edited by DIANA PABST

Award Winners Show Innovation, Dedication

Every year AAAS bestows a number of awards for exceptional contributions in areas related to science and engineering. The honors are varied, but the recipients are alike in their commitment to their respective endeavors.

The latest awards were presented this week at the Association's Annual Meeting in San Francisco.

The **AAAS Philip Hauge Abelson Prize** was established by the Board of Directors in 1985 to recognize public servants whose sustained efforts have advanced science or scientists whose careers have been marked by notable service to the scientific community as well as scientific achievement.

The prize was named in honor of the editor of *Science* from 1962 to 1984, who is now science adviser for AAAS.

Harvey Brooks, Benjamin F. Pierce Professor of Technology and Public Policy, emeritus, at Harvard University's John F. Kennedy School of Government, is the 1993 recipient.

After a distinguished career in solid-state physics, Brooks devoted himself to public service. He has guided many policymakers and scientific institutions, including the Office of Technology Assessment and the International Institute for Applied Systems Analysis, and his work has defined the intellectual standards for two generations of scholars in science and technology policy.

Frank von Hippel of the U.S. Office of Science and Technology Policy received the 1994 **AAAS Hilliard Roderick Prize in Science, Arms Control, and International Security.**

Respected for his ability to link technical analysis and policy considerations, von Hippel has furthered understanding of critical international security concerns.

In recent years, while a professor at Princeton University, he used his technical knowledge to help clarify controversial issues related to such matters as nuclear weapons testing, a ban on production of fissile material, deep reductions in nuclear arsenals, and dismantling of nuclear warheads. He not only pushed for consideration of these issues in the United States but also helped engage technical experts from the then Soviet Union in the debate.

The 1993 **AAAS Award for International Scientific Cooperation** was given to **Thomas F. Malone**, an atmospheric scientist and director of Sigma Xi Center in Research Triangle Park, North Carolina, for his work over five decades promoting joint efforts to protect the global environment.

He has advocated interdisciplinary environmental efforts through his participation and leadership in many organizations that foster international scientific cooperation. He also has been been influential as an adviser to the departments of State, Defense, and Transportation.

During 36 years at Brown University, psychology and medical professor **Lewis P. Lipsett** has been a mentor to at least 90 minority, women, and disabled students, including 32 who went on to complete Ph.D.'s.

John A. Watson, professor of biochemistry and biophysics at the University of California in San Francisco, has developed innovative programs to improve recruitment and supervision of students from groups underrepresented in the medical sciences, and has guided the careers of more than 220, including 32 who completed or are pursuing Ph.D.'s.

For this outstanding leadership, Lipsett and Watson received the 1993 **AAAS Mentor Award for Lifetime Achievement.**

For similar influence during a period of 10 years or less, **Carol A. Gross** received the **AAAS**

Two Pioneers in AIDS Concerns

For drawing national attention to the AIDS crisis in the early 1980s, **June Osborn** and **Mathilde Krim** were given the 1994 **AAAS Scientific Freedom and Responsibility Award.** It honors scientists or engineers whose exemplary actions, often taken at great personal cost, have fostered scientific freedom and responsibility.

Osborn, professor of epidemiology and pediatrics at the University of Michigan and dean of its School of Public Health from 1984 to 1993, is cited for her eloquent advocacy on behalf of the legal, scientific, and health needs of people with acquired immunodeficiency syndrome (AIDS). "There is no high-risk subgroup for AIDS," she has said. "Humanity is the high-risk group. There are only high-risk behaviors."

June Osborn

In the early 1980s, as a physician with an expertise in the study of viruses, she headed a committee to advise the National Institutes of Health on policies regarding the human immunodeficiency virus (HIV), and subsequently became a pioneer in AIDS advocacy and public health policy on the epidemic.

As one of the first U.S. scientists to publicly decry hatred and discrimination toward people with AIDS, she was chosen by her fellow commissioners to head the congressionally mandated National Commission on AIDS during its tenure (1989–93). She has been an adviser to many U.S. and international health agencies and other organizations.

Mathilde Krim

Krim is cited for her courageous efforts in changing public perceptions about HIV and AIDS and encouraging support for health and research policies to counter the disease.

A research virologist who was involved in developing interferon as a treatment for Kaposi's sarcoma, Krim became concerned by the early lack of funding for AIDS research and in 1983 founded the nonprofit AIDS Medical Foundation to support research on the disease. It later became the American Foundation for AIDS Research (AmFAR), which has generated millions of dollars for basic AIDS-related scientific and psycho-social research, community-based clinical research programs, and education projects for AIDS prevention.

She has spoken out widely against discrimination toward people with AIDS and about the need for coordinated worldwide efforts to stem the spread of the disease and care for those infected.

Krim is board chairman of AmFAR and an adjunct professor in the School of Public Health at Columbia University.

Mentor Award. A biology professor at the University of Wisconsin in Madison until last year and now at the University of California in San Francisco, Gross has been a mentor to 32 students, including 10 through completion of their Ph.D.'s.

