

ENGINEERING STATEMENT
MODIFICATION OF CONSTRUCTION PERMIT
(FCC FILE NO. BPCDT-19991029AIE)
ON BEHALF OF
NEXSTAR BROADCASTING, INC.
WFXV-DT, UTICA, NEW YORK
CHANNEL 27 1000 KW MAX DA ERP 272 METERS HAAT

DECEMBER 2007

COHEN, DIPPELL AND EVERIST, P.C.
CONSULTING ENGINEERS
RADIO AND TELEVISION
WASHINGTON, D.C.

COHEN, DIPPELL AND EVERIST, P. C.

City of Washington)
) ss
District of Columbia)

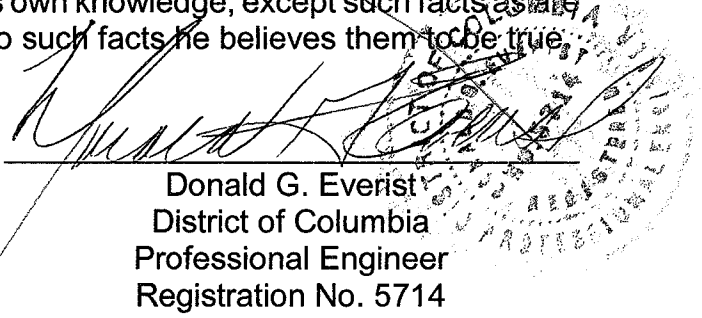
Donald G. Everist, being duly sworn upon his oath, deposes and states that:

He is a graduate electrical engineer, a Registered Professional Engineer in the District of Columbia, and is President, Secretary and Treasurer of Cohen, Dippell and Everist, P.C., Consulting Engineers, Radio - Television, with offices at 1300 L Street, N.W., Suite 1100, Washington, D.C. 20005;

That his qualifications are a matter of record in the Federal Communications Commission;

That the attached engineering report was prepared by him or under his supervision and direction and

That the facts stated herein are true of his own knowledge, except such facts as are stated to be on information and belief, and as to such facts he believes them to be true;



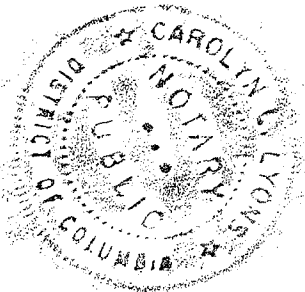
Donald G. Everist
District of Columbia
Professional Engineer
Registration No. 5714

Subscribed and sworn to before me this 12th day of December, 2007.



Notary Public

My Commission Expires: 2/28/2008



COHEN, DIPPELL AND EVERIST, P. C.

City of Washington)
) ss
District of Columbia)

Martin R. Doczkat being duly sworn upon his oath, deposes and states that:

He is a graduate electrical engineer of the Pennsylvania State University, and is a staff engineer at Cohen, Dippell and Everist, P.C., Consulting Engineers, Radio - Television, with offices at 1300 L Street, N.W., Suite 1100, Washington, D.C. 20005;

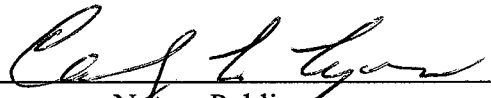
That the attached engineering report was prepared by him or under his supervision and direction and

That the facts stated herein are true of his own knowledge, except such facts as are stated to be on information and belief, and as to such facts he believes them to be true.



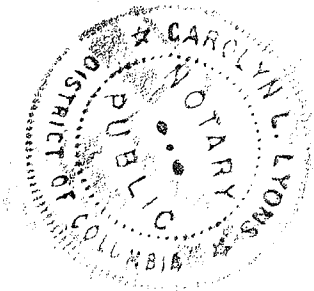
Martin R. Doczkat

Subscribed and sworn to before me this 12th day of December, 2007.



Notary Public

My Commission Expires: 2/28/2008



This engineering statement has been prepared on behalf of Nexstar Broadcasting, Inc., licensee of WFXV-TV, Utica, New York. The purpose of this engineering statement is to accompany its request to modify its outstanding construction permit (FCC File No. BPCDT-19991029AIE) for digital television (“DTV”) facilities and to supplement those data required in FCC Form 301, Section III-D.

WFXV-TV operates on NTSC Television Channel 33 with a maximum visual horizontal effective radiated power (“ERP”) of 851 kW non-directional and a height above average terrain (“HAAT”) of 193 meters. WFXV-DT has been authorized to construct DTV facilities of 688 kW directional ERP (horizontal polarization) on its allotted DTV Channel 27 at a HAAT of 433 meters on its existing antenna structure, however, WFXV-DT now proposes to construct DTV facilities with 1000 kW directional ERP (horizontal polarization) at an HAAT of 272 meters from a new tower site approximately 260 meters away from the currently authorized WFXV-DT tower site at a bearing of N 316° E, T.

There are no AM stations located within 3.22 km of the proposed WFXV-DT tower site. The closest broadcast tower is the WFXV-TV transmitter site, which also hosts two FM stations. With the exception of WFXV-TV and WFXV-DT, no other full-service NTSC or DTV stations operate within 500 meters from this site.

The DTV antenna will be top-mounted on the proposed new tower having a total overall structure height above ground of 161.3 meters (529.1 feet). The existing transmitter site is located approximately 9 miles west-southwest of Utica, New York.

Since this is a proposed new antenna structure, FAA airspace approval is being requested in the form of a FAA notification filed with the FAA (FAA Study No. 2007-AEA-6370-OE). Exhibit E-1 is a quadrangle map of the proposed site. Exhibit E-2 is a diagram of the proposed tower and the proposed transmitting antenna.

North Latitude: 43° 02' 19"

West Longitude: 75° 26' 49"

NAD-27

Equipment Data

Antenna: Dielectric, Type TFU-26GTH-R P260SP (or equivalent) top-mounted, horizontally polarized antenna with 1.0° electrical beam tilt. The horizontal and vertical plane patterns and other exhibits required by Section 73.625(c) are herein included as Exhibit E-3.

Power Data

Transmitter output	22.3 kW	13.48 dBk
Dielectric, Type EIA/DCA 4-1/16", 50 ohm or equivalent-length 182.6 meters (599 ft)	80.4%	0.95 dB
Input power to the antenna	17.9 kW	12.53 dBk
Antenna power gain, Main Lobe	55.9	17.47 dB
Effective Radiated Power, Maximum	1000 kW	30 dBk

Elevation Data

Vertical dimension of Channel 27 side-mounted antenna including beacon and lightning rod	16.2 meters 53.3 feet
Overall height above ground of the proposed antenna structure including beacon and lightning rod	161.3 meters 529.1 feet
Center of radiation of Channel 27 antenna above ground	152.1 meters 498.9 feet
Elevation of site above mean sea level	393.9 meters 1292.4 feet
Center of radiation of Channel 27 antenna above mean sea level	546 meters 1791.3 feet
Overall height above mean sea level of proposed tower including beacon and lightning rod	555.2 meters 1821.5 feet
Antenna height above average terrain	272 meters

NOTE: Slight height differences result due to conversion to metric.

Allocation

An allocation study from the proposed site has not been performed as the predicted F(50,90) 41 dBu contour of the proposed DTV facilities at the currently authorized site are expected to be entirely within the predicted F(50,90) 41 dBu contour of the WFXV-DT authorized construction permit (FCC File No. BPCDT-19991029AIE).

Coverage

The average elevation data for 3.2 to 16.1 km along each radial has been determined from the 3-second NGDC for the proposed new tower site. The F(50,90) DTV coverage contours have been computed from reference to the propagation data for Channels 14-69, as published by the FCC in Figure 10b and Figure 10c, Section 73.699 of the FCC Rules and Regulations. Utilizing the formula in Section 73.625(b)(2) of the Rules for the effective heights shown on the attached tabulations, the depression angle, A_n , for each azimuth has been calculated. The maximum radiation value has been used to calculate ERP and to determine coverage where the vertical radiation pattern at these angles is greater than 90% of the maximum.

Table I includes the distances along the radials to the predicted F(50,90) 48 and 41 dBu contours, the average elevation 3.2 to 16.1 km, and the effective antenna heights in accordance with Section 73.625(b) of the FCC Rules.

FCC Public Notice, Dated August 3, 2004

Dielectric has been able to develop a directional pattern which remains within the coverage area predicted for the facilities described in the proposed DTV Table of Allotments. In addition, the proposed WFXV-DT operation:

- provides in excess of 48 dBu over the entire principal community (see Exhibit E-4)
- is presumed to not require renotification to Canada

Therefore, this application provides a best fit available through a major antenna manufacturer within the service in the proposed Table of Allotments for WFXV-DT to comply with the August 3, 2004, FCC Public Notice and presumably should not require recoordination with Canada.

