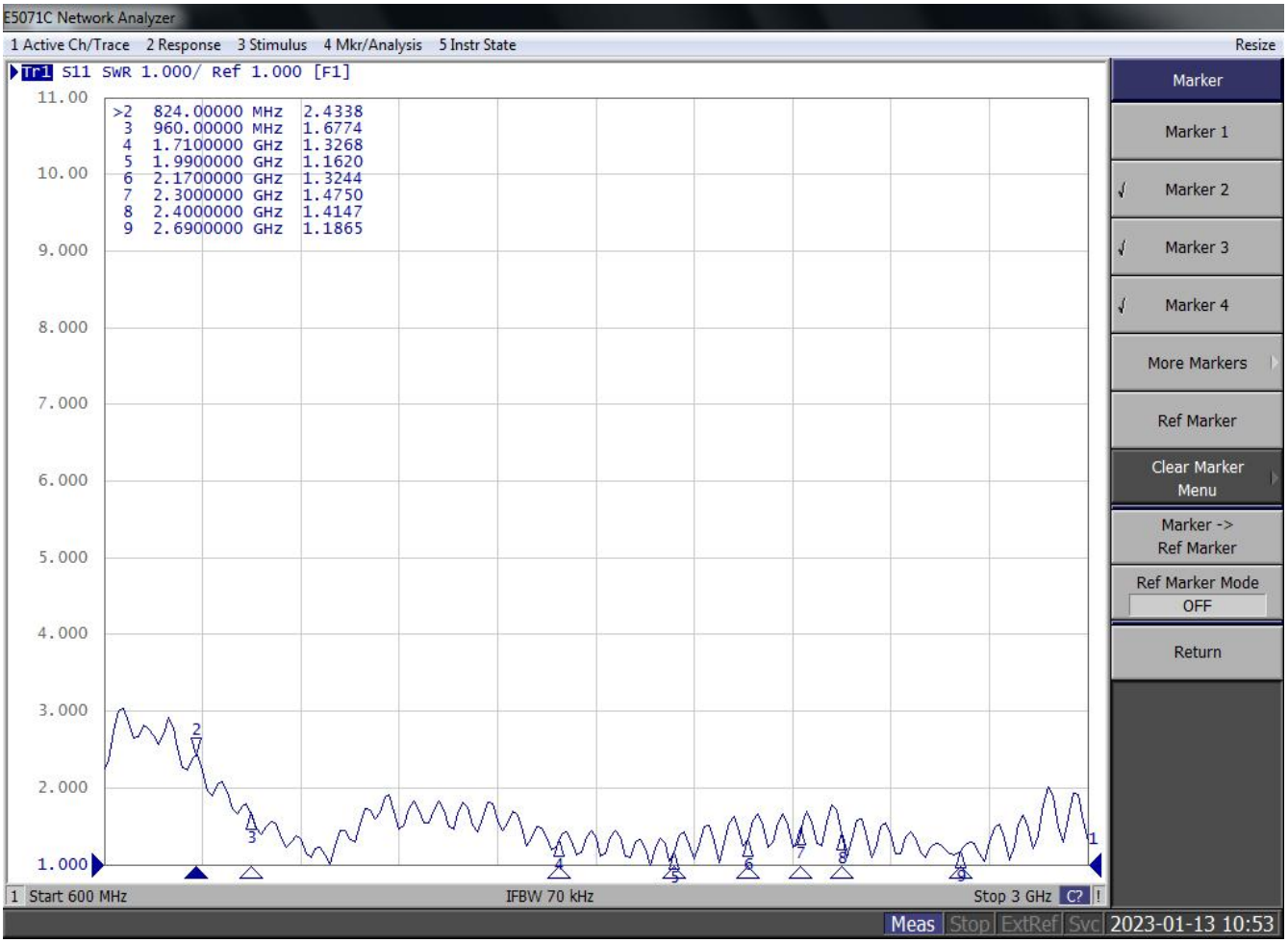
Frequency Band	700-960MHz 1710-2690MHz	The Antenna Material	Copper tube+cable
Nominal Impedance	50Ω	Antenna Connection Mode	SMA connection
VSWR	≤3.0	Working Temperature	-40℃～+85℃
Peak Gain	700-960MHz:1.3dBi	Keep The Temperature	+19℃～+23℃
	1710-2690MHz:3.32dBi	Polarization	Linear Polarization

Test Conditions And Methods:

