

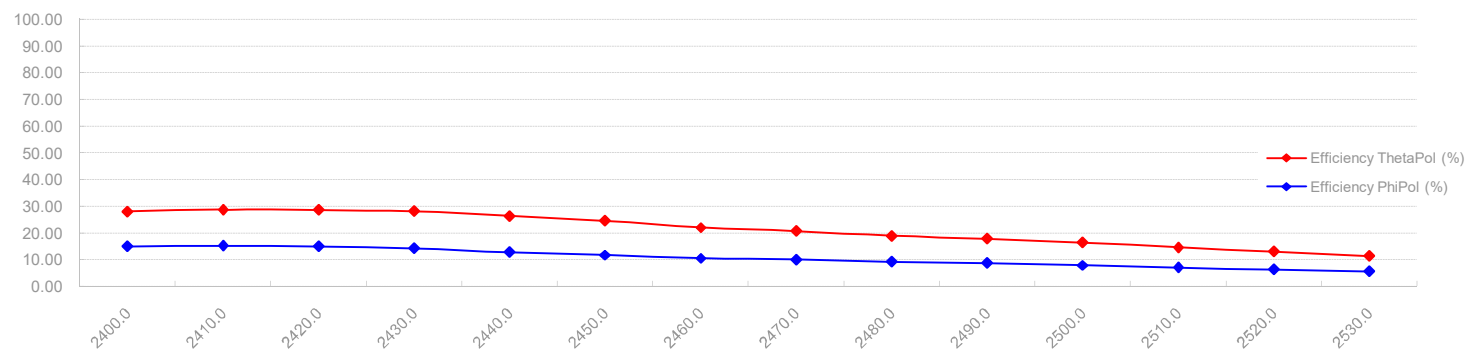
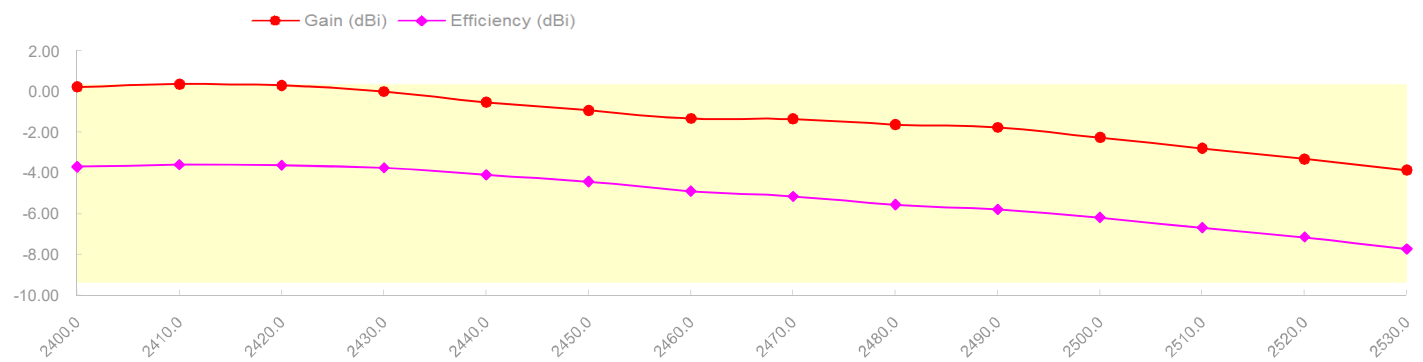
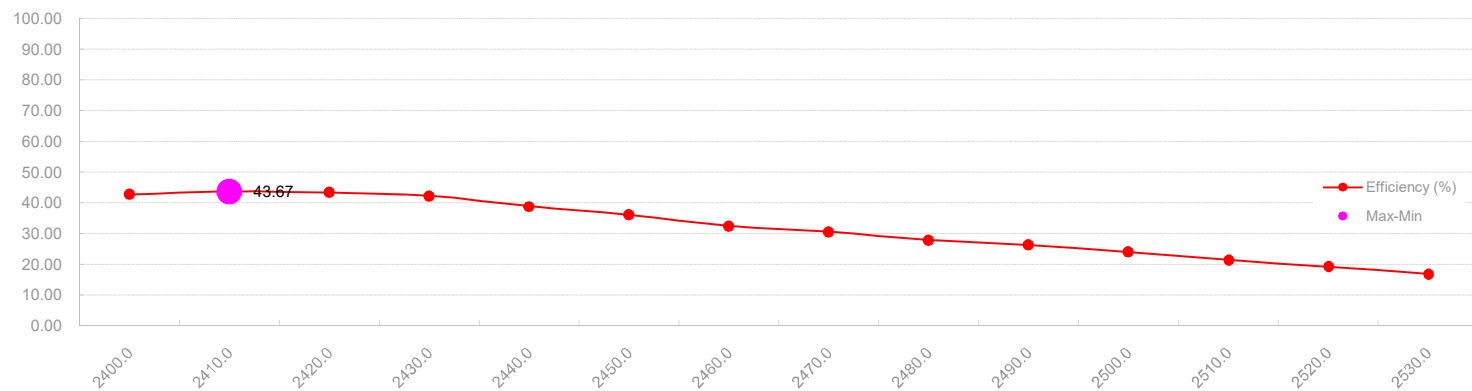


