

in Indo-European languages, says Sorenson; yet among the Canela they are mutually reinforcing.

- Patterns of mutual respect and interpersonal harmony among even densely populated groups in the Western Caroline Islands of Micronesia.

Sorenson has a somewhat Rousseauian view of the virtues of traditional societies. Nonetheless, one need only look at the facial expressions of young monks he has photographed during rituals at Tibetan monasteries—expressions reflecting various mixtures of awe, pensiveness, and rapture—to perceive the extraordinary range and subtlety of culturally conditioned emotional expression. People are beginning to recognize that environmental diversity must be preserved if humankind is to keep its



Sorenson holding ancestral skull from Vanuatu, formerly the New Hebrides.

options open. Sorenson's message is that the same principle applies when it comes to preserving knowledge about the emotional and behavioral diversity of human beings.

Sorenson has been described as a "genius," and a "lone wolf" type whose uncompromising approach to his work does not stand him in good stead when it comes to attracting political support. Smithsonian official Wilton Dillon, an anthropologist, also observes that his work stands outside the trends in modern anthropology which, "like other disciplines, has become so specialized that it has become divorced from its humanistic past." Sorenson is planning to sell his collection of Asian and New Guinean artifacts to finance further travel. Says Dillon: "if there was anybody who ever needed a patron, he is that."

—CONSTANCE HOLDEN

Rifkin versus Gene Splicing: NIH Wins a Round

A federal judge in Washington, D.C., has ruled that private companies, unlike federally funded researchers, are not legally required to obtain permission from the National Institutes of Health (NIH) before releasing into the environment organisms modified by gene splicing.

The ruling, by Judge Aubrey Robinson, Jr., came in a suit brought by author-activist Jeremy Rifkin. Rifkin was seeking, in effect, to force NIH to become the only federal agency with broad authority to regulate all experiments involving deliberate release of genetically engineered organisms. NIH does not want such sweeping authority, and Judge Robinson said in his ruling that there are "no legal grounds to compel NIH to regulate private firms."

NIH currently has jurisdiction only over researchers it funds. The Environmental Protection Agency (EPA) and the Department of Agriculture are claiming authority over specific types of experiments, whether funded publicly or privately, however. This means that NIH-funded researchers have to obtain approval from two separate agencies before conducting deliberate release experiments, while private companies are required to submit their proposals to a single agency.

Moreover, according to Lee Rogers, Rifkin's attorney, some types of experiments may not fall under the jurisdiction of any regulatory agency. "We were trying to say there should be no distinction between federally funded and company-funded proposals," says Rogers.

Rifkin used what one NIH official calls an "extremely contorted and remote argument" to force NIH to regulate private companies. In essence, he claimed that a clause in patent agreements between Stanford University and private firms for the use of a basic gene-splicing technique requires the firms to comply with NIH's recombinant DNA guidelines. Since NIH funded the Stanford work and is a party to the agreements, it can use them to exert authority over the companies, Rifkin claimed. Judge Robinson was unpersuaded.

The ruling is the latest setback for

Rifkin in his crusade against genetic engineering. Last year, he won a major victory when Judge John J. Sirica ruled that an experiment proposed by researchers at the University of California at Berkeley, which NIH had approved, could not go ahead because it had not been adequately reviewed for its potential environmental impact. Sirica also stopped NIH from approving any more experiments (*Science*, 1 June 1984, p. 962).

Last February, however, an appeals court said that NIH could go on approving experiments. (Rifkin filed his suit seeking to force NIH to regulate privately funded experiments before the appeals court acted. His objective at the time was to force companies to go to NIH while NIH was under court order not to approve any experiments, a situation that would effectively have placed a moratorium on all deliberate release experiments.)

NIH has now prepared an environmental assessment of the Berkeley experiment and will soon ask Judge Sirica to lift the injunction against it. The researchers will, however, have to obtain permission from EPA before they can go ahead.—COLIN NORMAN

Education Research Reorganization Announced

Secretary of Education William J. Bennett on 2 July announced a reorganization of the educational research bureaucracy, in which the National Institute of Education (NIE) will be renamed and its autonomy sharply diminished.

Two presidentially appointed positions will be eliminated, and the NIE and the National Center for Education Statistics will be reorganized within the Office of Educational Research and Improvement. This will be headed by a new assistant secretary, Chester R. Finn from Vanderbilt University. Finn, an early architect and later critic of NIE, was expected to receive Senate confirmation in mid-July.

Presented as a move toward "streamlining and consolidation," the plan entails the creation of five new offices—for research, statistics, information, library programs, and "improvement of practice." This last office

will oversee the regional educational laboratories and will also administer the secretary's discretionary fund, which Bennett plans to devote to the "three C's"—"choice, content, and character."

