Rejuvenation at the Soviet Academy

The Soviet Academy of Sciences has announced the election of more than 80 new members—almost 30% of its total membership of 300. The vacancies were created by the academy's decision last year to introduce a new rule requiring members to give up their seats—although without losing their substantial financial and other privileges—on reaching the age of 75.

The rule was introduced to correct the growing age imbalance among academy members. In 1986, for example, less than 1% of academy members were under 50 years old, while the proportion over 75 had increased from 15.3 to 36.6% during the previous decade.

Last month's elections, the first for 3 years, also saw the appointment of 166 new corresponding members of the academy, out of a total of 600. Over 2000 individuals had been put forward as candidates for the 250 vacancies in the two categories; the academy had suggested (but had held back from requiring) that candidates for full membership should be less than 60 years old and for corresponding membership less than 50.

According to press reports in *Pravda*, an active debate is currently taking place over the manner in which academicians are selected, with many demanding a revision of existing procedures to place greater emphasis on scientific achievement and less on purely administrative experience.

"Changes should be made to the electoral procedure," Academician N. Moiseyev is quoted as saying. "We obviously need expert commissions of reputable specialists which would reach their own conclusions on the quality of a scientific work and judge a candidate's real contribution on this rather than on the 'volume' of his publications."

Cosmonaut Faults Soviet Space Program

In a surprisingly frank interview with the Soviet magazine *Nedelya* reminiscent of recent debates in the United States, the head of the Yuri Gagarin cosmonaut training center has claimed that the Soviet space program suffers from "a lack of purposefulness and consistency," with an "unsystematic search going on" involving "a range of experiments in the most diverse areas."

Lt. General V. Shatalov says that the

situation could be improved by increasing the functions of the recently established U.S.S.R. Chief Directorate for the Creation and Use of Space Technology. But at present, he says, "There is a lack of a good program with a precise formulation of goals and of how to achieve them stage by stage."

Shatalov says in the interview that much is currently being done to produce spin-offs from space activities for the national economy. "But the crews will bring the results back to earth and everything will then disappear 'down a hole,' as it were."

In addition, the program suffers from delays caused by the fact that the results of experiments have to be brought back to Earth and then analyzed before the next experiment can be planned—a process that can itself take 6 to 12 months. "At this pace we won't set up orbital workshops and factories, which the press has in fact promised many times over, even by the year 2000," says Shatalov.

One possibility for correcting this situation, he says, would be to develop special modules which would be periodically dispatched from the Mir space station back to Earth with the results of experiments on board.

"All crews unanimously attest that the knowledge that their work is important to the country gives them a sense of purpose and makes it easier for them to endure their long stay in space," says Shatalov. "If they were aware while still in flight that the fruits of the labor were already being used, then this would act as the best of all incentives." **D.D.**

The Research Top Ten

Johns Hopkins University once again tops the list of academic recipients of federal research dollars, according to the latest compilation of figures (covering fiscal year 1986) put together by the National Science Foundation.* It owes its pride of place to the \$313 million it received for the Applied Physics Laboratory, an off-campus research center that conducts work mostly for the Department of Defense. If those funds were treated separately—as they are for similar research centers operated by other universities—Johns Hopkins would drop to fifth place, just behind the University of California at San Diego.

The top ten universities together received a little over 25% of the \$6.538 billion spent by the federal government on academic research in 1986. Following Johns Hopkins, which received \$446 million, were Massachusetts Institute of Technology (\$188 million), Stanford University (\$180 million), University of Washington (\$147 million), University of California at San Diego (\$133 million), Columbia University (\$127 million), University of California at Los Angeles (\$125 million), University of Wisconsin at Madison (\$121 million), Cornell University (\$113 million), and Yale University (\$112 million).

In all, the federal government spent \$11.6 billion on college-level academic programs in 1986, including about \$4.2 billion for activities not related directly to research and development, such as Pell Grants and other student support. **C.N.**

AIDS Funds Increased; Helms Measure Blunted

In the last days of the 1987 session, Congress approved an appropriations bill that almost doubles the amount spent on fighting AIDS and in the same generous spirit watered down an amendment that public health officials and gay rights activists feared would curtail AIDS education.

The original wording of the amendment sponsored by Senator Jesse Helms (R-NC) stated that no funds from the Centers for Disease Control "shall be used to provide AIDS education, information, or prevention materials that promote or encourage, directly or indirectly, homosexual sexual activities" (Science, 20 November, p. 1036). The House-Senate conference committee yanked the word "indirectly," an editing job which should allow federally funded groups to continue providing homosexuals, for example, with "safer" sex techniques. The Helms amendment goes on to state that any educational materials funded by Uncle Sam shall emphasize abstinence outside of a "sexually monogamous marriage." The conference committee report, however, was clear: the amendment shall not "prohibit descriptions of methods to reduce the risk of HIV transmission."

In other business, Congress earmarked \$950 million for AIDS research, care, and prevention activities in fiscal year 1988, an increase of 92% from \$494 million in fiscal year 1987. The AIDS budget for the National Institutes of Health swelled to \$448 million, up from \$253 million, while the budget for the Centers for Disease Control more than doubled to \$305 million. For AIDS work, the Food and Drug Administration got \$26 million and the Alcohol, Drug Abuse, and Mental Health Administration received \$112 million. ■ W.B.

^{*&}quot;Federal Support to Universities, Colleges, and Selected Nonprofit Institutions: Fiscal year 1986." NSF 87– 318.