Interference Analysis

An analysis of predicted interference caused by the proposed WFXV-DT service has not been performed as the proposed F(50,90) 41 dBu contour is not predicted to extend in any direction beyond that authorized by the F(50,90) 41 dBu contour of the outstanding construction permit (see Exhibit E-5).

The proposed facilities are not expected to exceed the coverage of the outstanding construction permit. Even so, action was taken to prevent any further interference than presently allowed within the WFXV-DT outstanding construction permit in all directions including towards Canada. Therefore, the protection is in accordance with the second step contour overlap method as defined in the Letter of Understanding (“*LOU*”) between the FCC and Industry Canada, released September 29, 2000.

Other Licensed and Broadcast Facilities

According to the CDBS, there are no AM stations located within 3.22 km of the proposed WFXV-DT site. NTSC Station WFXV-TV, FM stations WSKS(FM), 97.9 MHz and WUMX(FM), 102.5 MHz broadcast within 500 meters of the existing tower at the proposed WFXV-DT site. No other FM or full-service TV or DTV stations are located within 500 meters.

No adverse technical effect is anticipated by the proposed DTV operation to any other FCC licensed facility. If required, the applicant will install filters or take other measurements as necessary to resolve the problem.

RFF Levels at Tower Site

The radiofrequency field ("RFF") two meters above the ground at the proposed WFXV-DT tower site will be calculated. The RFF level study will include the following stations:

WFXV-DT	Channel 27	DTV (Proposed)
WFXV-TV	Channel 33	TV
WFGO(FM)	Channel 234A	FM
WQHZ(FM)	Channel 272A	FM

According to the FCC database, there are no other stations located within 500 meters of the site.

RFF Calculations

The RFF contribution of each broadcast station will be calculated using the following formula abstracted from OET Bulletin No. 65 dated August 1997:

$$S = \frac{33.4(F^2) \text{ Total ERP}}{R^2}$$

where:

S = power density in $\mu\text{W}/\text{cm}^2$

F = relative field factor

Total ERP = ERP Horizontal Polarization + ERP Vertical Polarization

R = RCAGL - 2 meters

ERP = RMS ERP in watts for DTV Stations and FM Stations.

ERP = $[0.4\text{ERP}_V + \text{ERP}_A]$ for NTSC Stations

ERP_V = peak visual ERP in watts

ERP_A = RMS aural ERP in watts

Total ERP

The broadcast stations are operating or propose to operate with the following ERP values:

<u>Station</u>	<u>ERP Horizontal</u> (kW)	<u>ERP Vertical</u> (kW)	<u>Total ERP (H + V)</u> (watts)
WFXV-DT (Proposed) Channel 27	1000	0	1,000,000
WFXV-TV (Channel 33)	851	0	851,000
WSKS(FM) (Channel 250A)	1.5	1.5	3,000
WUMX(FM) (Channel 273B)	27	27	54,000

Radiofrequency Field

The RFF has been calculated two meters above the ground in the vicinity of the proposed WFXV-DT operation. The RFF contributed by each station has been determined using the total ERP values and relative field values. FM stations are assumed to have a relative field value of 0.25, WFXV-DT is proposed to have a relative field value of less than 0.1 from 40° to 90° below the horizontal, and WFXV-TV is assumed to have relative field value of less than 0.15. Assumed values have been abstracted directly from the RFF analysis¹ accompanying the outstanding construction permit (FCC File No. BPCDT-19991029AIE) which was completed by Cohen, Dippell and Everist, P.C. in October 1999. Except for the proposed modification of WFXV-DT, no technical changes have been requested to any of the stations included in this report.

¹Entitled, "Engineering Statement Re RF Field Analysis, WFXV-DT, Utica, New York, October 1999."

The antenna height above ground, minus two meters, is listed for each station. The RFF limit, based on an uncontrolled environment, will be calculated for each station. The percentage contribution of each station will also be provided.

<u>Station</u>	<u>ERP</u> (watts)	<u>RCAGL-2</u> (meters)	<u>F</u>	<u>S</u> ($\mu\text{W}/\text{cm}^2$)	<u>Uncontrolled</u> <u>Limit</u> ($\mu\text{W}/\text{cm}^2$)	<u>Percent</u> (%)
WFXV-DT (Proposed) (Channel 27)	1,000,000	150.1	0.1	14.8	367	4.0%
WFXV-TV (Channel 33)	425,500	46	0.15	151.2	389	38.9%
WSKS(FM) (Channel 250A)	3,000	57	0.25	1.9	200	1.0%
WUMX(FM) (Channel 273B)	54,000	51	0.25	43.4	200	21.7%

Total RFF at WFXV-DT Tower Site

The total percentage of RFF can be calculated by combining the percentage contribution of each station.

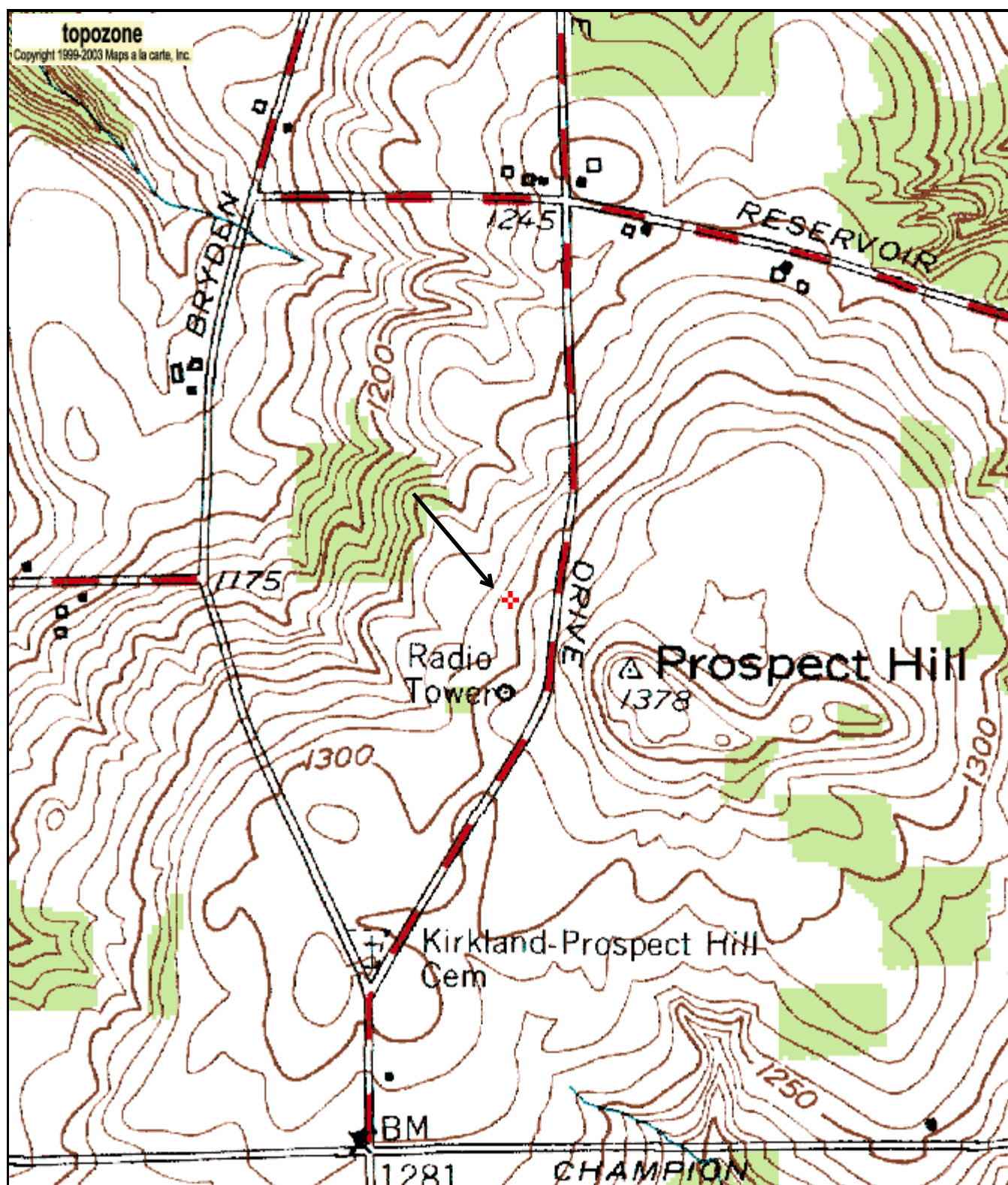
The total RFF contribution of all stations two meters above ground in the vicinity of the WFXV-DT tower is no more than 65.6% of the FCC guidelines for an uncontrolled environment which is no more than 13.2% of the FCC guidelines for a controlled environment when WFXV-DT is operational. Further, once WFXV-TV ceases its operation on or before February 17, 2009, the total post-transition RFF contributor of all stations two meters above ground in the vicinity of the

WFXV-DT tower will be no more than 26.7% of the FCC guidelines for an uncontrolled environment which will be no more than 5.4% of the FCC guidelines for a controlled environment.