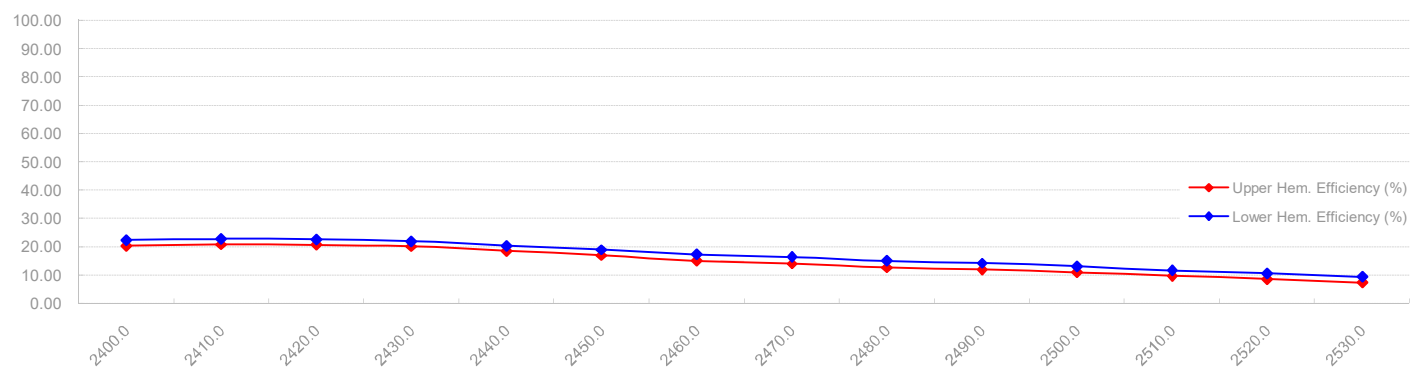
Shenzhen Hongxin electronic Technology Co., LTD

5F, Building 3, Langwei Essence Industrial Zone, Pingshan Street, Pingshan New District, Shenzhen, China

