

WE HEAR THAT

AGU Presents Awards and Medals in Washington

A highlight of the American Geophysical Union's spring meeting in Washington, DC, in June was the presentation of awards and medals for outstanding contributions to the field of geophysics.

The William Bowie Medal, AGU's highest honor, went to **John A. Simpson**. According to the award citation, "his accomplishments—spanning a half century—both in scientific research and in the realm of science and policy are unusually significant and important." Simpson has made a number of discoveries regarding cosmic rays and the heliosphere. Known as the father of the neutron monitor, he led in the development of space-borne detector systems and invented a number of particle detection techniques; all are among his contributions to space science. The awards announcement also acknowledged Simpson's "far-sighted and important" contributions to science policy issues. Simpson is the Arthur Holly Compton Distinguished Service Professor of Physics Emeritus at the University of Chicago.

Erik H. Hauri was awarded the James B. Macelwane Medal, given for significant contributions by a young scientist. AGU honored Hauri for "the wonderful knitting of geochemistry, experimental petrology, and fluid dynamics together into the larger tapestry of the Earth." Hauri is research staff member at the Department of Terrestrial Magnetism, Carnegie Institution of Washington.

The John Adam Fleming Medal was presented to **John T. Gosling**, a fellow in the space and atmospheric science group at Los Alamos National Laboratory, for his "outstanding contributions to our understanding of the solar wind and its interaction with the geomagnetic field."

M. Gordon Wolman, professor of geography and environmental engineering at Johns Hopkins University, received this year's Robert E. Horton Medal. Wolman was honored for his career, which has left "substantial legacies in hydrology and geomorphology," including his concepts, insights, publications, and his stu-

dents. Interestingly, Wolman's father, **Abel Wolman**, won this same medal from AGU 14 years ago.

The Waldo E. Smith Medal was awarded to **Rosina M. Bierbaum** for her "outstanding contributions throughout the last two decades to the analysis and assessment of a wide range of global and regional environmental issues." Bierbaum is associate director of the environment division in the White House Office of Science and Technology Policy.

The Walter Sullivan Award for Excellence in Science Journalism went this year to **Alexandra Witze**. She was chosen for her article "Paradise Submerged" on the Kerguelen Plateau in the Indian Ocean. The article appeared in the 12 July 1999 issue of *The Dallas Morning News*, for which Witze is a writer.

David W. Mogk, professor of geology at Montana State University-Bozeman, is the winner of AGU's Excellence in Geophysical Education Award. AGU praised Mogk for making a "major impact on science education in this country" through his work in the classroom, community, professional societies, and the National Science Foundation. The awards announcement acknowledged his leadership in establishing a central role for Earth sciences in science education.

Astronomical Society of the Pacific Presents Awards

At its annual meeting in July in Pasadena, California, the Astronomical Society of the Pacific presented six awards. **Rashid A. Sunyaev**, director of the Max Planck Institute for Astrophysics in Garching, Germany, and head of the high-energy astrophysics department and chief scientist at the Space Research Institute at the Russian Academy of Sciences, received the Catherine Wolfe Bruce Gold Medal. The society honored Sunyaev for his "fundamental, lifelong contributions to astronomy," especially his theoretical work, which "spans an enormous range and is the foundation of several major fields of current astrophysics."

Jack F. Horkheimer, director of the Space Transit Planetarium at the Miami Museum of Science in Florida,

garnered the Dorothea Klumpke-Roberts Award, given to an individual who contributes to public understanding and appreciation of astronomy. According to the society, Horkheimer's "enthusiasm and energy have enticed many people to go outside and look at the sky and learn more about astronomy." Horkheimer is best known for his TV show "Star Gazer."

The Thomas J. Brennan Award went to **Jeffrey F. Lockwood**, director of the astrobiology curriculum project at TERC, a not-for-profit education research and development organization in Cambridge, Massachusetts. Lockwood was recognized for his "exceptional achievement related to the teaching of astronomy at the high school level."

Scott D. Burles was presented with the Robert J. Trumpler Award, given to a recent PhD recipient whose research is considered "unusually important to astronomy." Burles received his doctorate at the University of Chicago for work done with his adviser, **David Tytler**, on a precise measurement of the primordial deuterium-to-hydrogen abundance ratio, and, hence, of the baryon density in the universe.

Peter B. Stetson, senior research officer with the National Research Council of Canada, received the Maria & Eric Muhlmann Award, which is given "for recent significant observational results made possible by innovative advances in astronomical instrumentation, software, or observational infrastructure." Stetson was honored for developing DAOPHOT, software that enables scientists to precisely determine the brightness of point sources imaged with area detectors.

The society presented its Amateur Achievement Award to **Paul Boltwood**, an amateur astronomer for 40 years who lives in Stittsville, Ontario, Canada. The society recognized Boltwood for his development of hardware and software for "precise deep-sky imaging, his research on brightness variations in active galactic nuclei, and his studies of near-nucleus activity in Comet Hyakutake."

IN BRIEF

Shi-Qing Wang, formerly professor of macromolecular science at Case Western Reserve University in Cleve-

land, Ohio, joined the faculty of the University of Akron, Ohio, in August as professor of polymer science.

