

CITY OF LICENSE  
FACILITY ID  
PREPARED FOR  
VERSION  
JOB

Burley, ID  
173150  
IDAHO COMMUNITY ACTION NETWORK  
2.0  
112043

# **CONSOLIDATED**

## **ENGINEERING EXHIBIT**

FCC Form 340 - Section VII - FM Engineering

# **ENGINEERING STATEMENT**

## **Proposed Minor-Modification to Construction Permit BNPED-20071016AIN KBWE, Burley, ID Idaho Community Action Network**

### **OVERVIEW:**

The Idaho Community Action Network (ICAN) hereby seeks a minor-modification to the original CP for KBWE, Burley, ID. Horizontal polarization has been added to the proposed antenna, as TV Channel 6 is no longer an issue. The antenna would have a 55/45 H/V configuration, with a horizontal ERP of 4.9kw. Other parameters would remain unchanged from the original CP.

### **PROTECTED ZONES REPORT:**

Protected zones report for KBWE on channel 220A 07-29-2012

Lat. 42 33 32.0 Lng. 113 44 50.0, ERP= 4.9 kw, HAAT= 11.3M

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Facility is okay with respect to AM station towers.

Closest AM Facility is KFTA, RUPERT, ID, L, DAN at 22.9° at a distance of 5.2 km

Facility is okay with respect to FCC monitoring stations.

Closest FCC Monitoring Station is 868.1 km= Livermore, CA

Facility is okay toward West Virginia Quiet Zone. Distance to center = 2941.5 km

Facility is okay toward Table Mountain. Distance to Center = 761.2 km, Azimuth = 107.9

