

part of America's rich heritage from the far past, when a much more diverse animal community populated the continent."

This site can be valued as a learning tool for school children across Texas and our country, as well as a site for study by professionals. Mr. Speaker, I ask the House to approve this bill, thus bringing an invaluable archeological find one step closer to being part, as I hope, and as it should, a unit of the National Park System.

I thank all of my colleagues for their courtesy, again, their leadership; and finally, Mr. Speaker, if I could just say that nothing ever happens positive in this country or in this Congress without a real team effort, and there were a lot of folks back home as well as here in Washington that worked on this. I want to thank the gentleman from Utah (Mr. HANSEN), the chairman of the Committee on Resources, for his support; the gentleman from West Virginia (Mr. RAHALL), the ranking member, for his support; the gentleman from California (Mr. RADANOVICH); the gentleman from Colorado (Mr. HEFLEY); the gentlewoman from the Virgin Islands (Mrs. CHRISTENSEN); and the gentleman from Indiana (Mr. SOUDER). Again, we would not be here today without their leadership.

And back home, those who first had this vision and have worked to protect this site for years without Federal help so far, the city of Waco, its leadership, represented by Mayor Linda Etheridge and the Waco City Council and staff; people such as Margaret Mills; my friend Sam Jack McGlassen, now deceased, who originally donated this property to the city of Waco, Baylor University, for its important role in this effort; and people such as Allen Samuels and Mr. and Mrs. Buddy Bostick and so many others, who care about preserving our important history for future generations.

I urge, Mr. Speaker, the House to vote in support of H.R. 1925.

Mrs. CHRISTENSEN. Mr. Speaker, I have no further requests for time, and I yield back the balance of my time.

Mr. SOUDER. Mr. Speaker, I yield myself such time as I may consume to conclude by saying that we are looking forward to seeing the continuing development and study by the National Park Service. Our National Park Service is not just great wild places; it is also important cultural and archeological finds, such as Dinosaur National Park, such as Mesa Verde, and other types of archeological finds.

This also proves that Texas not only has the biggest cattle, they at one time had the big mammoths. Even before there were people, they had huge mammoth ranches, apparently.

Mr. Speaker, I yield back the balance of my time.

The SPEAKER pro tempore. The question is on the motion offered by the gentleman from Indiana (Mr. SOUDER) that the House suspend the rules and pass the bill, H.R. 1925, as amended.

The question was taken; and (two-thirds having voted in favor thereof) the rules were suspended and the bill, as amended, was passed.

A motion to reconsider was laid on the table.

#### GENERAL LEAVE

Mr. SOUDER. Mr. Speaker, I ask unanimous consent that all Members may have 5 legislative days within which to revise and extend their remarks and to include extraneous material in the RECORD on the three bills just considered, H.R. 1370, H.R. 1925, and H.R. 4044.

The SPEAKER pro tempore. Is there objection to the request of the gentleman from Indiana?

There was no objection.

#### REGIONAL PLANT GENOME AND GENE EXPRESSION RESEARCH ACT

Mr. SMITH of Michigan. Mr. Speaker, I move to suspend the rules and pass the bill (H.R. 2051) to provide for the establishment of regional plant genome and gene expression research and development centers, as amended.

The Clerk read as follows:

H.R. 2051

*Be it enacted by the Senate and House of Representatives of the United States of America in Congress assembled,*

##### SECTION 1. DEFINITIONS.

In this Act—

(1) the term "Director" means the Director of the National Science Foundation;

(2) the term "institution of higher education" has the meaning given such term in section 101 of the Higher Education Act of 1965 (20 U.S.C. 1001); and

(3) the term "nonprofit organization" means a nonprofit research institute or a nonprofit association with experience and capability in plant biotechnology research as determined by the Director.

##### SEC. 2. MATCHING FUNDS.

The Director may establish matching fund requirements for grantees to receive grants under this Act.

##### SEC. 3. PLANT GENOME AND GENE EXPRESSION RESEARCH CENTERS.

(a) IN GENERAL.—The Director shall award grants to consortia of institutions of higher education or nonprofit organizations (or both) to establish regional plant genome and gene expression research centers. Grants shall be awarded under this section on a merit-reviewed, competitive basis. When making awards, the Director shall, to the extent practicable, ensure that the program created by this section examines as many different agricultural environments as possible.

(b) PURPOSE.—The purpose of the centers established pursuant to subsection (a) shall be to conduct research in plant genomics and plant gene expression. A center's activities may include—

(1) basic plant genomics research and genomics applications, including those related to cultivation of crops in extreme environments and to cultivation of crops with reduced reliance on fertilizer;

(2) basic research that will contribute to the development or use of innovative plant-derived products;

(3) basic research on alternative uses for plants and plant materials, including the use

of plants as renewable feedstock for alternative energy production and nonpetroleum-based industrial chemicals and precursors; and

(4) basic research and dissemination of information on the ecological and other consequences of genetically engineered plants.

