

KRBK Distributed Transmission System  
Channel 22 – Osage Beach, MO  
Site #5 of Five Total Sites  
Antenna Specifications  
June, 2017

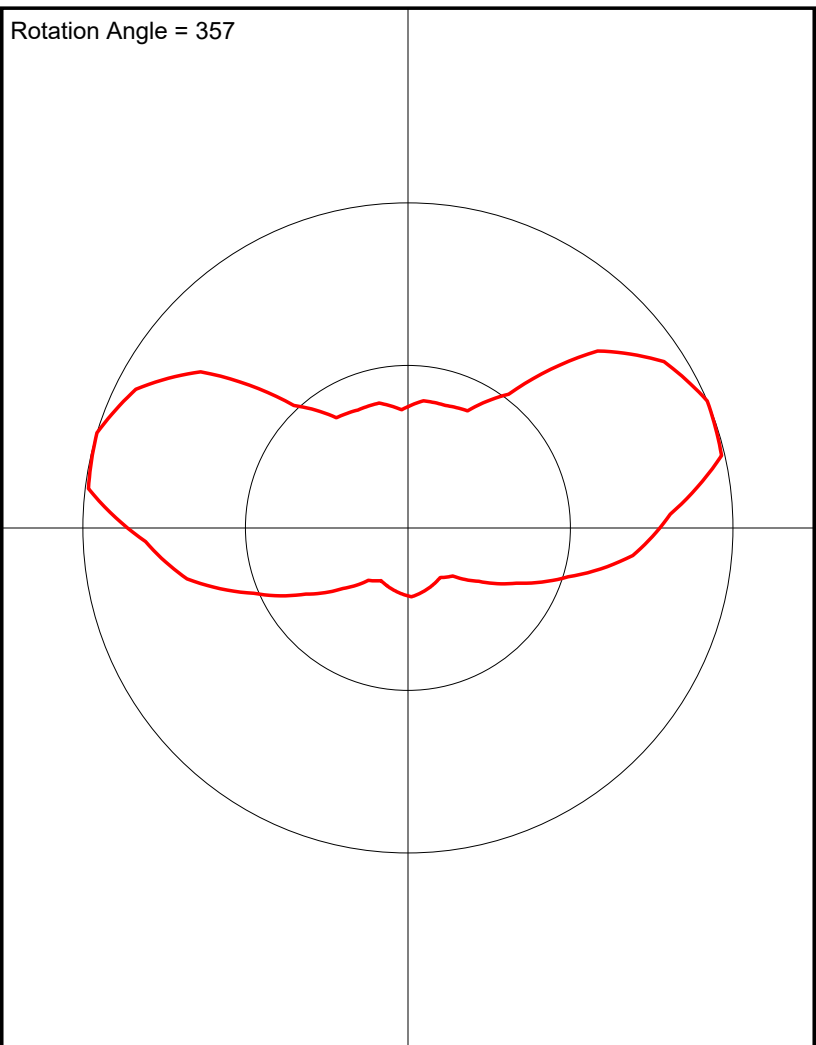
## DIRECTIONAL ANTENNA

### AZIMUTH PATTERN and ELEVATION PATTERN In Relative Field

KRBK DTS 5 Antenna Pattern  
Post-Rotation Antenna Pattern....

