

## **EXHIBITS 2 THROUGH 16**

### **25.221(b)(1)(i) Tables for Antennas**

**Exhibits 2, 3 and 4 are the 25.221(b)(1)(i) tables for the 2.4 meter Sea Tel model 9707, 9797 and 9711 C-band antennas and the C-band side of the Sea Tel model 9711 QOR antenna**

**Exhibits 5, 6 and 7 are the 25.222(b)(1)(i) tables for the 2.4 meter Intellian model v240 C-band antenna**

**Exhibits 8, 9 and 10 are the 25.222(b)(1)(i) tables for the 1.2 meter Ku-band side of the Sea Tel model 9711 QOR antenna**

**Exhibits 11, 12 and 13 are the 25.222(b)(1)(i) tables for the 1.06 meter Intellian model v100 Ku-band antenna**

**Exhibits 14, 15 and 16 are the 25.222(b)(1)(i) tables for the 1.25 meter Intellian model v130 Ku-band antenna**

(A)

2.

# Cobham SATCOM, SeaTel Products

2.4m (Offset) EIRPsd Data Table

Azimuth Co-Pol 6.04GHz @ -7dBW/4KHz Radome Loss 0.25dB

Angle	EIRPsd	Mask
Degrees	dBW/4KHz	dBW/4KHz
-179.0	-32.4	-14.0
-178.0	-37.2	-14.0
-177.0	-30.2	-14.0
-176.0	-26.1	-14.0
-175.0	-23.8	-14.0
-174.0	-25.3	-14.0
-173.0	-23.1	-14.0
-172.0	-21.0	-14.0
-171.0	-19.4	-14.0
-170.0	-17.4	-14.0
-169.0	-18.6	-14.0
-168.0	-15.3	-14.0
-167.0	-19.2	-14.0
-166.0	-15.6	-14.0
-165.0	-20.5	-14.0
-164.0	-19.7	-14.0
-163.0	-15.2	-14.0
-162.0	-16.1	-14.0
-161.0	-13.8	-14.0
-160.0	-16.4	-14.0
-159.0	-18.3	-14.0
-158.0	-22.6	-14.0
-157.0	-19.6	-14.0
-156.0	-21.1	-14.0
-155.0	-20.7	-14.0
-154.0	-22.4	-14.0
-153.0	-20.3	-14.0
-152.0	-18.8	-14.0
-151.0	-17.8	-14.0
-150.0	-20.2	-14.0
-149.0	-22.0	-14.0
-148.0	-19.4	-14.0
-147.0	-17.2	-14.0
-146.0	-15.4	-14.0
-145.0	-14.7	-14.0
-144.0	-13.6	-14.0
-143.0	-13.2	-14.0
-142.0	-13.5	-14.0
-141.0	-13.9	-14.0
-140.0	-14.4	-14.0
-139.0	-14.6	-14.0

Angle	EIRPsd	Mask
Degrees	dBW/4KHz	dBW/4KHz
0.0	34.0	
0.1	34.0	
0.2	33.7	
0.3	33.4	
0.4	32.8	
0.5	32.2	
0.6	31.4	
0.7	30.5	
0.8	29.3	
0.9	28.0	
1.0	26.5	
1.1	24.8	
1.2	22.8	
1.3	20.7	
1.4	18.4	
1.5	15.9	
1.6	13.3	21.2
1.7	10.7	20.5
1.8	8.2	19.9
1.9	5.2	19.3
2.0	2.5	18.8
2.1	-0.1	18.2
2.2	-2.1	17.7
2.3	-2.3	17.3
2.4	-1.0	16.8
2.5	0.3	16.4
2.6	0.9	15.9
2.7	0.8	15.5
2.8	0.0	15.1
2.9	-1.3	14.7
3.0	-3.9	14.4
3.1	-7.9	14.0
3.2	-11.4	13.7
3.3	-8.8	13.3
3.4	-5.4	13.0
3.5	-2.9	12.7
3.6	-1.7	12.4
3.7	-1.2	12.1
3.8	-1.2	11.8
3.9	-1.9	11.5
4.0	-3.1	11.3

(A)

2

-138.0	-15.0	-14.0
-137.0	-16.8	-14.0
-136.0	-16.2	-14.0
-135.0	-16.4	-14.0
-134.0	-16.7	-14.0
-133.0	-16.9	-14.0
-132.0	-17.1	-14.0
-131.0	-17.6	-14.0
-130.0	-15.2	-14.0
-129.0	-14.0	-14.0
-128.0	-13.0	-14.0
-127.0	-13.2	-14.0
-126.0	-13.9	-14.0
-125.0	-13.3	-14.0
-124.0	-13.5	-14.0
-123.0	-12.8	-14.0
-122.0	-12.3	-14.0
-121.0	-11.8	-14.0
-120.0	-12.9	-14.0
-119.0	-13.9	-14.0
-118.0	-17.4	-14.0
-117.0	-18.3	-14.0
-116.0	-15.5	-14.0
-115.0	-14.5	-14.0
-114.0	-17.6	-14.0
-113.0	-18.5	-14.0
-112.0	-17.3	-14.0
-111.0	-18.6	-14.0
-110.0	-19.6	-14.0
-109.0	-18.5	-14.0
-108.0	-20.6	-14.0
-107.0	-21.9	-14.0
-106.0	-18.9	-14.0
-105.0	-19.2	-14.0
-104.0	-20.5	-14.0
-103.0	-20.7	-14.0
-102.0	-21.2	-14.0
-101.0	-21.7	-14.0
-100.0	-21.6	-14.0
-99.0	-23.7	-14.0
-98.0	-27.3	-14.0
-97.0	-28.6	-14.0
-96.0	-28.6	-14.0
-95.0	-25.3	-14.0
-94.0	-23.9	-14.0
-93.0	-22.6	-14.0
-92.0	-21.7	-14.0

4.1	-4.8	11.0
4.2	-7.1	10.7
4.3	-10.5	10.5
4.4	-15.2	10.2
4.5	-21.4	10.0
4.6	-24.3	9.7
4.7	-19.1	9.5
4.8	-15.5	9.3
4.9	-12.8	9.0
5.0	-10.5	8.8
5.1	-8.4	8.6
5.2	-6.9	8.4
5.3	-5.8	8.2
5.4	-5.0	8.0
5.5	-4.6	7.8
5.6	-4.6	7.6
5.7	-4.9	7.4
5.8	-5.5	7.2
5.9	-6.6	7.0
6.0	-8.0	6.8
6.1	-9.5	6.7
6.2	-10.9	6.5
6.3	-12.1	6.3
6.4	-12.5	6.1
6.5	-12.5	6.0
6.6	-12.4	5.8
6.7	-12.5	5.6
6.8	-12.9	5.5
6.9	-13.7	5.3
7.0	-14.7	5.2
7.1	-15.7	5.3
7.2	-16.0	5.3
7.3	-15.3	5.3
7.4	-14.1	5.3
7.5	-12.7	5.3
7.6	-11.3	5.3
7.7	-10.3	5.3
7.8	-9.4	5.3
7.9	-8.8	5.3
8.0	-8.4	5.3
8.1	-8.2	5.3
8.2	-8.3	5.3
8.3	-8.7	5.3
8.4	-9.3	5.3
8.5	-10.1	5.3
8.6	-11.1	5.3
8.7	-12.2	5.3

(A)

2

-91.0	-21.4	-14.0
-90.0	-21.8	-14.0
-89.0	-24.7	-14.0
-88.0	-26.2	-14.0
-87.0	-26.6	-14.0
-86.0	-26.2	-14.0
-85.0	-23.5	-14.0
-84.0	-27.9	-14.0
-83.0	-37.8	-14.0
-82.0	-42.3	-14.0
-81.0	-38.5	-14.0
-80.0	-39.9	-14.0
-79.0	-30.3	-14.0
-78.0	-32.2	-14.0
-77.0	-31.4	-14.0
-76.0	-34.6	-14.0
-75.0	-29.7	-14.0
-74.0	-27.9	-14.0
-73.0	-26.2	-14.0
-72.0	-23.9	-14.0
-71.0	-23.5	-14.0
-70.0	-27.7	-14.0
-69.0	-32.2	-14.0
-68.0	-32.3	-14.0
-67.0	-27.6	-14.0
-66.0	-37.1	-14.0
-65.0	-24.4	-14.0
-64.0	-25.4	-14.0
-63.0	-30.5	-14.0
-62.0	-30.2	-14.0
-61.0	-40.9	-14.0
-60.0	-27.3	-14.0
-59.0	-21.0	-14.0
-58.0	-20.8	-14.0
-57.0	-23.4	-14.0
-56.0	-24.2	-14.0
-55.0	-30.9	-14.0
-54.0	-26.5	-14.0
-53.0	-27.8	-14.0
-52.0	-24.8	-14.0
-51.0	-21.4	-14.0
-50.0	-24.7	-14.0
-49.0	-27.7	-14.0
-48.0	-20.4	-12.7
-47.0	-21.3	-12.5
-46.0	-29.6	-12.3
-45.0	-27.4	-12.0

8.8	-13.2	5.3
8.9	-13.7	5.3
9.0	-13.9	5.3
9.1	-14.0	5.3
9.2	-14.2	5.3
9.3	-14.7	5.1
9.4	-15.7	5.0
9.5	-17.4	4.9
9.6	-19.5	4.7
9.7	-21.8	4.6
9.8	-21.2	4.5
9.9	-18.7	4.4
10.0	-16.2	4.3
11.0	-15.6	3.3
12.0	-16.6	2.3
13.0	-24.7	1.5
14.0	-29.8	0.6
15.0	-20.1	-0.1
16.0	-17.8	-0.8
17.0	-20.8	-1.5
18.0	-20.5	-2.1
19.0	-21.9	-2.7
20.0	-24.8	-3.2
21.0	-34.4	-3.8
22.0	-28.6	-4.3
23.0	-28.8	-4.7
24.0	-28.8	-5.2
25.0	-26.2	-5.6
26.0	-25.0	-6.1
27.0	-22.5	-6.5
28.0	-22.5	-6.9
29.0	-23.5	-7.3
30.0	-23.4	-7.6
31.0	-21.6	-8.0
32.0	-20.3	-8.3
33.0	-21.1	-8.7
34.0	-23.0	-9.0
35.0	-27.0	-9.3
36.0	-31.8	-9.6
37.0	-36.0	-9.9
38.0	-29.0	-10.2
39.0	-26.0	-10.5
40.0	-20.0	-10.7
41.0	-20.0	-11.0
42.0	-18.2	-11.3
43.0	-21.9	-11.5
44.0	-23.0	-11.8

(A)

2

-44.0	-33.5	-11.8
-43.0	-29.5	-11.5
-42.0	-25.5	-11.3
-41.0	-22.5	-11.0
-40.0	-27.6	-10.7
-39.0	-28.4	-10.5
-38.0	-22.8	-10.2
-37.0	-21.9	-9.9
-36.0	-22.2	-9.6
-35.0	-19.4	-9.3
-34.0	-21.4	-9.0
-33.0	-18.7	-8.7
-32.0	-19.9	-8.3
-31.0	-21.9	-8.0
-30.0	-21.5	-7.6
-29.0	-23.7	-7.3
-28.0	-30.3	-6.9
-27.0	-24.0	-6.5
-26.0	-23.9	-6.1
-25.0	-28.0	-5.6
-24.0	-23.4	-5.2
-23.0	-26.8	-4.7
-22.0	-26.9	-4.3
-21.0	-36.7	-3.8
-20.0	-31.1	-3.2
-19.0	-18.1	-2.7
-18.0	-17.5	-2.1
-17.0	-20.6	-1.5
-16.0	-19.5	-0.8
-15.0	-23.9	-0.1
-14.0	-21.8	0.6
-13.0	-13.7	1.5
-12.0	-15.2	2.3
-11.0	-13.2	3.3
-10.0	-14.6	4.3
-9.9	-14.4	4.4
-9.8	-14.2	4.5
-9.7	-14.1	4.6
-9.6	-14.2	4.7
-9.5	-14.4	4.9
-9.4	-15.0	5.0
-9.3	-16.1	5.1
-9.2	-17.9	5.3
-9.1	-20.6	5.3
-9.0	-24.5	5.3
-8.9	-27.0	5.3
-8.8	-23.0	5.3

45.0	-22.0	-12.0
46.0	-22.7	-12.3
47.0	-24.9	-12.5
48.0	-29.5	-12.7
49.0	-22.3	-14.0
50.0	-24.9	-14.0
51.0	-28.6	-14.0
52.0	-21.8	-14.0
53.0	-22.2	-14.0
54.0	-23.5	-14.0
55.0	-22.3	-14.0
56.0	-26.9	-14.0
57.0	-43.0	-14.0
58.0	-24.2	-14.0
59.0	-22.1	-14.0
60.0	-39.8	-14.0
61.0	-31.9	-14.0
62.0	-34.5	-14.0
63.0	-29.5	-14.0
64.0	-23.3	-14.0
65.0	-29.4	-14.0
66.0	-30.8	-14.0
67.0	-28.4	-14.0
68.0	-30.2	-14.0
69.0	-29.4	-14.0
70.0	-33.8	-14.0
71.0	-29.3	-14.0
72.0	-22.0	-14.0
73.0	-23.9	-14.0
74.0	-26.1	-14.0
75.0	-32.1	-14.0
76.0	-33.5	-14.0
77.0	-28.1	-14.0
78.0	-27.0	-14.0
79.0	-32.7	-14.0
80.0	-33.5	-14.0
81.0	-27.9	-14.0
82.0	-32.0	-14.0
83.0	-36.5	-14.0
84.0	-44.1	-14.0
85.0	-27.0	-14.0
86.0	-26.1	-14.0
87.0	-28.7	-14.0
88.0	-27.7	-14.0
89.0	-25.8	-14.0
90.0	-28.7	-14.0
91.0	-27.8	-14.0

(A)

2

-8.7	-19.4	5.3
-8.6	-17.2	5.3
-8.5	-16.0	5.3
-8.4	-15.5	5.3
-8.3	-15.7	5.3
-8.2	-16.5	5.3
-8.1	-17.9	5.3
-8.0	-19.9	5.3
-7.9	-21.0	5.3
-7.8	-20.2	5.3
-7.7	-18.0	5.3
-7.6	-16.2	5.3
-7.5	-15.1	5.3
-7.4	-14.5	5.3
-7.3	-14.5	5.3
-7.2	-14.7	5.3
-7.1	-15.5	5.3
-7.0	-16.6	5.2
-6.9	-17.9	5.3
-6.8	-19.2	5.5
-6.7	-21.0	5.6
-6.6	-22.9	5.8
-6.5	-24.4	6.0
-6.4	-23.1	6.1
-6.3	-19.5	6.3
-6.2	-16.1	6.5
-6.1	-13.3	6.7
-6.0	-11.2	6.8
-5.9	-9.5	7.0
-5.8	-8.4	7.2
-5.7	-7.9	7.4
-5.6	-7.9	7.6
-5.5	-8.5	7.8
-5.4	-9.6	8.0
-5.3	-11.4	8.2
-5.2	-14.0	8.4
-5.1	-17.4	8.6
-5.0	-17.9	8.8
-4.9	-15.7	9.0
-4.8	-13.8	9.3
-4.7	-12.9	9.5
-4.6	-13.5	9.7
-4.5	-15.6	10.0
-4.4	-20.4	10.2
-4.3	-20.5	10.5
-4.2	-14.3	10.7
-4.1	-9.7	11.0

92.0	-26.7	-14.0
93.0	-23.6	-14.0
94.0	-22.5	-14.0
95.0	-21.9	-14.0
96.0	-23.3	-14.0
97.0	-23.3	-14.0
98.0	-24.0	-14.0
99.0	-23.9	-14.0
100.0	-27.9	-14.0
101.0	-25.4	-14.0
102.0	-20.3	-14.0
103.0	-18.7	-14.0
104.0	-18.4	-14.0
105.0	-16.6	-14.0
106.0	-16.7	-14.0
107.0	-16.7	-14.0
108.0	-16.7	-14.0
109.0	-16.2	-14.0
110.0	-18.3	-14.0
111.0	-18.6	-14.0
112.0	-16.7	-14.0
113.0	-16.1	-14.0
114.0	-16.5	-14.0
115.0	-16.3	-14.0
116.0	-15.9	-14.0
117.0	-14.7	-14.0
118.0	-15.1	-14.0
119.0	-15.9	-14.0
120.0	-16.4	-14.0
121.0	-15.5	-14.0
122.0	-16.5	-14.0
123.0	-17.3	-14.0
124.0	-16.3	-14.0
125.0	-15.9	-14.0
126.0	-16.5	-14.0
127.0	-16.4	-14.0
128.0	-15.3	-14.0
129.0	-16.0	-14.0
130.0	-16.2	-14.0
131.0	-16.4	-14.0
132.0	-15.7	-14.0
133.0	-15.8	-14.0
134.0	-16.4	-14.0
135.0	-15.6	-14.0
136.0	-16.1	-14.0
137.0	-16.0	-14.0
138.0	-16.1	-14.0

(A)

2

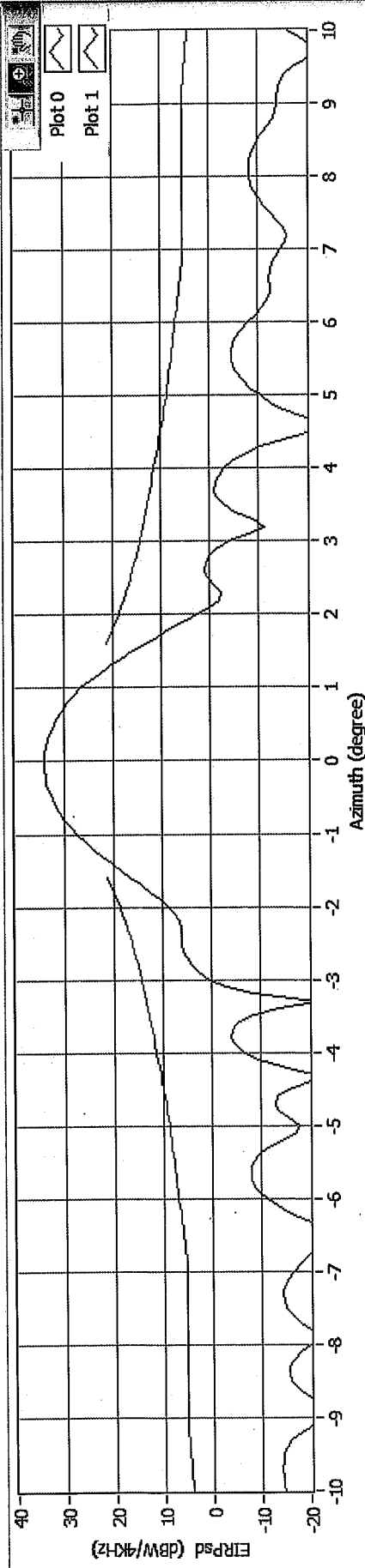
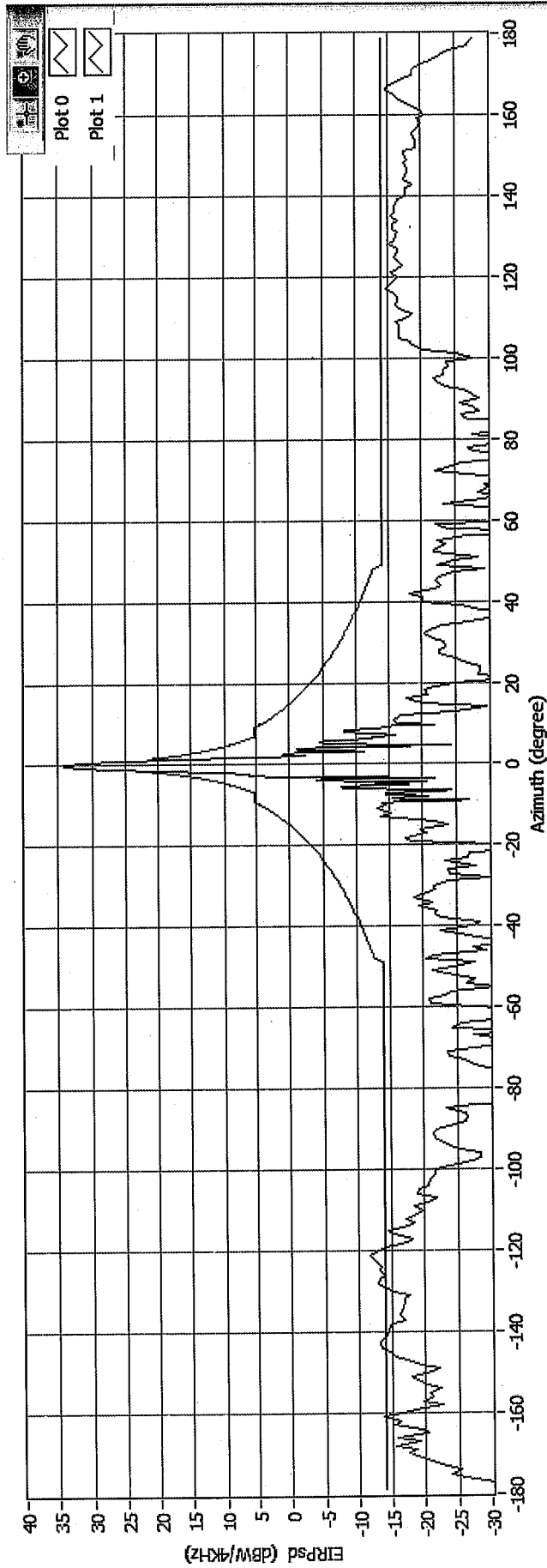
-4.0	-6.7	11.3
-3.9	-5.0	11.5
-3.8	-4.1	11.8
-3.7	-4.2	12.1
-3.6	-5.2	12.4
-3.5	-7.6	12.7
-3.4	-13.6	13.0
-3.3	-21.8	13.3
-3.2	-8.6	13.7
-3.1	-3.1	14.0
-3.0	0.4	14.4
-2.9	2.7	14.7
-2.8	4.2	15.1
-2.7	5.1	15.5
-2.6	5.7	15.9
-2.5	5.9	16.4
-2.4	6.1	16.8
-2.3	6.1	17.3
-2.2	6.4	17.7
-2.1	7.2	18.2
-2.0	8.6	18.8
-1.9	10.4	19.3
-1.8	12.3	19.9
-1.7	14.3	20.5
-1.6	16.5	21.2
-1.5	18.4	
-1.4	20.5	
-1.3	22.4	
-1.2	24.2	
-1.1	25.8	
-1.0	27.3	
-0.9	28.7	
-0.8	29.9	
-0.7	30.9	
-0.6	31.8	
-0.5	32.4	
-0.4	33.0	
-0.3	33.5	
-0.2	33.8	
-0.1	34.0	

139.0	-16.4	-14.0
140.0	-17.6	-14.0
141.0	-17.6	-14.0
142.0	-17.7	-14.0
143.0	-18.6	-14.0
144.0	-17.6	-14.0
145.0	-17.7	-14.0
146.0	-18.0	-14.0
147.0	-17.9	-14.0
148.0	-17.4	-14.0
149.0	-18.0	-14.0
150.0	-17.3	-14.0
151.0	-17.5	-14.0
152.0	-19.3	-14.0
153.0	-19.3	-14.0
154.0	-19.2	-14.0
155.0	-18.6	-14.0
156.0	-18.8	-14.0
157.0	-19.8	-14.0
158.0	-19.8	-14.0
159.0	-19.5	-14.0
160.0	-20.5	-14.0
161.0	-20.2	-14.0
162.0	-18.8	-14.0
163.0	-17.8	-14.0
164.0	-16.3	-14.0
165.0	-15.9	-14.0
166.0	-14.7	-14.0
167.0	-15.1	-14.0
168.0	-16.3	-14.0
169.0	-17.1	-14.0
170.0	-18.6	-14.0
171.0	-18.6	-14.0
172.0	-19.2	-14.0
173.0	-20.9	-14.0
174.0	-22.1	-14.0
175.0	-23.0	-14.0
176.0	-24.3	-14.0
177.0	-27.1	-14.0
178.0	-27.2	-14.0
179.0	-27.8	-14.0

(A)

2

### 6040 MHz Azimuth VV Pin=-7.0 (dBW/4KHz) Radome Loss 0.25dB



Source File	Freq(MHz)	Scan	Pol	EIRPsd	Over%	a=	a~7	7~9.2	9.2~48	48~180
M:\TestData\ DataBase\9797_2006_LoopCanyon_FCC\6040_AZ_VV.sea	6040	AZ	VV	34.05	4.02	1.50	0.00	0.00	0.00	2.18



(03)

3

# Cobham SATCOM, SeaTel Products

2.4m (Offset) EIRPsd Data Table

Elevation Co-Pol 6.04GHz @ -7dBW/4KHz Radome Loss 0.25dB

Angle	EIRPsd	Mask
Degrees	dBW/4KHz	dBW/4KHz
0.0	34.1	
0.1	34.0	
0.2	33.9	
0.3	33.6	
0.4	33.3	
0.5	32.9	
0.6	32.3	
0.7	31.7	
0.8	30.9	
0.9	30.1	
1.0	29.1	
1.1	28.0	
1.2	26.7	
1.3	25.3	
1.4	23.9	
1.5	22.0	
1.6	20.1	21.2
1.7	18.7	20.5
1.8	17.2	19.9
1.9	16.4	19.3
2.0	15.9	18.8
2.1	15.7	18.2
2.2	15.5	17.7
2.3	15.2	17.3
2.4	14.8	16.8
2.5	14.1	16.4
2.6	12.9	15.9
2.7	11.5	15.5
2.8	9.4	15.1
2.9	7.2	14.7
3.0	3.3	14.4
3.1	-1.2	14.0
3.2	-2.0	13.7
3.3	1.9	13.3
3.4	4.3	13.0
3.5	6.2	12.7
3.6	7.5	12.4
3.7	7.9	12.1
3.8	8.1	11.8
3.9	7.8	11.5
4.0	7.3	11.3

(B)

3

4.1	6.1	11.0
4.2	4.5	10.7
4.3	2.8	10.5
4.4	0.3	10.2
4.5	-2.3	10.0
4.6	-3.1	9.7
4.7	-1.7	9.5
4.8	0.5	9.3
4.9	2.1	9.0
5.0	3.3	8.8
5.1	4.0	8.6
5.2	4.3	8.4
5.3	4.3	8.2
5.4	4.0	8.0
5.5	3.3	7.8
5.6	2.2	7.6
5.7	0.7	7.4
5.8	-1.2	7.2
5.9	-3.5	7.0
6.0	-6.0	6.8
6.1	-6.7	6.7
6.2	-5.4	6.5
6.3	-3.4	6.3
6.4	-2.1	6.1
6.5	-1.0	6.0
6.6	-0.4	5.8
6.7	-0.3	5.6
6.8	-0.5	5.5
6.9	-1.0	5.3
7.0	-2.0	5.2
7.1	-3.8	5.3
7.2	-5.7	5.3
7.3	-9.4	5.3
7.4	-16.4	5.3
7.5	-24.3	5.3
7.6	-13.8	5.3
7.7	-9.5	5.3
7.8	-6.6	5.3
7.9	-5.0	5.3
8.0	-4.1	5.3
8.1	-3.5	5.3
8.2	-3.4	5.3
8.3	-3.7	5.3
8.4	-4.5	5.3
8.5	-5.5	5.3
8.6	-6.8	5.3
8.7	-8.1	5.3

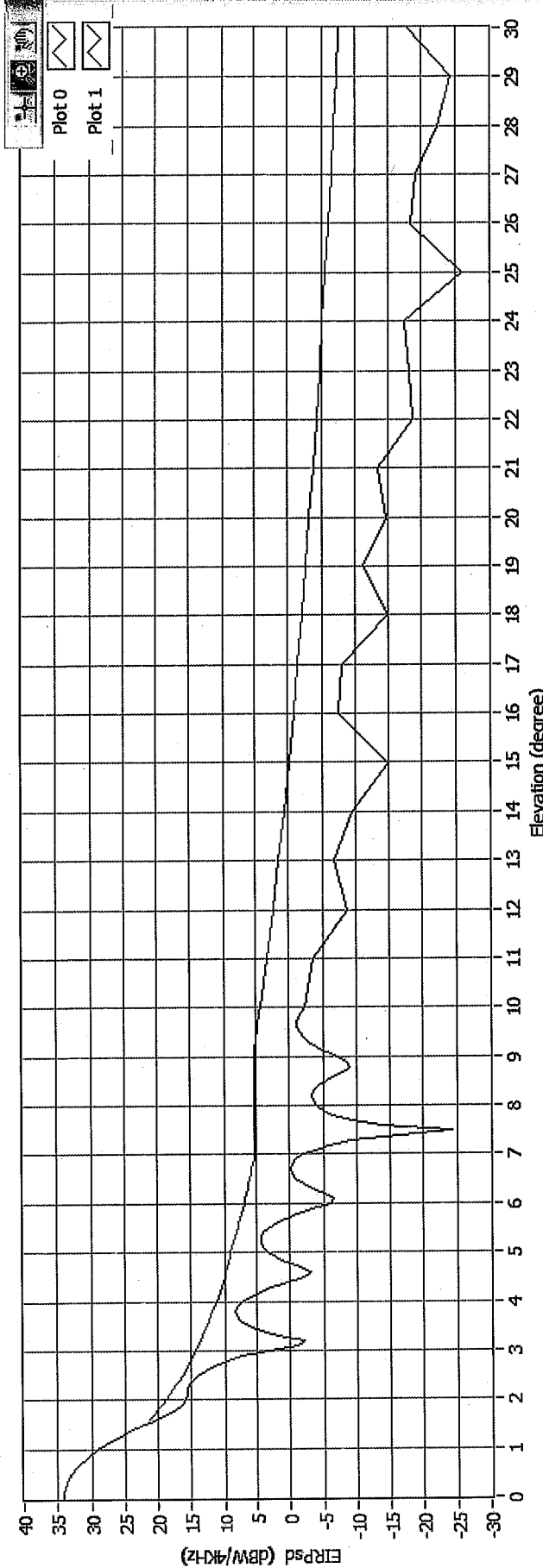
(B)

