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**LEHIGH VALLEY PUBLIC TELECOMMUNICATIONS CORPORATION**

**LICENSEE OF WLVT-DT**

**ALLENTOWN, PENNSYLVANIA**

**FCC FILE No. BLEDT-20030131AEW**

**FACILITY ID 36989**

**APPLICATION FOR A MODIFICATION OF LICENSE TO SPECIFY POST  
DTV TRANSITION OPERATION ON CHANNEL 39**

**RFR STATEMENT EXHIBIT 34**

**January 31, 2008**

**LEHIGH VALLEY PUBLIC TELECOMMUNICATIONS CORPORATION**

**LICENSEE OF WLVT-DT**

**ALLENTOWN, PENNSYLVANIA**

**FCC FILE No. BLEDT-20030131AEW**

**ANTENNA DATA ENGINEERING EXHIBIT 34**

This application is for a modification of License for WLVT-DT to return post transition to its analog channel, Channel 39. Lehigh Valley Public Telecommunications Corporation, Licensee of WLVT-DT, is currently in full compliance with the RFR energy requirements of 47 CFR 1.1310.

The post transition operation of WLVT-DT will be on Channel 39 from the currently licensed WLVT-DT, Channel 62 site and with 44.5 kW directional and with horizontal polarization. The proposed pattern data is included herein and includes tabulations of the azimuth and elevation patterns along with a composite azimuth and elevation plot. The azimuth plot is shown non-rotated.

**LEHIGH VALLEY PUB TELECOMS COUNCIL  
WLVT-DT**

**EXHIBIT 34 - TABLE 1**

PSI PSILPT16OM-39 (NO ROTATION)

**10 Degree**

Angle	Field	ERP (kW)	ERP (dBk)
0	0.991	43.70	16.405
10	0.986	43.26	16.361
20	0.963	41.27	16.156
30	0.963	41.27	16.156
40	0.957	40.76	16.102
50	0.962	41.18	16.147
60	0.972	42.04	16.237
70	0.961	41.10	16.138
80	0.935	38.90	15.900
90	0.893	35.49	15.501
100	0.856	32.61	15.133
110	0.827	30.43	14.834
120	0.804	28.77	14.589
130	0.804	28.77	14.589
140	0.835	31.03	14.917
150	0.886	34.93	15.432
160	0.943	39.57	15.974
170	0.985	43.18	16.352
180	0.999	44.41	16.475
190	0.981	42.83	16.317
200	0.939	39.24	15.937
210	0.886	34.93	15.432
220	0.857	32.68	15.143
230	0.859	32.84	15.163
240	0.885	34.85	15.422
250	0.921	37.75	15.769
260	0.952	40.33	16.056
270	0.974	42.22	16.255
280	0.99	43.61	16.396
290	1.000	44.50	16.484
300	1.000	44.50	16.484
310	0.994	43.97	16.431
320	0.993	43.88	16.423
330	0.976	42.39	16.273
340	0.978	42.56	16.290
350	0.987	43.35	16.370

**Cardinal**

Angle	Field	ERP (kW)	ERP (dBk)
0	0.99	43.70	16.405
45	0.959	40.93	16.120
90	0.893	35.49	15.501
135	0.809	29.12	14.643
180	0.999	44.41	16.475
225	0.858	32.76	15.153
270	0.974	42.22	16.255
315	0.993	43.88	16.423

