

TECHNICAL STATEMENT
K258BB LARAMIE, WYOMING
LARAMIE MOUNTAIN BROADCASTING, LLC
FCC FORM 349
OCTOBER 2010

This Technical Statement is filed in support of a minor change application for K258BB Laramie, Wyoming, facility ID 155323. K258BB is seeking to change its transmitter location, maintain its Effective Radiated Power of 250 watts, and also specify a new directional antenna.

Figure 1 is a detailed interference study for the proposed operation of K258BB on channel 258D. There will not be any prohibited outgoing interference produced by K258BB with the exceptions of KKPL Cheyenne, Wyoming, on channel 260C2, facility ID 54394 and KUAD-FM Windsor, Colorado, on channel 256C1 facility ID 9538. KKPL operates on channel 260, or a second adjacent channel to channel 258D. KUAD-FM operates on channel 256, which is second adjacent channel to channel 258D. However, a waiver of C.F.R. 74.1204 of the Commissions rules is hereby respectfully requested based on the fact that there is no-population within the area of predicted interference or the 100 db μ interference contour.

The worse case interference contour for K258BB is 100 db μ (F50,10) for a second adjacent channel station. This contour with a maximum of 250 watts ERP will extend 1.11 kilometers (1110 meters). There are no normally occupied structures within 1100 meters of the proposed tower site. The access to this site is gated and limited to equipment service personnel that occasionally work at the tower site.

Figure 4 is the predicted 100 dBμ interference contour, which would be the worse case contour towards any second adjacent channel station. It shows that there will be zero persons located inside of this contour. Hence, there will not be any “actual” areas of interference.

Figure 2 is a more detailed interference study conducted against KQMT Denver, Colorado operating on channel 258C, facility ID 26929. There is no prohibited overlap between these two facilities.

Figure 3 is a more detailed interference study conducted against KAAZ Chugwater, Wyoming on channel 258C3, facility ID 164284. There is no prohibited overlap between these two facilities.

Figure 5 shows the directional antenna data for the proposed K258BB.

Figure 6 is a tabulation of the distances to the pertinent contours for the modified operation of K258BB.

Figure 7 shows that the proposed 60 dBμ predicted contour will overlap with the current 60 dBμ contour of the licensed K258BB.

Figure 8 shows the proposed 60 dBμ of K258BB will be completely contained inside of the current 60 dBμ predicted coverage contour of the station being rebroadcast, KLWV Chugwater, Wyoming on channel 215C0, facility ID 91514. The proposed operation of K258BB will be considered a “fill-in” translator for KLWV, thus some of the maximum allowable ERP limits on some of the pertinent radials will be exceeded. However, the maximum ERP on any radial will not exceed 250 watts, thus this proposed operation is in compliance with 74.1235(a).

The new proposed operation of K258BB Laramie, Wyoming was found to meet all of the Commissions rules and regulations for an FM translator station.

FIGURE 1, DETAILED INTEFERENCE STUDY
K258BB LARAMIE, WYOMING, CHANNEL 258D
CH# 258D - 99.5 MHz, Pwr= 0.25 kW DA, HAAT= 208.1 M, COR= 2432 M
Average Protected F(50-50)= 18.89 km
Standard Directional

REFERENCE
41 04 35.0 N.
105 12 14.0 W.