3

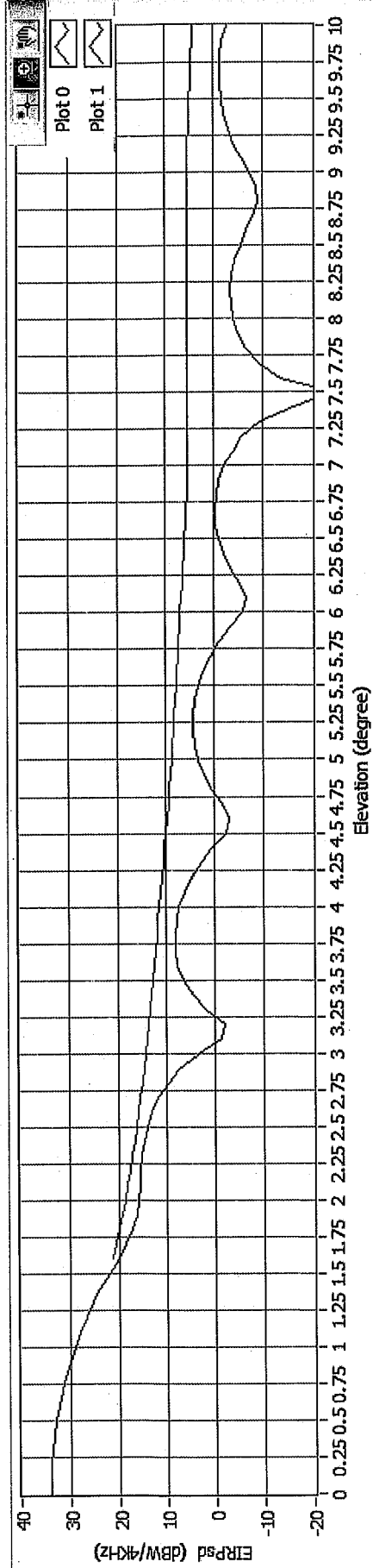
8.8	-9.0	5.3
8.9	-8.6	5.3
9.0	-7.2	5.3
9.1	-5.6	5.3
9.2	-4.1	5.3
9.3	-3.0	5.1
9.4	-2.1	5.0
9.5	-1.5	4.9
9.6	-1.2	4.7
9.7	-1.2	4.6
9.8	-1.4	4.5
9.9	-1.8	4.4
10.0	-2.5	4.3
11.0	-3.5	3.3
12.0	-8.8	2.3
13.0	-6.7	1.5
14.0	-9.6	0.6
15.0	-14.9	-0.1
16.0	-7.5	-0.8
17.0	-8.0	-1.5
18.0	-14.9	-2.1
19.0	-11.3	-2.7
20.0	-14.8	-3.2
21.0	-13.5	-3.8
22.0	-18.8	-4.3
23.0	-18.1	-4.7
24.0	-17.5	-5.2
25.0	-26.1	-5.6
26.0	-18.5	-6.1
27.0	-19.0	-6.5
28.0	-22.4	-6.9
29.0	-24.4	-7.3
30.0	-18.0	-7.6

(B)

### 6040 MHz Elevation HH Pin=-7.0 (dBW/4KHz) Radome Loss 0.25dB



3



Source File	Freq(MHz)	Scan	Pol	EIRPsd	Over%	a=	a~7	7~9.2	9.2~48	48~180
M:\TestData\ DataBase\9797_2006_LoopCanyon_FCC\6040_EL_HH.sea	6040	EL	HH	34.05	11.58	1.50	0.00	0.00	0.00	9.07

10

4

# Cobham SATCOM, SeaTel Products

2.4m (Offset) EIRPsd Data Table

Azimuth X-Pol 6.04GHz @ -7dBW/4KHz Radome Loss 0.25dB

Angle Degrees	EIRPsd dBW/4KHz	Mask dBW/4KHz
-10.0	-24.4	
-9.9	-23.9	
-9.8	-23.9	
-9.7	-24.6	
-9.6	-25.6	
-9.5	-26.8	
-9.4	-27.7	
-9.3	-27.0	
-9.2	-25.6	
-9.1	-24.1	-4.7
-9.0	-23.1	-4.7
-8.9	-22.7	-4.7
-8.8	-22.8	-4.7
-8.7	-23.6	-4.7
-8.6	-25.2	-4.7
-8.5	-27.9	-4.7
-8.4	-31.9	-4.7
-8.3	-34.9	-4.7
-8.2	-31.5	-4.7
-8.1	-27.8	-4.7
-8.0	-25.3	-4.7
-7.9	-24.1	-4.7
-7.8	-23.3	-4.7
-7.7	-22.7	-4.7
-7.6	-22.0	-4.7
-7.5	-20.8	-4.7
-7.4	-19.4	-4.7
-7.3	-18.1	-4.7
-7.2	-17.0	-4.7
-7.1	-16.2	-4.7
-7.0	-15.8	-4.7
-6.9	-15.9	-4.7
-6.8	-16.5	-4.6
-6.7	-17.6	-4.4
-6.6	-19.3	-4.2
-6.5	-22.1	-4.1
-6.4	-25.4	-3.9
-6.3	-26.8	-3.7
-6.2	-24.5	-3.6
-6.1	-22.1	-3.4
-6.0	-20.5	-3.2

Angle Degrees	EIRPsd dBW/4KHz	Mask dBW/4KHz
0.0	-2.4	
0.1	3.2	
0.2	7.4	
0.3	10.3	
0.4	12.3	
0.5	13.6	
0.6	14.6	
0.7	15.1	
0.8	15.4	
0.9	15.4	
1.0	15.1	
1.1	14.6	
1.2	13.8	
1.3	12.7	
1.4	11.4	
1.5	9.7	
1.6	7.7	
1.7	5.5	
1.8	2.8	
1.9	-0.2	9.5
2.0	-3.0	8.9
2.1	-5.4	8.4
2.2	-6.4	7.9
2.3	-7.2	7.4
2.4	-8.3	6.9
2.5	-10.1	6.5
2.6	-13.1	6.0
2.7	-16.6	5.6
2.8	-16.3	5.2
2.9	-13.4	4.8
3.0	-11.0	4.5
3.1	-9.7	4.1
3.2	-9.2	3.8
3.3	-9.6	3.4
3.4	-10.7	3.1
3.5	-12.4	2.8
3.6	-14.7	2.5
3.7	-16.4	2.2
3.8	-15.7	1.9
3.9	-13.8	1.6
4.0	-12.2	1.3

(C)

4

-5.9	-19.9	-3.0
-5.8	-19.9	-2.8
-5.7	-20.3	-2.6
-5.6	-20.6	-2.5
-5.5	-20.2	-2.3
-5.4	-18.9	-2.1
-5.3	-17.4	-1.9
-5.2	-16.2	-1.7
-5.1	-15.5	-1.4
-5.0	-15.5	-1.2
-4.9	-16.2	-1.0
-4.8	-18.0	-0.8
-4.7	-21.1	-0.6
-4.6	-28.0	-0.3
-4.5	-28.7	-0.1
-4.4	-21.3	0.2
-4.3	-17.3	0.4
-4.2	-15.0	0.7
-4.1	-13.8	0.9
-4.0	-13.6	1.2
-3.9	-14.5	1.5
-3.8	-16.7	1.7
-3.7	-21.7	2.0
-3.6	-30.4	2.3
-3.5	-19.1	2.6
-3.4	-13.7	2.9
-3.3	-10.3	3.3
-3.2	-8.2	3.6
-3.1	-6.9	3.9
-3.0	-6.2	4.3
-2.9	-6.0	4.6
-2.8	-6.3	5.0
-2.7	-7.0	5.4
-2.6	-8.0	5.8
-2.5	-9.0	6.2
-2.4	-9.6	6.7
-2.3	-9.4	7.1
-2.2	-8.7	7.6
-2.1	-7.6	8.1
-2.0	-6.2	8.6
-1.9	-4.2	9.2
-1.8	-1.9	9.8
-1.7	0.8	
-1.6	3.4	
-1.5	5.6	
-1.4	7.5	
-1.3	9.1	

4.1	-11.1	1.0
4.2	-10.7	0.8
4.3	-10.7	0.5
4.4	-11.3	0.3
4.5	-12.1	0.0
4.6	-13.2	-0.2
4.7	-14.4	-0.4
4.8	-15.4	-0.7
4.9	-16.0	-0.9
5.0	-16.3	-1.1
5.1	-16.4	-1.3
5.2	-16.3	-1.5
5.3	-16.2	-1.8
5.4	-16.0	-2.0
5.5	-15.6	-2.2
5.6	-15.1	-2.4
5.7	-14.5	-2.5
5.8	-14.2	-2.7
5.9	-14.1	-2.9
6.0	-14.3	-3.1
6.1	-15.0	-3.3
6.2	-16.2	-3.5
6.3	-18.2	-3.6
6.4	-20.8	-3.8
6.5	-23.7	-4.0
6.6	-23.8	-4.1
6.7	-21.3	-4.3
6.8	-19.1	-4.5
6.9	-17.5	-4.6
7.0	-16.7	-4.8
7.1	-16.5	-4.7
7.2	-16.8	-4.7
7.3	-17.5	-4.7
7.4	-18.4	-4.7
7.5	-19.5	-4.7
7.6	-20.2	-4.7
7.7	-20.2	-4.7
7.8	-19.9	-4.7
7.9	-19.6	-4.7
8.0	-19.5	-4.7
8.1	-19.9	-4.7
8.2	-20.7	-4.7
8.3	-22.2	-4.7
8.4	-24.5	-4.7
8.5	-27.2	-4.7
8.6	-30.2	-4.7
8.7	-30.7	-4.7

(C)

4

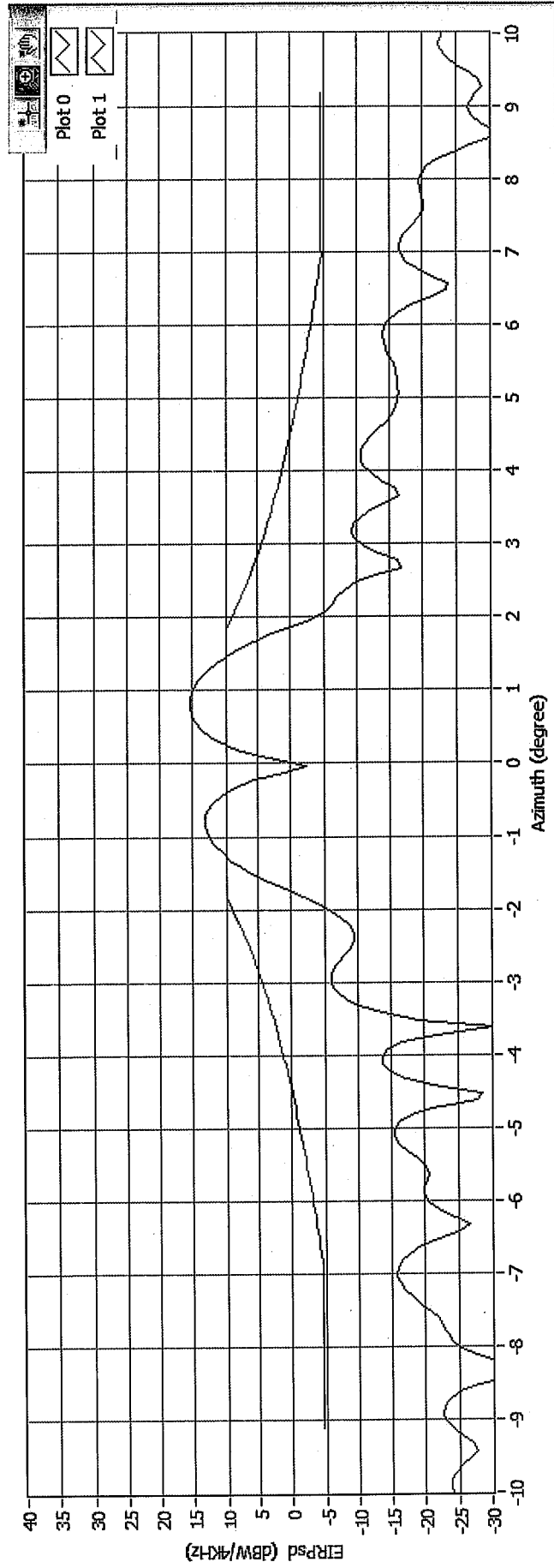
-1.2	10.5	
-1.1	11.5	
-1.0	12.4	
-0.9	12.9	
-0.8	13.1	
-0.7	13.0	
-0.6	12.6	
-0.5	11.9	
-0.4	10.5	
-0.3	8.6	
-0.2	5.4	
-0.1	0.8	

8.8	-28.8	-4.7
8.9	-27.6	-4.7
9.0	-26.9	-4.7
9.1	-27.3	-4.7
9.2	-28.1	-4.7
9.3	-29.1	
9.4	-28.6	
9.5	-27.2	
9.6	-25.2	
9.7	-23.6	
9.8	-22.8	
9.9	-22.5	
10.0	-22.7	

(C)

4

6040 MHz Azimuth HV Pin=-7.0 (dBW/4KHz) Radome Loss 0.25dB



Source File	Freq(MHz)	Scan	Pol	EIRPsd	Over%	a=	a~7	7~9.2
M:\TestData\ DataBase\9797_2006_LoopCanyon_FCC\6040_AZ_HV.sea	6040	AZ	HV	15.40	0.00	1.80	0.00	0.00



(A)  
V24D

S

## 2. EIRP Spectral Density Data

### 2.1. Azimuth pattern for Co-Pol (-10°~10°)

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-10.00	-10.22	4.30
-9.90	-10.61	4.41
-9.80	-10.97	4.52
-9.70	-11.21	4.63
-9.60	-11.26	4.74
-9.50	-11.07	4.86
-9.40	-10.82	4.97
-9.30	-10.49	5.09
-9.20	-10.14	5.21
-9.10	-9.80	5.30
-9.00	-9.69	5.30
-8.90	-9.74	5.30
-8.80	-9.92	5.30
-8.70	-10.22	5.30
-8.60	-10.72	5.30
-8.50	-11.33	5.30
-8.40	-11.92	5.30
-8.30	-12.48	5.30
-8.20	-13.13	5.30
-8.10	-13.68	5.30
-8.00	-14.61	5.30
-7.90	-16.12	5.30
-7.80	-18.35	5.30
-7.70	-20.93	5.30
-7.60	-22.29	5.30
-7.50	-17.42	5.30
-7.40	-12.93	5.30
-7.30	-7.97	5.30
-7.20	-5.32	5.30
-7.10	-3.64	5.30
-7.00	-2.07	5.30
-6.90	-1.07	5.33
-6.80	-0.29	5.49
-6.70	0.18	5.65
-6.60	0.51	5.81
-6.50	0.53	5.98
-6.40	0.37	6.15
-6.30	0.14	6.32
-6.20	-0.16	6.49
-6.10	-0.36	6.67
-6.00	-0.50	6.85
-5.90	-0.41	7.03
-5.80	-0.13	7.21
-5.70	0.13	7.40
-5.60	0.54	7.60
-5.50	0.87	7.79
-5.40	0.96	7.99
-5.30	1.07	8.19
-5.20	1.06	8.40
-5.10	1.03	8.61

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-5.00	0.9410564	8.825749892
-4.90	0.8577819	9.045097999
-4.80	0.9048075	9.268969066
-4.70	0.9293	9.497553552
-4.60	0.9753459	9.731054208
-4.50	0.9792647	9.969687156
-4.40	0.8176142	10.21368309
-4.30	0.3346221	10.46328861
-4.20	-0.4922447	10.71876774
-4.10	-2.0049015	10.98040358
-4.00	-4.6559697	11.24850022
-3.90	-9.9434106	11.52338482
-3.80	-15.5664118	11.80541008
-3.70	-8.097179	12.0949569
-3.60	-2.7019711	12.39243748
-3.50	0.6779939	12.69829889
-3.40	3.2428485	13.01302707
-3.30	4.6271646	13.3371515
-3.20	6.2309335	13.67125054
-3.10	7.4967059	14.01595765
-3.00	8.4430961	14.37196863
-2.90	9.2973945	14.74005005
-2.80	10.017474	15.12104922
-2.70	10.6670151	15.5159059
-2.60	11.1960531	15.9256663
-2.50	11.633979	16.35149978
-2.40	12.0033259	16.79471896
-2.30	12.2825404	17.2568041
-2.20	12.4941556	17.73943298
-2.10	12.6126993	18.24451763
-2.00	12.721446	18.77425011
-1.90	14.07	19.33115998
-1.80	15.583	19.91818737
-1.70	16.91	20.53877697
-1.60	18.6104	21.19700043
-1.50	19.8844911	21.89771852
-1.40	20.9553032	22.64679911
-1.30	22.1142883	23.45141619
-1.20	23.2585779	24.32046885
-1.10	24.6438737	25.26518287
-1.00	26.0164334	26.3
-0.90	27.17481303	
-0.80	28.45776152	
-0.70	29.37310304	
-0.60	30.39665728	
-0.50	31.21625069	
-0.40	31.85935931	
-0.30	32.37258418	
-0.20	32.78698242	
-0.10	33.08895649	

(A)  
V240

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0.00	33.3249992	
0.10	33.2139338	
0.20	32.994344	
0.30	32.661944	
0.40	32.2005812	
0.50	31.60811	
0.60	30.813236	
0.70	29.8152911	
0.80	28.862576	
0.90	27.5797403	
1.00	26.3000984	26.3
1.10	25.0077422	25.26518287
1.20	23.313668	24.32046885
1.30	21.165	23.45141619
1.40	19.277	22.64679911
1.50	17.471	21.89771852
1.60	15.779	21.19700043
1.70	13.8498804	20.53877697
1.80	12.0458404	19.91818737
1.90	12.3094066	19.33115998
2.00	12.5014474	18.77425011
2.10	12.5631748	18.24451763
2.20	12.4573564	17.73943298
2.30	12.2408206	17.2568041
2.40	11.9752948	16.79471896
2.50	11.5902334	16.35149978
2.60	11.1924346	15.9256663
2.70	10.6623628	15.5159059
2.80	10.0744828	15.12104922
2.90	9.4425118	14.74005005
3.00	8.7880054	14.37196863
3.10	8.0041654	14.01595765
3.20	7.085113	13.67125054
3.30	6.0288886	13.3371515
3.40	4.8090376	13.01302707
3.50	3.4020448	12.69829889
3.60	1.0701208	12.39243748
3.70	-1.9652996	12.0949569
3.80	-5.8247318	11.80541008
3.90	-13.4475758	11.52338482
4.00	-21.842066	11.24850022
4.10	-9.0025386	10.98040358
4.20	-5.4762384	10.71876774
4.30	-3.0189	10.46328861
4.40	-1.642281	10.21368309
4.50	-0.8359056	9.969687156
4.60	-0.3744198	9.731054208
4.70	-0.1490658	9.497553552
4.80	0.0214194	9.268969066
4.90	0.1419348	9.045097999

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
5.00	0.2810664	8.825749892
5.10	0.444693	8.610745598
5.20	0.621057	8.399916409
5.30	0.8179968	8.19310326
5.40	0.9414516	7.990156004
5.50	0.954189	7.790932763
5.60	0.8650272	7.595299325
5.70	0.6181176	7.403128608
5.80	0.1830864	7.214300161
5.90	-0.2637024	7.028699709
6.00	-0.927027	6.84621874
6.10	-1.4326038	6.666754125
6.20	-1.8784128	6.490207763
6.30	-2.097888	6.316486264
6.40	-2.1400194	6.14550065
6.50	-2.1067062	5.977166084
6.60	-1.975413	5.811401611
6.70	-2.014605	5.648129932
6.80	-2.1821508	5.487277182
6.90	-2.4917676	5.328772732
7.00	-3.1080618	5.3
7.10	-3.9291342	5.3
7.20	-5.0235708	5.3
7.30	-6.3570786	5.3
7.40	-7.8649908	5.3
7.50	-9.4150344	5.3
7.60	-11.097351	5.3
7.70	-12.1075248	5.3
7.80	-14.4161618	5.3
7.90	-14.0026862	5.3
8.00	-13.0219064	5.3
8.10	-12.1195106	5.3
8.20	-11.2778624	5.3
8.30	-10.5537902	5.3
8.40	-9.7689704	5.3
8.50	-9.1526762	5.3
8.60	-8.7254834	5.3
8.70	-8.3071088	5.3
8.80	-7.928906	5.3
8.90	-7.8034916	5.3
9.00	-7.7613602	5.3
9.10	-7.9210676	5.3
9.20	-8.1993308	5.205304316
9.30	-8.7009884	5.087926286
9.40	-9.2937674	4.97180366
9.50	-10.0756478	4.856909868
9.60	-10.755629	4.743219174
9.70	-11.1044378	4.630706643
9.80	-10.8947606	4.519348108
9.90	-10.304921	4.409120135
10.00	-9.4799294	4.3

(A)  
V240



**2.2. Azimuth pattern for Co-Pol (-180°~180°)**

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-180.00	-30.02	-12.70
-179.00	-33.63	-12.70
-178.00	-32.68	-12.70
-177.00	-33.35	-12.70
-176.00	-30.36	-12.70
-175.00	-32.03	-12.70
-174.00	-27.20	-12.70
-173.00	-35.70	-12.70
-172.00	-33.20	-12.70
-171.00	-38.64	-12.70
-170.00	-34.69	-12.70
-169.00	-35.69	-12.70
-168.00	-42.43	-12.70
-167.00	-34.53	-12.70
-166.00	-40.56	-12.70
-165.00	-41.91	-12.70
-164.00	-31.27	-12.70
-163.00	-44.29	-12.70
-162.00	-35.15	-12.70
-161.00	-33.98	-12.70
-160.00	-38.85	-12.70
-159.00	-37.86	-12.70
-158.00	-31.61	-12.70
-157.00	-30.41	-12.70
-156.00	-38.06	-12.70
-155.00	-34.98	-12.70
-154.00	-30.30	-12.70
-153.00	-36.95	-12.70
-152.00	-33.71	-12.70
-151.00	-37.35	-12.70
-150.00	-34.14	-12.70
-149.00	-43.65	-12.70
-148.00	-34.36	-12.70
-147.00	-31.17	-12.70
-146.00	-30.42	-12.70
-145.00	-33.20	-12.70
-144.00	-27.91	-12.70
-143.00	-26.97	-12.70
-142.00	-46.95	-12.70
-141.00	-34.42	-12.70
-140.00	-33.28	-12.70
-139.00	-32.32	-12.70
-138.00	-38.52	-12.70
-137.00	-35.04	-12.70
-136.00	-36.05	-12.70

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-135.00	-32.59	-12.70
-134.00	-38.063	-12.7
-133.00	-31.60	-12.70
-132.00	-38.04	-12.70
-131.00	-31.04	-12.70
-130.00	-42.12	-12.70
-129.00	-31.72	-12.70
-128.00	-36.27	-12.70
-127.00	-30.25	-12.70
-126.00	-34.11	-12.70
-125.00	-33.21	-12.70
-124.00	-32.72	-12.70
-123.00	-32.69	-12.70
-122.00	-31.50	-12.70
-121.00	-29.02	-12.70
-120.00	-29.24	-12.70
-119.00	-30.04	-12.70
-118.00	-28.36	-12.70
-117.00	-26.46	-12.70
-116.00	-26.18	-12.70
-115.00	-28.28	-12.70
-114.00	-31.02	-12.70
-113.00	-28.00	-12.70
-112.00	-25.50	-12.70
-111.00	-26.16	-12.70
-110.00	-26.94	-12.70
-109.00	-26.13	-12.70
-108.00	-26.04	-12.70
-107.00	-23.86	-12.70
-106.00	-22.51	-12.70
-105.00	-23.54	-12.70
-104.00	-23.43	-12.70
-103.00	-24.30	-12.70
-102.00	-25.59	-12.70
-101.00	-24.34	-12.70
-100.00	-22.83	-12.70
-99.00	-24.22	-12.70
-98.00	-27.52	-12.70
-97.00	-27.36	-12.70
-96.00	-27.06	-12.70
-95.00	-22.51	-12.70
-94.00	-19.28	-12.70
-93.00	-19.25	-12.70
-92.00	-20.03	-12.70
-91.00	-26.63	-12.70

(A)  
V240

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-90.00	-28.37	-12.70
-89.00	-21.26	-12.70
-88.00	-17.99	-12.70
-87.00	-18.46	-12.70
-86.00	-18.82	-12.70
-85.00	-16.69	-12.70
-84.00	-15.87	-12.70
-83.00	-16.72	-12.70
-82.00	-15.71	-12.70
-81.00	-16.36	-12.70
-80.00	-17.19	-12.70
-79.00	-15.32	-12.70
-78.00	-17.82	-12.70
-77.00	-19.43	-12.70
-76.00	-20.20	-12.70
-75.00	-18.79	-12.70
-74.00	-22.02	-12.70
-73.00	-21.72	-12.70
-72.00	-22.53	-12.70
-71.00	-24.46	-12.70
-70.00	-25.45	-12.70
-69.00	-25.10	-12.70
-68.00	-23.67	-12.70
-67.00	-24.65	-12.70
-66.00	-25.11	-12.70
-65.00	-27.34	-12.70
-64.00	-30.64	-12.70
-63.00	-28.84	-12.70
-62.00	-30.45	-12.70
-61.00	-26.75	-12.70
-60.00	-25.97	-12.70
-59.00	-37.18	-12.70
-58.00	-32.63	-12.70
-57.00	-21.98	-12.70
-56.00	-20.81	-12.70
-55.00	-20.90	-12.70
-54.00	-27.59	-12.70
-53.00	-33.59	-12.70
-52.00	-21.46	-12.70
-51.00	-21.22	-12.70
-50.00	-23.05	-12.70
-49.00	-29.19	-12.70
-48.00	-25.30	-12.70
-47.00	-23.76	-12.50
-46.00	-26.80	-12.27

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-45.00	-28.64	-12.03
-44.00	-24.67	-11.79
-43.00	-24.25	-11.54
-42.00	-29.99	-11.28
-41.00	-26.37	-11.02
-40.00	-29.66	-10.75
-39.00	-23.34	-10.48
-38.00	-40.52	-10.19
-37.00	-22.32	-9.91
-36.00	-26.03	-9.61
-35.00	-24.60	-9.30
-34.00	-29.09	-8.99
-33.00	-30.40	-8.66
-32.00	-27.75	-8.33
-31.00	-23.40	-7.98
-30.00	-27.33	-7.63
-29.00	-24.67	-7.26
-28.00	-21.52	-6.88
-27.00	-28.30	-6.48
-26.00	-25.36	-6.07
-25.00	-42.80	-5.65
-24.00	-25.43	-5.21
-23.00	-25.19	-4.74
-22.00	-26.60	-4.26
-21.00	-33.50	-3.76
-20.00	-19.49	-3.23
-19.00	-18.22	-2.67
-18.00	-12.50	-2.08
-17.00	-11.95	-1.46
-16.00	-5.58	-0.80
-15.00	-10.34	-0.10
-14.00	-12.11	0.65
-13.00	-7.01	1.45
-12.00	-6.33	2.32
-11.00	-5.64	3.27
-10.00	-10.22	4.30
-9.00	-9.69	5.30
-8.00	-14.61	5.30
-7.00	-2.07	5.30
-6.00	-0.50	6.85
-5.00	0.94	8.83
-4.00	-4.66	11.25
-3.00	8.44	14.37
-2.00	12.72	18.77
-1.00	26.02	26.30

(A)  
V240

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0.00	33.32	
1.00	26.30	26.30
2.00	12.50	18.77
3.00	8.79	14.37
4.00	-21.84	11.25
5.00	0.28	8.83
6.00	-0.93	6.85
7.00	-3.11	5.30
8.00	-13.02	5.30
9.00	-7.76	5.30
10.00	-9.48	4.30
11.00	-3.43	3.27
12.00	-5.96	2.32
13.00	-7.00	1.45
14.00	-9.51	0.65
15.00	-8.85	-0.10
16.00	-6.28	-0.80
17.00	-10.57	-1.46
18.00	-13.35	-2.08
19.00	-23.24	-2.67
20.00	-17.75	-3.23
21.00	-22.81	-3.76
22.00	-21.86	-4.26
23.00	-22.82	-4.74
24.00	-34.13	-5.21
25.00	-21.66	-5.65
26.00	-19.73	-6.07
27.00	-35.21	-6.48
28.00	-18.72	-6.88
29.00	-25.77	-7.26
30.00	-23.40	-7.63
31.00	-22.51	-7.98
32.00	-24.31	-8.33
33.00	-31.40	-8.66
34.00	-17.23	-8.99
35.00	-20.56	-9.30
36.00	-24.18	-9.61
37.00	-20.84	-9.91
38.00	-25.03	-10.19
39.00	-28.23	-10.48
40.00	-25.48	-10.75
41.00	-27.26	-11.02
42.00	-20.64	-11.28
43.00	-27.18	-11.54
44.00	-24.40	-11.79

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
45.00	-23.97	-12.03
46.00	-24.60	-12.27
47.00	-24.35	-12.50
48.00	-24.46	-12.70
49.00	-18.51	-12.70
50.00	-18.09	-12.70
51.00	-15.27	-12.70
52.00	-21.08	-12.70
53.00	-46.73	-12.70
54.00	-22.32	-12.70
55.00	-18.48	-12.70
56.00	-17.92	-12.70
57.00	-23.97	-12.70
58.00	-33.73	-12.70
59.00	-27.19	-12.70
60.00	-33.25	-12.70
61.00	-35.92	-12.70
62.00	-29.42	-12.70
63.00	-30.20	-12.70
64.00	-28.97	-12.70
65.00	-27.03	-12.70
66.00	-34.88	-12.70
67.00	-28.28	-12.70
68.00	-29.11	-12.70
69.00	-21.10	-12.70
70.00	-18.56	-12.70
71.00	-21.34	-12.70
72.00	-20.34	-12.70
73.00	-21.05	-12.70
74.00	-17.42	-12.70
75.00	-17.84	-12.70
76.00	-19.29	-12.70
77.00	-18.27	-12.70
78.00	-14.67	-12.70
79.00	-16.41	-12.70
80.00	-16.69	-12.70
81.00	-15.32	-12.70
82.00	-15.70	-12.70
83.00	-18.23	-12.70
84.00	-15.52	-12.70
85.00	-16.91	-12.70
86.00	-17.21	-12.70
87.00	-18.09	-12.70
88.00	-20.94	-12.70
89.00	-19.08	-12.70

