Note:
Study cell size: 1.00 km
Profile point spacing: 0.10 km

tvstudy v2.2.5 (4uoc83)
Database: localhost, Study: K18KU_Ch28_Omni_Move_Pre, Model: Longley-Rice
Start: 2019.04.16 16:07:34

Study created: 2019.04.16 16:05:46

Study build station data: LMS TV 2019-04-14

    Proposal: K18KU-D D28 LD APP DULUTH, MN
 File number: K18KU_Ch28_Omni_Move
 Facility ID: 186867
Station data: User record
   Record ID: 766
     Country: U.S.

Build options:
Protect pre-transition records not on baseline channel
Protect baseline records from LPTV

Search options:
Baseline record excluded if station has CP

Stations potentially affected by proposal:

IX	Call	Chan	Svc	Status	City, State	File Number	Distance
No	KCWV	D27	DT	APP	DULUTH, MN	BLANK0000036079	0.4 km
Yes	KCWV	D27	DT	LIC	DULUTH, MN	BLANK0000004652	0.4
No	WHWC-TV	D27	DT	APP	MENOMONIE, WI	BLANK0000035676	194.5
No	WHWC-TV	D27	DT	LIC	MENOMONIE, WI	BLEDT20040824AAF	194.5
No	K28KK-D	D28	LD	LIC	DECORAH, IA	BLDTT20101213AAY	385.7
No	K44GH-D	D28	LD	CP	ALEXANDRIA, MN	BLANK0000053422	272.4
No	K28DD	N28+	TX	LIC	BEMIDJI, MN	BLTT20080610AAL	218.2
Yes	KAWB	D28	DT	LIC	BRAINERD, MN	BLEDT20101012ADI	183.6
No	K28MV-D	D28	LD	CP	DAKOTA, MN	BNPDTL20100510AKD	323.3
No	KILW-LD	D28	LD	LIC	Minneapolis, MN	BLANK0000004615	243.0
No	KILW-LD	D28	LD	CP	Minneapolis, MN	BLANK0000036435	272.2
No	K28LN-D	D28	LD	APP	ORR, MN	BLDTT20120315AAI	142.8
No	K28LL-D	D28	LD	LIC	REDWOOD FALLS, MN	BLDTT20120604AAU	332.9
No	K28PL-D	D28	LD	LIC	ROSEAU, MN	BLANK0000066872	356.3
No	K38OH-D	D28	LD	CP	SAINT CLOUD, MN	BLANK0000051606	198.5
No	K28OH-D	D28	LD	LIC	ST. JAMES, MN	BLANK0000064440	355.1
No	K28MU-D	D28	LD	CP	WELLS, MN	BNPDTL20100510AJQ	370.9
No	K28IF-D	D28	LD	LIC	WILLMAR, MN	BLDTL20110203ACI	289.1
No	K28MA-D	D28	LD	LIC	ARGUSVILLE, ND	BLANK0000013937	396.3
No	WYOW	D28	DT	LIC	EAGLE RIVER, WI	BLCDT20121005AAF	247.4
No	WYOW	D28	DT	APP	EAGLE RIVER, WI	BPCDT20121019AAE	247.4
No	W28DT-D	D28	LD	CP	GALESVILLE, WI	BNPDTL20090825CBB	295.9
No	WXOW	D28	DT	LIC	LA CROSSE, WI	BLANK0000058613	336.5
Yes	K29LE-D	D29	LD	CP	DULUTH, MN	BNPDTL20100513ABM	0.6
No	K29EB-D	D29-	LD	LIC	GRAND RAPIDS, MN	BLANK0000016819	114.7
No	K29EB-D	N29-	TX	LIC	GRAND RAPIDS, MN	BLTT20021011AAW	114.7
No	WFTC	D29	DT	LIC	MINNEAPOLIS, MN	BLCDT20100809CJF	207.4
No	K31GH-D	N31-	TX	LIC	HAYWARD, WI	BLTTL20020729AAS	103.4

No non-directional AM stations found within 0.8 km

No directional AM stations found within 3.2 km

Record parameters as studied:

    Channel: D28
       Mask: Full Service
   Latitude: 46 47 15.80 N (NAD83)
  Longitude: 92 7 2.40 W
Height AMSL: 464.7 m
       HAAT: 0.0 m
   Peak ERP: 15.0 kW
    Antenna: Omnidirectional
Elev Pattrn: Generic

50.1 dBu contour:

Azimuth	ERP	HAAT	Distance
0.0 deg	15.0 kW	42.7 m	33.8 km
45.0	15.0	154.2	48.0
90.0	15.0	281.7	55.4
135.0	15.0	281.5	55.4
180.0	15.0	268.3	54.7
225.0	15.0	142.6	47.2
270.0	15.0	63.2	38.4
315.0	15.0	36.4	32.0

Database HAAT does not agree with computed HAAT
Database HAAT: 0 m Computed HAAT: 159 m

**Proposal 25.14 dBu contour crosses Canadian border, coordination required
Distance to Canadian border: 145.6 km

Distance to Mexican border: 2054.0 km

Conditions at FCC monitoring station: Allegan MI
Bearing: 131.5 degrees Distance: 672.7 km

Proposal is not within the West Virginia quiet zone area

Conditions at Table Mountain receiving zone:
Bearing: 239.8 degrees Distance: 1286.4 km