Authorized personnel and rigging contractors will be alerted to the potential zone of high field levels on the tower, and if necessary, the station will operate with reduced power or terminate the operation of the transmitter as appropriate when it is necessary for authorized personnel or contractors to perform work on the tower. Workers and the general public, therefore, will not be subjected to RFF levels in excess of the current FCC guidelines.

Environmental Assessment

According to the permittee, the environmental processing requirement imposed in WT No. Docket 03-128 has been addressed in a separate filing.



0 0.1 0.2 0.3 0.4 0.5 km
0 0.09 0.18 0.27 0.36 0.45 mi

43° 02' 19"N, 75° 26' 49"W (NAD27)
Elevation 1,292.4 ft / 393.9 m (USGS NED)
Prospect Hill, USGS Clinton (NY) Quadrangle
Projection is UTM Zone 18 NAD83 Datum

M
G
M=-13.043
G=-0.305

ABOVE MEAN SEA LEVEL

ABOVE GROUND

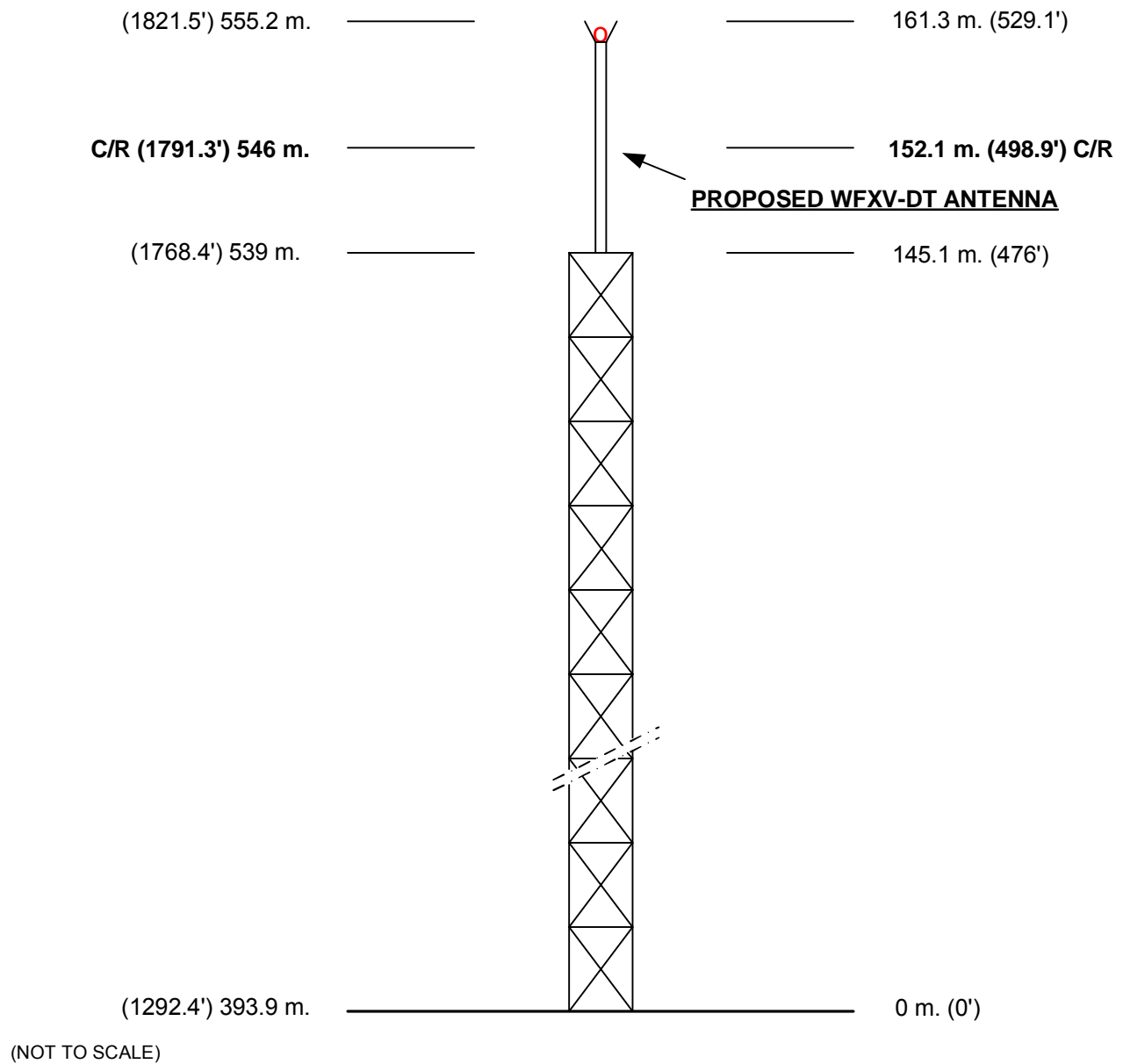


EXHIBIT E - 2
VERTICAL SKETCH
FOR THE PROPOSED OPERATION OF
WFXV-DT, UTICA, NEW YORK
DECEMBER 2007

COHEN, DIPPELL AND EVERIST, P.C.

EXHIBIT E-3

ANTENNA ELEVATION DATA

WFXV-DT, UTICA, NEW YORK



Proposal #: **C-01491** Antenna Type: **TFU-26GTH-R P260SP** Channel: **27 DTV**
 Call Letters: **WFXV-DT** Location: **Utica, NY**

Electrical Specifications		Value		Remarks	
		Ratio	dBd		
RMS Gain at Main Lobe over Halfwave Dipole	Hpol	21.5	13.32		
	Vpol				
RMS Gain at Horizontal over Halfwave Dipole	Hpol	12.0	10.79		
	Vpol				
Peak Directional Gain over Halfwave Dipole	Hpol	55.9	17.47		
	Vpol				
Peak Directional Gain at Horizontal over Halfwave Dipole	Hpol	31.1	14.93		
	Vpol				
Circularity Directional		dB			
Axial Ratio		dB			
Beam Tilt		1.00 deg			
Average Power	DTV	20 kW	13.01 dBk		
Antenna Input:	T/L	3 1/8 in	50.0 ohm	Type:	EIA/DCA
Maximum Antenna Input VSWR		Channel 1.08 : 1		Notes:	
Patterns	Azimuth	TFU-P260SP-5510			
	Elevation	26G215100	26G215100-90		
Mechanical Specifications		Metric	English		Preliminary
Height with Lightning Protector	H4	16.2 m	53.3 ft		
Height Less Lightning Protector	H2	15.0 m	49.3 ft	TIA/EIA-222-F.	
Height of Center of Radiation	H3	8.0 m	24.7 ft		
Basic Wind Speed	V	112.7 km/h	70 mi/h		
Force Coeff. x Projected Area	CaAc	4.7 m²	50.9 ft²	Above base flange	
Moment Arm	D1	8.1 m	26.6 ft	Above base flange	
Force Coeff. x Projected Area	CaAc	m²	ft²		
Moment Arm	D3	m	ft		
Pole Bury Length	D2	m	ft		
Weight	W	2.9 t	6,300 lbs		
Radome					
Antenna designed in accordance with AISC specifications for design of structural steel for building as prescribed by TIA/EIA-222-F.					

NOTE:

Prepared By : **SWB** Approved By : **JLS**
 Original Date : **13-Jun-07**

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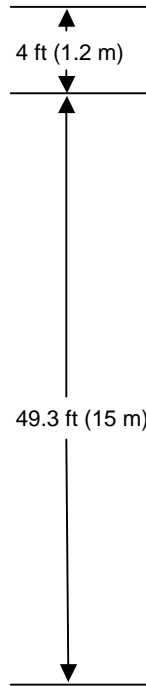
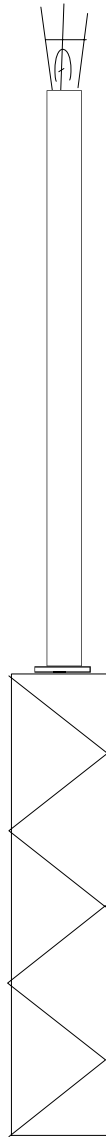


Proposal #: **C-01491**
Call Letters: **WFXV-DT**

Antenna Type:
Location:

TFU-26GTH-R P260SP
Utica, NY

Channel: **27 DTV**



Mechanical Specifications
TIA/EIA-222-F. @ 70 mi/h (112.7 km/h)

CaAc = 50.9 ft²(4.7 m²)
D1 = 26.6 ft(8.11 m)
W = 6300 lbs(2.9 t)

TFU-26GTH-R P260SP
Channel: D27

SWB-070613-6

Not to Scale

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Proposal Number	C-01491		
Date	13-Jun-07		
Call Letters	WFXV-DT	Channel	27
Location	Utica, NY		
Customer			
Antenna Type	TFU-26GTH-R P260SP		

SYSTEM SUMMARY

Antenna:

Type:	TFU-26GTH-R P260SP	ERP:	1000 kW	H Pol (30.00 dBk)
Channel:	27	Peak Gain*:	55.9	(17.47 dB)
Location:	Utica, NY	Input Power:	17.9 kW	(12.53 dBk)

Transmission Line:

Type:	EIA/DCA	Attenuation:	0.79 dB
Size:	4-1/16 in	Efficiency:	83.3%
Impedance:	50 ohm		
Length:	500 ft	152.4 m	

Transmitter:

Power Required: **21.5 kW** (13.32 dBk)

* Gain is with respect to half wave dipole.

