

tvstudy v2.2.5 (4uoc83)

Database: localhost, Study: Maple31d15kwTUA200T, Model: Longley-Rice

Start: 2021.06.28 07:26:19

Study created: 2021.06.28 07:26:19

Study build station data: LMS TV 2021-06-24

Proposal: W42EK-D D31 LD APP MAPLE VALLEY, MI

Facility ID: 184809

Station data: User record

Record ID: 373

Country: U.S.

Build options:

Protect pre-transition records not on baseline channel

Stations potentially affected by proposal:

IX	Call	Chan	Svc	Status	City, State	File Number	Distance
No	WNEM-TV	D30	DT	LIC	BAY CITY, MI	BLANK0000113433	107.2 km
No	WXII-LP	D30+	LD	CP	CEDAR, MI	BLANK0000071863	106.1
No	W30DQ-D	D30	LD	CP	CHARLES, MI	BLANK0000143602	196.4
No	W30ET-D	D30-	LD	LIC	FLINT, MI	BLANK0000121598	85.6
No	WFLD	D31	DT	LIC	CHICAGO, IL	BLANK0000055195	372.1
No	W31EZ-D	D31	LD	LIC	CHICAGO, IL	BLANK0000124951	369.7
No	WESV-LD	D31	LD	LIC	CHICAGO, IL	BLANK0000125079	369.7
No	W31ET-D	D31	LD	CP	FORT WAYNE, IN	BLANK0000074400	373.0
No	WNIT	D31	DT	LIC	SOUTH BEND, IN	BLANK0000087078	330.5
No	WMYD	D31	DT	LIC	DETROIT, MI	BLANK0000125639	233.2
No	W31FA-D	D31	LD	CP	ELMHURST, MI	BLANK0000143601	138.6
No	WMKG-CD	D31	DC	LIC	MUSKEGON, MI	BLANK0000107817	187.4
No	WNED-TV	D31	DT	LIC	BUFFALO, NY	BLANK0000107983	469.9
No	WITI	D31	DT	LIC	MILWAUKEE, WI	BLANK0000086971	305.6
No	W31EV-D	D31	LD	CP	WAUSAU, WI	BLANK0000143975	416.8
Yes	WFQX-TV	D32	DT	LIC	CADILLAC, MI	BLC DT20091217ACU	70.7
Yes	WFQX-TV	D32	DT	CP	CADILLAC, MI	BLANK0000035809	70.7
No	WDIV-TV	D32	DT	LIC	DETROIT, MI	BLANK0000126974	228.6

No	WBWM-LP	N32z	TX	LIC	MOUNT PLEASANT, MI	BLTTL20001220ABG	85.2
No	W32EL-D	D32	LD	CP	ST. IGNACE, MI	BNPDTL20100223ADT	172.9

No non-directional AM stations found within 0.8 km

No directional AM stations found within 3.2 km

Record parameters as studied:

Channel: D31
Mask: Stringent
Latitude: 44 18 53.60 N (NAD83)
Longitude: 84 29 27.00 W
Height AMSL: 381.0 m
HAAT: 0.0 m
Peak ERP: 15.0 kW
Antenna: DIE-TUA (ID 120649) 200.0 deg
Elev Pattnr: Generic

50.4 dBu contour:

Azimuth	ERP	HAAT	Distance
0.0 deg	0.037 kW	20.0 m	7.7 km
45.0	0.037	18.1	7.7
90.0	0.078	-16.1	9.2
135.0	0.333	20.0	13.1
180.0	10.9	21.0	28.4
225.0	9.01	8.4	27.6
270.0	0.138	28.6	10.6
315.0	0.078	19.8	9.2

Database HAAT does not agree with computed HAAT

Database HAAT: 0 m Computed HAAT: 15 m

Proposal 25.42 dBu contour does not cross Canadian border

Distance to Canadian border: 181.5 km

Distance to Mexican border: 2196.6 km

Conditions at FCC monitoring station: Allegan MI
Bearing: 212.4 degrees Distance: 223.7 km

Proposal is not within the West Virginia quiet zone area

Conditions at Table Mountain receiving zone:
Bearing: 262.0 degrees Distance: 1762.6 km