##### SEC. 4. PARTNERSHIPS FOR PLANT BIOTECHNOLOGY IN THE DEVELOPING WORLD.

(a) IN GENERAL.—(1) The Director shall award grants to institutions of higher education, nonprofit organizations, or consortia of such entities to establish research partnerships for supporting the development of plant biotechnology targeted to the needs of the developing world. The Director, by means of outreach, shall encourage inclusion of Historically Black Colleges or Universities, Hispanic-serving institutions, or tribal colleges or universities in consortia that enter into such partnerships.

(2) In order to be eligible to receive a grant under this section, an institution of higher education or eligible nonprofit organization (or consortium thereof) shall enter into a partnership with one or more research institutions in one or more developing nations and may also include for-profit companies involved in plant biotechnology.

(3) Grants under this section shall be awarded on a merit-reviewed competitive basis.

(b) PURPOSE.—Grants awarded under this section shall be used for support of research in plant biotechnology targeted to the needs of the developing world. Such activities may include—

(1) basic genomic research on crops grown in the developing world;

(2) basic research in plant biotechnology that will advance and expedite the development of improved cultivars, including those that are pest-resistant, produce increased yield, reduce the need for fertilizers, or increase tolerance to stress;

(3) basic research that could lead to the development of technologies to produce pharmaceutical compounds such as vaccines and medications in plants that can be grown in the developing world; and

(4) research on the impact of plant biotechnology on the social, political, economic, and environmental conditions in countries in the developing world.

##### SEC. 5. AUTHORIZATION OF APPROPRIATIONS.

There are authorized to be appropriated to the National Science Foundation \$9,000,000 for fiscal year 2002, \$13,500,000 for fiscal year 2003, and \$13,500,000 for fiscal year 2004 to carry out this Act.

The SPEAKER pro tempore. Pursuant to the rule, the gentleman from Michigan (Mr. SMITH) and the gentlewoman from Texas (Ms. EDDIE BERNICE JOHNSON) will each control 20 minutes.

Mr. KUCINICH. Mr. Speaker, does the gentlewoman from Texas claim time in opposition?

The SPEAKER pro tempore. Does the gentlewoman from Texas oppose the motion?

Ms. EDDIE BERNICE JOHNSON of Texas. No.

The SPEAKER pro tempore. Does the gentleman from Ohio oppose the motion?

Mr. KUCINICH. Mr. Speaker, I am opposed, and I seek to claim the time in opposition.

The SPEAKER pro tempore. Under the rule, the gentleman from Ohio (Mr. KUCINICH) controls the time as a true opponent of the motion.

The Chair recognizes the gentleman from Michigan (Mr. SMITH).

GENERAL LEAVE

Mr. SMITH of Michigan. Mr. Speaker, I ask unanimous consent that all Members may have 5 legislative days within which to revise and extend their remarks and to include extraneous material on the bill now under consideration, H.R. 2051.

The SPEAKER pro tempore. Is there objection to the request of the gentleman from Michigan?

There was no objection.

Mr. SMITH of Michigan. Mr. Speaker, I ask unanimous consent that the gentlewoman from Texas (Ms. EDDIE BERNICE JOHNSON) control 10 minutes of the time in favor of the passage of the bill.

The SPEAKER pro tempore. Is there objection to the request of the gentleman from Michigan?

There was no objection.

The SPEAKER pro tempore. The gentleman from Michigan (Mr. SMITH) is recognized.

Mr. SMITH of Michigan. Mr. Speaker, I yield myself such time as I may consume.

This legislation deals with a couple areas of research that the National Science Foundation is now involved in, and I would suggest that not only for the sake of this country but for the sake of the developing world that we move ahead with the kind of research in genetic modification that has the potential of not only reducing the price for farmers but that can help people. It will help people by giving a little additional priority to making sure that the products that are developed have that goal.

□ 1445

Mr. Speaker, as chairman of the Committee on Science Subcommittee on Research, we held a number of hearings on plant genomics, and what I learned led me to issue a report on "Plant Genomic Research to Improve Agriculture, Human Health and the Environment."

This legislation builds on the NSF's success in funding merit-based competitive research by establishing two genomic initiatives at NSF: First, the plant genome plant gene expression research centers; and, two, the suggestion and legislation by the gentlewoman from Texas (Ms. EDDIE BERNICE JOHNSON), the partnerships for plant biotechnology in the developing world. The bill authorizes \$9 million for fiscal year 2002, and \$13.5 million for fiscal years 2003 and 2004 to carry out these activities.

What are we going to do with our new technology to make sure that we help people in this country and the rest of the world? And that is what these bills are all about, to make sure we move in that direction.

Mr. Speaker, I reserve the balance of my time.

Ms. EDDIE BERNICE JOHNSON of Texas. Mr. Speaker, I yield myself such time as I may consume.

Mr. Speaker, I rise today in strong support of H.R. 2051, the Regional Plant Genome and Gene Research Expression Act. H.R. 2051 has been a collaborative effort between me and the chairman of the Subcommittee on Science, the gentleman from Michigan (Mr. SMITH). I also thank the gentleman from New York (Chairman BOEHLERT), and the gentleman from Texas (Mr. HALL), the ranking member, for their leadership in bringing this important piece of legislation to the floor.