(A)  
V240

5

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
90.00	-19.04	-12.70
91.00	-18.59	-12.70
92.00	-20.11	-12.70
93.00	-22.20	-12.70
94.00	-27.98	-12.70
95.00	-28.88	-12.70
96.00	-23.05	-12.70
97.00	-22.79	-12.70
98.00	-22.78	-12.70
99.00	-21.12	-12.70
100.00	-21.51	-12.70
101.00	-24.44	-12.70
102.00	-26.06	-12.70
103.00	-26.48	-12.70
104.00	-26.79	-12.70
105.00	-27.11	-12.70
106.00	-25.48	-12.70
107.00	-32.95	-12.70
108.00	-28.58	-12.70
109.00	-27.68	-12.70
110.00	-35.69	-12.70
111.00	-42.60	-12.70
112.00	-36.78	-12.70
113.00	-32.26	-12.70
114.00	-27.57	-12.70
115.00	-31.82	-12.70
116.00	-36.68	-12.70
117.00	-32.23	-12.70
118.00	-34.74	-12.70
119.00	-31.59	-12.70
120.00	-37.19	-12.70
121.00	-40.09	-12.70
122.00	-38.67	-12.70
123.00	-34.46	-12.70
124.00	-33.34	-12.70
125.00	-35.70	-12.70
126.00	-32.77	-12.70
127.00	-31.01	-12.70
128.00	-35.47	-12.70
129.00	-42.03	-12.70
130.00	-27.93	-12.70
131.00	-30.91	-12.70
132.00	-43.54	-12.70
133.00	-29.81	-12.70
134.00	-46.77	-12.70

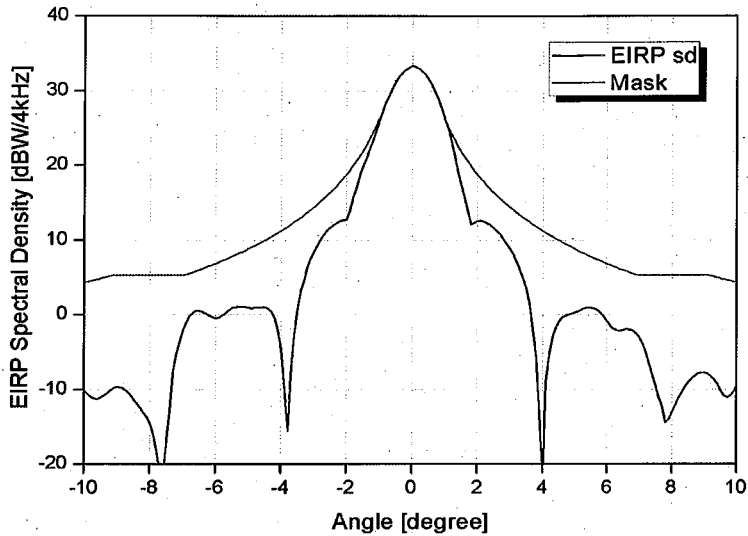
Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
135.00	-42.69	-12.70
136.00	-51.31	-12.70
137.00	-30.18	-12.70
138.00	-30.10	-12.70
139.00	-41.71	-12.70
140.00	-32.54	-12.70
141.00	-36.99	-12.70
142.00	-24.41	-12.70
143.00	-28.79	-12.70
144.00	-30.87	-12.70
145.00	-40.72	-12.70
146.00	-25.71	-12.70
147.00	-30.30	-12.70
148.00	-30.52	-12.70
149.00	-30.97	-12.70
150.00	-41.41	-12.70
151.00	-33.77	-12.70
152.00	-29.95	-12.70
153.00	-35.86	-12.70
154.00	-34.38	-12.70
155.00	-39.73	-12.70
156.00	-30.06	-12.70
157.00	-33.10	-12.70
158.00	-34.79	-12.70
159.00	-34.40	-12.70
160.00	-28.66	-12.70
161.00	-36.44	-12.70
162.00	-35.66	-12.70
163.00	-45.45	-12.70
164.00	-33.92	-12.70
165.00	-36.31	-12.70
166.00	-31.29	-12.70
167.00	-29.96	-12.70
168.00	-36.23	-12.70
169.00	-31.19	-12.70
170.00	-27.78	-12.70
171.00	-28.41	-12.70
172.00	-31.82	-12.70
173.00	-28.52	-12.70
174.00	-28.62	-12.70
175.00	-33.81	-12.70
176.00	-32.38	-12.70
177.00	-31.95	-12.70
178.00	-34.42	-12.70
179.00	-31.50	-12.70
180.00	-28.51	-12.70

(A)  
v240

5

## 1. EIRP Spectral Density of v240C

### 1.1. Azimuth pattern for Co-pol, narrow angle (-10°~10°)



6.15 GHz EIRP spectral density @ -8.357 dBW/4kHz Input power spectral density.

### FCC EIRP spectral density regulation

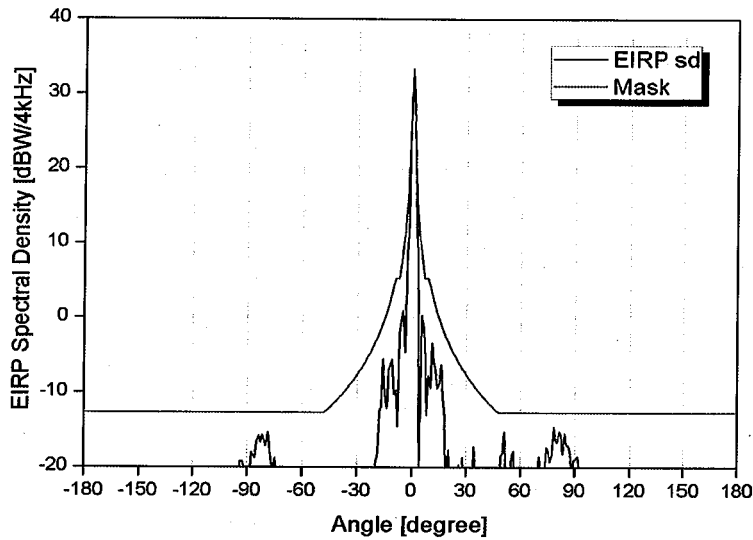
26.3-25log( $\theta$ )	dBW/4kHz	for	$1.0^\circ \leq \theta \leq 7.0^\circ$
-5.3	dBW/4kHz	for	$7.0^\circ \leq \theta \leq 9.2^\circ$
29.3-25log( $\theta$ )	dBW/4kHz	for	$9.2^\circ \leq \theta \leq 48^\circ$
-12.7	dBW/4kHz	for	$48^\circ \leq \theta \leq 85^\circ$

The v240C's radiation Pattern meets the FCC EIRP spectral density mask when the input power spectral density is -8.375 dBW/4kHz.

(A)  
V240

5

1.2. Azimuth pattern for Co-pol, wide angle (-180°~180°)



6.15 GHz EIRP spectral density @ -8.357 dBW/4kHz Input power spectral density.

FCC EIRP spectral density regulation

26.3-25log( $\theta$ )	dBW/4kHz	for	$1.0^\circ \leq \theta \leq 7.0^\circ$
-5.3	dBW/4kHz	for	$7.0^\circ \leq \theta \leq 9.2^\circ$
29.3-25log( $\theta$ )	dBW/4kHz	for	$9.2^\circ \leq \theta \leq 48^\circ$
-12.7	dBW/4kHz	for	$48^\circ \leq \theta \leq 85^\circ$

The v240C's radiation Pattern meets the FCC EIRP spectral density mask when the input power spectral density is -8.375 dBW/4kHz.



(B)  
V240

2.4. Elevation pattern for Co-pol (-30°~30°)

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-30	-20.02	-7.628031368
-29.9	-20.586	-7.591779708
-29.8	-21.326	-7.555406602
-29.7	-22.097	-7.518911233
-29.6	-21.705	-7.482292776
-29.5	-21.801	-7.445550399
-29.4	-22.163	-7.40868326
-29.3	-22.437	-7.371690509
-29.2	-23.267	-7.334571286
-29.1	-24.844	-7.297324725
-29	-27.105	-7.259949947
-28.9	-29.971	-7.222446069
-28.8	-30.895	-7.184812194
-28.7	-29.732	-7.147047418
-28.6	-27.202	-7.109150828
-28.5	-25.856	-7.0711215
-28.4	-24.502	-7.032958501
-28.3	-23.728	-6.994660888
-28.2	-23.334	-6.956227708
-28.1	-23.401	-6.917657998
-28	-24.276	-6.878950784
-27.9	-25.316	-6.840105082
-27.8	-26.247	-6.801119898
-27.7	-27.383	-6.761994227
-27.6	-28.283	-6.722727052
-27.5	-28.453	-6.683317346
-27.4	-27.836	-6.643764071
-27.3	-29.003	-6.604066176
-27.2	-28.892	-6.564222601
-27.1	-28.006	-6.524232272
-27	-26.536	-6.484094104
-26.9	-24.405	-6.443807
-26.8	-22.866	-6.403369851
-26.7	-21.022	-6.362781534
-26.6	-20.046	-6.322040916
-26.5	-18.967	-6.281146848
-26.4	-18.264	-6.240098172
-26.3	-17.828	-6.198893712
-26.2	-17.28	-6.157532283
-26.1	-17.119	-6.116012683
-26	-17.134	-6.074333699
-25.9	-17.373	-6.032494102
-25.8	-17.986	-5.990492649
-25.7	-18.252	-5.948328083
-25.6	-19.342	-5.905999133
-25.5	-20.55	-5.863504511
-25.4	-21.558	-5.820842915
-25.3	-22.339	-5.778013029
-25.2	-23.108	-5.73501352
-25.1	-23.487	-5.691843037

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-25	-23.36	-5.648500217
-24.9	-23.653	-5.604983677
-24.8	-23.472	-5.561292021
-24.7	-23.67	-5.517423831
-24.6	-23.952	-5.473377678
-24.5	-24.339	-5.429152109
-24.4	-24.934	-5.384745658
-24.3	-24.38	-5.34015684
-24.2	-22.827	-5.29538415
-24.1	-22.055	-5.250426064
-24	-21.12	-5.205281043
-23.9	-20.503	-5.159947524
-23.8	-19.666	-5.114423926
-23.7	-19.639	-5.06870865
-23.6	-19.548	-5.022800074
-23.5	-19.328	-4.976696557
-23.4	-19.167	-4.930396435
-23.3	-18.997	-4.883898026
-23.2	-18.785	-4.837199622
-23.1	-18.999	-4.790299497
-23	-19.243	-4.7431959
-22.9	-19.694	-4.695887058
-22.8	-19.952	-4.648371175
-22.7	-20.307	-4.60064643
-22.6	-20.338	-4.552710979
-22.5	-20.185	-4.504562953
-22.4	-19.809	-4.456200458
-22.3	-19.326	-4.407621576
-22.2	-18.7	-4.358824361
-22.1	-18.221	-4.309806842
-22	-17.972	-4.260567021
-21.9	-17.665	-4.211102871
-21.8	-17.402	-4.16141234
-21.7	-17.184	-4.111493346
-21.6	-16.918	-4.061343779
-21.5	-16.756	-4.010961498
-21.4	-16.577	-3.960344334
-21.3	-16.795	-3.909490086
-21.2	-17.311	-3.858396523
-21.1	-18.107	-3.807061382
-21	-19.04	-3.755482368
-20.9	-20.481	-3.703657153
-20.8	-22.101	-3.651583374
-20.7	-23.152	-3.599258636
-20.6	-23.743	-3.546680509
-20.5	-23.49	-3.493846526
-20.4	-22.566	-3.440754186
-20.3	-21.247	-3.387400948
-20.2	-20.647	-3.333784236
-20.1	-20.646	-3.279901436

B  
V240

6

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-20	-20.476	-3.225749892
-19.9	-21.386	-3.17132691
-19.8	-22.997	-3.116629757
-19.7	-25.41	-3.061655654
-19.6	-30.163	-3.006401784
-19.5	-33.713	-2.950865284
-19.4	-26.971	-2.895043248
-19.3	-23.73	-2.838932725
-19.2	-19.727	-2.782530718
-19.1	-17.566	-2.725834181
-19	-15.821	-2.668840024
-18.9	-14.278	-2.611545104
-18.8	-13.223	-2.553946232
-18.7	-12.619	-2.496040163
-18.6	-12.094	-2.437823605
-18.5	-12.112	-2.37929321
-18.4	-11.801	-2.320445575
-18.3	-11.573	-2.261277243
-18.2	-11.56	-2.2017847
-18.1	-11.455	-2.141964372
-18	-11.311	-2.081812628
-17.9	-11.021	-2.021325774
-17.8	-10.627	-1.960500058
-17.7	-10.312	-1.899331659
-17.6	-10.136	-1.837816695
-17.5	-10.152	-1.775951217
-17.4	-10.258	-1.713731207
-17.3	-10.34	-1.651152578
-17.2	-10.366	-1.588211173
-17.1	-10.57	-1.52490276
-17	-10.694	-1.461223034
-16.9	-10.705	-1.397167615
-16.8	-10.55	-1.332732043
-16.7	-10.287	-1.267911779
-16.6	-9.784	-1.202702201
-16.5	-9.346	-1.137098605
-16.4	-8.57	-1.071096201
-16.3	-8.04	-1.00469011
-16.2	-7.43	-0.937875364
-16.1	-6.966	-0.870646901
-16	-6.521	-0.802999566
-15.9	-6.288	-0.734928108
-15.8	-6.073	-0.666427174
-15.7	-6.015	-0.59749131
-15.6	-6.053	-0.528114959
-15.5	-6.223	-0.458292454
-15.4	-6.562	-0.388018021
-15.3	-6.975	-0.31728577
-15.2	-7.599	-0.246089699
-15.1	-8.009	-0.174423682

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-15	-8.643	-0.102281476
-14.9	-8.988	-0.02965671
-14.8	-9.434	0.043457115
-14.7	-9.603	0.117066631
-14.6	-9.74	0.191178605
-14.5	-9.773	0.265799944
-14.4	-9.84	0.340937698
-14.3	-10.126	0.416599063
-14.2	-10.393	0.49279139
-14.1	-10.736	0.569522184
-14	-11.116	0.646799108
-13.9	-11.369	0.724629994
-13.8	-11.365	0.80302284
-13.7	-11.053	0.881985821
-13.6	-10.019	0.961527291
-13.5	-9.165	1.041655788
-13.4	-8.354	1.122380041
-13.3	-7.371	1.203708976
-13.2	-6.642	1.28565172
-13.1	-6.03	1.368217609
-13	-5.569	1.451416192
-12.9	-5.34	1.535257243
-12.8	-5.343	1.619750759
-12.7	-5.631	1.704906976
-12.6	-6.145	1.790736372
-12.5	-6.887	1.877249675
-12.4	-8.127	1.964457871
-12.3	-9.53	2.052372214
-12.2	-11.453	2.141004233
-12.1	-13.721	2.230365742
-12	-15.738	2.320468849
-11.9	-19.865	2.411325965
-11.8	-16.922	2.502949817
-11.7	-15.247	2.595353456
-11.6	-13.738	2.688550269
-11.5	-12.582	2.782553991
-11.4	-11.722	2.877378717
-11.3	-11.425	2.973038913
-11.2	-11.299	3.069549433
-11.1	-11.513	3.16692553
-11	-11.778	3.265182871
-10.9	-12.325	3.364337551
-10.8	-12.656	3.464406113
-10.7	-12.746	3.565405558
-10.6	-10.626	3.667353368
-10.5	-9.862	3.770267523
-10.4	-9.037	3.874166518
-10.3	-8.234	3.979069382
-10.2	-7.301	4.084995706
-10.1	-6.427	4.191965655

(B3)  
V240

G

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-10	-5.934	4.3
-9.9	-5.446	4.409120135
-9.8	-5.049	4.519348108
-9.7	-4.857	4.630706643
-9.6	-4.712	4.743219174
-9.5	-4.683	4.856909868
-9.4	-4.711	4.97180366
-9.3	-4.768	5.087926286
-9.2	-4.743	5.205304316
-9.1	-4.655	5.323965192
-9	-4.371	5.443937264
-8.9	-3.912	5.565249834
-8.8	-3.29	5.687933196
-8.7	-2.688	5.812018685
-8.6	-2.132	5.937538719
-8.5	-1.416	6.064526857
-8.4	-0.999	6.193017848
-8.3	-0.676	6.323047691
-8.2	-0.519	6.45465369
-8.1	-0.488	6.587874528
-8	-0.615	6.722750325
-7.9	-0.916	6.859322718
-7.8	-1.517	6.997634933
-7.7	-2.278	7.137731871
-7.6	-3.095	7.279660193
-7.5	-3.906	7.423468415
-7.4	-4.421	7.569207007
-7.3	-4.581	7.716928497
-7.2	-4.139	7.866687589
-7.1	-3.487	8.018541282
-7	-2.684	8.172549
-6.9	-1.927	8.328772732
-6.8	-1.442	8.487277182
-6.7	-1.051	8.648129932
-6.6	-0.989	8.811401611
-6.5	-1.14	8.977166084
-6.4	-1.434	9.14550065
-6.3	-1.824	9.316486264
-6.2	-2.377	9.490207763
-6.1	-2.903	9.666754125
-6	-3.302	9.84621874
-5.9	-3.65	10.02869971
-5.8	-3.905	10.21430016
-5.7	-4.087	10.40312861
-5.6	-4.48	10.59529932
-5.5	-4.78	10.79093276
-5.4	-5.296	10.990156
-5.3	-5.883	11.19310326
-5.2	-6.052	11.39991641
-5.1	-5.787	11.6107456

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-5	-4.768	11.82574989
-4.9	-3.711	12.045098
-4.8	-2.756	12.26896907
-4.7	-1.532	12.49755355
-4.6	-0.692	12.73105421
-4.5	0.809	12.96968716
-4.4	0.672	13.21368309
-4.3	1.049	13.46328861
-4.2	1.004	13.71876774
-4.1	0.5	13.98040358
-4	-0.167	14.24850022
-3.9	-1.038	14.52338482
-3.8	-1.737	14.80541008
-3.7	-2.314	15.0949569
-3.6	-2.648	15.39243748
-3.5	-2.898	15.69829889
-3.4	-3.22	16.01302707
-3.3	-3.819	16.3371515
-3.2	-4.799	16.67125054
-3.1	-5.631	17.01595765
-3	-4.166	17.37196863
-2.9	-0.709	17.74005005
-2.8	2.799	18.12104922
-2.7	5.392	18.5159059
-2.6	7.268	18.9256663
-2.5	8.396	19.35149978
-2.4	10.094	19.79471896
-2.3	11.283	20.2568041
-2.2	12.227	20.73943298
-2.1	12.915	21.24451763
-2	13.414	21.77425011
-1.9	13.625	22.33115998
-1.8	13.616	22.91818737
-1.7	13.472	23.53877697
-1.6	15.13	24.19700043
-1.5	16.886	24.89771852
-1.4	19.079	25.64679911
-1.3	21.173	26.45141619
-1.2	22.716	
-1.1	24.264	
-1	25.973	
-0.9	27.452	
-0.8	28.659	
-0.7	29.879	
-0.6	30.656	
-0.5	31.507	
-0.4	32.101	
-0.3	32.646	
-0.2	33.026	
-0.1	33.248	

(B)  
V240

6

**Intellian**<sup>®</sup>

Intellian v-Series  
Maritime C-band VSAT Antenna System

Test Report

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0	33.325	
0.1	33.272	
0.2	33.129	
0.3	32.787	
0.4	32.342	
0.5	31.569	
0.6	30.876	
0.7	29.911	
0.8	28.77	
0.9	27.47	
1	25.915	
1.1	24.652	
1.2	22.925	
1.3	21.377	26.45141619
1.4	19.917	25.64679911
1.5	18.309	24.89771852
1.6	15.4715	24.19700043
1.7	14.305	23.53877697
1.8	14.346	22.91818737
1.9	14.26	22.33115998
2	13.968	21.77425011
2.1	13.46	21.24451763
2.2	12.721	20.73943298
2.3	11.548	20.2568041
2.4	10.07	19.79471896
2.5	8.231	19.35149978
2.6	5.926	18.9256663
2.7	2.945	18.5159059
2.8	-0.04	18.12104922
2.9	-5.411	17.74005005
3	-12.209	17.37196863
3.1	-11.005	17.01595765
3.2	-7.554	16.67125054
3.3	-6.121	16.3371515
3.4	-5.966	16.01302707
3.5	-7.052	15.69829889
3.6	-8.569	15.39243748
3.7	-11.397	15.0949569
3.8	-14.494	14.80541008
3.9	-12.393	14.52338482
4	-9.17	14.24850022
4.1	-6.928	13.98040358
4.2	-5.302	13.71876774
4.3	-4.714	13.46328861
4.4	-4.567	13.21368309
4.5	-4.733	12.96968716
4.6	-5.498	12.73105421
4.7	-6.595	12.49755355
4.8	-8.272	12.26896907
4.9	-10.347	12.045098

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
5	-14.199	11.82574989
5.1	-18.021	11.6107456
5.2	-22.485	11.39991641
5.3	-25.144	11.19310326
5.4	-24.179	10.990156
5.5	-22.659	10.79093276
5.6	-20.495	10.59529932
5.7	-16.28	10.40312861
5.8	-13.089	10.21430016
5.9	-10.123	10.02869971
6	-7.625	9.84621874
6.1	-5.868	9.666754125
6.2	-4.421	9.490207763
6.3	-3.198	9.316486264
6.4	-2.317	9.14550065
6.5	-1.799	8.977166084
6.6	-1.512	8.811401611
6.7	-1.513	8.648129932
6.8	-1.769	8.487277182
6.9	-2.348	8.328772732
7	-2.994	8.172549
7.1	-4.324	8.018541282
7.2	-5.852	7.866687589
7.3	-7.796	7.716928497
7.4	-9.666	7.569207007
7.5	-12.033	7.423468415
7.6	-13.559	7.279660193
7.7	-12.34	7.137731871
7.8	-11.136	6.997634933
7.9	-10.408	6.859322718
8	-9.763	6.722750325
8.1	-9.531	6.587874528
8.2	-9.621	6.45465369
8.3	-9.987	6.323047691
8.4	-10.686	6.193017848
8.5	-11.587	6.064526857
8.6	-12.689	5.937538719
8.7	-13.254	5.812018685
8.8	-13.907	5.687933196
8.9	-14.064	5.565249834
9	-13.748	5.443937264
9.1	-13.3	5.323965192
9.2	-12.852	5.205304316
9.3	-12.537	5.087926286
9.4	-12.392	4.97180366
9.5	-12.353	4.856909868
9.6	-12.457	4.743219174
9.7	-12.57	4.630706643
9.8	-12.833	4.519348108
9.9	-13.271	4.409120135

(B)  
N240

6

**Intellian**<sup>®</sup>

**Test Report**

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
10	-13.776	4.3
10.1	-14.351	4.191965655
10.2	-14.889	4.084995706
10.3	-15.406	3.979069382
10.4	-15.84	3.874166518
10.5	-14.237	3.770267523
10.6	-12.758	3.667353368
10.7	-12.225	3.565405558
10.8	-11.464	3.464406113
10.9	-10.77	3.364337551
11	-9.848	3.265182871
11.1	-9.381	3.16692553
11.2	-8.996	3.069549433
11.3	-8.778	2.973038913
11.4	-8.747	2.877378717
11.5	-9.013	2.782553991
11.6	-9.434	2.688550269
11.7	-9.918	2.595353456
11.8	-10.781	2.502949817
11.9	-11.248	2.411325965
12	-11.667	2.320468849
12.1	-11.734	2.230365742
12.2	-11.351	2.141004233
12.3	-10.577	2.052372214
12.4	-9.515	1.964457871
12.5	-8.775	1.877249675
12.6	-8.125	1.790736372
12.7	-7.546	1.704906976
12.8	-7.183	1.619750759
12.9	-6.939	1.535257243
13	-6.813	1.451416192
13.1	-6.78	1.368217609
13.2	-6.711	1.28565172
13.3	-6.806	1.203708976
13.4	-6.813	1.122380041
13.5	-6.849	1.041655788
13.6	-6.814	0.961527291
13.7	-6.795	0.881985821
13.8	-6.708	0.80302284
13.9	-6.653	0.724629994
14	-6.644	0.646799108
14.1	-6.681	0.569522184
14.2	-6.828	0.49279139
14.3	-6.977	0.416599063
14.4	-7.271	0.340937698
14.5	-7.533	0.265799944
14.6	-7.837	0.191178605
14.7	-8.051	0.117066631
14.8	-8.119	0.043457115
14.9	-8.16	-0.02965671

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
15	-7.931	-0.102281476
15.1	-7.671	-0.174423682
15.2	-7.361	-0.246089699
15.3	-7.014	-0.31728577
15.4	-6.776	-0.388018021
15.5	-6.535	-0.458292454
15.6	-6.457	-0.528114959
15.7	-6.393	-0.59749131
15.8	-6.485	-0.666427174
15.9	-6.686	-0.734928108
16	-6.907	-0.802999566
16.1	-7.211	-0.870646901
16.2	-7.511	-0.937875364
16.3	-7.798	-1.00469011
16.4	-8.123	-1.071096201
16.5	-8.415	-1.137098605
16.6	-8.439	-1.202702201
16.7	-8.55	-1.267911779
16.8	-8.576	-1.332732043
16.9	-8.537	-1.397167615
17	-8.661	-1.461223034
17.1	-8.707	-1.52490276
17.2	-8.729	-1.588211173
17.3	-8.866	-1.651152578
17.4	-9.11	-1.713731207
17.5	-9.227	-1.775951217
17.6	-9.521	-1.837816695
17.7	-9.705	-1.899331659
17.8	-9.923	-1.960500058
17.9	-9.999	-2.021325774
18	-10.237	-2.081812628
18.1	-10.243	-2.141964372
18.2	-10.332	-2.2017847
18.3	-10.441	-2.261277243
18.4	-10.822	-2.320445575
18.5	-11.255	-2.37929321
18.6	-11.942	-2.437823605
18.7	-12.789	-2.496040163
18.8	-13.949	-2.553946232
18.9	-15.207	-2.611545104
19	-16.403	-2.668840024
19.1	-18.282	-2.725834181
19.2	-20.705	-2.782530718
19.3	-23.344	-2.838932725
19.4	-27.122	-2.895043248
19.5	-29.569	-2.950865284
19.6	-28.353	-3.006401784
19.7	-26.685	-3.061655654
19.8	-25.276	-3.116629757
19.9	-23.619	-3.17132691

(B)  
V240

6

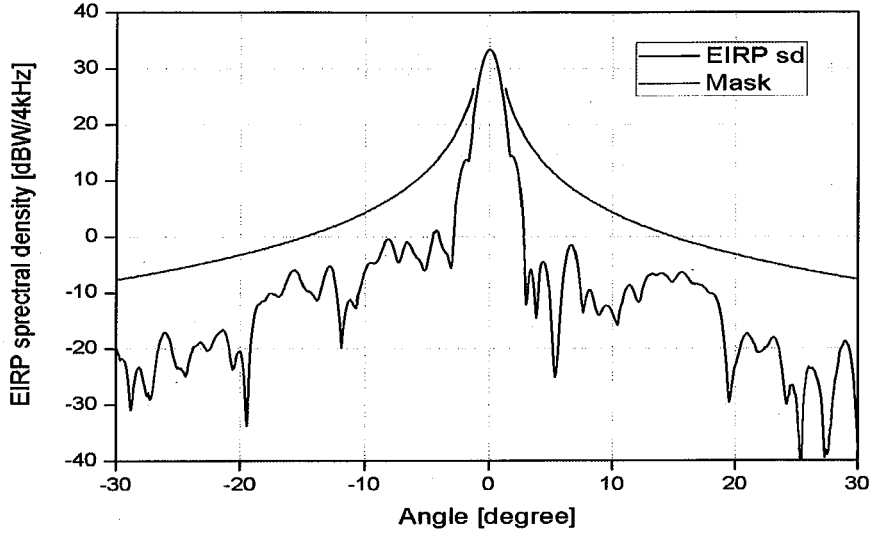
Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
20	-23.068	-3.225749892
20.1	-22.335	-3.279901436
20.2	-21.391	-3.333784236
20.3	-20.548	-3.387400948
20.4	-20.032	-3.440754186
20.5	-19.043	-3.493846526
20.6	-18.599	-3.546680509
20.7	-18	-3.599258636
20.8	-17.738	-3.651583374
20.9	-17.409	-3.703657153
21	-17.385	-3.755482368
21.1	-17.65	-3.807061382
21.2	-17.851	-3.858396523
21.3	-18.316	-3.909490086
21.4	-18.583	-3.960344334
21.5	-19.087	-4.010961498
21.6	-19.451	-4.061343779
21.7	-20.15	-4.111493346
21.8	-20.678	-4.16141234
21.9	-20.604	-4.211102871
22	-20.794	-4.260567021
22.1	-20.652	-4.309806842
22.2	-20.518	-4.358824361
22.3	-20.323	-4.407621576
22.4	-19.903	-4.456200458
22.5	-19.833	-4.504562953
22.6	-19.611	-4.552710979
22.7	-19.178	-4.60064643
22.8	-18.749	-4.648371175
22.9	-18.332	-4.695887058
23	-18.198	-4.7431959
23.1	-18.006	-4.790299497
23.2	-18.104	-4.837199622
23.3	-18.327	-4.883898026
23.4	-18.963	-4.930396435
23.5	-19.456	-4.976696557
23.6	-20.22	-5.022800074
23.7	-21.982	-5.06870865
23.8	-23.211	-5.114423926
23.9	-25.134	-5.159947524
24	-27.249	-5.205281043
24.1	-29.027	-5.250426064
24.2	-29.974	-5.29538415
24.3	-28.619	-5.34015684
24.4	-28.25	-5.384745658
24.5	-26.755	-5.429152109
24.6	-26.724	-5.473377678
24.7	-26.616	-5.517423831
24.8	-27.843	-5.561292021
24.9	-28.243	-5.604983677

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
25	-30.26	-5.648500217
25.1	-34.266	-5.691843037
25.2	-36.057	-5.73501352
25.3	-45.046	-5.778013029
25.4	-39.26	-5.820842915
25.5	-30.854	-5.863504511
25.6	-27.604	-5.905999133
25.7	-26.1	-5.948328083
25.8	-24.817	-5.990492649
25.9	-23.911	-6.032494102
26	-23.336	-6.074333699
26.1	-23.602	-6.116012683
26.2	-23.653	-6.157532283
26.3	-23.56	-6.198893712
26.4	-23.939	-6.240098172
26.5	-24.219	-6.281146848
26.6	-25.003	-6.322040916
26.7	-25.673	-6.362781534
26.8	-26.428	-6.403369851
26.9	-27.704	-6.443807
27	-29.149	-6.484094104
27.1	-32.741	-6.524232272
27.2	-35.162	-6.564222601
27.3	-39.444	-6.604066176
27.4	-38.059	-6.643764071
27.5	-38.977	-6.683317346
27.6	-38.021	-6.722727052
27.7	-34.694	-6.761994227
27.8	-33.502	-6.801119898
27.9	-29.638	-6.840105082
28	-27.848	-6.878950784
28.1	-25.913	-6.917657998
28.2	-24.743	-6.956227708
28.3	-23.582	-6.994660888
28.4	-22.189	-7.032958501
28.5	-20.922	-7.0711215
28.6	-20.137	-7.109150828
28.7	-19.764	-7.147047418
28.8	-19.389	-7.184812194
28.9	-18.746	-7.222446069
29	-18.783	-7.259949947
29.1	-19.236	-7.297324725
29.2	-19.465	-7.334571286
29.3	-20.364	-7.371690509
29.4	-21.45	-7.40868326
29.5	-23.248	-7.445550399
29.6	-25.043	-7.482292776
29.7	-28.092	-7.518911233
29.8	-31.887	-7.555406602
29.9	-33.107	-7.591779708
30	-38.108	-7.628031368

(B)  
BV240

6

1.4. Elevation pattern for Co-pol, narrow angle (-30°~30°)



14.25GHz EIRP spectral density @ -14.88dBW/4kHz Input power spectral density

FCC EIRP spectral density regulation

$29.3-25\log(\theta)$	dBW/4kHz	for	$1.25^\circ \leq \theta \leq 48^\circ$
-12.7	dBW/4kHz	for	$48^\circ < \theta \leq 180^\circ$

The v240C's radiation Pattern meets the FCC EIRP spectral density mask when the input power spectral density is -8.375 dBW/4kHz.