DISPLAY DATES
DATA 10-26-10
SEARCH 10-26-10

CH CITY	CALL	TYPE STATE	ANT AZI	DIST FILE #	LAT LNG	PWR (kW) HAAT (M)	INT (km) COR (M)	PRO (km) LICENSEE	*IN* (Overlap in km)	*OUT* (Overlap in km)
258D Laramie	K258BB *	LIC DC_ WY	321.4 141.2	33.4 BLFT20100507ACS	41 18 39.1 105 27 12.1	0.250 2771	62.9	20.5	-40.3*<	-24.0*< *
258C Denver	KQMT	LIC DC_ CO	181.0 1.0	149.6 BLH20020118AAT	39 43 45.0 105 14 06.0	100.000 495	158.2 2262	68.4	-28.9*<	18.9 Entercom Denver License, L
260C2 Cheyenne	KKPL **	LIC _C_ WY	129.3 309.3	15.3 BMLH20010426AAK	40 59 22.0 105 03 47.0	50.000 150	2.7 2129	26.5	-8.0*<	-12.1*< **
258C3 Chugwater	KAZ	LIC NCX WY	22.7 202.9	83.3 BLH20071205AAI	41 46 04.0 104 49 00.0	9.600 73	79.4 1724	17.9	-12.1<	13.1 Brahmin Broadcasting Corpo
256C1 Windsor	KUAD-FM **	LIC _CX CO	145.9 326.2	58.2 BLH20031223ACH	40 38 31.0 104 49 03.0	100.000 255	7.5 1816	60.8	28.8	-3.6*< **
204A South Greeley	KDNR	CP DCX WY	79.8 259.9	15.3 BPED20090205ACH	41 06 02.0 105 01 29.0	1.900 129	18.6 2153	5.6	10.0R	5.3M Western Inspirational Bro
204A South Greeley	KDNR	LIC _CX WY	79.8 259.9	15.3 BMLED20080929AUD	41 06 02.0 105 01 29.1	0.500 129	18.6 2153	5.6	10.0R	5.3M Western Inspirational Bro
258D Estes Park	K258BE	LIC _C_ CO	198.6 18.4	83.9 BLFT20060630AIH	40 21 38.0 105 31 12.0	0.013 2737	34.9	10.5	30.7	15.9 Educational Media Foundati
259C3 Medicine Bow	KAZ	CP NCX WY	304.5 123.8	98.6 BPH20100127ABI	41 34 23.8 106 10 47.3	7.800 176	70.7 2660	47.8	19.3	38.6 Brahmin Broadcasting Corpo
205A Burns	KEZF	LIC _CX WY	80.5 260.9	59.5 BLED20080725ADD	41 09 45.0 104 30 16.0	0.600 36	18.6 1774	5.6	10.0R	49.5M Cedar Cove Broadcasting, I
205A Fort Collins	KRFC	LIC _EX CO	155.4 335.6	60.5 BLED20030324ADY	40 34 53.0 104 54 20.0	3.000 66	18.6 1596	5.6	10.0R	50.5M Public Radio For The Front
205A Laramie	KAIW	LIC _CX WY	293.2 112.8	62.7 BLED20090220AAZ	41 17 46.0 105 53 30.0	1.150 197	18.6 2459	5.6	10.0R	52.7M Educational Media Foundati
205A Burns	KEZF	CP _CX WY	80.7 261.2	64.4 BPED20100202ACK	41 10 01.0 104 26 49.0	2.700 27	18.6 1739	5.6	10.0R	54.4M Cedar Cove Broadcasting, I
204A Estes Park	NONE	CP DVX CO	198.6 18.4	83.9 BNPED20071018AXE	40 21 38.0 105 31 12.0	0.290 14	18.6 2731	5.6	10.0R	73.9M Academy Media Inc.
257D Wheatland	648578	APP _C_ WY	10.8 191.0	112.9 BNPFT20030317JVT	42 04 28.1 104 56 49.1	0.170 1505	9.2	6.4	88.0	83.0 Edgewater Broadcasting, In
257A Mitchell	KETT	LIC NCX NE	53.1 234.0	142.9 BLH20080725ADB	41 50 23.0 103 49 35.0	0.950 249	36.2 1543	24.1	89.8	93.6 Legacy Communications, Llc
257C1 Saratoga	KTGA	LIC NCX WY	292.3 110.9	182.7 BLH20080130AKR	41 40 46.0 107 14 08.0	18.000 324	78.8 2500	53.6	94.5	115.9 Toga Radio Llc
260D Arvada	K260AL	LIC _C_ CO	179.3 359.3	118.2 BLFT20070718ADY	40 00 43.0 105 11 16.0	0.205 1654	1.0	11.5	96.5	105.7 Mountain Community Transla
260D Arvada	K260AL	CP DC_ CO	179.3 359.3	118.2 BPFT20090306ACN	40 00 43.0 105 11 16.0	0.250 1655	1.0	11.2	96.6	105.9 Mountain Community Transla
261C1 Sterling	AL5413	ADD _ CO	106.0 287.4	191.2	40 34 57.0 103 01 56.0	100.000 299	11.0 1609	76.7	162.3	113.8
257C1 Eckley	AL7594	RSV _ CO	119.1 300.7	238.6	40 00 33.0 102 45 35.0	100.000 299	102.8 1588	70.5	116.6	139.8
255C1 Manville	KOUZ	CP _CX WY	15.6 196.0	187.3 BNPH20060309AAA	42 41 56.0 104 35 18.0	100.000 298	8.5 1942	64.8	162.8	121.9 Robert. B. Rose
261C1 Glendo	KYOD	CP _CX WY	359.5 179.5	188.1 BPH20040122AEN	42 46 13.0 105 13 21.0	100.000 139	8.1 1677	63.4	165.3	124.1 Canned Ham Communications,
261C1 Glendo	KYOD	LIC _CN WY	359.5 179.5	188.1 BLH19990707KD	42 46 13.0 105 13 21.0	55.000 139	6.9 1677	57.8	166.5	129.7 Canned Ham Communications,
255A Steamboat Springs	970908MB	VAC _N CO	245.0 63.9	152.2	40 29 12.0 106 49 54.0	6.000 100	1.6 2493	15.8	137.7	135.4