This legislation was developed last fall because I believe we are only just beginning to unlock the potential of agricultural biotechnology. We have witnessed some of the benefits genetically improved crops have brought to American farmers, and it is time that farmers around the world are also able to enjoy the benefits of agricultural biotechnology.

H.R. 2051 establishes a competitive, merit-reviewed grant program under the National Science Foundation to award grants to eligible entities to conduct basic research on crops that can be grown in the developing world. The research supported by these grants will help scientists discover innovative solutions to some of the developing world's most intractable problems, such as hunger, malnutrition, and disease.

Last September, the House Subcommittee on Research held a hearing on the two bills that became H.R. 2051 as considered here today. The witnesses testified on the importance of Federal funding for basic research on developing world crops and indicated that this legislation fills an important funding gap in our current research environment. The witnesses also were enthusiastic about the partnership aspect of this legislation because collaborative research projects between the U.S. and developing world scientists will help develop the scientific capacity of developing nations as well as expand partnership opportunities for U.S. scientists.

The potential of basic research on developing world crops is enormous, and scientists have already produced some encouraging results. Many of us are familiar with a newly developed strain of golden rice that was developed by plant scientists to have increased Vitamin A and iron content. Golden rice was developed because Vitamin A deficiency causes more than 1 million childhood deaths each year and is the single most prevalent cause of blindness among children in developing countries. Golden rice is only the beginning of the potential benefits of biotechnology for the developing world. Biotechnology can help develop crop varieties that are resistant to insects, viruses, that can be grown in drought-stricken lands with only minimal amounts of water, that have improved nutritional content, and that vaccinate against life-threatening illnesses.

Dr. Norman Borlaug, a distinguished professor at Texas A&M University, fa-

ther of the Green Revolution, and recipient of the 1970 Nobel Peace Prize, stated in yesterday's Wall Street Journal that "Africa desperately needs the simple, effective, high-yield farming systems that have made the First World's food supply safe and secure." The technology developed through agricultural biotechnology and encapsulated in a seed is such a system. Biotechnology will not solve all of the developing world's problems, but it does have an important role to play in increasing food security and food self-sufficiency in the developing world.

Improving agriculture in the developing world often ranks low on the list of our Nation's priorities. Yet I can think of few things that are more important to our Nation's security and future prosperity than fostering stable, productive economies throughout the world. Such global stability will not take place as long as hunger, malnutrition, and disease ravage the majority of the world's population. Fortunately, we are at a time and a place where we can take positive steps to improve the lives of people around the world, and I believe H.R. 2051 makes a small, but important, contribution to this struggle.

Mr. Speaker, I thank the gentleman from Michigan (Mr. SMITH) for working with me in a collaborative, bipartisan effort on this bill. I urge Members to vote in favor of the legislation.

Mr. Speaker, I reserve the balance of my time.

Mr. KUCINICH. Mr. Speaker, I yield myself such time as I may consume.

Mr. Speaker, I call the House's attention to a document from the Southern African Seed-Initiative which states in part with regard to the restoration of sustainable agriculture in the future, "We are appealing to the regional international community and to organization in disaster relief and development assistance to take precautions: 1, to prevent the importation of inappropriate seeds to the southern Africa region which can undermine agrobiodiversity and thus food security for years; and 2, to support efforts to reconstitute locally adapted planning material and quality seed material/varieties, like indigenous landraces or farmers' varieties appropriate to the various ecosystems" this sheet goes on to claim: "Food aid, combined with the importation of often poorly adapted seed varieties, can lower yields and keep them low for years."

This information from the Seed Initiative from Southern Africa is very instructive, and reflects most seriously on the matter at hand because the truth of the matter is that all of us in this House who are very concerned about reducing hunger in the world must be careful not to create a circumstance that in our desire to use technologies that seemingly could reduce hunger, that we inadvertently use technologies which are poorly adapted to seed varieties that can end up actually increasing hunger.

Mr. Speaker, I oppose H.R. 2051, the Regional Plant Genome and Gene Expression Research Act. The bill before us is well-intentioned, but I believe it is based on an erroneous assumption. The legislation assumes that unproven technologies will solve the very serious international problem of world hunger. Technologies like genetically engineered food may have a limited role, but economics and the politics of repressive political regimes remain the significant barrier to a consistent food supply in developing nations.

The development of expensive genetically engineered foods may only exacerbate the situation. There are better alternatives. Agroecological interventions have had significantly more success in helping developing nations feed themselves with higher yields and improved environmental practices, all within reasonable costs for developing countries.

These alternatives do not further enrich the consolidated agricultural industry, but they can provide the poorest of citizens of a nation the opportunity to survive on their own means. Next week I am introducing the Real Solutions to World Hunger Act of 2002, which promotes this type of research that can quickly and effectively save millions of lives. The legislation before us today promotes a technology which is incompatible with the problem.

