



**KENNETH H. KALISKI P.E., Q.E.P., INCE BRD. CERT.**  
**DIRECTOR OF ENVIRONMENTAL SERVICES**

**EDUCATION, LICENSES, AND CERTIFICATIONS**

B.E. Engineering, Dartmouth College  
B.A. Biological Sciences and Environmental Studies, Dartmouth College  
Qualified Environmental Professional, Inst. of Professional Environmental Practice  
Licensed Professional Engineer, Vermont and New Hampshire  
Board Certified, Institute of Noise Control Engineering

**EXPERIENCE**

Mr. Kaliski is the Director of Resource Systems Group's Environmental division. He has been with the firm since its founding in 1987. He manages projects and has served as an expert witness in the areas of community noise, air pollution, and traffic impacts. His projects include work in Vermont, New Hampshire, Massachusetts, Maine, New York, Connecticut, New Jersey, Alabama and Florida. In addition to developing the firm's air pollution and noise programs, he has authored much of the firm's traffic, air, and noise software, some of which is commercially available.

**RESPONSIBILITIES & RELEVANT PROJECTS (PARTIAL LIST)**

*Noise Forecasting for a Wind Turbine Demonstration Project*—conducted noise measurements and modeling for a proposed 12-tower wind turbine project by the Green Mountain Power Company in Searsburg, Vermont. Used the NTerrain model to quantify the effects of atmospheric loss, vegetation, wind, and terrain features on octave-band noise levels in the area.

*Wind Turbine Noise Impact Study* – monitored sound levels at several sites around a proposed 20-turbine wind farm in Western Massachusetts. Using the monitored sound levels, performed statistical studies of the relationship between background sound levels and wind speed. Conducted noise modeling of the proposed wind turbines and made additional studies of the relationship between turbine and background noise levels.

*Review of Wind Turbine Impact Study* – For the Maine Land Use Regulatory Council, reviewed the noise impacts for a proposed 580 turbine, 210 MW wind farm in the Boundary Region in western Maine.

*Velco Northwest Reliability Project* – directed the noise studies required for the Velco Northwest Reliability Project (NWRP). This project involved sound monitoring and/or sound propagation modeling at 12 Velco substations. Measurement protocols were developed to meet IEC/IEEE standards for transformer and other noise-generating equipment. The measurement protocols also were developed for use in calibrating sound propagation models, so included directionality measurements of the transformers and property line/fence-line measurements. Modeling was conducted using the Cadna A sound propagation software to determine impacts at the nearest residences for several of the substations. A report was prepared and submitted to the Public Service Board (PSB) for the Granite and New Haven substations, outlining the potential for noise impacts and the mitigation required to meet commonly accepted standards. Many different types of equipment were modeled, including transformers, a shunt reactor, synchronous condensers, and a phase angle regulator transformer. Design detail testimony was prepared and submitted to the PSB and live testimony was given before the board.

*Brattleboro Landfill Gas Energy Recovery*—prepared an industrial source air quality permit for a landfill gas energy recovery system at the landfill in Brattleboro, Vermont. Determined emission rates of toxic air pollutants and criteria pollutants for landfill gas combustion. Screening and refined dispersion modeling was performed using local meteorological and topographical parameters.

*Velco Lamoille County Project* – Directed the noise study for the Velco Lamoille County project. Noise measurements were made at the Velco Moretown and Stowe Electric Department substations. Modeling was then conducted at the proposed Velco substation in Stowe, which is planned adjacent to the existing substation. The modeling demonstrated that using low-noise transformers, sound levels at the nearest neighbors would not exceed commonly accepted standards. A report and testimony was prepared and submitted to the Public Service Board.

*Ramapo Energy Project*—Reviewed the noise impact study and air pollution permitting submittals for a proposed natural-gas power plant in Ramapo, New York. Conducted noise modeling and air modeling. Oversaw a noise monitoring program. Assessed impacts on nearby residences and the adjacent Palisades Interstate Park. Presented testimony at permitting hearings.

## MEMBERSHIPS/AFFILIATIONS

Institute of Noise Control Engineering  
Acoustical Society of America  
Air and Waste Management Association  
Institute of Professional Environmental Practice  
Institute of Transportation Engineers  
Tau Beta Pi Engineering Society

## PUBLICATIONS

Ray, R. R., Collier, R. D., and Kaliski, K. H., *Optimization of Stability and Performance of LMS Filters for Feedforward Active Noise Reduction in Communications Headsets*, ACTIVE 02, The 2002 International Symposium on Active Control of Sound and Vibration, July 2002.

Collier, R. D., and Kaliski, K. H., and Ray, R. R., *Experimental Techniques for Evaluation of Active Noise Reduction Communication Headsets with the Thayer Low Frequency Acoustic Test Cell*, Proceedings of the 2003 Institute of Noise Control Engineers NOISECON 2003.

Kaliski, K. H., Mills-Tetty, A., Seitaridou, E., Collier, R., *Low-Complexity Continuous Noise Monitoring System for Communities, Small Airports, and Remote Areas*, Proceedings of the 2001 Institute of Noise Control Engineers NOISECON 2001.

Marshal, N.L., Kaliski, K.H., Rimmer, L.L., Lawe, J.C., *Estimating Network Model Parameters from Mail Survey Data*, Proceedings of ASCE 4th International Conf. on Microcomputers in Transportation, Baltimore MD, July, 1992

Kaliski K, *Integrating Network Modeling and Air Pollution Modeling to Determine NO<sub>2</sub> Contributions from Motor Vehicles*, Proceedings of the 3rd National Conference on Transportation Solutions for Small and Medium-Sized Areas, Transportation Research Board, October, 1991..