

EXHIBIT A

ENGINEERING STATEMENT

The engineering data contained herein have been prepared on behalf of COMMUNITY TELEVISION, INC., licensee of non-commercial digital television station WATC-DT, Channel 41 in Atlanta, Georgia, in support of its Application for Construction Permit for a new digital fill-in translator on Channel 36 in Union City, Georgia. The purpose of this request is to provide signal to the southern portion of the WATC-DT market, which has experienced significant loss of service since the end of the transition to digital television.

It is proposed to mount a standard ERI directional antenna at the 110-meter level of an existing 139-meter communications tower. Exhibit B is a map upon which the predicted service contours are plotted. In Exhibit C, we provide a map showing the 41 dBu service contour of the proposed fill-in translator in relation to the authorized 41 dBu contour of WATC-DT (BPEDT-20080619AIR). As shown, the former is completely contained within the latter. Operating parameters for the proposed facility are tabulated in Exhibit D. An interference study is provided in Exhibit E, and a power density calculation follows as Exhibit F.

Because no change in the overall height or location of the existing tower is proposed, the FAA has not been notified of this application. The FCC issued Antenna Structure Registration Number 1036336 to this tower.

I declare under penalty of perjury that the foregoing statements and the attached exhibits, which were prepared by me or under my immediate supervision, are true and correct to the best of my knowledge and belief.

  
KEVIN T. FISHER

August 13, 2009



**CONTOUR POPULATION**  
**51 DBU : 2,035,971**  
**41 DBU : 2,902,896**

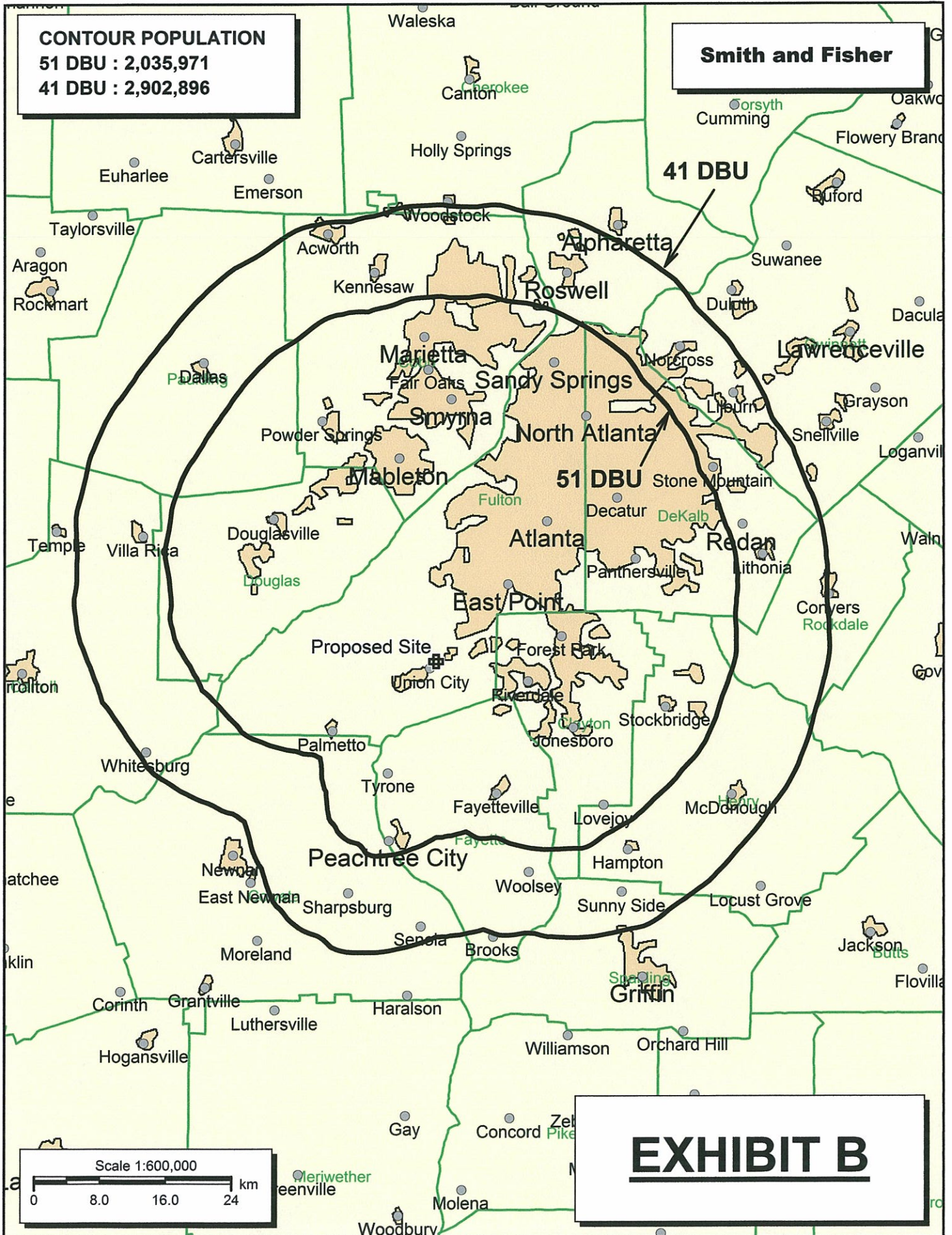
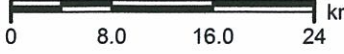
**Smith and Fisher**