The cause of world hunger has more to do with inadequate food distribution than food production. The world today produces more food per inhabitant than ever before. Enough food is available now to provide 4.3 pounds for every person each day. That information from Food First/Institute for Food and Development Policy.

The poor nutrition of millions is not due to a shortage in food, but rather to problems of distribution. Why was Ethiopia exporting food during its famine in the 1980s? In an economy that is becoming increasingly market driven, food is sold to the highest bidder. But at a more fundamental level, appalling land distribution policies favoring large landowners leave land idle preventing people from growing their own food. The landless poor are at the mercy of the cash economy to buy food.

This legislation follows the biotechnology industry strategy by employing bait and switch. Almost all genetic alterations are done to make food production and processing easier and more profitable for the manufacturers. A minuscule amount of research is aimed at improved nutrition, although biotechnology companies heavily advertise this tiny amount of research. In general, their crops are being engineered to increase corporate profitability, not to alleviate world hunger.

During the 5-year period 1996 to 2000, herbicide tolerance accounted for 74 percent of genetically engineered plants. Insect resistance for North American insects, not insects in developing countries, accounted for 19 per-

cent of genetically engineered plants, and stacked genes for herbicide tolerance and insect resistance accounted for 7 percent, this according to the International Service for the Acquisition of Agribiotech Applications.

When added up, that leaves no commercialized crops that provide any benefits for the poor and developing nations. I quote from a statement made to the United Nations by delegates from 24 African states in 1998: "We object strongly that the image of the poor and hungry from our countries is being used by giant, multinational corporations to push a technology that is neither safe, environmentally friendly, nor economically beneficial to us. We do not believe that such companies or gene technologies will help our farmers to produce the food that is needed in the 21st century. On the contrary, we think that it will destroy the diversity, the local knowledge, and the sustainable agricultural systems that our farmers have developed for millennia; and it will thus undermine our capacity to feed ourselves."

□ 1500

So here again, the best intentions seemingly to help address and eradicate hunger in developing nations can in fact end up creating conditions that promote more hunger. So if African nations, according to their representatives, do not want it, then who does besides the biotechnology public relations consultants?

Mr. Speaker, I reserve the balance of my time.

Mr. SMITH of Michigan. Mr. Speaker, I yield myself such time as I may consume.

I agree with much of what the gentleman from Ohio says, because that is part of our concern in this bill. What it calls for is more research. More research is going to include not only what it can do for people but also to increase the safety of any resulting product.

The gentleman mentioned that a lot of the private research so far in this area has been to simply increase profits. That is the kind of private research in genomics that have been directed at plant products that can be sold because they increase yield or they reduce the cost for the farmer. If we are going to have the kind of research that helps people, there is no doubt that Federal funding for genomic research is important, that research in areas possibly has no profit potential but that can help alleviate poverty, that can protect the environment, that can improve human health, and that can reduce our overdependence on petroleum products.

Reducing our dependency on petroleum energy is one of the areas that I have been concerned about. We have the potential to enhance the nitrogen-fixing capability of agricultural plants. Right now nitrogen fertilizer uses up approximately 6 percent of the natural gas in this country. If we can enhance the legumes the nodules that

are now in the clovers, in the soybeans, in the alfalfas, to fix that nitrogen in the soil much more effectively and efficiently and we have that potential, then we are going to reduce our dependence on energy.

Let me say that the Wall Street Journal yesterday ran an editorial by Norman Borlaug, best known as the Father of the Green Revolution. His work in developing higher yielding varieties of rice and wheat is credited with saving perhaps 1 billion people in China and India from starvation in the 1970s. Borlaug is now devoted to bringing about similar advancements in Africa where starvation remains all too common. What is his solution? His solution is to develop high yield varieties of traditional African crops such as cowpeas, cassava and how can we get there in part through biotechnology which has already shown promise for producing plants that are more tolerant to drought or can grow in soils that are too base or too acid or too salty that they cannot grow those crops now.

I would hope the gentleman would consider supporting this bill to give us the kind of research to not only ensure the safety that some are concerned about, that he is concerned about and that I am concerned about and that the gentlewoman from Texas (Ms. EDDIE BERNICE JOHNSON) is concerned about, but to develop the kind of products that can help people, not simply reduce the price to farmers.

Mr. Speaker, I reserve the balance of my time.

Ms. EDDIE BERNICE JOHNSON of Texas. Mr. Speaker, I yield myself such time as I may consume.

I thank the gentleman from Ohio for his comments and would like to respond. I believe he misunderstands this bill. The thrust of this bill is one of basic research at universities. The bill seeks to address the deficiency in basic genomic research on crops that can be grown in the developing world.

More importantly, the bill seeks to create strong partnerships with developing world institutions from the very beginning. In order to be eligible for funds under section 4 of this bill, research institutions are required to partner with their colleagues in developing countries. This partnership will not only help strengthen the scientific capacity of developing countries but will ensure that the basic research that is performed focuses on what developing countries perceive their own needs to be. Additionally, the bill allows for research on the impact of plant biotechnology on the social, political and environmental conditions in countries in the developing world. This provision will allow researchers to investigate many of the claims that my colleague from Ohio raises.

