

Exhibit 5A.1- §25.115(g)(1) PLOTS & TABLES FOR KU-BAND ANTENNAS

Exhibit Contains:

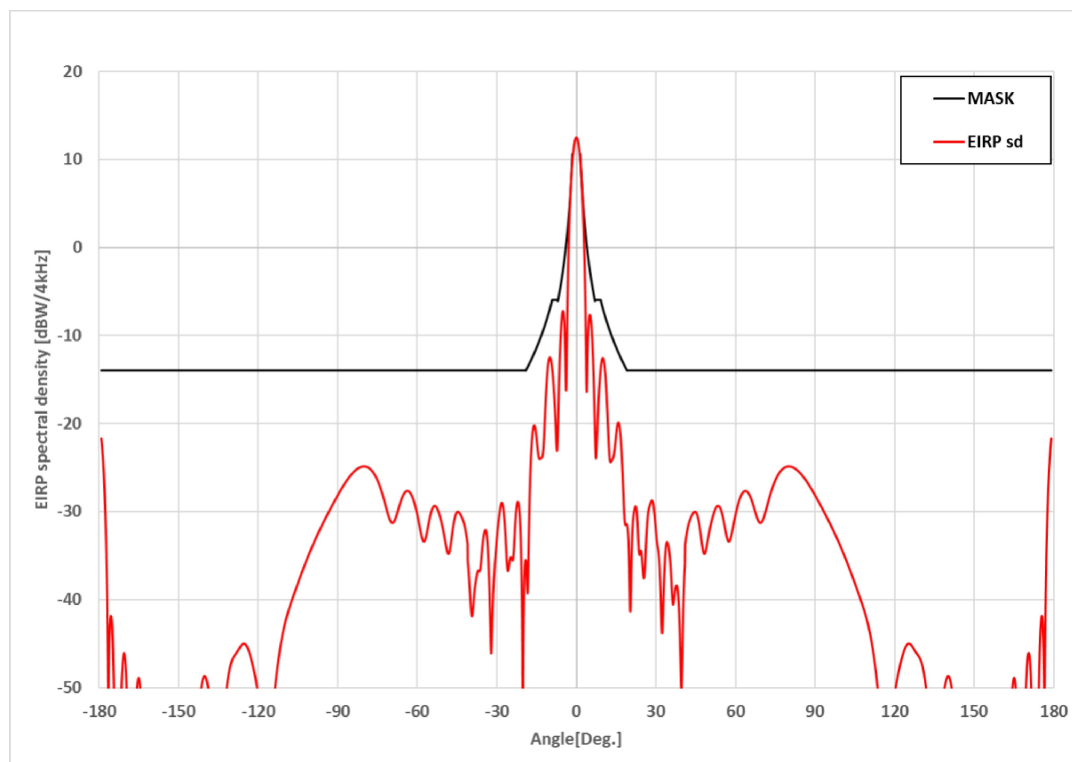
Plots and Tables for Intellian V45c and V60e antennas.

Intellian V45C Ku-band

1. EIRP Spectral Density of v45

1.1. Frequency 13.75GHz EIRP Spectral Density

1.1.1. Azimuth Pattern for Co-pol, Wide Angle (-180° ~ 180°)



-21.77dBW/4kHz Input power spectral density @ f=13.75GHz

▪ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2. EIRP Spectral Density Data

2.1. Frequency 13.75GHz Data

2.1.1. Azimuth Pattern for Co-pol (-180°~180°)

F=13.75GHz, -21.77dBW/4KHz EIRP sd					
-179	-46.017	-14.000	-141	-40.988	-14.000
-178	-31.905	-14.000	-140	-48.234	-14.000
-177	-29.909	-14.000	-139	-39.720	-14.000
-176	-35.800	-14.000	-138	-39.582	-14.000
-175	-33.176	-14.000	-137	-51.963	-14.000
-174	-32.051	-14.000	-136	-43.203	-14.000
-173	-37.598	-14.000	-135	-44.964	-14.000
-172	-34.702	-14.000	-134	-46.069	-14.000
-171	-36.124	-14.000	-133	-48.831	-14.000
-170	-40.546	-14.000	-132	-42.076	-14.000
-169	-35.693	-14.000	-131	-48.690	-14.000
-168	-40.981	-14.000	-130	-45.864	-14.000
-167	-42.029	-14.000	-129	-42.933	-14.000
-166	-37.437	-14.000	-128	-41.234	-14.000
-165	-46.675	-14.000	-127	-46.219	-14.000
-164	-40.495	-14.000	-126	-40.885	-14.000
-163	-40.974	-14.000	-125	-35.906	-14.000
-162	-50.173	-14.000	-124	-42.134	-14.000
-161	-38.822	-14.000	-123	-40.702	-14.000
-160	-45.915	-14.000	-122	-35.872	-14.000
-159	-46.834	-14.000	-121	-39.666	-14.000
-158	-38.757	-14.000	-120	-48.804	-14.000
-157	-45.454	-14.000	-119	-39.648	-14.000
-156	-38.827	-14.000	-118	-38.691	-14.000
-155	-43.042	-14.000	-117	-44.005	-14.000
-154	-47.750	-14.000	-116	-47.045	-14.000
-153	-35.099	-14.000	-115	-38.194	-14.000
-152	-48.379	-14.000	-114	-36.723	-14.000
-151	-43.919	-14.000	-113	-42.067	-14.000
-150	-36.192	-14.000	-112	-40.582	-14.000
-149	-40.888	-14.000	-111	-33.489	-14.000
-148	-35.982	-14.000	-110	-33.595	-14.000
-147	-38.812	-14.000	-109	-39.212	-14.000
-146	-46.402	-14.000	-108	-39.183	-14.000
-145	-38.367	-14.000	-107	-33.644	-14.000
-144	-34.263	-14.000	-106	-33.026	-14.000
-143	-47.449	-14.000	-105	-36.139	-14.000
-142	-37.621	-14.000	-104	-38.412	-14.000
			-103	-34.115	-14.000
			-102	-32.157	-14.000

-101	-33.381	-14.000
-100	-31.972	-14.000
-99	-31.351	-14.000
-98	-30.458	-14.000
-97	-29.566	-14.000
-96	-28.682	-14.000
-95	-27.807	-14.000
-94	-26.976	-14.000
-93	-26.218	-14.000
-92	-25.546	-14.000
-91	-24.961	-14.000
-90	-24.478	-14.000
-89	-24.126	-14.000
-88	-23.942	-14.000
-87	-23.962	-14.000
-86	-24.223	-14.000
-85	-24.772	-14.000
-84	-25.670	-14.000
-83	-26.983	-14.000
-82	-28.706	-14.000
-81	-30.458	-14.000
-80	-33.567	-14.000
-79	-39.894	-14.000
-78	-46.221	-14.000
-77	-43.576	-14.000
-76	-37.981	-14.000
-75	-35.312	-14.000
-74	-37.534	-14.000
-73	-45.508	-14.000
-72	-40.819	-14.000
-71	-33.828	-14.000
-70	-32.961	-14.000
-69	-31.164	-14.000
-68	-31.398	-14.000
-67	-35.307	-14.000
-66	-35.425	-14.000
-65	-31.187	-14.000
-64	-33.855	-14.000
-63	-36.704	-14.000
-62	-34.216	-14.000

-61	-35.875	-14.000
-60	-37.552	-14.000
-59	-36.815	-14.000
-58	-39.858	-14.000
-57	-48.199	-14.000
-56	-35.572	-14.000
-55	-31.997	-14.000
-54	-30.132	-14.000
-53	-32.102	-14.000
-52	-41.037	-14.000
-51	-39.018	-14.000
-50	-35.266	-14.000
-49	-33.314	-14.000
-48	-37.274	-14.000
-47	-41.411	-14.000
-46	-33.273	-14.000
-45	-37.506	-14.000
-44	-35.968	-14.000
-43	-40.126	-14.000
-42	-40.051	-14.000
-41	-33.337	-14.000
-40	-32.008	-14.000
-39	-35.897	-14.000
-38	-36.545	-14.000
-37	-41.597	-14.000
-36	-37.327	-14.000
-35	-38.803	-14.000
-34	-31.796	-14.000
-33	-34.469	-14.000
-32	-38.181	-14.000
-31	-35.934	-14.000
-30	-32.435	-14.000
-29	-39.484	-14.000
-28	-40.581	-14.000
-27	-32.704	-14.000
-26	-42.846	-14.000
-25	-35.022	-14.000
-24	-35.622	-14.000
-23	-32.536	-14.000
-22	-28.201	-14.000

-21	-31.367	-14.000
-20	-37.627	-14.000
-19	-26.998	-13.969
-18	-24.710	-13.382
-17	-30.410	-12.761
-16	-27.728	-12.103
-15	-19.840	-11.402
-14	-16.352	-10.653
-13	-24.020	-9.849
-12	-15.823	-8.980
-11	-17.685	-8.035
-10	-14.652	-7.000
-9	-11.089	-6.000
-8	-13.430	-6.000
-7	-10.854	-6.127
-6	-8.661	-4.454
-5	-14.546	-2.474
-4	-25.205	-0.051
-3	-1.191	3.072
-2	-2.391	7.474
-1	16.365	
0	20.181	
1	16.342	
2	-1.605	7.474
3	-2.166	3.072
4	-23.013	-0.051
5	-12.201	-2.474
6	-7.341	-4.454
7	-10.276	-6.127
8	-12.621	-6.000
9	-11.380	-6.000
10	-16.051	-7.000
11	-17.851	-8.035
12	-16.184	-8.980
13	-25.190	-9.849
14	-15.299	-10.653
15	-18.359	-11.402
16	-24.977	-12.103
17	-27.614	-12.761
18	-25.193	-13.382

19	-28.282	-13.969
20	-35.635	-14.000
21	-32.744	-14.000
22	-29.862	-14.000
23	-32.009	-14.000
24	-32.559	-14.000
25	-38.407	-14.000
26	-42.989	-14.000
27	-32.434	-14.000
28	-38.857	-14.000
29	-39.185	-14.000
30	-32.817	-14.000
31	-39.758	-14.000
32	-39.880	-14.000
33	-38.586	-14.000
34	-34.611	-14.000
35	-33.785	-14.000
36	-37.872	-14.000
37	-38.988	-14.000
38	-36.728	-14.000
39	-36.030	-14.000
40	-30.261	-14.000
41	-32.265	-14.000
42	-47.093	-14.000
43	-41.845	-14.000
44	-40.780	-14.000
45	-33.825	-14.000
46	-31.806	-14.000
47	-42.039	-14.000
48	-34.749	-14.000
49	-32.072	-14.000
50	-46.400	-14.000
51	-36.370	-14.000
52	-35.750	-14.000
53	-29.891	-14.000
54	-27.833	-14.000
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56	-32.978	-14.000
57	-33.520	-14.000
58	-36.108	-14.000

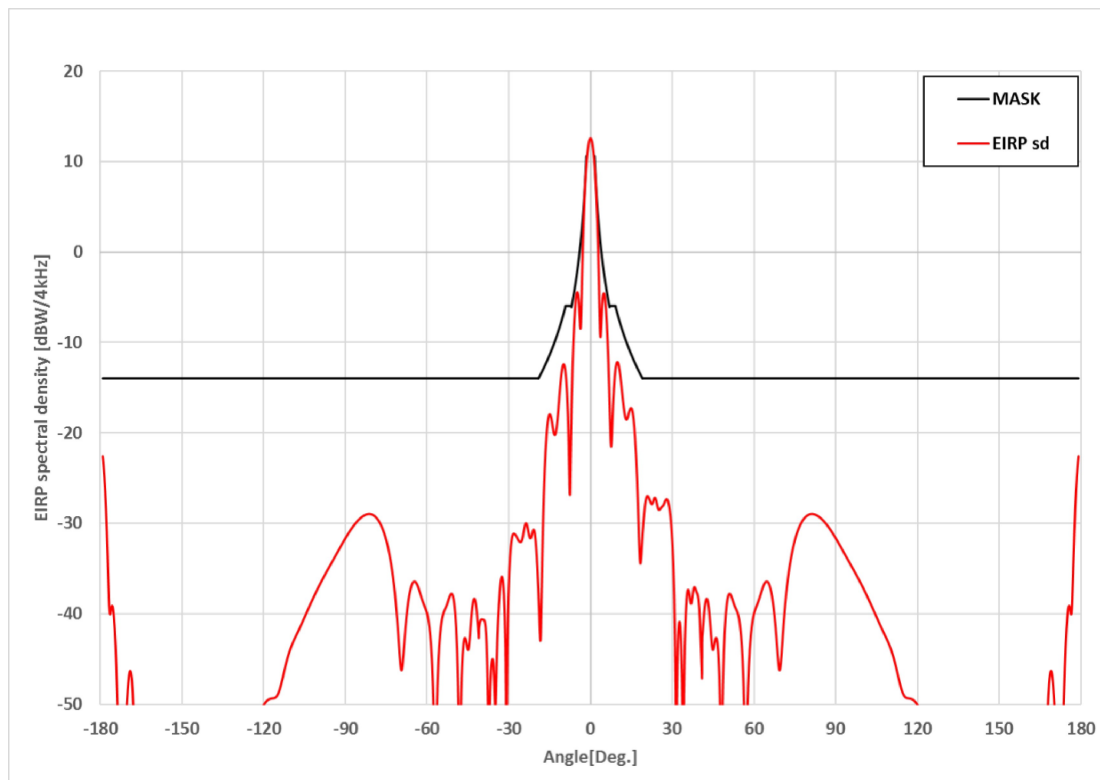
59	-47.704	-14.000
60	-38.260	-14.000
61	-36.692	-14.000
62	-42.269	-14.000
63	-50.022	-14.000
64	-45.206	-14.000
65	-36.001	-14.000
66	-36.547	-14.000
67	-31.944	-14.000
68	-30.833	-14.000
69	-34.571	-14.000
70	-33.238	-14.000
71	-34.044	-14.000
72	-38.468	-14.000
73	-38.789	-14.000
74	-34.296	-14.000
75	-35.392	-14.000
76	-29.508	-14.000
77	-28.996	-14.000
78	-28.478	-14.000
79	-27.547	-14.000
80	-26.556	-14.000
81	-26.024	-14.000
82	-26.071	-14.000
83	-26.322	-14.000
84	-26.135	-14.000
85	-25.464	-14.000
86	-24.952	-14.000
87	-25.064	-14.000
88	-25.773	-14.000
89	-26.495	-14.000
90	-26.533	-14.000
91	-26.212	-14.000
92	-26.405	-14.000
93	-27.529	-14.000
94	-29.210	-14.000
95	-29.951	-14.000
96	-29.395	-14.000
97	-29.303	-14.000
98	-30.711	-14.000

99	-33.502	-14.000
100	-34.525	-14.000
101	-32.791	-14.000
102	-32.416	-14.000
103	-34.724	-14.000
104	-39.370	-14.000
105	-37.447	-14.000
106	-34.684	-14.000
107	-35.651	-14.000
108	-41.539	-14.000
109	-41.918	-14.000
110	-36.545	-14.000
111	-36.439	-14.000
112	-42.600	-14.000
113	-43.049	-14.000
114	-36.668	-14.000
115	-37.104	-14.000
116	-44.918	-14.000
117	-41.726	-14.000
118	-36.850	-14.000
119	-38.245	-14.000
120	-47.839	-14.000
121	-39.139	-14.000
122	-35.886	-14.000
123	-42.190	-14.000
124	-44.811	-14.000
125	-38.634	-14.000
126	-43.662	-14.000
127	-49.046	-14.000
128	-42.932	-14.000
129	-43.207	-14.000
130	-44.714	-14.000
131	-46.116	-14.000
132	-38.078	-14.000
133	-44.177	-14.000
134	-41.271	-14.000
135	-40.592	-14.000
136	-40.110	-14.000
137	-50.150	-14.000
138	-39.049	-14.000

139	-40.468	-14.000
140	-50.261	-14.000
141	-44.296	-14.000
142	-42.209	-14.000
143	-53.316	-14.000
144	-40.048	-14.000
145	-43.305	-14.000
146	-50.492	-14.000
147	-42.056	-14.000
148	-38.379	-14.000
149	-42.438	-14.000
150	-36.895	-14.000
151	-43.775	-14.000
152	-47.388	-14.000
153	-33.260	-14.000
154	-45.065	-14.000
155	-40.018	-14.000
156	-35.803	-14.000
157	-42.430	-14.000
158	-35.733	-14.000
159	-43.810	-14.000
160	-43.211	-14.000
161	-36.650	-14.000
162	-48.535	-14.000
163	-39.869	-14.000
164	-39.923	-14.000
165	-46.636	-14.000
166	-37.931	-14.000
167	-43.055	-14.000
168	-42.541	-14.000
169	-37.785	-14.000
170	-43.172	-14.000
171	-38.857	-14.000
172	-37.434	-14.000
173	-40.331	-14.000
174	-34.784	-14.000
175	-35.909	-14.000
176	-38.007	-14.000
177	-30.804	-14.000
178	-31.487	-14.000
179	-44.391	-14.000

1.3. Frequency 14.50GHz EIRP Spectral Density

1.3.1. Azimuth Pattern for Co-pol, Wide Angle (-180° ~ 180°)



-21.77dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2.3. Frequency 14.50GHz Data

2.3.1. Azimuth Pattern for Co-pol (-180°~180°)

F=14.50GHz, -21.77dBW/4KHz EIRP sd					
-179	-44.505	-14.000	-141	-44.262	-14.000
-178	-38.121	-14.000	-140	-44.123	-14.000
-177	-36.022	-14.000	-139	-55.480	-14.000
-176	-34.898	-14.000	-138	-45.441	-14.000
-175	-40.445	-14.000	-137	-45.922	-14.000
-174	-37.548	-14.000	-136	-45.747	-14.000
-173	-38.970	-14.000	-135	-47.229	-14.000
-172	-43.392	-14.000	-134	-39.706	-14.000
-171	-38.539	-14.000	-133	-46.319	-14.000
-170	-43.827	-14.000	-132	-43.494	-14.000
-169	-44.875	-14.000	-131	-40.848	-14.000
-168	-40.283	-14.000	-130	-40.572	-14.000
-167	-49.522	-14.000	-129	-46.981	-14.000
-166	-42.915	-14.000	-128	-43.072	-14.000
-165	-42.861	-14.000	-127	-39.517	-14.000
-164	-51.527	-14.000	-126	-47.168	-14.000
-163	-39.642	-14.000	-125	-46.021	-14.000
-162	-46.203	-14.000	-124	-41.191	-14.000
-161	-46.802	-14.000	-123	-43.806	-14.000
-160	-38.725	-14.000	-122	-51.470	-14.000
-159	-45.422	-14.000	-121	-40.840	-14.000
-158	-38.795	-14.000	-120	-38.409	-14.000
-157	-43.010	-14.000	-119	-42.249	-14.000
-156	-47.718	-14.000	-118	-44.923	-14.000
-155	-35.067	-14.000	-117	-37.109	-14.000
-154	-48.347	-14.000	-116	-36.673	-14.000
-153	-43.887	-14.000	-115	-43.054	-14.000
-152	-36.160	-14.000	-114	-42.605	-14.000
-151	-40.856	-14.000	-113	-36.444	-14.000
-150	-36.797	-14.000	-112	-36.550	-14.000
-149	-40.474	-14.000	-111	-42.167	-14.000
-148	-48.911	-14.000	-110	-42.138	-14.000
-147	-41.723	-14.000	-109	-36.599	-14.000
-146	-38.466	-14.000	-108	-35.981	-14.000
-145	-51.991	-14.000	-107	-39.694	-14.000
-144	-42.163	-14.000	-106	-42.662	-14.000
-143	-45.530	-14.000	-105	-39.016	-14.000
-142	-52.776	-14.000	-104	-36.808	-14.000
			-103	-37.683	-14.000
			-102	-35.924	-14.000

-101	-34.954	-14.000
-100	-34.026	-14.000
-99	-33.134	-14.000
-98	-32.250	-14.000
-97	-31.376	-14.000
-96	-30.544	-14.000
-95	-29.787	-14.000
-94	-29.114	-14.000
-93	-28.530	-14.000
-92	-28.046	-14.000
-91	-27.694	-14.000
-90	-27.510	-14.000
-89	-27.530	-14.000
-88	-27.791	-14.000
-87	-28.340	-14.000
-86	-29.238	-14.000
-85	-30.551	-14.000
-84	-32.274	-14.000
-83	-34.027	-14.000
-82	-37.135	-14.000
-81	-43.462	-14.000
-80	-49.189	-14.000
-79	-45.544	-14.000
-78	-39.049	-14.000
-77	-44.644	-14.000
-76	-39.049	-14.000
-75	-36.380	-14.000
-74	-38.603	-14.000
-73	-46.576	-14.000
-72	-41.887	-14.000
-71	-34.896	-14.000
-70	-34.030	-14.000
-69	-32.233	-14.000
-68	-32.466	-14.000
-67	-36.375	-14.000
-66	-35.593	-14.000
-65	-30.756	-14.000
-64	-33.563	-14.000
-63	-36.552	-14.000
-62	-34.204	-14.000

-61	-36.004	-14.000
-60	-37.821	-14.000
-59	-35.094	-14.000
-58	-38.741	-14.000
-57	-38.922	-14.000
-56	-39.425	-14.000
-55	-47.259	-14.000
-54	-43.687	-14.000
-53	-38.731	-14.000
-52	-49.768	-14.000
-51	-31.800	-14.000
-50	-32.485	-14.000
-49	-38.920	-14.000
-48	-39.911	-14.000
-47	-40.764	-14.000
-46	-37.238	-14.000
-45	-36.278	-14.000
-44	-45.761	-14.000
-43	-35.025	-14.000
-42	-40.900	-14.000
-41	-45.319	-14.000
-40	-56.413	-14.000
-39	-44.538	-14.000
-38	-31.008	-14.000
-37	-30.935	-14.000
-36	-36.631	-14.000
-35	-40.666	-14.000
-34	-40.381	-14.000
-33	-31.782	-14.000
-32	-28.876	-14.000
-31	-36.943	-14.000
-30	-42.092	-14.000
-29	-39.107	-14.000
-28	-36.968	-14.000
-27	-32.259	-14.000
-26	-45.324	-14.000
-25	-32.135	-14.000
-24	-30.860	-14.000
-23	-41.842	-14.000
-22	-29.223	-14.000

-21	-31.338	-14.000
-20	-34.837	-14.000
-19	-28.618	-13.969
-18	-22.731	-13.382
-17	-23.028	-12.761
-16	-26.743	-12.103
-15	-23.057	-11.402
-14	-21.010	-10.653
-13	-19.581	-9.849
-12	-21.014	-8.980
-11	-14.507	-8.035
-10	-19.932	-7.000
-9	-16.079	-6.000
-8	-16.621	-6.000
-7	-13.803	-6.127
-6	-10.255	-4.454
-5	-9.534	-2.474
-4	-4.308	-0.051
-3	-0.580	3.072
-2	-6.881	7.474
-1	16.087	
0	20.527	
1	16.056	
2	-7.692	7.474
3	1.027	3.072
4	-4.014	-0.051
5	-9.842	-2.474
6	-9.828	-4.454
7	-13.696	-6.127
8	-15.656	-6.000
9	-16.672	-6.000
10	-22.829	-7.000
11	-15.357	-8.035
12	-21.974	-8.980
13	-18.600	-9.849
14	-20.328	-10.653
15	-28.731	-11.402
16	-33.344	-12.103
17	-20.790	-12.761
18	-20.928	-13.382