Degrees True

**BROWN BROADCAST SERVICES**  
INCORPORATED

Michael D. Brown

3740 S.W. Comus St.

Portland, Oregon 97219-7418

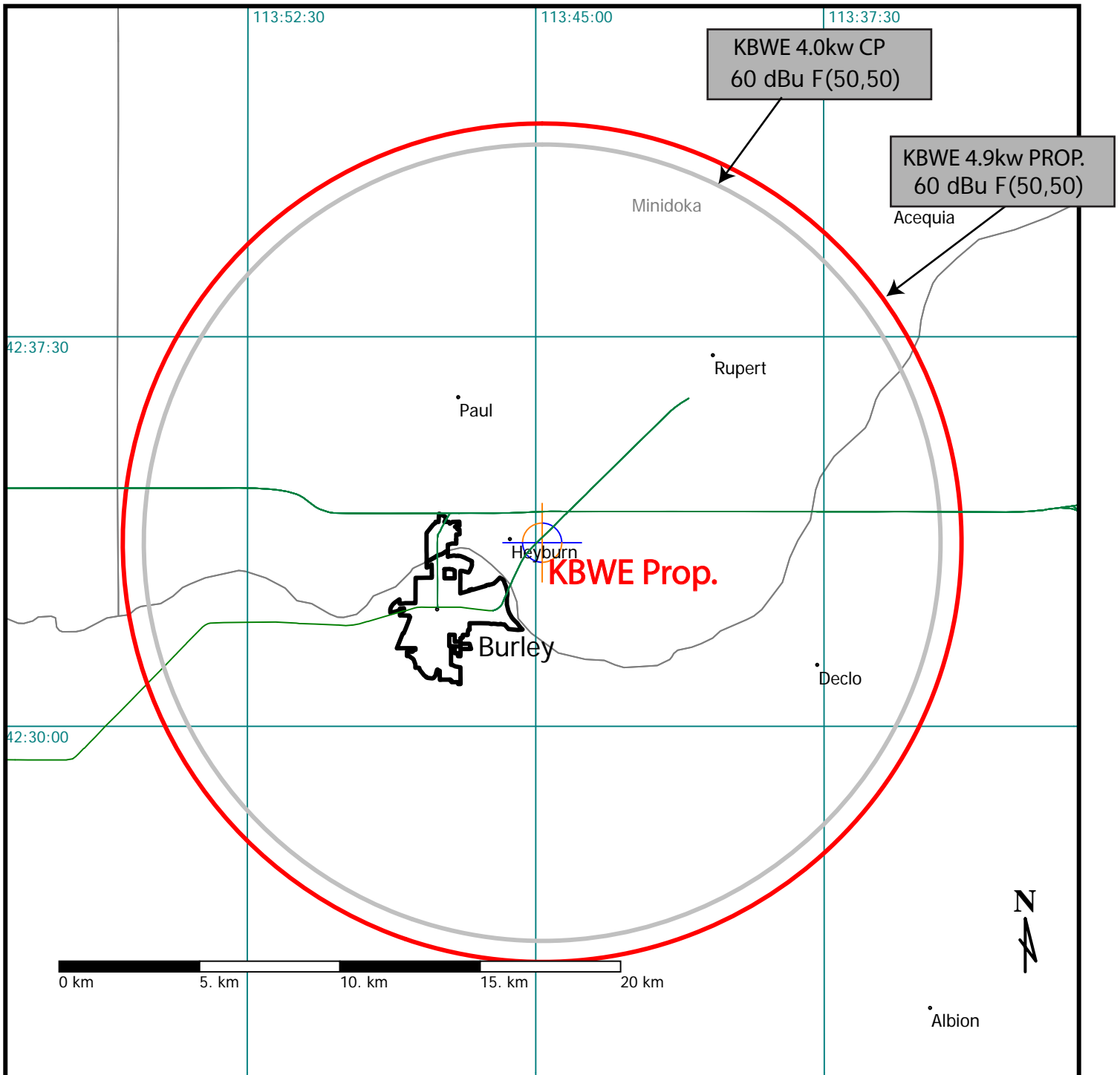
503-245-6065

## Exhibit 16 - Coverage Contours

Brown Broadcast Services, Inc.  
Job: KBWE power inc\_Jul2012.fmj  
Master Database: 2012\_Jul\_29.fmd  
Lat: N42:33:32 Lon: W113:44:50 NAD-27  
Scale: 1:200000  
Channel: 220 Class: A

rfInvestigator Version 3.5.25  
by rfSoftware, Inc.  
Date: 7/29/2012 12:01:17 PM  
Key:

Protected



# EXHIBIT 18

## CONTOUR OVERLAP PROTECTION TO RESERVED-BAND STATIONS, & SPACING REQUIREMENTS TO NON-RESERVED-BAND STATIONS

As shown by the attached contour maps, this proposed modified facility meets the contour overlap requirements of §73.509 with respect to all other reserved-band stations. It is also fully-spaced to KEGE, Pocatello ID, the only non-reserved band station within range.

All contour calculations were made using the methods and procedures described in 47 CFR §73.313(c). USGS 3 second terrain data was employed.

Domestic stations considered:

ID	City	St	Chan	CL	Stat	Prefix	ARN	FID	Dist	Min 207	Clear 207	NOTES
KBWE	BURLEY	ID	220	A	CP	BNPED	20071016AIN	173150	0	NA	NA	
KBSW	TWIN FALLS	ID	219	C3	LIC	BLED	19980820KB	28250	58.23	NA	NA	
KEGE	POCATELLO	ID	221	C2	LIC	BMLH	20120314ADS	87656	106.96	106	0.96	PROTECTION SHOWN BY DISTANCE SEPARATION
KWRV	SUN VALLEY	ID	220	A	LIC	BLED	20090121ADD	42917	133.58	NA	NA	
KBSJ	JACKPOT	NV	217	C1	LIC	BLED	20020403AAQ	92575	124.6	NA	NA	

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## Exhibit 18a - Co-Channel Contour Protection

Brown Broadcast Services, Inc.  
Job: KBWE power inc\_Jul2012.fmj  
Master Database: 2012\_Jul\_29.fmd  
Lat: N42:33:32 Lon: W113:44:50 NAD-27  
Scale: 1:1500000  
Channel: 220 Class: A  
Status: Licensed, Construction Permit, Application  
Channels: Co-Channel  
Range: 58 km, Clearance: -0.5km  
Comments: No Comments  
Description:

rfInvestigator Version 3.5.25  
by rfSoftware, Inc.  
Date: 7/29/2012 1:36:23 PM  
Key:

### PROPOSED

Protected: 60dBu F(50,50)

Interfering: 40dBu F(50,10)

### AFFECTED

Protected: 60dBu F(50,50)

Interfering: 40dBu F(50,10)