This bill does not force farmers in developing countries to adopt fancy technologies. It does not force the importation of genetically altered foods outside the country. On the contrary, it seeks to encourage the adoption of the

very simple technology of a better seed that was developed in conjunction with scientists from the developing world.

All of us here recognize that world hunger is an enormously complex problem with no simple solution. This bill does not pretend to hold the answer. What this bill does is provide the means for scientists in the United States and in developing countries to work together to contribute to the much larger solution to the very serious problem of hunger, malnutrition and disease in the developing world.

Mr. Speaker, I reserve the balance of my time.

Mr. KUCINICH. Mr. Speaker, I yield myself 6 minutes. I want to thank the gentleman from Michigan and the gentlewoman from Texas for their commitment to trying to deal with this problem of world hunger. We have differences of opinion about how we can deal with it effectively.

I would suggest that the research which is called for in part of this bill, Mr. Speaker, has already been done. As a matter of fact, in the *AgBioForum*, volume 2, number 3 and 4, summer and fall of 1999, pages 155 to 162, an article by Miguel Altieri and Peter Rosset, thoroughly researched article, I might add, that claims over 38 academic sources for their conclusions, states the following in the abstract. It says:

“Advocates of biotechnology affirm that the application of genetic engineering to develop transgenic crops will increase world agricultural productivity, enhance food security, and move agriculture away from a dependence on chemical inputs helping to reduce environmental problems. This paper challenges such assertions by first demystifying the Malthusian view that hunger is due to a gap between food production and human population growth. Second, we expose the fact that current bioengineered crops are not designed to increase yields or for poor small farmers, so that they may not benefit from them. In addition, transgenic crops pose serious environmental risks, continuously underplayed by the biotechnology industry. Finally, it is concluded that there are many other agro-ecological alternatives that can solve the agricultural problems that biotechnology aims at solving, but in a much more socially equitable manner and in a more environmentally harmonious way.”

In this article, which is entitled *Ten Reasons Why Biotechnology Will Not Ensure Food Security, Protect the Environment and Reduce Poverty in the Developing World*, Altieri and Rosset point out, number one, there is no relationship between the prevalence of hunger in a given country and its population. For every densely populated and hungry nation like Bangladesh or Haiti, there is a sparsely populated and hungry nation like Brazil and Indonesia.

The second point they make, number two, most innovations in agricultural biotechnology have been profit-driven

rather than need-driven. The real thrust of the genetic engineering industry is not to make Third World agriculture more productive, but rather to generate profits.

Number three, the integration of the seed and chemical industries appears destined to accelerate increases in per acre expenditures for seeds plus chemicals, delivering significantly lower returns to growers.

Number four, recent experimental trials have shown that genetically engineered seeds do not increase the yield of crops. A recent study by the United States Department of Agriculture Economic Research Service shows that in 1998 yields were not significantly different in engineered versus nonengineered crops in 12 of 18 crop/region combinations.

Number five, many scientists claim that the ingestion of genetically engineered food is harmless. Recent evidence, however, shows that there are potential risks of eating such foods as the new proteins produced in such foods could, one, act themselves as allergens or toxins; two, alter the metabolism of the food producing plant or animal, causing it to produce new allergens or toxins; or, three, reduce its nutritional quality or value.

In this article, *Ten Reasons Why Biotechnology Will Not Ensure Food Security, Protect the Environment and Reduce Poverty in the Developing World*, the authors as their sixth point indicate transgenic plants which produce their own insecticides closely follow the pesticide paradigm, which is itself rapidly failing due to pest resistance to insecticides.

Number seven, the global fight for market share is leading companies to massively deploy transgenic crops around the world, more than 30 million hectares in 1998, without proper advance testing of short- or long-term impacts on human health and ecosystems.

The next point that the authors make, number eight, there are many unanswered ecological questions regarding the impact of transgenic crops.

Number nine, as the private sector has exerted more and more dominance in advancing new biotechnologies, the public sector has had to invest a growing share of its scarce resources in enhancing biotechnological capacities in public institutions.

And, number 10, much of the needed food can be produced by small farmers located throughout the world using agro-ecological technologies. In fact, new world development approaches and low input technologies spearheaded by farmers and nongovernmental organizations around the world are already making a significant contribution to food security at the household, national and regional levels in Africa, Asia and Latin America.

So again, Mr. Speaker, there already is significant research which points out concerns that need to be regarded before such legislation is brought to the floor.

Mr. Speaker, I reserve the balance of my time.

Mr. SMITH of Michigan. Mr. Speaker, I yield myself such time as I may consume.

The gentleman from Ohio and the gentlewoman from Texas and I, agree on a lot of these issues. The plant genome and gene expression centers will take plant biotechnology research into the next phase, beyond simply mapping and sequencing genes and toward a better understanding of gene expression.