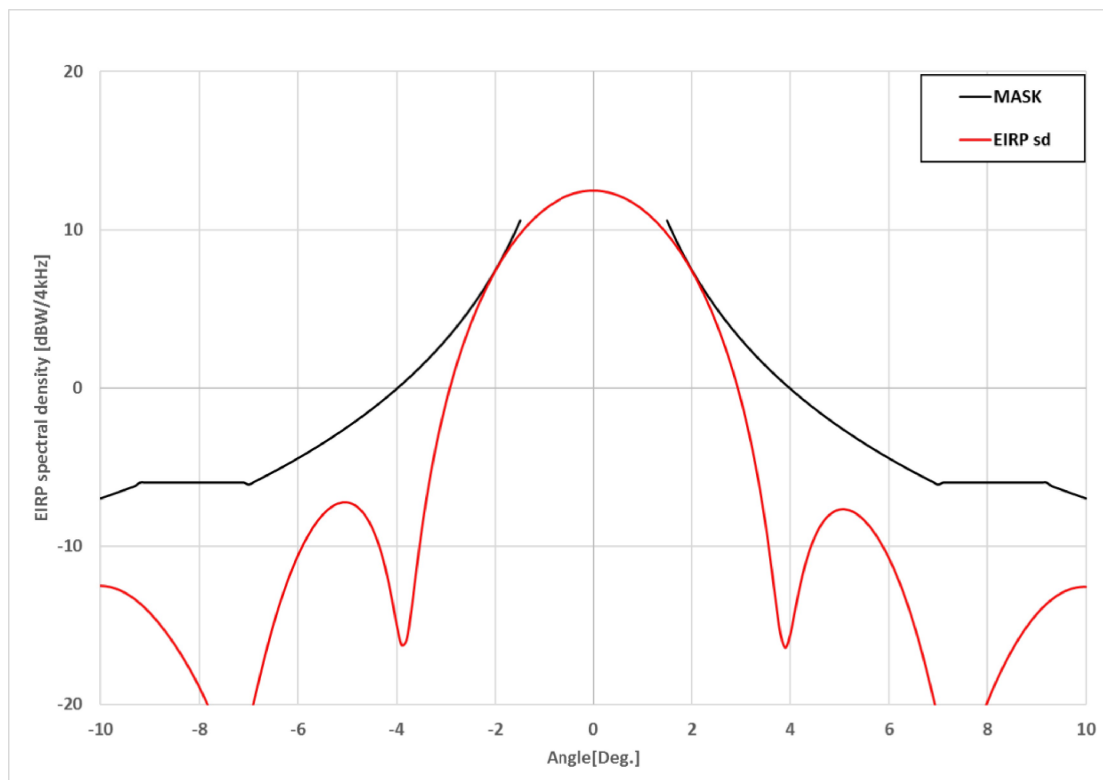
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20	-33.721	-14.000
21	-30.204	-14.000
22	-29.542	-14.000
23	-40.022	-14.000
24	-35.077	-14.000
25	-31.567	-14.000
26	-33.899	-14.000
27	-38.720	-14.000
28	-35.969	-14.000
29	-32.590	-14.000
30	-41.306	-14.000
31	-34.231	-14.000
32	-29.648	-14.000
33	-33.332	-14.000
34	-35.427	-14.000
35	-35.143	-14.000
36	-34.321	-14.000
37	-36.162	-14.000
38	-31.757	-14.000
39	-38.354	-14.000
40	-42.909	-14.000
41	-40.625	-14.000
42	-37.678	-14.000
43	-34.866	-14.000
44	-43.277	-14.000
45	-43.048	-14.000
46	-45.834	-14.000
47	-52.432	-14.000
48	-39.704	-14.000
49	-34.085	-14.000
50	-35.854	-14.000
51	-33.335	-14.000
52	-35.208	-14.000
53	-52.222	-14.000
54	-41.752	-14.000
55	-38.750	-14.000
56	-34.137	-14.000
57	-44.262	-14.000
58	-37.445	-14.000

59	-59.556	-14.000
60	-35.065	-14.000
61	-37.181	-14.000
62	-43.051	-14.000
63	-59.400	-14.000
64	-41.482	-14.000
65	-37.716	-14.000
66	-36.002	-14.000
67	-32.772	-14.000
68	-33.068	-14.000
69	-36.884	-14.000
70	-34.776	-14.000
71	-37.127	-14.000
72	-41.273	-14.000
73	-39.025	-14.000
74	-36.034	-14.000
75	-34.593	-14.000
76	-33.706	-14.000
77	-33.264	-14.000
78	-32.631	-14.000
79	-31.619	-14.000
80	-30.725	-14.000
81	-30.377	-14.000
82	-30.546	-14.000
83	-30.725	-14.000
84	-30.352	-14.000
85	-29.655	-14.000
86	-29.303	-14.000
87	-29.621	-14.000
88	-30.419	-14.000
89	-30.980	-14.000
90	-30.823	-14.000
91	-30.577	-14.000
92	-31.034	-14.000
93	-32.414	-14.000
94	-34.001	-14.000
95	-34.239	-14.000
96	-33.640	-14.000
97	-33.940	-14.000
98	-35.849	-14.000

99	-38.629	-14.000
100	-38.455	-14.000
101	-36.832	-14.000
102	-37.188	-14.000
103	-40.413	-14.000
104	-44.209	-14.000
105	-40.305	-14.000
106	-38.255	-14.000
107	-40.137	-14.000
108	-47.095	-14.000
109	-42.302	-14.000
110	-38.498	-14.000
111	-39.948	-14.000
112	-46.544	-14.000
113	-40.127	-14.000
114	-36.210	-14.000
115	-38.438	-14.000
116	-48.344	-14.000
117	-40.224	-14.000
118	-38.544	-14.000
119	-42.885	-14.000
120	-51.422	-14.000
121	-42.269	-14.000
122	-41.517	-14.000
123	-51.547	-14.000
124	-43.140	-14.000
125	-39.493	-14.000
126	-46.910	-14.000
127	-43.520	-14.000
128	-40.526	-14.000
129	-40.929	-14.000
130	-46.467	-14.000
131	-42.711	-14.000
132	-40.281	-14.000
133	-54.164	-14.000
134	-44.381	-14.000
135	-46.849	-14.000
136	-45.663	-14.000
137	-59.578	-14.000
138	-42.515	-14.000

139	-48.227	-14.000
140	-47.699	-14.000
141	-45.006	-14.000
142	-42.311	-14.000
143	-48.668	-14.000
144	-37.652	-14.000
145	-47.767	-14.000
146	-46.453	-14.000
147	-37.825	-14.000
148	-39.128	-14.000
149	-37.245	-14.000
150	-38.167	-14.000
151	-45.250	-14.000
152	-40.295	-14.000
153	-35.832	-14.000
154	-50.563	-14.000
155	-43.778	-14.000
156	-38.035	-14.000
157	-47.489	-14.000
158	-39.459	-14.000
159	-43.684	-14.000
160	-62.520	-14.000
161	-39.073	-14.000
162	-49.038	-14.000
163	-47.896	-14.000
164	-40.593	-14.000
165	-50.636	-14.000
166	-42.595	-14.000
167	-40.111	-14.000
168	-49.122	-14.000
169	-39.852	-14.000
170	-37.904	-14.000
171	-44.542	-14.000
172	-38.335	-14.000
173	-34.945	-14.000
174	-40.210	-14.000
175	-36.133	-14.000
176	-31.953	-14.000
177	-36.169	-14.000
178	-30.193	-14.000
179	-48.413	-14.000

1.1.2. Azimuth Pattern for Co-pol, Narrow Angle (-10°~10°)



-21.77dBW/4kHz Input power spectral density @ f=13.75GHz

▪ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2.1.2. Azimuth Pattern for Co-pol (-10°~10°)

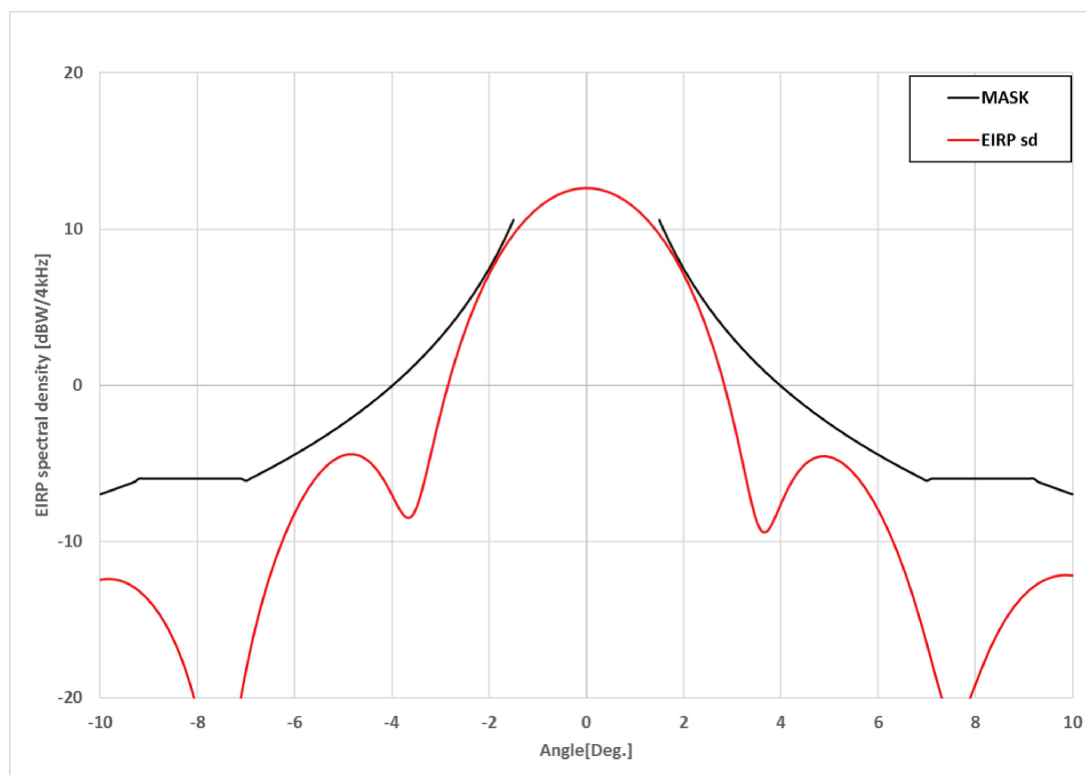
F=13.75GHz, -21.77dBW/4KHz EIRP sd					
-10	-12.494	-7.000	-6.2	-12.075	-4.810
-9.9	-12.515	-6.891	-6.1	-11.278	-4.633
-9.8	-12.571	-6.781	-6	-10.555	-4.454
-9.7	-12.663	-6.669	-5.9	-9.905	-4.271
-9.6	-12.787	-6.557	-5.8	-9.325	-4.086
-9.5	-12.946	-6.443	-5.7	-8.814	-3.897
-9.4	-13.137	-6.328	-5.6	-8.372	-3.705
-9.3	-13.360	-6.212	-5.5	-7.998	-3.509
-9.2	-13.615	-6.000	-5.4	-7.694	-3.310
-9.1	-13.900	-6.000	-5.3	-7.461	-3.107
-9	-14.217	-6.000	-5.2	-7.302	-2.900
-8.9	-14.561	-6.000	-5.1	-7.221	-2.689
-8.8	-14.934	-6.000	-5	-7.224	-2.474
-8.7	-15.335	-6.000	-4.9	-7.316	-2.255
-8.6	-15.761	-6.000	-4.8	-7.509	-2.031
-8.5	-16.214	-6.000	-4.7	-7.813	-1.802
-8.4	-16.693	-6.000	-4.6	-8.245	-1.569
-8.3	-17.199	-6.000	-4.5	-8.828	-1.330
-8.2	-17.734	-6.000	-4.4	-9.588	-1.086
-8.1	-18.303	-6.000	-4.3	-10.564	-0.837
-8	-18.910	-6.000	-4.2	-11.797	-0.581
-7.9	-19.558	-6.000	-4.1	-13.309	-0.320
-7.8	-20.249	-6.000	-4	-14.989	-0.051
-7.7	-20.975	-6.000	-3.9	-16.248	0.223
-7.6	-21.711	-6.000	-3.8	-15.914	0.505
-7.5	-22.395	-6.000	-3.7	-13.921	0.795
-7.4	-22.918	-6.000	-3.6	-11.430	1.092
-7.3	-23.123	-6.000	-3.5	-9.084	1.398
-7.2	-22.875	-6.000	-3.4	-7.013	1.713
-7.1	-22.162	-6.000	-3.3	-5.195	2.037
-7	-21.096	-6.127	-3.2	-3.591	2.371
-6.9	-19.851	-5.971	-3.1	-2.160	2.716
-6.8	-18.553	-5.813	-3	-0.872	3.072
-6.7	-17.281	-5.652	-2.9	0.296	3.440
-6.6	-16.075	-5.489	-2.8	1.363	3.821
-6.5	-14.948	-5.323	-2.7	2.342	4.216
-6.4	-13.907	-5.154	-2.6	3.244	4.626
-6.3	-12.950	-4.984	-2.5	4.078	5.051
			-2.4	4.851	5.495
			-2.3	5.568	5.957

-2.2	6.235	6.439
-2.1	6.855	6.945
-2	7.433	7.474
-1.9	7.970	8.031
-1.8	8.469	8.618
-1.7	8.932	9.239
-1.6	9.361	9.897
-1.5	9.759	10.598
-1.4	10.125	
-1.3	10.461	
-1.2	10.770	
-1.1	11.050	
-1	11.304	
-0.9	11.532	
-0.8	11.734	
-0.7	11.911	
-0.6	12.063	
-0.5	12.192	
-0.4	12.297	
-0.3	12.378	
-0.2	12.435	
-0.1	12.469	
0	12.480	
0.1	12.468	
0.2	12.432	
0.3	12.373	
0.4	12.290	
0.5	12.184	
0.6	12.054	
0.7	11.900	
0.8	11.722	
0.9	11.518	
1	11.289	
1.1	11.034	
1.2	10.753	
1.3	10.444	
1.4	10.107	
1.5	9.741	10.598
1.6	9.344	9.897
1.7	8.915	9.239

1.8	8.454	8.618
1.9	7.957	8.031
2	7.424	7.474
2.1	6.851	6.945
2.2	6.236	6.439
2.3	5.575	5.957
2.4	4.866	5.495
2.5	4.103	5.051
2.6	3.281	4.626
2.7	2.394	4.216
2.8	1.433	3.821
2.9	0.388	3.440
3	-0.753	3.072
3.1	-2.006	2.716
3.2	-3.394	2.371
3.3	-4.944	2.037
3.4	-6.688	1.713
3.5	-8.670	1.398
3.6	-10.910	1.092
3.7	-13.341	0.795
3.8	-15.522	0.505
3.9	-16.407	0.223
4	-15.573	-0.051
4.1	-14.007	-0.320
4.2	-12.479	-0.581
4.3	-11.203	-0.837
4.4	-10.184	-1.086
4.5	-9.387	-1.330
4.6	-8.776	-1.569
4.7	-8.320	-1.802
4.8	-7.995	-2.031
4.9	-7.785	-2.255
5	-7.675	-2.474
5.1	-7.657	-2.689
5.2	-7.720	-2.900
5.3	-7.860	-3.107
5.4	-8.072	-3.310
5.5	-8.353	-3.509
5.6	-8.699	-3.705
5.7	-9.111	-3.897

5.8	-9.586	-4.086
5.9	-10.126	-4.271
6	-10.732	-4.454
6.1	-11.405	-4.633
6.2	-12.148	-4.810
6.3	-12.965	-4.984
6.4	-13.858	-5.154
6.5	-14.833	-5.323
6.6	-15.892	-5.489
6.7	-17.036	-5.652
6.8	-18.259	-5.813
6.9	-19.546	-5.971
7	-20.854	-6.127
7.1	-22.097	-6.000
7.2	-23.142	-6.000
7.3	-23.804	-6.000
7.4	-23.974	-6.000
7.5	-23.678	-6.000
7.6	-23.060	-6.000
7.7	-22.283	-6.000
7.8	-21.453	-6.000
7.9	-20.631	-6.000
8	-19.842	-6.000
8.1	-19.097	-6.000
8.2	-18.396	-6.000
8.3	-17.741	-6.000
8.4	-17.127	-6.000
8.5	-16.555	-6.000
8.6	-16.023	-6.000
8.7	-15.529	-6.000
8.8	-15.075	-6.000
8.9	-14.659	-6.000
9	-14.282	-6.000
9.1	-13.942	-6.000
9.2	-13.639	-6.000
9.3	-13.374	-6.212
9.4	-13.146	-6.328
9.5	-12.954	-6.443
9.6	-12.800	-6.557
9.7	-12.683	-6.669
9.8	-12.604	-6.781
9.9	-12.563	-6.891
10	-12.560	-7.000

1.3.2. Azimuth Pattern for Co-pol, Narrow Angle (-10°~10°)



-21.77dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2.3.2. Azimuth Pattern for Co-pol (-10°~10°)

F=14.50GHz, -21.77dBW/4KHz EIRP sd		
-10	-12.438	-7.000
-9.9	-12.396	-6.891
-9.8	-12.389	-6.781
-9.7	-12.420	-6.669
-9.6	-12.487	-6.557
-9.5	-12.594	-6.443
-9.4	-12.740	-6.328
-9.3	-12.929	-6.212
-9.2	-13.161	-6.000
-9.1	-13.438	-6.000
-9	-13.764	-6.000
-8.9	-14.138	-6.000
-8.8	-14.567	-6.000
-8.7	-15.054	-6.000
-8.6	-15.605	-6.000
-8.5	-16.227	-6.000
-8.4	-16.930	-6.000
-8.3	-17.728	-6.000
-8.2	-18.636	-6.000
-8.1	-19.677	-6.000
-8	-20.875	-6.000
-7.9	-22.254	-6.000
-7.8	-23.808	-6.000
-7.7	-25.424	-6.000
-7.6	-26.683	-6.000
-7.5	-26.832	-6.000
-7.4	-25.614	-6.000
-7.3	-23.706	-6.000
-7.2	-21.720	-6.000
-7.1	-19.880	-6.000
-7	-18.230	-6.127
-6.9	-16.751	-5.971
-6.8	-15.422	-5.813
-6.7	-14.217	-5.652
-6.6	-13.120	-5.489
-6.5	-12.115	-5.323
-6.4	-11.192	-5.154
-6.3	-10.342	-4.984

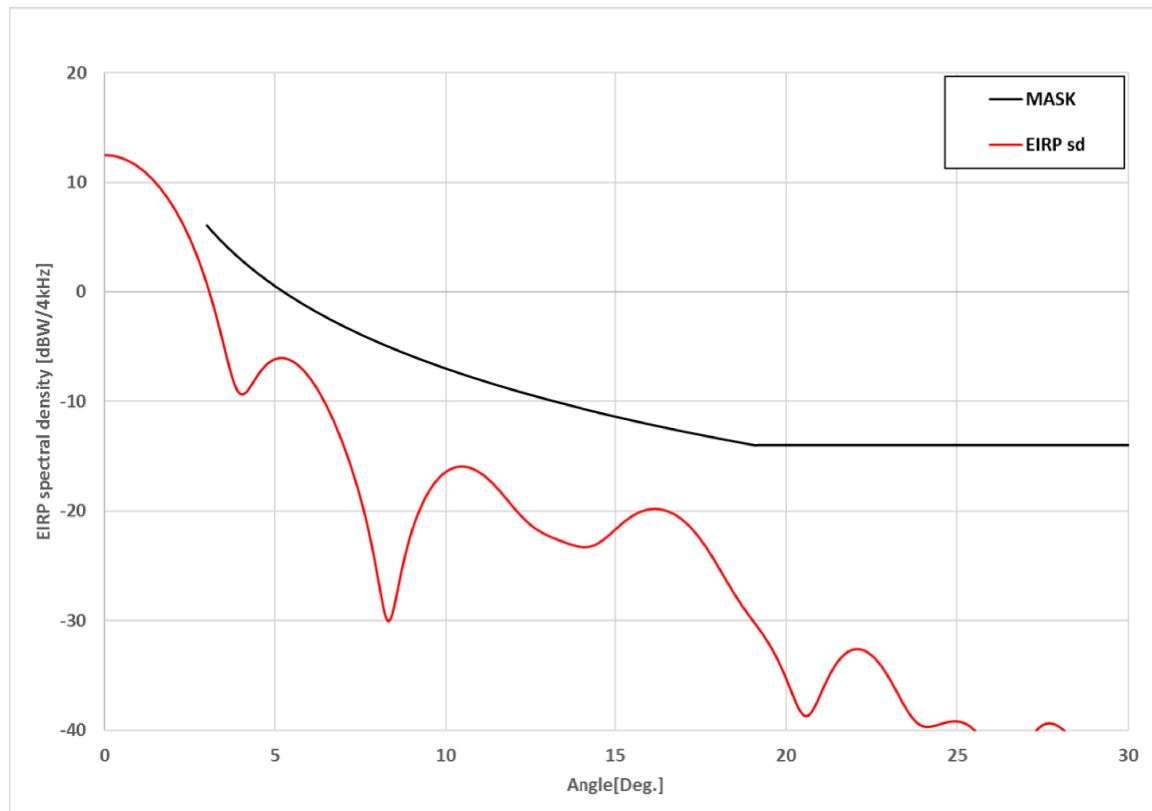
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-6.1	-8.837	-4.633
-6	-8.175	-4.454
-5.9	-7.568	-4.271
-5.8	-7.015	-4.086
-5.7	-6.516	-3.897
-5.6	-6.068	-3.705
-5.5	-5.673	-3.509
-5.4	-5.329	-3.310
-5.3	-5.037	-3.107
-5.2	-4.799	-2.900
-5.1	-4.616	-2.689
-5	-4.489	-2.474
-4.9	-4.421	-2.255
-4.8	-4.416	-2.031
-4.7	-4.475	-1.802
-4.6	-4.604	-1.569
-4.5	-4.808	-1.330
-4.4	-5.089	-1.086
-4.3	-5.453	-0.837
-4.2	-5.899	-0.581
-4.1	-6.424	-0.320
-4	-7.009	-0.051
-3.9	-7.609	0.223
-3.8	-8.139	0.505
-3.7	-8.456	0.795
-3.6	-8.400	1.092
-3.5	-7.876	1.398
-3.4	-6.936	1.713
-3.3	-5.733	2.037
-3.2	-4.418	2.371
-3.1	-3.094	2.716
-3	-1.818	3.072
-2.9	-0.612	3.440
-2.8	0.515	3.821
-2.7	1.565	4.216
-2.6	2.540	4.626
-2.5	3.446	5.051
-2.4	4.288	5.495
-2.3	5.071	5.957

-2.2	5.800	6.439
-2.1	6.478	6.945
-2	7.109	7.474
-1.9	7.696	8.031
-1.8	8.241	8.618
-1.7	8.747	9.239
-1.6	9.216	9.897
-1.5	9.649	10.598
-1.4	10.048	
-1.3	10.415	
-1.2	10.750	
-1.1	11.055	
-1	11.331	
-0.9	11.578	
-0.8	11.797	
-0.7	11.989	
-0.6	12.155	
-0.5	12.295	
-0.4	12.408	
-0.3	12.497	
-0.2	12.560	
-0.1	12.598	
0	12.611	
0.1	12.599	
0.2	12.562	
0.3	12.500	
0.4	12.412	
0.5	12.299	
0.6	12.159	
0.7	11.994	
0.8	11.801	
0.9	11.581	
1	11.334	
1.1	11.057	
1.2	10.752	
1.3	10.416	
1.4	10.048	
1.5	9.648	10.598
1.6	9.215	9.897
1.7	8.745	9.239

1.8	8.239	8.618
1.9	7.693	8.031
2	7.106	7.474
2.1	6.473	6.945
2.2	5.793	6.439
2.3	5.061	5.957
2.4	4.272	5.495
2.5	3.422	5.051
2.6	2.505	4.626
2.7	1.514	4.216
2.8	0.441	3.821
2.9	-0.718	3.440
3	-1.970	3.072
3.1	-3.314	2.716
3.2	-4.732	2.371
3.3	-6.181	2.037
3.4	-7.553	1.713
3.5	-8.667	1.398
3.6	-9.308	1.092
3.7	-9.375	0.795
3.8	-8.975	0.505
3.9	-8.326	0.223
4	-7.607	-0.051
4.1	-6.921	-0.320
4.2	-6.313	-0.581
4.3	-5.800	-0.837
4.4	-5.383	-1.086
4.5	-5.056	-1.330
4.6	-4.815	-1.569
4.7	-4.651	-1.802
4.8	-4.562	-2.031
4.9	-4.540	-2.255
5	-4.581	-2.474
5.1	-4.682	-2.689
5.2	-4.841	-2.900
5.3	-5.053	-3.107
5.4	-5.318	-3.310
5.5	-5.635	-3.509
5.6	-6.000	-3.705
5.7	-6.415	-3.897

5.8	-6.878	-4.086
5.9	-7.390	-4.271
6	-7.950	-4.454
6.1	-8.559	-4.633
6.2	-9.219	-4.810
6.3	-9.930	-4.984
6.4	-10.695	-5.154
6.5	-11.515	-5.323
6.6	-12.393	-5.489
6.7	-13.330	-5.652
6.8	-14.329	-5.813
6.9	-15.386	-5.971
7	-16.498	-6.127
7.1	-17.645	-6.000
7.2	-18.789	-6.000
7.3	-19.864	-6.000
7.4	-20.755	-6.000
7.5	-21.332	-6.000
7.6	-21.495	-6.000
7.7	-21.247	-6.000
7.8	-20.692	-6.000
7.9	-19.960	-6.000
8	-19.162	-6.000
8.1	-18.362	-6.000
8.2	-17.598	-6.000
8.3	-16.884	-6.000
8.4	-16.228	-6.000
8.5	-15.629	-6.000
8.6	-15.088	-6.000
8.7	-14.600	-6.000
8.8	-14.165	-6.000
8.9	-13.778	-6.000
9	-13.438	-6.000
9.1	-13.142	-6.000
9.2	-12.887	-6.000
9.3	-12.674	-6.212
9.4	-12.498	-6.328
9.5	-12.359	-6.443
9.6	-12.256	-6.557
9.7	-12.186	-6.669
9.8	-12.149	-6.781
9.9	-12.143	-6.891
10	-12.168	-7.000