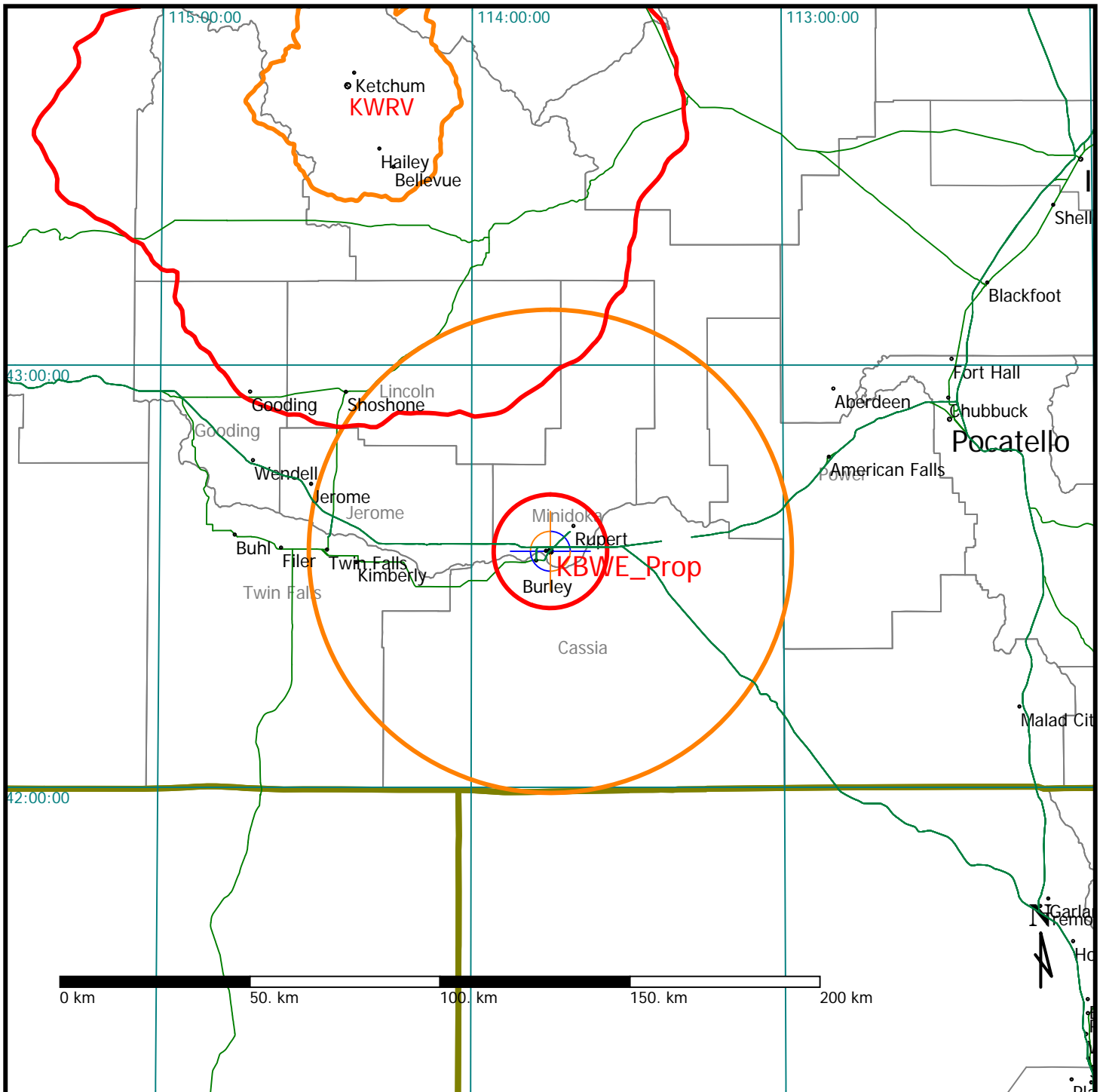
City Grade

Protected

Co-Channel

1st Adj

2nd/3rd Adj



## Exhibit 18b - First-Adjacent-Channel Contour Protection to reserved-band stations

Brown Broadcast Services, Inc.  
Job: KBWE power inc\_Jul2012.fmj  
Master Database: 2012\_Jul\_29.fmd  
Lat: N42:33:32 Lon: W113:44:50 NAD-27  
Scale: 1:750000  
Channel: 220 Class: A  
Status: Licensed, Construction Permit, Application  
Channels: 1st Adj  
Range: 58 km, Clearance: -0.5km  
Comments: No Comments  
Description:

rfInvestigator Version 3.5.25  
by rfSoftware, Inc.  
Date: 7/29/2012 1:35:48 PM  
Key:

### PROPOSED

Protected: 60dBu F(50,50)

Interfering: 54dBu F(50,10)

### AFFECTED

Protected: 60dBu F(50,50)

Interfering: 54dBu F(50,10)