"Choice" refers to a top Bennett priority, which is the promotion of vouchers and tax credits for private-school attendance. A task force headed by Finn will be established to coordinate research activities throughout the department.

The setup is generally regarded as designed to please conservative critics of NIE, who regard it as a bastion of liberalism. However, it has met with approval from moderate groups on both the left and right.

—CONSTANCE HOLDEN

Site Requirements Drawn Up for SSC

The Superconducting Super Collider (SSC) will require a level site with uniform geological characteristics, access to substantial quantities of fresh water, up to 200 megawatts of power, a relatively benign climate, a nearby airport, and communities with attractive social, cultural, and recreational resources, according to preliminary site criteria drawn up by the SSC design group.*

There is likely to be no shortage of contenders claiming to have the desired features. Even though the SSC is still in the early design stage and has not been approved by either the Department of Energy (DOE) or Congress, three states—Illinois, California, and Texas—are already positioning themselves to bid for the project if it gets the green light (*Science*, 7 June, p. 1181).

The design group's specifications are as follows:

- The site will be level or gently sloping to permit construction of the tunnel on a horizontal plane or tilted up to 1 degree. The tunnel, which will have a circumference of 60 to 100 miles, depending on the strength of the magnets chosen, will be constructed by cut-and-fill excavation on

a very flat site or by boring beneath the surface on a sloping site.

- The geology should be uniform to permit the use of common construction methods. Soft soils and ground water in pervious soils should be avoided. A site crossing an active fault line would be unacceptable.

- There will be a potential need for 2000 gallons per minute of water, mostly for cooling purposes. If water supplies are limited, electricity requirements would be substantially increased. Peak electrical power demand is reckoned to be 200 megawatts.

- Sources of vibration such as highway and railroad traffic, aircraft, and some types of industrial activity could be disruptive.

- "Summers with low humidity and few severe storms and winters with low accumulations of snow would be advantageous," the design group states.

The siting criteria are now being reviewed by DOE. If a decision is made to go ahead with the project, DOE will put out a request for proposals for the site. A panel appointed by the presidents of the National Academy of Sciences and the National Academy of Engineering will review the submissions and pare them down to a select few for a final decision by DOE.—COLIN NORMAN

Physics Institute Will Not Restrict Meetings

The American Institute of Physics, in a statement issued on 8 July, says it will not hold restricted sessions at any of its meetings to permit the presentation of unclassified papers that the Department of Defense (DOD) deems militarily sensitive.

The statement was issued in response to the growing trend of restricting attendance at some technical society meetings to U.S. and Canadian citizens and nationals of other non-Communist countries who have been approved by their embassies. Such restrictions have been imposed by some societies on their own initiative, but there is growing concern that DOD will require that unclassified but sensitive papers be presented in restricted sessions.

These concerns stem from a recent meeting of the Society of Photo-Optical Instrumentation Engineers (SPIE), at which restricted sessions were organized at the last moment to allow the presentation of some 28 unclassified papers that DOD had turned down for presentation in open sessions (*Science*, 26 April, p. 471). The legal instrument used to restrict attendance at the sessions was a new set of regulations designed to limit release of sensitive information under the Freedom of Information Act. Technical society officials feared that these regulations, which were used at the SPIE meeting to cope with a specific problem, would in future be routinely used by DOD to restrict attendance at other meetings.

Indeed, draft guidelines recently circulated among scientific societies by the Pentagon's Office of Research and Laboratory Management set out a procedure for review of DOD-sponsored papers that includes an assessment of whether the papers fall within the new regulations. According to the draft guidelines, conference organizers should tell DOD in advance which sessions will be restricted, and the organizers themselves will be responsible for implementing the controls at the meeting.

(No restrictions would be placed on papers derived from research sponsored by DOD on university campuses unless controls have been agreed in advance by contract. The restrictions would apply to work done in government laboratories or by industrial contractors.)

The Institute of Physics statement in effect says that the organization wants no part of such arrangements. According to the institute's executive director, H. William Koch, the statement was issued in part to encourage the organization's nine member-societies to adopt similar policies of their own. The American Physical Society has, in fact, already done so.

Some other technical societies are taking a less firm position. The Institute of Electrical and Electronics Engineers (IEEE) recently announced that it would not hold restricted sessions, but if IEEE members want to organize such sessions themselves in conjunction with an official IEEE meeting, a notice advertising the sessions will be published in the conference announcement.—COLIN NORMAN

*"Superconducting Super Collider Siting Parameters Document," available from the SSC Central Design Group, Universities Research Association, Lawrence Berkeley Laboratory, University of California, Berkeley, Calif. 94720.