1.1.4. Elevation Pattern for Co-pol, Narrow Angle (0°~30°)



-21.77dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

$18-25\log(\theta)$	dBW/4kHz	for	$3.0^\circ \leq \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2.1.4. Elevation Pattern for Co-pol (0°~30°)

F=13.75GHz, -21.77dBW/4KHz EIRP sd		
0	12.480	
0.1	12.469	
0.2	12.436	
0.3	12.381	
0.4	12.304	
0.5	12.205	
0.6	12.083	
0.7	11.939	
0.8	11.772	
0.9	11.581	
1	11.367	
1.1	11.129	
1.2	10.866	
1.3	10.578	
1.4	10.263	
1.5	9.923	
1.6	9.554	
1.7	9.157	
1.8	8.730	
1.9	8.274	
2	7.785	
2.1	7.261	
2.2	6.702	
2.3	6.105	
2.4	5.467	
2.5	4.785	
2.6	4.058	
2.7	3.281	
2.8	2.451	
2.9	1.563	
3	0.615	6.072
3.1	-0.398	5.716
3.2	-1.478	5.371
3.3	-2.623	5.037
3.4	-3.825	4.713
3.5	-5.066	4.398
3.6	-6.302	4.092
3.7	-7.460	3.795

3.8	-8.428	3.505
3.9	-9.085	3.223
4	-9.361	2.949
4.1	-9.280	2.680
4.2	-8.950	2.419
4.3	-8.492	2.163
4.4	-8.000	1.914
4.5	-7.530	1.670
4.6	-7.113	1.431
4.7	-6.762	1.198
4.8	-6.481	0.969
4.9	-6.271	0.745
5	-6.129	0.526
5.1	-6.052	0.311
5.2	-6.036	0.100
5.3	-6.080	-0.107
5.4	-6.179	-0.310
5.5	-6.331	-0.509
5.6	-6.535	-0.705
5.7	-6.788	-0.897
5.8	-7.088	-1.086
5.9	-7.434	-1.271
6	-7.824	-1.454
6.1	-8.258	-1.633
6.2	-8.735	-1.810
6.3	-9.254	-1.984
6.4	-9.814	-2.154
6.5	-10.415	-2.323
6.6	-11.056	-2.489
6.7	-11.738	-2.652
6.8	-12.461	-2.813
6.9	-13.226	-2.971
7	-14.034	-3.127
7.1	-14.889	-3.281
7.2	-15.795	-3.433
7.3	-16.757	-3.583
7.4	-17.782	-3.731
7.5	-18.881	-3.877
7.6	-20.067	-4.020
7.7	-21.357	-4.162
7.8	-22.766	-4.302
7.9	-24.312	-4.441

8	-25.989	-4.577
8.1	-27.720	-4.712
8.2	-29.252	-4.845
8.3	-30.050	-4.977
8.4	-29.713	-5.107
8.5	-28.505	-5.235
8.6	-26.988	-5.362
8.7	-25.494	-5.488
8.8	-24.136	-5.612
8.9	-22.932	-5.735
9	-21.873	-5.856
9.1	-20.942	-5.976
9.2	-20.122	-6.095
9.3	-19.403	-6.212
9.4	-18.770	-6.328
9.5	-18.218	-6.443
9.6	-17.737	-6.557
9.7	-17.322	-6.669
9.8	-16.970	-6.781
9.9	-16.674	-6.891
10	-16.433	-7.000
10.1	-16.243	-7.108
10.2	-16.102	-7.215
10.3	-16.008	-7.321
10.4	-15.958	-7.426
10.5	-15.952	-7.530
10.6	-15.987	-7.633
10.7	-16.062	-7.735
10.8	-16.175	-7.836
10.9	-16.326	-7.936
11	-16.512	-8.035
11.1	-16.732	-8.133
11.2	-16.983	-8.230
11.3	-17.264	-8.327
11.4	-17.571	-8.423
11.5	-17.901	-8.517
11.6	-18.250	-8.611
11.7	-18.614	-8.705

11.8	-18.985	-8.797
11.9	-19.359	-8.889
12	-19.729	-8.980
12.1	-20.088	-9.070
12.2	-20.431	-9.159
12.3	-20.752	-9.248
12.4	-21.047	-9.336
12.5	-21.313	-9.423
12.6	-21.551	-9.509
12.7	-21.762	-9.595
12.8	-21.948	-9.680
12.9	-22.113	-9.765
13	-22.262	-9.849
13.1	-22.399	-9.932
13.2	-22.528	-10.014
13.3	-22.651	-10.096
13.4	-22.771	-10.178
13.5	-22.887	-10.258
13.6	-22.999	-10.338
13.7	-23.102	-10.418
13.8	-23.193	-10.497
13.9	-23.264	-10.575
14	-23.309	-10.653
14.1	-23.322	-10.730
14.2	-23.295	-10.807
14.3	-23.224	-10.883
14.4	-23.106	-10.959
14.5	-22.944	-11.034
14.6	-22.741	-11.109
14.7	-22.504	-11.183
14.8	-22.243	-11.257
14.9	-21.967	-11.330
15	-21.685	-11.402
15.1	-21.408	-11.474
15.2	-21.139	-11.546
15.3	-20.888	-11.617
15.4	-20.658	-11.688
15.5	-20.451	-11.758
15.6	-20.273	-11.828
15.7	-20.123	-11.897
15.8	-20.002	-11.966
15.9	-19.911	-12.035

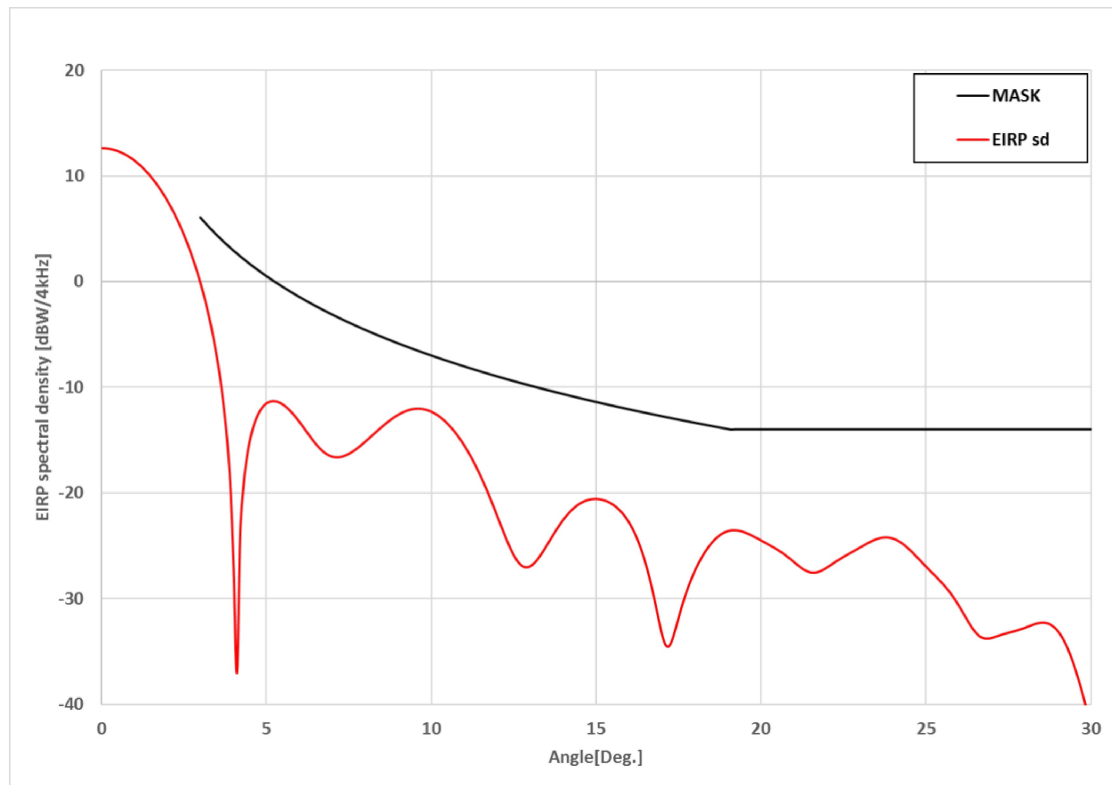
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16.2	-19.818	-12.238
16.3	-19.848	-12.305
16.4	-19.908	-12.371
16.5	-19.999	-12.437
16.6	-20.120	-12.503
16.7	-20.272	-12.568
16.8	-20.456	-12.633
16.9	-20.672	-12.697
17	-20.920	-12.761
17.1	-21.201	-12.825
17.2	-21.514	-12.888
17.3	-21.860	-12.951
17.4	-22.237	-13.014
17.5	-22.645	-13.076
17.6	-23.082	-13.138
17.7	-23.546	-13.199
17.8	-24.033	-13.261
17.9	-24.538	-13.321
18	-25.059	-13.382
18.1	-25.588	-13.442
18.2	-26.119	-13.502
18.3	-26.649	-13.561
18.4	-27.167	-13.620
18.5	-27.672	-13.679
18.6	-28.160	-13.738
18.7	-28.625	-13.796
18.8	-29.074	-13.854
18.9	-29.507	-13.912
19	-29.929	-13.969
19.1	-30.348	-14.026
19.2	-30.773	-14.000
19.3	-31.213	-14.000
19.4	-31.675	-14.000
19.5	-32.172	-14.000
19.6	-32.708	-14.000
19.7	-33.292	-14.000

19.8	-33.928	-14.000
19.9	-34.615	-14.000
20	-35.353	-14.000
20.1	-36.125	-14.000
20.2	-36.902	-14.000
20.3	-37.633	-14.000
20.4	-38.238	-14.000
20.5	-38.628	-14.000
20.6	-38.726	-14.000
20.7	-38.517	-14.000
20.8	-38.057	-14.000
20.9	-37.434	-14.000
21	-36.740	-14.000
21.1	-36.040	-14.000
21.2	-35.375	-14.000
21.3	-34.772	-14.000
21.4	-34.238	-14.000
21.5	-33.779	-14.000
21.6	-33.401	-14.000
21.7	-33.096	-14.000
21.8	-32.866	-14.000
21.9	-32.711	-14.000
22	-32.623	-14.000
22.1	-32.606	-14.000
22.2	-32.656	-14.000
22.3	-32.769	-14.000
22.4	-32.947	-14.000
22.5	-33.186	-14.000
22.6	-33.484	-14.000
22.7	-33.840	-14.000
22.8	-34.250	-14.000
22.9	-34.709	-14.000
23	-35.213	-14.000
23.1	-35.756	-14.000
23.2	-36.322	-14.000
23.3	-36.902	-14.000
23.4	-37.477	-14.000
23.5	-38.022	-14.000
23.6	-38.520	-14.000
23.7	-38.942	-14.000

23.8	-39.275	-14.000
23.9	-39.511	-14.000
24	-39.650	-14.000
24.1	-39.706	-14.000
24.2	-39.695	-14.000
24.3	-39.639	-14.000
24.4	-39.555	-14.000
24.5	-39.462	-14.000
24.6	-39.371	-14.000
24.7	-39.293	-14.000
24.8	-39.236	-14.000
24.9	-39.208	-14.000
25	-39.214	-14.000
25.1	-39.261	-14.000
25.2	-39.355	-14.000
25.3	-39.505	-14.000
25.4	-39.719	-14.000
25.5	-40.004	-14.000
25.6	-40.376	-14.000
25.7	-40.842	-14.000
25.8	-41.407	-14.000
25.9	-42.091	-14.000
26	-42.879	-14.000
26.1	-43.752	-14.000
26.2	-44.655	-14.000
26.3	-45.453	-14.000
26.4	-45.951	-14.000
26.5	-45.965	-14.000
26.6	-45.485	-14.000
26.7	-44.654	-14.000
26.8	-43.693	-14.000
26.9	-42.750	-14.000
27	-41.898	-14.000
27.1	-41.171	-14.000
27.2	-40.576	-14.000
27.3	-40.115	-14.000
27.4	-39.772	-14.000
27.5	-39.543	-14.000
27.6	-39.418	-14.000
27.7	-39.380	-14.000

27.8	-39.427	-14.000
27.9	-39.547	-14.000
28	-39.727	-14.000
28.1	-39.971	-14.000
28.2	-40.268	-14.000
28.3	-40.616	-14.000
28.4	-41.027	-14.000
28.5	-41.495	-14.000
28.6	-42.029	-14.000
28.7	-42.647	-14.000
28.8	-43.340	-14.000
28.9	-44.114	-14.000
29	-44.954	-14.000
29.1	-45.796	-14.000
29.2	-46.544	-14.000
29.3	-47.029	-14.000
29.4	-47.074	-14.000
29.5	-46.638	-14.000
29.6	-45.829	-14.000
29.7	-44.833	-14.000
29.8	-43.806	-14.000
29.9	-42.828	-14.000
30	-41.946	-14.000

1.3.4. Elevation Pattern for Co-pol, Narrow Angle (0°~30°)



-21.77dBW/4kHz Input power spectral density @ f=14.50GHz

▪ FCC EIRP spectral density regulation

18-25log(θ)	dBW/4kHz	for	$3.0^\circ \leq \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2.3.4. Elevation Pattern for Co-pol (0°~30°)

F=14.50GHz, -21.77dBW/4KHz EIRP sd		
0	12.613	
0.1	12.601	
0.2	12.566	
0.3	12.507	
0.4	12.424	
0.5	12.318	
0.6	12.188	
0.7	12.033	
0.8	11.854	
0.9	11.650	
1	11.421	
1.1	11.166	
1.2	10.885	
1.3	10.576	
1.4	10.240	
1.5	9.875	
1.6	9.480	
1.7	9.054	
1.8	8.596	
1.9	8.106	
2	7.581	
2.1	7.019	
2.2	6.418	
2.3	5.775	
2.4	5.089	
2.5	4.355	
2.6	3.569	
2.7	2.727	
2.8	1.821	
2.9	0.846	
3	-0.210	6.072
3.1	-1.359	5.716
3.2	-2.618	5.371
3.3	-4.009	5.037
3.4	-5.563	4.713
3.5	-7.329	4.398
3.6	-9.380	4.092
3.7	-11.842	3.795

3.8	-14.961	3.505
3.9	-19.311	3.223
4	-27.003	2.949
4.1	-37.060	2.680
4.2	-23.900	2.419
4.3	-19.323	2.163
4.4	-16.691	1.914
4.5	-14.951	1.670
4.6	-13.734	1.431
4.7	-12.861	1.198
4.8	-12.239	0.969
4.9	-11.807	0.745
5	-11.526	0.526
5.1	-11.370	0.311
5.2	-11.319	0.100
5.3	-11.357	-0.107
5.4	-11.473	-0.310
5.5	-11.657	-0.509
5.6	-11.901	-0.705
5.7	-12.196	-0.897
5.8	-12.535	-1.086
5.9	-12.911	-1.271
6	-13.315	-1.454
6.1	-13.738	-1.633
6.2	-14.170	-1.810
6.3	-14.601	-1.984
6.4	-15.017	-2.154
6.5	-15.406	-2.323
6.6	-15.757	-2.489
6.7	-16.056	-2.652
6.8	-16.298	-2.813
6.9	-16.476	-2.971
7	-16.590	-3.127
7.1	-16.639	-3.281
7.2	-16.629	-3.433
7.3	-16.566	-3.583
7.4	-16.455	-3.731
7.5	-16.303	-3.877
7.6	-16.117	-4.020
7.7	-15.903	-4.162

7.8	-15.665	-4.302
7.9	-15.410	-4.441
8	-15.141	-4.577
8.1	-14.865	-4.712
8.2	-14.585	-4.845
8.3	-14.304	-4.977
8.4	-14.026	-5.107
8.5	-13.755	-5.235
8.6	-13.493	-5.362
8.7	-13.244	-5.488
8.8	-13.012	-5.612
8.9	-12.797	-5.735
9	-12.605	-5.856
9.1	-12.437	-5.976
9.2	-12.295	-6.095
9.3	-12.183	-6.212
9.4	-12.101	-6.328
9.5	-12.053	-6.443
9.6	-12.037	-6.557
9.7	-12.057	-6.669
9.8	-12.112	-6.781
9.9	-12.202	-6.891
10	-12.329	-7.000
10.1	-12.491	-7.108
10.2	-12.690	-7.215
10.3	-12.924	-7.321
10.4	-13.194	-7.426
10.5	-13.498	-7.530
10.6	-13.837	-7.633
10.7	-14.211	-7.735
10.8	-14.620	-7.836
10.9	-15.063	-7.936
11	-15.541	-8.035
11.1	-16.055	-8.133
11.2	-16.605	-8.230
11.3	-17.191	-8.327
11.4	-17.813	-8.423
11.5	-18.472	-8.517
11.6	-19.166	-8.611
11.7	-19.894	-8.705

11.8	-20.653	-8.797
11.9	-21.435	-8.889
12	-22.234	-8.980
12.1	-23.038	-9.070
12.2	-23.832	-9.159
12.3	-24.596	-9.248
12.4	-25.302	-9.336
12.5	-25.924	-9.423
12.6	-26.429	-9.509
12.7	-26.796	-9.595
12.8	-27.006	-9.680
12.9	-27.055	-9.765
13	-26.954	-9.849
13.1	-26.719	-9.932
13.2	-26.380	-10.014
13.3	-25.959	-10.096
13.4	-25.485	-10.178
13.5	-24.981	-10.258
13.6	-24.464	-10.338
13.7	-23.952	-10.418
13.8	-23.457	-10.497
13.9	-22.988	-10.575
14	-22.553	-10.653
14.1	-22.159	-10.730
14.2	-21.807	-10.807
14.3	-21.501	-10.883
14.4	-21.241	-10.959
14.5	-21.026	-11.034
14.6	-20.856	-11.109
14.7	-20.729	-11.183
14.8	-20.643	-11.257
14.9	-20.596	-11.330
15	-20.587	-11.402
15.1	-20.615	-11.474
15.2	-20.680	-11.546
15.3	-20.781	-11.617
15.4	-20.922	-11.688
15.5	-21.105	-11.758
15.6	-21.334	-11.828
15.7	-21.615	-11.897

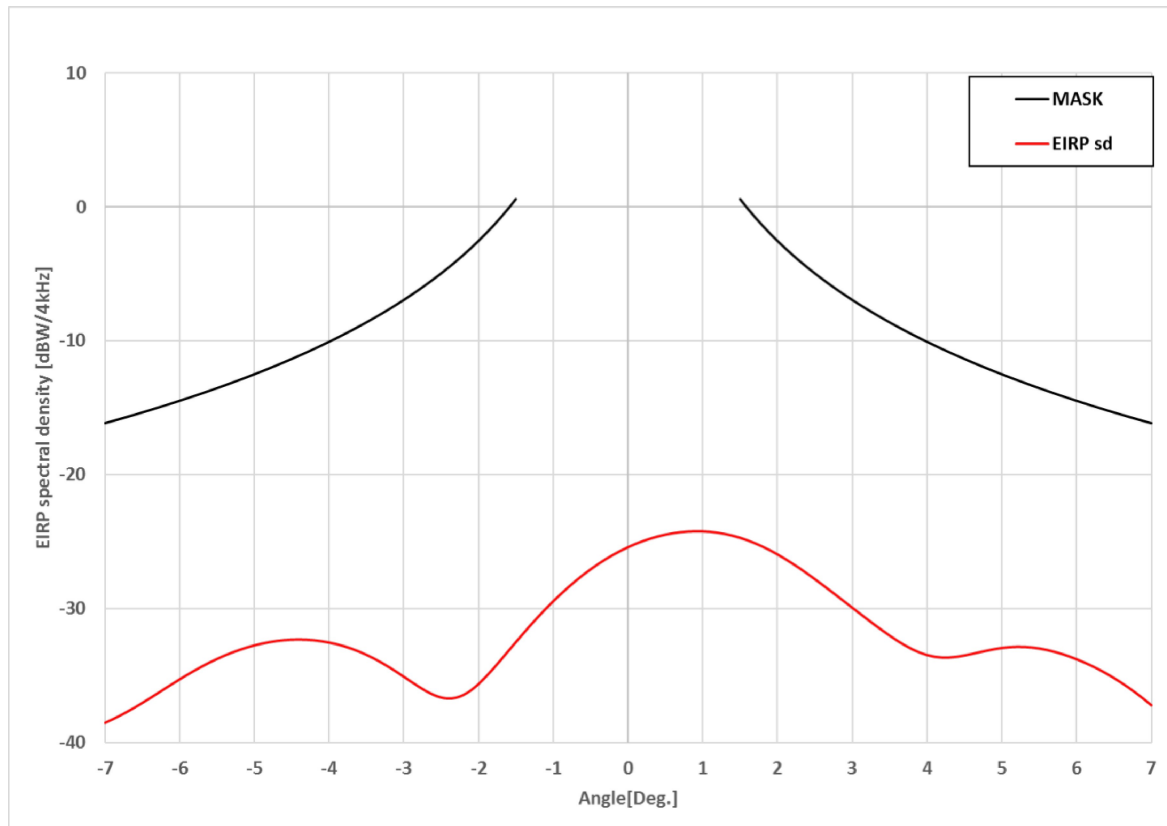
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15.9	-22.358	-12.035
16	-22.838	-12.103
16.1	-23.399	-12.171
16.2	-24.058	-12.238
16.3	-24.822	-12.305
16.4	-25.703	-12.371
16.5	-26.719	-12.437
16.6	-27.875	-12.503
16.7	-29.177	-12.568
16.8	-30.610	-12.633
16.9	-32.101	-12.697
17	-33.470	-12.761
17.1	-34.391	-12.825
17.2	-34.544	-12.888
17.3	-33.952	-12.951
17.4	-32.940	-13.014
17.5	-31.815	-13.076
17.6	-30.727	-13.138
17.7	-29.734	-13.199
17.8	-28.842	-13.261
17.9	-28.044	-13.321
18	-27.329	-13.382
18.1	-26.689	-13.442
18.2	-26.114	-13.502
18.3	-25.601	-13.561
18.4	-25.147	-13.620
18.5	-24.750	-13.679
18.6	-24.411	-13.738
18.7	-24.128	-13.796
18.8	-23.902	-13.854
18.9	-23.733	-13.912
19	-23.617	-13.969
19.1	-23.554	-14.026
19.2	-23.541	-14.000
19.3	-23.571	-14.000
19.4	-23.640	-14.000
19.5	-23.743	-14.000
19.6	-23.871	-14.000
19.7	-24.017	-14.000

19.8	-24.178	-14.000
19.9	-24.344	-14.000
20	-24.514	-14.000
20.1	-24.686	-14.000
20.2	-24.856	-14.000
20.3	-25.031	-14.000
20.4	-25.209	-14.000
20.5	-25.397	-14.000
20.6	-25.599	-14.000
20.7	-25.816	-14.000
20.8	-26.050	-14.000
20.9	-26.301	-14.000
21	-26.560	-14.000
21.1	-26.819	-14.000
21.2	-27.065	-14.000
21.3	-27.277	-14.000
21.4	-27.441	-14.000
21.5	-27.541	-14.000
21.6	-27.568	-14.000
21.7	-27.524	-14.000
21.8	-27.415	-14.000
21.9	-27.259	-14.000
22	-27.070	-14.000
22.1	-26.864	-14.000
22.2	-26.656	-14.000
22.3	-26.451	-14.000
22.4	-26.255	-14.000
22.5	-26.067	-14.000
22.6	-25.886	-14.000
22.7	-25.709	-14.000
22.8	-25.534	-14.000
22.9	-25.357	-14.000
23	-25.178	-14.000
23.1	-25.001	-14.000
23.2	-24.825	-14.000
23.3	-24.660	-14.000
23.4	-24.512	-14.000
23.5	-24.386	-14.000
23.6	-24.291	-14.000
23.7	-24.236	-14.000

23.8	-24.220	-14.000
23.9	-24.252	-14.000
24	-24.332	-14.000
24.1	-24.457	-14.000
24.2	-24.631	-14.000
24.3	-24.846	-14.000
24.4	-25.098	-14.000
24.5	-25.380	-14.000
24.6	-25.686	-14.000
24.7	-26.005	-14.000
24.8	-26.332	-14.000
24.9	-26.661	-14.000
25	-26.984	-14.000
25.1	-27.304	-14.000
25.2	-27.619	-14.000
25.3	-27.933	-14.000
25.4	-28.254	-14.000
25.5	-28.588	-14.000
25.6	-28.943	-14.000
25.7	-29.329	-14.000
25.8	-29.752	-14.000
25.9	-30.209	-14.000
26	-30.709	-14.000
26.1	-31.235	-14.000
26.2	-31.774	-14.000
26.3	-32.306	-14.000
26.4	-32.794	-14.000
26.5	-33.208	-14.000
26.6	-33.521	-14.000
26.7	-33.717	-14.000
26.8	-33.804	-14.000
26.9	-33.800	-14.000
27	-33.735	-14.000
27.1	-33.640	-14.000
27.2	-33.532	-14.000
27.3	-33.428	-14.000
27.4	-33.334	-14.000
27.5	-33.249	-14.000
27.6	-33.166	-14.000
27.7	-33.085	-14.000

