

readily. "I was shocked," says one prion researcher. "It's a lot more plausible than any of the other explanations." But the University of Cambridge's Malcolm Ferguson-Smith, the sole scientist on the three-member Phillips panel, defends its conclusions. "The question that bothered the committee was why scrapie had not previously passed into cattle during the past century, and why it only happened in the U.K." Nevertheless, Cambridge neuroscientist Gabriel Horn, who chairs a U.K. panel that will report later this month on BSE's origins, says his committee is so far "not ruling out" any of the half-dozen or so hypotheses put forward to explain the BSE epidemic.

Matthews says his findings do not necessarily rehabilitate the scrapie hypothesis. Echoing Smith, he says, "we may never be able to come to any conclusions about the origins" of the BSE epidemic. On the other hand, Matthews says, insights into the possible relation between scrapie and BSE could help prevent future epidemics: "The nearer we get to finding the origins, the better we can refine future policy." —MICHAEL BALTER

SCIENCE AND COMMERCE

Few Authors Disclose Conflicts, Survey Finds

Despite heightened sensitivity to the subject, a new report finds that few journals publish information about their authors' ties to commerce. Explicit guidelines are rare, the survey found, and many authors may feel the rules don't apply to their situation.

The survey, reported in the April issue of *Science and Engineering Ethics*, found that a mere 327 (0.5%) of the 61,134 papers ap-

pearing in 181 peer-reviewed journals in 1997 contained statements about authors' financial ties. Two-thirds of the journals published no disclosures; only three did so in at least 10% of their articles. Those journals were the only ones, out of 1396 "high-impact" journals surveyed—most of them covering biomedical research—that had any rules regarding disclosures of potential conflicts of interest. The policies ranged from detailed questionnaires to a request for authors to declare any ties that might be construed as a conflict of interest.

"I would say 0.5% is incredibly small when you look at all the information about the rise of patenting and commercial ties. I would expect at least 20%," says co-author Sheldon Krimsky, a professor of urban and environmental policy at Tufts University in Medford, Massachusetts. He says an earlier survey of Massachusetts biomedical scientists found that one-third of those who published in 1992 had financial interests related to their research—from patents to advisory positions in biotech companies.

Krimsky thinks a lot of scientists "are looking at these policies and saying, 'Sure, I have interests, but they're not conflicts of interest.'" Marcia Angell, former editor of *The New England Journal of Medicine* [which admitted to a failure to divulge potential conflicts among authors of several papers in recent years (*Science*, 3 March 2000, p. 1573)], says the survey demonstrates that journals need to tighten up their policies. Many have a qualifying clause, as in financial ties "that may bias your work," that are "big enough to drive a truck through," she says.

At the same time, it's not clear how well the 1997 data reflect the current situation. The study is "probably already dated because this is such a fast-moving area," says John Parrish, head of dermatology at Massachusetts General Hospital in Boston, who believes financial disclosure is "getting to be the cultural norm." A group of medical school deans, led by Harvard's Joseph Martin, have drafted new conflict-of-interest guidelines for biomedical researchers, and the Association of American Medical Colleges has just established a committee to look into clinical research.

Krimsky and others don't think things have changed that much. While clinical trial mishaps have spurred universities to reexamine conflict-of-interest policies, he says, "journals have not had the same impetus for change." Angell agrees, although she believes that the issue for journals extends beyond self-reporting. "Research institutions [as well] need to have far more stringent regulations," she says.

—CONSTANCE HOLDEN

FRENCH UNIVERSITIES

Reform Plan Seen as Halting Step

PARIS—A sweeping reorganization of France's higher education system could soon give the nation's 1.7 million university students greater freedom to plan their courses and study in other European countries. But the proposed reforms, unveiled last week by education minister Jack Lang, have so far drawn a tepid response.



Lang. University system is "too congealed."

The ministry intends to bring France into the European Credit Transfer System, developed by the European Union in the 1990s to help standardize course credits between E.U. countries and to encourage student exchanges. In a 23

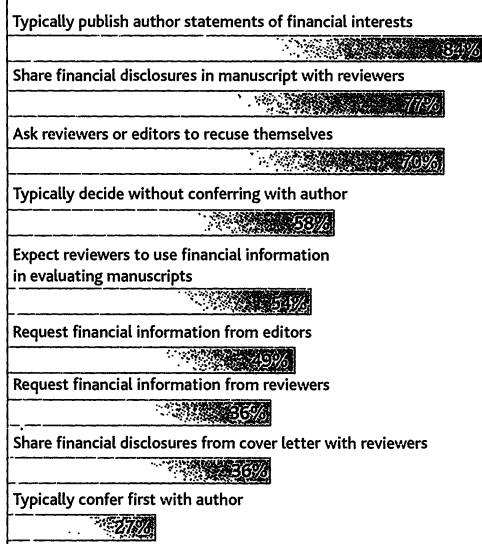
April speech before France's National Council of Higher Education and Research, Lang also argued for a greater emphasis on multidisciplinary studies, especially in the sciences. The current system is "too congealed," he said. "It is not possible, for example, to award a [joint] diploma in biology and computer sciences."

However, some professors and students say the plan fails to address the root of their woes: stagnant funding. Tight university budgets have driven a steady rise in the student-teacher ratio, eroding the quality of science education, says Michel Verdaguer, a chemistry professor at the University of Paris's Jussieu campus. "We have 200 or 250 students in a chemistry class," he says. French students and professors have staged several strikes for better funding since December, most recently at the University of Brittany's campus in Brest. Aware of the deteriorating teaching conditions, the education ministry is creating 4000 new teaching posts over the next 4 years.

Other critics contend that Lang's promise to create 1000 scholarships for foreign study by the end of 2001 falls short of the mark. Currently only about 15,000 French students study abroad each year. "What we want is a real democratization of European study," says Stephen Cazade, president of the Federation of General Student Associations in Paris, "so that each student can do one or more years in another European country." His organization will push for such measures at next month's meeting of E.U. education ministers in Prague.

—MICHAEL BALTER

How Journals Handle Potential Conflicts of Interest



Showing interest. The few journals with such policies take various approaches to conflicts.

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