(C)  
V240

2.3. Azimuth pattern for Cross-pol (-9.2°~9.2°)

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-9.20	-12.07	-4.70
-9.10	-12.18	-4.70
-9.00	-12.09	-4.70
-8.90	-11.63	-4.70
-8.80	-11.12	-4.70
-8.70	-10.35	-4.70
-8.60	-9.70	-4.70
-8.50	-8.88	-4.70
-8.40	-8.20	-4.70
-8.30	-7.71	-4.70
-8.20	-7.32	-4.70
-8.10	-7.04	-4.70
-8.00	-6.98	-4.70
-7.90	-7.02	-4.70
-7.80	-7.28	-4.70
-7.70	-7.59	-4.70
-7.60	-8.10	-4.70
-7.50	-8.59	-4.70
-7.40	-9.10	-4.70
-7.30	-9.34	-4.70
-7.20	-9.53	-4.70
-7.10	-9.33	-4.70
-7.00	-9.03	-4.70
-6.90	-8.81	-4.67
-6.80	-8.53	-4.51
-6.70	-8.34	-4.35
-6.60	-8.41	-4.19
-6.50	-8.58	-4.02
-6.40	-8.78	-3.85
-6.30	-9.25	-3.68
-6.20	-9.73	-3.51
-6.10	-10.08	-3.33
-6.00	-10.43	-3.15
-5.90	-10.91	-2.97
-5.80	-11.44	-2.79
-5.70	-12.15	-2.60
-5.60	-12.88	-2.40
-5.50	-13.67	-2.21
-5.40	-14.45	-2.01
-5.30	-14.91	-1.81
-5.20	-14.78	-1.60
-5.10	-13.45	-1.39
-5.00	-11.56	-1.17
-4.90	-9.79	-0.95
-4.80	-8.15	-0.73
-4.70	-6.58	-0.50

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-4.6	-5.484	-0.268945792
-4.5	-4.635	-0.030312844
-4.4	-4.041	0.213683088
-4.3	-3.69	0.463288611
-4.2	-3.575	0.71876774
-4.1	-3.602	0.980403582
-4	-3.904	1.248500217
-3.9	-4.383	1.523384824
-3.8	-5.013	1.805410085
-3.7	-5.793	2.094956898
-3.6	-6.638	2.392437481
-3.5	-7.42	2.698298891
-3.4	-7.944	3.013027074
-3.3	-8.262	3.337151503
-3.2	-8.434	3.671250542
-3.1	-8.582	4.015957654
-3	-8.978	4.371968632
-2.9	-9.949	4.740050053
-2.8	-11.596	5.121049216
-2.7	-15.021	5.515905896
-2.6	-21.005	5.925666301
-2.5	-23.693	6.351499783
-2.4	-14.533	6.794718957
-2.3	-9.328	7.2568041
-2.2	-5.261	7.739432979
-2.1	-2.991	8.244517632
-2	-1.188	8.774250108
-1.9	0.189	9.331159976
-1.8	1.082	9.918187372
-1.7	1.826	
-1.6	2.367	
-1.5	2.572	
-1.4	2.526	
-1.3	2.224	
-1.2	1.654	
-1.1	0.764	
-1	-0.365	
-0.9	-1.492	
-0.8	-2.649	
-0.7	-3.562	
-0.6	-3.307	
-0.5	-2.279	
-0.4	-0.851	
-0.3	0.427	
-0.2	1.489	
-0.1	2.236	



(C)  
V240

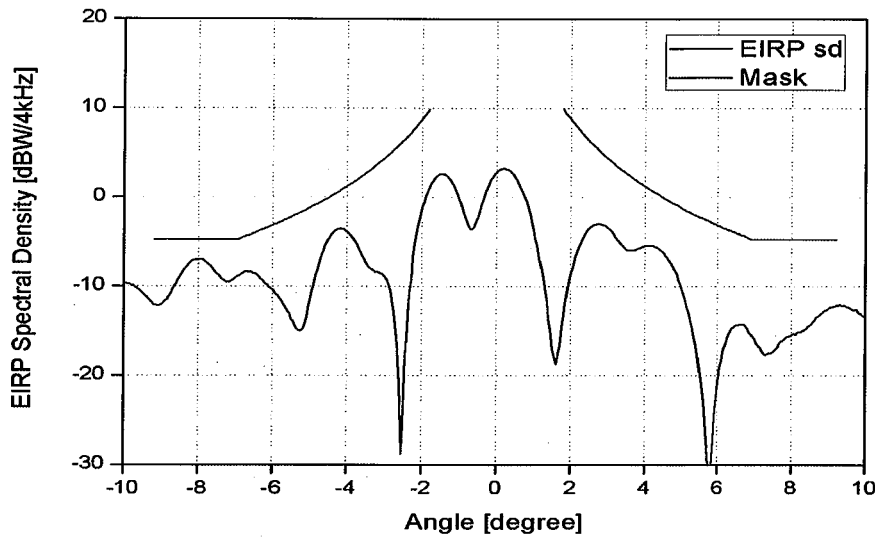
Intellian®

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0	2.802	
0.1	3.083	
0.2	3.214	
0.3	3.085	
0.4	2.756	
0.5	2.202	
0.6	1.467	
0.7	0.609	
0.8	-0.404	
0.9	-1.86	
1	-3.633	
1.1	-5.485	
1.2	-7.822	
1.3	-10.582	
1.4	-13.735	
1.5	-17.083	
1.6	-18.699	
1.7	-16.647	
1.8	-13.216	9.918187372
1.9	-10.697	9.331159976
2	-8.446	8.774250108
2.1	-6.913	8.244517632
2.2	-5.669	7.739432979
2.3	-4.814	7.2568041
2.4	-4.028	6.794718957
2.5	-3.483	6.351499783
2.6	-3.128	5.925666301
2.7	-3.041	5.515905896
2.8	-3.014	5.121049216
2.9	-3.184	4.740050053
3	-3.442	4.371968632
3.1	-3.873	4.015957654
3.2	-4.441	3.671250542
3.3	-4.942	3.337151503
3.4	-5.459	3.013027074
3.5	-5.885	2.698298891
3.6	-5.975	2.392437481
3.7	-5.964	2.094956898
3.8	-5.756	1.805410085
3.9	-5.601	1.523384824
4	-5.476	1.248500217
4.1	-5.432	0.980403582
4.2	-5.432	0.71876774
4.3	-5.609	0.463288611
4.4	-5.866	0.213683088
4.5	-6.272	-0.030312844

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
4.6	-6.838	-0.268945792
4.7	-7.404	-0.502446448
4.8	-8.252	-0.731030934
4.9	-9.397	-0.954902001
5	-10.255	-1.174250108
5.1	-11.473	-1.389254402
5.2	-12.841	-1.600083591
5.3	-14.557	-1.80689674
5.4	-16.691	-2.009843996
5.5	-19.369	-2.209067237
5.6	-22.936	-2.404700675
5.7	-29.259	-2.596871392
5.8	-30.205	-2.785699839
5.9	-24.595	-2.971300291
6	-20.701	-3.15378126
6.1	-18.366	-3.333245875
6.2	-16.624	-3.509792237
6.3	-15.189	-3.683513736
6.4	-14.631	-3.85449935
6.5	-14.302	-4.022833916
6.6	-14.287	-4.188598389
6.7	-14.278	-4.351870068
6.8	-14.726	-4.512722818
6.9	-15.369	-4.671227268
7	-15.985	-4.7
7.1	-16.693	-4.7
7.2	-17.365	-4.7
7.3	-17.71	-4.7
7.4	-17.51	-4.7
7.5	-17.312	-4.7
7.6	-16.81	-4.7
7.7	-16.168	-4.7
7.8	-15.955	-4.7
7.9	-15.65	-4.7
8	-15.418	-4.7
8.1	-15.405	-4.7
8.2	-15.167	-4.7
8.3	-14.952	-4.7
8.4	-14.6	-4.7
8.5	-14.319	-4.7
8.6	-13.917	-4.7
8.7	-13.393	-4.7
8.8	-13.055	-4.7
8.9	-12.739	-4.7
9	-12.495	-4.7
9.1	-12.322	-4.7
9.2	-12.16	-4.7

(5)  
v240

1.3. Azimuth pattern for Cross-pol, narrow angle (-10°~10°)



6.15 GHz EIRP spectral density @ -8.357 dBW/4kHz Input power spectral density.

FCC EIRP spectral density regulation

$16.3-25\log(\theta)$	dBW/4kHz for	$1.8^\circ \leq \theta \leq 7.0^\circ$
-4.7	dBW/4kHz for	$7.0^\circ \leq \theta \leq 9.2^\circ$

The v240C's radiation Pattern meets the FCC EIRP spectral density mask when the input power spectral density is -8.375 dBW/4kHz.

8

## Cobham SATCOM, Sea Tel Products

1.2M EIRPsd Data Table - Co Pol Azimuth, -10 to +10 Degrees @ 0.1 (A)

14.25 GHz @ -14 dBW / 4 kHz		
Angle Degrees	EIRPsd dBW/4kHz	Mask dBW/4kHz
-10.0	-22.6	-7.1
-9.9	-21.7	-6.9
-9.8	-20.6	-6.8
-9.7	-20.4	-6.7
-9.6	-20.6	-6.6
-9.5	-22.0	-6.5
-9.4	-23.8	-6.4
-9.3	-27.3	-6.3
-9.2	-35.3	-6.2
-9.1	-34.5	-6.0
-9.0	-28.1	-6.0
-8.9	-23.5	-6.0
-8.8	-22.2	-6.0
-8.7	-21.0	-6.0
-8.6	-20.7	-6.0
-8.5	-21.0	-6.0
-8.4	-22.7	-6.0
-8.3	-24.1	-6.0
-8.2	-26.2	-6.0
-8.1	-26.0	-6.0
-8.0	-24.4	-6.0
-7.9	-22.0	-6.0
-7.8	-20.2	-6.0
-7.7	-19.2	-6.0
-7.6	-18.8	-6.0
-7.5	-18.9	-6.0
-7.4	-19.1	-6.0
-7.3	-19.0	-6.0
-7.2	-18.4	-6.0
-7.1	-16.8	-6.0
-7.0	-14.7	-6.0
-6.9	-13.9	-6.0
-6.8	-12.5	-5.9
-6.7	-11.7	-5.7
-6.6	-11.5	-5.6
-6.5	-11.0	-5.4
-6.4	-10.9	-5.2
-6.3	-10.7	-5.1
-6.2	-10.3	-4.9
-6.1	-9.7	-4.7
-6.0	-9.1	-4.5
-5.9	-8.4	-4.4
-5.8	-7.8	-4.2
-5.7	-7.3	-4.0
-5.6	-7.1	-3.8
-5.5	-7.1	-3.6
-5.4	-7.4	-3.4
-5.3	-7.8	-3.2
-5.2	-8.3	-3.0
-5.1	-9.3	-2.8
-5.0	-10.1	-2.6
-4.9	-10.9	-2.4
-4.8	-11.5	-2.1
-4.7	-11.6	-1.9
-4.6	-11.3	-1.7
-4.5	-10.6	-1.5
-4.4	-10.0	-1.2

14.25 GHz @ -14 dBW / 4 kHz		
Angle Degrees	EIRPsd dBW/4kHz	Mask dBW/4kHz
0.0	28.9	
0.1	28.8	
0.2	28.8	
0.3	28.3	
0.4	27.9	
0.5	27.3	
0.6	26.2	
0.7	25.7	
0.8	24.4	
0.9	22.4	
1.0	21.2	
1.1	19.1	
1.2	16.2	
1.3	12.9	
1.4	8.8	
1.5	2.6	10.2
1.6	-7.0	9.6
1.7	0.0	8.9
1.8	3.9	8.3
1.9	5.3	7.7
2.0	5.7	7.2
2.1	5.2	6.7
2.2	4.2	6.2
2.3	3.2	5.7
2.4	1.2	5.3
2.5	-1.1	4.8
2.6	-3.0	4.4
2.7	-4.2	4.0
2.8	-4.6	3.6
2.9	-4.7	3.3
3.0	-5.3	2.9
3.1	-6.2	2.5
3.2	-7.7	2.2
3.3	-10.5	1.9
3.4	-12.1	1.6
3.5	-12.0	1.2
3.6	-9.9	0.9
3.7	-8.2	0.6
3.8	-7.1	0.4
3.9	-6.6	0.1
4.0	-6.4	-0.2
4.1	-6.8	-0.5
4.2	-7.4	-0.7
4.3	-8.2	-1.0
4.4	-10.0	-1.2
4.5	-11.1	-1.5
4.6	-12.0	-1.7
4.7	-13.2	-1.9
4.8	-13.3	-2.1
4.9	-12.9	-2.4
5.0	-11.6	-2.6
5.1	-10.6	-2.8
5.2	-9.4	-3.0
5.3	-7.9	-3.2
5.4	-7.2	-3.4
5.5	-6.5	-3.6
5.6	-5.9	-3.8



### Cobham SATCOM, Sea Tel Products

1.2M EIRPsd Data Table - Co Pol Azimuth, -10 to +10 Degrees @ 0.1 (A)

-4.3	-8.8	-1.0
-4.2	-7.9	-0.7
-4.1	-7.2	-0.5
-4.0	-6.6	-0.2
-3.9	-6.4	0.1
-3.8	-6.6	0.4
-3.7	-7.3	0.6
-3.6	-8.2	0.9
-3.5	-9.7	1.2
-3.4	-10.6	1.6
-3.3	-10.6	1.9
-3.2	-9.1	2.2
-3.1	-7.7	2.5
-3.0	-6.6	2.9
-2.9	-5.4	3.3
-2.8	-4.9	3.6
-2.7	-4.0	4.0
-2.6	-2.6	4.4
-2.5	-1.3	4.8
-2.4	1.0	5.3
-2.3	2.9	5.7
-2.2	4.4	6.2
-2.1	5.8	6.7
-2.0	6.5	7.2
-1.9	6.7	7.7
-1.8	6.3	8.3
-1.7	4.8	8.9
-1.6	1.3	9.6
-1.5	-4.5	10.2
-1.4	-3.3	
-1.3	6.5	
-1.2	11.1	
-1.1	15.5	
-1.0	17.9	
-0.9	19.8	
-0.8	22.4	
-0.7	23.7	
-0.6	25.0	
-0.5	26.2	
-0.4	27.0	
-0.3	27.8	
-0.2	28.3	
-0.1	28.6	
0.0	28.9	

5.7	-5.7	-4.0
5.8	-5.6	-4.2
5.9	-5.7	-4.4
6.0	-6.1	-4.5
6.1	-6.6	-4.7
6.2	-7.2	-4.9
6.3	-7.8	-5.1
6.4	-8.4	-5.2
6.5	-8.9	-5.4
6.6	-9.3	-5.6
6.7	-9.7	-5.7
6.8	-10.1	-5.9
6.9	-10.6	-6.0
7.0	-11.4	-6.0
7.1	-12.3	-6.0
7.2	-13.3	-6.0
7.3	-14.7	-6.0
7.4	-15.8	-6.0
7.5	-17.1	-6.0
7.6	-17.9	-6.0
7.7	-18.4	-6.0
7.8	-19.2	-6.0
7.9	-20.5	-6.0
8.0	-21.6	-6.0
8.1	-24.0	-6.0
8.2	-27.0	-6.0
8.3	-28.1	-6.0
8.4	-26.1	-6.0
8.5	-23.4	-6.0
8.6	-22.3	-6.0
8.7	-21.1	-6.0
8.8	-20.8	-6.0
8.9	-21.1	-6.0
9.0	-22.5	-6.0
9.1	-24.3	-6.0
9.2	-26.3	-6.2
9.3	-28.9	-6.3
9.4	-28.1	-6.4
9.5	-26.0	-6.5
9.6	-23.8	-6.6
9.7	-23.0	-6.7
9.8	-22.4	-6.8
9.9	-22.5	-6.9
10.0	-22.8	-7.1

8

## Cobham SATCOM, Sea Tel Products

1.2M EIRPsd Data Table - Co Pol Azimuth, -180 to +180 Degrees @ 0.5 (A)

14.25 GHz @ -14 dBW / 4 kHz		
Angle	EIRPsd	Mask
Degrees	dBW/4kHz	dBW/4kHz
-179.5	-39.6	-24.0
-179.0	-43.0	-24.0
-178.5	-43.2	-24.0
-178.0	-41.3	-24.0
-177.5	-38.5	-24.0
-177.0	-37.9	-24.0
-176.5	-40.0	-24.0
-176.0	-41.1	-24.0
-175.5	-37.7	-24.0
-175.0	-42.2	-24.0
-174.5	-39.1	-24.0
-174.0	-42.3	-24.0
-173.5	-35.3	-24.0
-173.0	-35.3	-24.0
-172.5	-50.7	-24.0
-172.0	-43.7	-24.0
-171.5	-41.8	-24.0
-171.0	-42.0	-24.0
-170.5	-39.5	-24.0
-170.0	-40.8	-24.0
-169.5	-42.4	-24.0
-169.0	-41.8	-24.0
-168.5	-38.6	-24.0
-168.0	-44.0	-24.0
-167.5	-37.3	-24.0
-167.0	-38.1	-24.0
-166.5	-46.5	-24.0
-166.0	-39.5	-24.0
-165.5	-40.0	-24.0
-165.0	-41.5	-24.0
-164.5	-41.8	-24.0
-164.0	-44.5	-24.0
-163.5	-37.0	-24.0
-163.0	-41.3	-24.0
-162.5	-42.9	-24.0
-162.0	-37.2	-24.0
-161.5	-35.9	-24.0
-161.0	-40.7	-24.0
-160.5	-37.6	-24.0
-160.0	-38.7	-24.0
-159.5	-46.0	-24.0
-159.0	-40.9	-24.0
-158.5	-44.3	-24.0
-158.0	-37.0	-24.0
-157.5	-40.4	-24.0
-157.0	-41.5	-24.0
-156.5	-46.1	-24.0
-156.0	-40.4	-24.0
-155.5	-40.5	-24.0
-155.0	-38.9	-24.0
-154.5	-37.7	-24.0
-154.0	-46.4	-24.0
-153.5	-41.1	-24.0
-153.0	-45.2	-24.0
-152.5	-37.7	-24.0
-152.0	-41.3	-24.0
-151.5	-39.6	-24.0

14.25 GHz @ -14 dBW / 4 kHz		
Angle	EIRPsd	Mask
Degrees	dBW/4kHz	dBW/4kHz
0.0	28.9	
0.5	27.5	
1.0	21.5	
1.5	4.4	10.6
2.0	5.6	7.5
2.5	-0.5	5.1
3.0	-5.1	3.1
3.5	-8.6	1.4
4.0	-6.4	-0.1
4.5	-10.9	-1.3
5.0	-9.7	-2.5
5.5	-5.7	-3.5
6.0	-6.0	-4.5
6.5	-8.8	-5.3
7.0	-11.1	-6.0
7.5	-16.8	-6.0
8.0	-21.2	-6.0
8.5	-21.3	-6.0
9.0	-22.0	-6.0
9.5	-23.2	-6.4
10.0	-22.7	-7.0
10.5	-32.0	-7.5
11.0	-25.5	-8.0
11.5	-21.6	-8.5
12.0	-26.1	-9.0
12.5	-25.4	-9.4
13.0	-27.4	-9.8
13.5	-20.3	-10.3
14.0	-20.4	-10.7
14.5	-27.0	-11.0
15.0	-31.3	-11.4
15.5	-24.1	-11.8
16.0	-23.1	-12.1
16.5	-26.2	-12.4
17.0	-25.1	-12.8
17.5	-21.9	-13.1
18.0	-22.2	-13.4
18.5	-27.1	-13.7
19.0	-29.8	-14.0
19.5	-25.6	-14.3
20.0	-25.7	-14.5
20.5	-26.6	-14.8
21.0	-25.7	-15.1
21.5	-29.0	-15.3
22.0	-36.1	-15.6
22.5	-28.0	-15.8
23.0	-25.8	-16.0
23.5	-27.3	-16.3
24.0	-29.8	-16.5
24.5	-29.8	-16.7
25.0	-29.4	-16.9
25.5	-28.8	-17.2
26.0	-26.6	-17.4
26.5	-27.4	-17.6
27.0	-28.7	-17.8
27.5	-27.6	-18.0
28.0	-27.6	-18.2

8

## Cobham SATCOM, Sea Tel Products

1.2M EIRPsd Data Table - Co Pol Azimuth, -180 to +180 Degrees @ 0.5 (A)

-151.0	-43.4	-24.0
-150.5	-49.7	-24.0
-150.0	-38.9	-24.0
-149.5	-39.0	-24.0
-149.0	-44.3	-24.0
-148.5	-48.3	-24.0
-148.0	-41.2	-24.0
-147.5	-44.0	-24.0
-147.0	-37.9	-24.0
-146.5	-46.3	-24.0
-146.0	-44.5	-24.0
-145.5	-39.7	-24.0
-145.0	-40.2	-24.0
-144.5	-40.1	-24.0
-144.0	-40.4	-24.0
-143.5	-37.1	-24.0
-143.0	-37.3	-24.0
-142.5	-43.4	-24.0
-142.0	-38.9	-24.0
-141.5	-37.5	-24.0
-141.0	-38.7	-24.0
-140.5	-34.4	-24.0
-140.0	-40.2	-24.0
-139.5	-38.9	-24.0
-139.0	-37.4	-24.0
-138.5	-41.2	-24.0
-138.0	-36.3	-24.0
-137.5	-38.2	-24.0
-137.0	-41.1	-24.0
-136.5	-38.3	-24.0
-136.0	-41.6	-24.0
-135.5	-38.6	-24.0
-135.0	-36.7	-24.0
-134.5	-36.0	-24.0
-134.0	-43.0	-24.0
-133.5	-36.7	-24.0
-133.0	-38.6	-24.0
-132.5	-44.2	-24.0
-132.0	-40.1	-24.0
-131.5	-41.9	-24.0
-131.0	-40.9	-24.0
-130.5	-38.0	-24.0
-130.0	-39.6	-24.0
-129.5	-38.1	-24.0
-129.0	-41.3	-24.0
-128.5	-40.3	-24.0
-128.0	-42.8	-24.0
-127.5	-35.8	-24.0
-127.0	-40.3	-24.0
-126.5	-40.5	-24.0
-126.0	-37.9	-24.0
-125.5	-39.6	-24.0
-125.0	-42.5	-24.0
-124.5	-40.0	-24.0
-124.0	-40.4	-24.0
-123.5	-41.5	-24.0
-123.0	-40.7	-24.0
-122.5	-37.4	-24.0
-122.0	-34.7	-24.0
-121.5	-45.5	-24.0
-121.0	-41.4	-24.0

28.5	-24.7	-18.4
29.0	-22.5	-18.6
29.5	-21.7	-18.7
30.0	-22.6	-18.9
30.5	-25.5	-19.1
31.0	-27.7	-19.3
31.5	-25.2	-19.5
32.0	-23.7	-19.6
32.5	-23.9	-19.8
33.0	-23.8	-20.0
33.5	-25.7	-20.1
34.0	-31.7	-20.3
34.5	-32.9	-20.4
35.0	-36.9	-20.6
35.5	-29.9	-20.8
36.0	-26.4	-20.9
36.5	-24.3	-21.1
37.0	-23.6	-21.2
37.5	-24.5	-21.4
38.0	-25.4	-21.5
38.5	-28.1	-21.6
39.0	-35.9	-21.8
39.5	-33.7	-21.9
40.0	-30.9	-22.1
40.5	-27.7	-22.2
41.0	-28.0	-22.3
41.5	-29.7	-22.5
42.0	-29.4	-22.6
42.5	-32.0	-22.7
43.0	-34.0	-22.8
43.5	-33.4	-23.0
44.0	-34.2	-23.1
44.5	-41.2	-23.2
45.0	-43.0	-23.3
45.5	-34.7	-23.5
46.0	-31.1	-23.6
46.5	-31.8	-23.7
47.0	-32.4	-23.8
47.5	-34.2	-23.9
48.0	-38.0	-24.0
48.5	-39.9	-24.0
49.0	-34.5	-24.0
49.5	-32.8	-24.0
50.0	-33.4	-24.0
50.5	-33.0	-24.0
51.0	-31.7	-24.0
51.5	-33.4	-24.0
52.0	-35.2	-24.0
52.5	-34.0	-24.0
53.0	-35.5	-24.0
53.5	-34.0	-24.0
54.0	-33.5	-24.0
54.5	-32.1	-24.0
55.0	-33.3	-24.0
55.5	-35.2	-24.0
56.0	-35.1	-24.0
56.5	-34.0	-24.0
57.0	-35.5	-24.0
57.5	-38.3	-24.0
58.0	-34.6	-24.0
58.5	-36.2	-24.0

### Cobham SATCOM, Sea Tel Products

1.2M EIRPsd Data Table - Co Pol Azimuth, -180 to +180 Degrees @ 0.5 (A)

-120.5	-38.0	-24.0
-120.0	-39.9	-24.0
-119.5	-36.9	-24.0
-119.0	-43.0	-24.0
-118.5	-38.8	-24.0
-118.0	-35.4	-24.0
-117.5	-39.1	-24.0
-117.0	-42.6	-24.0
-116.5	-44.8	-24.0
-116.0	-38.9	-24.0
-115.5	-36.5	-24.0
-115.0	-40.0	-24.0
-114.5	-37.0	-24.0
-114.0	-40.4	-24.0
-113.5	-38.3	-24.0
-113.0	-38.3	-24.0
-112.5	-36.8	-24.0
-112.0	-42.1	-24.0
-111.5	-38.7	-24.0
-111.0	-39.4	-24.0
-110.5	-37.4	-24.0
-110.0	-45.0	-24.0
-109.5	-40.1	-24.0
-109.0	-41.2	-24.0
-108.5	-35.5	-24.0
-108.0	-37.4	-24.0
-107.5	-38.2	-24.0
-107.0	-35.5	-24.0
-106.5	-37.1	-24.0
-106.0	-39.6	-24.0
-105.5	-38.2	-24.0
-105.0	-33.7	-24.0
-104.5	-35.0	-24.0
-104.0	-43.3	-24.0
-103.5	-40.8	-24.0
-103.0	-36.9	-24.0
-102.5	-34.7	-24.0
-102.0	-35.5	-24.0
-101.5	-35.9	-24.0
-101.0	-36.9	-24.0
-100.5	-40.3	-24.0
-100.0	-40.5	-24.0
-99.5	-35.3	-24.0
-99.0	-36.7	-24.0
-98.5	-37.8	-24.0
-98.0	-35.6	-24.0
-97.5	-35.8	-24.0
-97.0	-34.2	-24.0
-96.5	-34.9	-24.0
-96.0	-34.0	-24.0
-95.5	-30.9	-24.0
-95.0	-32.7	-24.0
-94.5	-32.3	-24.0
-94.0	-33.1	-24.0
-93.5	-32.8	-24.0
-93.0	-35.9	-24.0
-92.5	-34.7	-24.0
-92.0	-35.2	-24.0
-91.5	-31.8	-24.0
-91.0	-30.2	-24.0
-90.5	-29.1	-24.0

59.0	-37.9	-24.0
59.5	-27.8	-24.0
60.0	-29.5	-24.0
60.5	-28.3	-24.0
61.0	-35.6	-24.0
61.5	-37.8	-24.0
62.0	-38.9	-24.0
62.5	-39.2	-24.0
63.0	-44.0	-24.0
63.5	-54.0	-24.0
64.0	-45.8	-24.0
64.5	-40.9	-24.0
65.0	-34.2	-24.0
65.5	-38.0	-24.0
66.0	-39.0	-24.0
66.5	-41.1	-24.0
67.0	-42.4	-24.0
67.5	-55.2	-24.0
68.0	-40.4	-24.0
68.5	-37.6	-24.0
69.0	-34.8	-24.0
69.5	-33.9	-24.0
70.0	-34.5	-24.0
70.5	-33.4	-24.0
71.0	-34.1	-24.0
71.5	-35.1	-24.0
72.0	-33.2	-24.0
72.5	-33.3	-24.0
73.0	-33.8	-24.0
73.5	-34.0	-24.0
74.0	-32.9	-24.0
74.5	-31.4	-24.0
75.0	-30.4	-24.0
75.5	-29.5	-24.0
76.0	-27.5	-24.0
76.5	-26.8	-24.0
77.0	-26.4	-24.0
77.5	-26.8	-24.0
78.0	-26.2	-24.0
78.5	-25.2	-24.0
79.0	-24.9	-24.0
79.5	-24.1	-24.0
80.0	-23.9	-24.0
80.5	-23.5	-24.0
81.0	-24.5	-24.0
81.5	-24.9	-24.0
82.0	-26.0	-24.0
82.5	-25.9	-24.0
83.0	-25.6	-24.0
83.5	-25.3	-24.0
84.0	-25.6	-24.0
84.5	-25.7	-24.0
85.0	-25.4	-24.0
85.5	-26.4	-24.0
86.0	-26.2	-24.0
86.5	-28.3	-24.0
87.0	-29.0	-24.0
87.5	-27.4	-24.0
88.0	-27.7	-24.0
88.5	-27.6	-24.0
89.0	-28.6	-24.0