27.8	-32.996	-14.000
27.9	-32.893	-14.000
28	-32.784	-14.000
28.1	-32.661	-14.000
28.2	-32.539	-14.000
28.3	-32.429	-14.000
28.4	-32.342	-14.000
28.5	-32.292	-14.000
28.6	-32.298	-14.000
28.7	-32.372	-14.000
28.8	-32.520	-14.000
28.9	-32.767	-14.000
29	-33.109	-14.000
29.1	-33.552	-14.000
29.2	-34.115	-14.000
29.3	-34.784	-14.000
29.4	-35.563	-14.000
29.5	-36.455	-14.000
29.6	-37.442	-14.000
29.7	-38.520	-14.000
29.8	-39.671	-14.000
29.9	-40.861	-14.000
30	-42.049	-14.000

1.1.3. Azimuth Pattern for Cross-pol, Narrow angle (-7°~7°)



-21.77dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^\circ \leq \theta \leq 7.0^\circ$$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

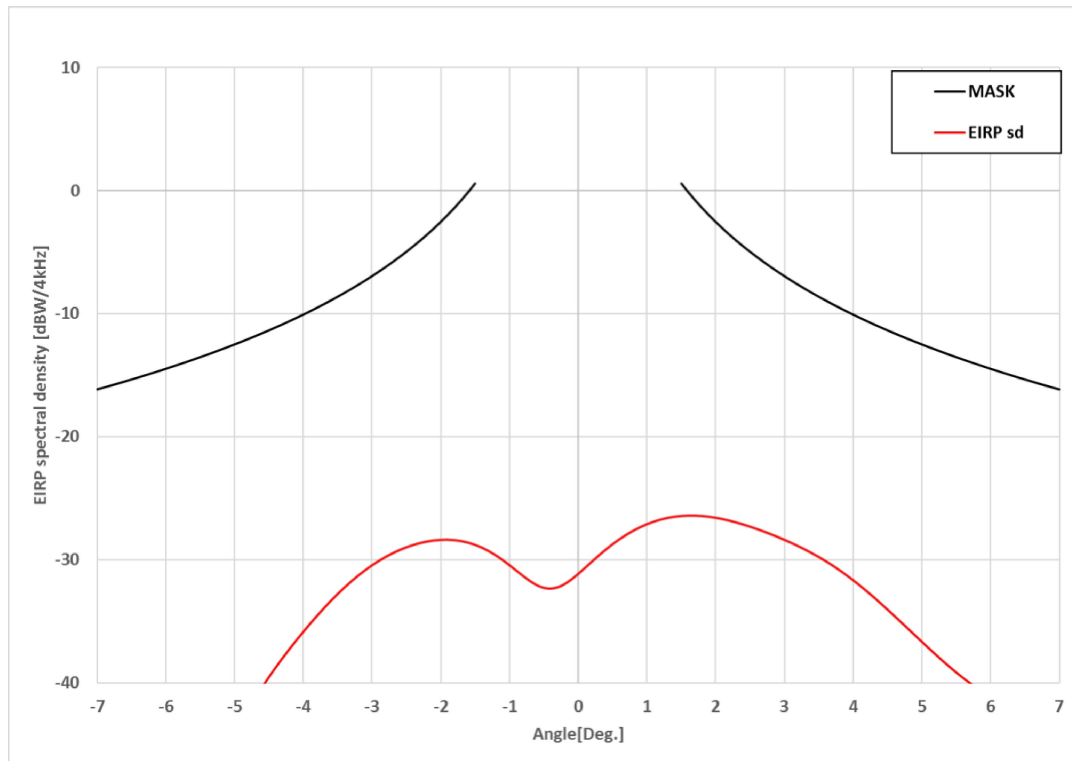
2.1.3. Azimuth Pattern for Cross-pol ($-7^{\circ}\sim 7^{\circ}$)

F=13.75GHz, -21.77dBW/4KHz EIRP sd					
-7	-38.556	-16.127	-3.2	-34.376	-7.629
-6.9	-38.299	-15.971	-3.1	-34.730	-7.284
-6.8	-38.020	-15.813	-3	-35.101	-6.928
-6.7	-37.720	-15.652	-2.9	-35.478	-6.560
-6.6	-37.403	-15.489	-2.8	-35.845	-6.179
-6.5	-37.067	-15.323	-2.7	-36.181	-5.784
-6.4	-36.721	-15.154	-2.6	-36.461	-5.374
-6.3	-36.367	-14.984	-2.5	-36.653	-4.949
-6.2	-36.010	-14.810	-2.4	-36.730	-4.505
-6.1	-35.655	-14.633	-2.3	-36.669	-4.043
-6	-35.306	-14.454	-2.2	-36.462	-3.561
-5.9	-34.968	-14.271	-2.1	-36.117	-3.055
-5.8	-34.645	-14.086	-2	-35.654	-2.526
-5.7	-34.337	-13.897	-1.9	-35.103	-1.969
-5.6	-34.048	-13.705	-1.8	-34.491	-1.382
-5.5	-33.781	-13.509	-1.7	-33.844	-0.761
-5.4	-33.532	-13.310	-1.6	-33.183	-0.103
-5.3	-33.307	-13.107	-1.5	-32.521	0.598
-5.2	-33.104	-12.900	-1.4	-31.869	
-5.1	-32.922	-12.689	-1.3	-31.233	
-5	-32.765	-12.474	-1.2	-30.619	
-4.9	-32.630	-12.255	-1.1	-30.029	
-4.8	-32.520	-12.031	-1	-29.466	
-4.7	-32.434	-11.802	-0.9	-28.930	
-4.6	-32.372	-11.569	-0.8	-28.422	
-4.5	-32.336	-11.330	-0.7	-27.943	
-4.4	-32.325	-11.086	-0.6	-27.494	
-4.3	-32.341	-10.837	-0.5	-27.075	
-4.2	-32.382	-10.581	-0.4	-26.685	
-4.1	-32.451	-10.320	-0.3	-26.325	
-4	-32.547	-10.051	-0.2	-25.995	
-3.9	-32.671	-9.777	-0.1	-25.694	
-3.8	-32.824	-9.495	0	-25.422	
-3.7	-33.007	-9.205	0.1	-25.179	
-3.6	-33.221	-8.908	0.2	-24.964	
-3.5	-33.465	-8.602	0.3	-24.776	
-3.4	-33.740	-8.287	0.4	-24.617	
-3.3	-34.045	-7.963	0.5	-24.485	
			0.6	-24.380	
			0.7	-24.303	

0.8	-24.253	
0.9	-24.231	
1	-24.238	
1.1	-24.274	
1.2	-24.340	
1.3	-24.436	
1.4	-24.563	
1.5	-24.720	0.598
1.6	-24.909	-0.103
1.7	-25.129	-0.761
1.8	-25.378	-1.382
1.9	-25.655	-1.969
2	-25.959	-2.526
2.1	-26.289	-3.055
2.2	-26.642	-3.561
2.3	-27.016	-4.043
2.4	-27.406	-4.505
2.5	-27.812	-4.949
2.6	-28.228	-5.374
2.7	-28.652	-5.784
2.8	-29.081	-6.179
2.9	-29.513	-6.560
3	-29.947	-6.928
3.1	-30.378	-7.284
3.2	-30.805	-7.629
3.3	-31.226	-7.963
3.4	-31.638	-8.287
3.5	-32.033	-8.602
3.6	-32.407	-8.908
3.7	-32.749	-9.205
3.8	-33.050	-9.495
3.9	-33.300	-9.777
4	-33.490	-10.051
4.1	-33.614	-10.320
4.2	-33.672	-10.581
4.3	-33.668	-10.837
4.4	-33.613	-11.086
4.5	-33.520	-11.330
4.6	-33.403	-11.569
4.7	-33.276	-11.802
4.8	-33.154	-12.031
4.9	-33.046	-12.255

5	-32.959	-12.474
5.1	-32.901	-12.689
5.2	-32.875	-12.900
5.3	-32.882	-13.107
5.4	-32.923	-13.310
5.5	-32.996	-13.509
5.6	-33.102	-13.705
5.7	-33.237	-13.897
5.8	-33.399	-14.086
5.9	-33.587	-14.271
6	-33.799	-14.454
6.1	-34.034	-14.633
6.2	-34.291	-14.810
6.3	-34.571	-14.984
6.4	-34.875	-15.154
6.5	-35.204	-15.323
6.6	-35.558	-15.489
6.7	-35.939	-15.652
6.8	-36.346	-15.813
6.9	-36.779	-15.971
7	-37.236	-16.127

1.3.3. Azimuth Pattern for Cross-pol, Narrow angle (-7°~7°)



-21.77dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^\circ \leq \theta \leq 7.0^\circ$$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

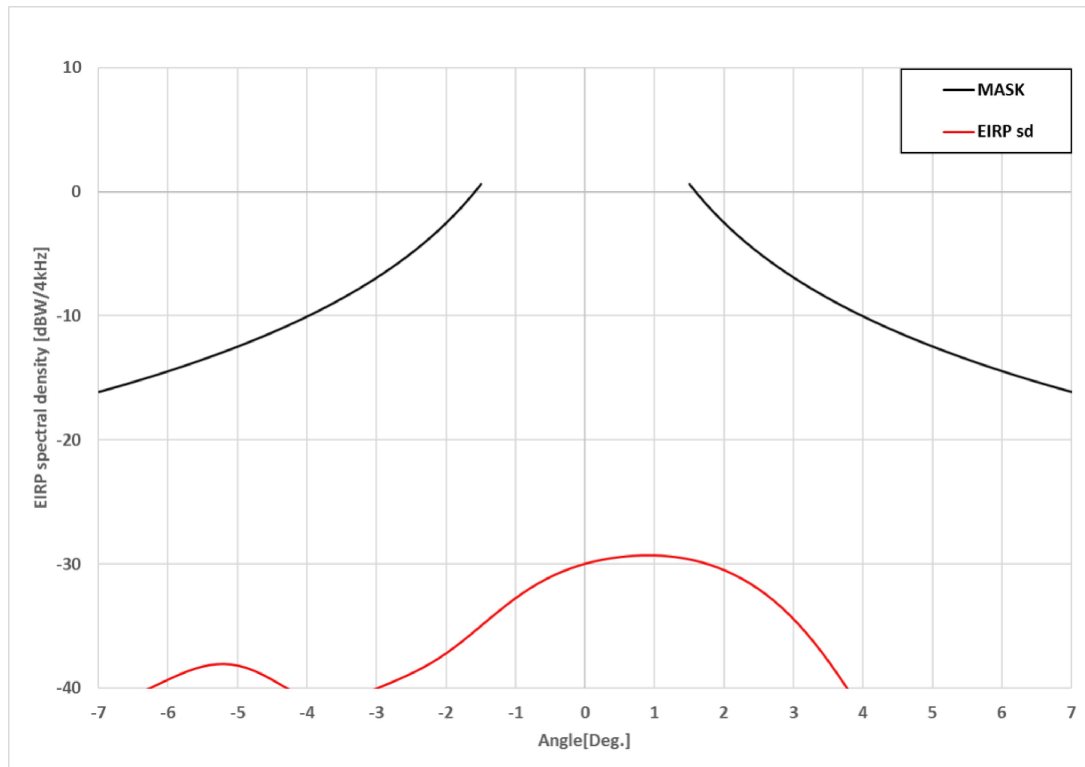
2.3.3. Azimuth Pattern for Cross-pol ($-7^{\circ}\sim 7^{\circ}$)

F=14.50GHz, -21.77dBW/4KHz EIRP sd					
-7	-47.303	-16.127	-3.2	-31.283	-7.629
-6.9	-47.453	-15.971	-3.1	-30.850	-7.284
-6.8	-47.729	-15.813	-3	-30.451	-6.928
-6.7	-48.149	-15.652	-2.9	-30.089	-6.560
-6.6	-48.729	-15.489	-2.8	-29.761	-6.179
-6.5	-49.490	-15.323	-2.7	-29.468	-5.784
-6.4	-50.466	-15.154	-2.6	-29.209	-5.374
-6.3	-51.700	-14.984	-2.5	-28.984	-4.949
-6.2	-53.261	-14.810	-2.4	-28.793	-4.505
-6.1	-55.230	-14.633	-2.3	-28.636	-4.043
-6	-57.644	-14.454	-2.2	-28.514	-3.561
-5.9	-60.009	-14.271	-2.1	-28.427	-3.055
-5.8	-60.284	-14.086	-2	-28.377	-2.526
-5.7	-57.869	-13.897	-1.9	-28.368	-1.969
-5.6	-54.960	-13.705	-1.8	-28.400	-1.382
-5.5	-52.433	-13.509	-1.7	-28.478	-0.761
-5.4	-50.316	-13.310	-1.6	-28.604	-0.103
-5.3	-48.517	-13.107	-1.5	-28.782	0.598
-5.2	-46.960	-12.900	-1.4	-29.012	
-5.1	-45.586	-12.689	-1.3	-29.296	
-5	-44.356	-12.474	-1.2	-29.631	
-4.9	-43.241	-12.255	-1.1	-30.014	
-4.8	-42.218	-12.031	-1	-30.437	
-4.7	-41.270	-11.802	-0.9	-30.881	
-4.6	-40.383	-11.569	-0.8	-31.326	
-4.5	-39.547	-11.330	-0.7	-31.735	
-4.4	-38.753	-11.086	-0.6	-32.067	
-4.3	-37.992	-10.837	-0.5	-32.281	
-4.2	-37.260	-10.581	-0.4	-32.342	
-4.1	-36.551	-10.320	-0.3	-32.238	
-4	-35.866	-10.051	-0.2	-31.982	
-3.9	-35.202	-9.777	-0.1	-31.606	
-3.8	-34.560	-9.495	0	-31.150	
-3.7	-33.942	-9.205	0.1	-30.653	
-3.6	-33.350	-8.908	0.2	-30.145	
-3.5	-32.786	-8.602	0.3	-29.647	
-3.4	-32.253	-8.287	0.4	-29.173	
-3.3	-31.751	-7.963	0.5	-28.732	
			0.6	-28.328	
			0.7	-27.963	

0.8	-27.637	
0.9	-27.352	
1	-27.106	
1.1	-26.898	
1.2	-26.728	
1.3	-26.596	
1.4	-26.499	
1.5	-26.436	0.598
1.6	-26.407	-0.103
1.7	-26.409	-0.761
1.8	-26.440	-1.382
1.9	-26.499	-1.969
2	-26.583	-2.526
2.1	-26.690	-3.055
2.2	-26.818	-3.561
2.3	-26.965	-4.043
2.4	-27.128	-4.505
2.5	-27.306	-4.949
2.6	-27.498	-5.374
2.7	-27.700	-5.784
2.8	-27.914	-6.179
2.9	-28.139	-6.560
3	-28.376	-6.928
3.1	-28.625	-7.284
3.2	-28.888	-7.629
3.3	-29.165	-7.963
3.4	-29.461	-8.287
3.5	-29.774	-8.602
3.6	-30.109	-8.908
3.7	-30.464	-9.205
3.8	-30.842	-9.495
3.9	-31.242	-9.777
4	-31.663	-10.051
4.1	-32.106	-10.320
4.2	-32.569	-10.581
4.3	-33.049	-10.837
4.4	-33.545	-11.086
4.5	-34.053	-11.330
4.6	-34.570	-11.569
4.7	-35.094	-11.802

4.8	-35.621	-12.031
4.9	-36.150	-12.255
5	-36.676	-12.474
5.1	-37.198	-12.689
5.2	-37.711	-12.900
5.3	-38.214	-13.107
5.4	-38.702	-13.310
5.5	-39.171	-13.509
5.6	-39.616	-13.705
5.7	-40.033	-13.897
5.8	-40.418	-14.086
5.9	-40.768	-14.271
6	-41.080	-14.454
6.1	-41.359	-14.633
6.2	-41.603	-14.810
6.3	-41.824	-14.984
6.4	-42.028	-15.154
6.5	-42.225	-15.323
6.6	-42.430	-15.489
6.7	-42.656	-15.652
6.8	-42.913	-15.813
6.9	-43.219	-15.971
7	-43.579	-16.127

1.1.5. Elevation Pattern for Cross-pol, Narrow angle (-7°~7°)



-21.77dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^\circ \leq \theta \leq 7.0^\circ$$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2.1.5. Elevation Pattern for Cross-pol ($-7^{\circ}\sim 7^{\circ}$)

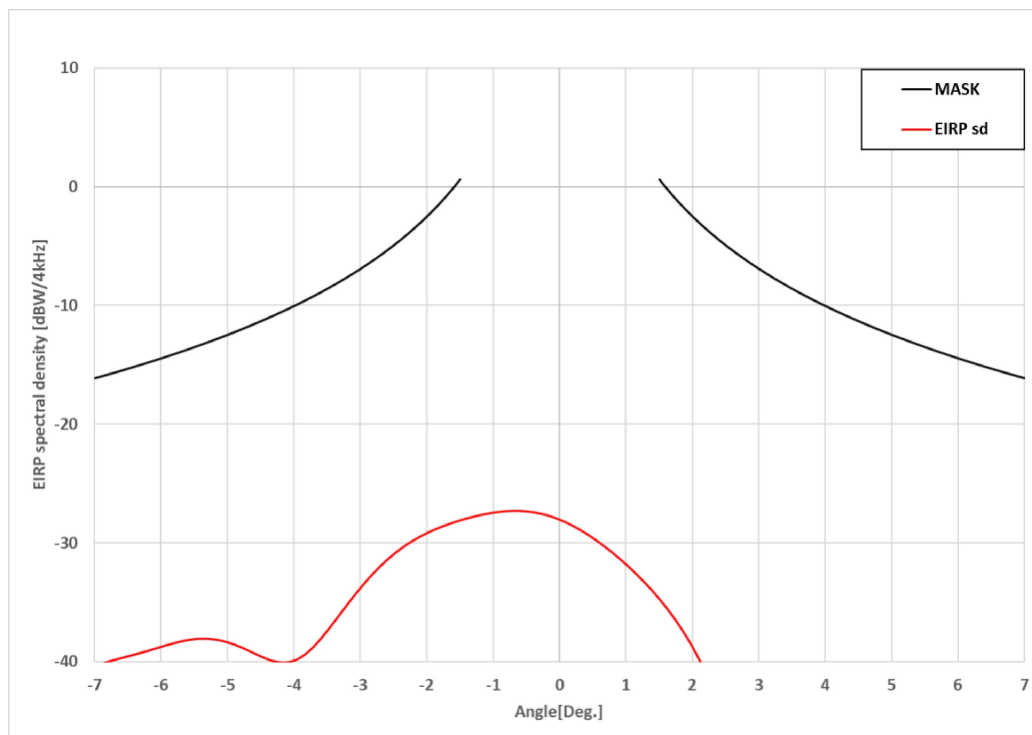
F=13.75GHz, -21.77dBW/4KHz EIRP sd		
-7	-41.907	-16.127
-6.9	-41.652	-15.971
-6.8	-41.395	-15.813
-6.7	-41.137	-15.652
-6.6	-40.877	-15.489
-6.5	-40.617	-15.323
-6.4	-40.357	-15.154
-6.3	-40.091	-14.984
-6.2	-39.826	-14.810
-6.1	-39.560	-14.633
-6	-39.296	-14.454
-5.9	-39.042	-14.271
-5.8	-38.801	-14.086
-5.7	-38.583	-13.897
-5.6	-38.393	-13.705
-5.5	-38.239	-13.509
-5.4	-38.124	-13.310
-5.3	-38.060	-13.107
-5.2	-38.043	-12.900
-5.1	-38.080	-12.689
-5	-38.172	-12.474
-4.9	-38.313	-12.255
-4.8	-38.509	-12.031
-4.7	-38.747	-11.802
-4.6	-39.024	-11.569
-4.5	-39.331	-11.330
-4.4	-39.654	-11.086
-4.3	-39.979	-10.837
-4.2	-40.293	-10.581
-4.1	-40.574	-10.320
-4	-40.808	-10.051
-3.9	-40.986	-9.777
-3.8	-41.088	-9.495
-3.7	-41.122	-9.205
-3.6	-41.087	-8.908
-3.5	-40.990	-8.602
-3.4	-40.848	-8.287
-3.3	-40.669	-7.963

-3.2	-40.465	-7.629
-3.1	-40.248	-7.284
-3	-40.022	-6.928
-2.9	-39.789	-6.560
-2.8	-39.556	-6.179
-2.7	-39.313	-5.784
-2.6	-39.064	-5.374
-2.5	-38.802	-4.949
-2.4	-38.523	-4.505
-2.3	-38.224	-4.043
-2.2	-37.901	-3.561
-2.1	-37.550	-3.055
-2	-37.173	-2.526
-1.9	-36.770	-1.969
-1.8	-36.342	-1.382
-1.7	-35.897	-0.761
-1.6	-35.435	-0.103
-1.5	-34.967	0.598
-1.4	-34.497	
-1.3	-34.032	
-1.2	-33.579	
-1.1	-33.141	
-1	-32.723	
-0.9	-32.329	
-0.8	-31.960	
-0.7	-31.617	
-0.6	-31.302	
-0.5	-31.014	
-0.4	-30.754	
-0.3	-30.519	
-0.2	-30.308	
-0.1	-30.121	
0	-29.956	
0.1	-29.812	
0.2	-29.687	
0.3	-29.580	
0.4	-29.490	
0.5	-29.416	
0.6	-29.359	
0.7	-29.317	

0.8	-29.291	
0.9	-29.282	
1	-29.289	
1.1	-29.314	
1.2	-29.358	
1.3	-29.420	
1.4	-29.503	
1.5	-29.607	0.598
1.6	-29.733	-0.103
1.7	-29.883	-0.761
1.8	-30.055	-1.382
1.9	-30.253	-1.969
2	-30.476	-2.526
2.1	-30.727	-3.055
2.2	-31.005	-3.561
2.3	-31.314	-4.043
2.4	-31.654	-4.505
2.5	-32.027	-4.949
2.6	-32.434	-5.374
2.7	-32.877	-5.784
2.8	-33.358	-6.179
2.9	-33.878	-6.560
3	-34.437	-6.928
3.1	-35.037	-7.284
3.2	-35.677	-7.629
3.3	-36.357	-7.963
3.4	-37.076	-8.287
3.5	-37.832	-8.602
3.6	-38.622	-8.908
3.7	-39.442	-9.205
3.8	-40.284	-9.495
3.9	-41.140	-9.777
4	-42.001	-10.051
4.1	-42.843	-10.320
4.2	-43.650	-10.581
4.3	-44.384	-10.837
4.4	-45.011	-11.086
4.5	-45.494	-11.330
4.6	-45.795	-11.569
4.7	-45.910	-11.802

4.8	-45.851	-12.031
4.9	-45.657	-12.255
5	-45.379	-12.474
5.1	-45.067	-12.689
5.2	-44.759	-12.900
5.3	-44.495	-13.107
5.4	-44.287	-13.310
5.5	-44.154	-13.509
5.6	-44.104	-13.705
5.7	-44.129	-13.897
5.8	-44.234	-14.086
5.9	-44.400	-14.271
6	-44.611	-14.454
6.1	-44.844	-14.633
6.2	-45.070	-14.810
6.3	-45.246	-14.984
6.4	-45.354	-15.154
6.5	-45.364	-15.323
6.6	-45.272	-15.489
6.7	-45.095	-15.652
6.8	-44.847	-15.813
6.9	-44.562	-15.971
7	-44.270	-16.127

1.3.5. Elevation Pattern for Cross-pol, Narrow angle (-7°~7°)



-21.77dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^\circ \leq \theta \leq 7.0^\circ$$