Page # 2											
CH CITY	CALL	TYPE STATE	ANT	AZI ---	DIST FILE #	LAT LNG	PWR (kW) HAAT (M)	INT (km) COR (M)	PRO (km) LICENSEE	*IN* (Overlap	*OUT* in km)
255A Steamboat Springs	970911MV	CP CO	_CX	244.3 63.2	154.8 BPH19970911MV	40 27 43.0 106 50 58.0	1.850 183	1.6 2531	11.8 Ramsey Leasing,	140.2 Inc.	141.9
205A Living Springs	1214520	APP CO	DEX	148.4 329.0	151.9 BNPED20071022ARD	39 54 31.0 104 16 16.0	6.630 91	18.6 1629	5.6 Calvary Chapel	10.0R Aurora	141.9M
257C1 Eckley	KECK	CP CO	_CX	119.1 300.7	238.6 BPH20100505AHV	40 00 33.0 102 45 35.0	100.000 103	76.5 1391	46.8 Arnold Broadcasting,	142.9 Inc.	163.5
257A Douglas	KKTY-FM	LIC WY	_CN	351.8 171.5	185.5 BLH19840320AC	42 43 42.0 105 31 46.0	0.810 162	28.2 1780	19.2 Douglas Broadcasting	143.1	145.0
205A Leader	1213218	APP CO	_CX	140.5 321.3	165.3 BNPED20071022AGT	39 55 21.8 103 58 18.3	1.000 38	18.6 1523	5.6 De Mujer A Mujer Internati	10.0R	155.3M
260C Pueblo	KVUU	LIC CO	_CY	173.5 353.7	260.4 BLH19990311KF	38 44 44.0 104 51 42.0	79.000 670	16.1 2922	101.9 Capstar Tx Llc	221.4	157.4
255C Pueblo	KKMG	LIC CO	_CY	173.5 353.7	260.5 BLH19951005KA	38 44 43.0 104 51 41.0	72.000 695	15.6 2946	101.4 Radio License Holding Cbc,	221.9	158.0

Terrain database is USGS 03 SEC , R= 73.215 qualifying spacings or FCC minimum Spacings in KM, M= Margin in KM
Contour distances are on direct line to and from reference station. Reference zone = 2, Co to 3rd adjacent.
Ant Column: (D= DA Standard, Z= DA 73.215, N= Not DA 73.215, _= Omni), Polarization (C,H,V,E), Beamtilt(Y,N,X)
"*"affixed to 'IN' or 'OUT' values = site inside protected contour.

* TRANSLATOR BEING MODIFIED BY THIS APPLICATION.

** INTERFERENCE PROTECTION WILL BE PROVIDED TO THESE 2ND ADJACENT CHANNEL STATIONS, SINCE THERE IS
NO POPULATION INSIDE THE PROPOSED 100 DBU INTERFERENCE CONTOUR. SEE THE TECHNICAL STATEMENT FOR
MORE DETAILS.

