ence the flow of water through a material. And plants are full of hydrogels, in the form of pectins that glue cell walls together. Could pectins regulate the xylem's water flow? They injected the xylem with solutions of varying pH and polarity, factors known to activate hydrogels. Low pH and nonpolar solvents did, indeed, spur immediate increases in xylem flow rate—a similar effect, the researchers say, to the xylem's uptake of salty water from soil.

Further experiments localized this activity to the xylem's "pit" membranes—a sievelike mesh of cellulose fibers and pectins. Water flowing up the xylem must pass through these membranes. As a plant soaks up soil minerals, the researchers suggest, the pectins can either swell or shrink. When pectins swell, pores in the membranes are squeezed, slowing water flow to a trickle. But when pectins shrink, the pores can open wide, and water flushes across the xylem membrane toward thirsty leaves above.

Now Holbrook's team wants to figure out how, exactly, plants put the xylem's water-control system to work. Zwieniecki suggests that the xylem preferentially waters branches or leaves most in need of a drink. The membrane mechanics may also help the xylem deal with drought. But the scientists are ready to be surprised—again. "It had never occurred to me that the xylem could have these inner controls," remarks Pickard. "There must be a lot more to learn here."

–KATHRYN BROWN

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NATIONAL SCIENCE FOUNDATION

## Transition Rumor Targets Colwell

It was a classic Washington rumor. The incoming Bush Administration had told Rita Colwell, the director of the National Science Foundation (NSF), to hit the road. The supposed evidence? The head of the transition team for NSF, Richard Russell, had held a brief, get-acquainted meeting with Colwell that, according to some sources, "was a disaster." Russell, it was noted, has been a staffer on the House Science Committee, whose chair, Representative James Sensenbrenner (R–WS), had sparred publicly with Colwell and last year drafted a reauthorization bill with language intended to curb some of her powers. The message allegedly was being conveyed by former Energy Secretary James Watkins, who has been advising the new Administration on science and technology issues.

With the scientific community already nervous about the new president's commitment to basic research, the rumor spread last week like wildfire. No matter that Colwell is in the midst of a 6-year term that runs until 2004, that she had told colleagues the meeting went well, and that transition officials deny that any mention of Colwell's tenure was ever raised. Another complication is that the outgoing Clinton Administration had explicitly exempted Colwell and other presidentially chosen agency heads with "term appointments" from the need to submit their resignation—a move that makes it easier for the new president to clean house—and that Colwell has said repeatedly that she hopes to complete her term. In addition, there is little evidence that the new Administration so far has focused on science policy at all, much less on who should lead a low-profile agency like NSF.

Indeed, it may have been the absence of real news that caused things to snowball in the 48 hours preceding last weekend's inauguration ceremonies. Members of the National Science Board, NSF's presidentially appointed oversight body, contacted friends in high places to trumpet the danger of "politicizing" NSF by replacing its director in midterm. Although the board issued no public statement, Watkins, who sources say was "extremely upset" by rumors of his involvement, sent its 24 members an e-mail applauding them "for taking such a strong, timely position." Scientific societies began collecting signatures on a letter that urges the new president to maintain the "independence of the director's office" as the best way to protect the "integrity of basic research."

By Monday, the fire seemed to be subsiding. "Dr. Colwell is enthusiastically looking forward to completing her term," says her spokesperson, Curt Suplee. However, because it's impossible to disprove, and because nobody has stepped forward to claim responsibility for starting it, the rumor may continue to smolder at least until the new Administration signals its intentions toward NSF.

–JEFFREY MERVIS


**Hearing whispers.** Rita Colwell, with Senator Pete Domenici, hopes for more opportunities to celebrate NSF facilities like the Very Large Array (VLA) radio telescope.

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CLINICAL MEDICINE

## FDA to Release Data On Gene Therapy Trials

Moving to allay public concerns over the risks of gene therapy experiments, the U.S. Food and Drug Administration (FDA) last week proposed publicly releasing much of the safety and protocol data from clinical trials that it now keeps confidential. The agency wants to apply the same policy to animal-to-human transplants, another controversial experimental procedure.

Several gene therapy researchers praised the decision. "We think public fears should be assuaged, and one way to do it is to make the information available," says Inder Verma of the Salk Institute for Biological Studies in La Jolla, California, president of the American Society of Gene Therapy. Phil Noguchi, director of the cellular and gene therapy division at FDA's Center for Biologics Evaluation and Research, agrees that the proposed rules are important symbols: "It's the perception of something being hidden that's the scary part." Biotech industry officials, however, are not pleased; they worry that releasing clinical data could stifle drug development and that the public may misinterpret the safety reports.

The changes come in response to the 1999 death of 18-year-old Jesse Gelsinger in a gene therapy trial at the University of Pennsylvania in Philadelphia. The incident triggered a flurry of reports and congressional hearings on whether safety problems from this and other trials were being fully disclosed by sponsors, whether academic or commercial (*Science*, 12 May 2000, p. 951). It also revealed the confusion over current government reporting requirements.

Under the proposed rule, FDA would make public much of the information that sponsors now submit in confidence to the agency on their gene therapy clinical trials, including preclinical toxicity data, protocols, informed consent forms, ongoing reports of adverse events, and records of any FDA investigations. Under FDA rules, for example, companies must report within 7 to 15 days serious events that are unexpected and possibly related to the therapy. Companies themselves would remove personal and confidential business information from these documents, which FDA would then post on the Internet.

The Biotechnology Industry Organization (BIO) says the FDA proposal sets a "trou-