The v45's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.77 dBW/ 4kHz

2.3.5. Elevation Pattern for Cross-pol ($-7^{\circ}\sim 7^{\circ}$)

F=14.50GHz, -21.77dBW/4KHz EIRP sd					
-7	-40.379	-16.127	-3.2	-35.214	-7.629
-6.9	-40.186	-15.971	-3.1	-34.492	-7.284
-6.8	-40.011	-15.813	-3	-33.800	-6.928
-6.7	-39.852	-15.652	-2.9	-33.144	-6.560
-6.6	-39.703	-15.489	-2.8	-32.530	-6.179
-6.5	-39.557	-15.323	-2.7	-31.961	-5.784
-6.4	-39.409	-15.154	-2.6	-31.438	-5.374
-6.3	-39.257	-14.984	-2.5	-30.961	-4.949
-6.2	-39.096	-14.810	-2.4	-30.529	-4.505
-6.1	-38.930	-14.633	-2.3	-30.137	-4.043
-6	-38.761	-14.454	-2.2	-29.786	-3.561
-5.9	-38.594	-14.271	-2.1	-29.469	-3.055
-5.8	-38.439	-14.086	-2	-29.185	-2.526
-5.7	-38.301	-13.897	-1.9	-28.928	-1.969
-5.6	-38.190	-13.705	-1.8	-28.695	-1.382
-5.5	-38.112	-13.509	-1.7	-28.483	-0.761
-5.4	-38.074	-13.310	-1.6	-28.290	-0.103
-5.3	-38.080	-13.107	-1.5	-28.112	0.598
-5.2	-38.133	-12.900	-1.4	-27.951	
-5.1	-38.233	-12.689	-1.3	-27.804	
-5	-38.381	-12.474	-1.2	-27.672	
-4.9	-38.569	-12.255	-1.1	-27.558	
-4.8	-38.795	-12.031	-1	-27.462	
-4.7	-39.045	-11.802	-0.9	-27.388	
-4.6	-39.308	-11.569	-0.8	-27.337	
-4.5	-39.567	-11.330	-0.7	-27.313	
-4.4	-39.797	-11.086	-0.6	-27.319	
-4.3	-39.975	-10.837	-0.5	-27.356	
-4.2	-40.072	-10.581	-0.4	-27.426	
-4.1	-40.061	-10.320	-0.3	-27.531	
-4	-39.924	-10.051	-0.2	-27.670	
-3.9	-39.650	-9.777	-0.1	-27.847	
-3.8	-39.243	-9.495	0	-28.058	
-3.7	-38.721	-9.205	0.1	-28.303	
-3.6	-38.101	-8.908	0.2	-28.582	
-3.5	-37.418	-8.602	0.3	-28.892	
-3.4	-36.693	-8.287	0.4	-29.233	
-3.3	-35.952	-7.963	0.5	-29.602	
			0.6	-29.998	
			0.7	-30.420	

0.8	-30.866	
0.9	-31.336	
1	-31.831	
1.1	-32.350	
1.2	-32.898	
1.3	-33.475	
1.4	-34.086	
1.5	-34.735	0.598
1.6	-35.429	-0.103
1.7	-36.174	-0.761
1.8	-36.978	-1.382
1.9	-37.850	-1.969
2	-38.801	-2.526
2.1	-39.843	-3.055
2.2	-40.991	-3.561
2.3	-42.265	-4.043
2.4	-43.689	-4.505
2.5	-45.296	-4.949
2.6	-47.128	-5.374
2.7	-49.245	-5.784
2.8	-51.697	-6.179
2.9	-54.458	-6.560
3	-57.035	-6.928
3.1	-57.959	-7.284
3.2	-56.773	-7.629
3.3	-54.959	-7.963
3.4	-53.380	-8.287
3.5	-52.148	-8.602
3.6	-51.230	-8.908
3.7	-50.561	-9.205
3.8	-50.083	-9.495
3.9	-49.757	-9.777
4	-49.542	-10.051
4.1	-49.402	-10.320
4.2	-49.314	-10.581
4.3	-49.245	-10.837
4.4	-49.180	-11.086
4.5	-49.105	-11.330
4.6	-49.006	-11.569
4.7	-48.893	-11.802

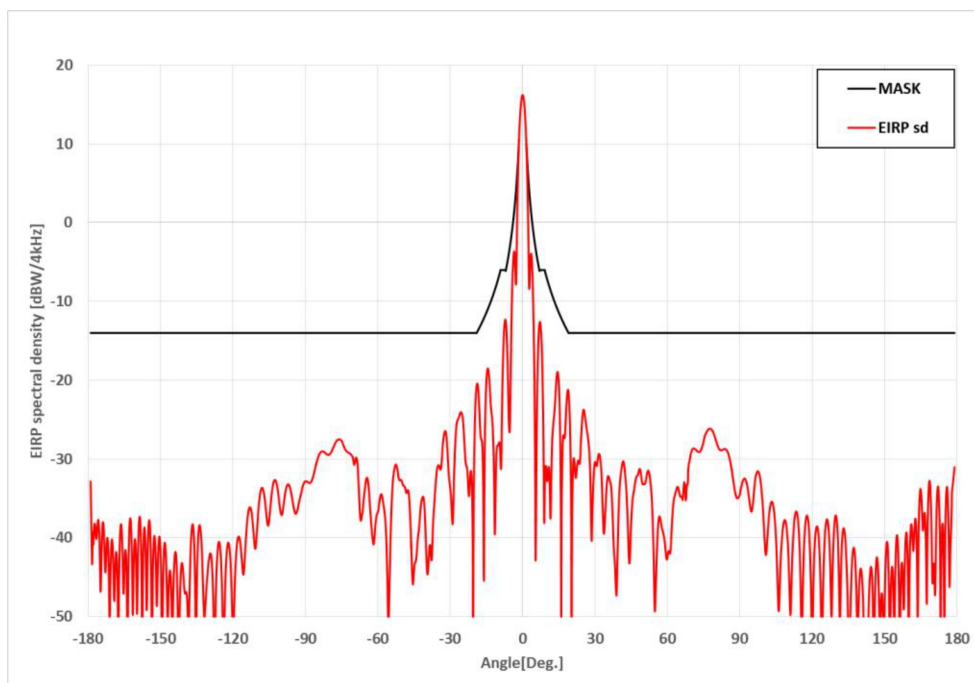
4.8	-48.761	-12.031
4.9	-48.628	-12.255
5	-48.503	-12.474
5.1	-48.398	-12.689
5.2	-48.324	-12.900
5.3	-48.292	-13.107
5.4	-48.297	-13.310
5.5	-48.347	-13.509
5.6	-48.422	-13.705
5.7	-48.508	-13.897
5.8	-48.579	-14.086
5.9	-48.599	-14.271
6	-48.536	-14.454
6.1	-48.366	-14.633
6.2	-48.069	-14.810
6.3	-47.658	-14.984
6.4	-47.148	-15.154
6.5	-46.567	-15.323
6.6	-45.946	-15.489
6.7	-45.305	-15.652
6.8	-44.668	-15.813
6.9	-44.049	-15.971
7	-43.457	-16.127

Intellian V60E Ku-band

1. EIRP Spectral Density of v60E

1.1. Frequency 13.75GHz EIRP Spectral Density

1.1.1. Azimuth Pattern for Co-pol, Wide Angle (-180° ~ 180°)



-21.5dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

2. EIRP Spectral Density Data

2.1. Frequency 13.75GHz Data

2.1.1. Azimuth Pattern for Co-pol (-180°~180°)

F=13.75GHz, -21.5dBW/4KHz EIRP sd		
-179	-32.848	-14.000
-178	-40.634	-14.000
-177	-39.092	-14.000
-176	-37.848	-14.000
-175	-45.705	-14.000
-174	-38.126	-14.000
-173	-44.093	-14.000
-172	-40.083	-14.000
-171	-48.972	-14.000
-170	-40.537	-14.000
-169	-46.079	-14.000
-168	-44.059	-14.000
-167	-41.612	-14.000
-166	-39.896	-14.000
-165	-43.825	-14.000
-164	-47.091	-14.000
-163	-39.127	-14.000
-162	-40.971	-14.000
-161	-41.884	-14.000
-160	-45.815	-14.000
-159	-38.261	-14.000
-158	-42.816	-14.000
-157	-39.960	-14.000
-156	-45.149	-14.000
-155	-38.561	-14.000
-154	-43.181	-14.000
-153	-41.631	-14.000
-152	-43.185	-14.000
-151	-41.878	-14.000
-150	-42.371	-14.000
-149	-46.114	-14.000
-148	-41.155	-14.000
-147	-50.506	-14.000
-146	-44.287	-14.000
-145	-50.954	-14.000
-144	-41.879	-14.000
-143	-47.653	-14.000
-142	-47.910	-14.000
-141	-43.351	-14.000
-140	-46.991	-14.000
-139	-47.918	-14.000
-138	-46.920	-14.000
-137	-38.614	-14.000
-136	-41.534	-14.000
-135	-46.500	-14.000
-134	-38.471	-14.000
-133	-41.154	-14.000
-132	-49.856	-14.000
-131	-46.348	-14.000

-130	-42.816	-14.000
-129	-42.436	-14.000
-128	-51.393	-14.000
-127	-46.126	-14.000
-126	-40.619	-14.000
-125	-42.743	-14.000
-124	-58.678	-14.000
-123	-44.032	-14.000
-122	-40.622	-14.000
-121	-43.222	-14.000
-120	-53.753	-14.000
-119	-43.787	-14.000
-118	-40.047	-14.000
-117	-40.634	-14.000
-116	-44.210	-14.000
-115	-41.916	-14.000
-114	-37.507	-14.000
-113	-36.122	-14.000
-112	-37.609	-14.000
-111	-41.143	-14.000
-110	-38.788	-14.000
-109	-34.932	-14.000
-108	-33.655	-14.000
-107	-34.731	-14.000
-106	-37.608	-14.000
-105	-37.716	-14.000
-104	-34.506	-14.000
-103	-32.786	-14.000
-102	-33.042	-14.000
-101	-35.073	-14.000
-100	-37.074	-14.000
-99	-35.718	-14.000
-98	-33.746	-14.000
-97	-33.235	-14.000
-96	-34.134	-14.000
-95	-35.914	-14.000
-94	-36.953	-14.000
-93	-36.007	-14.000
-92	-34.674	-14.000
-91	-33.354	-14.000
-90	-32.827	-14.000
-89	-32.936	-14.000
-88	-33.026	-14.000
-87	-32.435	-14.000
-86	-31.235	-14.000
-85	-30.048	-14.000
-84	-29.280	-14.000
-83	-29.023	-14.000
-82	-29.168	-14.000
-81	-29.430	-14.000
-80	-29.410	-14.000

-79	-28.924	-14.000
-78	-28.219	-14.000
-77	-27.671	-14.000
-76	-27.497	-14.000
-75	-27.677	-14.000
-74	-28.458	-14.000
-73	-29.001	-14.000
-72	-29.214	-14.000
-71	-29.467	-14.000
-70	-30.450	-14.000
-69	-29.865	-14.000
-68	-32.925	-14.000
-67	-37.834	-14.000
-66	-35.604	-14.000
-65	-32.934	-14.000
-64	-32.974	-14.000
-63	-37.103	-14.000
-62	-40.495	-14.000
-61	-38.358	-14.000
-60	-36.716	-14.000
-59	-34.794	-14.000
-58	-35.094	-14.000
-57	-37.378	-14.000
-56	-45.946	-14.000
-55	-43.654	-14.000
-54	-33.993	-14.000
-53	-31.062	-14.000
-52	-31.150	-14.000
-51	-32.700	-14.000
-50	-32.870	-14.000
-49	-33.454	-14.000
-48	-34.281	-14.000
-47	-34.984	-14.000
-46	-42.301	-14.000
-45	-44.206	-14.000
-44	-42.410	-14.000
-43	-38.995	-14.000
-42	-35.482	-14.000
-41	-34.990	-14.000
-40	-41.137	-14.000
-39	-43.171	-14.000
-38	-42.033	-14.000
-37	-37.651	-14.000
-36	-33.013	-14.000
-35	-30.811	-14.000
-34	-31.350	-14.000
-33	-27.974	-14.000
-32	-26.463	-14.000
-31	-29.827	-14.000
-30	-33.719	-14.000
-29	-38.279	-14.000
-28	-28.686	-14.000
-27	-25.095	-14.000
-26	-24.269	-14.000

-25	-24.441	-14.000
-24	-28.692	-14.000
-23	-31.228	-14.000
-22	-33.861	-14.000
-21	-33.497	-14.000
-20	-28.884	-14.000
-19	-20.586	-13.969
-18	-23.262	-13.382
-17	-27.523	-12.761
-16	-45.356	-12.103
-15	-20.062	-11.402
-14	-19.182	-10.653
-13	-23.846	-9.849
-12	-29.665	-8.980
-11	-30.937	-8.035
-10	-28.162	-7.000
-9	-31.282	-6.000
-8	-16.239	-6.000
-7	-12.451	-6.127
-6	-20.948	-4.454
-5	-20.705	-2.474
-4	-5.535	-0.051
-3	-6.012	3.072
-2	4.824	7.474
-1	13.765	
0	16.200	
1	13.776	
2	4.852	7.474
3	-6.421	3.072
4	-5.895	-0.051
5	-23.611	-2.474
6	-22.878	-4.454
7	-12.743	-6.127
8	-16.663	-6.000
9	-38.127	-6.000
10	-32.462	-7.000
11	-31.471	-8.035
12	-30.755	-8.980
13	-24.696	-9.849
14	-19.967	-10.653
15	-20.477	-11.402
16	-52.833	-12.103
17	-26.990	-12.761
18	-24.180	-13.382
19	-21.456	-13.969
20	-32.776	-14.000
21	-30.332	-14.000
22	-32.391	-14.000
23	-30.189	-14.000
24	-29.075	-14.000
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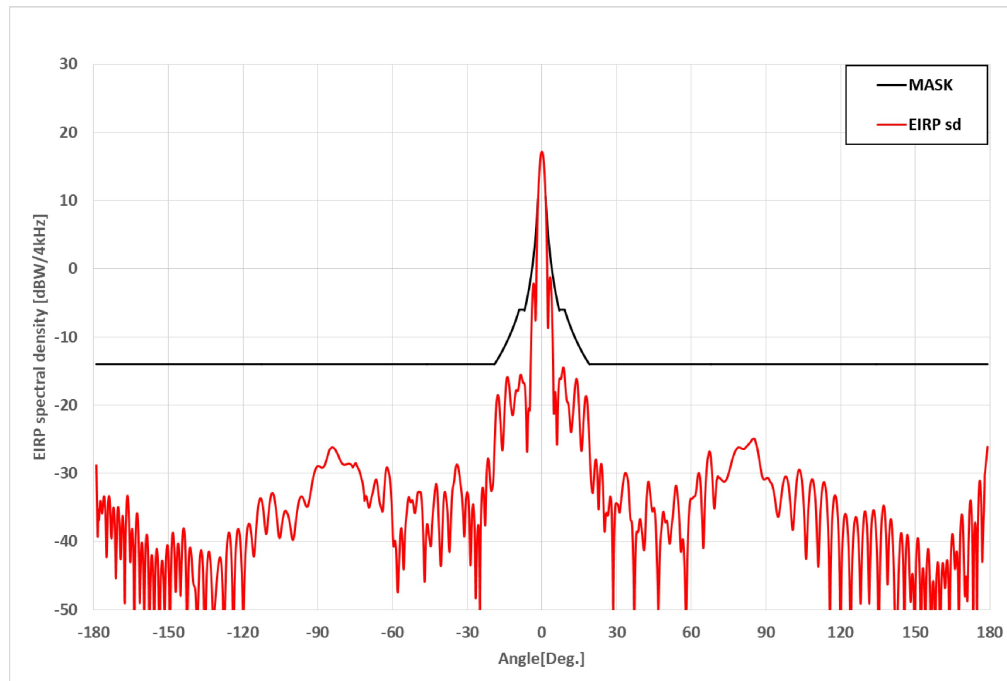
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46	-34.266	-14.000
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48	-31.743	-14.000
49	-31.831	-14.000
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61	-41.992	-14.000
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63	-34.717	-14.000
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74	-28.809	-14.000
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80	-27.525	-14.000
81	-28.440	-14.000
82	-28.879	-14.000
83	-28.804	-14.000

84	-28.727	-14.000
85	-29.133	-14.000
86	-30.257	-14.000
87	-32.094	-14.000
88	-34.117	-14.000
89	-35.000	-14.000
90	-34.537	-14.000
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92	-32.485	-14.000
93	-33.254	-14.000
94	-35.360	-14.000
95	-36.575	-14.000
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101	-41.912	-14.000
102	-37.569	-14.000
103	-35.498	-14.000
104	-36.189	-14.000
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106	-48.922	-14.000
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123	-41.623	-14.000
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125	-41.431	-14.000
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127	-39.805	-14.000
128	-50.056	-14.000
129	-39.318	-14.000
130	-37.354	-14.000
131	-43.916	-14.000
132	-43.759	-14.000
133	-38.781	-14.000
134	-41.730	-14.000
135	-54.052	-14.000
136	-47.485	-14.000
137	-41.433	-14.000
138	-43.856	-14.000

139	-51.826	-14.000
140	-43.976	-14.000
141	-47.352	-14.000
142	-58.640	-14.000
143	-54.477	-14.000
144	-44.450	-14.000
145	-46.676	-14.000
146	-48.116	-14.000
147	-42.678	-14.000
148	-51.433	-14.000
149	-47.290	-14.000
150	-49.863	-14.000
151	-40.502	-14.000
152	-51.518	-14.000
153	-43.879	-14.000
154	-51.816	-14.000
155	-39.838	-14.000
156	-48.092	-14.000
157	-43.542	-14.000
158	-49.054	-14.000
159	-39.320	-14.000
160	-57.726	-14.000
161	-38.303	-14.000
162	-41.514	-14.000
163	-38.021	-14.000
164	-42.245	-14.000
165	-33.904	-14.000
166	-38.930	-14.000
167	-39.083	-14.000
168	-36.250	-14.000
169	-34.045	-14.000
170	-45.321	-14.000
171	-46.573	-14.000
172	-33.619	-14.000
173	-43.106	-14.000
174	-38.193	-14.000
175	-43.339	-14.000
176	-33.799	-14.000
177	-45.427	-14.000
178	-33.932	-14.000
179	-31.027	-14.000

1.3. Frequency 14.50GHz EIRP Spectral Density

1.3.1. Azimuth Pattern for Co-pol, Wide Angle (-180° ~ 180°)



-21.5dBW/4kHz Input power spectral density @ f=14.50GHz

▪ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

2.3. Frequency 14.50GHz Data

2.3.1. Azimuth Pattern for Co-pol (-180°~180°)

F=14.50GHz, -21.5dBW/4KHz EIRP sd		
-179	-28.793	-14.000
-178	-36.596	-14.000
-177	-34.894	-14.000
-176	-33.490	-14.000
-175	-41.187	-14.000
-174	-33.448	-14.000
-173	-39.255	-14.000
-172	-35.085	-14.000
-171	-43.814	-14.000
-170	-35.219	-14.000
-169	-40.601	-14.000
-168	-38.421	-14.000
-167	-36.135	-14.000
-166	-35.279	-14.000
-165	-40.068	-14.000
-164	-44.194	-14.000
-163	-37.090	-14.000
-162	-39.794	-14.000
-161	-41.567	-14.000
-160	-46.358	-14.000
-159	-39.664	-14.000
-158	-45.079	-14.000
-157	-43.083	-14.000
-156	-48.444	-14.000
-155	-41.856	-14.000
-154	-46.476	-14.000
-153	-44.926	-14.000
-152	-45.568	-14.000
-151	-43.121	-14.000
-150	-42.474	-14.000
-149	-45.077	-14.000
-148	-38.978	-14.000
-147	-47.189	-14.000
-146	-40.430	-14.000
-145	-47.157	-14.000
-144	-38.142	-14.000
-143	-43.976	-14.000
-142	-44.635	-14.000
-141	-41.276	-14.000
-140	-46.116	-14.000
-139	-48.243	-14.000
-138	-48.445	-14.000
-137	-41.339	-14.000
-136	-45.459	-14.000
-135	-50.303	-14.000
-134	-41.664	-14.000
-133	-43.737	-14.000
-132	-51.829	-14.000
-131	-47.711	-14.000

-130	-43.569	-14.000
-129	-42.579	-14.000
-128	-50.926	-14.000
-127	-45.049	-14.000
-126	-38.932	-14.000
-125	-40.446	-14.000
-124	-56.198	-14.000
-123	-41.552	-14.000
-122	-38.142	-14.000
-121	-40.742	-14.000
-120	-51.273	-14.000
-119	-41.307	-14.000
-118	-37.567	-14.000
-117	-38.154	-14.000
-116	-41.730	-14.000
-115	-39.436	-14.000
-114	-35.027	-14.000
-113	-33.642	-14.000
-112	-35.129	-14.000
-111	-38.663	-14.000
-110	-36.716	-14.000
-109	-33.540	-14.000
-108	-32.942	-14.000
-107	-34.699	-14.000
-106	-38.256	-14.000
-105	-39.044	-14.000
-104	-36.513	-14.000
-103	-35.473	-14.000
-102	-36.084	-14.000
-101	-37.981	-14.000
-100	-39.780	-14.000
-99	-37.610	-14.000
-98	-34.824	-14.000
-97	-33.499	-14.000
-96	-33.584	-14.000
-95	-34.550	-14.000
-94	-34.775	-14.000
-93	-33.015	-14.000
-92	-30.868	-14.000
-91	-29.466	-14.000
-90	-28.940	-14.000
-89	-29.048	-14.000
-88	-29.138	-14.000
-87	-28.548	-14.000
-86	-27.347	-14.000
-85	-26.391	-14.000
-84	-26.199	-14.000
-83	-26.517	-14.000
-82	-27.238	-14.000
-81	-28.075	-14.000
-80	-28.631	-14.000

-79	-28.721	-14.000
-78	-28.591	-14.000
-77	-28.620	-14.000
-76	-29.111	-14.000
-75	-28.554	-14.000
-74	-29.105	-14.000
-73	-30.034	-14.000
-72	-31.454	-14.000
-71	-33.465	-14.000
-70	-34.323	-14.000
-69	-34.477	-14.000
-68	-32.905	-14.000
-67	-31.148	-14.000
-66	-31.844	-14.000
-65	-34.570	-14.000
-64	-35.574	-14.000
-63	-30.796	-14.000
-62	-29.223	-14.000
-61	-31.012	-14.000
-60	-37.767	-14.000
-59	-39.861	-14.000
-58	-47.069	-14.000
-57	-39.911	-14.000
-56	-40.125	-14.000
-55	-39.154	-14.000
-54	-34.652	-14.000
-53	-33.931	-14.000
-52	-33.932	-14.000
-51	-35.831	-14.000
-50	-33.078	-14.000
-49	-32.712	-14.000
-48	-35.826	-14.000
-47	-45.617	-14.000
-46	-37.431	-14.000
-45	-40.102	-14.000
-44	-36.964	-14.000
-43	-32.676	-14.000
-42	-32.774	-14.000
-41	-41.492	-14.000
-40	-38.842	-14.000
-39	-32.725	-14.000
-38	-35.320	-14.000
-37	-41.261	-14.000
-36	-32.911	-14.000
-35	-30.244	-14.000
-34	-28.734	-14.000
-33	-30.613	-14.000
-32	-33.879	-14.000
-31	-38.223	-14.000
-30	-32.757	-14.000
-29	-39.062	-14.000
-28	-35.708	-14.000
-27	-38.968	-14.000
-26	-39.637	-14.000

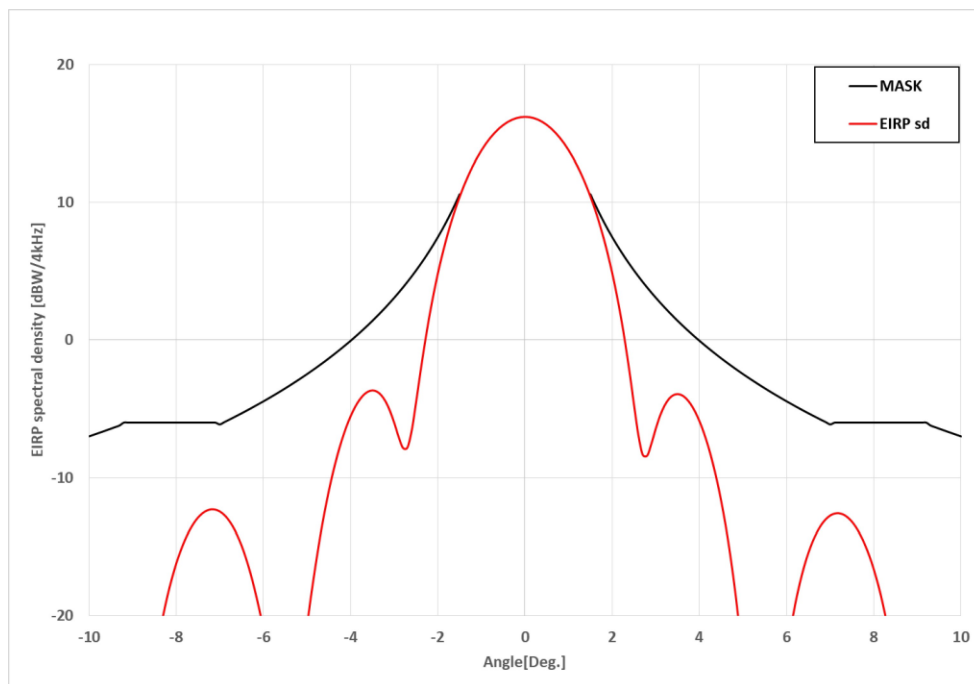
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-24	-32.458	-14.000
-23	-36.372	-14.000
-22	-28.756	-14.000
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-20	-32.274	-14.000
-19	-25.677	-13.969
-18	-18.826	-13.382
-17	-20.394	-12.761
-16	-26.462	-12.103
-15	-20.874	-11.402
-14	-15.942	-10.653
-13	-17.721	-9.849
-12	-21.282	-8.980
-11	-19.426	-8.035
-10	-17.823	-7.000
-9	-16.395	-6.000
-8	-16.044	-6.000
-7	-16.874	-6.127
-6	-26.555	-4.454
-5	-20.815	-2.474
-4	-6.048	-0.051
-3	-3.135	3.072
-2	3.634	7.474
-1	14.402	
0	17.200	
1	14.370	
2	3.040	7.474
3	-2.101	3.072
4	-5.449	-0.051
5	-19.903	-2.474
6	-25.693	-4.454
7	-16.237	-6.127
8	-15.518	-6.000
9	-15.173	-6.000
10	-19.348	-7.000
11	-21.115	-8.035
12	-23.460	-8.980
13	-18.681	-9.849
14	-16.194	-10.653
15	-20.988	-11.402
16	-26.649	-12.103
17	-20.671	-12.761
18	-18.945	-13.382
19	-24.942	-13.969
20	-32.041	-14.000
21	-30.184	-14.000
22	-28.522	-14.000
23	-33.726	-14.000
24	-28.798	-14.000
25	-37.686	-14.000
26	-35.776	-14.000
27	-34.577	-14.000
28	-35.564	-14.000