Study cell size: 1.00 km
Profile point spacing: 0.10 km

Maximum new IX to full-service and Class A: 0.50%
Maximum new IX to LPTV: 2.00%

Interference to BLANK0000004652 LIC scenario 1

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	KCWV	D27	DT	LIC	DULUTH, MN	BLANK0000004652	
Undesireds:	K18KU-D	D28	LD	APP	DULUTH, MN	K18KU_Ch28_Omni_Move	0.4 km
	WHWC-TV	D27	DT	APP	MENOMONIE, WI	BLANK0000035676	194.2

Service area		Terrain-limited		IX-free, before		IX-free, after		Percent New IX	
11936.7	207,472	11894.3	207,401	11191.7	206,572	11190.7	206,567	0.01	0.00

Undesired	Total IX		Unique IX, before		Unique IX, after	
K18KU-D D28 LD APP	1.0	5			1.0	5
WHWC-TV D27 DT APP	702.6	829	702.6	829	702.6	829

Interference to BLANK0000004652 LIC scenario 2

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	KCWV	D27	DT	LIC	DULUTH, MN	BLANK0000004652	
Undesireds:	K18KU-D	D28	LD	APP	DULUTH, MN	K18KU_Ch28_Omni_Move	0.4 km
	WHWC-TV	D27	DT	LIC	MENOMONIE, WI	BLEDT20040824AAF	194.2

Service area		Terrain-limited		IX-free, before		IX-free, after		Percent New IX	
11936.7	207,472	11894.3	207,401	11293.0	206,805	11292.0	206,800	0.01	0.00

Undesired	Total IX		Unique IX, before		Unique IX, after	
K18KU-D D28 LD APP	1.0	5			1.0	5
WHWC-TV D27 DT LIC	601.3	596	601.3	596	601.3	596

Interference to BLEDT20101012ADI LIC scenario 1

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	KAWB	D28	DT	LIC	BRAINERD, MN	BLEDT20101012ADI	

Undesireds:	K18KU-D	D28	LD	APP	DULUTH, MN	K18KU_Ch28_Omni_Move	183.6 km	

Service area		Terrain-limited		IX-free, before		IX-free, after		Percent New IX	
17764.8	186,673	17725.4	186,488	17725.4	186,488	17720.3	186,468	0.03	0.01

Undesired	Total IX		Unique IX, before		Unique IX, after	
K18KU-D D28 LD APP	5.0	20			5.0	20

Interference to BNPDTL20100513ABM CP scenario 1

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	K29LE-D	D29	LD	CP	DULUTH, MN	BNPDTL20100513ABM	
Undesireds:	K18KU-D	D28	LD	APP	DULUTH, MN	K18KU_Ch28_Omni_Move	0.6 km
	K29EB-D	D29-	LD	LIC	GRAND RAPIDS, MN	BLANK0000016819	114.1
	WFTC	D29	DT	LIC	MINNEAPOLIS, MN	BLCDT20100809CJF	207.3

Service area		Terrain-limited		IX-free, before		IX-free, after		Percent New IX	
5986.0	191,554	5969.9	190,703	5867.7	188,475	5865.7	188,456	0.03	0.01

Undesired	Total IX		Unique IX, before		Unique IX, after	
K18KU-D D28 LD APP	2.0	19			2.0	19
K29EB-D D29- LD LIC	1.0	0	1.0	0	1.0	0
WFTC D29 DT LIC	101.2	2,228	101.2	2,228	101.2	2,228

Interference to BNPDTL20100513ABM CP scenario 2

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	K29LE-D	D29	LD	CP	DULUTH, MN	BNPDTL20100513ABM	
Undesireds:	K18KU-D	D28	LD	APP	DULUTH, MN	K18KU_Ch28_Omni_Move	0.6 km
	WFTC	D29	DT	LIC	MINNEAPOLIS, MN	BLCDT20100809CJF	207.3

Service area		Terrain-limited		IX-free, before		IX-free, after		Percent New IX	
5986.0	191,554	5969.9	190,703	5868.7	188,475	5866.7	188,456	0.03	0.01

Undesired	Total IX		Unique IX, before		Unique IX, after	
K18KU-D D28 LD APP	2.0	19			2.0	19
WFTC D29 DT LIC	101.2	2,228	101.2	2,228	101.2	2,228

Interference to proposal scenario 1

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	K18KU-D	D28	LD	APP	DULUTH, MN	K18KU_Ch28_Omni_Move	
Undesireds:	KCWV	D27	DT	APP	DULUTH, MN	BLANK0000036079	0.4 km
	KAWB	D28	DT	LIC	BRAINERD, MN	BLEDT20101012ADI	183.6
	KILW-LD	D28	LD	LIC	Minneapolis, MN	BLANK0000004615	243.0
	WYOW	D28	DT	LIC	EAGLE RIVER, WI	BLCDT20121005AAF	247.4
	K29LE-D	D29	LD	CP	DULUTH, MN	BNPDTL20100513ABM	0.6
	K29EB-D	D29-	LD	LIC	GRAND RAPIDS, MN	BLANK0000016819	114.7

Service area		Terrain-limited		IX-free		Percent IX	
6899.6	196,218	6863.3	195,710	6777.6	194,530	1.25	0.60

Undesired	Total IX		Unique IX		Prcnt Unique IX	
KAWB D28 DT LIC	2.0	24	2.0	24	0.03	0.01
K29LE-D D29 LD CP	83.6	1,156	83.6	1,156	1.22	0.59