EUROPEAN UNION

Framework: 'Unfocused, Underachieving'

BRUSSELS—An independent review panel charged last week that the European Union's (EU's) flagship research program "lacks focus and is underachieving." The broadside, from a group chaired by Viscount Etienne Davignon, a former vice president for research at the European Commission, the EU's executive body, came just as EU officials are preparing to seek approval for the next 4-year block of funds for the program, known as Framework 5.

The majority of EU research was gathered under the umbrella of the Framework program in 1984, and the structure of the program and its funding has since been approved in 4-year blocks. Although Framework 4, with a total budget of \$16 billion, accounts for only 3.5% of annual research and development funds in the 15 EU countries, it is influential because it aims to support research beyond the reach of national programs and puts together ambitious collaborations involving scientists in many member countries. Plans for Framework 5, which will begin in 1998, will be finalized later this month for presentation to the EU Council of

Ministers and the European Parliament.

Davignon's report—which was requested by the commission—says that past efforts to achieve a distinctive role for Framework have been blocked by a flawed consultation process and a requirement that the Council of Ministers approve the program by a unanimous vote. The result, said the panel, is that decisions are "decisively colored by national or sectorial perspectives," and the program supports too wide a range of projects. "As it is currently conceived and managed, the program is not flexible enough to respond to new challenges and opportunities," the report says. Edith Cresson, the current research commissioner, agrees that the decision-making process is flawed. "No country would run its own policies like the union. There are too many procedures for controlling and approving," she told a conference on the program in Brussels last week.

The commission has already responded to the criticisms by reducing the many strands in the program into three grand themes for Framework 5: natural resources, user-friendly information technology, and promoting sustainable growth. Emphasis will also be put on enhancing Europe's international standing in research, involving small and medium-sized businesses in R&D, and promoting human potential. Says Jorma Routti, the commission's director-general for science: "Framework 5 has to be much more concentrated. Framework 4 has too many projects." The commission is also seeking a change to majority voting and is pushing for changes in the program's legal structures so that it can respond to new scientific opportunities or crises, such as the epidemic of bovine spongiform encephalopathy.

One aspect of the program that did win plaudits from the reviewers was the quality of the wide range of basic science it supports. But with governments across the continent focusing national research programs on economic and social goals and encouraging cooperation between industry and academic scientists, some European researchers fear that support for basic research will also dwindle in Framework 5. But Routti strongly defends the need for high-quality basic science, particularly in emerging areas such as biotechnology: "The need to support scientific excellence is one thing all member states agree upon."

-Nigel Williams

MARS METEORITES

Tighter Rules for Sharing Studied

HOUSTON-Over the past several months, NASA geologist David McKay has shared tiny pieces of a Martian meteorite with other researchers interested in checking his results that it could contain fossilized life. It was his call, but in the future, he may not have the choice: NASA and the National Science Foundation (NSF) are weighing new rules that would severely restrict investigators who want to parcel out their samples of the 12 known Martian mete-

orites. The goal is to reduce the risk of contamination to such precious property.

Proposed last month by an outside panel commissioned by NASA, the rules would be similar to those used for lunar samples, which require that every grain be accounted for and forbid the sharing of material. "The fear is that once samples are handed out to investigators and they send it out [to others], you don't know what happens," says Jeffrey Bada, a geochemist at the Scripps Institution of Oceanography in La Jolla, California, who is skeptical of McKay's findings. But McKay and others say such restric-



Under scrutiny. Mars rock poses for pictures.

tions would stifle scientific debate on whether life existed in the Martian rock. NASA and NSF officials say they need more data on the risk of contamination before making a decision.

NASA last fall asked the Houston-based Lunar and Planetary Institute to set up a panel to study the issue following publication of McKay's paper on Mars meteorite ALH84001 (*Science*, 16 August 1996, p. 924). The group, led by Bada, declared in a 5 February report

that "the possibilities for organic contamination and sample ambiguity are boundless" once the rocks leave the space center.

"What bothers me is that the curatorial facility has done a wonderful job, but the whole integrity is lost in these hand-me-down samples," says Bada. "I would not accept a sample that didn't come from the curator." Aside from possible contamination, he notes, the spot on the rock from which the sample was taken is hard to pinpoint if the sample does not come from a curator. And such concerns are not just hypothetical: A different Martian meteorite discovered in Antarctica

was found in 1995 to have been contaminated in the lab, according to Stanford University researchers Simon Clemett and Richard Zare (*Science*, 20 December 1996, p. 2122).

McKay and others are not convinced that tougher restrictions are warranted. "Getting more research groups going is a good thing to do," says McKay. "It means better science, more excitement, and enthusiasm. Only in a narrow way can you see a downside." NASA space science chief Wes Huntress dismisses concerns about passing out samples as "a little bit of overreaction." McKay also says that there is plenty of rock left. His team received only about 3 grams of the 2-kilogram meteorite, and he says he has passed out a milligram each to three or four collaborators. NASA itself gave out another 100 grams before McKay's findings were published and distribution was temporarily halted.

NASA and NSF managers say they have no timetable for making a decision, and they must consider the cost of stricter rules. "Curators gasp at the idea of lunar-type protection," says Joseph Boyce, NASA's geosciences chief. "It's very arduous, expensive, and time consuming." Says NSF geologist Scott Borg, "We don't want to inhibit people from healthy collaborations. But considering [ALH84001] has been catapulted into [being] the rarest rock in the world, using the lunar protocols is not an outrageous idea."

-Andrew Lawler