**41 DBU**

**51 DBU**

**EXHIBIT B**

Scale 1:600,000





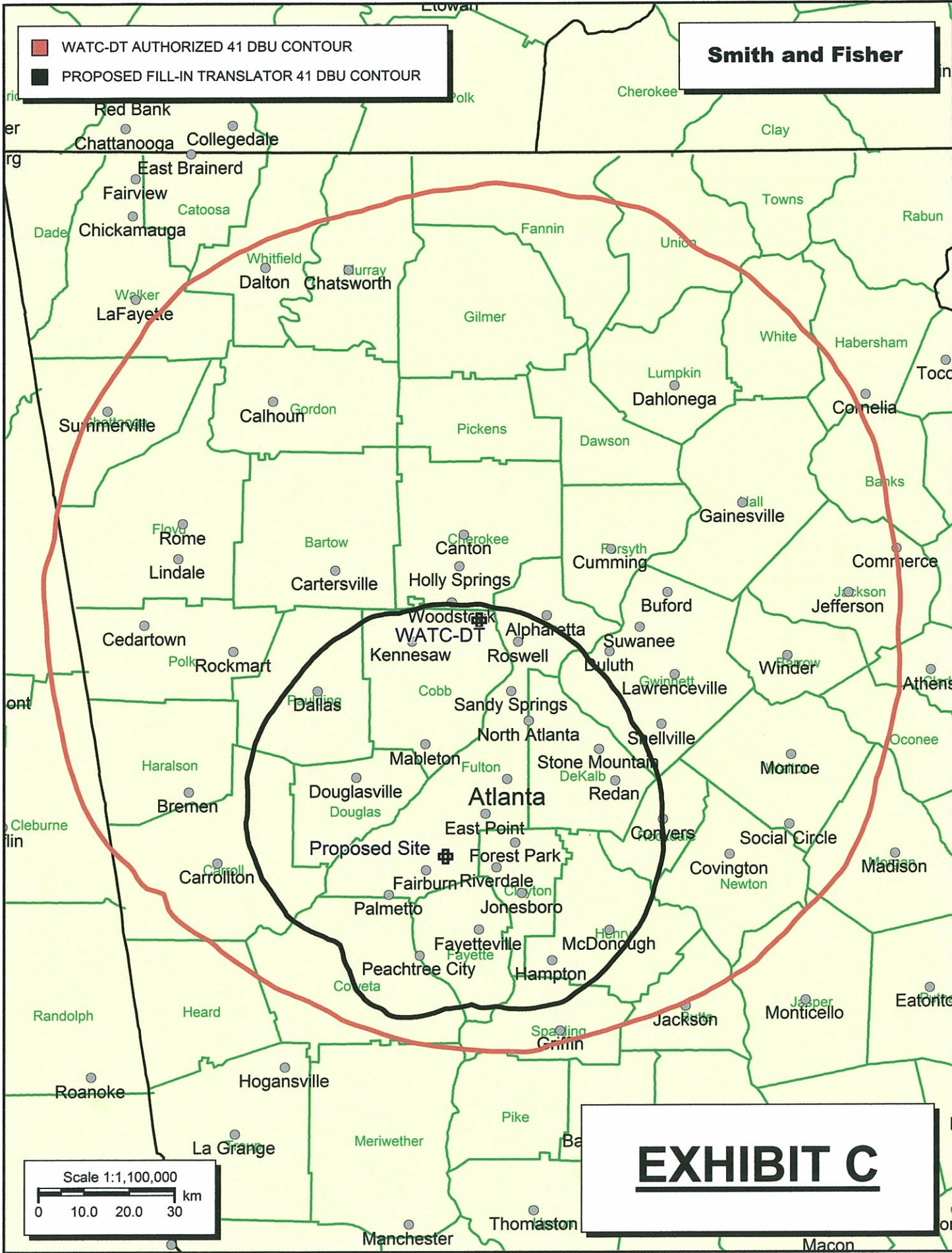


EXHIBIT D

## PROPOSED OPERATING PARAMETERS

PROPOSED DIGITAL FILL-IN TRANSLATOR  
CHANNEL 36 – UNION CITY, GEORGIA

Transmitter Power Output:	0.7 kw
Transmission Line Efficiency:	62.1%
Antenna Power Gain – Toward Horizon:	34.39
Antenna Power Gain – Main Lobe:	34.39
Effective Radiated Power – Toward Horizon:	15.0 kw
Effective Radiated Power – Main Lobe:	15.0 kw
Transmitter Make and Model:	Type-accepted
Transmission Line Make and Model:	Andrew HJ7-50A
Size and Type:	1-5/8" air heliax
Length:	390 feet*
Antenna Make and Model:	ERI ALP8L1-HSNR
Orientation	20 degrees true
Beam Tilt	0.25 degrees
Radiation Center Above Ground:	110 meters
Radiation Center Above Mean Sea Level:	400 meters

\*Estimated



LONGLEY-RICE INTERFERENCE STUDY  
PROPOSED DIGITAL FILL-IN TRANSLATOR  
CHANNEL 36 – UNION CITY, GEORGIA

We conducted a detailed interference study (a V-Soft SunDTV study) using the Longley-Rice methodology contained in the Commission's *OET Bulletin No. 69*, with respect to all facilities of concern. The software utilizes a 1-square kilometer cell size, calculates signal strength at 1.0-kilometer increments along each radial studied, and employs the 2000 U.S. Census to count population within cells. In addition, the program does not attribute interference to the proposed facility in cells within the protected contour of the station under study where interference from another source (other than the proposed station) already is predicted to exist (also known as "masking"). The results of this study are provided in Exhibit E-2. It concludes that the facility proposed herein causes no significant new interference to any of the potentially affected stations.

As a result, it is believed that the proposed digital fill-in translator facility complies with the requirements of Sections 74.709, 74.793(e), 74.793(f), 74.793(g), 74.793(h), 74.794(b) and 73.1030 of the Commission's Rules.

## Summary Study

Census data selected: 2000

Post DTV Transition Database Selected

## TV INTERFERENCE and SPACING ANALYSIS PROGRAM

Date: 08-12-2009 Time: 06:45:16

Record Selected for Analysis

PROPOSED USERRECORD-01 ATLANTA GA US  
 Channel 36 ERP 15. kW HAAT 123. m RCAMSL 00400 m STRINGENT MASK  
 Latitude 033-35-41 Longitude 0084-32-04  
 Status APP Zone 1 Border  
 Dir Antenna Make usr Model USRPAT01 Beam tilt N Ref Azimuth  
 200.  
 Last update Cutoff date Docket  
 Comments  
 Applicant

