using AIMS to redesign photoactive proteins," he explains. He says his ultimate goal is to create light-powered or light-controlled molecular machines that can be used to affect chemically specific transport at the nanometer scale. "This would allow transference of the exquisite spatiotemporal control over light available with modern lasers to direct control of chemical concentrations," he says.

Aural historian Thompson, an associate professor of history at the University of California, San Diego, and an affiliated researcher at the California Institute for Telecommunications and Information Technology, maps the history of the design of sound and acoustics. According to the MacArthur Foundation, Thompson's work is "bridging the history of the United States and the histories of technology, science, sound, and acoustics to examine transformations in the American soundscape."

In her recent book *The Soundscape* of *Modernity* (MIT Press, 2002), she examined the history of the science of sound as applied to the design of rooms. In her current project, she is studying the transition from silent to sound film in the American film industry in the 1920s. Thompson believes that understanding this historical transformation may help filmmakers today navigate their own ongoing technological transition from film to digital data.

"I've loved the movies ever since I was a child. I had this long-standing interest in sound and audiotechnology," Thompson explains. "With this award, I now have wonderful resources, and this project is a nice way to bring those two interests together."

If your new car were spewing out hazardous gases, Michael P. Walsh wouldn't have been doing his job. The Arlington, Virginia-based international technical consultant and vehicle emissions specialist has dedicated his life to cutting pollution by reducing discharges from cars, trucks, and other vehicles. The owner and publisher of *CarLines*, a bimonthly newsletter that covers international and national auto pollution issues, Walsh got his start in the field about 40 years ago.

"The first job I had was in the 1960s, in an auto research lab, where I helped design experiments evaluating fuels and looking at catalytic converters that cleaned up pollution," Walsh remembers. A few years later, in 1970, the city of New York invited him to work at a vehicle pollution control bureau it wanted to set up. Four years later, he took a position at the

US Environmental Protection Agency, where his work led to the adoption in 1980 of the first diesel particulate standard in the world. Walsh credits his years with the EPA for teaching him about particulates' harmful health consequences. Part of his work as a consultant involves educating other nations about the danger of particulates and how to prevent their production.

Though based in the US, Walsh operates internationally. At present, he's working with China and Mexico on cutting vehicle-related air pollution, and in July he completed a similar project with Vietnam. In recognition of his broad-based work, the foundation is honoring him for "designing and implementing inventive, cost-effective programs to improve air quality for populations around the globe."

"This is an area where I think I can have an impact," he says.

## ASA Recognizes Six at Annual Meeting

received honors from the Acoustical Society of America during ASA's 149th annual meeting, held in October in Minneapolis, Minnesota. The following awards were presented at the gathering:

Katherine Safford Harris, Distinguished Professor Emerita of speech and hearing sciences at the graduate school of the City University of New York, received the Rossing Prize in Acoustics Education. The prize, in its second year, carries a \$3000 purse and is given to recognize significant contributions to acoustics education through teaching, creation of educational materials, textbook writing, and other activities.

Harris was also awarded the Silver Medal in Speech Communication "for research and leadership in speech production."

The Silver Medal in Animal Bioacoustics was presented to **James M. Simmons**, professor of neuroscience

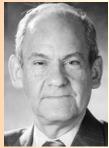


Harris

Simmons







Ginsberg

at Brown University in Providence, Rhode Island. He was recognized "for contributions to understanding bat echolocation."

Henrik Schmidt, professor of mechanical and ocean engineering at MIT in Cambridge, Massachusetts, received the Pioneers of Underwater Acoustics Medal "for pioneering contributions in numerical modeling and at-sea experiments in underwater acoustics."

The Trent-Crede Medal was given to **Jerry H. Ginsberg**, George W. Woodruff Chair and Professor at the Georgia Institute of Technology's school of mechanical engineering in Atlanta. He was honored "for contributions to the theory of vibrations of complex systems."

**Declan Butler**, a senior reporter with *Nature*, received the Science Writing Award in Acoustics for Journalists for his piece "Sound and Vision," published in *Nature* on 5 February 2004.

**Kate Ramsayer**, who reports on business and the environment at the *Daily Astorian* in Astoria, Oregon, also received the Science Writing Award in Acoustics for Journalists. She was honored for her story "Infrasonic Symphony," which was published in *Science News* on 10 January 2004.

## NAE Names New Inductees

Seventy-four new members and ten foreign associates were inducted into the National Academy of Engineering in October, which brings the organization's total US membership to 2195 and the number of its foreign associates to 178. Of the new inductees, 35 are involved in physics-related work:

Han Asriel Blech, technical officer at Oraxion Inc in Pasadena, California, and retired president of Flexus Corp in Los Altos, California

John Edward Bowers, professor of electrical and computer engineer-