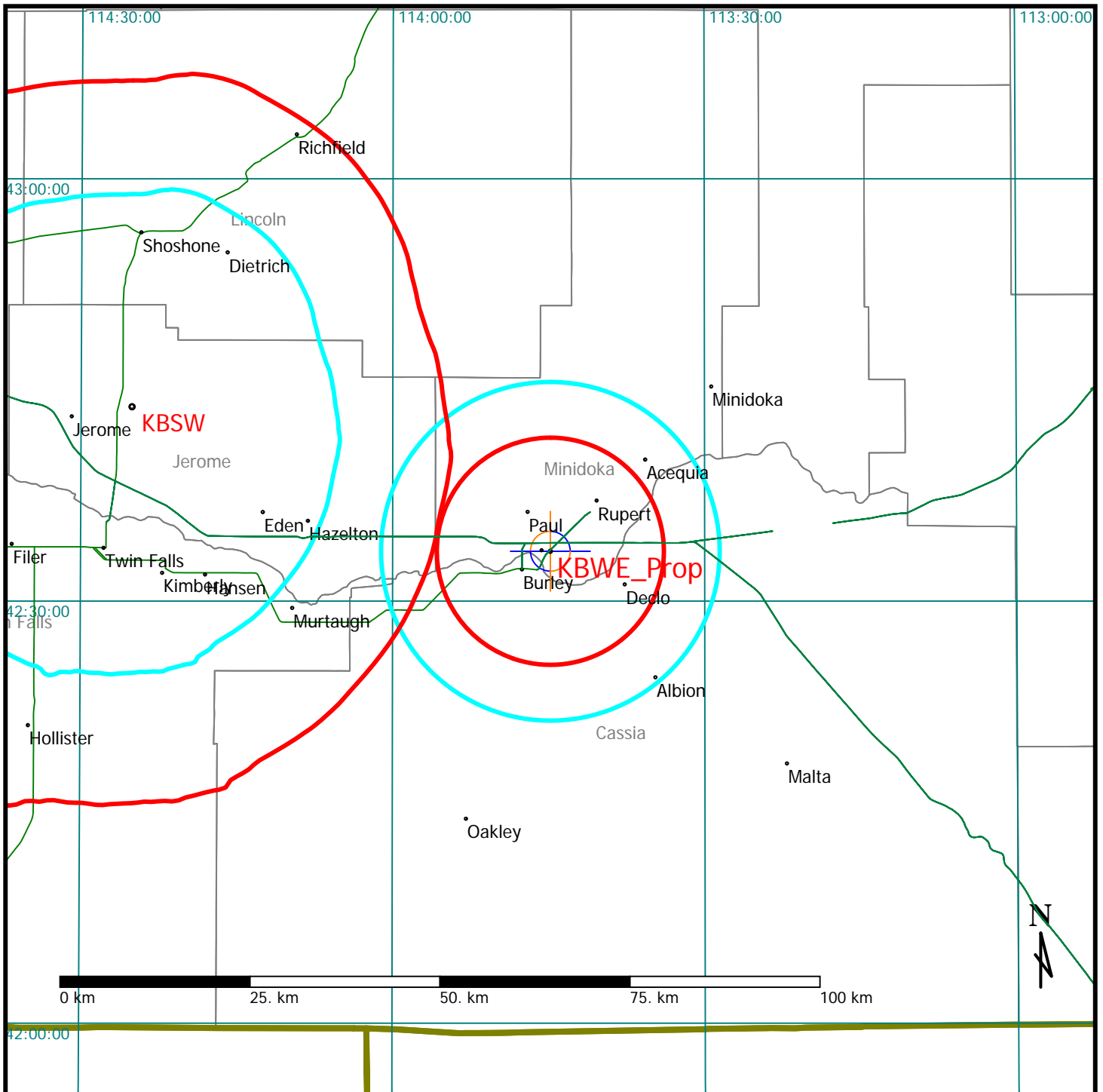
City Grade

Protected

Co-Channel

1st Adj

2nd/3rd Adj



# EXHIBIT 18c

## FMOver Analysis - Proposed vs. KBSW, Twin Falls, ID

07-30-2012      Terrain Data: USGS 03 SEC      FMOver Analysis

KBWE

KBSW    BLED19980820KB

Channel = 220A  
Max ERP = 4.9 kW  
RCAMSL = 1288 M  
N. Lat. 42 33 32.0  
W. Lng. 113 44 50.0  
Protected  
60 dBu

Channel = 219C3  
Max ERP = 4.5 kW  
RCAMSL = 1320 M  
N. Lat. 42 43 48.0  
W. Lng. 114 25 06.0  
Interfering  
54 dBu