Frequency ID	1	2	3	4	5	6	7	8	9	10	11	12	13	14
Frequency (MHz)	2400.0	2410.0	2420.0	2430.0	2440.0	2450.0	2460.0	2470.0	2480.0	2490.0	2500.0	2510.0	2520.0	2530.0
Efficiency (dBi)	-3.69	-3.60	-3.63	-3.75	-4.10	-4.42	-4.89	-5.15	-5.56	-5.80	-6.19	-6.70	-7.16	-7.74
Gain (dBi)	0.23	0.37	0.31	0.01	-0.53	-0.92	-1.32	-1.34	-1.61	-1.76	-2.26	-2.79	-3.31	-3.86
Efficiency (%)	42.72	43.67	43.40	42.18	38.90	36.10	32.41	30.53	27.81	26.29	24.05	21.40	19.22	16.82
Directivity (dB)	3.92	3.97	3.93	3.75	3.57	3.51	3.57	3.81	3.94	4.04	3.93	3.91	3.85	3.88
Peak Gain Position (Theta)	120.00	120.00	120.00	120.00	120.00	120.00	120.00	120.00	120.00	120.00	120.00	120.00	120.00	120.00
Peak Gain Position (Phi)	270.00	270.00	270.00	270.00	270.00	270.00	270.00	270.00	270.00	270.00	270.00	270.00	270.00	270.00
Efficiency ThetaPol (%)	27.91	28.63	28.58	28.09	26.22	24.45	21.97	20.62	18.76	17.73	16.25	14.49	12.99	11.31
Efficiency PhiPol (%)	14.81	15.04	14.82	14.09	12.68	11.65	10.44	9.91	9.05	8.56	7.80	6.91	6.23	5.51
Upper Hem. Efficiency (%)	20.33	20.88	20.77	20.20	18.54	17.03	15.10	14.08	12.74	11.99	10.95	9.70	8.61	7.41
Lower Hem. Efficiency (%)	22.39	22.80	22.63	21.97	20.37	19.07	17.32	16.45	15.07	14.31	13.09	11.70	10.61	9.41

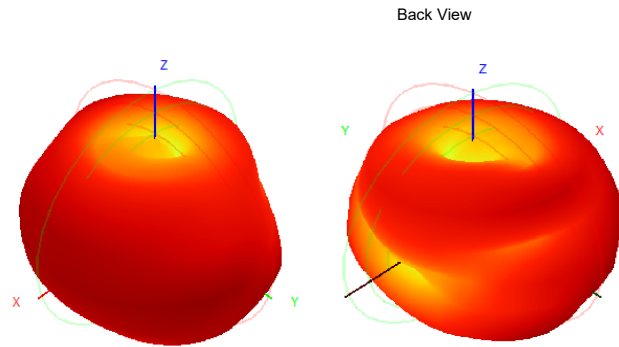
T90(H)Roundness	14.35	13.59	13.08	12.73	13.06	14.30	15.22	16.35	17.22	17.77	19.01	19.80	21.51	22.02
Lobe width E1(XZ)	61.00	58.00	58.00	57.00	57.00	58.00	77.00	76.00	76.00	76.00	77.00	78.00	76.00	75.00
Front-to-back ratioE1(XZ)	5.55	5.74	5.75	5.67	5.62	5.42	5.08	4.86	4.49	4.28	4.12	3.99	3.90	3.66
Lobe width E2(YZ)	59.00	60.00	60.00	61.00	59.00	57.00	56.00	54.00	54.00	55.00	56.00	55.00	54.00	53.00
Front-to-back ratioE2(YZ)	3.80	3.80	3.78	3.61	3.33	3.19	3.08	3.29	3.36	3.38	3.28	3.08	3.01	2.96
Maximum Gain axis ratio(P)	9.77	9.50	9.23	8.81	8.49	8.21	8.00	7.84	7.67	7.55	7.59	7.55	7.42	7.43
Acme(Theta=0)axis ratio(P)	10.26	12.31	13.26	13.14	12.83	12.84	13.29	14.39	15.52	18.66	21.24	24.57	27.99	31.77
Elevation 10 degrees Worst (large) axis ratio (P)	54.38	46.21	52.04	57.07	55.35	55.09	51.77	51.29	53.43	54.14	55.70	55.94	53.27	54.85
Lobe width Hc(XY)	230.00	234.00	235.00	236.00	238.00	234.00	231.00	227.00	223.00	223.00	224.00	225.00	224.00	223.00
Front-to-back ratio Hc(XY)	0.00	0.00	0.00	0.00	0.07	0.31	0.44	0.64	0.69	0.66	0.75	0.77	1.00	1.15
Left-handed circular polarization efficiency(%)	22.13	22.17	21.80	21.34	19.99	18.77	16.82	15.58	14.05	13.12	11.98	10.84	9.90	8.83
Right-hand circular polarization efficiency (%)	20.59	21.50	21.60	20.83	18.92	17.33	15.59	14.96	13.77	13.17	12.06	10.56	9.32	7.99



