Cohen, Dippell and Everist, P.C.

Before The
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554

In the Matter of	)	
	)	
Office of Engineering and Technology	)	ET Docket No. 13-26
Releases and Seeks Comment on Updated	)	GN Docket No. 12-268
OET-69 Software	)	
	)	
Comment Sought on Software to be Used	)	
in Conjunction With Proposed Incentive	)	
Auction	)	

Comments
on Behalf of
COHEN, DIPPELL AND EVERIST, P.C.

The following comments are submitted on behalf of Cohen, Dippell and Everist, P.C. ("CDE") and is in response to the Public Notice released by the Commission on February 4, 2013. CDE and its predecessors have practiced before the Federal Communications Commission ("FCC") for over 75 years in broadcast and telecommunications matters. The firm or its predecessors have been located in Washington, DC since 1937 and performed professional consulting engineering services to the communications industry.

The undersigned is licensed as a Professional Engineer in the District of Columbia and has been in continuous employment with this firm or its predecessors for over fifty (50) years.

While making *TVStudy* software available to outside interested parties is meritorious, its implementation as the only software in view of the legislative language[1] is not appropriate.

[1]Middle Class Tax Relief and Job Creations Act of 2012, Section 6403(b)(2) in part states:..."the Commission shall make all reasonable efforts to preserve, as of the date of the enactment of this Act, the coverage area and population served of each broadcast television licensee, as determined using the

This Firm's Current Version of OET Bulletin 69

Studies of predicted coverage and interference for DT post-transition operations are performed using a version of the Longley-Rice program as described in OET Bulletin No. 69 (February 6, 2004) and the Public Notice, "Additional Application Processing Guidelines for Digital Television (DTV)" (August 1998). For the current OET Bulletin No. 69 source code, the FCC's FORTRAN-77 code was modified only to the extent necessary (primarily input/output handling) for the program to run on a Windows XP platform. Comparison of service/interference areas and populations for the current OET Bulletin 69 software indicates that this model closely matches the current FCC's evaluation program. Best efforts have been made to use data and calculations identical to the current FCC's evaluation program. Any slight differences are attributable to compiler, operating system and/or processor characteristics. The effect of any variance in calculated population values versus the FCC's program is minimized when differencing a given model's results, such as calculating new interference as total interference less baseline interference. Any variance effect is further reduced when using ratios of calculated population values such as measuring the incremental population affected as a percent of the total population served. This firm's model employs the Longley-Rice propagation methodology and evaluates in grid cells of approximately 4 km^2 using 3-second terrain data typically sampled approximately every 1.0 km at one degree azimuth intervals with 2000 census

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methodology described in OET Bulletin 69 of the Office of Engineering and Technology of the Commission"... .

centroids. This firm has used this philosophy in developing the software since the FCC's initial release.

TVStudy Program Implementation To Date

With the release of *TVStudy*[2] by the FCC, the source code to date has been modified only to the extent necessary for the program to run on Windows XP platform.

Comparison to Date of Current
OET Bulletin 69 and *TVStudy*

While analyzing the software, this firm has found discrepancies between the new *TVStudy* software and this firm's implementation of the current OET-Bulletin 69 Longley-Rice code provided by the FCC. The initial comparison is based on *TVStudy* using the local-grid setting, 2000 population data, and 3-second terrain data. Thus far, only full service station coverage has been subject to scrutiny using the current OET-Bulletin 69 and *TVStudy*. Differences are found between the noise-limited, terrain-limited, and interference-free numbers. The biggest difference seen is the amount of interference caused by stations. In some cases the amount of caused interference differs by many thousands of people. While the *TVStudy* software predicts total interference in one scenario as 836 people and unique interference as 154, the OET Bulletin 69 methodology calculates the interference caused as 6362 people.

[2]See FCC Public Notice dated February 4, 2013 entitled, "Office of Engineering and Technology Releases and Seeks Comment on Updated OET-69 Software"

We further comment that this firm believes that the OET Bulletin 69 recently posted on the FCC's website can produce different results than the current program used by the FCC's Media Bureau.

Based on this firm's limited experience with *TVStudy* more detailed description of the output files would be extremely helpful. Further, so that *TVStudy* results can be further examined, it is requested that the FCC run test cases using low-band VHF, high-band VHF and different UHF channels in flat terrain, rolling terrain and rough terrain so that each party attempting to create the *TVStudy* software on their particular computer implementation can make a comparison of their results with the FCC's *TVStudy* software.

Conclusion

The firm is of the opinion that the legislative language noted on Page 1 of the footnote does not provide for updated OET Bulletin 69 as the FCC indicates in its Public Notice dated February 4, 2013 for the express purpose of implementing the Incentive Auction.[3]

Respectfully Submitted,

COHEN, DIPPELL AND EVERIST, P.C.

Donald G. Everist
President

DATE: March 21, 2013

[3]In the Matter of Expanding the Economic and Innovation Opportunities of the Spectrum Through Incentive Auctions; ET Docket 13-26, GN Docket No. 12-268.