We have got the *Arabidopsis* plant. We have cataloged those genes. We have determined the folding of several of those genes to learn more about what particular genes do. But there is a tremendous void in the information that we need to make sure the new plants are safe.

Let us not argue against having more research. Let us not argue against maybe having government do a little bit of this research instead of leaving it to the private sector that are forced to have some kind of financial rewards for what they do. The centers are going to expand on NSF's current activities in gene research by providing central locations for multidisciplinary interactive approaches to plant biotech research. This will allow researchers to develop the kind of research to allow development of safe and beneficial plant varieties and plant-derived applications.

□ 1515

Specifically in this bill, I would say to the gentleman from Ohio (Mr. KUCINICH), the centers will conduct research in plant genomics related to the development of the kind of information that can lead to new varieties of enhanced crops, including those grown in nontraditional environments and those grown with reduced reliance on chemical fertilizers. These may include research into enhancing the nitrogen-fixing ability of legumes, that I earlier mentioned. The primary input, of course, of nitrogen is natural gas, so we can make ourselves a little more energy dependent while we increase the safety of the environment.

The centers are also going to expand on current biotechnology efforts that have primarily been focused on improving the production and the cost and the quantity. And exactly like the gentleman from Ohio (Mr. KUCINICH) says, we are going to move away from that to the kind of research that is going to give us better information.

I believe we are on the threshold of a new era in food production. Biotechnology will be especially important to poor subsistence farmers across the globe who struggle against the odds to bring in a good crop each year.

To address this problem, H.R. 2051 authorizes a program creating plant biotechnology partnerships for the developing world. This program is based on H.R. 2912, introduced by the gentlewoman from Texas (Ms. EDDIE BERNICE JOHNSON). The plant biotechnology

partnerships will provide the fundamental research needed to build on the current plant biotechnology base to address specific agricultural problems in the developing world.

Mr. KUCINICH. Mr. Speaker, I yield myself 3 minutes.

Mr. Speaker, it has been stated over and over here that the interest here is in just research. However, we cannot separate the kind of research that will be done here from the logic that is driving biotechnology, because this bill states that for-profit companies can be involved in this research.

Now, I agree with my friend from Michigan that we do not want to just leave it to for-profit companies, but it is in the bill. So I would just say that if we do not want for-profit companies involved, I would certainly be willing to entertain a unanimous consent request to strike that provision from this bill.

In addition to that, the total of this bill is \$36 million.

Mr. SMITH of Michigan. Mr. Speaker, will the gentleman yield?

Mr. KUCINICH. I yield to the gentleman from Michigan.

Mr. SMITH of Michigan. Mr. Speaker, the language in the bill was not for-profit companies, it is for nonprofit organizations to be involved, so the nonprofits that are interested in something beside profit.

Mr. KUCINICH. Mr. Speaker, reclaiming my time, may I ask the gentleman to make sure that he and I have the same copies of these bills, because often there are reprints and newer iterations. I have here under section 4: "Partnerships for Plant Biotechnology in the Developing World," under number (2), which is line 8. I am going to read it to the gentleman: "In order to be eligible to receive a grant under this section, an institution of higher education or eligible nonprofit organization (or consortium thereof) shall enter into a partnership with one or more developing nations and may also include for-profit companies involved in plant biotechnology."

I will ask the gentleman again, I would certainly entertain the gentleman's willingness to strike that language there so that we can certainly keep the for-profit companies out of this, because, Mr. Speaker, the for-profit companies had a \$50 million advertising campaign to try to promote biotechnology, glossing over all the concerns that scientists around the world have, and they get \$36 million out of this bill if left to the language of this bill. They could get if that much.

I would be happy to have my good friend respond.

Mr. SMITH of Michigan. If the gentleman will yield further, this is part of the language of the bill of the gentleman from Texas (Ms. EDDIE BERNICE JOHNSON) originally. It does not give these companies the grant. They still go to the universities to make the decision of whether there is going to be any private involvement. That is one

thing we have lacked as we searched for money, is trying to get more money in. But certainly they should not be allowed to dictate the kind of research to be done. I certainly appreciate that.

Mr. KUCINICH. Mr. Speaker, I ask unanimous consent to strike the language.

Mr. BARTON of Texas. Mr. Speaker, I object.

The SPEAKER pro tempore (Mr. LAHOOD). The Chair would announce that the proponent of the motion is the only member that the Chair would recognize to ask unanimous consent to modify the motion.

Mr. KUCINICH. Mr. Speaker, I yield myself one more minute.

Mr. Speaker, inasmuch as my unanimous consent request was objected to, it is very clear that there are Members of this House, certainly not the gentleman from Michigan, but there are members of this House who are looking to give the biotech firms a handout under the guise of helping to feed the poor.

Most genetically engineered food products and almost all research funding for the development of genetically engineered food target developing nation agriculture and consumers. Developing countries cannot afford this technology and therefore are vastly ignored.

If the biotechnology industry believes they could help mitigate hunger concerns, domestic or foreign, then requiring biotechnology companies to make available the necessary resources for this purpose is appropriate.