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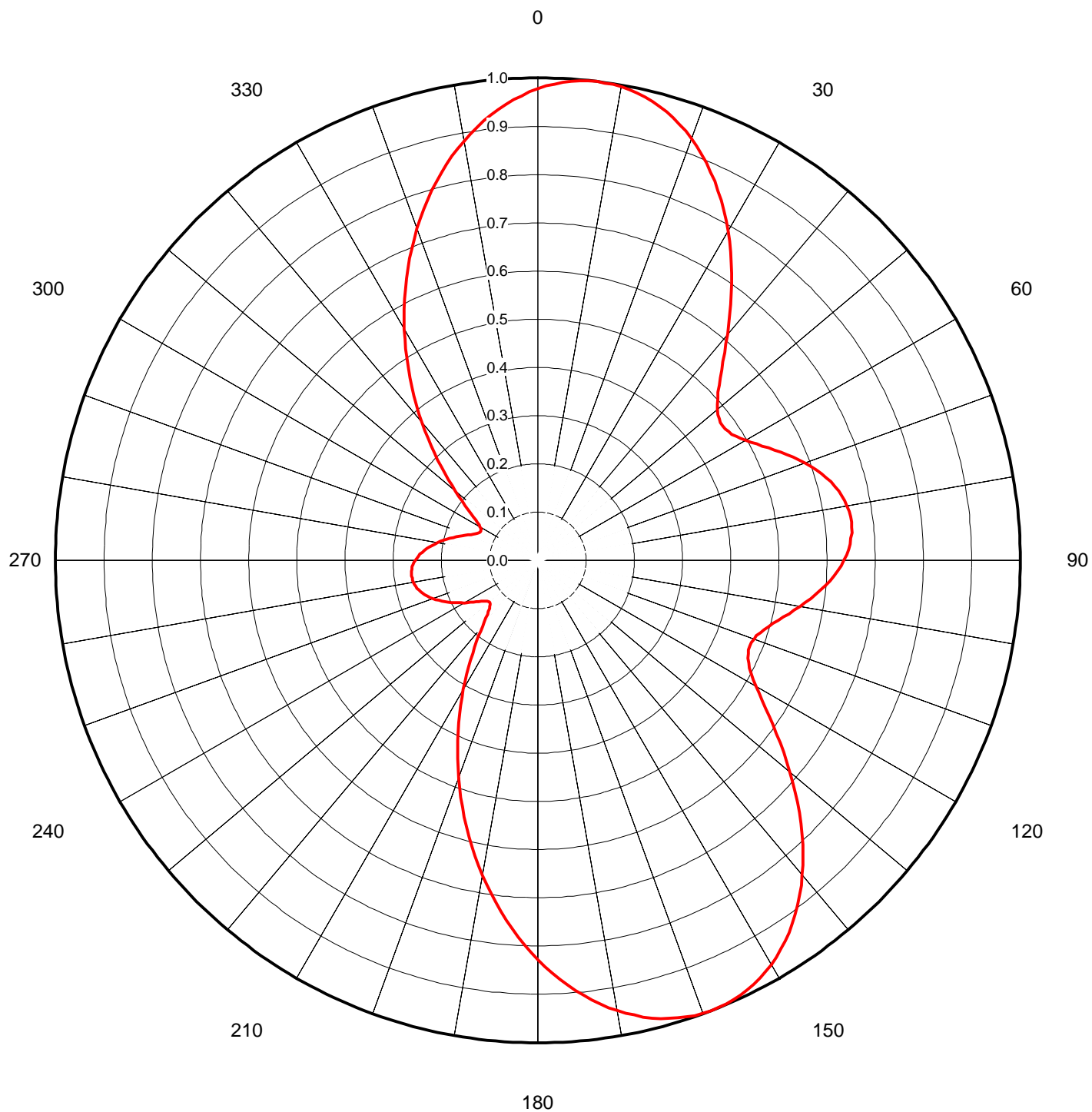


Proposal Number	C-01491	
Date	13-Jun-07	
Call Letters	WFXV-DT	Channel 27
Location	Utica, NY	
Customer		
Antenna Type	TFU-26GTH-R P260SP	

AZIMUTH PATTERN

Gain	2.60	(4.15 dB)
Calculated / Measured		Calculated

Frequency	551.00 MHz
Drawing #	TFU-P260SP-5510





Proposal Number **C-01491**
Date **13-Jun-07**
Call Letters **WFXV-DT** Channel **27**
Location **Utica, NY**
Customer
Antenna Type **TFU-26GTH-R P260SP**

TABULATION OF AZIMUTH PATTERN

Azimuth Pattern Drawing #: **TFU-P260SP-5510**

Angle	Field	Angle	Field	Angle	Field	Angle	Field	Angle	Field	Angle	Field	Angle	Field	Angle	Field
0	0.977	45	0.535	90	0.634	135	0.771	180	0.827	225	0.142	270	0.254	315	0.293
1	0.983	46	0.523	91	0.629	136	0.788	181	0.813	226	0.138	271	0.251	316	0.309
2	0.988	47	0.511	92	0.622	137	0.805	182	0.797	227	0.135	272	0.248	317	0.324
3	0.992	48	0.502	93	0.614	138	0.821	183	0.782	228	0.134	273	0.244	318	0.341
4	0.995	49	0.492	94	0.606	139	0.837	184	0.765	229	0.133	274	0.240	319	0.357
5	0.998	50	0.486	95	0.598	140	0.852	185	0.749	230	0.134	275	0.236	320	0.374
6	0.999	51	0.480	96	0.589	141	0.867	186	0.732	231	0.135	276	0.231	321	0.391
7	1.000	52	0.477	97	0.580	142	0.881	187	0.715	232	0.137	277	0.227	322	0.408
8	0.999	53	0.474	98	0.570	143	0.895	188	0.698	233	0.140	278	0.222	323	0.426
9	0.999	54	0.474	99	0.561	144	0.907	189	0.680	234	0.144	279	0.217	324	0.444
10	0.997	55	0.474	100	0.551	145	0.919	190	0.662	235	0.149	280	0.211	325	0.462
11	0.994	56	0.477	101	0.541	146	0.930	191	0.644	236	0.154	281	0.205	326	0.480
12	0.990	57	0.480	102	0.532	147	0.941	192	0.626	237	0.159	282	0.200	327	0.498
13	0.986	58	0.485	103	0.522	148	0.950	193	0.608	238	0.164	283	0.194	328	0.516
14	0.980	59	0.490	104	0.514	149	0.959	194	0.590	239	0.170	284	0.188	329	0.535
15	0.974	60	0.498	105	0.505	150	0.967	195	0.571	240	0.176	285	0.182	330	0.553
16	0.967	61	0.505	106	0.498	151	0.974	196	0.553	241	0.182	286	0.176	331	0.571
17	0.959	62	0.514	107	0.490	152	0.980	197	0.535	242	0.188	287	0.170	332	0.590
18	0.950	63	0.522	108	0.485	153	0.986	198	0.516	243	0.194	288	0.164	333	0.608
19	0.941	64	0.532	109	0.480	154	0.990	199	0.498	244	0.200	289	0.159	334	0.626
20	0.930	65	0.541	110	0.477	155	0.994	200	0.480	245	0.205	290	0.154	335	0.644
21	0.919	66	0.551	111	0.474	156	0.997	201	0.462	246	0.211	291	0.149	336	0.662
22	0.907	67	0.561	112	0.474	157	0.999	202	0.444	247	0.217	292	0.144	337	0.680
23	0.895	68	0.570	113	0.474	158	0.999	203	0.426	248	0.222	293	0.140	338	0.698
24	0.881	69	0.580	114	0.477	159	1.000	204	0.408	249	0.227	294	0.137	339	0.715
25	0.867	70	0.589	115	0.480	160	0.999	205	0.391	250	0.231	295	0.135	340	0.732
26	0.852	71	0.598	116	0.486	161	0.998	206	0.374	251	0.236	296	0.134	341	0.749
27	0.837	72	0.606	117	0.492	162	0.995	207	0.357	252	0.240	297	0.133	342	0.765
28	0.821	73	0.614	118	0.502	163	0.992	208	0.341	253	0.244	298	0.134	343	0.782
29	0.805	74	0.622	119	0.511	164	0.988	209	0.324	254	0.248	299	0.135	344	0.797
30	0.788	75	0.629	120	0.523	165	0.983	210	0.309	255	0.251	300	0.138	345	0.813
31	0.771	76	0.634	121	0.535	166	0.977	211	0.293	256	0.254	301	0.142	346	0.827
32	0.754	77	0.640	122	0.549	167	0.971	212	0.278	257	0.257	302	0.147	347	0.842
33	0.736	78	0.644	123	0.563	168	0.964	213	0.264	258	0.259	303	0.153	348	0.856
34	0.718	79	0.648	124	0.579	169	0.956	214	0.250	259	0.261	304	0.161	349	0.870
35	0.700	80	0.651	125	0.595	170	0.947	215	0.236	260	0.262	305	0.169	350	0.882
36	0.682	81	0.653	126	0.612	171	0.938	216	0.223	261	0.263	306	0.178	351	0.895
37	0.664	82	0.654	127	0.628	172	0.928	217	0.211	262	0.263	307	0.188	352	0.906
38	0.646	83	0.655	128	0.646	173	0.918	218	0.199	263	0.264	308	0.199	353	0.918
39	0.628	84	0.654	129	0.664	174	0.906	219	0.188	264	0.263	309	0.211	354	0.928
40	0.612	85	0.653	130	0.682	175	0.895	220	0.178	265	0.263	310	0.223	355	0.938
41	0.595	86	0.651	131	0.700	176	0.882	221	0.169	266	0.262	311	0.236	356	0.947
42	0.579	87	0.648	132	0.718	177	0.870	222	0.161	267	0.261	312	0.250	357	0.956
43	0.563	88	0.644	133	0.736	178	0.856	223	0.153	268	0.259	313	0.264	358	0.964
44	0.549	89	0.640	134	0.754	179	0.842	224	0.147	269	0.257	314	0.278	359	0.971