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

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

Interference to BLCDT20091217ACU LIC scenario 1

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	WFQX-TV	D32	DT	LIC	CADILLAC, MI	BLCDT20091217ACU	
Undesireds:	W42EK-D	D31	LD	APP	MAPLE VALLEY, MI		70.7 km
	WLPD-CD	D32	DC	LIC	PLANO, IL	BLANK0000113895	338.8
	WDIV-TV	D32	DT	LIC	DETROIT, MI	BLANK0000126974	252.3
	WJMN-TV	D32	DT	LIC	ESCANABA, MI	BLANK0000063727	255.3
	WTMJ-TV	D32	DT	LIC	MILWAUKEE, WI	BLANK0000086939	236.5
	Service area	Terrain-limited		IX-free, before		IX-free, after	Percent New IX
	25260.7	538,816	25068.1	535,638	24898.4	533,206	24884.3 533,099 0.06 0.02
Undesired				Total IX	Unique IX, before		Unique IX, after
W42EK-D	D31	LD	APP	14.1	107	14.1	107
WDIV-TV	D32	DT	LIC	76.3	1,100	76.3	1,100
WJMN-TV	D32	DT	LIC	56.3	912	30.2	816
WTMJ-TV	D32	DT	LIC	63.3	516	37.2	420

Interference to BLANK0000035809 CP scenario 1

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	WFQX-TV	D32	DT	CP	CADILLAC, MI	BLANK0000035809	
Undesireds:	W42EK-D	D31	LD	APP	MAPLE VALLEY, MI		70.7 km
	WLPD-CD	D32	DC	LIC	PLANO, IL	BLANK00000113895	338.8
	WANE-TV	D32	DT	LIC	FORT WAYNE, IN	BLANK00000121250	338.5
	WDIV-TV	D32	DT	LIC	DETROIT, MI	BLANK00000126974	252.3
	WJMN-TV	D32	DT	LIC	ESCANABA, MI	BLANK00000063727	255.3
	WTMJ-TV	D32	DT	LIC	MILWAUKEE, WI	BLANK00000086939	236.5
	WKAR-TV	D33	DT	LIC	EAST LANSING, MI	BLANK00000054990	176.2
	Service area	Terrain-limited		IX-free, before		IX-free, after	Percent New IX
	31523.1	688,477	31231.2	683,387	30969.3	676,657	30965.3 676,657 0.01 0.00
Undesired				Total IX	Unique IX, before		Unique IX, after
W42EK-D D31 LD APP				4.0	0		4.0 0
WANE-TV D32 DT LIC				25.0	897		0.0 0
WDIV-TV D32 DT LIC				163.4	5,443		138.4 4,551
WJMN-TV D32 DT LIC				65.4	1,059		38.3 1,026
WTMJ-TV D32 DT LIC				67.2	392		32.2 219
WKAR-TV D33 DT LIC				13.0	272		0.0 0

Interference to proposal scenario 1
10.53% interference received

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	W42EK-D	D31	LD	APP	MAPLE VALLEY, MI		
Undesireds:	WMYD	D31	DT	LIC	DETROIT, MI	BLANK00000125639	233.2 km
	W31FA-D	D31	LD	CP	ELMHURST, MI	BLANK00000143601	138.6
	WFQX-TV	D32	DT	LIC	CADILLAC, MI	BLCDT20091217ACU	70.7
	Service area	Terrain-limited		IX-free		Percent IX	
	843.0	9,099	710.0	7,719	657.6	6,906	7.38 10.53

Undesired			Total IX		Unique IX	Prcnt Unique IX
WMYD D31 DT LIC	51.4	813	48.3	759	6.81	9.83
W31FA-D D31 LD CP	3.0	54	0.0	0	0.00	0.00
WFQX-TV D32 DT LIC	1.0	0	1.0	0	0.14	0.00

Interference to proposal scenario 2
11.52% interference received

	Call	Chan	Svc	Status	City, State	File Number	Distance
Desired:	W42EK-D	D31	LD	APP	MAPLE VALLEY, MI		
Undesireds:	WMYD	D31	DT	LIC	DETROIT, MI	BLANK00000125639	233.2 km
	W31FA-D	D31	LD	CP	ELMHURST, MI	BLANK00000143601	138.6
	WFQX-TV	D32	DT	CP	CADILLAC, MI	BLANK00000035809	70.7

	Service area		Terrain-limited		IX-free	Percent IX
843.0	9,099	710.0	7,719	619.4	6,830	12.76 11.52

Undesired			Total IX		Unique IX	Prcnt Unique IX
WMYD D31 DT LIC	51.4	813	45.3	745	6.38	9.65
W31FA-D D31 LD CP	3.0	54	0.0	0	0.00	0.00
WFQX-TV D32 DT CP	42.3	90	39.3	76	5.53	0.98