Astronomical personal

gambles





1478 Egypt's postmodern Giza



1479 Tumult beneath Yellowstone Lake

Boehlert says they "need just as much reevaluation as do the alternative energy R&D programs the policy seems to distrust."

Researchers are puzzled by other recommendations. One asks the President's Council of Advisors on Science and Technology (PCAST) to "make recommendations on using the nation's energy resources more efficiently." But plasma physicist John Holdren of Harvard University notes that he chaired a seemingly identical 1997 PCAST effort. "It's not clear to me [whether] the task force was aware of our results," says Holdren, who had no contact with Cheney's team. "I don't know if it makes sense to do it again."

The energy report's lack of scientific perspective, Holdren says, highlights the new Administration's failure to connect with the technical community. But Congress may be more receptive to researchers' advice when it starts to translate the strategy's sketchy outline into legislation. In the Senate, for instance, a bipartisan group including Pete Domenici (R-NM), Jeff Bingaman (D-NM), and Joe Lieberman (D-CT)—has already suggested boosting DOE's renewable research programs. Last week House Democrats released their own energy strategy. It calls for doubling the DOE's science budget over 5 years and creating a "science czar" to ensure that the best science guides any overall energy road map.

–DAVID MALAKOFF With reporting by Andrew Lawler.

EMBRYONIC STEM CELLS

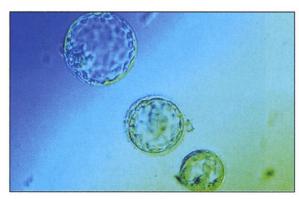
Court Asked to Declare NIH Guidelines Legal

Seven prominent stem cell scientists, together with three patients, have filed suit against the U.S. Department of Health and Human Services (HHS) and the National Institutes of Health (NIH). They are charging that the Bush Administration's failure to fund work on human pluripotent stem cells is causing "irreparable harm" by delaying potential therapies.

Last August, NIH issued guidelines to govern federal funding of work on human pluripotent stem cells (HPSCs) (*Science*, 1 September 2000, p. 1442). The move paved the way for NIH-funded scientists to conduct research that can now be done in the United States only with private funds. But it ignited a controversy because the cells—which in theory could be coaxed to

become any cell type in the body—are derived from human embryos or fetal tissue obtained from elective abortions. In February, the new Bush Administration asked HHS Secretary Tommy Thompson to review the guidelines; Thompson in turn told NIH to put its process for implementing them on hold (*Science*, 20 April, p. 415).

On 8 May, the scientists, who work with HPSCs using private funding, joined forces



In dispute. Suit seeks implementation of guidelines that would permit U.S. government funds to be used for research on pluripotent stem cells derived from human blastocysts (*above*).

with actor Christopher Reeve (paralyzed by a spinal cord injury), Parkinson's disease advocate James Cordy (who suffers from the disease), and Chicago business executive James Tyree (who has type I diabetes). In their complaint they ask the U.S. District Court for the District of Columbia to declare that the NIH guidelines are legal and to compel NIH to fund research on the cells. The plaintiffs include James Thomson of the University of Wisconsin, Madison, who first isolated HPSCs from embryos, and John Gearhart of Johns Hopkins University, who isolated HPSCs from fetal tissue. It also includes the three researchers who have asked NIH to certify that cell lines they have derived meet the guidelines, a prerequisite for their use by other federally funded researchers. They are Roger Pedersen of the University of California, San Francisco, and Alan Trounson and Martin Pera of Monash Medical Center in Melbourne, Australia. Stem cell researchers Dan Kaufman of the University of Wisconsin, Madison, and Douglas Melton of Harvard University are also listed as plaintiffs.

In the 22-page complaint, the plaintiffs argue that by halting NIH's review process, HHS is failing in its "statutory duty to fund scientifically meritorious research projects." They note that the 1993 NIH Revitalization

Act specifically bars the executive branch from blocking funding for research on transplanting fetal tissue; they also argue that embryonic stem cell lines, as opposed to embryos, are fetal tissue. The review is causing irreparable harm by "delaying research using HPSCs ... by restricting collegial sharing of cell lines with other scientists, and by discouraging talented young researchers from joining their labs or entering the field of

HPSC research," the plaintiffs assert. The patients charge that the HHS review is "preventing or delaying the development of potential treatments" for conditions such as paralysis, Parkinson's disease, and diabetes.

This is not the first time the issue has been in the courts. Nightlight Christian Adoptions, an agency that arranges adoptions of extra human embryos created as a part of fertility treatments, filed suit on 8 March to block the NIH guidelines. That suit was put on hold when Thompson asked NIH to suspend its review process.

The government has 60 days to respond to the complaint, says Jeffrey Martin of Shea & Gardner in Washington, D.C., who is representing the plaintiffs pro bono. "Much of the conversation about legal arguments was one-sided until we filed our case," says Martin. He hopes the arguments in the suit will help persuade the Administration to allow the guidelines to proceed. —GRETCHEN VOGEL

U.S. SCIENCE EDUCATION

Lawmakers Vie to Shape NSF Program

Congress abhors a vacuum. So this spring, after President Bush proposed a \$200-milliona-year science and math education program to be run by the National Science Foundation (NSF) but offered scant details (*Science*, 13 April, p. 182), legislators jumped at the chance to influence one of the hottest political debates of the year. The result is a slew of bills that would flesh out Bush's sketchy plan to forge partnerships between university researchers and local school districts. Chances appear good that one or more of them will be adopted this year, although funding levels remain up in the air.

Making the biggest splash is a plan intro-