

grams of postgraduate training and an organized program of career guidance for juniors.

All these criticisms are only too recognizable as home truths about the U.S. situation as well. What the young militants seem to find particularly frustrating in Britain is the fact that final responsibility seems to reside nowhere. Particularly after the events of the summer, the junior staff are inclined to place the blame on the Ministry of Health, which one active militant referred to as "the last enemy."

The ministry, for its part, has sought to interfere with the profession as little as possible. Authority over hospitals is decentralized, with planning and budgeting responsibility delegated in large part to 15 regional hospital boards. Local management boards responsible for individual hospitals or groups of hospitals constitute another administrative layer. Members of these boards are appointed by the Minister of Health, and although some medical members are included at both levels, the junior doctors argue that the appointments are made either to grant an honor or bring in the representa-

tive of some interest, such as the trades unions, and that the boards therefore are both amateur and political.

The junior medical staff claim that the diffusion of responsibility makes it impossible for them to have any real effect in improving either the conditions under which they work or the quality of the services they provide. What they feel they have achieved so far is recognition by both the BMA and the government that they should be directly represented not only in negotiations over pay but in formulation of policy which affects the hospital service.

In the past, a joint consultants' committee, drawn from the membership of the BMA and the specialty groups, has done the negotiating for all grades of hospital staff. Last year one junior doctor was appointed to the body, and the BMA's influential Central Consultants' and Specialists' Committee will probably soon broaden its own representation of juniors. But the young doctors are pressing for a more direct voice.

Inevitably, government officials emphasize what has been done to strength-

en the NHS while the critics stress what needs doing. It should be noted that government officials seem pleased at the initiative being taken by the junior staff, since many of the things that worry the young doctors worry ministry officials more than the consultants realize.

What the junior doctors can do and will do next is not clear. There have been some scattered suggestions that junior staff hold only to formal working schedules, and, since overtime is the rule, the result would necessarily be cutbacks, in some places drastic, of important hospital services. Such talk has been dampened, both because the doctors themselves take pride in the service they provide and because any slowdown could dissipate the present considerable public sympathy for their cause.

Perhaps the junior doctors' greatest leverage lies in the emigration figures.

—JOHN WALSH

(A second article in this space will discuss this matter of emigration, which some serious observers now claim puts the National Health Service itself in jeopardy.)

Smale Aftermath: ICSU and Academy Urge Ban on Politics at Meetings

There have been a number of developments in recent weeks at least in part connected with the affair of Stephen Smale, the Berkeley mathematician who, while on NSF subsidy, stood on the steps of Moscow University and berated both the United States and the Soviet Union (*Science*, 7 October).

First of all, as a consequence of Smale's activities and other political outcroppings at international scientific meetings this summer, two prestigious scientific organizations have issued pleas that scientists refrain from political activity at such meetings. These pleas were embodied in resolutions adopted 2 October in Washington by the 16-member council of the National Academy of Sciences (NAS) and a few days

later, in Monte Carlo, by the executive committee of the International Council of Scientific Unions (ICSU). The ICSU committee consists of 33 members, including representatives from scientific organizations in the United States and the Soviet Union.

Neither organization made specific reference to the source of its concern, but clearly both resolutions were inspired by efforts, at scientific meetings in Moscow during the summer, to drum up protest against the U.S. role in Vietnam. In the case of the ICSU statement, it was pointed out that the tradition of excluding politics from scientific meetings has enabled ICSU "to exert considerable influence in order to ensure the free movement of *bona fide* scien-

tists to attend scientific meetings anywhere in the world." Which is perhaps another way of saying that, if international congresses become a place to score political points, cloak-and-dagger spooks from East and West can reasonably be expected to crowd in and seek to manipulate the proceedings.

NSF, which is a very small boat on the seas of national politics, has regained its composure after a touch of panic over the Smale affair, and is honorably, though quietly, standing by the principle that, by Act of Congress, it is concerned only with the professor's mathematics, not his politics. Representative Richard L. Roudebush (R-Ind.) announced last week that he "will explore the possibility of drafting individual legislation to block Smale's grant for next summer and also, when the 90th Congress returns in January, seek a House Committee on Science and Astronautics review of the National Science Foundation's procedures for awarding grants and fellowships." No one sympathetic to the Foundation wants to inflame "Roudy," as his congressional colleagues affectionately call him. But inquiry suggests some similarity between his proclamation and

that of *Henry IV's* Glendower, who said, "I can call spirits from the vasty deep." To which Hotspur replied, "Why, so can I, or so can any man; but will they come when you do call for them?" Roudebush is a minority-party member of a committee whose chairman, George Miller (D-Calif.), is very friendly to NSF and the University of California, and while Miller's views on the Smale affair have not been disclosed, it is doubtful that they coincide with Roudebush's.