Cell Size for Service Analysis 1.0 km/side

Distance Increments for Longley-Rice Analysis 1.00 km

Not full service station

Facility meets maximum power limit

Azimuth (Deg)	ERP (kW)	HAAT (m)	51.0 dBu F(50,90) (km)
0.0	12.476	131.9	44.5
45.0	11.275	98.2	41.1
90.0	2.878	118.4	36.1
135.0	0.733	128.6	29.8
180.0	0.159	125.3	21.6
225.0	0.153	107.1	19.7
270.0	0.843	124.8	30.3
315.0	3.442	148.2	39.1

Contour Overlap to Proposed Station

Contour Overlap Evaluation to Proposed Station Complete

## LANDMOBILE SPACING VIOLATIONS FOUND

NONE

Proposed facility OK to FCC Monitoring Stations

Proposed facility OK toward West Virginia quiet zone

Proposed facility OK toward Table Mountain

Proposed facility is beyond the Canadian coordination distance

Proposed facility is beyond the Mexican coordination distance

Proposed station is OK toward AM broadcast stations

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# Start of Interference Analysis

Channel	Proposed Station Call	City/State	ARN
36	PROPOSED	ATLANTA GA	USERRECORD01

## Stations Potentially Affected by Proposed Station

Chan No.	Call	City/State	Dist(km)	Status	Application	Ref.
35	WDTA-LP	ATLANTA GA	23.1	CP	BDISDTL	-
20081007ALW						
35	WDTA-LP	ATLANTA GA	23.1	APP	BMPDTL	-
20090806AAC						
35	WLTZ	COLUMBUS GA	130.5	LIC	BLCDT	-
20060627ABT						
35	W35BB	DUBLIN GA	191.6	CP	BPTTL	-
20050311ABU						
35	W35BB	DUBLIN GA	191.6	APP	BPTTL	-
20090805ABM						
35	W35CK-D	HIGHLANDS NC	201.0	LIC	BLDTT	-
20080922ABE						
36	WABM	BIRMINGHAM AL	210.9	LIC	BLCDT	-
20060406AAJ						
36	WTVY	DOTHAN AL	318.2	CP MOD	BMPCDT	-
20090609AAF						
36	W58CZ	AUGUSTA GA	240.5	CP	BDISDTT	-
20060331AII						
36	WQMB-LP	COLUMBUS GA	134.8	CP	BDISTT	-
20071011AAR						
36	W36DL-D	COLUMBIA SC	352.8	CP	BDCCDTL	-
20061027AEO						
36	WYFF	GREENVILLE SC	244.4	CP	BPCDT	-
20080317ABT						
36	WCNT-LP	CHATTANOOGA TN	199.1	LIC	BLTTL	-
20050908AAJ						
36	WNPX-TV	COOKEVILLE TN	361.5	LIC	BLCDT	-
20040401ANA						
36	WDLY-LP	GATLINBURG TN	259.1	APP	BSTA	-
20070411AAE						
36	WDLY-LP	GATLINBURG TN	259.1	CP	BPTTL	-
20070411AAD						
36	WDLY-LP	GATLINBURG TN	252.5	LIC	BLTTL	-
20060130ATY						
36	WAPK-CA	KINGSPORT TN	383.4	LIC	BLTTA	-
20030618AAX						
38	W38BQ	HUNTSVILLE AL	234.5	APP	BSTA	-
20060929ABO						
38	W38BQ	HUNTSVILLE AL	234.5	LIC	BLTTL	-

