

# Radiotechniques

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402 Tenth Ave. • PO Box 367 • Haddon Heights, NJ 08035-0367

## Groundwave Interference Narrative WHLM, Bloomsburg, PA October 2001 Exhibit 14 Page 1

- 1) This exhibit shows compliance with the requirements of FCC Rules and Regulations §73.37 concerning daytime contour overlap.
- 2) Exhibit 14 Figure 1 is a map on FCC Figure M-3 showing that the proposed facilities will not cause prohibited overlap with respect to any other stations excepting WPAT, Paterson, NJ and WADV, Lebanon, PA.
- 3) Comparing the extent of the proposed 0.025 mV/m contour towards the WPAT 0.5 mV/m contour, it is obvious from Exhibit 14 Figure 1 that the overlap is reduced from that caused by the licensed facility. This meets the requirements of FCC Rules and Regulations §73.37 (a)
- 4) Exhibit 14 Figure 2 is a map showing the detail of the allocations situation with respect to first adjacent channel station WADV. The area of overlap of the WHLM proposed 0.25 mV/m contour with the WADV 0.5 mV/m contour is reduced from that of the licensed facility, and the area of overlap between the WADV 0.25 mV/m contour and the WHLM proposed 0.5 mV/m is less than the overlap with the licensed WHLM 0.5 mV/m contour.
- 5) Exhibit 14 Figure 3, 4 and 5 are GWFI plots showing the ground conductivity from the WADV transmitter site on the 310°, 330°, and 340° bearings, covering analyzed bearings from 300° through 350°. Exhibit 14 Table 1, 2, and 3 tabulate the measurements made in support of these ground conductivity values. All other values for ground conductivity are those from FCC Figure M-3 as extracted by Radiosoft ComStudy. The measurements were made by myself using a Potomac Instruments Model FIM-21 meter Serial number 431, calibrated on 8 December 2000. Locations for these measurements were determined using a WAAS enabled GPS receiver which provides accuracy of approximately 10 feet.
- 6) This is to certify that this report has been prepared by myself, or under my direction. It is correct and accurate of my own knowledge, except where stated otherwise, and where this is so, the information is correct to the best of my knowledge and belief. The field intensity measurements of WADV included in this application were taken by myself.

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- 7) I further certify that I am a Licensed Professional Engineer in the State of New Jersey and the Commonwealth of Pennsylvania, with a BSEE degree from the Newark College of Engineering of NJIT, and that I am regularly engaged in the practice of radio engineering with the firm of Radiotechniques Engineering Corporation, with offices at 402 Tenth Avenue, Haddon Heights, NJ. I am a member of the AFCCE, senior member of the IEEE, and SBE, and hold an FCC General Radiotelephone Operator License. My qualifications are a matter of record with the FCC.



Date: October 19, 2001

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