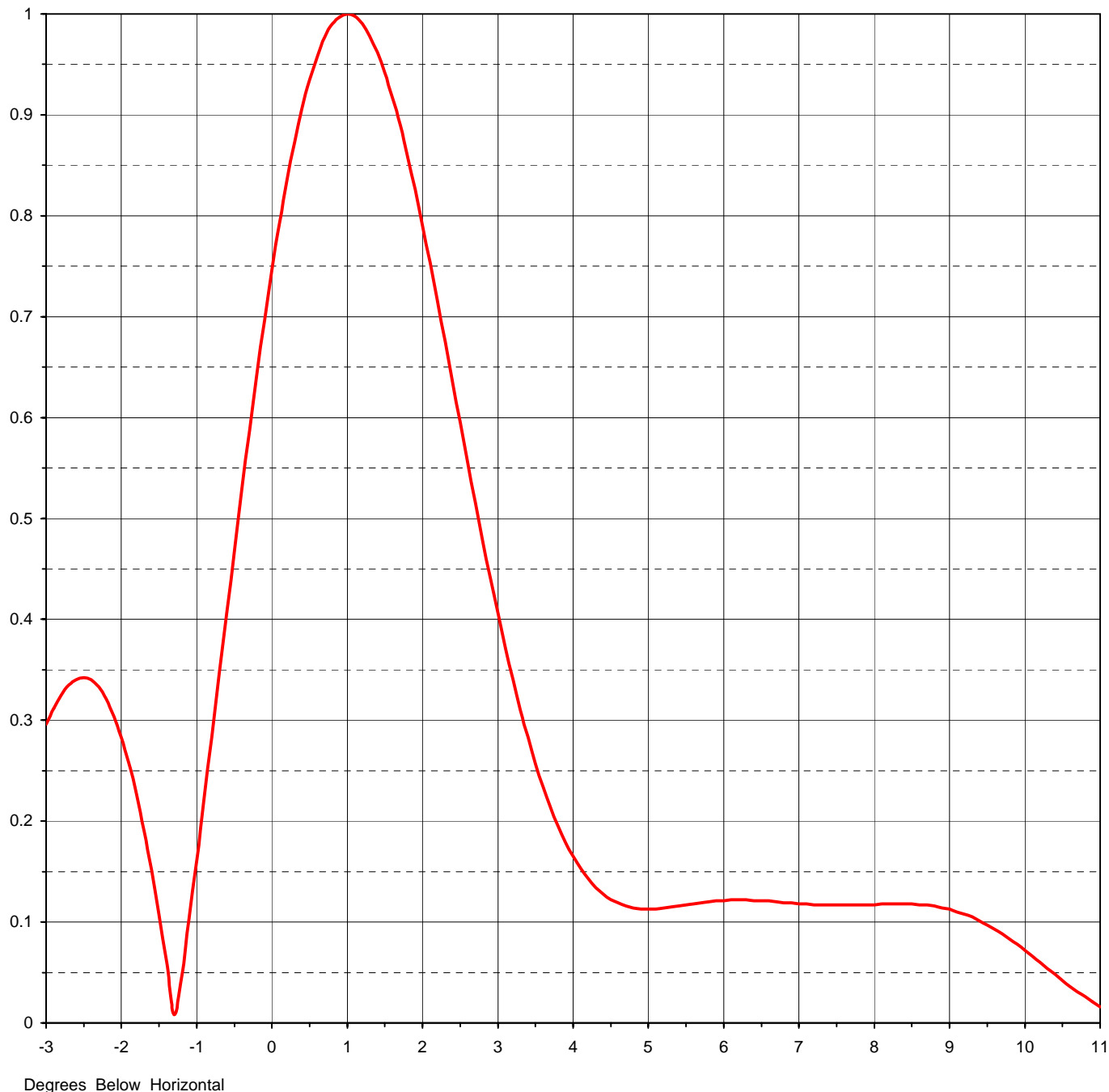
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Proposal Number	C-01491	
Date	13-Jun-07	
Call Letters	WFXV-DT	Channel 27
Location	Utica, NY	
Customer		
Antenna Type	TFU-26GTH-R P260SP	

ELEVATION PATTERN

RMS Gain at Main Lobe	21.50 (13.32 dB)	Beam Tilt	1.00 deg
RMS Gain at Horizontal	12.00 (10.79 dB)	Frequency	551.00 MHz
Calculated / Measured	Calculated	Drawing #	26G215100

