# **NEWS FROM APS**

# RICHTER ELECTED VICE PRESIDENT, COUNCIL IS EXPANDED

Members of The American Physical Society have elected Burton Richter, director of the Stanford Linear Accelerator Center, to be the society's next vice president. Richter's term begins in January, when he will succeed Donald Langenberg of the University of Maryland, who will become president-elect. Richter will become president in 1994. The 1992 president is Ernest M. Henley of the University of Washington.

In other election results, Patricia M. Dehmer (Argonne National Laboratory) was chosen chair-elect of the nominating committee. The newly elected councilors-at-large are Jerry P. Gollub (Haverford College), Wick C. Haxton (University of Washington), Barbara A. Wilson (Jet Propulsion Laboratory), Robert H. Austin (Princeton University), Kate P. Kirby (Harvard-Smithsonian Center for Astrophysics) and Alice E. White (AT&T Bell Labs, Murray Hill).

### Richter

Since 1990 Richter has served on the APS council as a representative of the division of physics of beams, and he is also a member of the APS publications committee. He has served on advisory committees of the US Department of Energy and of numerous national and European labs, including Brookhaven, Fermilab, Argonne and CERN.

Born in 1931 in New York, Richter received a BS in 1952 and a PhD in physics in 1956 from the Massachusetts Institute of Technology. After graduating from MIT, he accepted a postdoctoral position at Stanford University and in 1963 joined the staff of SLAC, where he has been a professor of physics since 1967. He became director of SLAC in 1984. His research in experimental particle physics has included pioneering work in colliding beam technology. In 1976 he and Samuel C.C. Ting of MIT shared the Nobel Prize in Physics for the discovery of the psi/J particle in 1974.

In his candidate's statement Richter said that APS should increase its efforts to inform government officials and the general public of the intellectual and practical benefits of physics research. In particular, he said APS should emphasize the importance of achieving a balance between big science projects and basic research. He also mentioned the need to bridge the gap between physicists in industry and academia.

## Nominating committee

The APS nominating committee, which will be headed by Jack Sandweiss of Yale University in 1992, selects the slate of candidates for vice president, councilors-at-large and its own chair-elect. The committee's choices are then voted on by the APS membership.

Dehmer, who will lead the nominating committee in 1993, is currently chair of both the committee on constitution and bylaws and the division of atomic, molecular and optical physics. She was a member of the council from 1987–90 and the executive committee from 1988–90, and she has served on numerous other APS committees and task forces. She has also served on advisory committees for the

**Burton Richter** 



NSF, university departments and national labs.

Dehmer received a PhD in physics from the University of Chicago in 1972. Following postdoctoral positions in the physics and chemistry divisions at Argonne, she joined the research staff there in 1975 and now heads a program of studies in multiphoton processes. Her research has included uv and multiphoton ionization and dissociation processes; the electronic structure of small molecules, free radicals and van der Waals clusters; atomic and molecular Rydberg-state spectroscopy; and chemical ionization and ion-molecule reactions.

In her candidate's statement Dehmer emphasized the importance of providing APS members with a balanced slate of candidates. She said that nominations should reflect all of the subfields of physics, should be drawn from academia, industry and government, and should include women and minorities.

#### Councilors-at-large

Elected by the APS membership as a whole, councilors-at-large represent the organization broadly and do not speak for any specific subunit. Beginning in 1992 the number of councilors-at-large will increase by three to 15, to conform to a new provision in the APS constitution that specifies that the number of general councilors should correspond to the percentage of APS members who do not belong to a division. If that percentage should fluctuate in the future, the number of councilors up for election will also change. Next year, for example, the terms of four councilors will expire, but it has not yet been determined how many new councilor seats will open up.

The terms of the newly elected councilors have been staggered. Gollub, Haxton and Wilson will serve four-year terms, Austin three years, Kirby two years and White one year.

Austin, a professor of physics at

Princeton, earned a PhD in physics from the University of Illinois in 1975. He worked at the Max Planck Institute for Biophysical Chemistry until 1979, when he moved to Princeton. His research includes the dynamics and function of biological molecules, particularly proteins and nucleic acids. At present he is studying polymer dynamics, collective modes in proteins and the physics of protein–nucleic acid interactions.

As a biophysicist with strong ties to related disciplines such as molecular biology, Austin expressed concern in his candidate's statement at the growing number of physicists who have "defected" to other fields, a trend that he attributes in part to "a perceived lack of opportunity in the physics community for real growth." He suggested that APS establish a free access database to list job openings for physicists. He also recommended improving the computer technology used to produce APS journals.