29	-40.161	-14.000
30	-34.372	-14.000
31	-35.508	-14.000
32	-33.367	-14.000
33	-30.497	-14.000
34	-30.157	-14.000
35	-33.219	-14.000
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37	-52.379	-14.000
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39	-37.659	-14.000
40	-37.873	-14.000
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42	-34.274	-14.000
43	-31.507	-14.000
44	-34.774	-14.000
45	-35.043	-14.000
46	-40.107	-14.000
47	-47.292	-14.000
48	-38.172	-14.000
49	-35.846	-14.000
50	-36.964	-14.000
51	-39.606	-14.000
52	-38.157	-14.000
53	-34.496	-14.000
54	-31.872	-14.000
55	-35.517	-14.000
56	-41.357	-14.000
57	-41.210	-14.000
58	-50.374	-14.000
59	-36.378	-14.000
60	-33.698	-14.000
61	-33.438	-14.000
62	-32.469	-14.000
63	-29.929	-14.000
64	-33.320	-14.000
65	-39.961	-14.000
66	-30.156	-14.000
67	-27.024	-14.000
68	-28.214	-14.000
69	-34.350	-14.000
70	-32.040	-14.000
71	-30.589	-14.000
72	-30.897	-14.000
73	-31.208	-14.000
74	-30.979	-14.000
75	-30.002	-14.000
76	-28.627	-14.000
77	-27.359	-14.000
78	-26.517	-14.000
79	-26.203	-14.000
80	-26.305	-14.000
81	-26.440	-14.000
82	-26.099	-14.000
83	-25.744	-14.000

84	-25.287	-14.000
85	-24.913	-14.000
86	-25.591	-14.000
87	-27.288	-14.000
88	-29.621	-14.000
89	-30.864	-14.000
90	-30.761	-14.000
91	-30.750	-14.000
92	-31.349	-14.000
93	-32.418	-14.000
94	-34.824	-14.000
95	-36.339	-14.000
96	-33.816	-14.000
97	-31.274	-14.000
98	-30.452	-14.000
99	-31.646	-14.000
100	-35.428	-14.000
101	-37.836	-14.000
102	-32.593	-14.000
103	-29.622	-14.000
104	-30.023	-14.000
105	-33.635	-14.000
106	-42.176	-14.000
107	-35.509	-14.000
108	-31.359	-14.000
109	-31.191	-14.000
110	-34.940	-14.000
111	-43.684	-14.000
112	-34.916	-14.000
113	-31.462	-14.000
114	-32.246	-14.000
115	-38.471	-14.000
116	-44.536	-14.000
117	-34.633	-14.000
118	-33.381	-14.000
119	-37.419	-14.000
120	-59.506	-14.000
121	-38.303	-14.000
122	-35.945	-14.000
123	-39.341	-14.000
124	-66.841	-14.000
125	-39.789	-14.000
126	-36.392	-14.000
127	-38.803	-14.000
128	-49.102	-14.000
129	-38.004	-14.000
130	-35.680	-14.000
131	-41.882	-14.000
132	-41.365	-14.000
133	-35.484	-14.000
134	-37.393	-14.000
135	-48.675	-14.000
136	-41.231	-14.000
137	-34.953	-14.000
138	-37.150	-14.000

139	-44.894	-14.000
140	-36.818	-14.000
141	-40.456	-14.000
142	-52.333	-14.000
143	-48.758	-14.000
144	-39.319	-14.000
145	-42.133	-14.000
146	-44.161	-14.000
147	-39.311	-14.000
148	-48.654	-14.000
149	-45.099	-14.000
150	-48.260	-14.000
151	-39.487	-14.000
152	-51.091	-14.000
153	-44.041	-14.000
154	-52.566	-14.000
155	-41.176	-14.000
156	-50.018	-14.000
157	-46.055	-14.000
158	-52.156	-14.000
159	-43.010	-14.000
160	-62.004	-14.000
161	-43.169	-14.000
162	-46.674	-14.000
163	-43.183	-14.000
164	-47.408	-14.000
165	-38.979	-14.000
166	-43.906	-14.000
167	-43.433	-14.000
168	-39.914	-14.000
169	-36.995	-14.000
170	-47.485	-14.000
171	-47.952	-14.000
172	-34.214	-14.000
173	-42.915	-14.000
174	-37.217	-14.000
175	-41.577	-14.000
176	-31.252	-14.000
177	-42.095	-14.000
178	-29.815	-14.000
179	-26.125	-14.000

1.1.2. Azimuth Pattern for Co-pol, Narrow Angle (-10°~10°)



-21.5dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

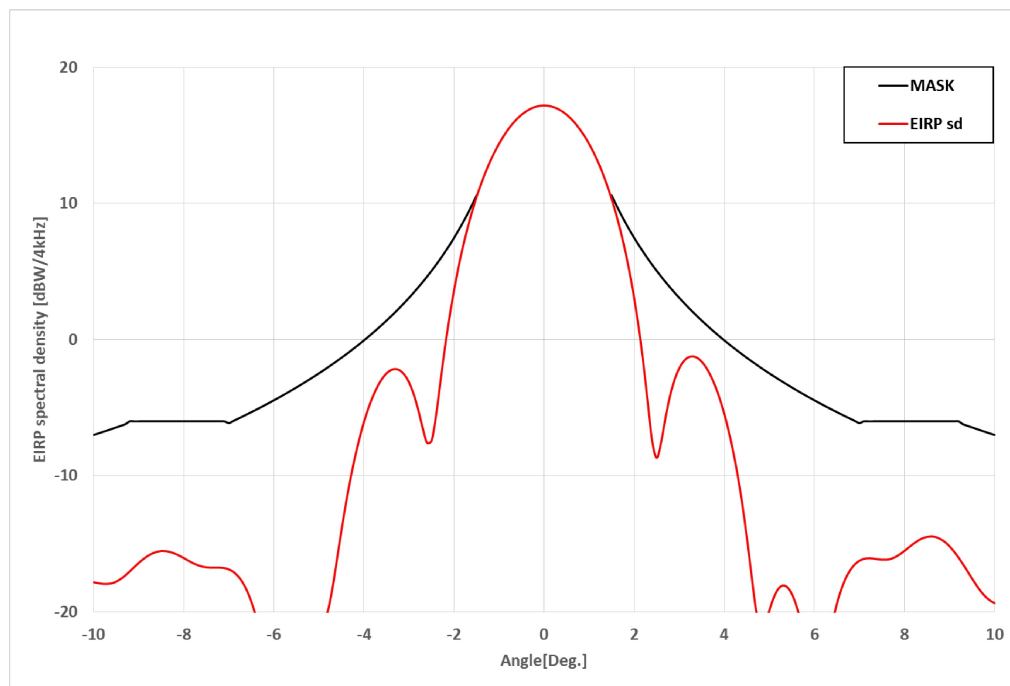
2.1.2. Azimuth Pattern for Co-pol (-10°~10°)

F=13.75GHz, -21.5dBW/4KHz EIRP sd					
-10	-28.162	-7.000	-5.2	-24.871	-2.900
-9.9	-28.056	-6.891	-5.1	-22.951	-2.689
-9.8	-27.949	-6.781	-5	-20.705	-2.474
-9.7	-27.885	-6.669	-4.9	-18.415	-2.255
-9.6	-27.901	-6.557	-4.8	-16.271	-2.031
-9.5	-28.053	-6.443	-4.7	-14.304	-1.802
-9.4	-28.380	-6.328	-4.6	-12.538	-1.569
-9.3	-28.912	-6.212	-4.5	-10.966	-1.330
-9.2	-29.661	-6.000	-4.4	-9.566	-1.086
-9.1	-30.555	-6.000	-4.3	-8.336	-0.837
-9	-31.282	-6.000	-4.2	-7.257	-0.581
-8.9	-31.224	-6.000	-4.1	-6.326	-0.320
-8.8	-29.941	-6.000	-4	-5.535	-0.051
-8.7	-27.861	-6.000	-3.9	-4.880	0.223
-8.6	-25.612	-6.000	-3.8	-4.362	0.505
-8.5	-23.518	-6.000	-3.7	-3.982	0.795
-8.4	-21.644	-6.000	-3.6	-3.745	1.092
-8.3	-20.001	-6.000	-3.5	-3.661	1.398
-8.2	-18.568	-6.000	-3.4	-3.740	1.713
-8.1	-17.320	-6.000	-3.3	-3.997	2.037
-8	-16.239	-6.000	-3.2	-4.456	2.371
-7.9	-15.311	-6.000	-3.1	-5.128	2.716
-7.8	-14.520	-6.000	-3	-6.012	3.072
-7.7	-13.859	-6.000	-2.9	-7.020	3.440
-7.6	-13.322	-6.000	-2.8	-7.836	3.821
-7.5	-12.898	-6.000	-2.7	-7.831	4.216
-7.4	-12.591	-6.000	-2.6	-6.597	4.626
-7.3	-12.391	-6.000	-2.5	-4.563	5.051
-7.2	-12.301	-6.000	-2.4	-2.353	5.495
-7.1	-12.322	-6.000	-2.3	-0.267	5.957
-7	-12.451	-6.127	-2.2	1.623	6.439
-6.9	-12.698	-5.971	-2.1	3.312	6.945
-6.8	-13.061	-5.813	-2	4.824	7.474
-6.7	-13.549	-5.652	-1.9	6.180	8.031
-6.6	-14.169	-5.489	-1.8	7.400	8.618
-6.5	-14.924	-5.323	-1.7	8.503	9.239
-6.4	-15.832	-5.154	-1.6	9.500	9.897
-6.3	-16.891	-4.984	-1.5	10.403	10.598
-6.2	-18.107	-4.810	-1.4	11.221	
-6.1	-19.471	-4.633	-1.3	11.960	
-6	-20.948	-4.454	-1.2	12.628	
-5.9	-22.469	-4.271	-1.1	13.228	
-5.8	-23.915	-4.086	-1	13.765	
-5.7	-25.128	-3.897	-0.9	14.242	
-5.6	-26.003	-3.705	-0.8	14.663	
-5.5	-26.510	-3.509	-0.7	15.029	
-5.4	-26.596	-3.310	-0.6	15.344	
-5.3	-26.121	-3.107	-0.5	15.607	
			-0.4	15.821	
			-0.3	15.987	

-0.2	16.105	
-0.1	16.176	
0	16.200	
0.1	16.178	
0.2	16.108	
0.3	15.991	
0.4	15.827	
0.5	15.614	
0.6	15.352	
0.7	15.038	
0.8	14.672	
0.9	14.253	
1	13.776	
1.1	13.240	
1.2	12.641	
1.3	11.975	
1.4	11.237	
1.5	10.422	10.598
1.6	9.522	9.897
1.7	8.527	9.239
1.8	7.427	8.618
1.9	6.208	8.031
2	4.852	7.474
2.1	3.335	6.945
2.2	1.636	6.439
2.3	-0.277	5.957
2.4	-2.415	5.495
2.5	-4.721	5.051
2.6	-6.927	4.626
2.7	-8.346	4.216
2.8	-8.405	3.821
2.9	-7.516	3.440
3	-6.421	3.072
3.1	-5.470	2.716
3.2	-4.758	2.371
3.3	-4.276	2.037
3.4	-4.006	1.713
3.5	-3.926	1.398
3.6	-4.015	1.092
3.7	-4.264	0.795
3.8	-4.663	0.505
3.9	-5.206	0.223
4	-5.895	-0.051
4.1	-6.730	-0.320
4.2	-7.718	-0.581
4.3	-8.871	-0.837
4.4	-10.196	-1.086
4.5	-11.720	-1.330
4.6	-13.465	-1.569
4.7	-15.463	-1.802
4.8	-17.778	-2.031
4.9	-20.450	-2.255

5	-23.611	-2.474
5.1	-27.400	-2.689
5.2	-32.041	-2.900
5.3	-37.909	-3.107
5.4	-42.837	-3.310
5.5	-40.182	-3.509
5.6	-35.630	-3.705
5.7	-31.626	-3.897
5.8	-28.207	-4.086
5.9	-25.313	-4.271
6	-22.878	-4.454
6.1	-20.833	-4.633
6.2	-19.111	-4.810
6.3	-17.659	-4.984
6.4	-16.445	-5.154
6.5	-15.430	-5.323
6.6	-14.596	-5.489
6.7	-13.923	-5.652
6.8	-13.395	-5.813
6.9	-13.007	-5.971
7	-12.743	-6.127
7.1	-12.605	-6.000
7.2	-12.584	-6.000
7.3	-12.677	-6.000
7.4	-12.887	-6.000
7.5	-13.208	-6.000
7.6	-13.647	-6.000
7.7	-14.206	-6.000
7.8	-14.888	-6.000
7.9	-15.704	-6.000
8	-16.663	-6.000
8.1	-17.781	-6.000
8.2	-19.083	-6.000
8.3	-20.598	-6.000
8.4	-22.370	-6.000
8.5	-24.477	-6.000
8.6	-27.010	-6.000
8.7	-30.146	-6.000
8.8	-34.040	-6.000
8.9	-37.943	-6.000
9	-38.127	-6.000
9.1	-35.557	-6.000
9.2	-33.434	-6.000
9.3	-32.063	-6.212
9.4	-31.271	-6.328
9.5	-30.903	-6.443
9.6	-30.874	-6.557
9.7	-31.097	-6.669
9.8	-31.500	-6.781
9.9	-31.994	-6.891
10	-32.462	-7.000

1.3.2. Azimuth Pattern for Co-pol, Narrow Angle (-10°~10°)



-21.5dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

15-25log(θ)	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log(θ)	dBW/4kHz	for	$9.2^\circ < \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

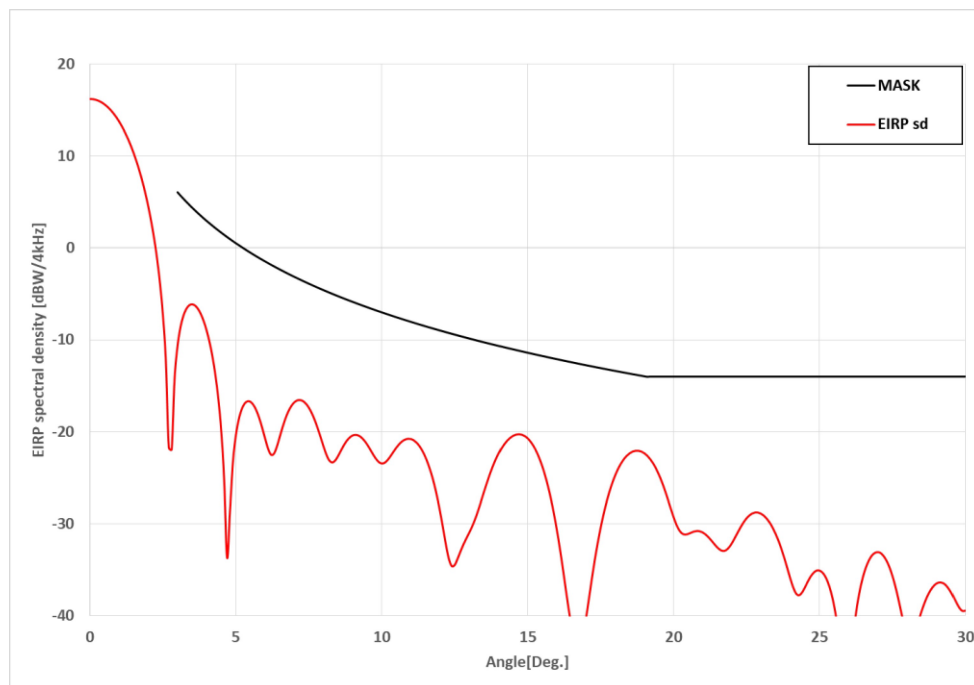
2.3.2. Azimuth Pattern for Co-pol (-10°~10°)

F=14.50GHz, -21.5dBW/4KHz EIRP sd					
-10	-17.823	-7.000	-5.2	-20.434	-2.900
-9.9	-17.884	-6.891	-5.1	-20.584	-2.689
-9.8	-17.929	-6.781	-5	-20.815	-2.474
-9.7	-17.942	-6.669	-4.9	-20.734	-2.255
-9.6	-17.893	-6.557	-4.8	-19.905	-2.031
-9.5	-17.772	-6.443	-4.7	-18.245	-1.802
-9.4	-17.577	-6.328	-4.6	-16.151	-1.569
-9.3	-17.318	-6.212	-4.5	-14.005	-1.330
-9.2	-17.020	-6.000	-4.4	-12.010	-1.086
-9.1	-16.702	-6.000	-4.3	-10.215	-0.837
-9	-16.395	-6.000	-4.2	-8.632	-0.581
-8.9	-16.116	-6.000	-4.1	-7.248	-0.320
-8.8	-15.881	-6.000	-4	-6.048	-0.051
-8.7	-15.702	-6.000	-3.9	-5.020	0.223
-8.6	-15.582	-6.000	-3.8	-4.152	0.505
-8.5	-15.528	-6.000	-3.7	-3.440	0.795
-8.4	-15.534	-6.000	-3.6	-2.882	1.092
-8.3	-15.598	-6.000	-3.5	-2.477	1.398
-8.2	-15.712	-6.000	-3.4	-2.232	1.713
-8.1	-15.865	-6.000	-3.3	-2.156	2.037
-8	-16.044	-6.000	-3.2	-2.265	2.371
-7.9	-16.231	-6.000	-3.1	-2.582	2.716
-7.8	-16.406	-6.000	-3	-3.135	3.072
-7.7	-16.554	-6.000	-2.9	-3.967	3.440
-7.6	-16.660	-6.000	-2.8	-5.092	3.821
-7.5	-16.721	-6.000	-2.7	-6.443	4.216
-7.4	-16.744	-6.000	-2.6	-7.574	4.626
-7.3	-16.744	-6.000	-2.5	-7.432	5.051
-7.2	-16.747	-6.000	-2.4	-5.584	5.495
-7.1	-16.780	-6.000	-2.3	-3.030	5.957
-7	-16.874	-6.127	-2.2	-0.534	6.439
-6.9	-17.058	-5.971	-2.1	1.688	6.945
-6.8	-17.359	-5.813	-2	3.634	7.474
-6.7	-17.804	-5.652	-1.9	5.344	8.031
-6.6	-18.427	-5.489	-1.8	6.853	8.618
-6.5	-19.251	-5.323	-1.7	8.196	9.239
-6.4	-20.326	-5.154	-1.6	9.395	9.897
-6.3	-21.670	-4.984	-1.5	10.470	10.598
-6.2	-23.300	-4.810	-1.4	11.436	
-6.1	-25.090	-4.633	-1.3	12.303	
-6	-26.555	-4.454	-1.2	13.082	
-5.9	-26.834	-4.271	-1.1	13.780	
-5.8	-25.765	-4.086	-1	14.402	
-5.7	-24.205	-3.897	-0.9	14.954	
-5.6	-22.770	-3.705	-0.8	15.439	
-5.5	-21.667	-3.509	-0.7	15.861	
-5.4	-20.920	-3.310	-0.6	16.222	
-5.3	-20.517	-3.107	-0.5	16.524	
			-0.4	16.769	
			-0.3	16.958	

-0.2	17.093	
-0.1	17.173	
0	17.200	
0.1	17.173	
0.2	17.093	
0.3	16.958	
0.4	16.768	
0.5	16.522	
0.6	16.217	
0.7	15.852	
0.8	15.425	
0.9	14.932	
1	14.370	
1.1	13.735	
1.2	13.020	
1.3	12.219	
1.4	11.323	
1.5	10.322	10.598
1.6	9.201	9.897
1.7	7.942	9.239
1.8	6.519	8.618
1.9	4.899	8.031
2	3.040	7.474
2.1	0.874	6.945
2.2	-1.664	6.439
2.3	-4.585	5.957
2.4	-7.459	5.495
2.5	-8.678	5.051
2.6	-7.497	4.626
2.7	-5.644	4.216
2.8	-4.071	3.821
2.9	-2.910	3.440
3	-2.101	3.072
3.1	-1.581	2.716
3.2	-1.302	2.371
3.3	-1.229	2.037
3.4	-1.341	1.713
3.5	-1.621	1.398
3.6	-2.062	1.092
3.7	-2.662	0.795
3.8	-3.420	0.505
3.9	-4.345	0.223
4	-5.449	-0.051
4.1	-6.744	-0.320
4.2	-8.261	-0.581
4.3	-10.029	-0.837
4.4	-12.093	-1.086
4.5	-14.486	-1.330
4.6	-17.160	-1.569
4.7	-19.754	-1.802
4.8	-21.235	-2.031
4.9	-20.966	-2.255

5	-19.903	-2.474
5.1	-18.925	-2.689
5.2	-18.299	-2.900
5.3	-18.064	-3.107
5.4	-18.189	-3.310
5.5	-18.682	-3.509
5.6	-19.532	-3.705
5.7	-20.758	-3.897
5.8	-22.357	-4.086
5.9	-24.193	-4.271
6	-25.693	-4.454
6.1	-25.773	-4.633
6.2	-24.353	-4.810
6.3	-22.478	-4.984
6.4	-20.783	-5.154
6.5	-19.402	-5.323
6.6	-18.322	-5.489
6.7	-17.507	-5.652
6.8	-16.907	-5.813
6.9	-16.498	-5.971
7	-16.237	-6.127
7.1	-16.101	-6.000
7.2	-16.059	-6.000
7.3	-16.077	-6.000
7.4	-16.124	-6.000
7.5	-16.164	-6.000
7.6	-16.163	-6.000
7.7	-16.101	-6.000
7.8	-15.965	-6.000
7.9	-15.764	-6.000
8	-15.518	-6.000
8.1	-15.249	-6.000
8.2	-14.990	-6.000
8.3	-14.764	-6.000
8.4	-14.589	-6.000
8.5	-14.482	-6.000
8.6	-14.453	-6.000
8.7	-14.505	-6.000
8.8	-14.645	-6.000
8.9	-14.867	-6.000
9	-15.173	-6.000
9.1	-15.553	-6.000
9.2	-15.997	-6.000
9.3	-16.492	-6.212
9.4	-17.015	-6.328
9.5	-17.545	-6.443
9.6	-18.049	-6.557
9.7	-18.503	-6.669
9.8	-18.877	-6.781
9.9	-19.158	-6.891
10	-19.348	-7.000

1.1.4. Elevation Pattern for Co-pol, Narrow Angle (0°~30°)



-21.5dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

18-25log(θ)	dBW/4kHz	for	$3.0^\circ \leq \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

2.1.4. Elevation Pattern for Co-pol (0°~30°)

F=13.75GHz, -21.5dBW/4KHz EIRP sd		
0	16.200	
0.1	16.177	
0.2	16.106	
0.3	15.987	
0.4	15.819	
0.5	15.602	
0.6	15.335	
0.7	15.016	
0.8	14.642	
0.9	14.214	
1	13.726	
1.1	13.178	
1.2	12.564	
1.3	11.881	
1.4	11.124	
1.5	10.285	
1.6	9.355	
1.7	8.326	
1.8	7.182	
1.9	5.905	
2	4.471	
2.1	2.842	
2.2	0.970	
2.3	-1.237	
2.4	-3.921	
2.5	-7.380	
2.6	-12.364	
2.7	-21.734	
2.8	-21.946	
2.9	-14.214	
3	-10.687	6.072
3.1	-8.646	5.716
3.2	-7.393	5.371
3.3	-6.633	5.037
3.4	-6.238	4.713
3.5	-6.129	4.398
3.6	-6.264	4.092
3.7	-6.623	3.795
3.8	-7.195	3.505
3.9	-7.983	3.223
4	-9.004	2.949
4.1	-10.287	2.680
4.2	-11.883	2.419
4.3	-13.889	2.163
4.4	-16.461	1.914
4.5	-19.965	1.670
4.6	-25.273	1.431
4.7	-33.698	1.198
4.8	-28.582	0.969