EXHIBIT E-2 continued

19971105IJ						
38	WBMG-LP	MOODY AL	179.8	LIC	BLTTL	-
19970804JG						
38	W63CK	SYLACAUGA AL	146.5	CP	BDISTTL	-
20081119ANP						
38	WKTB-CA	ATLANTA GA	47.2	LIC	BLTTA	-
20030701BJB						
38	WKTB-CA	ATLANTA GA	47.2	CP	BPTTA	-
20030624ABT						
38	WBUD-LP	BLAIRSVILLE GA	121.8	LIC	BLTTL	-
20080626ACE						
38	WGCW-LP	SAVANNAH GA	364.3	LIC	BLTTL	-
20070110ACE						
38	W38DG	TIFTON GA	254.6	LIC	BLTTL	-
20040813AAC						
38	W38CN	CHARLOTTE NC	364.6	LIC	BLTT	-
20011026AAF						
38	W27CL	ACTON TN	394.3	LIC	BLTTL	-
20001130AAC						
39	W54BU	HUNTSVILLE AL	234.5	APP	BPTTL	-
20020819ABS						
39	WETU-LP	WETUMPKA AL	194.1	LIC	BLTTL	-
19970206JC						
39	WPAF-LP	PANAMA CITY FL	397.5	CP	BDISTTL	-
20060403ARH						
39	W39CD	FULTON MS	347.8	LIC	BLTTL	-
19980511JB						
39	W39CD	FULTON MS	347.8	CP	BPTTA	-
20080916ADQ						
39	W39CD	FULTON MS	347.8	STA	BSTA	-
20050228ADW						
39	WYHB-CA	CHATTANOOGA TN	191.9	LIC	BLTTL	-
19980824JC						
40	WAAO-LP	ANDALUSIA AL	309.2	LIC	BLTTL	-
19980304JZ						
40	W40BU	PANAMA CITY FL	379.1	LIC	BLTTL	-
20060410AAW						
40	W40BZ	TUPELO MS	386.4	LIC	BLTTL	-
20070730ALP						
40	W40CC	TUPELO MS	393.5	CP	BNPTTL	-
20000830BBO						
40	W40CM	KNOXVILLE TN	272.0	LIC	BLTTL	-
20080724ABW						
40	W40CM	KNOXVILLE TN	272.0	CP MOD	BMPTTL	-
20080723AAV						
43	WMJN-LP	DECATUR AL	261.1	LIC	BLTTA	-
20020711AAH						
43	WMJN-LP	SOMERVILLE AL	261.1	APP	BSTA	-
20060201ACN						
43	WBXT-CA	TALLAHASSEE FL	345.6	LIC	BLTTA	-
20040628AAI						
43	WDGA-CA	DALTON GA	136.6	LIC	BLTTL	-
19910211IF						
43	W57CT	SAVANNAH GA	362.2	LIC	BLTT	-
20060321ADL						
43	W43AU	MARION NC	326.5	LIC	BLTT	-
19920505IF						
43	W43BH	ACTON TN	394.3	LIC	BLTTL	-
20001130AAD						
44	W50BP	PANAMA CITY FL	397.3	CP	BDISTTL	-
20060306BCD						



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Study of this proposal found the following interference problem(s):

Proposal is MX with BMPDTL	20090806AAC	in scenario	5
Proposal is MX with BMPDTL	20090806AAC	in scenario	6
Proposal is MX with BMPDTL	20090806AAC	in scenario	7
Proposal is MX with BMPDTL	20090806AAC	in scenario	8

EXHIBIT F

POWER DENSITY CALCULATION

PROPOSED DIGITAL FILL-IN TRANSLATOR  
CHANNEL 36 – UNION CITY, GEORGIA

Since the FCC considers the possible biological effects of RF transmissions in its environmental determinations, we have studied the matter with respect to this Union City facility. Employing the methods set forth in *OET Bulletin No. 65* and considering a main-lobe effective radiated power of 15.0 kw, an antenna radiation center 110 meters above ground, and the vertical pattern of the ERI antenna, maximum power density two meters above ground of  $0.0026 \text{ mw/cm}^2$  is calculated to occur 44 meters north-northeast of the base of the tower. Since this is only 0.6 percent of the  $0.40 \text{ mw/cm}^2$  reference for uncontrolled environments (areas with public access) surrounding a facility operating on Channel 36 (602-608 MHz), this proposal may be excluded from consideration with respect to public exposure to nonionizing electromagnetic radiation.

Further, the station owner will take whatever precautionary steps are necessary, such as reducing power or leaving the air temporarily, to ensure that workers operating in the vicinity of the antenna are not exposed to excessive nonionizing radiation.