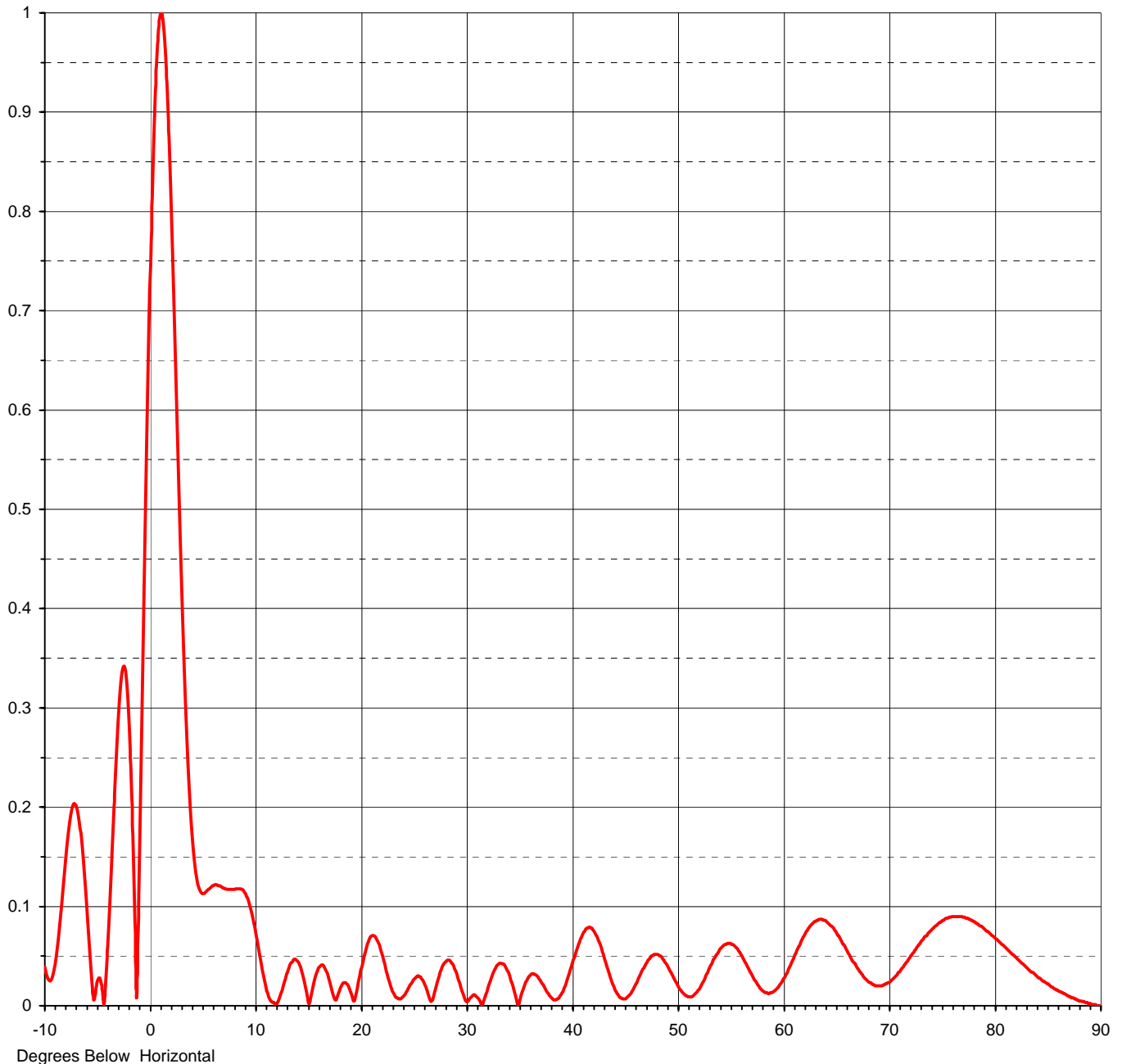




Proposal Number	C-01491	
Date	13-Jun-07	
Call Letters	WFXV-DT	Channel 27
Location	Utica, NY	
Customer		
Antenna Type	TFU-26GTH-R P260SP	

ELEVATION PATTERN

RMS Gain at Main Lobe	21.50 (13.32 dB)	Beam Tilt	1.00 deg
RMS Gain at Horizontal	12.00 (10.79 dB)	Frequency	551.00 MHz
Calculated / Measured	Calculated	Drawing #	26G215100-90





Proposal Number **C-01491**
Date **13-Jun-07**
Call Letters **WFXV-DT** Channel **27**
Location **Utica, NY**
Customer
Antenna Type **TFU-26GTH-R P260SP**

TABULATION OF ELEVATION PATTERN

Elevation Pattern Drawing #: **26G215100-90**

Angle	Field	Angle	Field	Angle	Field	Angle	Field	Angle	Field	Angle	Field
-10.0	0.039	2.4	0.635	10.6	0.042	30.5	0.009	51.0	0.009	71.5	0.042
-9.5	0.025	2.6	0.556	10.8	0.031	31.0	0.009	51.5	0.010	72.0	0.050
-9.0	0.043	2.8	0.478	11.0	0.021	31.5	0.000	52.0	0.016	72.5	0.057
-8.5	0.090	3.0	0.406	11.5	0.005	32.0	0.015	52.5	0.025	73.0	0.065
-8.0	0.149	3.2	0.340	12.0	0.002	32.5	0.031	53.0	0.037	73.5	0.071
-7.5	0.194	3.4	0.283	12.5	0.013	33.0	0.041	53.5	0.048	74.0	0.077
-7.0	0.201	3.6	0.234	13.0	0.031	33.5	0.042	54.0	0.057	74.5	0.082
-6.5	0.163	3.8	0.195	13.5	0.044	34.0	0.033	54.5	0.062	75.0	0.086
-6.0	0.092	4.0	0.165	14.0	0.045	34.5	0.016	55.0	0.063	75.5	0.088
-5.5	0.017	4.2	0.143	14.5	0.031	35.0	0.003	55.5	0.059	76.0	0.090
-5.0	0.026	4.4	0.128	15.0	0.006	35.5	0.020	56.0	0.052	76.5	0.090
-4.5	0.010	4.6	0.119	15.5	0.020	36.0	0.030	56.5	0.042	77.0	0.089
-4.0	0.070	4.8	0.114	16.0	0.038	36.5	0.031	57.0	0.032	77.5	0.087
-3.5	0.187	5.0	0.113	16.5	0.040	37.0	0.026	57.5	0.023	78.0	0.085
-3.0	0.296	5.2	0.114	17.0	0.027	37.5	0.017	58.0	0.016	78.5	0.081
-2.8	0.325	5.4	0.116	17.5	0.008	38.0	0.009	58.5	0.013	79.0	0.077
-2.6	0.340	5.6	0.118	18.0	0.015	38.5	0.006	59.0	0.013	79.5	0.073
-2.4	0.340	5.8	0.120	18.5	0.023	39.0	0.011	59.5	0.018	80.0	0.068
-2.2	0.321	6.0	0.121	19.0	0.016	39.5	0.023	60.0	0.026	80.5	0.063
-2.0	0.283	6.2	0.122	19.5	0.007	40.0	0.040	60.5	0.037	81.0	0.058
-1.8	0.226	6.4	0.121	20.0	0.034	40.5	0.058	61.0	0.048	81.5	0.053
-1.6	0.151	6.6	0.121	20.5	0.057	41.0	0.072	61.5	0.060	82.0	0.048
-1.4	0.060	6.8	0.119	21.0	0.070	41.5	0.078	62.0	0.071	82.5	0.043
-1.2	0.046	7.0	0.118	21.5	0.067	42.0	0.076	62.5	0.079	83.0	0.038
-1.0	0.161	7.2	0.117	22.0	0.053	42.5	0.066	63.0	0.085	83.5	0.034
-0.8	0.283	7.4	0.117	22.5	0.032	43.0	0.051	63.5	0.087	84.0	0.029
-0.6	0.407	7.6	0.117	23.0	0.015	43.5	0.034	64.0	0.086	84.5	0.025
-0.4	0.529	7.8	0.117	23.5	0.008	44.0	0.019	64.5	0.080	85.0	0.022
-0.2	0.643	8.0	0.117	24.0	0.009	44.5	0.009	65.0	0.073	85.5	0.018
0.0	0.746	8.2	0.118	24.5	0.017	45.0	0.007	65.5	0.064	86.0	0.015
0.2	0.835	8.4	0.118	25.0	0.026	45.5	0.011	66.0	0.055	86.5	0.012
0.4	0.906	8.6	0.117	25.5	0.030	46.0	0.020	66.5	0.045	87.0	0.009
0.6	0.958	8.8	0.116	26.0	0.024	46.5	0.031	67.0	0.037	87.5	0.007
0.8	0.990	9.0	0.113	26.5	0.009	47.0	0.042	67.5	0.029	88.0	0.005
1.0	1.000	9.2	0.108	27.0	0.014	47.5	0.050	68.0	0.024	88.5	0.003
1.2	0.990	9.4	0.101	27.5	0.033	48.0	0.052	68.5	0.021	89.0	0.002
1.4	0.962	9.6	0.093	28.0	0.044	48.5	0.049	69.0	0.020	89.5	0.001
1.6	0.917	9.8	0.088	28.5	0.045	49.0	0.041	69.5	0.021	90.0	0.000
1.8	0.859	10.0	0.078	29.0	0.035	49.5	0.031	70.0	0.024		
2.0	0.790	10.2	0.066	29.5	0.018	50.0	0.021	70.5	0.029		
2.2	0.715	10.4	0.054	30.0	0.004	50.5	0.013	71.0	0.035		

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TABLE I
COMPUTED COVERAGE DATA
FOR THE PROPOSED DTV OPERATION OF
WFXV-DT, UTICA, NEW YORK
CHANNEL 27 1000 KW ERP 272 METERS HAAT
DECEMBER 2007

<u>Radial</u> N ° E, T	<u>Average*</u> <u>Elevation</u> meters	<u>Effective</u> <u>Height</u> meters	<u>Depression</u> <u>Angle</u> degrees	<u>ERP</u> kW	<u>Distance to Contour</u>	
					<u>48 dBu</u> <u>City Grade</u> km	<u>41 dBu</u> <u>Noise-Limited</u> km
0	189.0	357.0	0.523	954.5	88.8	102.0
7	191.9	354.1	0.521	1000.0	88.9	102.2
10	192.0	354.0	0.521	994.0	88.9	102.1
20	197.1	348.9	0.517	864.9	87.3	100.5
30	184.3	361.7	0.527	620.9	86.0	98.7
40	173.4	372.6	0.535	374.5	83.4	95.3
50	185.6	360.4	0.526	236.2	79.3	90.8
60	177.8	368.2	0.532	248.0	80.3	91.8
70	182.7	363.3	0.528	346.9	82.1	94.0
80	224.4	321.6	0.497	423.8	79.4	91.7
90	255.4	290.6	0.472	402.0	76.0	87.4
100	299.1	246.9	0.435	303.6	70.9	79.7
110	346.3	199.7	0.391	227.5	66.4	74.3
120	362.3	183.7	0.375	273.5	66.2	74.1
130	363.9	182.1	0.374	465.1	68.6	76.9
140	367.6	178.4	0.370	725.9	70.5	79.4
150	338.0	208.0	0.399	935.1	73.8	84.2
159	308.1	237.9	0.427	1000.0	76.4	88.3
160	309.5	236.5	0.426	998.0	76.3	88.1
170	347.3	198.7	0.390	896.8	72.9	82.9
180	367.3	178.7	0.370	683.9	70.2	79.1
190	382.7	163.3	0.354	438.2	67.0	75.1
200	368.0	178.0	0.370	230.4	65.1	72.8
210	376.5	169.5	0.361	95.5	60.5	67.8
220	389.1	156.9	0.347	31.7	54.3	62.0
230	351.7	194.3	0.386	18.0	53.9	61.8
240	324.5	221.5	0.412	31.0	58.4	66.1
250	303.4	242.6	0.431	53.4	62.4	70.0
260	285.3	260.7	0.447	68.6	64.7	72.5