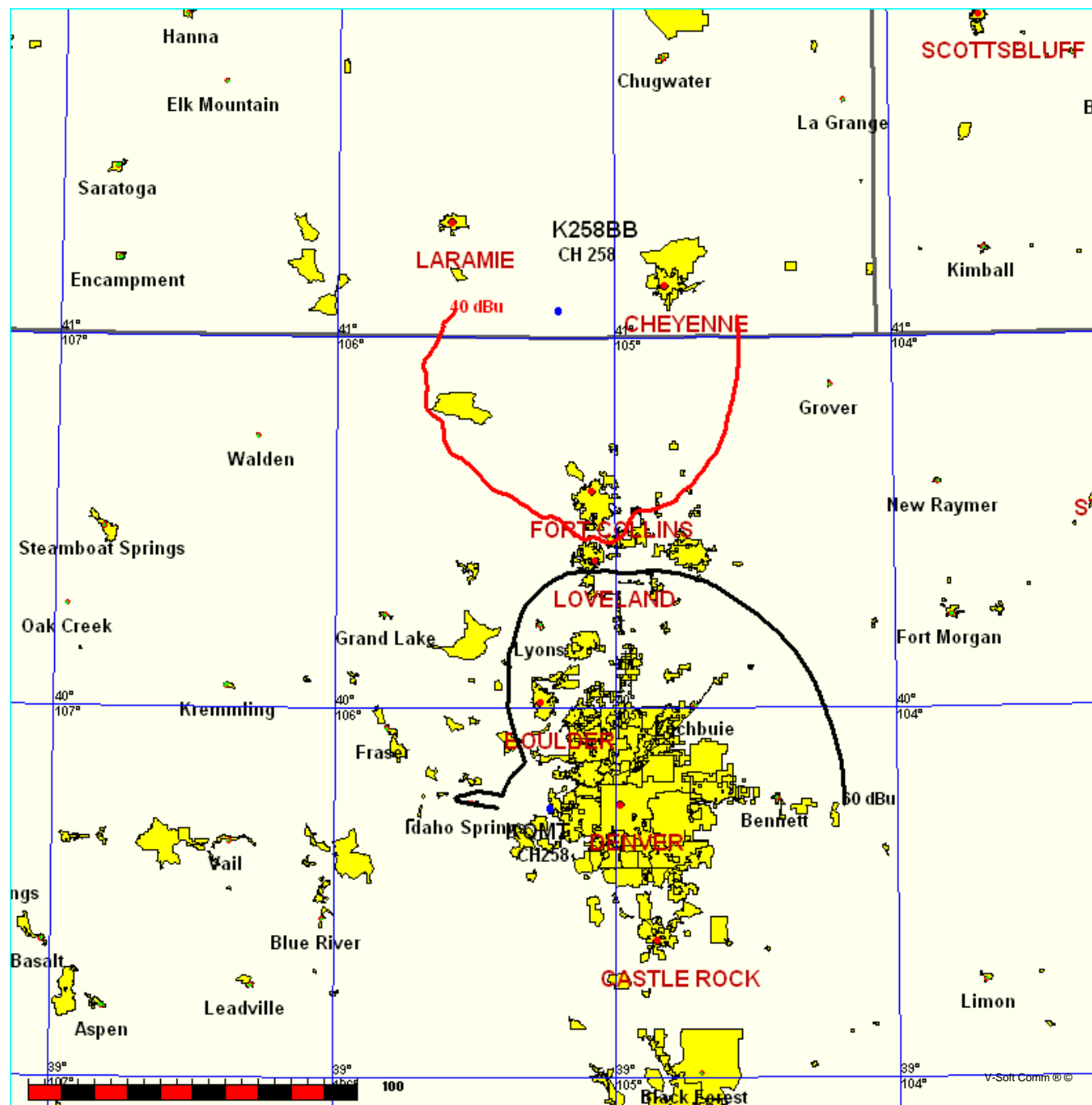


FIGURE 3, DETAILED INTEFERENCE STUDY WITH KAAZ, CH. 258C3
K258BB LARAMIE, WYOMING, CHANNEL 258D

FMCommander Single Allocation Study - 10-26-2010 - USGS 03 SEC
K258BB's Overlaps (In= -12.08 km, Out= 13.08 km)

K258BB CH 258 D DA
Lat= 41 04 35.0, Lng= 105 12 14.0
0.25 kW 208.1 M HAAT, 2432 M COR
Prot.= 60 dBu, Intef.= 40 dBu

KAAZ CH 258 C3 73.215 N BLH20071205AAI
Lat= 41 46 04.0, Lng= 104 49 00.0
9.6 kW 73 M HAAT, 1724 M COR
Prot.= 60 dBu, Intef.= 40 dBu