**Maxima**

Angle	Field	ERP (kW)	ERP (dBk)
290	1.000	44.50	16.484
300	1.000	44.50	16.484

**Minima**

Angle	Field	ERP (kW)	ERP (dBk)
110	0.827	30.43	14.834
220	0.857	32.68	15.143

# LEHIGH VALLEY PUB TELECOMS COUNCIL

WLVT-DT ALLENTOWN PA

## EXHIBIT 34 - TABLE 2

PSI PSILP16OM-39  
ELEVATION PATTERN

### Elevation

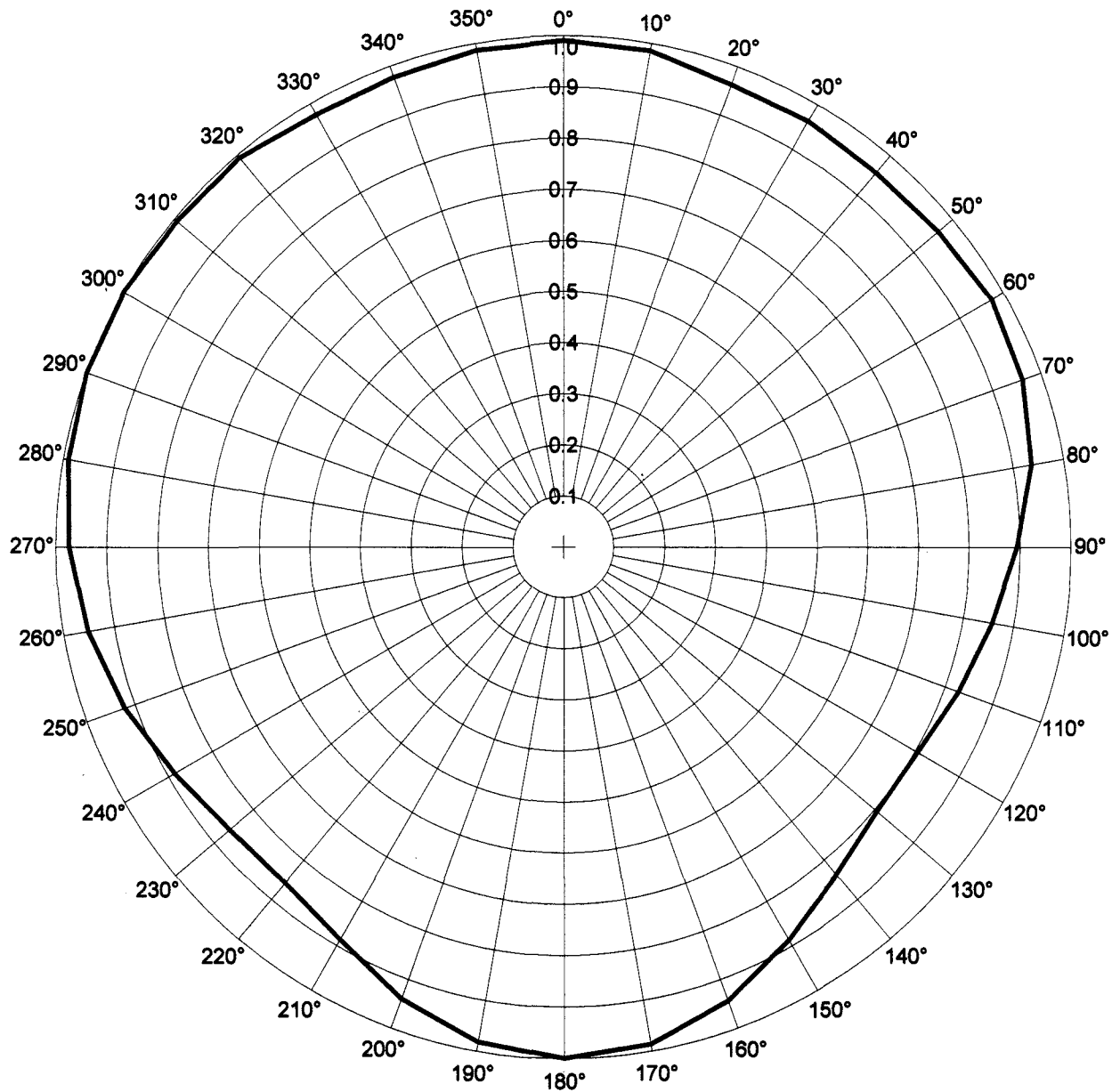
Angle	Field
6.00	0.189
5.00	0.260
4.00	0.320
3.00	0.210
2.00	0.210
1.00	0.580
0.00	0.890
-1.00	1.000
-2.00	0.860
-3.00	0.550
-4.00	0.230
-5.00	0.160
-6.00	0.200
-7.00	0.120
-8.00	0.035
-9.00	0.120
-10.00	0.140
-11.00	0.090
-12.00	0.030
-13.00	0.050
-14.00	0.030
-15.00	0.040

ERP (kW)	ERP (dBk)
1.59	2.013
3.01	4.783
4.56	6.587
1.96	2.928
1.96	2.928
14.97	11.752
35.25	15.471
44.50	16.484
32.91	15.174
13.46	11.291
2.35	3.718
1.14	0.566
1.78	2.504
0.64	-1.933
0.05	-12.635
0.64	-1.933
0.87	-0.594
0.36	-4.432
0.04	-13.974
0.11	-9.537
0.04	-13.974
0.07	-11.475

prepared by  
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ERP= 44.5 kW  
CALL WLVT-DT

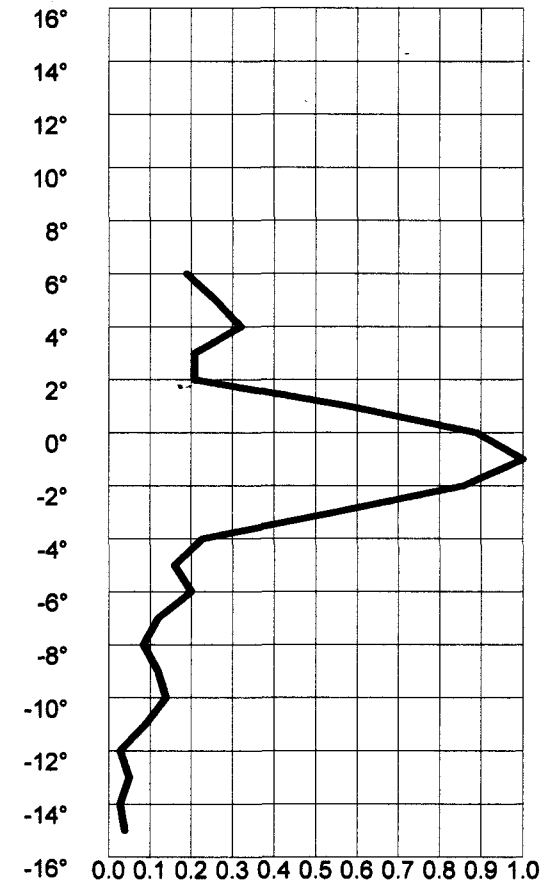
## HORIZONTAL PLANE PATTERN



Relative Intensity

## VERTICAL PLANE PATTERN

Azimuth: 0.0°



Relative Intensity

Pattern file: PSI\_OMNIOID.pat