Gollub received a PhD in experimental condensed matter physics from Harvard in 1971, after which he joined the faculty of Haverford College. He is currently a professor there, and he headed the physics department for many years. He also served as provost from 1988 to 1990. His research interests have included studies of instabilities and pattern formation in fluids and liquid crystals, chaotic dynamics and turbulence, nonlinear wave phenomena, and patterns at the liquid–solid interface.

Gollub was secretary-treasurer of the APS division of fluid dynamics from 1985 to 1988 and has served on the editorial board of *Physical Review A*. He identified several areas of concern in his candidate's statement, including the polarization between big and small science; the relationship between physics and other scientific disciplines, engineering and the general public; science ethics; and the need to encourage young students, particularly females and minorities, to study physics.

Haxton received a PhD in physics from Stanford in 1976 and joined Los Alamos National Laboratory the following year. In 1984 he moved to the University of Washington, where he is currently a professor of physics. Since 1990 he has been the associate director of DOE's Institute for Nuclear Theory. His research interests include symmetry tests using nuclear and atomic systems, nuclear and particle astrophysics, neutrino physics and numerical many-body techniques.

Haxton has long been active with

the division of nuclear physics, having served on its executive, nominating and program committees and currently serving as chair-elect. In his candidate's statement Haxton said more government funds should be diverted away from "megaprojects" to support basic research, a change that would create job opportunities for young scientists. He also said that when trying to describe to the public the value of physics research, physicists should not discuss it solely in terms of its local economic impact or the benefits of technology transfer. "It is a mistake to underestimate the capacity of the public to appreciate and support our true motivations, the excitement of the unknown and the cultural advancement of society," he said.

After receiving a PhD from the University of Chicago in 1972, Kirby joined the Harvard College Observatory as a postdoc and became a research physicist at the Smithsonian Astrophysical Observatory the following year. Since 1988 she has been an associate director at the Harvard-Smithsonian Center for Astrophysics and has headed the atomic and molecular physics division. A specialist in molecular structure and spectroscopy, Kirby's recent research includes calculations of metastable molecular excited states, photoionization and autoionization cross-sections for small molecules and charge transfer in ion-atom collisions.

Kirby chairs the APS committee on membership and is a member of the committee on meetings and the executive committee of the topical group on computational physics. In

# APS News Debuts Next Month

January will mark the debut of APS's monthly membership newsletter. Entitled APS News, the newsletter will consolidate the news currently published in the Bulletin of The American Physical Society and the "News from APS" section of PHYSICS TODAY (see PHYSICS TODAY, October, page 131). The PHYSICS TODAY section and the news section of the Bulletin will be discontinued after the December issues.

APS members will receive the newsletter free of charge in addition to the *Bulletin*, which will continue to carry information on APS meetings. Beginning in July, members will receive only those issues of the *Bulletin* that they select on the annual membership dues bill.

her candidate's statement Kirby said APS should maintain its core activities—journal publication and meetings—while extending its attention to broader issues in physics. These issues include improving pre-college science and math education, encouraging government and industry to invest more in basic science research, and studying technological and environmental issues pertaining directly to physics.

White received a PhD in physics from Harvard in 1982. She then worked as a postdoc at Bell Labs, becoming a member of the technical staff in 1984. Since 1988 she has headed the physics of materials research department, where she is responsible for research in femtosecond spectroscopy, high- $T_{\rm c}$  superconductors and nonlinear optics. Her own research is on the properties of metallic and semiconducting layers formed in silicon by high-dose ion implantation, including the new field of mesotaxy.

In her candidate's statement White spoke of the erosion in Federal funding for basic research and of the importance of technology transfer, and she said there was a need to increase the number of skilled scientists able to bridge the gap between science and technology. "Improved coupling between research and development has become a necessity rather than a luxury," she said.

Wilson received a PhD in physics from the University of Wisconsin, Madison, in 1977. She joined Bell Labs the following year and in 1986 became supervisor of the optoelectronics physics research group. Her research there included experimental studies of two-dimensional electrongas properties in the extreme quantum limit. In 1988 she moved to the Center for Space Microelectronics at JPL, where she manages research in superconductivity, integrated photonics, epitaxial detector structures and scanning—tunneling microscopy.

As part of her longstanding interest in science education and her desire to encourage young women and minorities to consider science careers, Wilson founded the Science Education Club, which sponsors community science fairs, industrial tours and industrial speakers for local elementary and high schools. In 1986 she headed the APS committee on the status of women in physics. In her candidate's statement Wilson expressed concern at the country's increasingly short-term perspective and its effect on physics funding, as well as the decline in science literacy among the general populace.