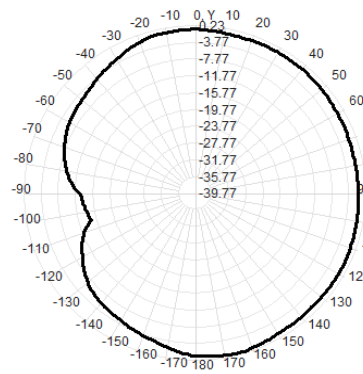


3D Pattern

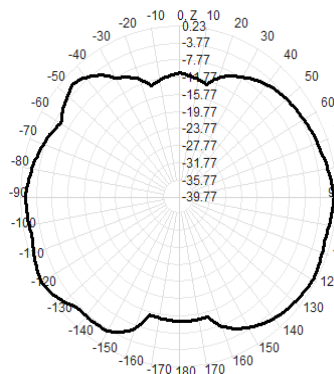
2400.0MHz H+V, Eff: 42.7%



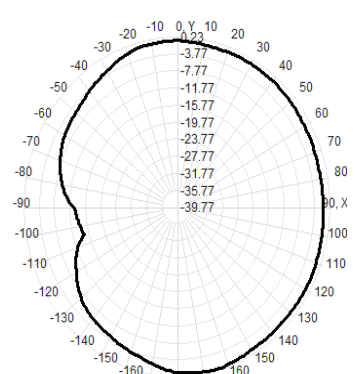
Total(H-XY), Max= -0.42dBi, CirD=14



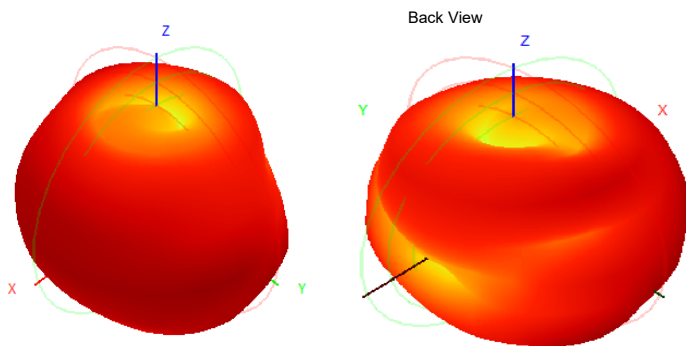
2400.0MHz Total(E2-YZ), Max= 0.23dBi



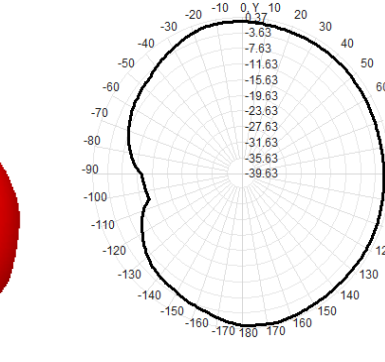
Total(H-XY), Max= -0.42dBi, CirD=14.35



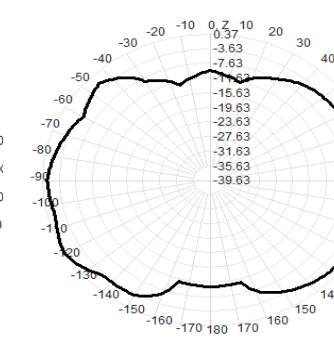
2410.0MHz H+V, Eff: 43.7%



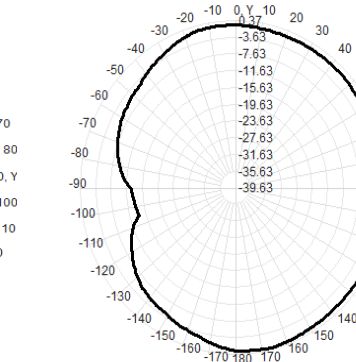
Total(H-XY), Max= -0.38dBi, CirD=13.59



2410.0MHz Total(E2-YZ), Max= 0.37dBi



Total(H-XY), Max= -0.38dBi, CirD=13.59