The winners of this year's Carl Zeiss Research Award, which is given in recognition of "outstanding work in the fields of optics and glass technology," are **Ursula Schmidt-Erfurth**, professor and doctor at the Medical University of Lübeck in Germany, and **Shuji Nakamura**, professor in the materials department at the University of California, Santa Barbara. The Carl Zeiss Foundation presented the award in June to Schmidt-Erfurth for her work in developing the basic principles behind photodynamic therapy for the eye and to Nakamura for his development of high-brightness blue light-emitting diodes and laser diodes, which permit applications such as full-color displays and full-color indicators. The award winners will split the prize money of DM 50 000 (about \$24 000).

Jonathon Howard has accepted a position as director of the Max Planck Institute of Molecular Cell Biology and Genetics, which is under construction in Dresden, Germany, and is expected to be completed in early 2001. Howard currently is professor of physiology and biophysics at the University of Washington, Seattle. **Kai Simons** also accepted a position at the institute: Earlier this year, he became the executive director. He had been program coordinator for the cell biology program at the European Molecular Biology Laboratory in Heidelberg, Germany.

At its annual meeting in San Diego, California, in July, Fusion Power Associates announced the four winners of its Distinguished Career Award, given to individuals whose lifelong career contributions have benefited fusion development. **Alan Gibson**, retired deputy director and head of the torus and measurement department at the Joint European Torus (JET) laboratory in the UK, was recognized "for his seminal research contributions to fusion," according to the awards announcement. **Tom Simonen**, retired vice president in the fusion group and director of the DIII-D national fusion program at General Atomics, was honored for his "many solid scientific contributions and leadership of major fusion research facilities over many decades." **Ken Tomabechi**, honorary research adviser at the Central

Research Institute of Electric Power Industry in Tokyo, was recognized for making "essential contributions . . . to fusion international collaboration."

Alvin W. Trivelpiece, retired director of Oak Ridge National Laboratory, was acknowledged as "a pioneering researcher, university professor, and top-level manager in both the private and public sectors."

In June, former National Science Foundation director **John Brooks Slaughter** was named president and chief executive officer of the National Action Council for Minorities in Engineering, Inc, in New York.

The Alexander von Humboldt Foundation in Bonn, Germany, in June gave its Humboldt Research Award for Senior US Scientists to **Neville Smith**, division deputy of science at The Advanced Light Source, a division of Lawrence Berkeley National Laboratory. To promote international scientific cooperation, the foundation invites award winners to spend extended periods at research institutes in Germany. Smith will be working with **Wolfgang Eberhardt** on magnoelectronics at the Jülich Research Center in Jülich, Germany.

In April, the German Physical Society gained a new president: **Dirk Basting**, president and chief executive officer of Lambda Physik, headquartered in Göttingen, Germany. Basting succeeds **Alexander M. Bradshaw**, scientific director of the Max Planck Institute for Plasma Physics in Garching, Germany, who now serves as the society's vice president.

OBITUARIES

Hendrik Brugt Gerhard Casimir

Hendrik Brugt Gerhard Casimir, a brilliant scientist and leader of industrial research, died on 4 May in Heeze, the Netherlands, after a brief illness.

Born in The Hague on 15 July 1909, Casimir was endowed with a strong body, fabulous memory, and great intelligence. As a student of Paul Ehrenfest at Leiden University, he studied theoretical physics. But he

The Washington Academy of Sciences presented its annual award for Distinguished Achievement in the Physical Sciences to **Katharine B. Gebbie**, director of the physics laboratory at NIST in Gaithersburg, Maryland, and selected her as a fellow of the academy this past May. According to the academy, Gebbie was recognized for "initiating now world-leading programs in nanotechnology, atom interferometry, atom optics, quantum metrology, and quantum computation."

In May, **Richard Osgood Jr** was named associate laboratory director for basic energy sciences at Brookhaven National Laboratory. Osgood retains an appointment as Higgins Professor of Electrical Engineering and of Applied Physics at Columbia University.

The Association of Universities for Research in Astronomy, Inc, has appointed **Jean-René Roy** as associate director of the Gemini North Observatory on Hawaii's Mauna Kea. Roy, a professor at the University of Laval in Quebec City, Quebec, Canada, will begin his new position in October.

The Inamori Foundation in Kyoto, Japan, has announced that computer scientist **Charles Antony Richard Hoare**, professor emeritus at the University of Oxford, has won the Kyoto Prize in advanced technology for his "pioneering and fundamental contributions to software science." Kyoto Prizes are given annually to individuals or groups who have "contributed greatly to mankind's scientific, cultural, and spiritual betterment."

also spent 18 months of his graduate education in Copenhagen as a student of Ehrenfest's close friend Niels Bohr. Casimir's PhD thesis, which he completed in 1931, dealt with the quantum mechanics of a rigid spinning body and the group theory of the rotations of molecules.

After earning his PhD, Casimir became extremely active in the young field of quantum mechanics. For example, he used Heisenberg's matrix mechanics to establish a relation between natural line width and radiation damping. He also used the time-