TABLE I
COMPUTED COVERAGE DATA
FOR THE PROPOSED DTV OPERATION OF
WFXV-DT, UTICA, NEW YORK
CHANNEL 27 1000 KW ERP 272 METERS HAAT
DECEMBER 2007
 (continued)

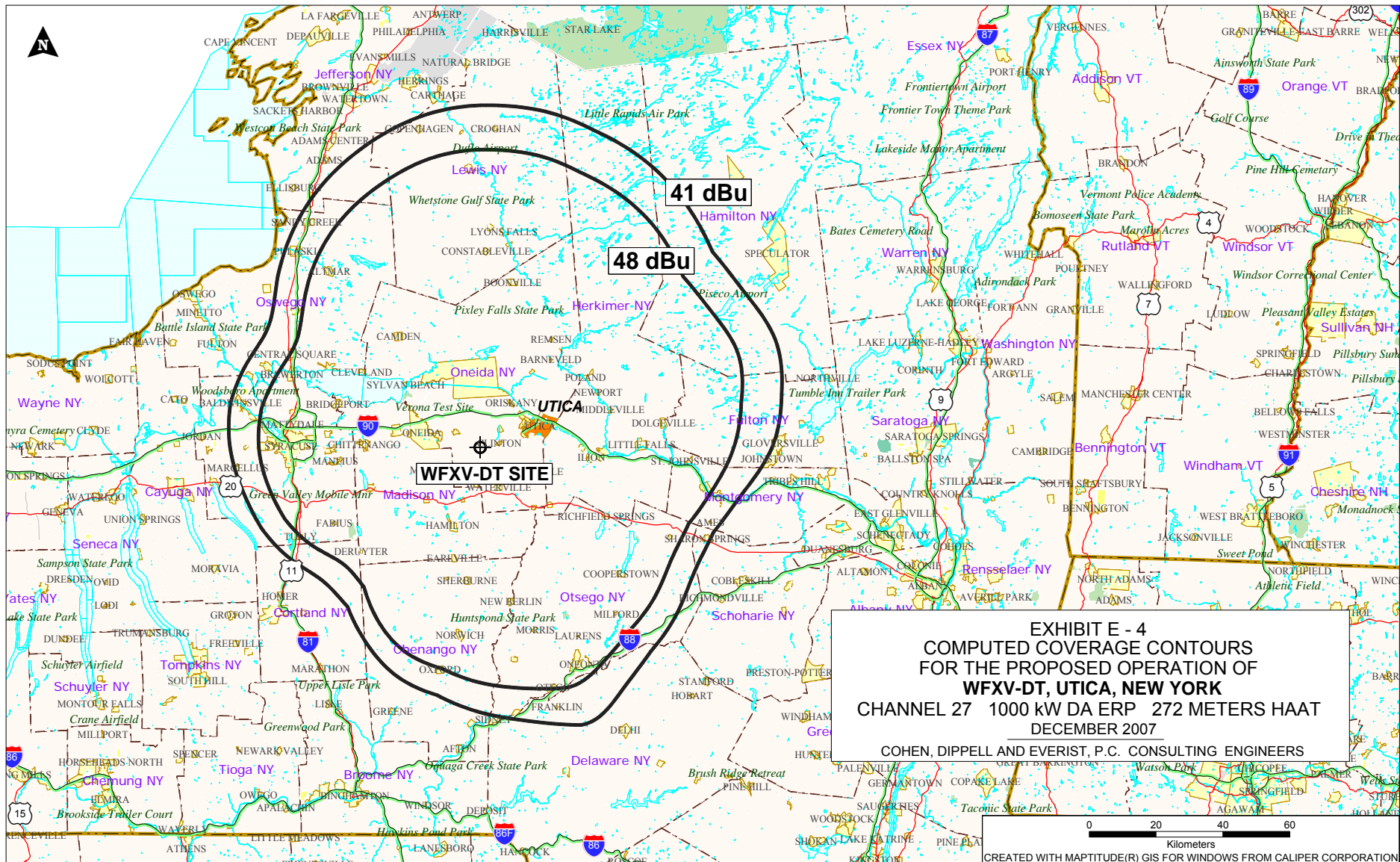
<u>Radial</u> N ° E, T	<u>Average*</u> <u>Elevation</u> meters	<u>Effective</u> <u>Height</u> meters	<u>Depression</u> <u>Angle</u> degrees	<u>ERP</u> kW	<u>Distance to Contour</u>	
					<u>48 dBu</u> <u>City Grade</u> km	<u>41 dBu</u> <u>Noise-Limited</u> km
270	251.6	294.4	0.475	64.5	66.4	75.0
280	215.8	330.2	0.503	44.5	66.6	76.1
290	190.3	355.7	0.522	23.7	64.6	74.3
300	186.8	359.2	0.525	19.0	63.6	73.1
310	189.7	356.3	0.523	49.7	68.8	79.3
320	190.9	355.1	0.522	139.9	75.3	86.3
330	192.4	353.6	0.521	305.8	80.4	92.2
340	192.6	353.4	0.521	535.8	84.2	96.8
350	187.1	358.9	0.525	777.9	87.5	100.4

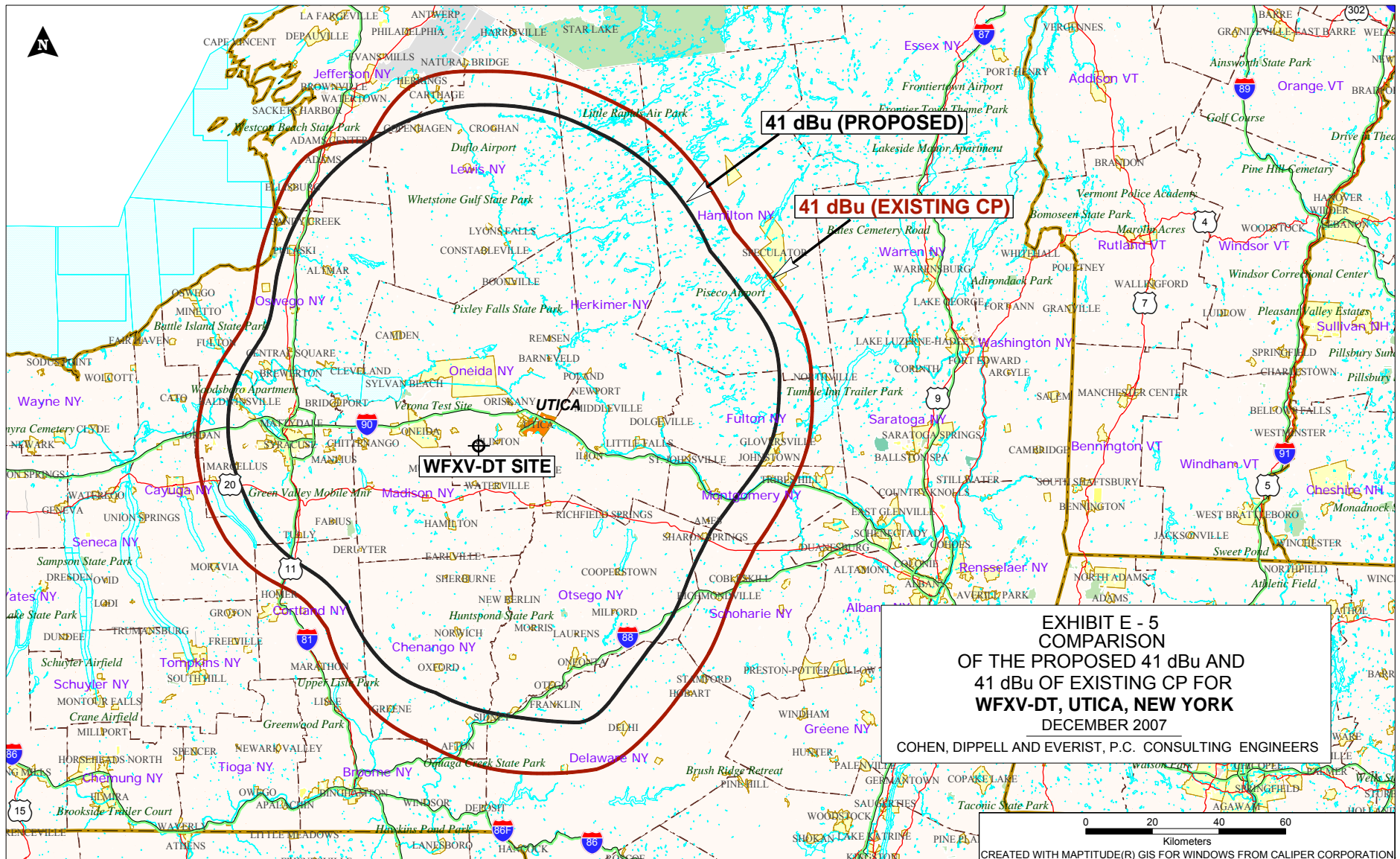
*Based on data from FCC 3-second data base.