The annual **AAAS–Newcomb Cleveland Prize** honors the authors of the best article or report in *Science* during the previous year. It must include original research data, theory, or synthesis; constitute a fundamental contribution to basic knowledge or a technical achievement of far-reaching consequences; and be a first-time publication of the work.

Authors of the prize-winning paper for 1992–93 are **Michael J. Mahan** of the University of California in Santa Barbara, **John J. Mekalanos** of Harvard Medical School, and **James M. Slauch** of the University of Illinois.

Their paper, "Selection of Bacterial Virulence Genes That Are Specifically Induced in Host Tissues," was published in the 29 January 1993 issue of *Science*.

The report was chosen for its elegant and original approach to finding the virulence genes in bacteria, an approach that led to a breakthrough in understanding bacterial pathogenicity and developing methods for alleviating it.

The **AAAS Prize for Behavioral Science Research** is given for a major scientific paper that furthers understanding of human psychological-social-cultural behavior.

The 1993 winners are **Nalini Ambady** of College of the Holy Cross in Worcester, Massachusetts, and **Robert Rosenthal** of Harvard University.

Their paper, "Thin Slices of Expressive Behavior as Predictors of Interpersonal Consequences: A Meta-Analysis," published in the March 1992 issue of *Psychological Bulletin*, is an original review and interpretation of empirical studies revealing that nonverbal expressive behavior by a person has profound consequences on those exposed to that behavior.

For nearly 50 years, **AAAS-Westinghouse Science Journalism Awards** have recognized outstanding writing by journalists on the sciences, engineering, and mathematics. The 1993 winners are:

- Daily newspapers with circulation of more than 100,000: **Boyce Rensberger** of *The Washington Post*, for three unrelated stories, "Iceman Yields Details of Stone Age Transition," 15 October 1992; "After 2000, Outlook for the Ozone Layer Looks Good," 15 April 1993; and "Greenhouse Effect Seems Benign So Far," 1 June 1993.
- Newspapers with circulation of less than 100,000: **Nancy Bazilchuk** of the *Burlington Free Press*, for a five-part investigative series, "Superfund: The Road to Nowhere," published 7 to 11 February 1993.
- Magazines: **John Horgan** of *Scientific American*, for "Eugenics Revisited," published in June 1993.
- Radio: **Dan Mushalko** for "Stuck on You," about cell adhesion molecules, broadcast 15 September 1992 on "The Amazing Science Emporium." The program is produced by Mushalko's Radio Phonic Lab and aired on stations WERU in Bluehills Falls, Maine, and WPUS in State College, Pennsylvania.
- Television: No winner.

Stage-Struck by Science

Three years ago, a group of graduate students in physics and astronomy at Michigan State University pondered how they could break down the mystique of their chosen fields and get children and the general public to share their own excitement about doing science.

They came up with the idea of putting on stage shows and hands-on experiments using theater and multimedia techniques to demonstrate scientific concepts. The first presentation, held at a local mall, attracted a thousand observers in 4 hours —and Science Theatre was born.

Science Theatre: Enthralls young audiences.

Today, these "road" shows play to more than 10,000 students, teachers, and parents each year, mainly in schools. Each self-contained module focuses on a single theme and is designed to encourage audience participation.

The project is so popular there is a 2-year waiting list for performances. Efforts are under way to extend the approach by sharing the ideas with other institutions.

Science Theatre received the 1993 **AAAS Award for Public Understanding of Science and Technology**, given to scientists and engineers who are highly effective in popularizing science but are not members of the media.

About 40 students, faculty, and staff members are active in the project, which is run voluntarily by graduate students. Most are in physics and astronomy, but other departments also are represented.

Participants include steering-council members Steve Snyder, director; Dave Bercik, assistant director; Mark Lepper, Bill Abbett, Dennis Kuhl, Jeff Kriessler, Brian McSpadden, Jennifer Discenna, Danielle Casavant, and Joy Conrad.

Science and Technology Colloquium

Since 1976, AAAS has helped to decipher the federal budget and what it means for R&D policy at an annual seminar in Washington, D.C. This year's AAAS Colloquium on Science and Technology Policy will be held 6 to 8 April at the Renaissance Hotel.

Speakers include members of Congress, executive branch officials, industry managers, academic experts, and officials of science and engineering organizations.

"The audience looks to this as the first comprehensive review of national R&D and related issues in the annual budget cycle," said Stephen D. Nelson, director of the AAAS Science, Technology, and Government Program. This year's meeting also will cover industry R&D trends, federal agency priorities, and international science and technology issues.

The fee is $215 ($180 for nonprofit organizations). For information or to pre-register, call 202-326-6600.

- *AAAS Science and Technology Policy Yearbook 1993* is now available ($19.95, or $15.95 for AAAS members, plus $4 for postage and handling; order from AAAS Distribution Center, P.O. Box 521, Annapolis Junction, MD 20701, phone 1-800-222-7809).