Meanwhile, with the issue of poli-

ticking by individuals on NSF grants quiet for the moment, another matter, indirectly related to the Smale case, is just beginning to be stirred. Last week, Serge Lang, of the Columbia mathematics department, who shared an office with Smale during a leave last year at Berkeley, lectured at Princeton, where Smale is spending this academic term on leave at the Institute for Advanced Study. The lecture, titled "Topics in Political Science I: Smale, Universities, Government, and Contracts," was an *ad hoc* affair, held on 4 days'

notice, in which Lang wittily ranged over a wondrous variety of matters before an appreciative audience of some 75 students and faculty members. If any point emerged from Lang's 65 minutes of rapid delivery, it was his violent opposition to NSF's requirement that grantees file effort reports after each 3-month period in which they have received NSF funds. In the past, some institutions have taken care of the paperwork without bothering the grantee. But, early this year, all federal agencies supporting research adopted a new system for computing overhead costs on research grants. Known as cost sharing, the new system replaces the method of the government's simply paying a straight percentage of direct costs. Now the government and the universities share the costs, which, in general, means more money for the universities. But, to figure the shares, the university must specify the contribution that it is making to federally supported projects, and this has resulted in an institution's paying closer attention to the requirement that its faculty members account for their time. In the view of Lang and many others, it is nonsensical and offensive for a scientist to be required to account for his research time, and often impossible for him to do so. Lang, a prodigious letter writer and xerox-er, has been urging colleagues across the nation to protest the requirement. In a letter to a Columbia official (with copies to 28 other individuals), Lang asserts that "once the grant is made . . . it should be like salary. I firmly believe that it is irrevocable, and that at most a brief report of the year's progress can then be asked. . . . This should be the practice with any source of support like government grants. . . ." Just how much of a stir this is going to create is not clear. But what is clear is a deficiency of rapport between NSF and its constituency. Perhaps more than any other federal agency, NSF has tailored its programs according to an enlightened view of the best interests of the people it serves. NSF is, in fact, largely composed of people drawn from the scientific community and in continuing close contact with the scientific community. And as things now stand in this country, it is the best that the scientific community can reasonably hope for in its dealings with government. Nevertheless, the Foundation generally hears from its clients only when they want money or are displeased about not getting it; and

NAS, ICSU Statements on International Meetings

The following statements were separately adopted earlier this month by the Council of the National Academy of Sciences and the Executive Committee of the International Council of Scientific Unions.

National Academy of Sciences

Scientific meetings sponsored by the international unions provide an unparalleled opportunity for scientists to exchange scientific information in their chosen fields. The intrusion of nonscientific issues into union-sponsored gatherings, either during the formal sessions or in a manner that identifies them with the meetings, can only serve to undermine the union as vehicles for advancing scientific knowledge.

The National Academy of Sciences is the organization that serves as the focus for participation by the United States in the work of the International Council of Scientific Unions and its constituent unions, committees, and commissions. The Council of the Academy re-emphasizes the basic nonpolitical nature of those organizations. ICSU and the unions exist to facilitate free and constructive communication on scientific matters among scientists from all areas, irrespective of the social and political policies of their governments. To this end there is a long-established tradition that their deliberations remain unencumbered by the introduction of political statements and related activities.

The Council of the NAS urges all scientists to help maintain ICSU's nonpolitical traditions by avoiding controversial nonscientific activities while participating in union-sponsored meetings.

International Council of Scientific Unions

The International Council of Scientific Unions (ICSU) with its component Unions and committees, exists to promote active cooperation in scientific matters between scientists from all parts of the world, regardless of the political structure of their governments. To this end, there is a well-established agreement that scientific meetings shall not be disturbed by political statements or by any activities of a political nature. It is upon this understanding that ICSU has been able to exert considerable influence in order to ensure the free movement of *bona fide* scientists to attend scientific meetings anywhere in the world.

The Executive Committee of ICSU, unanimously, wishes to emphasize the importance of this agreement on the exclusion of politics and draws attention to the need of observing it at all times.

Congress rarely hears from them, except for an occasional attempt to enlist a congressman's help in appealing an adverse decision. Apparently there is little realization, in the rank and file of the scientific community, that the Foundation is a political creation whose rate of growth and policies are in large part determined by the elected representatives who sit in the U.S. Congress.

—D. S. GREENBERG

Announcements

An office of **engineering standards** liaison and analysis has been created at the National Bureau of Standards. The new office, part of the NBS director's office, is designed as a "focal point for NBS assistance to engineering standards-making bodies throughout the Nation." It will help make the bureau's technical resources available to private standards organizations, manufacturers, and government agencies concerned with the development of performance standards and test methods for industrial products. George S. Gordon, formerly chief of the textile and apparel technology center in NBS's institute for applied technology, will head the office.

