

Exhibit 12

Gloucester MA

Freespace Interference Study based on Vertical Radiation Pattern SHI 6812-4H 4 Bay Half Wave Spaced 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	0.001	0.000	-75.69	43.00	58.56	0	58.56	0.00	0.10	42.90
85	0.021	0.012	-49.24	43.16	84.98	0	84.98	3.76	2.13	40.88
80	0.041	0.045	-43.43	43.66	90.69	0	90.69	7.58	4.16	38.90
75	0.065	0.114	-39.43	44.52	94.52	0	94.52	11.52	6.59	36.63
70	0.090	0.219	-36.60	45.76	97.11	0	97.11	15.65	9.13	34.42
65	0.116	0.363	-34.40	47.45	99.00	0	99.00	20.05	11.77	32.34
60	0.140	0.529	-32.76	49.65	100.24	0	100.24	24.83	14.20	30.70
55	0.155	0.649	-31.88	52.49	100.64	0	100.64	30.11	15.72	30.12
50	0.155	0.649	-31.88	56.13	100.06	0	100.06	36.08	15.72	30.96
45	0.130	0.456	-33.41	60.81	97.83	0	97.83	43.00	13.19	33.68
40	0.071	0.136	-38.66	66.90	91.75	0	91.75	51.25	7.20	38.37
35	0.026	0.018	-47.39	74.97	82.04	0	82.04	61.41	2.64	41.49
30	0.162	0.709	-31.50	86.00	96.73	0	96.73	74.48	16.43	34.78
25	0.331	2.958	-25.29	101.75	101.48	0	101.48	92.21	33.57	28.81
20	0.519	7.273	-21.38	125.72	103.55	0	103.55	118.14	52.64	24.99
15	0.703	13.344	-18.75	166.14	103.76	0	103.76	160.48	71.31	24.54
10	0.858	19.876	-17.02	247.63	102.03	0	102.03	243.87	87.03	27.89
5	0.963	25.039	-16.01	493.37	97.04	0	97.04	491.49	97.68	34.49

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

Maximum ERP	27 watts	Max dBu at Ground Level	103.76	Lowest Height of Contour (m)	24.54
Radiation Center AG	43 m			Lowest Height of Contour (f)	80.52
Radiation Center AG	141 ft.				
Maximum ERP	-15.69 dBk				
Protected dBu	71.11 dBu				
Interfering dBu	111.1 dBu				
Free Space Distance	101.43 m				
	332.78 ft.				