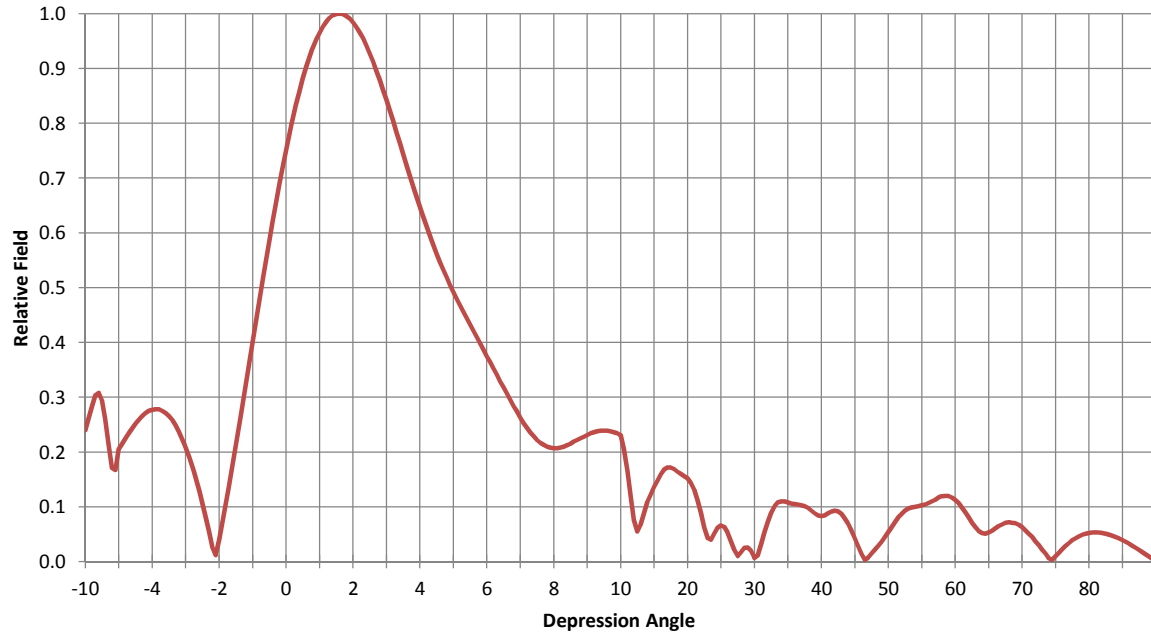
Azimuth (deg)	Relative Field
0.0	0.373
5.0	0.388
10.0	0.394
15.0	0.394
20.0	0.397
25.0	0.402
30.0	0.4373
35.0	0.4928
40.0	0.5999
45.0	0.7414
50.0	0.8403
55.0	0.9108
60.0	0.9573
65.0	0.9878
70.0	0.997
75.0	0.992
80.0	0.9354
85.0	0.8444
90.0	0.7747
95.0	0.7192
100.0	0.6424
105.0	0.5514
110.0	0.4727
115.0	0.4022
120.0	0.3437
125.0	0.2932
130.0	0.2517
135.0	0.2162
140.0	0.196
145.0	0.186
150.0	0.185
155.0	0.19
160.0	0.195
165.0	0.2
170.0	0.205
175.0	0.21
180.0	0.209
185.0	0.204
190.0	0.199
195.0	0.194
200.0	0.189
205.0	0.184
210.0	0.188
215.0	0.198
220.0	0.2233
225.0	0.2588
230.0	0.3033
235.0	0.3538
240.0	0.4163
245.0	0.4868
250.0	0.5696
255.0	0.6606
260.0	0.7303
265.0	0.7858
270.0	0.8626
275.0	0.9536
280.0	0.993
285.0	0.998
290.0	0.9817
295.0	0.9512
300.0	0.8967
305.0	0.8262
310.0	0.7131
315.0	0.5716

Rotation Angle = 357



320.0	0.4817
325.0	0.4262
330.0	0.401
335.0	0.396
340.0	0.394
345.0	0.394
350.0	0.385
355.0	0.37

## KRBK Ch 22 DTS Site 2 & Site 5 Elevation Relative Field Values



Depression Angle	Relative Field	ERP Site 2 (kW)	ERP Site 5 (kW)
-10.0	0.240	1.43	1.46
-5.0	0.205	1.05	1.07
0.0	0.751	14.04	14.33
0.5	0.881	19.33	19.71
1.0	0.965	23.19	23.65
1.5	0.999	24.85	25.35
2.0	0.984	24.11	24.59
2.5	0.928	21.44	21.87
3.0	0.843	17.70	18.05
3.5	0.744	13.78	14.06
4.0	0.647	10.42	10.63
4.5	0.562	7.86	8.02
5.0	0.492	6.03	6.15
5.5	0.432	4.65	4.74
6.0	0.375	3.50	3.57
6.5	0.318	2.52	2.57
7.0	0.263	1.72	1.76
7.5	0.222	1.23	1.25
8.0	0.207	1.07	1.09
8.5	0.215	1.15	1.17
9.0	0.231	1.33	1.36
9.5	0.239	1.42	1.45
10.0	0.231	1.33	1.36

Depression Angle	Relative Field	ERP Site 2 (kW)	ERP Site 5 (dBk)
10.5	0.205	1.05	1.07
11.0	0.166	0.69	0.70
11.5	0.120	0.36	0.37
12.0	0.076	0.14	0.15
12.5	0.055	0.08	0.08
13.0	0.067	0.11	0.11
13.5	0.089	0.20	0.20
14.0	0.109	0.30	0.30
14.5	0.123	0.38	0.38
15.0	0.136	0.46	0.47
15.5	0.148	0.55	0.56
16.0	0.159	0.63	0.64
16.5	0.168	0.70	0.72
17.0	0.172	0.74	0.75
17.5	0.172	0.74	0.75
18.0	0.169	0.71	0.73
18.5	0.164	0.67	0.68
19.0	0.160	0.64	0.65
19.5	0.156	0.61	0.62
20.0	0.152	0.58	0.59
20.5	0.144	0.52	0.53
21.0	0.131	0.43	0.44
21.5	0.112	0.31	0.32