Azimuth (degrees)	ERP (kW)	HAAT (m)	Dist (km)	Azimuth (degrees)	ERP (kW)	HAAT (m)	Dist (km)	Actual (dBu)	IX (km)
244.0	004.9000	0003.2	014.9	121.5	004.5000	0124.3	048.8	52.37	
245.0	004.9000	0004.8	014.9	121.3	004.5000	0124.2	048.6	52.45	
246.0	004.9000	0006.3	014.9	121.1	004.5000	0124.0	048.3	52.52	
247.0	004.9000	0007.8	014.9	120.9	004.5000	0123.8	048.1	52.59	
248.0	004.9000	0009.3	014.9	120.7	004.5000	0123.7	047.9	52.67	
249.0	004.9000	0010.8	014.9	120.6	004.5000	0123.5	047.7	52.74	
250.0	004.9000	0012.6	014.9	120.4	004.5000	0123.3	047.5	52.81	
251.0	004.9000	0014.5	014.9	120.2	004.5000	0123.1	047.3	52.88	
252.0	004.9000	0016.4	014.9	120.0	004.5000	0123.0	047.1	52.95	
253.0	004.9000	0018.4	014.9	119.7	004.5000	0122.8	046.9	53.01	
254.0	004.9000	0020.3	014.9	119.5	004.5000	0122.6	046.7	53.08	
255.0	004.9000	0021.8	014.9	119.3	004.5000	0122.4	046.5	53.14	
256.0	004.9000	0023.2	014.9	119.1	004.5000	0122.2	046.4	53.20	
257.0	004.9000	0024.6	014.9	118.8	004.5000	0121.9	046.2	53.26	
258.0	004.9000	0026.0	014.9	118.6	004.5000	0121.7	046.0	53.32	
259.0	004.9000	0027.5	014.9	118.3	004.5000	0121.5	045.8	53.37	
260.0	004.9000	0028.5	014.9	118.1	004.5000	0121.3	045.7	53.43	
261.0	004.9000	0029.1	014.9	117.8	004.5000	0121.1	045.5	53.48	
262.0	004.9000	0028.6	014.9	117.6	004.5000	0120.8	045.4	53.53	
263.0	004.9000	0027.2	014.9	117.3	004.5000	0120.5	045.2	53.57	
264.0	004.9000	0025.8	014.9	117.0	004.5000	0120.3	045.1	53.62	
265.0	004.9000	0024.4	014.9	116.7	004.5000	0120.1	044.9	53.67	
266.0	004.9000	0023.0	014.9	116.5	004.5000	0119.8	044.8	53.71	
267.0	004.9000	0021.2	014.9	116.2	004.5000	0119.5	044.7	53.74	
268.0	004.9000	0019.9	014.9	115.9	004.5000	0119.2	044.5	53.77	
269.0	004.9000	0018.9	014.9	115.6	004.5000	0118.9	044.4	53.81	
270.0	004.9000	0017.4	014.9	115.3	004.5000	0118.6	044.3	53.84	
271.0	004.9000	0014.9	014.9	115.0	004.5000	0118.3	044.2	53.86	
272.0	004.9000	0012.7	014.9	114.7	004.5000	0117.9	044.1	53.88	
273.0	004.9000	0011.2	014.9	114.3	004.5000	0117.5	044.0	53.90	
274.0	004.9000	0010.2	014.9	114.0	004.5000	0117.2	043.9	53.92	
275.0	004.9000	0009.5	014.9	113.7	004.5000	0116.9	043.8	53.94	
276.0	004.9000	0008.9	014.9	113.4	004.5000	0116.5	043.7	53.95	
277.0	004.9000	0008.7	014.9	113.1	004.5000	0116.2	043.6	53.96	
278.0	004.9000	0009.1	014.9	112.7	004.5000	0115.9	043.6	53.97	
279.0	004.9000	0010.2	014.9	112.4	004.5000	0115.5	043.5	53.97	
280.0	004.9000	0011.8	014.9	112.1	004.5000	0115.1	043.4	53.97	