2440.0MHz H+V, Eff: 38.9%



Total(H-XY), Max= -1.29dBi, CirD=13.06



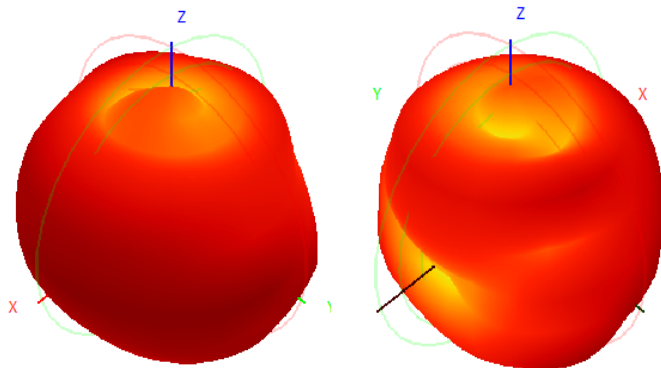
2440.0MHz Total(E2-YZ), Max= -0.53dBi



Total(H-XY),Max=-1.29dBi,CirD=13.06

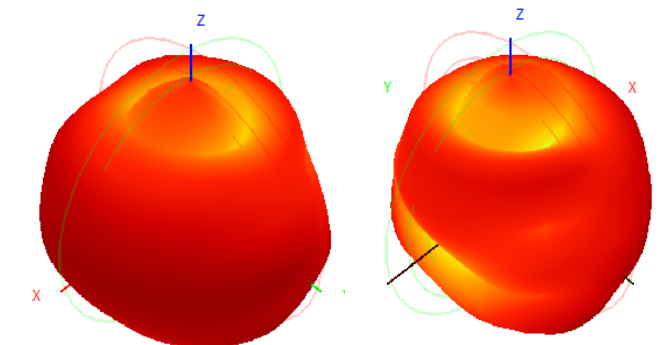


Back View

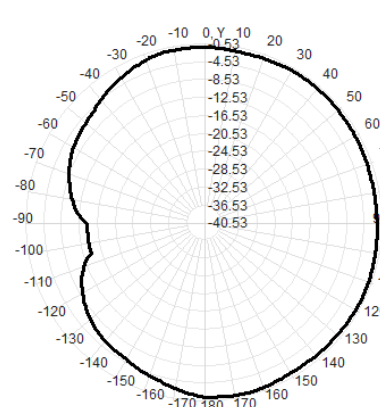
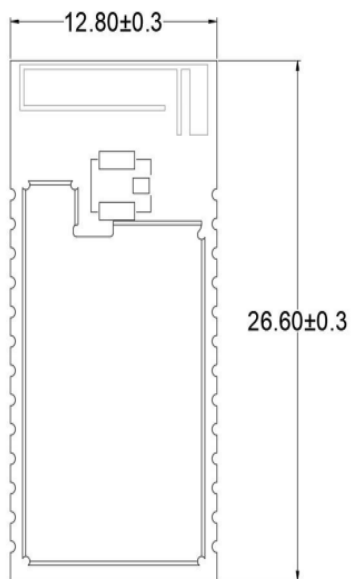


2480.0MHz H+V, Eff: 27.8%

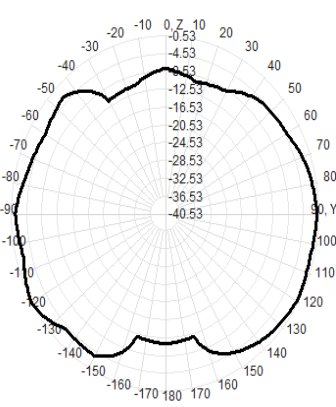
Back View



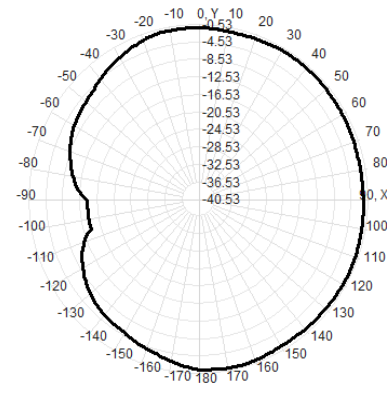
Antenna Photos



Total(H-XY), Max= -2.05dBi, CirD=17.22



2480.0MHz Total(E2-YZ), Max= -1.61dBi



Total(H-XY), Max= -2.05dBi, CirD=17.22