4.9	-23.339	0.745
5	-20.427	0.526
5.1	-18.658	0.311
5.2	-17.569	0.100
5.3	-16.941	-0.107
5.4	-16.693	-0.310
5.5	-16.745	-0.509
5.6	-17.076	-0.705
5.7	-17.666	-0.897
5.8	-18.494	-1.086
5.9	-19.538	-1.271
6	-20.706	-1.454
6.1	-21.805	-1.633
6.2	-22.487	-1.810
6.3	-22.429	-1.984
6.4	-21.697	-2.154
6.5	-20.627	-2.323
6.6	-19.543	-2.489
6.7	-18.584	-2.652
6.8	-17.804	-2.813
6.9	-17.222	-2.971
7	-16.820	-3.127
7.1	-16.601	-3.281
7.2	-16.551	-3.433
7.3	-16.663	-3.583
7.4	-16.938	-3.731
7.5	-17.367	-3.877
7.6	-17.954	-4.020
7.7	-18.689	-4.162
7.8	-19.559	-4.302
7.9	-20.532	-4.441
8	-21.541	-4.577
8.1	-22.455	-4.712
8.2	-23.111	-4.845
8.3	-23.354	-4.977
8.4	-23.169	-5.107
8.5	-22.691	-5.235
8.6	-22.092	-5.362
8.7	-21.507	-5.488
8.8	-21.014	-5.612
8.9	-20.649	-5.735
9	-20.422	-5.856
9.1	-20.348	-5.976
9.2	-20.411	-6.095
9.3	-20.614	-6.212
9.4	-20.943	-6.328
9.5	-21.375	-6.443
9.6	-21.892	-6.557
9.7	-22.431	-6.669
9.8	-22.929	-6.781
9.9	-23.300	-6.891

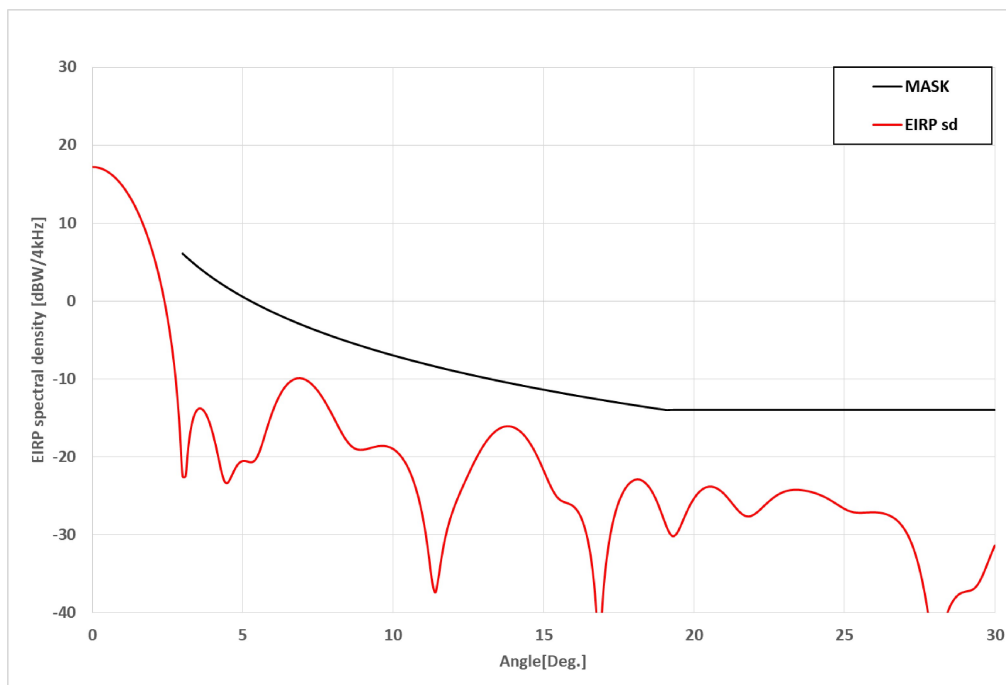
10	-23.461	-7.000
10.1	-23.391	-7.108
10.2	-23.105	-7.215
10.3	-22.688	-7.321
10.4	-22.220	-7.426
10.5	-21.762	-7.530
10.6	-21.374	-7.633
10.7	-21.067	-7.735
10.8	-20.866	-7.836
10.9	-20.776	-7.936
11	-20.796	-8.035
11.1	-20.938	-8.133
11.2	-21.197	-8.230
11.3	-21.581	-8.327
11.4	-22.096	-8.423
11.5	-22.749	-8.517
11.6	-23.555	-8.611
11.7	-24.525	-8.705
11.8	-25.678	-8.797
11.9	-27.033	-8.889
12	-28.598	-8.980
12.1	-30.343	-9.070
12.2	-32.162	-9.159
12.3	-33.729	-9.248
12.4	-34.579	-9.336
12.5	-34.517	-9.423
12.6	-33.857	-9.509
12.7	-33.048	-9.595
12.8	-32.297	-9.680
12.9	-31.631	-9.765
13	-31.000	-9.849
13.1	-30.330	-9.932
13.2	-29.556	-10.014
13.3	-28.669	-10.096
13.4	-27.690	-10.178
13.5	-26.673	-10.258
13.6	-25.678	-10.338
13.7	-24.733	-10.418
13.8	-23.871	-10.497
13.9	-23.103	-10.575
14	-22.426	-10.653
14.1	-21.852	-10.730
14.2	-21.367	-10.807
14.3	-20.974	-10.883
14.4	-20.671	-10.959
14.5	-20.451	-11.034
14.6	-20.323	-11.109
14.7	-20.281	-11.183
14.8	-20.332	-11.257
14.9	-20.482	-11.330
15	-20.730	-11.402
15.1	-21.092	-11.474

15.2	-21.567	-11.546
15.3	-22.165	-11.617
15.4	-22.899	-11.688
15.5	-23.772	-11.758
15.6	-24.799	-11.828
15.7	-25.990	-11.897
15.8	-27.356	-11.966
15.9	-28.908	-12.035
16	-30.663	-12.103
16.1	-32.605	-12.171
16.2	-34.728	-12.238
16.3	-36.973	-12.305
16.4	-39.159	-12.371
16.5	-41.095	-12.437
16.6	-42.475	-12.503
16.7	-43.148	-12.568
16.8	-43.039	-12.633
16.9	-42.000	-12.697
17	-40.279	-12.761
17.1	-38.177	-12.825
17.2	-36.013	-12.888
17.3	-33.985	-12.951
17.4	-32.121	-13.014
17.5	-30.462	-13.076
17.6	-28.996	-13.138
17.7	-27.704	-13.199
17.8	-26.577	-13.261
17.9	-25.603	-13.321
18	-24.766	-13.382
18.1	-24.057	-13.442
18.2	-23.471	-13.502
18.3	-22.993	-13.561
18.4	-22.622	-13.620
18.5	-22.348	-13.679
18.6	-22.166	-13.738
18.7	-22.080	-13.796
18.8	-22.079	-13.854
18.9	-22.167	-13.912
19	-22.345	-13.969
19.1	-22.611	-14.026
19.2	-22.977	-14.000
19.3	-23.439	-14.000
19.4	-24.002	-14.000
19.5	-24.676	-14.000
19.6	-25.450	-14.000
19.7	-26.324	-14.000
19.8	-27.277	-14.000
19.9	-28.266	-14.000
20	-29.231	-14.000
20.1	-30.077	-14.000
20.2	-30.705	-14.000
20.3	-31.064	-14.000

20.4	-31.167	-14.000
20.5	-31.106	-14.000
20.6	-30.972	-14.000
20.7	-30.845	-14.000
20.8	-30.787	-14.000
20.9	-30.811	-14.000
21	-30.934	-14.000
21.1	-31.153	-14.000
21.2	-31.454	-14.000
21.3	-31.811	-14.000
21.4	-32.198	-14.000
21.5	-32.559	-14.000
21.6	-32.829	-14.000
21.7	-32.960	-14.000
21.8	-32.877	-14.000
21.9	-32.590	-14.000
22	-32.139	-14.000
22.1	-31.568	-14.000
22.2	-30.967	-14.000
22.3	-30.387	-14.000
22.4	-29.866	-14.000
22.5	-29.430	-14.000
22.6	-29.103	-14.000
22.7	-28.882	-14.000
22.8	-28.769	-14.000
22.9	-28.777	-14.000
23	-28.888	-14.000
23.1	-29.109	-14.000
23.2	-29.439	-14.000
23.3	-29.867	-14.000
23.4	-30.411	-14.000
23.5	-31.061	-14.000
23.6	-31.819	-14.000
23.7	-32.704	-14.000
23.8	-33.690	-14.000
23.9	-34.767	-14.000
24	-35.873	-14.000
24.1	-36.860	-14.000
24.2	-37.559	-14.000
24.3	-37.783	-14.000
24.4	-37.526	-14.000
24.5	-36.984	-14.000
24.6	-36.344	-14.000
24.7	-35.773	-14.000
24.8	-35.354	-14.000
24.9	-35.106	-14.000
25	-35.083	-14.000
25.1	-35.276	-14.000
25.2	-35.694	-14.000

25.3	-36.397	-14.000
25.4	-37.390	-14.000
25.5	-38.749	-14.000
25.6	-40.605	-14.000
25.7	-43.146	-14.000
25.8	-46.616	-14.000
25.9	-50.066	-14.000
26	-48.434	-14.000
26.1	-44.371	-14.000
26.2	-41.231	-14.000
26.3	-38.910	-14.000
26.4	-37.149	-14.000
26.5	-35.793	-14.000
26.6	-34.768	-14.000
26.7	-34.013	-14.000
26.8	-33.481	-14.000
26.9	-33.183	-14.000
27	-33.084	-14.000
27.1	-33.168	-14.000
27.2	-33.477	-14.000
27.3	-33.968	-14.000
27.4	-34.655	-14.000
27.5	-35.563	-14.000
27.6	-36.668	-14.000
27.7	-37.971	-14.000
27.8	-39.437	-14.000
27.9	-40.918	-14.000
28	-42.167	-14.000
28.1	-42.774	-14.000
28.2	-42.515	-14.000
28.3	-41.716	-14.000
28.4	-40.669	-14.000
28.5	-39.628	-14.000
28.6	-38.723	-14.000
28.7	-37.946	-14.000
28.8	-37.327	-14.000
28.9	-36.867	-14.000
29	-36.547	-14.000
29.1	-36.397	-14.000
29.2	-36.407	-14.000
29.3	-36.558	-14.000
29.4	-36.897	-14.000
29.5	-37.373	-14.000
29.6	-37.941	-14.000
29.7	-38.602	-14.000
29.8	-39.166	-14.000
29.9	-39.484	-14.000
30	-39.462	-14.000

1.3.4. Elevation Pattern for Co-pol, Narrow Angle (0°~30°)



-21.5dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

18-25log(θ)	dBW/4kHz	for	$3.0^\circ \leq \theta \leq 19.1^\circ$
-14	dBW/4kHz	for	$19.1^\circ < \theta \leq 180^\circ$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

2.3.4. Elevation Pattern for Co-pol (0°~30°)

F=14.50GHz, -21.5dBW/4KHz EIRP sd		
0	17.200	
0.1	17.176	
0.2	17.106	
0.3	16.987	
0.4	16.822	
0.5	16.607	
0.6	16.343	
0.7	16.029	
0.8	15.663	
0.9	15.245	
1	14.771	
1.1	14.241	
1.2	13.652	
1.3	13.001	
1.4	12.284	
1.5	11.498	
1.6	10.637	
1.7	9.696	
1.8	8.666	
1.9	7.540	
2	6.306	
2.1	4.948	
2.2	3.450	
2.3	1.783	
2.4	-0.086	
2.5	-2.213	
2.6	-4.677	
2.7	-7.616	
2.8	-11.288	
2.9	-16.170	
3	-22.533	6.072
3.1	-22.522	5.716
3.2	-18.392	5.371
3.3	-15.917	5.037
3.4	-14.571	4.713
3.5	-13.935	4.398
3.6	-13.809	4.092
3.7	-14.089	3.795
3.8	-14.718	3.505
3.9	-15.680	3.223
4	-16.956	2.949
4.1	-18.528	2.680
4.2	-20.319	2.419
4.3	-22.052	2.163
4.4	-23.226	1.914
4.5	-23.359	1.670
4.6	-22.724	1.431
4.7	-21.887	1.198
4.8	-21.193	0.969

4.9	-20.748	0.745
5	-20.562	0.526
5.1	-20.568	0.311
5.2	-20.677	0.100
5.3	-20.715	-0.107
5.4	-20.492	-0.310
5.5	-19.873	-0.509
5.6	-18.884	-0.705
5.7	-17.678	-0.897
5.8	-16.417	-1.086
5.9	-15.213	-1.271
6	-14.117	-1.454
6.1	-13.155	-1.633
6.2	-12.329	-1.810
6.3	-11.635	-1.984
6.4	-11.071	-2.154
6.5	-10.624	-2.323
6.6	-10.294	-2.489
6.7	-10.069	-2.652
6.8	-9.948	-2.813
6.9	-9.923	-2.971
7	-9.990	-3.127
7.1	-10.148	-3.281
7.2	-10.389	-3.433
7.3	-10.712	-3.583
7.4	-11.112	-3.731
7.5	-11.585	-3.877
7.6	-12.127	-4.020
7.7	-12.731	-4.162
7.8	-13.389	-4.302
7.9	-14.093	-4.441
8	-14.827	-4.577
8.1	-15.576	-4.712
8.2	-16.316	-4.845
8.3	-17.019	-4.977
8.4	-17.657	-5.107
8.5	-18.196	-5.235
8.6	-18.618	-5.362
8.7	-18.909	-5.488
8.8	-19.076	-5.612
8.9	-19.137	-5.735
9	-19.116	-5.856
9.1	-19.044	-5.976
9.2	-18.941	-6.095
9.3	-18.832	-6.212
9.4	-18.733	-6.328
9.5	-18.657	-6.443
9.6	-18.618	-6.557
9.7	-18.624	-6.669
9.8	-18.685	-6.781
9.9	-18.812	-6.891

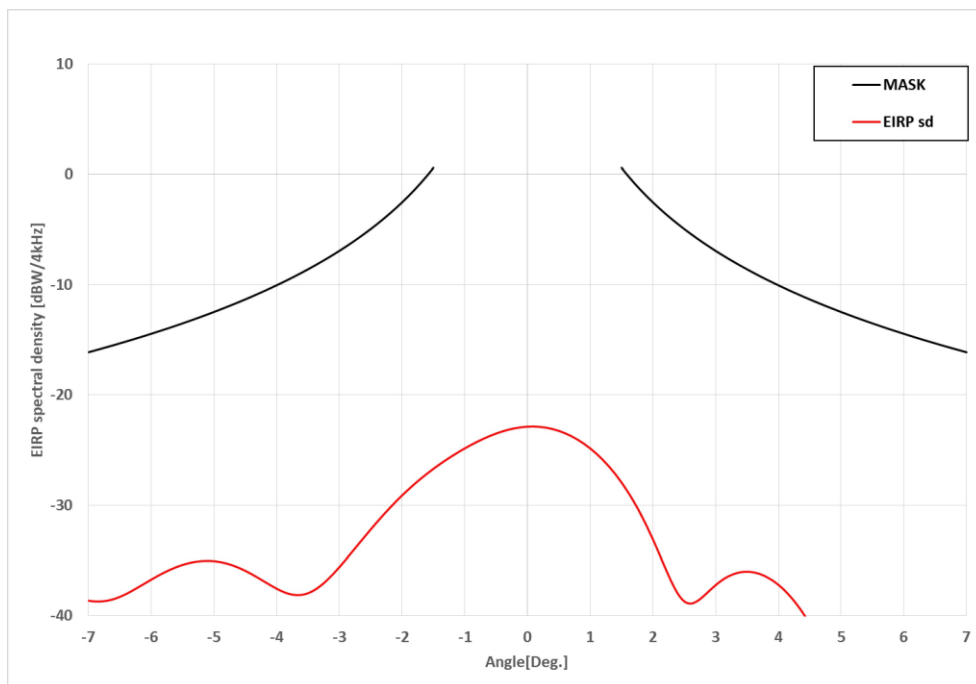
10	-19.012	-7.000
10.1	-19.295	-7.108
10.2	-19.672	-7.215
10.3	-20.151	-7.321
10.4	-20.750	-7.426
10.5	-21.477	-7.530
10.6	-22.361	-7.633
10.7	-23.420	-7.735
10.8	-24.693	-7.836
10.9	-26.229	-7.936
11	-28.096	-8.035
11.1	-30.394	-8.133
11.2	-33.195	-8.230
11.3	-36.181	-8.327
11.4	-37.449	-8.423
11.5	-35.670	-8.517
11.6	-33.139	-8.611
11.7	-31.003	-8.705
11.8	-29.303	-8.797
11.9	-27.930	-8.889
12	-26.776	-8.980
12.1	-25.763	-9.070
12.2	-24.836	-9.159
12.3	-23.953	-9.248
12.4	-23.098	-9.336
12.5	-22.261	-9.423
12.6	-21.445	-9.509
12.7	-20.661	-9.595
12.8	-19.917	-9.680
12.9	-19.222	-9.765
13	-18.589	-9.849
13.1	-18.018	-9.932
13.2	-17.520	-10.014
13.3	-17.093	-10.096
13.4	-16.739	-10.178
13.5	-16.462	-10.258
13.6	-16.258	-10.338
13.7	-16.135	-10.418
13.8	-16.086	-10.497
13.9	-16.116	-10.575
14	-16.225	-10.653
14.1	-16.411	-10.730
14.2	-16.682	-10.807
14.3	-17.033	-10.883
14.4	-17.469	-10.959
14.5	-17.989	-11.034
14.6	-18.593	-11.109
14.7	-19.282	-11.183
14.8	-20.044	-11.257
14.9	-20.879	-11.330
15	-21.757	-11.402
15.1	-22.653	-11.474

15.2	-23.520	-11.546
15.3	-24.295	-11.617
15.4	-24.934	-11.688
15.5	-25.389	-11.758
15.6	-25.682	-11.828
15.7	-25.856	-11.897
15.8	-25.985	-11.966
15.9	-26.152	-12.035
16	-26.407	-12.103
16.1	-26.827	-12.171
16.2	-27.449	-12.238
16.3	-28.339	-12.305
16.4	-29.581	-12.371
16.5	-31.290	-12.437
16.6	-33.710	-12.503
16.7	-37.242	-12.568
16.8	-42.087	-12.633
16.9	-41.767	-12.697
17	-36.720	-12.761
17.1	-33.035	-12.825
17.2	-30.418	-12.888
17.3	-28.480	-12.951
17.4	-26.983	-13.014
17.5	-25.812	-13.076
17.6	-24.895	-13.138
17.7	-24.178	-13.199
17.8	-23.643	-13.261
17.9	-23.261	-13.321
18	-23.024	-13.382
18.1	-22.926	-13.442
18.2	-22.956	-13.502
18.3	-23.130	-13.561
18.4	-23.432	-13.620
18.5	-23.877	-13.679
18.6	-24.464	-13.738
18.7	-25.191	-13.796
18.8	-26.063	-13.854
18.9	-27.050	-13.912
19	-28.105	-13.969
19.1	-29.115	-14.026
19.2	-29.888	-14.000
19.3	-30.218	-14.000
19.4	-29.998	-14.000
19.5	-29.356	-14.000
19.6	-28.495	-14.000
19.7	-27.590	-14.000
19.8	-26.744	-14.000
19.9	-25.992	-14.000
20	-25.358	-14.000
20.1	-24.837	-14.000
20.2	-24.429	-14.000
20.3	-24.133	-14.000

20.4	-23.937	-14.000
20.5	-23.849	-14.000
20.6	-23.856	-14.000
20.7	-23.958	-14.000
20.8	-24.154	-14.000
20.9	-24.430	-14.000
21	-24.786	-14.000
21.1	-25.204	-14.000
21.2	-25.667	-14.000
21.3	-26.152	-14.000
21.4	-26.626	-14.000
21.5	-27.051	-14.000
21.6	-27.389	-14.000
21.7	-27.604	-14.000
21.8	-27.678	-14.000
21.9	-27.610	-14.000
22	-27.420	-14.000
22.1	-27.138	-14.000
22.2	-26.799	-14.000
22.3	-26.433	-14.000
22.4	-26.064	-14.000
22.5	-25.713	-14.000
22.6	-25.389	-14.000
22.7	-25.103	-14.000
22.8	-24.859	-14.000
22.9	-24.656	-14.000
23	-24.499	-14.000
23.1	-24.384	-14.000
23.2	-24.306	-14.000
23.3	-24.265	-14.000
23.4	-24.255	-14.000
23.5	-24.271	-14.000
23.6	-24.311	-14.000
23.7	-24.371	-14.000
23.8	-24.447	-14.000
23.9	-24.542	-14.000
24	-24.653	-14.000
24.1	-24.782	-14.000
24.2	-24.932	-14.000
24.3	-25.103	-14.000
24.4	-25.295	-14.000
24.5	-25.510	-14.000
24.6	-25.743	-14.000
24.7	-25.987	-14.000
24.8	-26.238	-14.000
24.9	-26.478	-14.000
25	-26.699	-14.000
25.1	-26.888	-14.000
25.2	-27.033	-14.000

25.3	-27.135	-14.000
25.4	-27.191	-14.000
25.5	-27.210	-14.000
25.6	-27.204	-14.000
25.7	-27.182	-14.000
25.8	-27.162	-14.000
25.9	-27.147	-14.000
26	-27.146	-14.000
26.1	-27.170	-14.000
26.2	-27.216	-14.000
26.3	-27.295	-14.000
26.4	-27.407	-14.000
26.5	-27.560	-14.000
26.6	-27.767	-14.000
26.7	-28.033	-14.000
26.8	-28.375	-14.000
26.9	-28.811	-14.000
27	-29.349	-14.000
27.1	-30.023	-14.000
27.2	-30.843	-14.000
27.3	-31.834	-14.000
27.4	-33.035	-14.000
27.5	-34.474	-14.000
27.6	-36.190	-14.000
27.7	-38.232	-14.000
27.8	-40.606	-14.000
27.9	-43.020	-14.000
28	-44.679	-14.000
28.1	-44.519	-14.000
28.2	-43.120	-14.000
28.3	-41.588	-14.000
28.4	-40.306	-14.000
28.5	-39.314	-14.000
28.6	-38.574	-14.000
28.7	-38.053	-14.000
28.8	-37.695	-14.000
28.9	-37.477	-14.000
29	-37.356	-14.000
29.1	-37.270	-14.000
29.2	-37.177	-14.000
29.3	-36.971	-14.000
29.4	-36.583	-14.000
29.5	-35.983	-14.000
29.6	-35.182	-14.000
29.7	-34.255	-14.000
29.8	-33.275	-14.000
29.9	-32.310	-14.000
30	-31.413	-14.000

1.1.3. Azimuth Pattern for Cross-pol, Narrow angle (-7°~7°)



-21.5dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^\circ \leq \theta \leq 7.0^\circ$$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

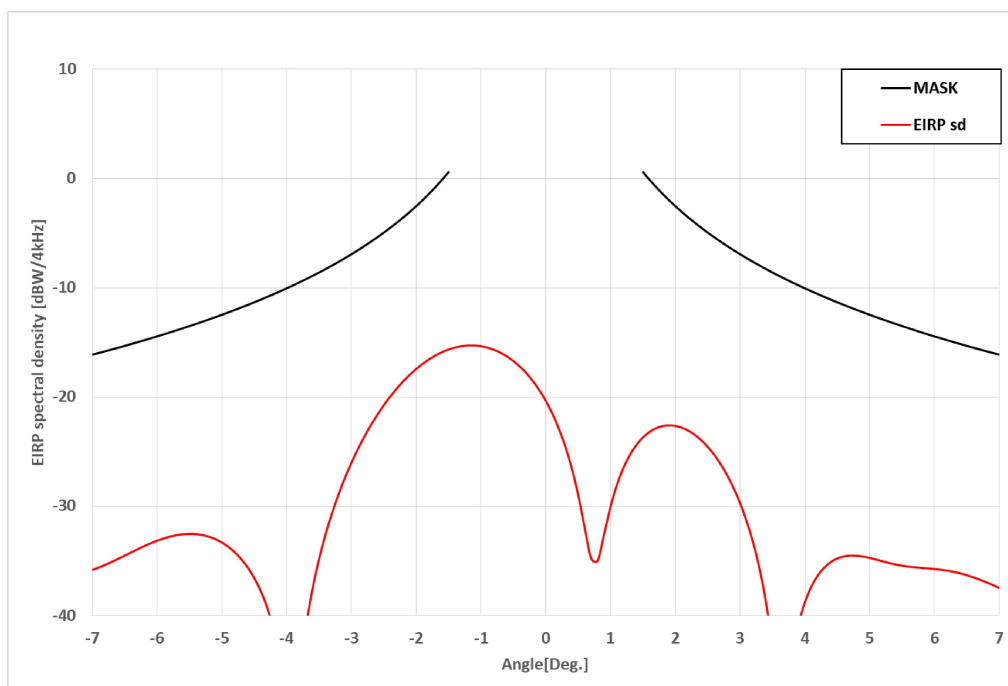
2.1.3. Azimuth Pattern for Cross-pol ($-7^{\circ}\sim 7^{\circ}$)