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281.0	004.9000	0013.5	014.9	111.7	004.5000	0114.7	043.4	53.97
282.0	004.9000	0014.2	014.9	111.4	004.5000	0114.4	043.3	53.97
283.0	004.9000	0014.2	014.9	111.0	004.5000	0114.1	043.3	53.96
284.0	004.9000	0014.6	014.9	110.7	004.5000	0113.7	043.3	53.95
285.0	004.9000	0015.9	014.9	110.4	004.5000	0113.5	043.2	53.95
286.0	004.9000	0016.8	014.9	110.0	004.5000	0113.1	043.2	53.94
287.0	004.9000	0017.3	014.9	109.7	004.5000	0112.9	043.2	53.93
288.0	004.9000	0017.4	014.9	109.3	004.5000	0112.6	043.2	53.92
289.0	004.9000	0017.4	014.9	109.0	004.5000	0112.4	043.2	53.90
290.0	004.9000	0017.3	014.9	108.6	004.5000	0112.2	043.2	53.89
291.0	004.9000	0017.4	014.9	108.3	004.5000	0112.0	043.2	53.87
292.0	004.9000	0017.5	014.9	107.9	004.5000	0111.9	043.2	53.86
293.0	004.9000	0017.6	014.9	107.6	004.5000	0111.7	043.2	53.84
294.0	004.9000	0017.5	014.9	107.3	004.5000	0111.6	043.2	53.82
295.0	004.9000	0017.6	014.9	106.9	004.5000	0111.5	043.3	53.80
296.0	004.9000	0017.6	014.9	106.6	004.5000	0111.4	043.3	53.77
297.0	004.9000	0017.6	014.9	106.2	004.5000	0111.3	043.4	53.75
298.0	004.9000	0017.6	014.9	105.9	004.5000	0111.2	043.4	53.72
299.0	004.9000	0017.6	014.9	105.6	004.5000	0111.1	043.5	53.69
300.0	004.9000	0017.6	014.9	105.2	004.5000	0111.0	043.5	53.66
301.0	004.9000	0017.6	014.9	104.9	004.5000	0110.9	043.6	53.63
302.0	004.9000	0017.6	014.9	104.6	004.5000	0110.8	043.7	53.59
303.0	004.9000	0017.6	014.9	104.2	004.5000	0110.7	043.7	53.55
304.0	004.9000	0017.6	014.9	103.9	004.5000	0110.6	043.8	53.51
305.0	004.9000	0017.6	014.9	103.6	004.5000	0110.6	043.9	53.47
306.0	004.9000	0017.6	014.9	103.3	004.5000	0110.5	044.0	53.43
307.0	004.9000	0017.6	014.9	103.0	004.5000	0110.4	044.1	53.38
308.0	004.9000	0017.6	014.9	102.7	004.5000	0110.3	044.2	53.33
309.0	004.9000	0017.6	014.9	102.4	004.5000	0110.3	044.3	53.28
310.0	004.9000	0017.5	014.9	102.1	004.5000	0110.2	044.5	53.23
311.0	004.9000	0017.5	014.9	101.8	004.5000	0110.1	044.6	53.17
312.0	004.9000	0017.5	014.9	101.5	004.5000	0110.1	044.7	53.12
313.0	004.9000	0017.5	014.9	101.2	004.5000	0110.0	044.8	53.06
314.0	004.9000	0017.3	014.9	100.9	004.5000	0110.0	045.0	53.01
315.0	004.9000	0017.2	014.9	100.6	004.5000	0110.0	045.1	52.95
316.0	004.9000	0017.0	014.9	100.4	004.5000	0110.0	045.3	52.89
317.0	004.9000	0016.7	014.9	100.1	004.5000	0110.0	045.4	52.83
318.0	004.9000	0016.2	014.9	99.8	004.5000	0110.0	045.6	52.77
319.0	004.9000	0015.6	014.9	99.6	004.5000	0109.9	045.7	52.70
320.0	004.9000	0015.2	014.9	99.3	004.5000	0109.8	045.9	52.62
321.0	004.9000	0015.0	014.9	99.1	004.5000	0109.7	046.1	52.55
322.0	004.9000	0014.7	014.9	98.8	004.5000	0109.6	046.2	52.47
323.0	004.9000	0014.5	014.9	98.6	004.5000	0109.5	046.4	52.40
324.0	004.9000	0014.3	014.9	98.4	004.5000	0109.4	046.6	52.32
325.0	004.9000	0014.2	014.9	98.1	004.5000	0109.2	046.8	52.23
326.0	004.9000	0014.0	014.9	97.9	004.5000	0109.0	047.0	52.14
327.0	004.9000	0014.0	014.9	97.7	004.5000	0108.8	047.2	52.05
328.0	004.9000	0014.1	014.9	97.5	004.5000	0108.6	047.4	51.96
329.0	004.9000	0014.2	014.9	97.3	004.5000	0108.3	047.6	51.87
330.0	004.9000	0014.2	014.9	97.1	004.5000	0108.0	047.8	51.77
331.0	004.9000	0014.2	014.9	96.9	004.5000	0107.7	048.0	51.67
332.0	004.9000	0014.2	014.9	96.8	004.5000	0107.4	048.2	51.56
333.0	004.9000	0014.2	014.9	96.6	004.5000	0107.1	048.4	51.46

07-30-2012

Terrain Data: USGS 03 SEC

FMOver Analysis

# **BROWN BROADCAST SERVICES** INCORPORATED

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503-245-6065



KBSW BLED19980820KB

Channel = 219C3  
 Max ERP = 4.5 kW  
 RCAMSL = 1320 M  
 N. Lat. 42 43 48.0  
 W. Lng. 114 25 06.0  
 Protected  
 60 dBu

KBWE

Channel = 220A  
 Max ERP = 4.9 kW  
 RCAMSL = 1288 M  
 N. Lat. 42 33 32.0  
 W. Lng. 113 44 50.0  
 Interfering  
 54 dBu