8

**Cobham SATCOM, Sea Tel Products**

1.2M EIRPsd Data Table - Co Pol Azimuth, -180 to +180 Degrees @ 0.5 (A)

-90.0	-30.8	-24.0
-89.5	-28.3	-24.0
-89.0	-29.3	-24.0
-88.5	-29.7	-24.0
-88.0	-28.6	-24.0
-87.5	-29.1	-24.0
-87.0	-29.9	-24.0
-86.5	-29.4	-24.0
-86.0	-27.8	-24.0
-85.5	-27.9	-24.0
-85.0	-26.4	-24.0
-84.5	-25.3	-24.0
-84.0	-25.4	-24.0
-83.5	-25.2	-24.0
-83.0	-25.8	-24.0
-82.5	-26.4	-24.0
-82.0	-26.4	-24.0
-81.5	-25.0	-24.0
-81.0	-25.1	-24.0
-80.5	-26.3	-24.0
-80.0	-25.9	-24.0
-79.5	-26.2	-24.0
-79.0	-25.9	-24.0
-78.5	-26.0	-24.0
-78.0	-25.8	-24.0
-77.5	-25.1	-24.0
-77.0	-26.6	-24.0
-76.5	-28.7	-24.0
-76.0	-28.9	-24.0
-75.5	-29.9	-24.0
-75.0	-31.9	-24.0
-74.5	-32.9	-24.0
-74.0	-34.5	-24.0
-73.5	-35.5	-24.0
-73.0	-38.4	-24.0
-72.5	-37.4	-24.0
-72.0	-39.2	-24.0
-71.5	-37.0	-24.0
-71.0	-33.5	-24.0
-70.5	-34.0	-24.0
-70.0	-37.8	-24.0
-69.5	-34.5	-24.0
-69.0	-35.1	-24.0
-68.5	-39.2	-24.0
-68.0	-36.9	-24.0
-67.5	-41.2	-24.0
-67.0	-41.4	-24.0
-66.5	-40.5	-24.0
-66.0	-45.0	-24.0
-65.5	-52.9	-24.0
-65.0	-46.3	-24.0
-64.5	-43.7	-24.0
-64.0	-42.1	-24.0
-63.5	-41.4	-24.0
-63.0	-47.2	-24.0
-62.5	-43.1	-24.0
-62.0	-43.9	-24.0
-61.5	-37.8	-24.0
-61.0	-37.2	-24.0
-60.5	-40.6	-24.0
-60.0	-44.1	-24.0

89.5	-29.3	-24.0
90.0	-29.1	-24.0
90.5	-29.5	-24.0
91.0	-29.7	-24.0
91.5	-32.7	-24.0
92.0	-33.0	-24.0
92.5	-32.7	-24.0
93.0	-30.0	-24.0
93.5	-29.9	-24.0
94.0	-30.7	-24.0
94.5	-35.3	-24.0
95.0	-32.9	-24.0
95.5	-32.0	-24.0
96.0	-32.8	-24.0
96.5	-35.1	-24.0
97.0	-33.9	-24.0
97.5	-39.2	-24.0
98.0	-35.5	-24.0
98.5	-32.6	-24.0
99.0	-30.5	-24.0
99.5	-34.4	-24.0
100.0	-33.6	-24.0
100.5	-35.1	-24.0
101.0	-40.2	-24.0
101.5	-36.1	-24.0
102.0	-35.4	-24.0
102.5	-35.0	-24.0
103.0	-34.9	-24.0
103.5	-35.1	-24.0
104.0	-36.4	-24.0
104.5	-41.2	-24.0
105.0	-35.0	-24.0
105.5	-36.2	-24.0
106.0	-32.8	-24.0
106.5	-33.4	-24.0
107.0	-36.5	-24.0
107.5	-40.3	-24.0
108.0	-39.2	-24.0
108.5	-35.7	-24.0
109.0	-42.6	-24.0
109.5	-35.7	-24.0
110.0	-37.1	-24.0
110.5	-39.7	-24.0
111.0	-37.9	-24.0
111.5	-37.2	-24.0
112.0	-35.7	-24.0
112.5	-38.2	-24.0
113.0	-37.2	-24.0
113.5	-38.8	-24.0
114.0	-41.0	-24.0
114.5	-38.4	-24.0
115.0	-41.8	-24.0
115.5	-36.7	-24.0
116.0	-39.2	-24.0
116.5	-37.9	-24.0
117.0	-34.2	-24.0
117.5	-40.8	-24.0
118.0	-41.2	-24.0
118.5	-37.3	-24.0
119.0	-37.0	-24.0
119.5	-38.6	-24.0



8

## Cobham SATCOM, Sea Tel Products

1.2M EIRPsd Data Table - Co Pol Azimuth, -180 to +180 Degrees @ 0.5 (A)

-59.5	-40.3	-24.0
-59.0	-43.3	-24.0
-58.5	-45.5	-24.0
-58.0	-36.7	-24.0
-57.5	-32.4	-24.0
-57.0	-32.3	-24.0
-56.5	-34.2	-24.0
-56.0	-34.1	-24.0
-55.5	-32.8	-24.0
-55.0	-33.6	-24.0
-54.5	-34.9	-24.0
-54.0	-30.5	-24.0
-53.5	-28.1	-24.0
-53.0	-27.8	-24.0
-52.5	-29.2	-24.0
-52.0	-28.7	-24.0
-51.5	-30.9	-24.0
-51.0	-33.2	-24.0
-50.5	-35.7	-24.0
-50.0	-39.5	-24.0
-49.5	-35.8	-24.0
-49.0	-40.2	-24.0
-48.5	-39.5	-24.0
-48.0	-40.5	-24.0
-47.5	-32.7	-23.9
-47.0	-30.6	-23.8
-46.5	-26.7	-23.7
-46.0	-25.6	-23.6
-45.5	-27.2	-23.5
-45.0	-25.9	-23.3
-44.5	-26.9	-23.2
-44.0	-30.3	-23.1
-43.5	-33.1	-23.0
-43.0	-31.5	-22.8
-42.5	-33.2	-22.7
-42.0	-37.5	-22.6
-41.5	-35.8	-22.5
-41.0	-31.1	-22.3
-40.5	-28.7	-22.2
-40.0	-26.4	-22.1
-39.5	-25.0	-21.9
-39.0	-24.6	-21.8
-38.5	-24.5	-21.6
-38.0	-27.8	-21.5
-37.5	-30.9	-21.4
-37.0	-32.4	-21.2
-36.5	-29.9	-21.1
-36.0	-28.7	-20.9
-35.5	-27.5	-20.8
-35.0	-27.9	-20.6
-34.5	-30.1	-20.4
-34.0	-27.3	-20.3
-33.5	-27.0	-20.1
-33.0	-29.5	-20.0
-32.5	-29.1	-19.8
-32.0	-25.3	-19.6
-31.5	-24.2	-19.5
-31.0	-23.4	-19.3
-30.5	-23.4	-19.1
-30.0	-24.3	-18.9
-29.5	-26.7	-18.7

120.0	-38.1	-24.0
120.5	-45.4	-24.0
121.0	-36.7	-24.0
121.5	-39.9	-24.0
122.0	-37.3	-24.0
122.5	-36.9	-24.0
123.0	-38.1	-24.0
123.5	-38.5	-24.0
124.0	-39.6	-24.0
124.5	-38.4	-24.0
125.0	-38.1	-24.0
125.5	-38.3	-24.0
126.0	-35.9	-24.0
126.5	-39.9	-24.0
127.0	-38.1	-24.0
127.5	-37.0	-24.0
128.0	-40.8	-24.0
128.5	-38.0	-24.0
129.0	-40.6	-24.0
129.5	-40.3	-24.0
130.0	-35.5	-24.0
130.5	-39.0	-24.0
131.0	-43.3	-24.0
131.5	-36.8	-24.0
132.0	-39.2	-24.0
132.5	-39.2	-24.0
133.0	-35.5	-24.0
133.5	-36.0	-24.0
134.0	-39.5	-24.0
134.5	-38.1	-24.0
135.0	-37.6	-24.0
135.5	-38.5	-24.0
136.0	-36.0	-24.0
136.5	-37.5	-24.0
137.0	-38.8	-24.0
137.5	-33.7	-24.0
138.0	-40.7	-24.0
138.5	-39.7	-24.0
139.0	-37.1	-24.0
139.5	-35.3	-24.0
140.0	-33.0	-24.0
140.5	-31.4	-24.0
141.0	-34.7	-24.0
141.5	-40.2	-24.0
142.0	-39.1	-24.0
142.5	-34.7	-24.0
143.0	-39.5	-24.0
143.5	-34.7	-24.0
144.0	-38.6	-24.0
144.5	-37.3	-24.0
145.0	-39.8	-24.0
145.5	-37.1	-24.0
146.0	-34.9	-24.0
146.5	-48.8	-24.0
147.0	-40.4	-24.0
147.5	-43.6	-24.0
148.0	-35.7	-24.0
148.5	-37.7	-24.0
149.0	-38.7	-24.0
149.5	-35.2	-24.0
150.0	-42.2	-24.0

8

**Cobham SATCOM, Sea Tel Products**

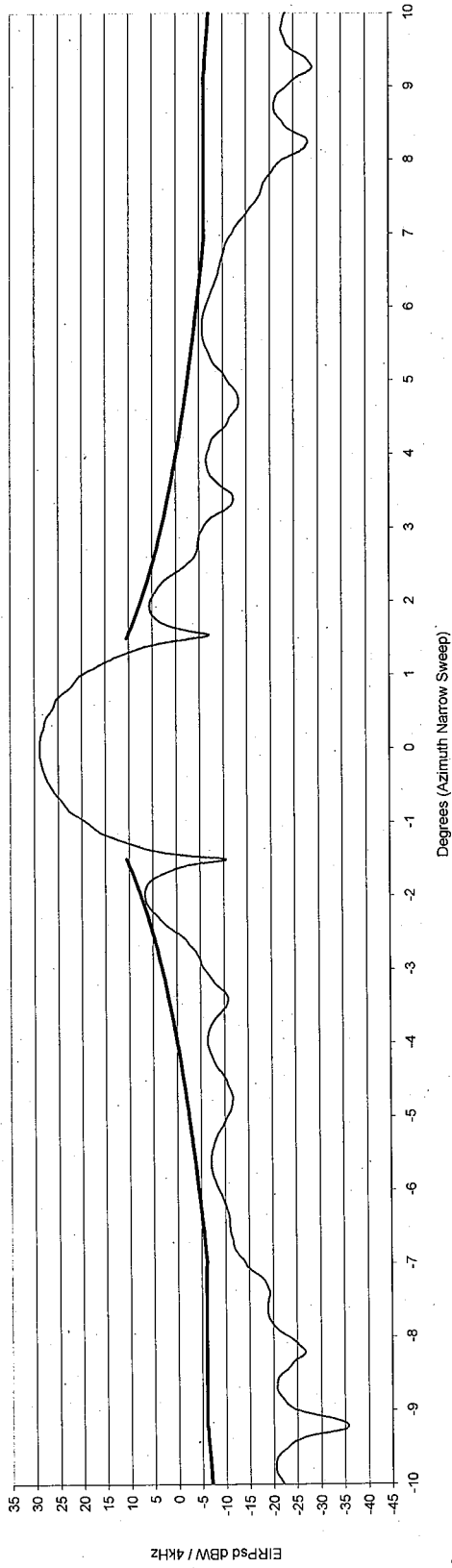
1.2M EIRPsd Data Table - Co Pol Azimuth, -180 to +180 Degrees @ 0.5 (A)

-29.0	-28.2	-18.6
-28.5	-28.2	-18.4
-28.0	-27.5	-18.2
-27.5	-27.7	-18.0
-27.0	-27.1	-17.8
-26.5	-26.2	-17.6
-26.0	-27.9	-17.4
-25.5	-30.1	-17.2
-25.0	-29.3	-16.9
-24.5	-29.9	-16.7
-24.0	-28.2	-16.5
-23.5	-24.3	-16.3
-23.0	-23.9	-16.0
-22.5	-28.2	-15.8
-22.0	-31.3	-15.6
-21.5	-25.7	-15.3
-21.0	-23.6	-15.1
-20.5	-24.5	-14.8
-20.0	-22.9	-14.5
-19.5	-24.1	-14.3
-19.0	-28.3	-14.0
-18.5	-23.8	-13.7
-18.0	-20.3	-13.4
-17.5	-21.1	-13.1
-17.0	-25.9	-12.8
-16.5	-25.2	-12.4
-16.0	-21.7	-12.1
-15.5	-23.6	-11.8
-15.0	-39.6	-11.4
-14.5	-27.2	-11.0
-14.0	-20.0	-10.7
-13.5	-20.1	-10.3
-13.0	-28.2	-9.8
-12.5	-25.9	-9.4
-12.0	-23.1	-9.0
-11.5	-19.3	-8.5
-11.0	-21.6	-8.0
-10.5	-27.3	-7.5
-10.0	-20.9	-7.0
-9.5	-21.6	-6.4
-9.0	-22.5	-6.0
-8.5	-20.9	-6.0
-8.0	-20.6	-6.0
-7.5	-18.9	-6.0
-7.0	-12.9	-6.1
-6.5	-10.8	-5.3
-6.0	-8.0	-4.5
-5.5	-7.1	-3.5
-5.0	-9.9	-2.5
-4.5	-9.1	-1.3
-4.0	-6.4	-0.1
-3.5	-9.3	1.4
-3.0	-5.0	3.1
-2.5	2.5	5.1
-2.0	6.7	7.5
-1.5	4.7	10.6
-1.0	21.8	
-0.5	27.6	
0.00	28.9	

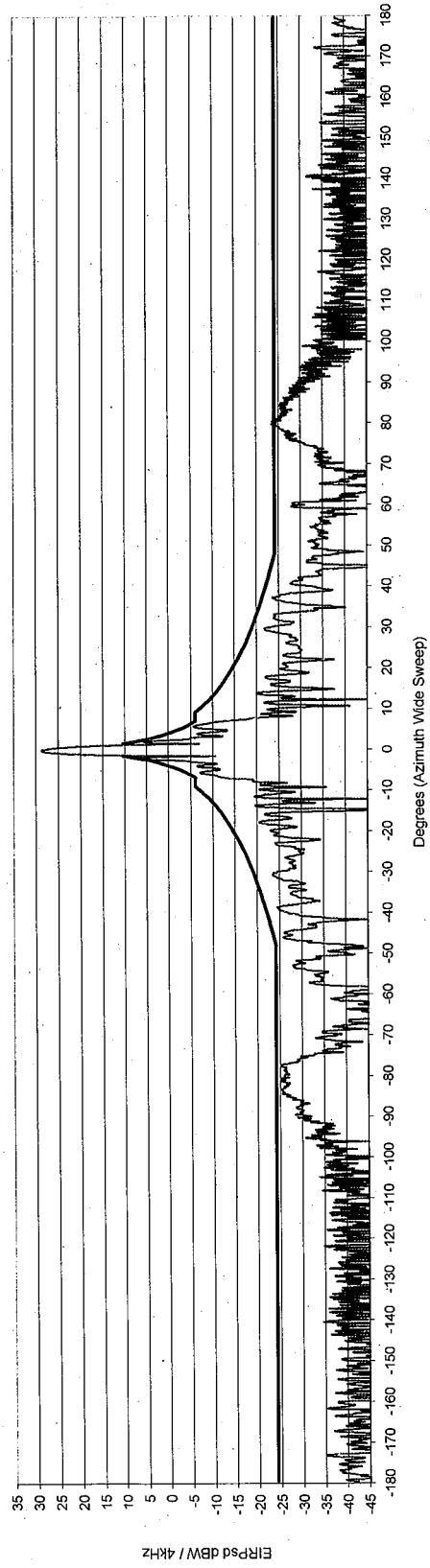
150.5	-37.6	-24.0
151.0	-43.4	-24.0
151.5	-38.9	-24.0
152.0	-37.9	-24.0
152.5	-39.3	-24.0
153.0	-48.8	-24.0
153.5	-35.3	-24.0
154.0	-35.5	-24.0
154.5	-46.1	-24.0
155.0	-44.8	-24.0
155.5	-37.4	-24.0
156.0	-36.1	-24.0
156.5	-39.3	-24.0
157.0	-45.4	-24.0
157.5	-38.3	-24.0
158.0	-42.5	-24.0
158.5	-43.3	-24.0
159.0	-42.1	-24.0
159.5	-41.2	-24.0
160.0	-43.8	-24.0
160.5	-43.4	-24.0
161.0	-36.0	-24.0
161.5	-39.8	-24.0
162.0	-37.9	-24.0
162.5	-45.4	-24.0
163.0	-40.3	-24.0
163.5	-43.3	-24.0
164.0	-39.6	-24.0
164.5	-43.3	-24.0
165.0	-42.7	-24.0
165.5	-41.2	-24.0
166.0	-43.8	-24.0
166.5	-41.3	-24.0
167.0	-39.9	-24.0
167.5	-37.7	-24.0
168.0	-39.0	-24.0
168.5	-39.1	-24.0
169.0	-41.7	-24.0
169.5	-38.6	-24.0
170.0	-44.5	-24.0
170.5	-35.8	-24.0
171.0	-36.7	-24.0
171.5	-38.4	-24.0
172.0	-33.6	-24.0
172.5	-35.4	-24.0
173.0	-44.8	-24.0
173.5	-46.9	-24.0
174.0	-44.3	-24.0
174.5	-50.1	-24.0
175.0	-37.8	-24.0
175.5	-37.8	-24.0
176.0	-47.0	-24.0
176.5	-44.0	-24.0
177.0	-40.9	-24.0
177.5	-38.9	-24.0
178.0	-37.8	-24.0
178.5	-39.1	-24.0
179.0	-38.5	-24.0
179.50	-37.91	-24.00

Cobham SATCOM, Sea Tel Products  
 1.2 meter EIRPsd, HH Co-Pol, Azimuth, E-Plane (A)

14.25 GHz @ -14 dBW / 4 kHz, 0.2 dB Radome Loss



14.25 GHz @ -14 dBW / 4 kHz, 0.2 dB Radome Loss



Plot Parameters	
Input sd	-14.0
Gain	43.05
Cal Factor	42.22
Peak Excursions dB	1.5° to 7° 7° to 180°
% Over	0%

File  
 E:\LOOPCANYONVACQUIREDDATA\1425\_AZ\_HH.MDB

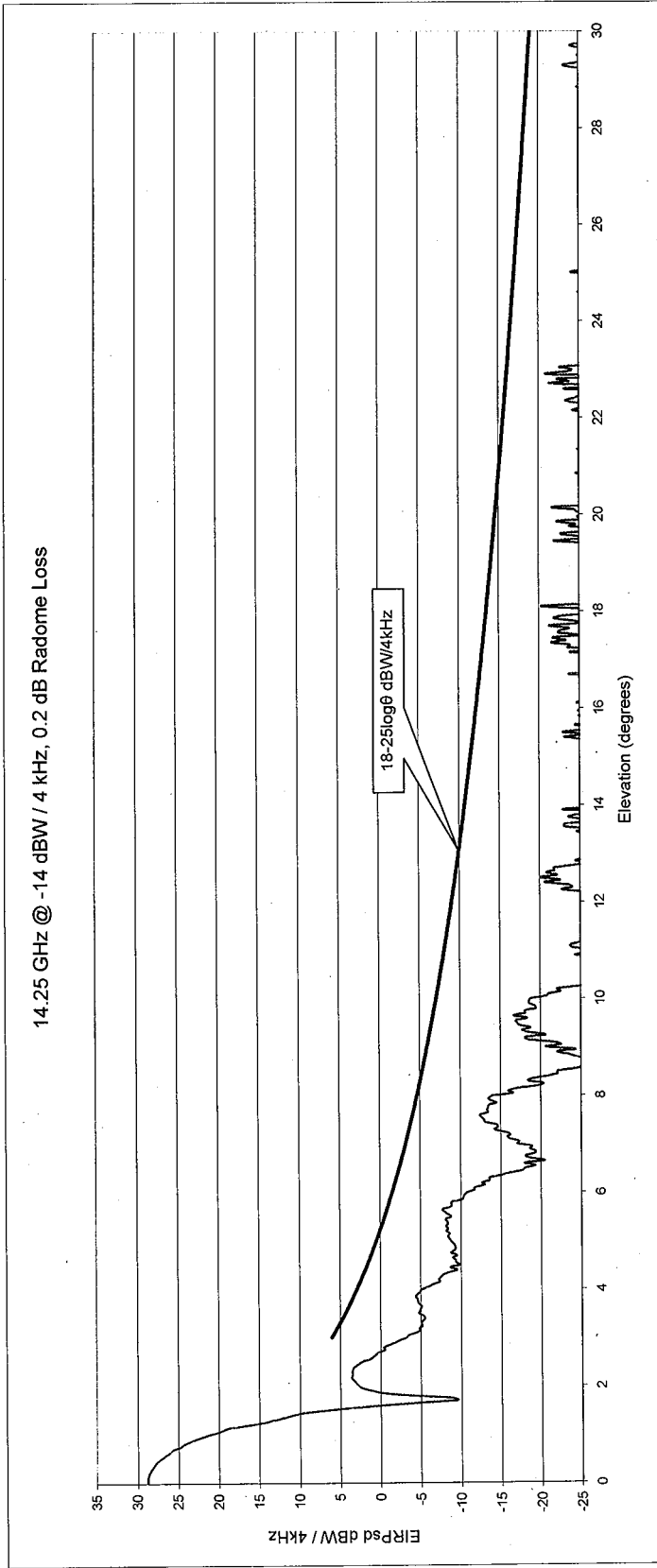
8





Cobham SATCOM, Sea Tel Products  
 1.2 meter EIRPsd, HH Co-Pol, Elevation, H-Plane (B)

14.25 GHz @ -14 dBW / 4 kHz, 0.2 dB Radome Loss



9

Plot Parameters  
 Input sd -14.0  
 Gain 43.05  
 Cal Factor 46.92  
 Peak Excursions dB 3° to 30° -3.12  
 % Over 0%

File E:\LOOPCANYONACQUIREDATA\1425EL\_HH\_ND\_11.MDB

10

**Cobham SATCOM, Sea Tel Products**

1.2M EIRPsd Data Table - Cross Pol Azimuth, -10 to +10 Degrees @ 0.1 (C)

14.25 GHz @ -14 dBW / 4 kHz

Angle Degrees	EIRPsd dBW/4kHz	Mask dBW/4kHz
-10.0	-36.3	-16.0
-9.9	-33.3	-16.0
-9.8	-32.9	-16.0
-9.7	-33.8	-16.0
-9.6	-34.3	-16.0
-9.5	-36.5	-16.0
-9.4	-35.4	-16.0
-9.3	-33.9	-16.0
-9.2	-35.8	-16.0
-9.1	-33.5	-16.0
-9.0	-30.8	-16.0
-8.9	-33.3	-16.0
-8.8	-37.2	-16.0
-8.7	-28.1	-16.0
-8.6	-30.6	-16.0
-8.5	-36.5	-16.0
-8.4	-35.8	-16.0
-8.3	-36.1	-16.0
-8.2	-31.4	-16.0
-8.1	-31.8	-16.0
-8.0	-31.8	-16.0
-7.9	-33.5	-16.0
-7.8	-30.1	-16.0
-7.7	-29.4	-16.0
-7.6	-31.7	-16.0
-7.5	-30.6	-16.0
-7.4	-34.7	-16.0
-7.3	-30.5	-16.0
-7.2	-33.1	-16.0
-7.1	-34.8	-16.0
-7.0	-36.4	-16.0
-6.9	-30.2	-16.0
-6.8	-33.3	-15.8
-6.7	-30.1	-15.7
-6.6	-31.0	-15.5
-6.5	-29.1	-15.3
-6.4	-31.4	-15.2
-6.3	-31.0	-15.0
-6.2	-29.4	-14.8
-6.1	-29.6	-14.6
-6.0	-31.7	-14.5
-5.9	-37.4	-14.3
-5.8	-32.4	-14.1
-5.7	-37.7	-13.9
-5.6	-32.3	-13.7
-5.5	-36.5	-13.5
-5.4	-33.0	-13.3
-5.3	-29.7	-13.1
-5.2	-33.1	-12.9
-5.1	-35.0	-12.7
-5.0	-33.6	-12.5
-4.9	-35.1	-12.3
-4.8	-35.1	-12.0
-4.7	-47.7	-11.8
-4.6	-39.6	-11.6
-4.5	-49.3	-11.3
-4.4	-34.4	-11.1
-4.3	-55.7	-10.8

14.25 GHz @ -14 dBW / 4 kHz

Angle Degrees	EIRPsd dBW/4kHz	Mask dBW/4kHz
0.0	-30.8	
0.1	-28.8	
0.2	-21.9	
0.3	-20.0	
0.4	-19.4	
0.5	-18.8	
0.6	-18.4	
0.7	-17.4	
0.8	-18.4	
0.9	-18.4	
1.0	-19.1	
1.1	-19.4	
1.2	-20.1	
1.3	-20.8	
1.4	-22.0	
1.5	-21.1	
1.6	-21.4	
1.7	-21.7	
1.8	-21.2	-1.4
1.9	-21.2	-2.0
2.0	-19.5	-2.5
2.1	-20.6	-3.1
2.2	-20.0	-3.6
2.3	-18.4	-4.0
2.4	-19.5	-4.5
2.5	-18.9	-4.9
2.6	-20.4	-5.4
2.7	-20.3	-5.8
2.8	-20.8	-6.2
2.9	-21.2	-6.6
3.0	-22.1	-6.9
3.1	-23.6	-7.3
3.2	-25.4	-7.6
3.3	-27.2	-8.0
3.4	-28.2	-8.3
3.5	-31.1	-8.6
3.6	-34.1	-8.9
3.7	-34.7	-9.2
3.8	-37.3	-9.5
3.9	-40.5	-9.8
4.0	-49.4	-10.1
4.1	-37.0	-10.3
4.2	-39.9	-10.6
4.3	-37.8	-10.8
4.4	-37.4	-11.1
4.5	-42.5	-11.3
4.6	-49.7	-11.6
4.7	-50.3	-11.8
4.8	-43.5	-12.0
4.9	-44.1	-12.3
5.0	-46.3	-12.5
5.1	-35.5	-12.7
5.2	-37.3	-12.9
5.3	-41.1	-13.1
5.4	-40.9	-13.3
5.5	-40.3	-13.5
5.6	-40.1	-13.7
5.7	-40.3	-13.9

10

**Cobham SATCOM, Sea Tel Products**

1.2M EIRPsd Data Table - Cross Pol Azimuth, -10 to +10 Degrees @ 0.1 (C)

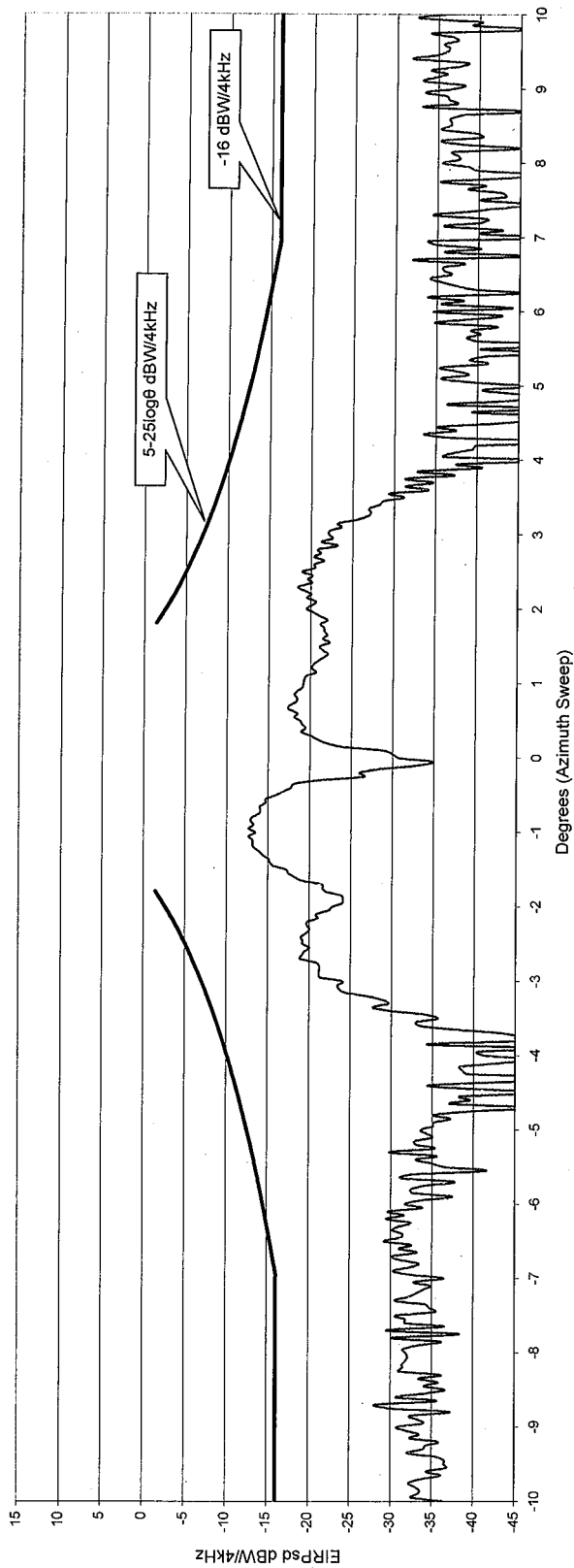
-4.2	-38.6	-10.6
-4.1	-43.4	-10.3
-4.0	-41.3	-10.1
-3.9	-48.3	-9.8
-3.8	-45.8	-9.5
-3.7	-43.4	-9.2
-3.6	-33.4	-8.9
-3.5	-35.6	-8.6
-3.4	-29.9	-8.3
-3.3	-29.6	-8.0
-3.2	-26.9	-7.6
-3.1	-23.6	-7.3
-3.0	-24.0	-6.9
-2.9	-21.1	-6.6
-2.8	-21.2	-6.2
-2.7	-18.9	-5.8
-2.6	-19.4	-5.4
-2.5	-19.2	-4.9
-2.4	-19.0	-4.5
-2.3	-20.0	-4.0
-2.2	-19.7	-3.6
-2.1	-20.8	-3.1
-2.0	-22.7	-2.5
-1.9	-24.0	-2.0
-1.8	-22.0	-1.4
-1.7	-21.5	
-1.6	-18.2	
-1.5	-17.2	
-1.4	-15.2	
-1.3	-14.3	
-1.2	-13.2	
-1.1	-13.1	
-1.0	-13.4	
-0.9	-13.2	
-0.8	-13.0	
-0.7	-14.1	
-0.6	-14.7	
-0.5	-15.9	
-0.4	-17.7	
-0.3	-21.1	
-0.2	-25.9	
-0.1	-32.9	
0.0	-30.8	

