



BARBARA J. WRIGHT/ANIMALS, ANIMALS

Unwise decision? The burrowing owl wouldn't be protected by draft Canadian law.

Canada Debates Species Protection Act

As Canada considers adopting its first law to protect endangered species, scientists have become embroiled in a heated debate over whether a bill unveiled this fall will be too weak to protect plants and animals at risk of extinction.

A government advisory panel of biologists, environmentalists, and industry groups began drafting an endangered species act in 1995, and last May released a final proposal. Like the U.S. law, it would prohibit harming species at risk or damaging their nests or dens. But critics point to several gaps that turned up when the Environment Ministry presented the draft bill to Parliament this fall. One is its scope: The law would protect only aquatic species, some migratory birds, and

any species on federal lands. That would leave unprotected about 60% of the 254 species listed as at risk, including animals that cross national borders, such as the grizzly bear, peregrine falcon, and burrowing owl. Beyond this, "the big shortcoming," says ecologist David Schindler of the University of Alberta, is that the law wouldn't mandate protection of habitats. Also troubling to scientists is that the bill would give final say on listing species not to the experts, but to the federal Cabinet.

The bill is less aggressive than some would like, says Stewart Elgie of the Sierra Legal Defence Fund, in part because Ottawa wants to leave it to provinces to protect species on their lands. But Elgie and others say only a national law makes sense. More than 200 scientists are expected to sign a letter urging Prime Minister Jean Chretien to strengthen the final law, which will be hashed out in the coming months.

NTT Labs to Get New Bosses

Japan decided last week to split its national phone company, Nippon Telegraph and Telephone (NTT), into three pieces under a plan that will preserve the company's \$2.9 billion research enterprise. But the deal, a compromise between NTT and Japan's

Ministry of Posts and Telecommunications (MPT), also means the labs will have to sharpen their sales pitch to the rest of the company and the entire industry.

Under the plan, NTT would be divided into one long-distance and two local-service providers, all fully owned by a new parent holding company. NTT's applied research would be parceled out among the service providers, while basic research on materials, optoelectronics, and quantum-effect electronics would continue under the holding company.

The ministry had long wanted to break up NTT to foster competition; NTT had resisted, partly because of the possible impact on the labs (*Science*, 12 April, p. 186). As for the compromise, says NTT spokesperson Atsushi Touno, "there won't be any deterioration of NTT's R&D strengths." But Eiichi Tanaka, an MPT policy official, notes that researchers will need to sell their results to the service providers or firms outside the group.

Masao Kawachi, head of research planning for NTT's Basic Research Labs, is cautiously optimistic. "If the holding company plan works well, negative effects could be minimized, but we're not sure just how it will go," Kawachi says. The reorganization must clear several legal hurdles, but could take effect in 1999.

Russian Research on the Ropes

Russian science may be in even more trouble than observers have realized, according to new data in a draft report from a Russian government think tank. *Russian Science and Technology at a Glance* 1996, to be released early next year by the Center for Science Research and Statistics (CSRS) in Moscow, contains eyebrow-raising statistics on everything from the country's scientific brain drain to the decline of federal R&D spending.

Perhaps the biggest surprise is the rate at which Russian scientists are fleeing to other countries or other professions. CSRS estimates that the number of researchers has plummeted nearly 50%—from about 1 million in 1990 to 518,700 in 1995.

That's not necessarily bad for commerce, as more than half the ex-scientists have begun new careers within Russia, and a move of talent to banking and other sectors "is gainful for the economy," says CSRS deputy director Leonid Gokhberg. But there's a dark side, he says: Some of the best scientists have gone abroad, and "less qualified personnel continue to stay in R&D." Indeed, adds Gerson Sher, executive director of the Civilian Research and Development Foundation, a U.S. organization that funds East-West collaborations, the latest figures "suggest a real cataclysm going on there."

Meanwhile, funding of Russian research has dropped off a cliff. The federal R&D budget has declined from roughly \$10 billion in 1990 to just \$2.45 billion in 1995, or from 2.03% to 0.73% of gross domestic product. "R&D still enjoys a low rank among the government's priorities," says Gokhberg. In addition, while total university enrollment is up, fewer science students are receiving advanced degrees. In 1992, universities awarded more than 29,000 candidate and doctoral degrees in the sciences, but in 1995, only about 14,000.

Lawmakers Jostle for Committee Chairs

Members of Congress are winding up their post-election scramble to run committees, and some new faces are appearing on panels affecting science.

The big change in the Senate is the replacement of retiring Appropriations Committee chair Mark Hatfield (R-OR), a fan of biomedical research, by Ted Stevens (R-AK). Meanwhile, James Jeffords (R-VT) is replacing Nancy Kassebaum (R-KA) as chair of the Labor and Human Resources Committee, which hopes to write a new authorization bill for the National Institutes of Health. Dan Coats (R-IN)—an abortion opponent—had indicated he might challenge Jeffords for the job, but in the end, he did not. Capitol Hill scuttlebutt had it that Coats might head a new health subcommittee, but staffers now say no such panel is planned.

The Senate Commerce Committee, which has oversight of much of civilian R&D, will be led by John McCain (R-AZ). Last session, the former Navy pilot proposed forcing federal technology programs to conform to peer-review standards, and was a leading critic of the Advanced Technology Program.



McDade

Jeffords

In the House, Joseph McDade (R-PA) will take over the subcommittee that oversees energy spending. McDade recently returned to Congress after being acquitted of charges of improperly accepting gifts and lost a bid to chair the full Appropriations Committee. Hill staffers say he has little experience with energy research issues and is known as an old-fashioned legislator partial to tagging funds for pet projects.