Mr. SMITH of Michigan. Mr. Speaker, I yield 30 seconds to the gentleman from Texas (Mr. BARTON).

Mr. BARTON of Texas. Mr. Speaker, my late father was a plant geneticist. He spent his entire career developing cotton plants and cotton seeds that could be used as food. I wish we would have had this research enabled when he was alive so he could have participated through grants at Texas A&M or the University of Texas to forward this very worthwhile research endeavor.

Mr. Speaker, I very strongly support the gentlewoman from Texas and the gentleman from Michigan in their noble endeavor.

Ms. EDDIE BERNICE JOHNSON of Texas. Mr. Speaker, I yield myself such time as I may consume.

The gentleman from Ohio just gave all the reasons why this bill should pass. This is a bill on research where it can establish partnerships. The grants can only go to universities and nonprofits. Profit businesses can join the partnership, the consortium, but no money flows in that direction. The paper the gentleman read prior to that last statement is 3 years old. With research, that changes.

This bill only speaks to research and who can be a part of the partnership, of the consortium. It is not public dollars flowing to profit organizations. It is what we will hear more of in the future, public-private-type partnerships.

No public dollar flows to a profit organization. The dollars go to the universities, and that is where the research takes place; and it includes persons from the developing countries to be a part of the research.

Mr. Speaker, I would urge passage of this legislation. It is good legislation intended to do a good job.

Mr. KUCINICH. Mr. Speaker, I yield myself 2 minutes.

Mr. Speaker, my legislation which I will be bringing to this House hopefully sometime soon, called the Real Solutions to World Hunger Act of 2002, offers new initiatives and protections to help developing nations resolve their hunger concerns.

First, to protect developing nations, genetically engineered exports are restricted to those already approved in the U.S. and approved by the importing nation.

Second, creation of an international research fund for sustainable agricultural research.

Third, U.S. prohibition on any intervention in a developing nation's effort to mandatorily license a genetically engineered crop.

Fourth, establishing the Sustainable Agriculture Trust Fund with a small tax on a biotechnology company's profits. This trust fund will fund the activities in this bill.

To understand how this bill before us, the one we are going to be voting on today, will fail to help anyone except for the biotechnology companies, I think we should examine our own Nation, our own farming practices and our domestic hunger challenges.

The United States of America, the wealthiest Nation in the world, grows substantial amounts of genetically engineered foods. Our farmers plant approximately 100 million acres a year in genetically engineered crops. However, in this great wealthy Nation of ours, plenty of families go hungry every day. Approximately 4 million low-income children under the age of 12 experience hunger each year, and an additional 9.6 million children are at risk of hunger.

The proponents of this legislation before us believe that genetically engineered foods will solve world hunger. But I question this rationale when we have so much hunger in our own Nation. This technology has not helped a single hungry family in our Nation. These hungry families need a better economy, better paying jobs, access to child care, and a decent education to solve the economic trap that leads to hunger.

It is clear that hunger is something that we must eradicate, but promoting false solutions to provide great public relations for a troubled industry does a great disservice to those who need our help the most. We all want to help resolve the hunger crisis in other nations, but only the legislation I will introduce soon will begin to deal with the real problems of world hunger.

The SPEAKER pro tempore. The Chair would announce that each Member has 1 minute remaining, with the

gentleman from Michigan having the right to close.

Ms. EDDIE BERNICE JOHNSON of Texas. Mr. Speaker, I yield myself the balance of my time.

Mr. Speaker, one more time let me say that the gentleman from Ohio has made the case for this bill. This bill speaks to research partnerships, including developing-nation participation. There is nothing in this bill that requires any kind of deportation to these developing nations. It provides a way by which they can be part of research that will provide them foods that will probably help with immunizations, extra vitamins, but only after the research is done with the involvement of scientists from the developing countries.

Mr. Speaker, I would urge the passage of the bill. I think that the opponent has misunderstood the bill.

Mr. KUCINICH. Mr. Speaker, I yield myself the balance of my time.

Mr. Speaker, the fact is that the agriculture and biotechnology industries are driving the research; and as such, they have ignored a tremendous amount of work that has been done by independent scientists that challenges the rationale of the industry itself.

There are serious issues that need to be addressed, that relate to food security as a fundamental human right. The philosopher and human rights activist of India, Vandana Shiva, has said that globalization of agriculture is violating all components of food-related human rights. She says that everywhere across the world, less food is being produced and less diverse food is being grown and less is reaching the poor and hungry. She quotes Senator McGovern as stating: "Food security in private hands is no food security at all," because corporations are in the business of making money, not feeding people.

Vandana Shiva goes on to say, "The centralized and chemical-intensive production and distribution system, linked with the green revolution model, proved itself to be undemocratic, wasteful and non-sustainable. The imperative now is to shift to a democratic food system based on sustainable production, conservation and equitable access to resources and food security for all."

I would submit, Mr. Speaker, that in this bill, which authorizes certain research, if it is in any way connected, as this bill is, with the ag-biotech industry, there is no possibility that the human rights of people around the world are in any way going to be regarded.