5.8	-42.2	-14.1
5.9	-39.2	-14.3
6.0	-34.5	-14.5
6.1	-35.6	-14.6
6.2	-34.0	-14.8
6.3	-39.5	-15.0
6.4	-35.4	-15.2
6.5	-36.7	-15.3
6.6	-35.7	-15.5
6.7	-32.1	-15.7
6.8	-35.9	-15.8
6.9	-34.8	-16.0
7.0	-49.2	-16.0
7.1	-42.8	-16.0
7.2	-40.1	-16.0
7.3	-34.4	-16.0
7.4	-43.2	-16.0
7.5	-40.2	-16.0
7.6	-42.7	-16.0
7.7	-40.7	-16.0
7.8	-43.5	-16.0
7.9	-39.9	-16.0
8.0	-35.5	-16.0
8.1	-37.4	-16.0
8.2	-44.9	-16.0
8.3	-35.3	-16.0
8.4	-39.6	-16.0
8.5	-36.4	-16.0
8.6	-36.4	-16.0
8.7	-46.3	-16.0
8.8	-37.2	-16.0
8.9	-36.0	-16.0
9.0	-36.7	-16.0
9.1	-33.2	-16.0
9.2	-36.0	-16.0
9.3	-37.4	-16.0
9.4	-31.9	-16.0
9.5	-36.0	-16.0
9.6	-35.6	-16.0
9.7	-36.5	-16.0
9.8	-47.3	-16.0
9.9	-40.2	-16.0
10.0	-35.7	-16.0



Cobnam SATCOM, Sea Tel Products  
 1.2 meter EIRPsd, VH XP, Azimuth, E-Plane (C)

14.25 GHz @ -14 dBW / 4 kHz, 0.2 dB Radome Loss



10

% Over  
0.00

Peak Excursions dB  
 1.8° to 7° 7° to 180°  
 -13.09 -13.31

Plot Parameters		
Pin sd	Gain	Cal Factor
-14	43.05	42.12

File  
 E:\LOOPCANYON\ACQUIRE\DATA\1425XAZ\_HH\_ND\_2.MDB

(A)  
V100

## 2. EIRP Spectral Density Data

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

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-10.000	-27.513	-7.000
-9.900	-24.222	-6.891
-9.800	-21.840	-6.781
-9.700	-19.973	-6.669
-9.600	-18.438	-6.557
-9.500	-17.133	-6.443
-9.400	-16.027	-6.328
-9.300	-15.047	-6.212
-9.200	-14.165	-6.000
-9.100	-13.365	-6.000
-9.000	-12.633	-6.000
-8.900	-12.949	-6.000
-8.800	-13.277	-6.000
-8.700	-13.618	-6.000
-8.600	-13.973	-6.000
-8.500	-14.343	-6.000
-8.400	-15.111	-6.000
-8.300	-15.954	-6.000
-8.200	-16.888	-6.000
-8.100	-17.934	-6.000
-8.000	-19.123	-6.000
-7.900	-18.347	-6.000
-7.800	-17.635	-6.000
-7.700	-16.976	-6.000
-7.600	-16.365	-6.000
-7.500	-15.793	-6.000
-7.400	-14.427	-6.000
-7.300	-13.247	-6.000
-7.200	-12.209	-6.000
-7.100	-11.281	-6.000
-7.000	-10.443	-6.000
-6.900	-10.255	-5.971
-6.800	-10.072	-5.813
-6.700	-9.892	-5.652
-6.600	-9.716	-5.489
-6.500	-9.543	-5.323
-6.400	-10.323	-5.154
-6.300	-11.179	-4.984
-6.200	-12.129	-4.810
-6.100	-13.196	-4.633
-6.000	-14.413	-4.454
-5.900	-15.531	-4.271
-5.800	-16.814	-4.086
-5.700	-18.320	-3.897
-5.600	-20.143	-3.705
-5.500	-22.453	-3.509
-5.400	-23.107	-3.310
-5.300	-23.814	-3.107
-5.200	-24.583	-2.900
-5.100	-25.428	-2.689

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-5.000	-26.363	-2.474
-4.900	-21.634	-2.255
-4.800	-18.589	-2.031
-4.700	-16.339	-1.802
-4.600	-14.553	-1.569
-4.500	-13.073	-1.330
-4.400	-13.173	-1.086
-4.300	-13.273	-0.837
-4.200	-13.375	-0.581
-4.100	-13.479	-0.320
-4.000	-13.583	-0.051
-3.900	-14.515	0.223
-3.800	-15.558	0.505
-3.700	-16.745	0.795
-3.600	-18.119	1.092
-3.500	-19.753	1.398
-3.400	-16.105	1.713
-3.300	-13.544	2.037
-3.200	-11.568	2.371
-3.100	-9.960	2.716
-3.000	-8.603	3.072
-2.900	-6.084	3.440
-2.800	-4.134	3.821
-2.700	-2.542	4.216
-2.600	-1.197	4.626
-2.500	-0.033	5.051
-2.400	0.300	5.495
-2.300	0.621	5.957
-2.200	0.930	6.439
-2.100	1.228	6.945
-2.000	1.517	7.474
-1.900	4.244	8.031
-1.800	6.317	8.618
-1.700	7.989	9.239
-1.600	9.391	9.897
-1.500	10.597	10.598
-1.400	13.056	
-1.300	14.971	
-1.200	16.538	
-1.100	17.866	
-1.000	19.017	
-0.900	20.029	
-0.800	20.936	
-0.700	21.757	
-0.600	22.507	
-0.500	23.197	
-0.400	23.475	
-0.300	23.745	
-0.200	24.006	
-0.100	24.260	

(A)  
V100

Intellian®

Intellian v-Series  
Maritime Ku-band VSAT Antenna System

Test Report

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
0.000	24.507	
0.100	24.244	
0.200	23.974	
0.300	23.694	
0.400	23.406	
0.500	23.107	
0.600	22.380	
0.700	21.586	
0.800	20.712	
0.900	19.741	
1.000	18.647	
1.100	17.459	
1.200	16.083	
1.300	14.447	
1.400	12.430	
1.500	9.797	10.598
1.600	8.544	9.897
1.700	7.080	9.239
1.800	5.318	8.618
1.900	3.104	8.031
2.000	0.127	7.474
2.100	-0.172	6.945
2.200	-0.482	6.439
2.300	-0.803	5.957
2.400	-1.136	5.495
2.500	-1.483	5.051
2.600	-2.630	4.626
2.700	-3.952	4.216
2.800	-5.511	3.821
2.900	-7.414	3.440
3.000	-9.853	3.072
3.100	-11.023	2.716
3.200	-12.376	2.371
3.300	-13.979	2.037
3.400	-15.946	1.713
3.500	-18.493	1.398
3.600	-17.060	1.092
3.700	-15.831	0.795
3.800	-14.754	0.505
3.900	-13.796	0.223
4.000	-12.933	-0.051
4.100	-12.945	-0.320
4.200	-12.957	-0.581
4.300	-12.969	-0.837
4.400	-12.981	-1.086
4.500	-12.993	-1.330
4.600	-13.832	-1.569
4.700	-14.761	-1.802
4.800	-15.802	-2.031
4.900	-16.984	-2.255

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
5.000	-18.353	-2.474
5.100	-19.867	-2.689
5.200	-20.694	-2.900
5.300	-20.341	-3.107
5.400	-19.038	-3.310
5.500	-17.393	-3.509
5.600	-18.977	-3.705
5.700	-20.917	-3.897
5.800	-23.417	-4.086
5.900	-26.942	-4.271
6.000	-32.973	-4.454
6.100	-25.621	-4.633
6.200	-21.698	-4.810
6.300	-19.005	-4.984
6.400	-16.952	-5.154
6.500	-15.293	-5.323
6.600	-15.414	-5.489
6.700	-15.536	-5.652
6.800	-15.660	-5.813
6.900	-15.785	-5.971
7.000	-15.913	-6.000
7.100	-16.518	-6.000
7.200	-17.168	-6.000
7.300	-17.870	-6.000
7.400	-18.635	-6.000
7.500	-19.473	-6.000
7.600	-19.959	-6.000
7.700	-20.474	-6.000
7.800	-21.022	-6.000
7.900	-21.606	-6.000
8.000	-22.233	-6.000
8.100	-21.835	-6.000
8.200	-21.454	-6.000
8.300	-21.090	-6.000
8.400	-20.739	-6.000
8.500	-20.403	-6.000
8.600	-18.763	-6.000
8.700	-17.383	-6.000
8.800	-16.193	-6.000
8.900	-15.147	-6.000
9.000	-14.213	-6.000
9.100	-14.483	-6.000
9.200	-14.761	-6.000
9.300	-15.048	-6.212
9.400	-15.345	-6.328
9.500	-15.653	-6.443
9.600	-16.683	-6.557
9.700	-17.851	-6.669
9.800	-19.201	-6.781
9.900	-20.801	-6.891
10.000	-22.763	-7.000

(A)  
V100

11



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

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-180	-37.993	-14
-179	-39.113	-14
-178	-36.993	-14
-177	-34.193	-14
-176	-32.303	-14
-175	-31.463	-14
-174	-35.973	-14
-173	-38.733	-14
-172	-44.023	-14
-171	-35.563	-14
-170	-36.643	-14
-169	-49.553	-14
-168	-40.443	-14
-167	-37.943	-14
-166	-59.063	-14
-165	-37.733	-14
-164	-46.343	-14
-163	-63.133	-14
-162	-41.233	-14
-161	-39.703	-14
-160	-45.933	-14
-159	-46.093	-14
-158	-38.673	-14
-157	-42.733	-14
-156	-40.453	-14
-155	-40.653	-14
-154	-46.833	-14
-153	-39.893	-14
-152	-38.583	-14
-151	-40.133	-14
-150	-48.713	-14
-149	-39.613	-14
-148	-36.623	-14
-147	-43.493	-14
-146	-42.963	-14
-145	-38.083	-14
-144	-37.243	-14
-143	-42.573	-14
-142	-40.413	-14
-141	-40.783	-14
-140	-38.953	-14
-139	-38.673	-14
-138	-42.503	-14
-137	-36.933	-14
-136	-35.343	-14

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-135	-36.483	-14
-134	-35.343	-14
-133	-35.493	-14
-132	-35.853	-14
-131	-34.543	-14
-130	-34.763	-14
-129	-31.963	-14
-128	-31.813	-14
-127	-29.203	-14
-126	-29.513	-14
-125	-29.703	-14
-124	-29.253	-14
-123	-28.403	-14
-122	-27.343	-14
-121	-25.913	-14
-120	-24.593	-14
-119	-24.273	-14
-118	-24.173	-14
-117	-24.353	-14
-116	-24.863	-14
-115	-25.173	-14
-114	-24.583	-14
-113	-24.513	-14
-112	-26.033	-14
-111	-29.153	-14
-110	-32.523	-14
-109	-33.453	-14
-108	-30.713	-14
-107	-29.933	-14
-106	-28.863	-14
-105	-29.493	-14
-104	-30.473	-14
-103	-33.393	-14
-102	-31.913	-14
-101	-31.483	-14
-100	-31.673	-14
-99	-33.753	-14
-98	-34.223	-14
-97	-33.283	-14
-96	-34.643	-14
-95	-36.553	-14
-94	-36.463	-14
-93	-35.853	-14
-92	-37.373	-14
-91	-40.103	-14

(A)  
V100

Intellian®

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-90.000	-43.263	-14.000
-89.000	-38.673	-14.000
-88.000	-35.503	-14.000
-87.000	-36.533	-14.000
-86.000	-38.753	-14.000
-85.000	-32.423	-14.000
-84.000	-35.023	-24.000
-83.000	-36.983	-24.000
-82.000	-34.963	-24.000
-81.000	-35.713	-24.000
-80.000	-36.483	-24.000
-79.000	-47.953	-24.000
-78.000	-36.133	-24.000
-77.000	-40.443	-24.000
-76.000	-47.633	-24.000
-75.000	-42.493	-24.000
-74.000	-48.523	-24.000
-73.000	-49.443	-24.000
-72.000	-43.183	-24.000
-71.000	-45.253	-24.000
-70.000	-38.453	-24.000
-69.000	-38.123	-24.000
-68.000	-37.663	-24.000
-67.000	-37.893	-24.000
-66.000	-41.193	-24.000
-65.000	-35.283	-24.000
-64.000	-40.403	-24.000
-63.000	-38.603	-24.000
-62.000	-43.563	-24.000
-61.000	-38.533	-24.000
-60.000	-39.743	-24.000
-59.000	-38.223	-24.000
-58.000	-38.743	-24.000
-57.000	-42.583	-24.000
-56.000	-39.703	-24.000
-55.000	-44.173	-24.000
-54.000	-39.373	-24.000
-53.000	-40.413	-24.000
-52.000	-47.723	-24.000
-51.000	-41.953	-24.000
-50.000	-41.493	-24.000
-49.000	-44.213	-24.000
-48.000	-43.933	-24.000
-47.000	-38.903	-23.802
-46.000	-39.463	-23.569

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-45.000	-40.063	-23.330
-44.000	-42.843	-23.086
-43.000	-36.203	-22.837
-42.000	-47.283	-22.581
-41.000	-36.373	-22.320
-40.000	-34.853	-22.051
-39.000	-35.733	-21.777
-38.000	-42.133	-21.495
-37.000	-39.093	-21.205
-36.000	-33.823	-20.908
-35.000	-33.983	-20.602
-34.000	-41.453	-20.287
-33.000	-44.893	-19.963
-32.000	-32.353	-19.629
-31.000	-35.093	-19.284
-30.000	-46.103	-18.928
-29.000	-32.563	-18.560
-28.000	-38.993	-18.179
-27.000	-41.403	-17.784
-26.000	-33.473	-17.374
-25.000	-26.853	-16.949
-24.000	-32.593	-16.505
-23.000	-26.953	-16.043
-22.000	-37.993	-15.561
-21.000	-34.053	-15.055
-20.000	-27.333	-14.526
-19.000	-24.833	-13.969
-18.000	-24.083	-13.382
-17.000	-21.773	-12.761
-16.000	-28.393	-12.103
-15.000	-21.813	-11.402
-14.000	-32.343	-10.653
-13.000	-25.413	-9.849
-12.000	-26.963	-8.980
-11.000	-19.493	-8.035
-10.000	-27.513	-7.000
-9.000	-12.633	-6.000
-8.000	-19.123	-6.000
-7.000	-10.443	-6.000
-6.000	-14.413	-4.454
-5.000	-26.363	-2.474
-4.000	-13.583	-0.051
-3.000	-8.603	3.072
-2.000	1.517	7.474
-1.000	19.017	

(A)

11

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
0.000	24.507	
1.000	18.647	
2.000	0.127	7.474
3.000	-9.853	3.072
4.000	-12.933	-0.051
5.000	-18.353	-2.474
6.000	-32.973	-4.454
7.000	-15.913	-6.000
8.000	-22.233	-6.000
9.000	-14.213	-6.000
10.000	-22.763	-7.000
11.000	-22.563	-8.035
12.000	-25.053	-8.980
13.000	-24.873	-9.849
14.000	-28.513	-10.653
15.000	-22.753	-11.402
16.000	-28.713	-12.103
17.000	-20.973	-12.761
18.000	-25.113	-13.382
19.000	-25.953	-13.969
20.000	-26.013	-14.526
21.000	-29.933	-15.055
22.000	-37.853	-15.561
23.000	-33.443	-16.043
24.000	-32.903	-16.505
25.000	-30.393	-16.949
26.000	-32.873	-17.374
27.000	-46.683	-17.784
28.000	-43.033	-18.179
29.000	-39.683	-18.560
30.000	-35.113	-18.928
31.000	-40.173	-19.284
32.000	-31.083	-19.629
33.000	-43.433	-19.963
34.000	-33.053	-20.287
35.000	-39.023	-20.602
36.000	-33.713	-20.908
37.000	-41.663	-21.205
38.000	-35.763	-21.495
39.000	-39.593	-21.777
40.000	-34.903	-22.051
41.000	-37.533	-22.320
42.000	-40.563	-22.581
43.000	-41.093	-22.837
44.000	-44.853	-23.086

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
45.000	-41.113	-23.330
46.000	-39.963	-23.569
47.000	-41.833	-23.802
48.000	-53.533	-24.000
49.000	-44.973	-24.000
50.000	-47.043	-24.000
51.000	-37.743	-24.000
52.000	-43.033	-24.000
53.000	-38.763	-24.000
54.000	-56.683	-24.000
55.000	-42.793	-24.000
56.000	-44.603	-24.000
57.000	-37.893	-24.000
58.000	-43.623	-24.000
59.000	-39.283	-24.000
60.000	-57.433	-24.000
61.000	-40.263	-24.000
62.000	-42.343	-24.000
63.000	-38.963	-24.000
64.000	-45.393	-24.000
65.000	-37.253	-24.000
66.000	-48.413	-24.000
67.000	-48.863	-24.000
68.000	-33.703	-24.000
69.000	-41.623	-24.000
70.000	-48.543	-24.000
71.000	-42.533	-24.000
72.000	-44.323	-24.000
73.000	-41.453	-24.000
74.000	-45.733	-24.000
75.000	-44.633	-24.000
76.000	-47.543	-24.000
77.000	-49.423	-24.000
78.000	-48.623	-24.000
79.000	-40.133	-24.000
80.000	-59.333	-24.000
81.000	-50.163	-24.000
82.000	-37.363	-24.000
83.000	-41.593	-24.000
84.000	-38.913	-24.000
85.000	-37.323	-24.000
86.000	-38.473	-14.000
87.000	-39.493	-14.000
88.000	-39.103	-14.000
89.000	-35.503	-14.000

(A)  
V100

11



f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
90.000	-38.733	-14.000
91.000	-42.393	-14.000
92.000	-37.313	-14.000
93.000	-37.463	-14.000
94.000	-39.793	-14.000
95.000	-37.393	-14.000
96.000	-37.133	-14.000
97.000	-35.373	-14.000
98.000	-35.713	-14.000
99.000	-36.353	-14.000
100.000	-32.283	-14.000
101.000	-31.553	-14.000
102.000	-31.863	-14.000
103.000	-33.393	-14.000
104.000	-33.173	-14.000
105.000	-32.643	-14.000
106.000	-30.933	-14.000
107.000	-30.613	-14.000
108.000	-30.803	-14.000
109.000	-32.893	-14.000
110.000	-34.653	-14.000
111.000	-31.703	-14.000
112.000	-29.003	-14.000
113.000	-27.493	-14.000
114.000	-26.343	-14.000
115.000	-25.143	-14.000
116.000	-25.183	-14.000
117.000	-24.093	-14.000
118.000	-24.383	-14.000
119.000	-25.093	-14.000
120.000	-25.693	-14.000
121.000	-26.743	-14.000
122.000	-27.523	-14.000
123.000	-27.743	-14.000
124.000	-28.173	-14.000
125.000	-28.823	-14.000
126.000	-29.753	-14.000
127.000	-29.523	-14.000
128.000	-32.043	-14.000
129.000	-34.743	-14.000
130.000	-33.223	-14.000
131.000	-32.683	-14.000
132.000	-35.593	-14.000
133.000	-35.493	-14.000
134.000	-35.623	-14.000

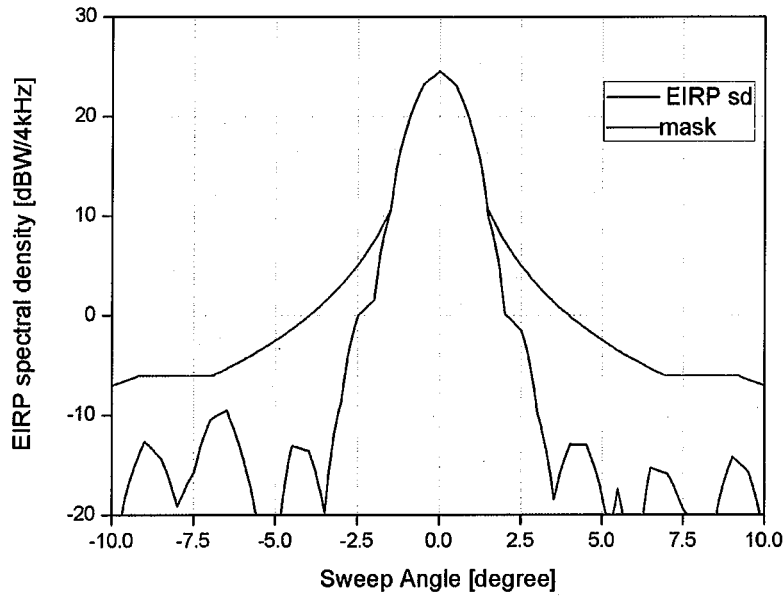
f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
135	-34.813	-14
136	-34.253	-14
137	-36.193	-14
138	-38.283	-14
139	-35.783	-14
140	-34.953	-14
141	-37.503	-14
142	-36.973	-14
143	-40.063	-14
144	-38.123	-14
145	-37.193	-14
146	-37.343	-14
147	-43.543	-14
148	-56.213	-14
149	-37.863	-14
150	-45.113	-14
151	-47.753	-14
152	-41.913	-14
153	-38.183	-14
154	-41.103	-14
155	-46.913	-14
156	-40.563	-14
157	-45.883	-14
158	-36.873	-14
159	-39.773	-14
160	-41.443	-14
161	-39.123	-14
162	-40.283	-14
163	-38.733	-14
164	-61.613	-14
165	-38.343	-14
166	-42.093	-14
167	-37.903	-14
168	-45.313	-14
169	-39.013	-14
170	-41.853	-14
171	-32.643	-14
172	-40.063	-14
173	-32.963	-14
174	-34.243	-14
175	-46.203	-14
176	-42.193	-14
177	-38.983	-14
178	-37.083	-14
179	-35.093	-14
180	-36.983	-14

(V100)

11

# 1. EIRP Spectral Density of V100GX

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



-16.66dBW/4kHz Input power spectral density @ f=14.25GHz & 0.6dB Radome loss

### ▪ FCC EIRP spectral density regulation

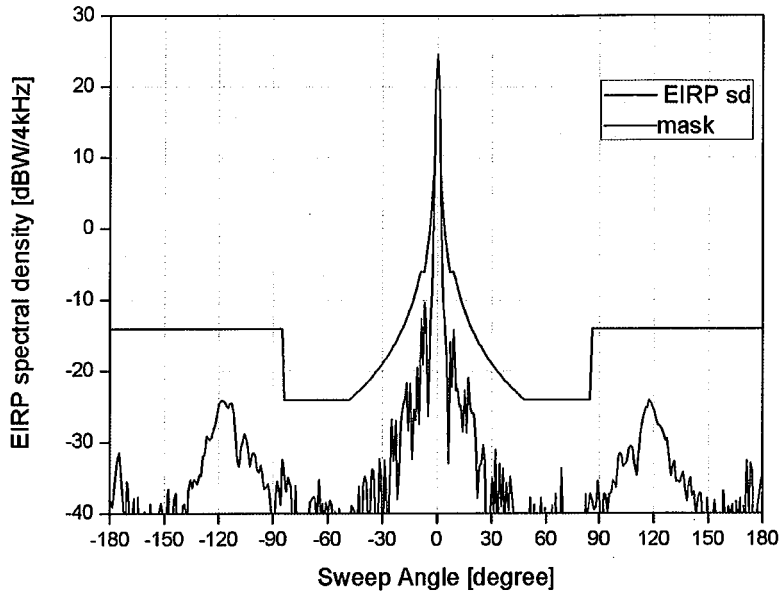
15-25log( $\theta$ )	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
18-25log( $\theta$ )	dBW/4kHz	for	$9.2^\circ < \theta \leq 48^\circ$
-24	dBW/4kHz	for	$48^\circ < \theta \leq 85^\circ$
-14	dBW/4kHz	for	$85^\circ < \theta \leq 180^\circ$

The v100GX's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -16.66 dBW/ 4kHz



(A)  
v100

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



-16.66dBW/4kHz Input power spectral density @ f=14.25GHz & 0.6dB Radome loss

### ▪ FCC EIRP spectral density regulation

$15-25\log(\theta)$	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
$18-25\log(\theta)$	dBW/4kHz	for	$9.2^\circ < \theta \leq 48^\circ$
-24	dBW/4kHz	for	$48^\circ < \theta \leq 85^\circ$
-14	dBW/4kHz	for	$85^\circ < \theta \leq 180^\circ$

The v100GX's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -16.66 dBW/ 4kHz

(B)  
V100

12

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

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
0.000	24.507	
0.100	24.237	
0.200	23.959	
0.300	23.672	
0.400	23.375	
0.500	23.067	
0.600	22.294	
0.700	21.445	
0.800	20.504	
0.900	19.449	
1.000	18.247	
1.100	17.043	
1.200	15.645	
1.300	13.977	
1.400	11.912	
1.500	9.197	
1.600	8.411	
1.700	7.547	
1.800	6.588	
1.900	5.509	
2.000	4.277	
2.100	4.136	
2.200	3.992	
2.300	3.846	
2.400	3.698	
2.500	3.547	
2.600	3.187	
2.700	2.812	
2.800	2.419	
2.900	2.008	
3.000	1.577	6.072
3.100	1.318	5.716
3.200	1.051	5.371
3.300	0.776	5.037
3.400	0.491	4.713
3.500	0.197	4.398
3.600	-0.176	4.092
3.700	-0.566	3.795
3.800	-0.974	3.505
3.900	-1.402	3.223
4.000	-1.853	2.949
4.100	-2.181	2.680
4.200	-2.522	2.419
4.300	-2.877	2.163
4.400	-3.247	1.914
4.500	-3.633	1.670
4.600	-4.356	1.431
4.700	-5.145	1.198
4.800	-6.013	0.969
4.900	-6.978	0.745

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
5.000	-8.063	0.526
5.100	-8.870	0.311
5.200	-9.759	0.100
5.300	-10.750	-0.107
5.400	-11.869	-0.310
5.500	-13.153	-0.509
5.600	-12.987	-0.705
5.700	-12.824	-0.897
5.800	-12.664	-1.086
5.900	-12.507	-1.271
6.000	-12.353	-1.454
6.100	-11.672	-1.633
6.200	-11.041	-1.810
6.300	-10.452	-1.984
6.400	-9.901	-2.154
6.500	-9.383	-2.323
6.600	-9.714	-2.489
6.700	-10.059	-2.652
6.800	-10.418	-2.813
6.900	-10.792	-2.971
7.000	-11.183	-3.127
7.100	-12.388	-3.281
7.200	-13.787	-3.433
7.300	-15.456	-3.583
7.400	-17.524	-3.731
7.500	-20.243	-3.877
7.600	-21.803	-4.020
7.700	-23.705	-4.162
7.800	-26.144	-4.302
7.900	-29.547	-4.441
8.000	-35.223	-4.577
8.100	-28.452	-4.712
8.200	-24.694	-4.845
8.300	-22.079	-4.977
8.400	-20.072	-5.107
8.500	-18.443	-5.235
8.600	-17.045	-5.362
8.700	-15.842	-5.488
8.800	-14.785	-5.612
8.900	-13.843	-5.735
9.000	-12.993	-5.856
9.100	-13.236	-5.976
9.200	-13.486	-6.095
9.300	-13.744	-6.212
9.400	-14.009	-6.328
9.500	-14.283	-6.443
9.600	-15.254	-6.557
9.700	-16.348	-6.669
9.800	-17.600	-6.781
9.900	-19.063	-6.891

(B)  
V100

12

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
10.000	-20.823	-7.000
10.100	-21.757	-7.108
10.200	-22.803	-7.215
10.300	-23.993	-7.321
10.400	-25.373	-7.426
10.500	-27.013	-7.530
10.600	-25.701	-7.633
10.700	-24.561	-7.735
10.800	-23.553	-7.836
10.900	-22.651	-7.936
11.000	-21.833	-8.035
11.100	-21.399	-8.133
11.200	-20.986	-8.230
11.300	-20.592	-8.327
11.400	-20.215	-8.423
11.500	-19.853	-8.517
11.600	-20.842	-8.611
11.700	-21.959	-8.705
11.800	-23.240	-8.797
11.900	-24.743	-8.889
12.000	-26.563	-8.980
12.100	-27.525	-9.070
12.200	-28.607	-9.159
12.300	-29.842	-9.248
12.400	-31.284	-9.336
12.500	-33.013	-9.423
12.600	-32.655	-9.509
12.700	-32.310	-9.595
12.800	-31.979	-9.680
12.900	-31.661	-9.765
13.000	-31.353	-9.849
13.100	-30.221	-9.932
13.200	-29.219	-10.014
13.300	-28.321	-10.096
13.400	-27.507	-10.178
13.500	-26.763	-10.258
13.600	-26.558	-10.338
13.700	-26.358	-10.418
13.800	-26.162	-10.497
13.900	-25.970	-10.575
14.000	-25.783	-10.653
14.100	-27.093	-10.730
14.200	-28.635	-10.807
14.300	-30.512	-10.883
14.400	-32.910	-10.959
14.500	-36.233	-11.034
14.600	-33.857	-11.109
14.700	-31.993	-11.183
14.800	-30.459	-11.257
14.900	-29.156	-11.330