Test Instruments	Test Method	Test Result
7*4*3 microwave darkroom E5071B network analyzer 48 probe test system MT8862 comprehensive tester	1. Assemble the antenna to be tested on the prototype. 2. Put the prototype on the test fixture in a dark room, and conduct comprehensive test with it. Instrument/analyzer connection is established. 3. Test antenna passive data with test software.	Refer to the Test Report

Passive performance test parameters

Frequency(MHz)	824	1710	2690
VSWR	2.43	1.32	1.18

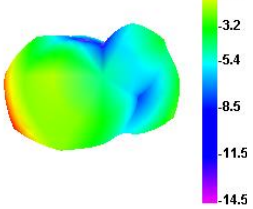


antenna passive data:

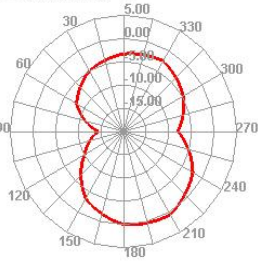
Freq (MHz)	Effi (%)	Gain (dBi)	Freq (MHz)	Effi (%)	Gain (dBi)	Freq (MHz)	Effi (%)	Gain (dBi)
700	40.7	0.63	1700	46.86	0.49	2240	59.02	2.14
710	40.65	0.32	1720	52.89	1.17	2260	57.08	2.01
720	38.51	-0.17	1740	50.54	1.59	2280	54.43	1.56
730	44.11	0.34	1760	54.48	1.79	2300	55.16	1.84
740	48.65	0.64	1780	57.34	1.62	2320	58.23	2.18
750	44.95	0.23	1800	59.4	1.66	2340	55.25	2.05
760	38.31	-0.4	1820	61.09	2.08	2360	54.6	1.99
770	43.01	0.31	1840	63.34	2.2	2380	54.6	1.92
780	44.43	0.74	1860	62.33	2.05	2400	57.75	2.05
790	46.04	0.91	1880	63.61	2.17	2420	53.86	2.15
800	48.86	1.07	1900	61.51	2.09	2440	51.94	1.89
810	46.2	0.93	1920	55.49	1.89	2460	58.16	2.11
820	41.26	0.44	1940	58.92	2.05	2480	53.63	1.78
830	42.89	0.43	1960	58.72	2.18	2500	59.52	2.15
840	46.31	0.74	1980	59.15	2.09	2520	61.17	2.18
850	48.58	1.14	2000	57.26	1.98	2540	51.38	1.84
860	49.83	1.22	2020	60	2.12	2560	51.35	1.94
870	45.34	1.07	2040	58.44	1.86	2580	58.63	2.51
880	41.29	0.69	2060	57.68	1.73	2600	55.37	3.32
890	40.39	0.41	2080	59.68	2.01	2620	51.58	3.24
900	40.31	0.25	2100	59.46	2.01	2640	52.32	3.13
910	37.19	0.03	2120	57.18	1.96	2660	53.56	3.22
920	43.35	0.76	2140	58.29	2.08	2680	52.96	2.74
930	37.31	-0.07	2160	55.59	1.89	2700	57.29	2.92
940	41.07	0.02	2180	56.92	2.1			
950	48.98	0.86	2200	55.71	2.12			
960	50.78	1.3	2220	54.12	1.96			

Directional diagram

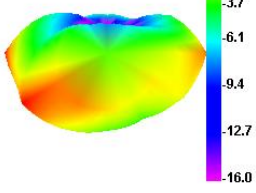
700.000MHz



700.000MHz H



830.000MHz



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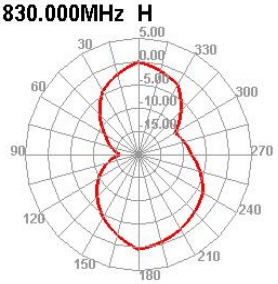
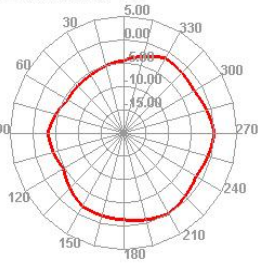
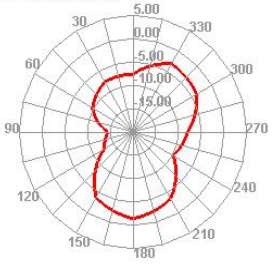


700.000MHz E1



700.000MHz E2



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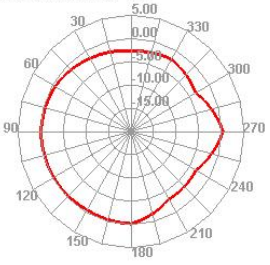