The Canadian government has authorized Atomic Energy of Canada Limited to design and build a **nuclear power station** in Quebec province. The station will be constructed at Pointe aux Roches, on the south shore of the St. Lawrence River about 100 miles from the United States-Canada border in Maine; it is expected to be operational in 1971 with an output of 250,000 kilowatts of electricity. AECL will own the power plant initially, but Hydro-Quebec will operate it and buy the power produced. Plans call for Hydro-Quebec to eventually buy the station and incorporate it into its existing power system.

The National Academy of Sciences invites applications from **U.S. scientists to visit the U.S.S.R., Czechoslovakia, Poland, Romania, Yugoslavia, and Hungary** during the 1967-1968 academic year. Applicants must be U.S. citizens and have a doctorate in physical, biological, or behavioral sciences, or in mathematics or engineering. Applicants should specify which country they wish to visit. Under an agreement between the NAS and the Soviet

Academy of Sciences, about 16 persons may be selected for research visits of 3 to 10 months and a "very few" for 1-month lecture and survey visits to the U.S.S.R. Arrangements with the other academies will permit both types of visits. The program with Hungary, although not yet in effect, is expected to become operational by the end of the year and applications are being received on this basis. Participants will receive transportation to and from the foreign country; those staying 3 months or longer may receive grants to offset salary losses, and those whose visits will last 5 months or more may also receive travel support for dependents.

Additional information and applications may be obtained from the Office of the Foreign Secretary (U.S.S.R./EE), NAS, 2101 Constitution Avenue, NW, Washington, D.C., 20418. Applications are due by 21 November.

The Public Health Service has published a report entitled *Trends in Graduate Enrollment and Ph.D. Output in Scientific Fields at 100 Leading Institutions 1963-64 to 1964-65*. The study covers the biosciences, mathematics and statistics, physical sciences, psychology, selected social sciences, and social work. The schools named confer some 92 percent of this country's Ph.D. degrees in those sciences. Analyses are based on data taken from an annual survey of enrollment for advanced degrees, which the U.S. Office of Education conducts, and from institutional data on NIH training and fellowship programs.

The report, ninth in the PHS series, *Resources for Medical Research*, updates an earlier study (number six in the series) on 5-year trends in the same fields at the same schools. The current study is 94 pages long, of which the first 21 include the text, charts, and tables; the rest of the book is devoted to the appendix, which presents the statistics on enrollment and Ph.D. output for the individual schools. Copies of the publication are available from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402, for 50 cents.

The Government Printing Office has released the proceedings of a conference held last February on **job development and training for workers in health services**. The meeting, attended by nearly 300 representatives of a variety of government and nongovernment agencies, was an attempt to find ways to

increase the supply of manpower available for supportive jobs of a skilled, semiskilled, or technical nature. It lasted 4 days. The major suggestions the participants made centered around spending more federal money for recruiting and training programs, improving salaries and working conditions, and providing more opportunities for advancement of qualified workers.

The proceedings are published in a 102-page book, *Training Health Service Workers: The Critical Challenge*, available for 60 cents from the Superintendent of Documents, GPO, Washington 20402.

The Smithsonian Institution and the National Cancer Institute have established a **Registry of Tumors in Lower Animals** at the Smithsonian. The registry is collecting specimens which may be useful in studies of fundamental neoplastic processes. Scientists are invited to help build the collection by submitting "examples of induced or naturally occurring neoplasms, preneoplastic conditions," or lesions that are suspected neoplasms. The specimens will be available for use by visiting investigators. Additional information is available from the registry's director, George E. Cantwell, Registry of Tumors in Lower Animals, U.S. National Museum, Smithsonian Institution, Washington 20560.

The California State College at Palos Verdes has moved and its name changed to **California State College**, Dominguez Hills. The new address is Post Office, Gardena.

Required 6-months' notice is given on the possible use of plenary powers by the **International Commission on Zoological Nomenclature** in connection with the following names, listed by case number [see *Bull. Zool. Nomenclature* **23**, pt. 4 (14 October 1966)]:

- 1723. Suppression of *Sphyraena acus* Lacépède, 1803, and *Belona argalus* Lesueur, 1821 (Pisces).
- 1728. Suppression of *Voluta mitra episcopalis* Linnaeus, 1758 (Gastropoda).
- 1740. Suppression of *Clupea flosmaris* Richardson, 1846 (Pisces).
- 1742. Type-species for *Cosmopterix* Hübner, 1825 (Insecta, Lepidoptera).
- 1745. Suppression of *Macrochoeta* Macquart, 1851 (Insecta, Diptera).