DTV Channel 27 (548-554 MHz)
 Average Elevation 3.2 to 16.1 km 274 meters AMSL
 Center of Radiation 546 meters AMSL
 Antenna Height Above Average Terrain 272 meters
 Effective Radiated Power 1000 kW (30 dBk) Max

North Latitude: 43° 02' 19"
 West Longitude: 75° 26' 49"

(NAD-27)





SECTION III-D - DTV Engineering

Complete Questions 1-5 of the Certification Checklist and provide all data and information for the proposed facility, as requested in Technical Specifications, Items 1-13.

Certification Checklist: A correct answer of "Yes" to all of the questions below will ensure an expeditious grant of a construction permit. However, if the proposed facility is located within the Canadian or Mexican borders, coordination of the proposal under the appropriate treaties may be required prior to grant of the application. An answer of "No" will require additional evaluation of the applicable information in this form before a construction permit can be granted.

1. The proposed DTV facility complies with 47 C.F.R. Section 73.622 in the following respects:

- (a) It will operate on the DTV channel for this station as established in 47 C.F.R. Section 73.622. ☐ Yes ☐ No
- (b) It will operate from a transmitting antenna located within 5.0 km (3.1 miles) of the DTV reference site for this station as established in 47 C.F.R. Section 73.622. ☐ Yes ☐ No
- (c) It will operate with an effective radiated power (ERP) and antenna height above average terrain (HAAT) that do not exceed the DTV reference ERP and HAAT for this station as established in 47 C.F.R. Section 73.622. ☐ Yes ☐ No

2. The proposed facility will not have a significant environmental impact, including exposure of workers or the general public to levels of RF radiation exceeding the applicable health and safety guidelines, and therefore will not come within 47 C.F.R. Section 1.1307. ☐ Yes ☐ No

Applicant must **submit the Exhibit** called for in Item 13.

3. Pursuant to 47 C.F.R. Section 73.625, the DTV coverage contour of the proposed facility will encompass the allotted principal community. ☐ Yes ☐ No
4. The requirements of 47 C.F.R. Section 73.1030 regarding notification to radio astronomy installations, radio receiving installations and FCC monitoring stations have either been satisfied or are not applicable. ☐ Yes ☐ No
5. The antenna structure to be used by this facility has been registered by the Commission and will not require reregistration to support the proposed antenna, OR the FAA has previously determined that the proposed structure will not adversely effect safety in air navigation and this structure qualifies for later registration under the Commission's phased registration plan, OR the proposed installation on this structure does not require notification to the FAA pursuant to 47 C.F.R. Section 17.7. ☐ Yes ☐ No

SECTION III-D DTV Engineering

TECHNICAL SPECIFICATIONS

Ensure that the specifications below are accurate. Contradicting data found elsewhere in this application will be disregarded. All items must be completed. The response "on file" is not acceptable.

TECH BOX

1. Channel Number: DTV _____ Analog TV, if any _____

2. Zone: ☐ I ☐ II ☐ III

3. Antenna Location Coordinates: (NAD 27)

_____ ° _____ ' _____ " ☐ N ☐ S Latitude
_____ ° _____ ' _____ " ☐ E ☐ W Longitude

4. Antenna Structure Registration Number: _____

☐ Not applicable ☐ FAA Notification Filed with FAA

5. Antenna Location Site Elevation Above Mean Sea Level: _____ meters

6. Overall Tower Height Above Ground Level: _____ meters

7. Height of Radiation Center Above Ground Level: _____ meters

8. Height of Radiation Center Above Average Terrain: _____ meters

9. Maximum Effective Radiated Power (average power): _____ kW

10. Antenna Specifications:

a.

Manufacturer	Model
--------------	-------

b. Electrical Beam Tilt: _____ degrees ☐ Not Applicable

c. Mechanical Beam Tilt: _____ degrees toward azimuth _____ degrees True ☐ Not Applicable

Attach as an Exhibit all data specified in 47 C.F.R. Section 73.625(c).

Exhibit No.

d. Polarization: ☐ Horizontal ☐ Circular ☐ Elliptical

TECH BOX

e. Directional Antenna Relative Field Values: ☐ Not applicable (Nondirectional)

Rotation: _____ ° ☐ No rotation

Degree	Value	Degree	Value	Degree	Value	Degree	Value	Degree	Value	Degree	Value
0		60		120		180		240		300	
10		70		130		190		250		310	
20		80		140		200		260		320	
30		90		150		210		270		330	
40		100		160		220		280		340	
50		110		170		230		290		350	
Additional Azimuths											

If a directional antenna is proposed, the requirements of 47 C.F.R. Section 73.625(c) must be satisfied. **Exhibit required.**

Exhibit No.

11. Does the proposed facility satisfy the interference protection provisions of 47 C.F.R. Section 73.623(a)? (Applicable only if **Certification Checklist** Items 1(a), (b), or (c) are answered "No.") ☐ Yes ☐ No

If "No," attach as an Exhibit justification therefor, including a summary of any related previously granted waivers.

Exhibit No.

12. If the proposed facility will not satisfy the coverage requirement of 47 C.F.R. Section 73.625, attach as an Exhibit justification therefor. (Applicable only if **Certification Checklist** Item 3 is answered "No.")

Exhibit No.

13. **Environmental Protection Act. Submit in an Exhibit** the following:

Exhibit No.

- a. If **Certification Checklist** Item 2 is answered "Yes," a brief explanation of why an Environmental Assessment is not required. Also describe in the Exhibit the steps that will be taken to limit RF radiation exposure to the public and to persons authorized access to the tower site.

By checking "Yes" to **Certification Checklist** Item 2, the applicant also certifies that it, in coordination with other users of the site, will reduce power or cease operation as necessary to protect persons having access to the site, tower or antenna from radiofrequency electromagnetic exposure in excess of FCC guidelines.

If **Certification Checklist** Item 2 is answered "No," an Environmental Assessment as required by 47 C.F.R. Section 1.1311.

PREPARER'S CERTIFICATION IN SECTION III MUST BE COMPLETED AND SIGNED.

WFXV


I certify that the statements in this application are true, complete, and correct to the best of my knowledge and belief, and are made in good faith. I acknowledge that all certifications and attached Exhibits are considered material representations. I hereby waive any claim to the use of any particular frequency as against the regulatory power of the United States because of the previous use of the same, whether by license or otherwise, and request an authorization in accordance with this application. (See Section 304 of the Communications Act of 1934, as amended.)

Typed or Printed Name of Person Signing	Typed or Printed Title of Person Signing
Signature	Date

WILLFUL FALSE STATEMENTS ON THIS FORM ARE PUNISHABLE BY FINE AND/OR IMPRISONMENT (U.S. CODE, TITLE 18, SECTION 1001), AND/OR REVOCATION OF ANY STATION LICENSE OR CONSTRUCTION PERMIT (U.S. CODE, TITLE 47, SECTION 312(a)(1)), AND/OR FORFEITURE (U.S. CODE, TITLE 47, SECTION 503).

SECTION III PREPARER'S CERTIFICATION

I certify that I have prepared Section III (Engineering Data) on behalf of the applicant, and that after such preparation, I have examined and found it to be accurate and true to the best of my knowledge and belief.

Name Martin R. Doczkat	Relationship to Applicant (e.g., Consulting Engineer) Consulting Engineer	
Signature 	Date December 12, 2007	
Mailing Address Cohen, Dippell and Everist, P.C., 1300 L Street, NW, Suite 1100		
City Washington	State or Country (if foreign address) DC	ZIP Code 20005
Telephone Number (include area code) (202) 898-0111	E-Mail Address (if available) cde@attglobal.net	

WILLFUL FALSE STATEMENTS ON THIS FORM ARE PUNISHABLE BY FINE AND/OR IMPRISONMENT (U.S. CODE, TITLE 18, SECTION 1001), AND/OR REVOCATION OF ANY STATION LICENSE OR CONSTRUCTION PERMIT (U.S. CODE, TITLE 47, SECTION 312(a)(1)), AND/OR FORFEITURE (U.S. CODE, TITLE 47, SECTION 503).