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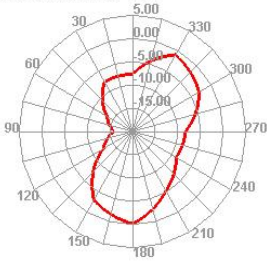
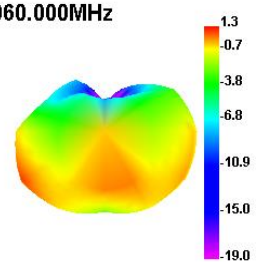


960.000MHz



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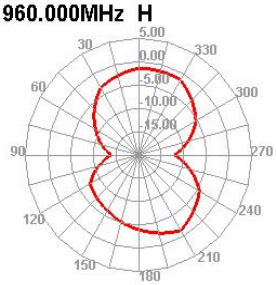
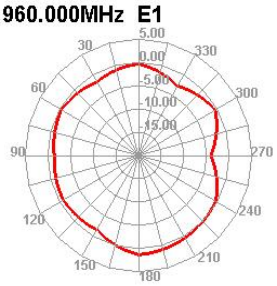
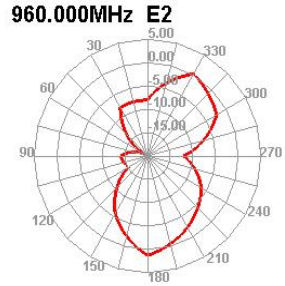


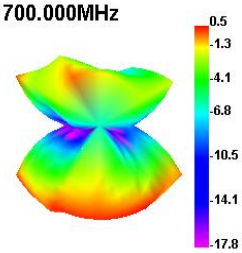
960.000MHz E1



960.000MHz E2



1700.000MHz



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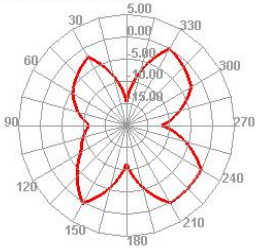
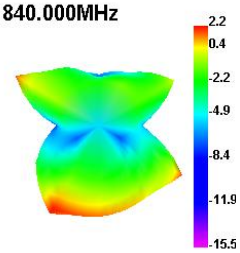
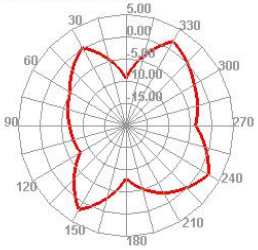


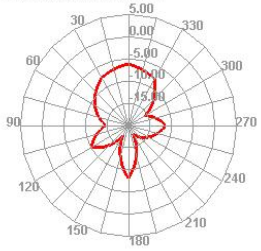
1840.000MHz



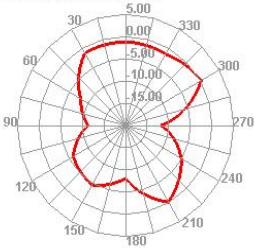
1840.000MHz H



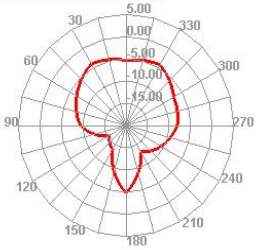
1700.000MHz E1



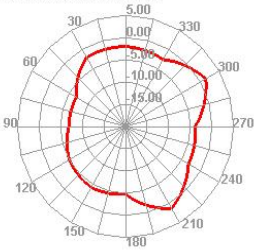
1700.000MHz E2



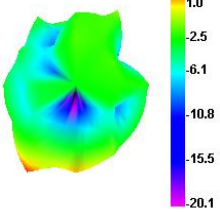
1840.000MHz E1



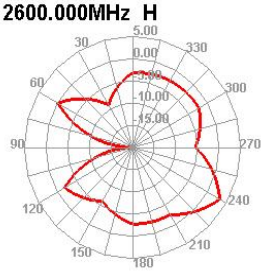
1840.000MHz E2



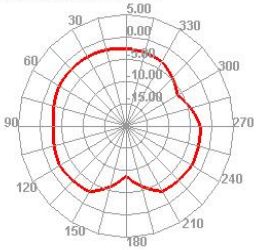
2600.000MHz



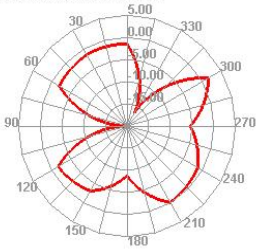
2600.000MHz H



2600.000MHz E1



2600.000MHz E2



Antenna picture：