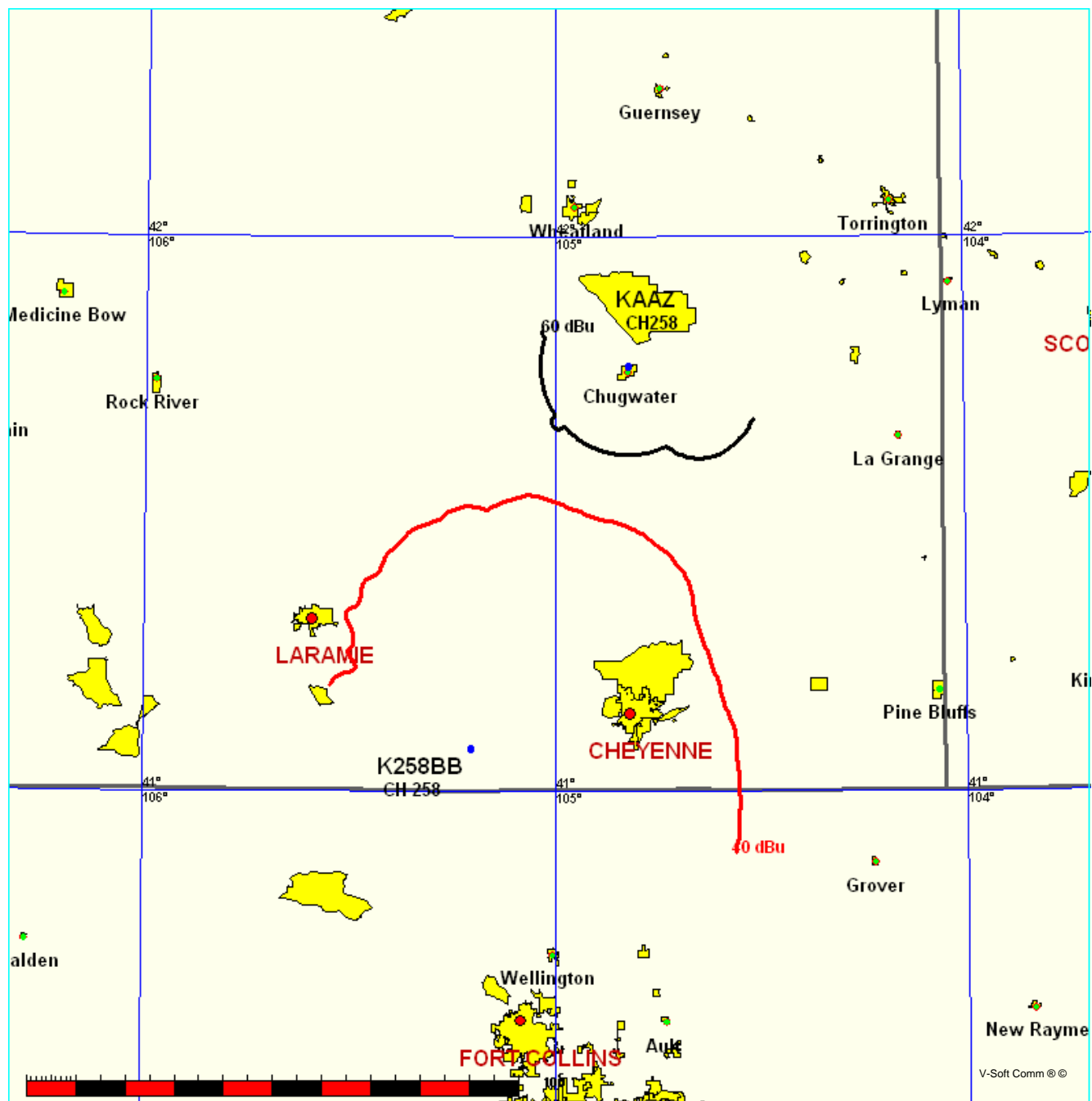


FIGURE 4, PREDICTED 100 DBU INTERFERENCE CONTOUR
K258BB LARAMIE, WYOMING, CHANNEL 258D

Coverage Study - USGS 03 SEC
10-26-2010

K258BB CH258 D , 0.25 kW, 208.1M HAAT, 2432.0M COR AMSL
Interference Contour = 100 dBu. Population = 0