Please defeat the bill.

Mr. SMITH of Michigan. Mr. Speaker, I yield myself the balance of my time.

Mr. Speaker, the tremendous potential of plant genomics is limited only by the creativity of the scientists and this body and Washington allowing them to do the research. This bill will help create the next generation of

plants that will provide consumer benefits, for example, plants that can be engineered to produce compounds, such as enzymes used for food processing; food that provides vaccines and antibodies; compounds used to produce biodegradable plastics; renewable energy production.

In conclusion, Mr. Speaker, I would like to thank the chairman of the Committee on Science, the gentleman from New York (Mr. BOEHLERT), and the ranking majority member, the gentleman from Texas (Mr. HALL), for all of their support in bringing this bill to the floor; and of course, I wish to say a special thanks to the gentlewoman from Texas (Ms. EDDIE BERNICE JOHNSON), the ranking member of our Subcommittee on Research, for all of her input and help. I think together we have crafted a good bill that will make good programs even better.

The SPEAKER pro tempore. The question is on the motion offered by the gentleman from Michigan (Mr. SMITH) that the House suspend the rules and pass the bill, H.R. 2051, as amended.

The question was taken; and (two-thirds having voted in favor thereof) the rules were suspended and the bill, as amended, was passed.

The title of the bill was amended so as to read: "A bill to authorize the National Science Foundation to establish regional centers for the purpose of plant genome and gene expression research and development and international research partnerships for the advancement of plant biotechnology in the developing world."

A motion to reconsider was laid on the table.

□ 1530

#### RECOGNIZING AMERICAN SOCIETY OF CIVIL ENGINEERS ON ITS 150TH ANNIVERSARY

Mr. BARTON of Texas. Mr. Speaker, I move to suspend the rules and agree to the concurrent resolution (H. Con. Res. 387) recognizing the American Society of Civil Engineers for reaching its 150th Anniversary and for the many vital contributions of civil engineers to the quality of life of our Nation's people including the research and development projects that have led to the physical infrastructure of modern America.

The Clerk read as follows:

H. CON. RES. 387

Whereas, founded in 1852, the American Society of Civil Engineers is the Nation's oldest national engineering society;

Whereas civil engineers work to constantly improve buildings, water systems, and other civil engineering works through research, demonstration projects, and the technical codes and standards developed by the American Society of Civil Engineers;

Whereas the American Society of Civil Engineers incorporates educational, scientific, and charitable efforts to advance the science of engineering, improve engineering education, maintain the highest standards of ex-

cellence in the practice of civil engineering, and ensure the public health, safety, and welfare;

Whereas the American Society of Civil Engineers represents the profession primarily responsible for the design, construction, and maintenance of the Nation's roads, bridges, airports, railroads, public buildings, mass transit systems, resource recovery systems, water systems, waste disposal and treatment facilities, dams, ports and waterways and other public facilities that are the foundation on which the Nation's economy stands and grows; and

Whereas the Nation's civil engineers, through innovation and the highest professional standards in the practice of civil engineering, protect the public health and safety and ensure the high quality of life enjoyed by the Nation's citizens: Now, therefore, be it

*Resolved by the House of Representatives (the Senate concurring), That the Congress—*

(1) acknowledges the American Society of Civil Engineers for its 150th Anniversary;

(2) commends the many achievements of the Nation's civil engineers; and

(3) encourages the American Society of Civil Engineers to continue its tradition of excellence in service to the profession of civil engineering and to the public.

The SPEAKER pro tempore (Mr. LAHOOD). Pursuant to the rule, the gentleman from Texas (Mr. BARTON) and the gentleman from Kansas (Mr. MOORE) each will control 20 minutes.

The Chair recognizes the gentleman from Texas (Mr. BARTON).

GENERAL LEAVE

Mr. BARTON of Texas. Mr. Speaker, I ask unanimous consent that all Members may have 5 legislative days within which to revise and extend their remarks and include extraneous material on House Concurrent Resolution 387.

The SPEAKER pro tempore. Is there objection to the request of the gentleman from Texas?

There was no objection.

Mr. BARTON of Texas. Mr. Speaker, I yield myself such time as I may consume.

(Mr. BARTON of Texas asked and was given permission to revise and extend his remarks.)

Mr. BARTON of Texas. Mr. Speaker, first, I want to commend our distinguished chairman, the gentleman from New York (Mr. BOEHLERT), and our distinguished ranking member, the gentleman from Texas (Mr. HALL), for their excellent work on this resolution that was reported on a bipartisan basis from the Committee on Science. I also want to thank the gentleman from Kansas (Mr. MOORE), my good friend, for his excellent work and for serving as an original cosponsor with myself on this bill.

Before I get into my prepared remarks, I want to say a special "get well soon" to young Lindsay Taylor, who is 12 years old down in Round Rock, Texas. She is the President of her National Junior Honor Society. She is a budding civil engineer, although I think she wants to go to the University of Texas instead of Texas A&M, where I went to engineering school. She is home sick today and we need all of our young engineers to get