F=13.75GHz, -21.5dBW/4KHz EIRP sd		
-7	-38.647	-16.127
-6.9	-38.714	-15.971
-6.8	-38.717	-15.813
-6.7	-38.650	-15.652
-6.6	-38.511	-15.489
-6.5	-38.306	-15.323
-6.4	-38.045	-15.154
-6.3	-37.744	-14.984
-6.2	-37.416	-14.810
-6.1	-37.079	-14.633
-6	-36.743	-14.454
-5.9	-36.420	-14.271
-5.8	-36.118	-14.086
-5.7	-35.845	-13.897
-5.6	-35.606	-13.705
-5.5	-35.405	-13.509
-5.4	-35.246	-13.310
-5.3	-35.130	-13.107
-5.2	-35.061	-12.900
-5.1	-35.040	-12.689
-5	-35.067	-12.474
-4.9	-35.146	-12.255
-4.8	-35.272	-12.031
-4.7	-35.448	-11.802
-4.6	-35.670	-11.569
-4.5	-35.932	-11.330
-4.4	-36.232	-11.086
-4.3	-36.557	-10.837
-4.2	-36.898	-10.581
-4.1	-37.238	-10.320
-4	-37.556	-10.051
-3.9	-37.828	-9.777
-3.8	-38.029	-9.495
-3.7	-38.131	-9.205
-3.6	-38.116	-8.908
-3.5	-37.971	-8.602
-3.4	-37.697	-8.287
-3.3	-37.305	-7.963
-3.2	-36.811	-7.629
-3.1	-36.242	-7.284
-3	-35.615	-6.928
-2.9	-34.952	-6.560
-2.8	-34.270	-6.179
-2.7	-33.578	-5.784
-2.6	-32.889	-5.374
-2.5	-32.210	-4.949
-2.4	-31.547	-4.505
-2.3	-30.904	-4.043
-2.2	-30.286	-3.561

-2.1	-29.693	-3.055
-2	-29.127	-2.526
-1.9	-28.589	-1.969
-1.8	-28.079	-1.382
-1.7	-27.597	-0.761
-1.6	-27.139	-0.103
-1.5	-26.707	0.598
-1.4	-26.296	
-1.3	-25.907	
-1.2	-25.537	
-1.1	-25.185	
-1	-24.852	
-0.9	-24.538	
-0.8	-24.245	
-0.7	-23.973	
-0.6	-23.724	
-0.5	-23.503	
-0.4	-23.310	
-0.3	-23.149	
-0.2	-23.023	
-0.1	-22.932	
0	-22.881	
0.1	-22.870	
0.2	-22.902	
0.3	-22.977	
0.4	-23.097	
0.5	-23.265	
0.6	-23.480	
0.7	-23.744	
0.8	-24.060	
0.9	-24.429	
1	-24.855	
1.1	-25.339	
1.2	-25.887	
1.3	-26.501	
1.4	-27.188	
1.5	-27.952	0.598
1.6	-28.799	-0.103
1.7	-29.736	-0.761
1.8	-30.768	-1.382
1.9	-31.896	-1.969
2	-33.116	-2.526
2.1	-34.412	-3.055
2.2	-35.733	-3.561
2.3	-36.994	-4.043
2.4	-38.042	-4.505
2.5	-38.709	-4.949
2.6	-38.911	-5.374
2.7	-38.708	-5.784
2.8	-38.266	-6.179
2.9	-37.740	-6.560

3	-37.232	-6.928
3.1	-36.793	-7.284
3.2	-36.449	-7.629
3.3	-36.204	-7.963
3.4	-36.061	-8.287
3.5	-36.018	-8.602
3.6	-36.070	-8.908
3.7	-36.217	-9.205
3.8	-36.455	-9.495
3.9	-36.786	-9.777
4	-37.207	-10.051
4.1	-37.721	-10.320
4.2	-38.331	-10.581
4.3	-39.037	-10.837
4.4	-39.842	-11.086
4.5	-40.746	-11.330
4.6	-41.745	-11.569
4.7	-42.825	-11.802
4.8	-43.952	-12.031
4.9	-45.046	-12.255
5	-45.991	-12.474
5.1	-46.615	-12.689
5.2	-46.785	-12.900
5.3	-46.513	-13.107
5.4	-45.920	-13.310
5.5	-45.178	-13.509
5.6	-44.408	-13.705
5.7	-43.675	-13.897
5.8	-43.013	-14.086
5.9	-42.431	-14.271
6	-41.929	-14.454
6.1	-41.505	-14.633
6.2	-41.152	-14.810
6.3	-40.864	-14.984
6.4	-40.637	-15.154
6.5	-40.463	-15.323
6.6	-40.340	-15.489
6.7	-40.262	-15.652
6.8	-40.224	-15.813
6.9	-40.227	-15.971
7	-40.260	-16.127

1.3.3. Azimuth Pattern for Cross-pol, Narrow angle ($-7^{\circ} \sim 7^{\circ}$)



-21.5dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^{\circ} \leq \theta \leq 7.0^{\circ}$$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

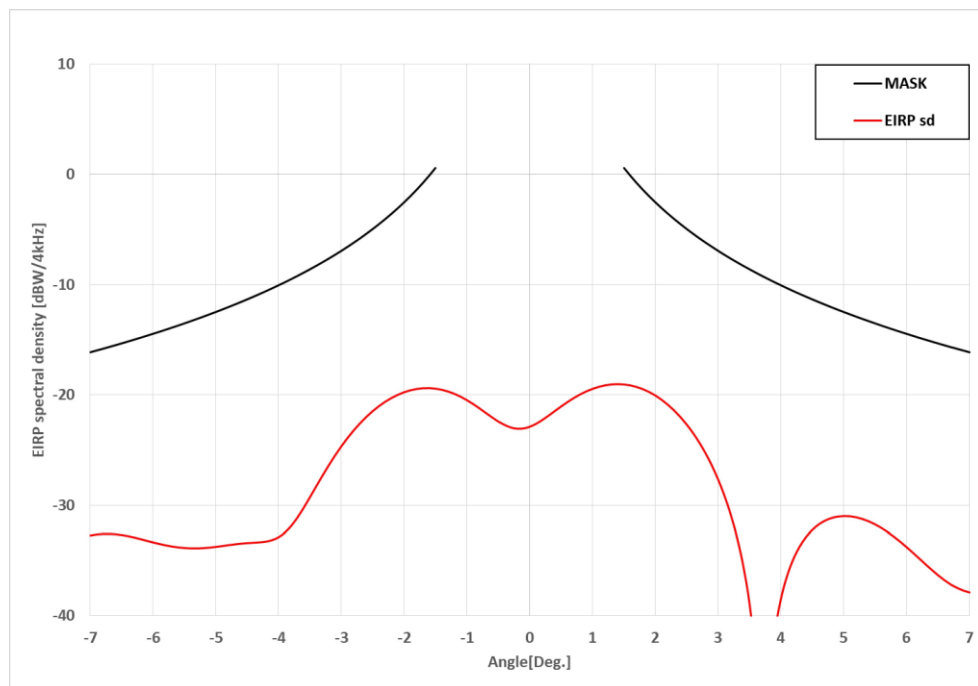
2.3.3. Azimuth Pattern for Cross-pol ($-7^{\circ}\sim 7^{\circ}$)

F=14.50GHz, -21.5dBW/4KHz EIRP sd		
-7	-35.850	-16.127
-6.9	-35.621	-15.971
-6.8	-35.372	-15.813
-6.7	-35.105	-15.652
-6.6	-34.822	-15.489
-6.5	-34.531	-15.323
-6.4	-34.235	-15.154
-6.3	-33.944	-14.984
-6.2	-33.664	-14.810
-6.1	-33.403	-14.633
-6	-33.166	-14.454
-5.9	-32.959	-14.271
-5.8	-32.789	-14.086
-5.7	-32.658	-13.897
-5.6	-32.574	-13.705
-5.5	-32.540	-13.509
-5.4	-32.562	-13.310
-5.3	-32.645	-13.107
-5.2	-32.796	-12.900
-5.1	-33.019	-12.689
-5	-33.328	-12.474
-4.9	-33.728	-12.255
-4.8	-34.233	-12.031
-4.7	-34.861	-11.802
-4.6	-35.633	-11.569
-4.5	-36.590	-11.330
-4.4	-37.782	-11.086
-4.3	-39.312	-10.837
-4.2	-41.339	-10.581
-4.1	-44.161	-10.320
-4	-48.059	-10.051
-3.9	-49.866	-9.777
-3.8	-45.358	-9.495
-3.7	-40.941	-9.205
-3.6	-37.552	-8.908
-3.5	-34.851	-8.602
-3.4	-32.592	-8.287
-3.3	-30.644	-7.963
-3.2	-28.931	-7.629
-3.1	-27.399	-7.284
-3	-26.019	-6.928
-2.9	-24.765	-6.560
-2.8	-23.623	-6.179
-2.7	-22.579	-5.784
-2.6	-21.624	-5.374
-2.5	-20.750	-4.949
-2.4	-19.951	-4.505
-2.3	-19.223	-4.043
-2.2	-18.562	-3.561

-2.1	-17.966	-3.055
-2	-17.431	-2.526
-1.9	-16.957	-1.969
-1.8	-16.543	-1.382
-1.7	-16.187	-0.761
-1.6	-15.889	-0.103
-1.5	-15.650	0.598
-1.4	-15.470	
-1.3	-15.349	
-1.2	-15.288	
-1.1	-15.288	
-1	-15.352	
-0.9	-15.480	
-0.8	-15.676	
-0.7	-15.942	
-0.6	-16.284	
-0.5	-16.707	
-0.4	-17.217	
-0.3	-17.823	
-0.2	-18.538	
-0.1	-19.376	
0	-20.359	
0.1	-21.514	
0.2	-22.883	
0.3	-24.521	
0.4	-26.514	
0.5	-28.971	
0.6	-31.946	
0.7	-34.802	
0.8	-35.015	
0.9	-32.589	
1	-30.046	
1.1	-28.030	
1.2	-26.479	
1.3	-25.294	
1.4	-24.387	
1.5	-23.705	0.598
1.6	-23.208	-0.103
1.7	-22.870	-0.761
1.8	-22.675	-1.382
1.9	-22.605	-1.969
2	-22.655	-2.526
2.1	-22.817	-3.055
2.2	-23.090	-3.561
2.3	-23.471	-4.043
2.4	-23.963	-4.505
2.5	-24.570	-4.949
2.6	-25.300	-5.374
2.7	-26.162	-5.784
2.8	-27.173	-6.179
2.9	-28.355	-6.560

3	-29.738	-6.928
3.1	-31.373	-7.284
3.2	-33.332	-7.629
3.3	-35.747	-7.963
3.4	-38.837	-8.287
3.5	-43.056	-8.602
3.6	-48.586	-8.908
3.7	-48.628	-9.205
3.8	-44.063	-9.495
3.9	-40.910	-9.777
4	-38.814	-10.051
4.1	-37.368	-10.320
4.2	-36.342	-10.581
4.3	-35.620	-10.837
4.4	-35.121	-11.086
4.5	-34.796	-11.330
4.6	-34.610	-11.569
4.7	-34.534	-11.802
4.8	-34.545	-12.031
4.9	-34.621	-12.255
5	-34.744	-12.474
5.1	-34.894	-12.689
5.2	-35.053	-12.900
5.3	-35.207	-13.107
5.4	-35.344	-13.310
5.5	-35.456	-13.509
5.6	-35.543	-13.705
5.7	-35.608	-13.897
5.8	-35.658	-14.086
5.9	-35.704	-14.271
6	-35.756	-14.454
6.1	-35.821	-14.633
6.2	-35.908	-14.810
6.3	-36.019	-14.984
6.4	-36.157	-15.154
6.5	-36.324	-15.323
6.6	-36.516	-15.489
6.7	-36.732	-15.652
6.8	-36.969	-15.813
6.9	-37.224	-15.971
7	-37.496	-16.127

1.1.5. Elevation Pattern for Cross-pol, Narrow angle (-7°~7°)



-21.5dBW/4kHz Input power spectral density @ f=13.75GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^\circ \leq \theta \leq 7.0^\circ$$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

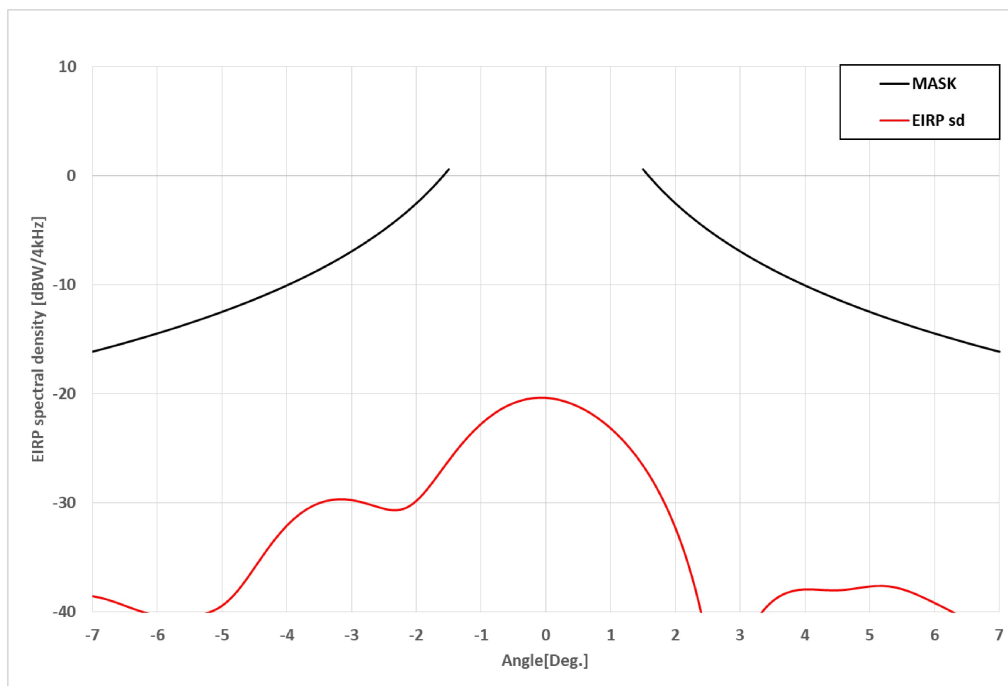
2.1.5. Elevation Pattern for Cross-pol (-7°~7°)

F=13.75GHz, -21.5dBW/4KHz EIRP sd		
-7	-32.739	-16.127
-6.9	-32.645	-15.971
-6.8	-32.594	-15.813
-6.7	-32.586	-15.652
-6.6	-32.620	-15.489
-6.5	-32.690	-15.323
-6.4	-32.792	-15.154
-6.3	-32.918	-14.984
-6.2	-33.060	-14.810
-6.1	-33.208	-14.633
-6	-33.356	-14.454
-5.9	-33.494	-14.271
-5.8	-33.619	-14.086
-5.7	-33.724	-13.897
-5.6	-33.806	-13.705
-5.5	-33.863	-13.509
-5.4	-33.894	-13.310
-5.3	-33.898	-13.107
-5.2	-33.876	-12.900
-5.1	-33.831	-12.689
-5	-33.767	-12.474
-4.9	-33.690	-12.255
-4.8	-33.610	-12.031
-4.7	-33.535	-11.802
-4.6	-33.471	-11.569
-4.5	-33.424	-11.330
-4.4	-33.390	-11.086
-4.3	-33.351	-10.837
-4.2	-33.287	-10.581
-4.1	-33.150	-10.320
-4	-32.897	-10.051
-3.9	-32.485	-9.777
-3.8	-31.894	-9.495
-3.7	-31.137	-9.205
-3.6	-30.253	-8.908
-3.5	-29.294	-8.602
-3.4	-28.308	-8.287
-3.3	-27.332	-7.963
-3.2	-26.392	-7.629
-3.1	-25.503	-7.284
-3	-24.673	-6.928
-2.9	-23.907	-6.560
-2.8	-23.204	-6.179
-2.7	-22.566	-5.784
-2.6	-21.990	-5.374
-2.5	-21.474	-4.949
-2.4	-21.017	-4.505
-2.3	-20.618	-4.043
-2.2	-20.276	-3.561

-2.1	-19.989	-3.055
-2	-19.758	-2.526
-1.9	-19.581	-1.969
-1.8	-19.460	-1.382
-1.7	-19.394	-0.761
-1.6	-19.383	-0.103
-1.5	-19.427	0.598
-1.4	-19.527	
-1.3	-19.682	
-1.2	-19.892	
-1.1	-20.154	
-1	-20.466	
-0.9	-20.821	
-0.8	-21.210	
-0.7	-21.619	
-0.6	-22.026	
-0.5	-22.407	
-0.4	-22.728	
-0.3	-22.957	
-0.2	-23.065	
-0.1	-23.039	
0	-22.881	
0.1	-22.612	
0.2	-22.264	
0.3	-21.866	
0.4	-21.448	
0.5	-21.035	
0.6	-20.640	
0.7	-20.277	
0.8	-19.953	
0.9	-19.673	
1	-19.441	
1.1	-19.258	
1.2	-19.126	
1.3	-19.046	
1.4	-19.019	
1.5	-19.048	0.598
1.6	-19.131	-0.103
1.7	-19.273	-0.761
1.8	-19.473	-1.382
1.9	-19.733	-1.969
2	-20.055	-2.526
2.1	-20.441	-3.055
2.2	-20.896	-3.561
2.3	-21.420	-4.043
2.4	-22.020	-4.505
2.5	-22.700	-4.949
2.6	-23.468	-5.374
2.7	-24.334	-5.784
2.8	-25.313	-6.179
2.9	-26.422	-6.560

3	-27.688	-6.928
3.1	-29.151	-7.284
3.2	-30.867	-7.629
3.3	-32.935	-7.963
3.4	-35.522	-8.287
3.5	-38.980	-8.602
3.6	-44.159	-8.908
3.7	-51.948	-9.205
3.8	-46.976	-9.495
3.9	-41.624	-9.777
4	-38.459	-10.051
4.1	-36.346	-10.320
4.2	-34.836	-10.581
4.3	-33.712	-10.837
4.4	-32.868	-11.086
4.5	-32.229	-11.330
4.6	-31.752	-11.569
4.7	-31.409	-11.802
4.8	-31.175	-12.031
4.9	-31.038	-12.255
5	-30.985	-12.474
5.1	-31.007	-12.689
5.2	-31.099	-12.900
5.3	-31.255	-13.107
5.4	-31.471	-13.310
5.5	-31.742	-13.509
5.6	-32.065	-13.705
5.7	-32.436	-13.897
5.8	-32.850	-14.086
5.9	-33.300	-14.271
6	-33.781	-14.454
6.1	-34.285	-14.633
6.2	-34.803	-14.810
6.3	-35.325	-14.984
6.4	-35.835	-15.154
6.5	-36.323	-15.323
6.6	-36.768	-15.489
6.7	-37.159	-15.652
6.8	-37.481	-15.813
6.9	-37.725	-15.971
7	-37.893	-16.127

1.3.5. Elevation Pattern for Cross-pol, Narrow angle (-7°~7°)



-21.5dBW/4kHz Input power spectral density @ f=14.50GHz

■ FCC EIRP spectral density regulation

$$5-25\log(\theta) \quad \text{dBW/4kHz} \quad \text{for} \quad 1.5^\circ \leq \theta \leq 7.0^\circ$$

The v60E's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -21.5 dBW/ 4kHz

2.3.5. Elevation Pattern for Cross-pol (-7°~7°)

F=14.50GHz, -21.5dBW/4KHz EIRP sd					
-7	-38.545	-16.127	-2.1	-30.261	-3.055
-6.9	-38.662	-15.971	-2	-29.810	-2.526
-6.8	-38.812	-15.813	-1.9	-29.209	-1.969
-6.7	-38.995	-15.652	-1.8	-28.496	-1.382
-6.6	-39.200	-15.489	-1.7	-27.716	-0.761
-6.5	-39.417	-15.323	-1.6	-26.910	-0.103
-6.4	-39.637	-15.154	-1.5	-26.109	0.598
-6.3	-39.848	-14.984	-1.4	-25.337	
-6.2	-40.036	-14.810	-1.3	-24.607	
-6.1	-40.198	-14.633	-1.2	-23.929	
-6	-40.322	-14.454	-1.1	-23.308	
-5.9	-40.409	-14.271	-1	-22.746	
-5.8	-40.459	-14.086	-0.9	-22.245	
-5.7	-40.472	-13.897	-0.8	-21.804	
-5.6	-40.453	-13.705	-0.7	-21.423	
-5.5	-40.407	-13.509	-0.6	-21.101	
-5.4	-40.327	-13.310	-0.5	-20.838	
-5.3	-40.210	-13.107	-0.4	-20.632	
-5.2	-40.037	-12.900	-0.3	-20.482	
-5.1	-39.783	-12.689	-0.2	-20.388	
-5	-39.428	-12.474	-0.1	-20.347	
-4.9	-38.949	-12.255	0	-20.359	
-4.8	-38.339	-12.031	0.1	-20.422	
-4.7	-37.619	-11.802	0.2	-20.535	
-4.6	-36.810	-11.569	0.3	-20.697	
-4.5	-35.957	-11.330	0.4	-20.905	
-4.4	-35.095	-11.086	0.5	-21.160	
-4.3	-34.255	-10.837	0.6	-21.463	
-4.2	-33.464	-10.581	0.7	-21.812	
-4.1	-32.736	-10.320	0.8	-22.209	
-4	-32.082	-10.051	0.9	-22.655	
-3.9	-31.508	-9.777	1	-23.153	
-3.8	-31.015	-9.495	1.1	-23.707	
-3.7	-30.602	-9.205	1.2	-24.320	
-3.6	-30.269	-8.908	1.3	-24.998	
-3.5	-30.011	-8.602	1.4	-25.747	
-3.4	-29.827	-8.287	1.5	-26.576	0.598
-3.3	-29.712	-7.963	1.6	-27.493	-0.103
-3.2	-29.662	-7.629	1.7	-28.509	-0.761
-3.1	-29.671	-7.284	1.8	-29.637	-1.382
-3	-29.735	-6.928	1.9	-30.893	-1.969
-2.9	-29.847	-6.560	2	-32.298	-2.526
-2.8	-29.998	-6.179	2.1	-33.883	-3.055
-2.7	-30.175	-5.784	2.2	-35.681	-3.561
-2.6	-30.360	-5.374	2.3	-37.754	-4.043
-2.5	-30.527	-4.949	2.4	-40.163	-4.505
-2.4	-30.640	-4.505	2.5	-42.987	-4.949
-2.3	-30.659	-4.043	2.6	-46.097	-5.374
-2.2	-30.542	-3.561	2.7	-48.416	-5.784
			2.8	-48.055	-6.179
			2.9	-46.044	-6.560

3	-44.066	-6.928
3.1	-42.477	-7.284
3.2	-41.248	-7.629
3.3	-40.297	-7.963
3.4	-39.562	-8.287
3.5	-39.002	-8.602
3.6	-38.584	-8.908
3.7	-38.284	-9.205
3.8	-38.086	-9.495
3.9	-37.971	-9.777
4	-37.923	-10.051
4.1	-37.924	-10.320
4.2	-37.952	-10.581
4.3	-37.987	-10.837
4.4	-38.012	-11.086
4.5	-38.009	-11.330
4.6	-37.975	-11.569
4.7	-37.910	-11.802
4.8	-37.824	-12.031
4.9	-37.735	-12.255
5	-37.660	-12.474
5.1	-37.612	-12.689
5.2	-37.611	-12.900
5.3	-37.656	-13.107
5.4	-37.756	-13.310
5.5	-37.908	-13.509
5.6	-38.105	-13.705
5.7	-38.340	-13.897
5.8	-38.602	-14.086
5.9	-38.881	-14.271
6	-39.170	-14.454
6.1	-39.464	-14.633
6.2	-39.765	-14.810
6.3	-40.081	-14.984
6.4	-40.422	-15.154
6.5	-40.800	-15.323
6.6	-41.237	-15.489
6.7	-41.740	-15.652
6.8	-42.325	-15.813
6.9	-42.998	-15.971
7	-43.758	-16.127