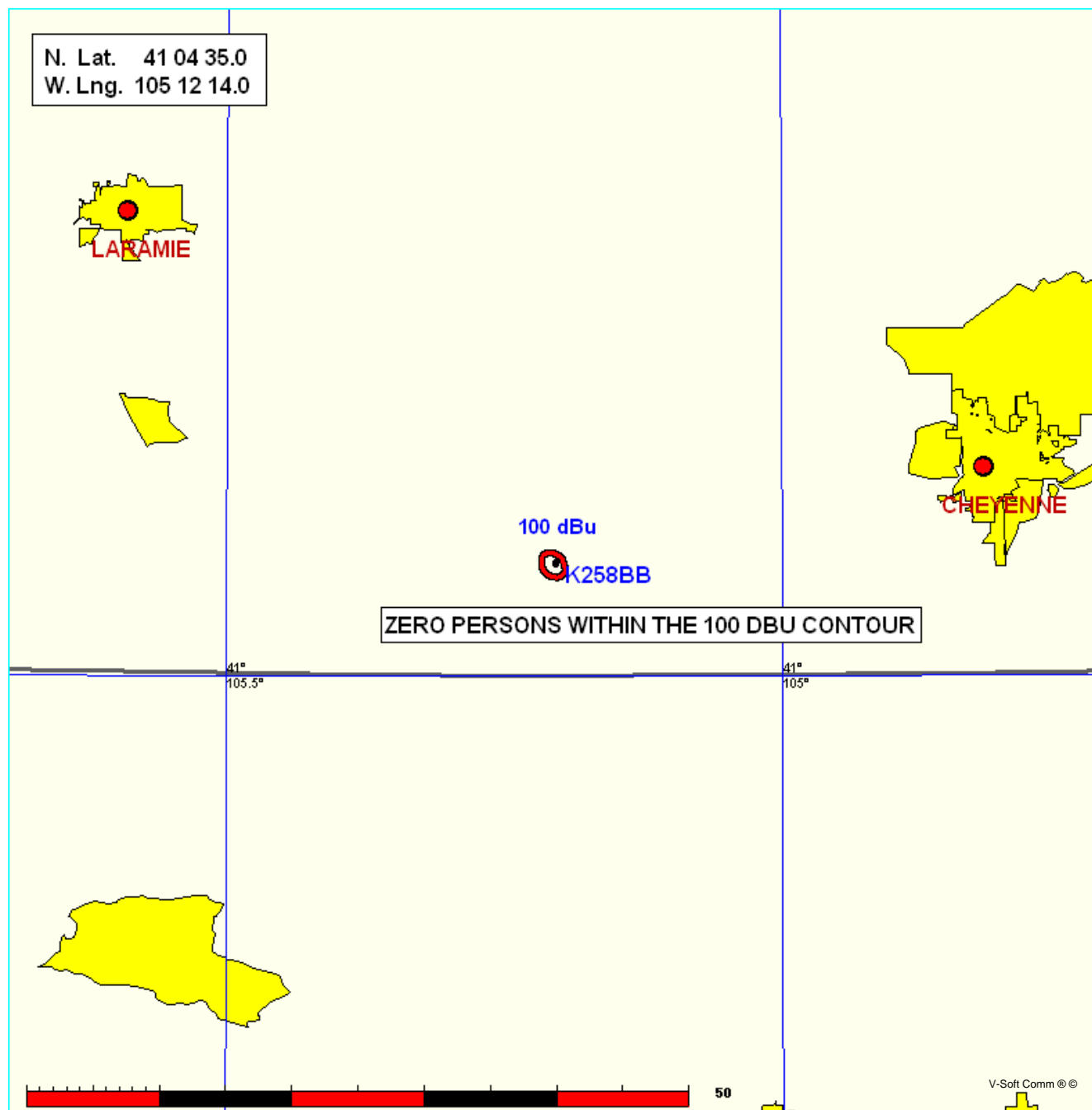


FIGURE 5 - DIRECTIONAL ANTENNA DATA

K258BB LARAMIE, WYOMING

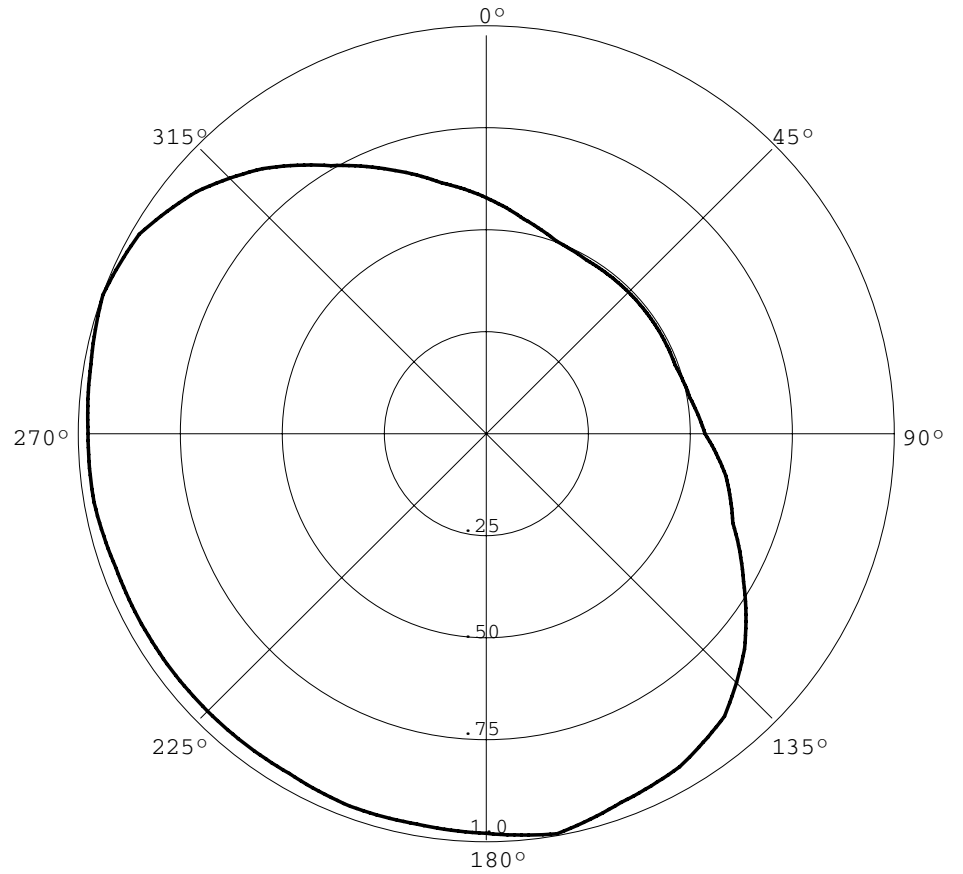
10-26-2010

RMS(V) = .811

NICOM BKG-77, DIRECTIONAL ANTENNA SYSTEM

Graph is Relative Field

Azi	Field	dBk	kW
000	0.581	-10.737	0.084
010	0.536	-11.437	0.072
020	0.504	-11.972	0.064
030	0.493	-12.164	0.061
040	0.493	-12.164	0.061
050	0.493	-12.164	0.061
060	0.493	-12.164	0.061
070	0.493	-12.164	0.061
080	0.507	-11.920	0.064
090	0.536	-11.437	0.072
100	0.596	-10.516	0.089
110	0.643	-9.856	0.103
120	0.728	-8.778	0.132
130	0.826	-7.681	0.171
140	0.908	-6.859	0.206
150	0.947	-6.494	0.224
160	0.966	-6.321	0.233
170	1.000	-6.021	0.250
180	0.984	-6.161	0.242
190	0.976	-6.232	0.238
200	0.976	-6.232	0.238
210	0.966	-6.321	0.233
220	0.966	-6.321	0.233
230	0.966	-6.321	0.233
240	0.966	-6.321	0.233
250	0.966	-6.321	0.233
260	0.976	-6.232	0.238
270	0.976	-6.232	0.238
280	0.984	-6.161	0.242
290	1.000	-6.021	0.250
300	0.982	-6.178	0.241
310	0.927	-6.679	0.215
320	0.852	-7.412	0.181
330	0.762	-8.382	0.145
340	0.692	-9.218	0.120
350	0.627	-10.075	0.098



Contour.out

N. Lat. = 410435.0 W. Lng. = 1051214.0
 HAAT and Distance to Contour,
 FCC, FM 2-10 Mi, 51 pts Method - USGS 03 SEC

FIGURE 6, DISTANCE TO CONTOURS, K258BB, CH. 258D

Azi.	AV EL	HAAT	dBk	60-F5	40-F1	100-F1
000	2206.8	225.2	-10.74	14.77	48.82	0.64
