

Exhibit 12

Freespace Interference Study based on Vertical Radiation Pattern ERI 100-1 1 Bay Antenna

Depression Angle from Antenna	Antenna Relative Field	ERP Watts	ERP dBk	Distance to Ground from Antenna (m)	Free Space Signal (dBu)	dB Loss for Reflection	Signal Strength at Ground (dBu)	Circular Distance From Tower (m)	Distance to Contour using Free Space (m)	Height of Contour above Ground (m)
90	0.135	1.823	-27.39	24.00	111.92	0	111.92	0.00	5.20	18.80
85	0.200	4.000	-23.98	24.09	115.30	0	115.30	2.10	7.71	16.32
80	0.280	7.840	-21.06	24.37	118.13	0	118.13	4.23	10.79	13.37
75	0.355	12.603	-19.00	24.85	120.02	0	120.02	6.43	13.68	10.78
70	0.425	18.063	-17.43	25.54	121.34	0	121.34	8.74	16.38	8.61
65	0.495	24.503	-16.11	26.48	122.35	0	122.35	11.19	19.08	6.71
60	0.565	31.923	-14.96	27.71	123.11	0	123.11	13.86	21.78	5.14
55	0.625	39.063	-14.08	29.30	123.50	0	123.50	16.80	24.09	4.26
50	0.690	47.610	-13.22	31.33	123.78	0	123.78	20.14	26.60	3.62
45	0.745	55.503	-12.56	33.94	123.75	0	123.75	24.00	28.72	3.69
40	0.795	63.203	-11.99	37.34	123.48	0	123.48	28.60	30.65	4.30
35	0.840	70.560	-11.51	41.84	122.97	0	122.97	34.28	32.38	5.43
30	0.880	77.440	-11.11	48.00	122.18	0	122.18	41.57	33.92	7.04
25	0.920	84.640	-10.72	56.79	121.11	0	121.11	51.47	35.46	9.01
20	0.945	89.303	-10.49	70.17	119.51	0	119.51	65.94	36.43	11.54
15	0.975	95.063	-10.22	92.73	117.36	0	117.36	89.57	37.58	14.27
10	0.980	96.040	-10.18	138.21	113.93	0	113.93	136.11	37.78	17.44
5	0.989	97.812	-10.10	275.37	108.03	0	108.03	274.32	38.12	20.68

Distance to Ground Level assumes flat ground or a site where the site level is above average terrain in all azimuths.

Maximum ERP	100	watts	Max dBu at Ground Level	123.78	Lowest Height of Contour (m)	3.62
Radiation Center AG	24	m			Lowest Height of Contour (ft)	11.89
Radiation Center AG	79	ft.				Must be +
Maximum ERP	-10.00	dBk				
Protected dBu	85.2	dBu				
Interfering dBu	125.2	dBu				
Free Space Distance	38.55	m				
	126.47	ft.				