Azimuth (degrees)	ERP (kW)	HAAT (m)	Dist (km)	Azimuth (degrees)	ERP (kW)	HAAT (m)	Dist (km)	Actual (dBu)	IX (km)
064.0	004.5000	0098.7	026.4	314.5	004.9000	0017.3	043.7	44.34	
065.0	004.5000	0097.9	026.3	314.2	004.9000	0017.3	043.3	44.45	
066.0	004.5000	0097.3	026.2	313.9	004.9000	0017.3	042.9	44.56	
067.0	004.5000	0096.8	026.1	313.6	004.9000	0017.4	042.5	44.67	
068.0	004.5000	0096.5	026.1	313.3	004.9000	0017.5	042.1	44.79	
069.0	004.5000	0095.7	026.0	312.9	004.9000	0017.5	041.7	44.90	
070.0	004.5000	0095.3	025.9	312.5	004.9000	0017.5	041.4	45.01	
071.0	004.5000	0095.2	025.9	312.2	004.9000	0017.5	041.0	45.13	
072.0	004.5000	0095.0	025.9	311.9	004.9000	0017.6	040.6	45.25	
073.0	004.5000	0095.2	025.9	311.6	004.9000	0017.6	040.2	45.37	
074.0	004.5000	0095.3	025.9	311.2	004.9000	0017.5	039.8	45.49	
075.0	004.5000	0095.6	026.0	310.9	004.9000	0017.5	039.4	45.62	
076.0	004.5000	0096.0	026.0	310.6	004.9000	0017.6	039.0	45.75	
077.0	004.5000	0096.5	026.1	310.3	004.9000	0017.5	038.6	45.88	
078.0	004.5000	0097.1	026.2	310.0	004.9000	0017.5	038.2	46.02	
079.0	004.5000	0098.0	026.3	309.6	004.9000	0017.5	037.8	46.16	
080.0	004.5000	0098.5	026.3	309.3	004.9000	0017.6	037.4	46.29	
081.0	004.5000	0098.8	026.4	308.8	004.9000	0017.6	037.0	46.42	
082.0	004.5000	0098.9	026.4	308.4	004.9000	0017.6	036.7	46.54	
083.0	004.5000	0099.2	026.4	307.9	004.9000	0017.6	036.3	46.66	
084.0	004.5000	0099.5	026.5	307.4	004.9000	0017.6	036.0	46.79	
085.0	004.5000	0099.8	026.5	306.9	004.9000	0017.6	035.6	46.90	
086.0	004.5000	0100.1	026.5	306.4	004.9000	0017.5	035.3	47.03	
087.0	004.5000	0100.3	026.6	305.8	004.9000	0017.6	035.0	47.14	
088.0	004.5000	0100.7	026.6	305.3	004.9000	0017.6	034.7	47.26	
089.0	004.5000	0101.1	026.7	304.7	004.9000	0017.6	034.4	47.37	
090.0	004.5000	0101.8	026.8	304.1	004.9000	0017.6	034.0	47.50	
091.0	004.5000	0102.5	026.8	303.5	004.9000	0017.6	033.7	47.62	
092.0	004.5000	0103.4	026.9	302.9	004.9000	0017.6	033.4	47.74	
093.0	004.5000	0104.3	027.0	302.3	004.9000	0017.6	033.0	47.87	
094.0	004.5000	0105.1	027.1	301.7	004.9000	0017.6	032.7	47.98	
095.0	004.5000	0105.5	027.2	301.0	004.9000	0017.6	032.5	48.08	
096.0	004.5000	0106.2	027.3	300.3	004.9000	0017.6	032.2	48.19	
097.0	004.5000	0107.8	027.5	299.6	004.9000	0017.6	031.8	48.33	
098.0	004.5000	0109.1	027.6	298.9	004.9000	0017.6	031.5	48.46	
099.0	004.5000	0109.7	027.7	298.1	004.9000	0017.6	031.3	48.55	
100.0	004.5000	0110.0	027.7	297.3	004.9000	0017.6	031.1	48.64	
101.0	004.5000	0110.0	027.7	296.4	004.9000	0017.7	031.0	48.69	
102.0	004.5000	0110.2	027.7	295.6	004.9000	0017.6	030.8	48.76	
103.0	004.5000	0110.4	027.8	294.7	004.9000	0017.6	030.7	48.81	
104.0	004.5000	0110.7	027.8	293.8	004.9000	0017.6	030.6	48.87	
105.0	004.5000	0111.0	027.8	292.9	004.9000	0017.6	030.5	48.91	
106.0	004.5000	0111.2	027.8	292.0	004.9000	0017.5	030.4	48.95	
107.0	004.5000	0111.5	027.9	291.1	004.9000	0017.4	030.3	48.99	
108.0	004.5000	0111.9	027.9	290.2	004.9000	0017.3	030.3	49.02	

**BROWN BROADCAST SERVICES**  
 INCORPORATED

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3740 S.W. Comus St.