010	2163.7	268.3	-11.44	15.52	51.03	0.59
020	2128.6	303.4	-11.97	16.08	52.55	0.56
030	2113.7	318.3	-12.16	16.31	53.28	0.55
040	2085.2	346.8	-12.16	17.05	55.71	0.55
050	2079.9	352.1	-12.16	17.18	56.15	0.55
060	2119.3	312.7	-12.16	16.15	52.82	0.55
070	2128.6	303.4	-12.16	15.90	52.06	0.55
080	2129.3	302.7	-11.92	16.11	52.63	0.56
090	2125.3	306.7	-11.44	16.72	54.18	0.59
100	2133.4	298.6	-10.52	17.42	55.85	0.66
110	2129.4	302.6	-9.86	18.25	57.89	0.71
120	2132.3	299.7	-8.78	19.33	60.45	0.81
130	2126.3	305.7	-7.68	20.77	63.95	0.92
140	2126.9	305.1	-6.86	21.72	66.18	1.01
150	2121.1	310.9	-6.49	22.37	67.75	1.05
160	2143.1	288.9	-6.32	21.79	66.16	1.07
170	2113.5	318.5	-6.02	23.22	69.81	1.11
180	2180.3	251.8	-6.16	20.58	63.01	1.09
190	2213.9	218.1	-6.23	19.10	59.44	1.08
200	2233.0	199.0	-6.23	18.26	57.33	1.08
210	2260.8	171.2	-6.32	16.86	53.80	1.07
220	2266.3	165.7	-6.32	16.56	53.10	1.07
230	2293.5	138.5	-6.32	14.89	49.48	1.07
240	2318.4	113.6	-6.32	13.46	45.96	1.07
250	2335.9	96.1	-6.32	12.41	42.67	1.07
260	2364.5	67.5	-6.23	10.59	35.82	1.08
270	2381.7	50.3	-6.23	9.18	30.42	1.08
280	2394.3	37.7	-6.16	7.83	26.22	1.09
290	2384.3	47.7	-6.02	9.02	29.91	1.11
300	2384.4	47.6	-6.18	8.93	29.58	1.09
310	2376.1	55.9	-6.68	9.46	31.36	1.03
320	2350.8	81.2	-7.41	10.79	36.62	0.94
330	2325.1	106.9	-8.38	11.64	39.84	0.85
340	2284.3	147.7	-9.22	13.02	43.53	0.77
350	2245.0	187.0	-10.08	14.02	46.07	0.70