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
15.000	-28.023	-11.402
15.100	-28.927	-11.474
15.200	-29.936	-11.546
15.300	-31.078	-11.617
15.400	-32.393	-11.688
15.500	-33.943	-11.758
15.600	-33.828	-11.828
15.700	-33.715	-11.897
15.800	-33.603	-11.966
15.900	-33.492	-12.035
16.000	-33.383	-12.103
16.100	-32.245	-12.171
16.200	-31.238	-12.238
16.300	-30.336	-12.305
16.400	-29.520	-12.371
16.500	-28.773	-12.437
16.600	-27.885	-12.503
16.700	-27.080	-12.568
16.800	-26.343	-12.633
16.900	-25.663	-12.697
17.000	-25.033	-12.761
17.100	-24.867	-12.825
17.200	-24.704	-12.888
17.300	-24.544	-12.951
17.400	-24.387	-13.014
17.500	-24.233	-13.076
17.600	-25.151	-13.138
17.700	-26.179	-13.199
17.800	-27.344	-13.261
17.900	-28.690	-13.321
18.000	-30.283	-13.382
18.100	-30.299	-13.442
18.200	-30.315	-13.502
18.300	-30.331	-13.561
18.400	-30.347	-13.620
18.500	-30.363	-13.679
18.600	-29.815	-13.738
18.700	-29.299	-13.796
18.800	-28.812	-13.854
18.900	-28.351	-13.912
19.000	-27.913	-13.969
19.100	-27.738	-14.026
19.200	-27.567	-14.083
19.300	-27.399	-14.139
19.400	-27.235	-14.195
19.500	-27.073	-14.251
19.600	-27.259	-14.306
19.700	-27.448	-14.362
19.800	-27.642	-14.417
19.900	-27.840	-14.471

(13)  
V100

12

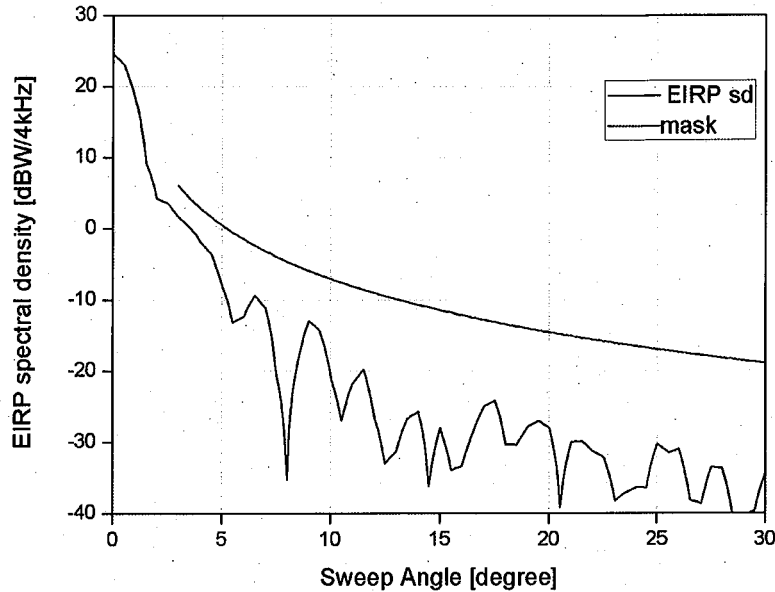
f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
20.000	-28.043	-14.526
20.100	-29.399	-14.580
20.200	-31.006	-14.634
20.300	-32.981	-14.687
20.400	-35.540	-14.741
20.500	-39.183	-14.794
20.600	-36.397	-14.847
20.700	-34.291	-14.899
20.800	-32.597	-14.952
20.900	-31.181	-15.004
21.000	-29.963	-15.055
21.100	-29.957	-15.107
21.200	-29.951	-15.158
21.300	-29.945	-15.209
21.400	-29.939	-15.260
21.500	-29.933	-15.311
21.600	-30.183	-15.361
21.700	-30.441	-15.411
21.800	-30.706	-15.461
21.900	-30.980	-15.511
22.000	-31.263	-15.561
22.100	-31.438	-15.610
22.200	-31.616	-15.659
22.300	-31.797	-15.708
22.400	-31.983	-15.756
22.500	-32.173	-15.805
22.600	-33.097	-15.853
22.700	-34.131	-15.901
22.800	-35.305	-15.948
22.900	-36.663	-15.996
23.000	-38.273	-16.043
23.100	-38.024	-16.090
23.200	-37.782	-16.137
23.300	-37.546	-16.184
23.400	-37.317	-16.230
23.500	-37.093	-16.277
23.600	-36.946	-16.323
23.700	-36.802	-16.369
23.800	-36.660	-16.414
23.900	-36.520	-16.460
24.000	-36.383	-16.505
24.100	-36.397	-16.550
24.200	-36.411	-16.595
24.300	-36.425	-16.640
24.400	-36.439	-16.685
24.500	-36.453	-16.729
24.600	-34.819	-16.773
24.700	-33.445	-16.817
24.800	-32.258	-16.861
24.900	-31.215	-16.905

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
25.000	-30.283	-16.949
25.100	-30.508	-16.992
25.200	-30.740	-17.035
25.300	-30.977	-17.078
25.400	-31.222	-17.121
25.500	-31.473	-17.164
25.600	-31.377	-17.206
25.700	-31.282	-17.248
25.800	-31.188	-17.290
25.900	-31.095	-17.332
26.000	-31.003	-17.374
26.100	-32.036	-17.416
26.200	-33.208	-17.458
26.300	-34.563	-17.499
26.400	-36.170	-17.540
26.500	-38.143	-17.581
26.600	-38.243	-17.622
26.700	-38.343	-17.663
26.800	-38.445	-17.703
26.900	-38.549	-17.744
27.000	-38.653	-17.784
27.100	-37.353	-17.824
27.200	-36.223	-17.864
27.300	-35.223	-17.904
27.400	-34.326	-17.944
27.500	-33.513	-17.983
27.600	-33.553	-18.023
27.700	-33.592	-18.062
27.800	-33.632	-18.101
27.900	-33.673	-18.140
28.000	-33.713	-18.179
28.100	-34.813	-18.218
28.200	-36.074	-18.256
28.300	-37.548	-18.295
28.400	-39.326	-18.333
28.500	-41.563	-18.371
28.600	-41.289	-18.409
28.700	-41.024	-18.447
28.800	-40.766	-18.485
28.900	-40.516	-18.522
29.000	-40.273	-18.560
29.100	-40.152	-18.597
29.200	-40.032	-18.635
29.300	-39.914	-18.672
29.400	-39.798	-18.709
29.500	-39.683	-18.746
29.600	-38.276	-18.782
29.700	-37.065	-18.819
29.800	-36.003	-18.855
29.900	-35.056	-18.892
30.000	-34.203	-18.928

(B)  
V100

12

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



-16.66dBW/4kHz Input power spectral density @ f=14.25GHz & 0.6dB Radome loss

#### ▪ FCC EIRP spectral density regulation

$18-25\log(\theta)$	dBW/4kHz	for	$3.0^\circ \leq \theta \leq 48^\circ$
-24	dBW/4kHz	for	$48^\circ < \theta \leq 85^\circ$
-14	dBW/4kHz	for	$85^\circ < \theta \leq 180^\circ$

The v100GX's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -16.66 dBW/ 4kHz

(C)  
V100

13

### 2.3. Azimuth Pattern for Cross-pol (-10°~10°)

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-10.000	-49.583	-16.000
-9.900	-49.543	-16.000
-9.800	-49.753	-16.000
-9.700	-50.413	-16.000
-9.600	-50.463	-16.000
-9.500	-50.243	-16.000
-9.400	-50.363	-16.000
-9.300	-48.343	-16.000
-9.200	-48.473	-16.000
-9.100	-46.833	-16.000
-9.000	-45.643	-16.000
-8.900	-45.783	-16.000
-8.800	-46.013	-16.000
-8.700	-46.153	-16.000
-8.600	-45.993	-16.000
-8.500	-47.593	-16.000
-8.400	-48.473	-16.000
-8.300	-49.583	-16.000
-8.200	-51.733	-16.000
-8.100	-54.863	-16.000
-8.000	-58.723	-16.000
-7.900	-65.553	-16.000
-7.800	-70.153	-16.000
-7.700	-69.123	-16.000
-7.600	-60.653	-16.000
-7.500	-55.013	-16.000
-7.400	-51.033	-16.000
-7.300	-48.653	-16.000
-7.200	-47.553	-16.000
-7.100	-46.343	-16.000
-7.000	-45.723	-16.000
-6.900	-46.003	-15.971
-6.800	-45.583	-15.813
-6.700	-46.063	-15.652
-6.600	-45.083	-15.489
-6.500	-44.943	-15.323
-6.400	-43.923	-15.154
-6.300	-43.823	-14.984
-6.200	-42.983	-14.810
-6.100	-42.873	-14.633
-6.000	-43.203	-14.454
-5.900	-43.433	-14.271
-5.800	-43.673	-14.086
-5.700	-43.143	-13.897
-5.600	-43.093	-13.705
-5.500	-42.583	-13.509
-5.400	-41.913	-13.310
-5.300	-41.733	-13.107
-5.200	-41.253	-12.900
-5.100	-41.223	-12.689

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
-5.000	-41.253	-12.474
-4.900	-41.963	-12.255
-4.800	-41.953	-12.031
-4.700	-42.713	-11.802
-4.600	-43.133	-11.569
-4.500	-43.903	-11.330
-4.400	-43.643	-11.086
-4.300	-43.073	-10.837
-4.200	-41.523	-10.581
-4.100	-39.903	-10.320
-4.000	-38.153	-10.051
-3.900	-37.003	-9.777
-3.800	-35.753	-9.495
-3.700	-34.903	-9.205
-3.600	-34.273	-8.908
-3.500	-34.303	-8.602
-3.400	-34.793	-8.287
-3.300	-35.323	-7.963
-3.200	-36.803	-7.629
-3.100	-38.803	-7.284
-3.000	-43.243	-6.928
-2.900	-51.473	-6.560
-2.800	-46.803	-6.179
-2.700	-39.113	-5.784
-2.600	-34.463	-5.374
-2.500	-31.013	-4.949
-2.400	-28.963	-4.505
-2.300	-27.343	-4.043
-2.200	-25.813	-3.561
-2.100	-24.523	-3.055
-2.000	-23.723	-2.526
-1.900	-23.043	-1.969
-1.800	-22.643	-1.382
-1.700	-22.513	
-1.600	-22.453	
-1.500	-22.463	
-1.400	-22.493	
-1.300	-22.443	
-1.200	-22.243	
-1.100	-21.823	
-1.000	-20.863	
-0.900	-19.743	
-0.800	-18.643	
-0.700	-17.643	
-0.600	-16.683	
-0.500	-15.993	
-0.400	-15.253	
-0.300	-14.693	
-0.200	-14.083	
-0.100	-13.663	

(c)  
V100

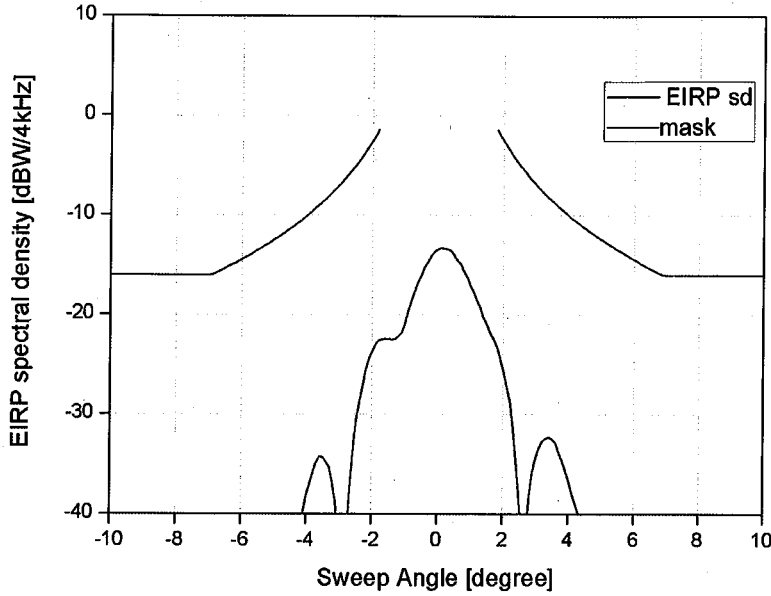
13

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
0.000	-13.443	
0.100	-13.353	
0.200	-13.373	
0.300	-13.443	
0.400	-13.643	
0.500	-14.033	
0.600	-14.543	
0.700	-14.983	
0.800	-15.703	
0.900	-16.303	
1.000	-17.103	
1.100	-17.793	
1.200	-18.663	
1.300	-19.353	
1.400	-20.243	
1.500	-20.903	
1.600	-21.803	
1.700	-22.453	
1.800	-23.183	-1.382
1.900	-24.203	-1.969
2.000	-25.623	-2.526
2.100	-27.063	-3.055
2.200	-28.603	-3.561
2.300	-30.933	-4.043
2.400	-34.583	-4.505
2.500	-38.673	-4.949
2.600	-43.263	-5.374
2.700	-42.453	-5.784
2.800	-38.723	-6.179
2.900	-35.863	-6.560
3.000	-34.373	-6.928
3.100	-33.343	-7.284
3.200	-32.763	-7.629
3.300	-32.413	-7.963
3.400	-32.323	-8.287
3.500	-32.523	-8.602
3.600	-32.883	-8.908
3.700	-33.723	-9.205
3.800	-34.533	-9.495
3.900	-35.573	-9.777
4.000	-36.683	-10.051
4.100	-37.753	-10.320
4.200	-38.823	-10.581
4.300	-39.913	-10.837
4.400	-41.073	-11.086
4.500	-42.313	-11.330
4.600	-44.383	-11.569
4.700	-47.093	-11.802
4.800	-50.043	-12.031
4.900	-53.643	-12.255

f=14.25GHz, -16.66dBW/4kHz EIRP sd (0.6dB radome loss)		
5.000	-52.363	-12.474
5.100	-49.793	-12.689
5.200	-46.663	-12.900
5.300	-44.883	-13.107
5.400	-43.623	-13.310
5.500	-43.243	-13.509
5.600	-43.223	-13.705
5.700	-43.373	-13.897
5.800	-44.763	-14.086
5.900	-46.713	-14.271
6.000	-49.763	-14.454
6.100	-51.623	-14.633
6.200	-49.683	-14.810
6.300	-47.463	-14.984
6.400	-45.453	-15.154
6.500	-44.733	-15.323
6.600	-44.593	-15.489
6.700	-44.343	-15.652
6.800	-43.953	-15.813
6.900	-44.343	-15.971
7.000	-44.753	-16.000
7.100	-44.683	-16.000
7.200	-44.913	-16.000
7.300	-44.373	-16.000
7.400	-44.283	-16.000
7.500	-43.653	-16.000
7.600	-42.973	-16.000
7.700	-42.003	-16.000
7.800	-41.313	-16.000
7.900	-41.243	-16.000
8.000	-41.453	-16.000
8.100	-41.753	-16.000
8.200	-42.193	-16.000
8.300	-43.103	-16.000
8.400	-43.923	-16.000
8.500	-44.923	-16.000
8.600	-46.193	-16.000
8.700	-48.243	-16.000
8.800	-48.953	-16.000
8.900	-51.643	-16.000
9.000	-53.863	-16.000
9.100	-57.583	-16.000
9.200	-57.963	-16.000
9.300	-54.753	-16.000
9.400	-52.193	-16.000
9.500	-49.313	-16.000
9.600	-48.373	-16.000
9.700	-48.023	-16.000
9.800	-47.873	-16.000
9.900	-48.593	-16.000
10.000	-49.143	-16.000

(C)  
v100

### 1.3. Azimuth Pattern for Cross-pol, Narrow angle (-10°~10°)



-16.66dBW/4kHz Input power spectral density @ f=14.25GHz & 0.6dB Radome loss

- FCC EIRP spectral density regulation

$5-25\log(\theta)$	dBW/4kHz	for	$1.8^\circ \leq \theta \leq 7.0^\circ$
-16	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$

The v100GX's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -16.66 dBW/ 4kHz



(A)  
V130

## 2. EIRP Spectral Density Data

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

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-10.0	-17.29	-7.00	-5.0	-5.93	-2.47
-9.9	-17.07	-6.89	-4.9	-6.26	-2.25
-9.8	-16.71	-6.78	-4.8	-6.55	-2.03
-9.7	-16.20	-6.67	-4.7	-6.79	-1.80
-9.6	-15.55	-6.56	-4.6	-6.94	-1.57
-9.5	-14.77	-6.44	-4.5	-6.97	-1.33
-9.4	-13.93	-6.33	-4.4	-6.87	-1.09
-9.3	-13.09	-6.21	-4.3	-6.69	-0.84
-9.2	-12.32	-6.00	-4.2	-6.46	-0.58
-9.1	-11.67	-6.00	-4.1	-6.26	-0.32
-9.0	-11.19	-6.00	-4.0	-6.16	-0.05
-8.9	-10.89	-6.00	-3.9	-6.19	0.22
-8.8	-10.79	-6.00	-3.8	-6.41	0.51
-8.7	-10.87	-6.00	-3.7	-6.83	0.79
-8.6	-11.12	-6.00	-3.6	-7.44	1.09
-8.5	-11.53	-6.00	-3.5	-8.20	1.40
-8.4	-12.04	-6.00	-3.4	-9.03	1.71
-8.3	-12.59	-6.00	-3.3	-9.85	2.04
-8.2	-13.12	-6.00	-3.2	-10.62	2.37
-8.1	-13.56	-6.00	-3.1	-11.40	2.72
-8.0	-13.91	-6.00	-3.0	-12.31	3.07
-7.9	-14.21	-6.00	-2.9	-13.25	3.44
-7.8	-14.53	-6.00	-2.8	-10.04	3.82
-7.7	-14.93	-6.00	-2.7	-6.75	4.22
-7.6	-15.47	-6.00	-2.6	-3.73	4.63
-7.5	-16.18	-6.00	-2.5	-0.84	5.05
-7.4	-17.04	-6.00	-2.4	1.53	5.49
-7.3	-17.96	-6.00	-2.3	3.34	5.96
-7.2	-18.80	-6.00	-2.2	4.61	6.44
-7.1	-21.32	-6.00	-2.1	5.31	6.94
-7.0	-21.23	-6.00	-2.0	5.38	7.47
-6.9	-20.43	-5.97	-1.9	4.64	8.03
-6.8	-19.03	-5.81	-1.8	2.77	8.62
-6.7	-17.25	-5.65	-1.7	-0.37	9.24
-6.6	-15.34	-5.49	-1.6	0.31	9.90
-6.5	-13.46	-5.32	-1.5	6.10	10.60
-6.4	-11.72	-5.15	-1.4	10.87	
-6.3	-10.16	-4.98	-1.3	14.51	
-6.2	-8.81	-4.81	-1.2	17.41	
-6.1	-7.67	-4.63	-1.1	19.77	
-6.0	-6.74	-4.45	-1.0	21.75	
-5.9	-6.01	-4.27	-0.9	23.40	
-5.8	-5.46	-4.09	-0.8	24.80	
-5.7	-5.10	-3.90	-0.7	25.97	
-5.6	-4.89	-3.70	-0.6	26.93	
-5.5	-4.83	-3.51	-0.5	27.70	
-5.4	-4.90	-3.31	-0.4	28.29	
-5.3	-5.06	-3.11	-0.3	28.72	
-5.2	-5.31	-2.90	-0.2	28.99	
-5.1	-5.61	-2.69	-0.1	29.10	

(A)  
V130

Intellian®

14

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0.0	29.06		5.0	-6.41	-2.47
0.1	28.85		5.1	-6.67	-2.69
0.2	28.48		5.2	-6.91	-2.90
0.3	27.94		5.3	-7.11	-3.11
0.4	27.22		5.4	-7.25	-3.31
0.5	26.31		5.5	-7.35	-3.51
0.6	25.18		5.6	-7.47	-3.70
0.7	23.80		5.7	-7.68	-3.90
0.8	22.13		5.8	-8.02	-4.09
0.9	20.10		5.9	-8.54	-4.27
1.0	17.60		6.0	-9.26	-4.45
1.1	14.41		6.1	-10.20	-4.63
1.2	10.11		6.2	-11.35	-4.81
1.3	3.96		6.3	-12.66	-4.98
1.4	-2.32		6.4	-14.05	-5.15
1.5	2.31	10.60	6.5	-15.39	-5.32
1.6	5.39	9.90	6.6	-16.44	-5.49
1.7	7.01	9.24	6.7	-17.03	-5.65
1.8	7.73	8.62	6.8	-17.07	-5.81
1.9	7.84	8.03	6.9	-16.68	-5.97
2.0	7.47	7.47	7.0	-15.99	-6.00
2.1	6.70	6.94	7.1	-15.14	-6.00
2.2	5.57	6.44	7.2	-14.25	-6.00
2.3	4.09	5.96	7.3	-13.39	-6.00
2.4	2.30	5.49	7.4	-12.61	-6.00
2.5	0.21	5.05	7.5	-11.94	-6.00
2.6	-2.13	4.63	7.6	-11.37	-6.00
2.7	-4.60	4.22	7.7	-10.86	-6.00
2.8	-6.97	3.82	7.8	-10.41	-6.00
2.9	-8.83	3.44	7.9	-9.96	-6.00
3.0	-9.64	3.07	8.0	-9.50	-6.00
3.1	-8.24	2.72	8.1	-9.03	-6.00
3.2	-7.05	2.37	8.2	-8.56	-6.00
3.3	-5.64	2.04	8.3	-8.14	-6.00
3.4	-4.34	1.71	8.4	-7.79	-6.00
3.5	-3.31	1.40	8.5	-7.54	-6.00
3.6	-2.58	1.09	8.6	-7.44	-6.00
3.7	-2.15	0.79	8.7	-7.49	-6.00
3.8	-2.00	0.51	8.8	-7.71	-6.00
3.9	-2.13	0.22	8.9	-8.11	-6.00
4.0	-2.49	-0.05	9.0	-8.69	-6.00
4.1	-3.03	-0.32	9.1	-9.46	-6.00
4.2	-3.69	-0.58	9.2	-10.41	-6.00
4.3	-4.36	-0.84	9.3	-11.53	-6.21
4.4	-4.94	-1.09	9.4	-12.79	-6.33
4.5	-5.38	-1.33	9.5	-14.15	-6.44
4.6	-5.65	-1.57	9.6	-15.55	-6.56
4.7	-5.83	-1.80	9.7	-16.88	-6.67
4.8	-5.99	-2.03	9.8	-18.02	-6.78
4.9	-6.17	-2.25	9.9	-18.82	-6.89
			10.0	-19.19	-7.00

(A)  
V130

14

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

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-180.0	-28.91	-14.00	-135.0	-28.78	-14.00
-179.0	-19.71	-14.00	-134.0	-28.45	-14.00
-178.0	-24.58	-14.00	-133.0	-27.24	-14.00
-177.0	-20.27	-14.00	-132.0	-26.97	-14.00
-176.0	-25.22	-14.00	-131.0	-26.27	-14.00
-175.0	-26.44	-14.00	-130.0	-26.74	-14.00
-174.0	-26.68	-14.00	-129.0	-26.61	-14.00
-173.0	-29.11	-14.00	-128.0	-29.61	-14.00
-172.0	-29.18	-14.00	-127.0	-27.24	-14.00
-171.0	-28.05	-14.00	-126.0	-29.22	-14.00
-170.0	-28.39	-14.00	-125.0	-24.70	-14.00
-169.0	-24.58	-14.00	-124.0	-28.22	-14.00
-168.0	-27.52	-14.00	-123.0	-27.89	-14.00
-167.0	-27.70	-14.00	-122.0	-27.65	-14.00
-166.0	-28.71	-14.00	-121.0	-29.19	-14.00
-165.0	-24.85	-14.00	-120.0	-26.01	-14.00
-164.0	-27.83	-14.00	-119.0	-27.65	-14.00
-163.0	-26.88	-14.00	-118.0	-24.99	-14.00
-162.0	-27.91	-14.00	-117.0	-27.72	-14.00
-161.0	-28.44	-14.00	-116.0	-27.99	-14.00
-160.0	-28.49	-14.00	-115.0	-27.59	-14.00
-159.0	-29.70	-14.00	-114.0	-23.88	-14.00
-158.0	-28.68	-14.00	-113.0	-27.92	-14.00
-157.0	-27.31	-14.00	-112.0	-30.23	-14.00
-156.0	-23.74	-14.00	-111.0	-25.71	-14.00
-155.0	-27.77	-14.00	-110.0	-28.03	-14.00
-154.0	-26.02	-14.00	-109.0	-24.55	-14.00
-153.0	-27.53	-14.00	-108.0	-28.13	-14.00
-152.0	-28.82	-14.00	-107.0	-28.57	-14.00
-151.0	-24.92	-14.00	-106.0	-22.51	-14.00
-150.0	-27.37	-14.00	-105.0	-26.56	-14.00
-149.0	-28.22	-14.00	-104.0	-24.24	-14.00
-148.0	-30.68	-14.00	-103.0	-24.66	-14.00
-147.0	-29.88	-14.00	-102.0	-24.57	-14.00
-146.0	-27.10	-14.00	-101.0	-28.82	-14.00
-145.0	-30.42	-14.00	-100.0	-29.26	-14.00
-144.0	-28.66	-14.00	-99.0	-21.62	-14.00
-143.0	-28.70	-14.00	-98.0	-26.97	-14.00
-142.0	-26.22	-14.00	-97.0	-26.11	-14.00
-141.0	-30.08	-14.00	-96.0	-20.28	-14.00
-140.0	-28.12	-14.00	-95.0	-20.40	-14.00
-139.0	-29.31	-14.00	-94.0	-26.66	-14.00
-138.0	-28.38	-14.00	-93.0	-18.48	-14.00
-137.0	-29.80	-14.00	-92.0	-17.74	-14.00
-136.0	-27.12	-14.00	-91.0	-19.56	-14.00

(A)  
V130

14

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-90.0	-19.11	-14.00	-45.0	-14.32	-23.33
-89.0	-13.87	-14.00	-44.0	-16.96	-23.09
-88.0	-15.85	-14.00	-43.0	-16.04	-22.84
-87.0	-12.96	-14.00	-42.0	-20.41	-22.58
-86.0	-12.82	-14.00	-41.0	-17.92	-22.32
-85.0	-11.20	-24.00	-40.0	-20.38	-22.05
-84.0	-10.62	-24.00	-39.0	-19.24	-21.78
-83.0	-8.33	-24.00	-38.0	-24.92	-21.49
-82.0	-8.28	-24.00	-37.0	-25.78	-21.21
-81.0	-7.84	-24.00	-36.0	-15.69	-20.91
-80.0	-7.58	-24.00	-35.0	-17.12	-20.60
-79.0	-7.86	-24.00	-34.0	-17.58	-20.29
-78.0	-8.04	-24.00	-33.0	-29.57	-19.96
-77.0	-9.33	-24.00	-32.0	-15.16	-19.63
-76.0	-9.26	-24.00	-31.0	-22.99	-19.28
-75.0	-10.18	-24.00	-30.0	-13.36	-18.93
-74.0	-8.27	-24.00	-29.0	-24.05	-18.56
-73.0	-8.00	-24.00	-28.0	-15.99	-18.18
-72.0	-7.31	-24.00	-27.0	-16.11	-17.78
-71.0	-7.33	-24.00	-26.0	-29.02	-17.37
-70.0	-8.02	-24.00	-25.0	-26.23	-16.95
-69.0	-7.58	-24.00	-24.0	-13.39	-16.51
-68.0	-7.01	-24.00	-23.0	-21.68	-16.04
-67.0	-6.85	-24.00	-22.0	-13.82	-15.56
-66.0	-7.72	-24.00	-21.0	-14.26	-15.06
-65.0	-6.95	-24.00	-20.0	-14.39	-14.53
-64.0	-7.18	-24.00	-19.0	-19.26	-13.97
-63.0	-8.81	-24.00	-18.0	-7.92	-13.38
-62.0	-9.74	-24.00	-17.0	-21.20	-12.76
-61.0	-9.44	-24.00	-16.0	-6.15	-12.10
-60.0	-9.09	-24.00	-15.0	-25.19	-11.40
-59.0	-9.85	-24.00	-14.0	-11.63	-10.65
-58.0	-12.11	-24.00	-13.0	-7.81	-9.85
-57.0	-11.16	-24.00	-12.0	-17.21	-8.98
-56.0	-13.28	-24.00	-11.0	-2.94	-8.03
-55.0	-13.52	-24.00	-10.0	-2.72	-7.00
-54.0	-12.61	-24.00	-9.0	3.39	-6.00
-53.0	-16.31	-24.00	-8.0	0.66	-6.00
-52.0	-16.76	-24.00	-7.0	-6.65	-6.00
-51.0	-11.73	-24.00	-6.0	7.84	-4.45
-50.0	-16.63	-24.00	-5.0	8.65	-2.47
-49.0	-18.34	-24.00	-4.0	8.42	-0.05
-48.0	-14.08	-24.00	-3.0	2.27	3.07
-47.0	-15.40	-23.80	-2.0	19.96	7.47
-46.0	-15.63	-23.57	-1.0	36.33	