Portland, Oregon 97219-7418

503-245-6065

109.0	004.5000	0112.4	028.0	289.3	004.9000	0017.3	030.2	49.05
110.0	004.5000	0113.1	028.1	288.3	004.9000	0017.4	030.1	49.08
111.0	004.5000	0114.0	028.2	287.4	004.9000	0017.3	030.1	49.12
112.0	004.5000	0115.1	028.3	286.4	004.9000	0017.0	030.0	49.15
113.0	004.5000	0116.2	028.4	285.5	004.9000	0016.4	029.9	49.18
114.0	004.5000	0117.2	028.5	284.5	004.9000	0015.3	029.9	49.19
115.0	004.5000	0118.3	028.6	283.5	004.9000	0014.3	029.9	49.20
116.0	004.5000	0119.3	028.7	282.5	004.9000	0014.3	029.9	49.20
117.0	004.5000	0120.3	028.8	281.6	004.9000	0014.0	029.9	49.18
118.0	004.5000	0121.2	028.9	280.6	004.9000	0013.0	030.0	49.15
119.0	004.5000	0122.1	029.0	279.6	004.9000	0011.0	030.1	49.11
120.0	004.5000	0123.0	029.1	278.7	004.9000	0009.8	030.2	49.06
121.0	004.5000	0123.9	029.1	277.7	004.9000	0008.9	030.3	49.00
122.0	004.5000	0124.8	029.2	276.8	004.9000	0008.7	030.4	48.94
123.0	004.5000	0125.7	029.3	275.8	004.9000	0009.0	030.6	48.87
124.0	004.5000	0126.8	029.4	274.9	004.9000	0009.6	030.7	48.80
125.0	004.5000	0128.0	029.5	274.0	004.9000	0010.3	030.9	48.73
126.0	004.5000	0129.2	029.6	273.0	004.9000	0011.1	031.1	48.65
127.0	004.5000	0130.4	029.8	272.1	004.9000	0012.5	031.3	48.57
128.0	004.5000	0131.3	029.9	271.3	004.9000	0014.3	031.5	48.47
129.0	004.5000	0132.2	029.9	270.4	004.9000	0016.3	031.8	48.36
130.0	004.5000	0133.1	030.0	269.6	004.9000	0018.1	032.0	48.26
131.0	004.5000	0134.0	030.1	268.8	004.9000	0019.1	032.3	48.15
132.0	004.5000	0134.8	030.2	268.0	004.9000	0019.8	032.6	48.03
133.0	004.5000	0135.7	030.3	267.3	004.9000	0020.8	032.9	47.91
134.0	004.5000	0136.4	030.4	266.5	004.9000	0022.0	033.3	47.78
135.0	004.5000	0137.3	030.4	265.8	004.9000	0023.3	033.6	47.66
136.0	004.5000	0138.1	030.5	265.2	004.9000	0024.2	034.0	47.52
137.0	004.5000	0139.0	030.6	264.5	004.9000	0025.2	034.3	47.39
138.0	004.5000	0139.8	030.7	263.8	004.9000	0026.0	034.7	47.25
139.0	004.5000	0140.7	030.8	263.2	004.9000	0026.9	035.1	47.10
140.0	004.5000	0141.7	030.9	262.6	004.9000	0027.8	035.5	46.96
141.0	004.5000	0142.6	031.0	262.0	004.9000	0028.6	035.9	46.81
142.0	004.5000	0143.9	031.1	261.4	004.9000	0029.0	036.3	46.67
143.0	004.5000	0145.2	031.3	260.8	004.9000	0029.0	036.7	46.53
144.0	004.5000	0146.5	031.4	260.2	004.9000	0028.7	037.1	46.38
145.0	004.5000	0147.8	031.5	259.7	004.9000	0028.3	037.6	46.23
146.0	004.5000	0148.8	031.6	259.2	004.9000	0027.7	038.0	46.07
147.0	004.5000	0150.1	031.8	258.7	004.9000	0027.0	038.5	45.92
148.0	004.5000	0151.2	031.9	258.2	004.9000	0026.4	039.0	45.76
149.0	004.5000	0152.3	032.0	257.8	004.9000	0025.8	039.5	45.60
150.0	004.5000	0153.3	032.1	257.4	004.9000	0025.2	040.0	45.44
151.0	004.5000	0154.1	032.2	257.1	004.9000	0024.7	040.5	45.28
152.0	004.5000	0154.7	032.3	256.8	004.9000	0024.3	041.0	45.12
153.0	004.5000	0155.6	032.4	256.5	004.9000	0023.9	041.5	44.96

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## **EXHIBIT 24**

### **ENVIRONMENTAL PROTECTION ACT / NIER ANALYSIS**

KBWE proposes to install a 4 bay, full-wavelength-spaced PSI “Slant-V” FM antenna, on an existing registered tower. The tower height would not change, and the tower would not be modified. This antenna is the functional equivalent to the Jampro JLLP “Double Vee” or “Penetrator” style antennas. The antenna would employ a 55/45 H/V power split. The horizontal ERP would be 4.9kw, with a vertical ERP of 4.0kw (3.975kw before §73.212 rounding).

Calculations were made using FM Model for Windows, version 2.10, using the “Jampro Double V (EPA)” setting. FM Model predicted a peak exposure of  $86.6\mu\text{w}/\text{cm}^2$ , at 8.4 meters from the tower. This represents 43.3% of the Maximum Permissible Exposure (MPE) of  $200\mu\text{w}/\text{cm}^2$  for uncontrolled environments. The other facilities on this tower and in the vicinity are non-broadcast in nature, and are not significant contributors of ground-level RF exposure.

Public access to the tower is restricted by fencing. The site will be posted with appropriate RF exposure warning signs. If tower climbing by authorized personnel becomes necessary, transmitter power will be reduced or operation will cease, as necessary, so as to not exceed the RF exposure limits.

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