Ave EI = 2219.42 M HAAT= 212.58 M AMSL= 2432

FIGURE 7, PRESENT AND PROPOSED 60 DBU CONTOURS
K258BB LARAMIE, WYOMING, CHANNEL 258D

Coverage Study - USGS 03 SEC
10-26-2010

K258BB CH258 D , 0.25 kW, 0.0M HAAT, 2771.0M COR AMSL
Service Contour = 60 dBu. Population = 1,136

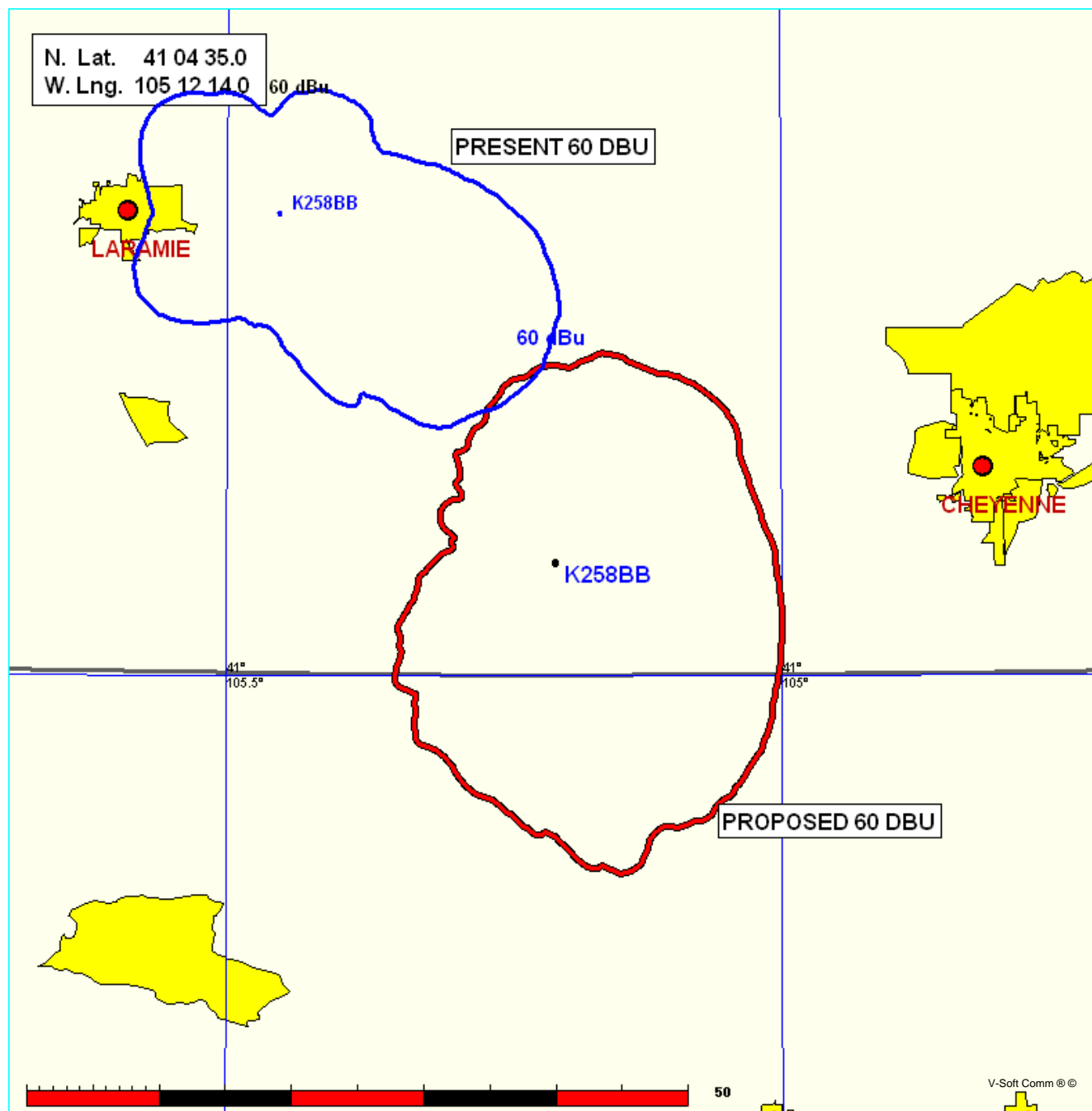


FIGURE 8, FILL IN MAP WITH KLWV AND K258BB 60 DBU CONTOURS
K258BB LARAMIE, WYOMING, CHANNEL 258D

Coverage Study - USGS 03 SEC
10-26-2010

K258BB CH215 D , 0.25 kW, 208.1M HAAT, 2432.0M COR AMSL
Service Contour = 60 dBu. Population = 111,411

