

THE LAST WORD

EIGHT 'MUSTS' FOR BIOTECHNOLOGY

by Sen. Patrick J. Leahy

Now is the time for America to develop a strategic and long-term agenda for the future of biotechnology. We must show the necessary foresight to protect and move forward with our scientific know-how.

Last fall, I chaired a joint hearing of the Agriculture, Nutrition, and Forestry Committee and the Judiciary Committee's Subcommittee on Technology and the Law to address America's competitive position in biotechnology. Committee members were concerned to learn from Earle Harbison, the president of Monsanto Company (St. Louis, MO), that "There is no discernible official attitude toward this or any other emerging industry. The industry, and those who regulate it, operate largely in a political vacuum. There is no clear signal from our political leaders to 'go for it.'"

The public is justifiably concerned about the tide of opinion in Congress. Certainly, the future competitiveness of America's biotech industry will depend, in large measure, on how effectively Government addresses the revolutionary questions biotech poses for our nation.

I have challenged my colleagues in the United States Senate to address the issues raised by biotechnology. Congress must search for ways to advance this technology and keep a step ahead of our competitor countries who invest great resources in the development of biotechnology.

But Congress cannot do it alone. Clearly, advice and guidance must come from those individuals and organizations who work in the biotech field every day. There are eight areas Congress must examine to ensure the success of our biotechnology industry.

First, we must make agricultural applications of biotechnology a national priority. We must ensure that our farmers benefit from new biotech farming tools. To do this, U.S. Department of Agriculture research budgets and the Cooperative Extension Service efforts must be redirected.

Second, America must support the world's premier research program. The success of our research program will depend upon adequate funding, the establishment of cooperative programs, and the availability of highly trained personnel.

Third, we must support small biotechnology firms that pioneer new discoveries. Small companies find it difficult to survive lengthy research investments and many are

latching onto foreign companies for financial support.

Fourth, the tools of biotechnology must be used to protect and enhance our environment. Biotech that reduces this country's chemical dependence should be supported in every possible way. As well, greater efforts to protect our biodiversity must be undertaken.

Fifth, patenting issues must be resolved. Congressional moratoria are not the answer. Congress has a responsibility to address these difficult questions and come up with workable solutions.

Sixth, America's commitment to open exchange of scientific information must continue. America does not hold a monopoly on scientific know-how. Translation of foreign scientific journals, attendance at conferences, and research exchanges should be encouraged.

Seventh, the biotechnology regulatory structure must be reworked. The basic structure is in place but it needs fine-tuning to prevent overlapping jurisdictions and gaps in regulation. The system must provide safety for the public and fairness, timeliness, and predictability to all.

Finally, we must establish international mechanisms that prevent the runaway research that occurs when unscrupulous scientists move research to nations with few, if any, standards. And we must aid developing nations in using the tools of biotechnology to help solve problems of hunger and poverty.

I am convinced that biotechnology is going to create a vast new marketplace in the 21st century. I want America in a position to lead the world in this revolution. These eight areas deserve extensive inquiry and creative planning. I want to work with the biotech community—industry, academia, citizen groups, and government workers—to expand upon these principles. I am anxious to hear your ideas for advancing biotechnology in this country.

The Congress is receptive and ready to act.

Patrick J. Leahy, a Democrat from Vermont, is Chairman of the U.S. Senate Committee on Agriculture, Forestry, and Nutrition (Room 328A, Russell Senate Office Building, Washington, DC 20510-6000) as well as Chairman of the Senate Judiciary Committee's subcommittee on Technology and the Law. These opinions are the author's own, and are not necessarily those of *Bio/Technology*.