(A)  
V130

14

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0.0	43.63		45.0	-20.10	-23.33
1.0	32.17		46.0	-20.78	-23.57
2.0	22.05	7.47	47.0	-14.75	-23.80
3.0	4.94	3.07	48.0	-17.31	-24.00
4.0	12.09	-0.05	49.0	-19.44	-24.00
5.0	8.17	-2.47	50.0	-19.47	-24.00
6.0	5.32	-4.45	51.0	-19.13	-24.00
7.0	-1.41	-6.00	52.0	-12.83	-24.00
8.0	5.08	-6.00	53.0	-16.36	-24.00
9.0	5.89	-6.00	54.0	-16.71	-24.00
10.0	-4.61	-7.00	55.0	-12.56	-24.00
11.0	-2.80	-8.03	56.0	-12.32	-24.00
12.0	-12.87	-8.98	57.0	-11.67	-24.00
13.0	-6.18	-9.85	58.0	-10.72	-24.00
14.0	-11.06	-10.65	59.0	-9.89	-24.00
15.0	-15.87	-11.40	60.0	-9.43	-24.00
16.0	-13.28	-12.10	61.0	-8.05	-24.00
17.0	-13.86	-12.76	62.0	-8.80	-24.00
18.0	-10.56	-13.38	63.0	-8.65	-24.00
19.0	-13.38	-13.97	64.0	-9.35	-24.00
20.0	-32.15	-14.53	65.0	-8.68	-24.00
21.0	-12.88	-15.06	66.0	-8.68	-24.00
22.0	-19.37	-15.56	67.0	-9.27	-24.00
23.0	-18.37	-16.04	68.0	-9.11	-24.00
24.0	-13.55	-16.51	69.0	-9.90	-24.00
25.0	-19.86	-16.95	70.0	-11.12	-24.00
26.0	-14.11	-17.37	71.0	-12.63	-24.00
27.0	-24.12	-17.78	72.0	-14.13	-24.00
28.0	-21.99	-18.18	73.0	-13.29	-24.00
29.0	-16.99	-18.56	74.0	-13.91	-24.00
30.0	-12.37	-18.93	75.0	-15.56	-24.00
31.0	-21.74	-19.28	76.0	-13.13	-24.00
32.0	-17.45	-19.63	77.0	-13.24	-24.00
33.0	-17.41	-19.96	78.0	-13.39	-24.00
34.0	-15.85	-20.29	79.0	-12.30	-24.00
35.0	-30.56	-20.60	80.0	-12.01	-24.00
36.0	-17.98	-20.91	81.0	-12.54	-24.00
37.0	-10.65	-21.21	82.0	-10.68	-24.00
38.0	-18.38	-21.49	83.0	-12.66	-24.00
39.0	-9.72	-21.78	84.0	-13.67	-24.00
40.0	-12.56	-22.05	85.0	-15.29	-24.00
41.0	-22.30	-22.32	86.0	-17.03	-14.00
42.0	-18.10	-22.58	87.0	-19.84	-14.00
43.0	-16.08	-22.84	88.0	-18.31	-14.00
44.0	-22.42	-23.09	89.0	-19.50	-14.00

(A)  
V130

Intellian®

14

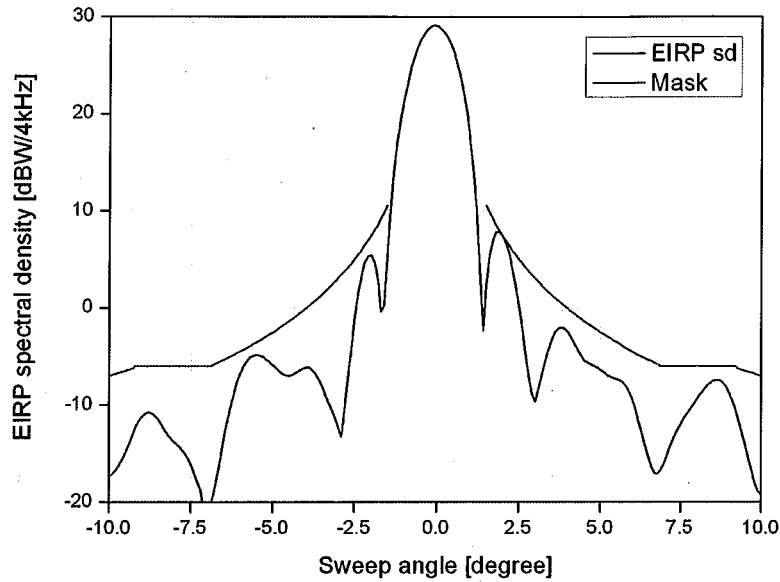
Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
90.0	-20.35	-14.00	135.0	-25.88	-14.00
91.0	-21.12	-14.00	136.0	-28.72	-14.00
92.0	-22.15	-14.00	137.0	-30.96	-14.00
93.0	-23.58	-14.00	138.0	-30.75	-14.00
94.0	-22.13	-14.00	139.0	-29.23	-14.00
95.0	-30.08	-14.00	140.0	-30.09	-14.00
96.0	-28.84	-14.00	141.0	-27.79	-14.00
97.0	-28.70	-14.00	142.0	-26.15	-14.00
98.0	-28.93	-14.00	143.0	-29.18	-14.00
99.0	-28.03	-14.00	144.0	-25.18	-14.00
100.0	-29.34	-14.00	145.0	-27.60	-14.00
101.0	-26.65	-14.00	146.0	-28.05	-14.00
102.0	-22.99	-14.00	147.0	-28.21	-14.00
103.0	-28.71	-14.00	148.0	-28.47	-14.00
104.0	-28.59	-14.00	149.0	-28.28	-14.00
105.0	-28.05	-14.00	150.0	-25.96	-14.00
106.0	-27.41	-14.00	151.0	-28.72	-14.00
107.0	-29.18	-14.00	152.0	-28.33	-14.00
108.0	-28.18	-14.00	153.0	-29.92	-14.00
109.0	-25.46	-14.00	154.0	-29.46	-14.00
110.0	-27.33	-14.00	155.0	-29.23	-14.00
111.0	-28.68	-14.00	156.0	-28.89	-14.00
112.0	-29.61	-14.00	157.0	-28.41	-14.00
113.0	-28.48	-14.00	158.0	-28.97	-14.00
114.0	-29.17	-14.00	159.0	-27.83	-14.00
115.0	-27.48	-14.00	160.0	-23.47	-14.00
116.0	-30.62	-14.00	161.0	-28.40	-14.00
117.0	-29.30	-14.00	162.0	-28.93	-14.00
118.0	-27.15	-14.00	163.0	-26.86	-14.00
119.0	-29.82	-14.00	164.0	-28.51	-14.00
120.0	-28.85	-14.00	165.0	-26.08	-14.00
121.0	-29.91	-14.00	166.0	-28.27	-14.00
122.0	-27.71	-14.00	167.0	-27.63	-14.00
123.0	-27.41	-14.00	168.0	-27.97	-14.00
124.0	-27.92	-14.00	169.0	-26.61	-14.00
125.0	-28.17	-14.00	170.0	-29.62	-14.00
126.0	-28.78	-14.00	171.0	-27.84	-14.00
127.0	-27.03	-14.00	172.0	-24.41	-14.00
128.0	-29.49	-14.00	173.0	-30.39	-14.00
129.0	-27.89	-14.00	174.0	-24.25	-14.00
130.0	-29.65	-14.00	175.0	-28.24	-14.00
131.0	-30.71	-14.00	176.0	-21.92	-14.00
132.0	-27.21	-14.00	177.0	-19.42	-14.00
133.0	-26.82	-14.00	178.0	-28.66	-14.00
134.0	-28.96	-14.00	179.0	-20.10	-14.00
			180.0	-29.63	-14.00

(A)  
v130

14

# 1. EIRP Spectral Density of v130

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



14.25GHz EIRP spectral density @ -14.62dBW/4kHz Input power spectral density

### ▪ FCC EIRP spectral density regulation

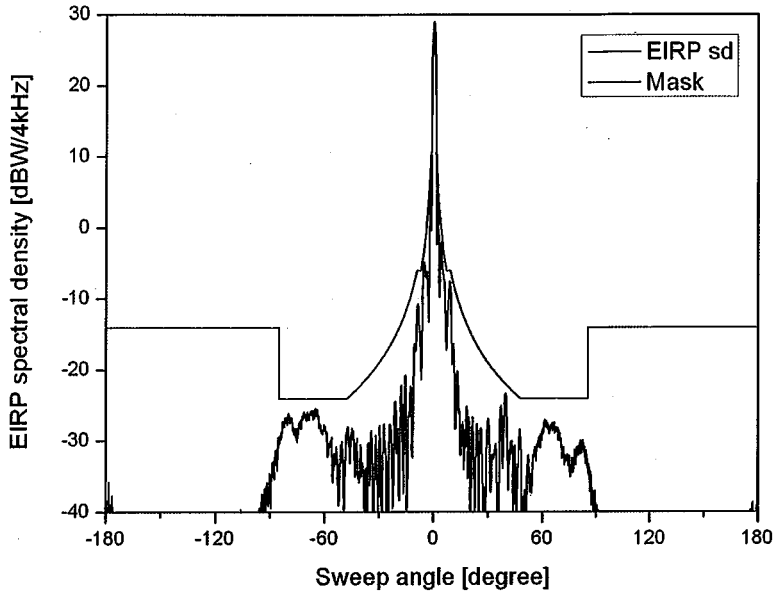
$15-25\log(\theta)$	dBW/4kHz	for	$1.5^\circ \leq \theta \leq 7.0^\circ$
-6	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$
$18-25\log(\theta)$	dBW/4kHz	for	$9.2^\circ < \theta \leq 48^\circ$
-24	dBW/4kHz	for	$48^\circ < \theta \leq 85^\circ$
-14	dBW/4kHz	for	$85^\circ < \theta \leq 180^\circ$

The v130's Radiation pattern meets the FCC EIRP spectral density mask when the input powers spectral density is @ -14.62 dBW/ 4kHz

(A)

14

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



14.25GHz EIRP spectral density @ -14.62dBW/4kHz Input power spectral density

#### ▪ FCC EIRP spectral density regulation

15-25log( $\theta$ )	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( $\theta$ )	dBW/4kHz	for	$9.2^\circ < \theta \leq 48^\circ$
-24	dBW/4kHz	for	$48^\circ < \theta \leq 85^\circ$
-14	dBW/4kHz	for	$85^\circ < \theta \leq 180^\circ$

The v130's Radiation pattern meets the FCC EIRP spectral density mask when the Input powers spectral density is @ -14.62 dBW/ 4kHz



(B)  
V130

15

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

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0.0	14.41		5.0	-22.95	0.53
0.1	14.38		5.1	-23.04	0.31
0.2	14.17		5.2	-22.92	0.10
0.3	13.75		5.3	-22.51	-0.11
0.4	13.12		5.4	-21.93	-0.31
0.5	12.27		5.5	-21.35	-0.51
0.6	11.17		5.6	-20.97	-0.70
0.7	9.80		5.7	-20.88	-0.90
0.8	8.10		5.8	-21.14	-1.09
0.9	6.01		5.9	-21.81	-1.27
1.0	3.44		6.0	-22.92	-1.45
1.1	0.30		6.1	-24.51	-1.63
1.2	-3.21		6.2	-26.51	-1.81
1.3	-6.64		6.3	-28.53	-1.98
1.4	-6.18		6.4	-29.62	-2.15
1.5	-4.66		6.5	-29.25	-2.32
1.6	-3.58		6.6	-28.29	-2.49
1.7	-3.15		6.7	-27.60	-2.65
1.8	-3.32		6.8	-27.46	-2.81
1.9	-4.06		6.9	-27.96	-2.97
2.0	-5.38		7.0	-29.13	-3.13
2.1	-7.37		7.1	-31.02	-3.28
2.2	-10.27		7.2	-33.38	-3.43
2.3	-14.62		7.3	-34.86	-3.58
2.4	-22.25		7.4	-31.82	-3.73
2.5	-28.85		7.5	-29.79	-3.88
2.6	-21.02		7.6	-28.18	-4.02
2.7	-17.66		7.7	-27.22	-4.16
2.8	-16.40		7.8	-26.82	-4.30
2.9	-16.37		7.9	-26.79	-4.44
3.0	-17.26	6.07	8.0	-26.89	-4.58
3.1	-18.85	5.72	8.1	-26.76	-4.71
3.2	-20.35	5.37	8.2	-26.13	-4.85
3.3	-20.15	5.04	8.3	-25.10	-4.98
3.4	-18.26	4.71	8.4	-23.96	-5.11
3.5	-16.24	4.40	8.5	-22.97	-5.24
3.6	-14.72	4.09	8.6	-22.26	-5.36
3.7	-13.76	3.79	8.7	-21.89	-5.49
3.8	-13.29	3.51	8.8	-21.88	-5.61
3.9	-13.28	3.22	8.9	-22.25	-5.73
4.0	-13.68	2.95	9.0	-23.03	-5.86
4.1	-14.47	2.68	9.1	-24.27	-5.98
4.2	-15.61	2.42	9.2	-26.04	-6.09
4.3	-17.06	2.16	9.3	-28.43	-6.21
4.4	-18.70	1.91	9.4	-31.49	-6.33
4.5	-20.30	1.67	9.5	-34.72	-6.44
4.6	-21.56	1.43	9.6	-36.09	-6.56
4.7	-22.29	1.20	9.7	-35.08	-6.67
4.8	-22.61	0.97	9.8	-33.98	-6.78
4.9	-22.79	0.75	9.9	-33.73	-6.89

(13)  
V130

15

**Intellian®**

Test Report

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
10.0	-34.50	-7.00	15.0	-36.76	-11.40
10.1	-36.28	-7.11	15.1	-37.99	-11.47
10.2	-38.40	-7.22	15.2	-40.00	-11.55
10.3	-37.94	-7.32	15.3	-42.33	-11.62
10.4	-34.82	-7.43	15.4	-42.67	-11.69
10.5	-31.94	-7.53	15.5	-40.23	-11.76
10.6	-29.92	-7.63	15.6	-37.57	-11.83
10.7	-28.64	-7.73	15.7	-35.60	-11.90
10.8	-28.02	-7.84	15.8	-34.32	-11.97
10.9	-27.98	-7.94	15.9	-33.64	-12.03
11.0	-28.54	-8.03	16.0	-33.48	-12.10
11.1	-29.80	-8.13	16.1	-33.80	-12.17
11.2	-31.95	-8.23	16.2	-34.57	-12.24
11.3	-35.55	-8.33	16.3	-35.77	-12.30
11.4	-42.55	-8.42	16.4	-37.21	-12.37
11.5	-52.01	-8.52	16.5	-38.48	-12.44
11.6	-39.39	-8.61	16.6	-38.94	-12.50
11.7	-34.95	-8.70	16.7	-38.49	-12.57
11.8	-32.70	-8.80	16.8	-37.71	-12.63
11.9	-31.63	-8.89	16.9	-37.18	-12.70
12.0	-31.38	-8.98	17.0	-37.14	-12.76
12.1	-31.86	-9.07	17.1	-37.76	-12.82
12.2	-33.08	-9.16	17.2	-39.22	-12.89
12.3	-35.18	-9.25	17.3	-41.94	-12.95
12.4	-38.53	-9.34	17.4	-46.96	-13.01
12.5	-44.00	-9.42	17.5	-52.91	-13.08
12.6	-50.28	-9.51	17.6	-45.63	-13.14
12.7	-45.07	-9.60	17.7	-40.76	-13.20
12.8	-41.36	-9.68	17.8	-37.92	-13.26
12.9	-39.84	-9.76	17.9	-36.20	-13.32
13.0	-39.79	-9.85	18.0	-35.27	-13.38
13.1	-40.98	-9.93	18.1	-34.96	-13.44
13.2	-43.24	-10.01	18.2	-35.20	-13.50
13.3	-44.69	-10.10	18.3	-35.98	-13.56
13.4	-42.18	-10.18	18.4	-37.32	-13.62
13.5	-38.75	-10.26	18.5	-39.23	-13.68
13.6	-36.21	-10.34	18.6	-41.47	-13.74
13.7	-34.55	-10.42	18.7	-43.11	-13.80
13.8	-33.59	-10.50	18.8	-42.82	-13.85
13.9	-33.23	-10.58	18.9	-41.36	-13.91
14.0	-33.42	-10.65	19.0	-40.05	-13.97
14.1	-34.13	-10.73	19.1	-39.31	-14.03
14.2	-35.31	-10.81	19.2	-39.19	-14.08
14.3	-36.80	-10.88	19.3	-39.72	-14.14
14.4	-38.13	-10.96	19.4	-40.95	-14.20
14.5	-38.56	-11.03	19.5	-43.02	-14.25
14.6	-37.94	-11.11	19.6	-46.20	-14.31
14.7	-37.01	-11.18	19.7	-50.70	-14.36
14.8	-36.37	-11.26	19.8	-52.88	-14.42
14.9	-36.25	-11.33	19.9	-49.42	-14.47

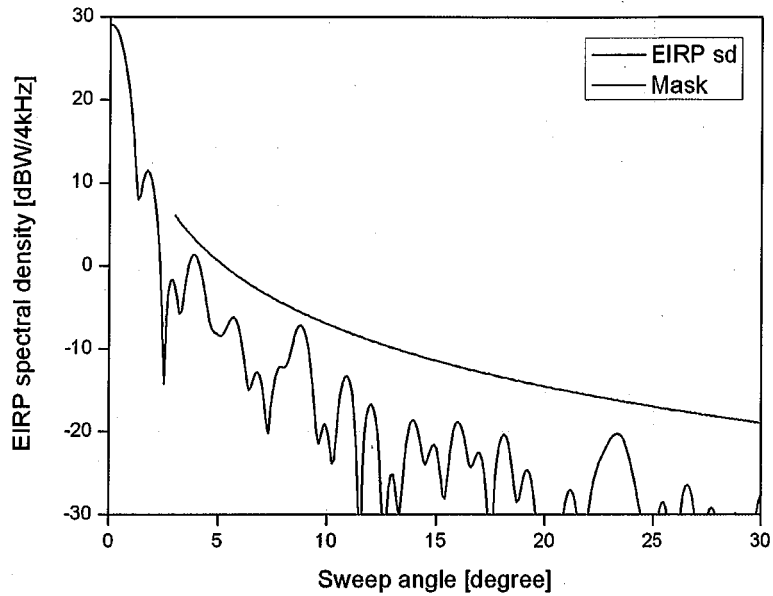
(B)  
V130

15

Intellian®

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
20.0	-46.61	-14.53	25.0	-51.29	-16.95
20.1	-45.15	-14.58	25.1	-47.77	-16.99
20.2	-44.71	-14.63	25.2	-45.43	-17.04
20.3	-45.10	-14.69	25.3	-43.98	-17.08
20.4	-46.20	-14.74	25.4	-43.22	-17.12
20.5	-47.59	-14.79	25.5	-43.13	-17.16
20.6	-48.14	-14.85	25.6	-43.71	-17.21
20.7	-46.96	-14.90	25.7	-45.06	-17.25
20.8	-45.02	-14.95	25.8	-47.40	-17.29
20.9	-43.34	-15.00	25.9	-50.86	-17.33
21.0	-42.20	-15.06	26.0	-52.78	-17.37
21.1	-41.65	-15.11	26.1	-49.46	-17.42
21.2	-41.65	-15.16	26.2	-45.93	-17.46
21.3	-42.23	-15.21	26.3	-43.51	-17.50
21.4	-43.49	-15.26	26.4	-42.00	-17.54
21.5	-45.56	-15.31	26.5	-41.20	-17.58
21.6	-48.61	-15.36	26.6	-41.00	-17.62
21.7	-51.82	-15.41	26.7	-41.39	-17.66
21.8	-50.73	-15.46	26.8	-42.41	-17.70
21.9	-47.08	-15.51	26.9	-44.15	-17.74
22.0	-44.19	-15.56	27.0	-46.81	-17.78
22.1	-42.15	-15.61	27.1	-50.45	-17.82
22.2	-40.68	-15.66	27.2	-52.61	-17.86
22.3	-39.60	-15.71	27.3	-49.98	-17.90
22.4	-38.78	-15.76	27.4	-47.00	-17.94
22.5	-38.12	-15.80	27.5	-45.05	-17.98
22.6	-37.54	-15.85	27.6	-44.01	-18.02
22.7	-37.00	-15.90	27.7	-43.73	-18.06
22.8	-36.47	-15.95	27.8	-44.13	-18.10
22.9	-35.97	-16.00	27.9	-45.25	-18.14
23.0	-35.53	-16.04	28.0	-47.28	-18.18
23.1	-35.18	-16.09	28.1	-50.47	-18.22
23.2	-34.94	-16.14	28.2	-54.71	-18.26
23.3	-34.86	-16.18	28.3	-54.80	-18.29
23.4	-34.94	-16.23	28.4	-50.70	-18.33
23.5	-35.20	-16.28	28.5	-47.69	-18.37
23.6	-35.65	-16.32	28.6	-45.83	-18.41
23.7	-36.32	-16.37	28.7	-44.80	-18.45
23.8	-37.18	-16.41	28.8	-44.47	-18.48
23.9	-38.22	-16.46	28.9	-44.76	-18.52
24.0	-39.41	-16.51	29.0	-45.72	-18.56
24.1	-40.71	-16.55	29.1	-47.52	-18.60
24.2	-42.03	-16.60	29.2	-50.68	-18.63
24.3	-43.33	-16.64	29.3	-56.82	-18.67
24.4	-44.63	-16.68	29.4	-67.25	-18.71
24.5	-46.10	-16.73	29.5	-54.14	-18.75
24.6	-48.04	-16.77	29.6	-48.91	-18.78
24.7	-50.80	-16.82	29.7	-45.92	-18.82
24.8	-54.47	-16.86	29.8	-44.00	-18.86
24.9	-55.31	-16.90	29.9	-42.76	-18.89
			30.0	-42.04	-18.93

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



14.25GHz EIRP spectral density @ -14.62dBW/4kHz Input power spectral density

▪ **FCC EIRP spectral density regulation**

$18-25\log(\theta)$	dBW/4kHz	for	$3.0^\circ \leq \theta \leq 48^\circ$
-24	dBW/4kHz	for	$48^\circ < \theta \leq 85^\circ$
-14	dBW/4kHz	for	$85^\circ < \theta \leq 180^\circ$

*The v130's Radiation pattern meets the FCC EIRP spectral density mask when the Input powers spectral density is @ -14.62 dBW/ 4kHz*

(C)  
V130

16

2.3. Azimuth Pattern for Cross-pol (-10°~10°)

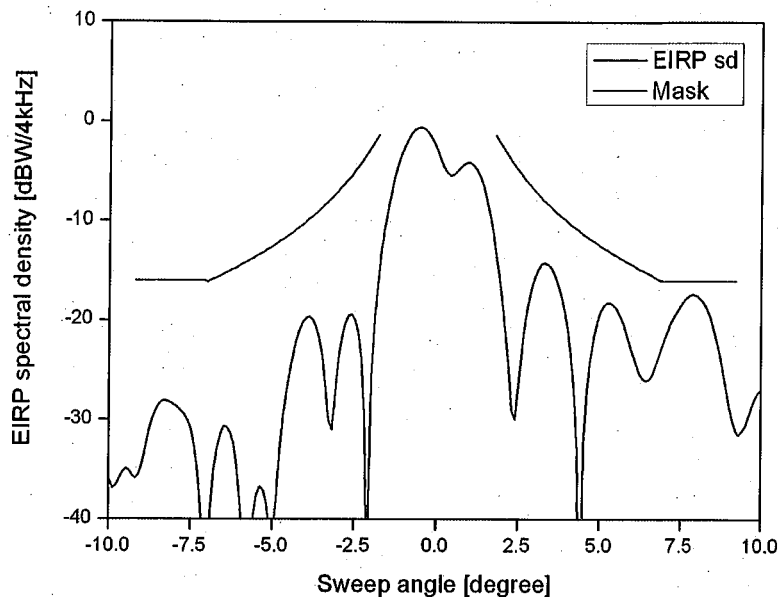
Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
-10.0	-35.97	-16.00	-5.0	-41.85	-12.47
-9.9	-36.86	-16.00	-4.9	-38.01	-12.25
-9.8	-36.63	-16.00	-4.8	-33.79	-12.03
-9.7	-35.99	-16.00	-4.7	-30.15	-11.80
-9.6	-35.29	-16.00	-4.6	-27.40	-11.57
-9.5	-34.91	-16.00	-4.5	-25.25	-11.33
-9.4	-35.08	-16.00	-4.4	-23.43	-11.09
-9.3	-35.57	-16.00	-4.3	-22.07	-10.84
-9.2	-35.84	-16.00	-4.2	-21.01	-10.58
-9.1	-35.57	-16.00	-4.1	-20.22	-10.32
-9.0	-34.45	-16.00	-4.0	-19.81	-10.05
-8.9	-32.90	-16.00	-3.9	-19.69	-9.78
-8.8	-31.34	-16.00	-3.8	-19.92	-9.49
-8.7	-30.06	-16.00	-3.7	-20.59	-9.21
-8.6	-29.17	-16.00	-3.6	-21.80	-8.91
-8.5	-28.54	-16.00	-3.5	-23.60	-8.60
-8.4	-28.19	-16.00	-3.4	-26.40	-8.29
-8.3	-28.11	-16.00	-3.3	-30.09	-7.96
-8.2	-28.18	-16.00	-3.2	-31.00	-7.63
-8.1	-28.35	-16.00	-3.1	-27.27	-7.28
-8.0	-28.59	-16.00	-3.0	-23.94	-6.93
-7.9	-28.83	-16.00	-2.9	-21.82	-6.56
-7.8	-29.12	-16.00	-2.8	-20.34	-6.18
-7.7	-29.53	-16.00	-2.7	-19.58	-5.78
-7.6	-30.09	-16.00	-2.6	-19.48	-5.37
-7.5	-31.03	-16.00	-2.5	-19.96	-4.95
-7.4	-32.56	-16.00	-2.4	-21.26	-4.51
-7.3	-34.77	-16.00	-2.3	-23.92	-4.04
-7.2	-38.66	-16.00	-2.2	-29.52	-3.56
-7.1	-47.59	-16.00	-2.1	-45.01	-3.06
-7.0	-49.44	-16.13	-2.0	-25.90	-2.53
-6.9	-39.37	-15.97	-1.9	-19.79	-1.97
-6.8	-35.05	-15.81	-1.8	-15.90	-1.38
-6.7	-32.82	-15.65	-1.7	-12.96	
-6.6	-31.42	-15.49	-1.6	-10.65	
-6.5	-30.73	-15.32	-1.5	-8.70	
-6.4	-30.75	-15.15	-1.4	-7.04	
-6.3	-31.36	-14.98	-1.3	-5.64	
-6.2	-32.48	-14.81	-1.2	-4.40	
-6.1	-34.59	-14.63	-1.1	-3.36	
-6.0	-38.03	-14.45	-1.0	-2.50	
-5.9	-43.53	-14.27	-0.9	-1.78	
-5.8	-59.21	-14.09	-0.8	-1.24	
-5.7	-44.80	-13.90	-0.7	-0.87	
-5.6	-40.11	-13.70	-0.6	-0.65	
-5.5	-37.63	-13.51	-0.5	-0.62	
-5.4	-36.70	-13.31	-0.4	-0.75	
-5.3	-37.01	-13.11	-0.3	-1.06	
-5.2	-38.16	-12.90	-0.2	-1.54	
-5.1	-40.53	-12.69	-0.1	-2.19	

Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)	Angle (Degree)	EIRP SD (dBW/4kHz)	Mask (dBW/4kHz)
0.0	-2.96		5.0	-19.23	-12.47
0.1	-3.80		5.1	-18.57	-12.69
0.2	-4.60		5.2	-18.26	-12.90
0.3	-5.18		5.3	-18.24	-13.11
0.4	-5.43		5.4	-18.43	-13.31
0.5	-5.33		5.5	-18.87	-13.51
0.6	-5.02		5.6	-19.56	-13.70
0.7	-4.63		5.7	-20.35	-13.90
0.8	-4.30		5.8	-21.32	-14.09
0.9	-4.14		5.9	-22.43	-14.27
1.0	-4.17		6.0	-23.48	-14.45
1.1	-4.39		6.1	-24.48	-14.63
1.2	-4.86		6.2	-25.36	-14.81
1.3	-5.57		6.3	-25.90	-14.98
1.4	-6.49		6.4	-26.06	-15.15
1.5	-7.72		6.5	-25.94	-15.32
1.6	-9.21		6.6	-25.41	-15.49
1.7	-10.94		6.7	-24.61	-15.65
1.8	-13.05	-1.38	6.8	-23.81	-15.81
1.9	-15.45	-1.97	6.9	-22.87	-15.97
2.0	-18.19	-2.53	7.0	-21.95	-16.00
2.1	-21.36	-3.06	7.1	-21.15	-16.00
2.2	-24.98	-3.56	7.2	-20.35	-16.00
2.3	-28.97	-4.04	7.3	-19.63	-16.00
2.4	-29.97	-4.51	7.4	-19.02	-16.00
2.5	-26.55	-4.95	7.5	-18.45	-16.00
2.6	-23.10	-5.37	7.6	-18.00	-16.00
2.7	-20.39	-5.78	7.7	-17.67	-16.00
2.8	-18.32	-6.18	7.8	-17.44	-16.00
2.9	-16.73	-6.56	7.9	-17.37	-16.00
3.0	-15.62	-6.93	8.0	-17.48	-16.00
3.1	-14.85	-7.28	8.1	-17.72	-16.00
3.2	-14.39	-7.63	8.2	-18.15	-16.00
3.3	-14.25	-7.96	8.3	-18.81	-16.00
3.4	-14.39	-8.29	8.4	-19.61	-16.00
3.5	-14.76	-8.60	8.5	-20.65	-16.00
3.6	-15.39	-8.91	8.6	-21.95	-16.00
3.7	-16.32	-9.21	8.7	-23.34	-16.00
3.8	-17.46	-9.49	8.8	-24.96	-16.00
3.9	-18.97	-9.78	8.9	-26.75	-16.00
4.0	-20.91	-10.05	9.0	-28.40	-16.00
4.1	-23.35	-10.32	9.1	-29.92	-16.00
4.2	-26.99	-10.58	9.2	-31.09	-16.00
4.3	-33.25	-10.84	9.3	-31.51	-16.00
4.4	-57.14	-11.09	9.4	-31.19	-16.00
4.5	-32.64	-11.33	9.5	-30.58	-16.00
4.6	-27.05	-11.57	9.6	-29.60	-16.00
4.7	-23.86	-11.80	9.7	-28.56	-16.00
4.8	-21.66	-12.03	9.8	-27.87	-16.00
4.9	-20.22	-12.25	9.9	-27.28	-16.00
			10.0	-26.91	-16.00

(C)  
V130

16

### 1.3. Azimuth Pattern for Cross-pol, Narrow angle (-10°~10°)



14.25GHz EIRP spectral density @ -14.62dBW/4kHz Input power spectral density

#### ▪ FCC EIRP spectral density regulation

$5-25\log(\theta)$	dBW/4kHz	for	$1.8^\circ \leq \theta \leq 7.0^\circ$
-16	dBW/4kHz	for	$7.0^\circ < \theta \leq 9.2^\circ$

The v130's Radiation pattern meets the FCC EIRP spectral density mask when the Input powers spectral density is @ -14.62 dBW/ 4kHz