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Senate

The Senate met at 9:30 a.m. and was called to order by the Honorable BENJAMIN L. CARDIN, a Senator from the State of Maryland.

PRAYER

The Chaplain, Dr. Barry C. Black, offered the following prayer:

Let us pray:

Eternal God, whose grace sustains us, You know us better than we know ourselves. You understand our going out and coming in and the things that challenge us.

Today, give wisdom to our lawmakers. Deliver them from the myth that they are self-made men and women, masters of their own destinies. Instead, may they seek Your guidance and know that You alone sustain our Nation and world. Lord, teach them to depend upon Your power and to serve Your sovereign purposes. May their humility match Your willingness to help them through all of the seasons of their labors.

We pray in Your mighty Name. Amen.

PLEDGE OF ALLEGIANCE

The Honorable BENJAMIN L. CARDIN led the Pledge of Allegiance, as follows:

I pledge allegiance to the Flag of the United States of America, and to the Republic for which it stands, one nation under God, indivisible, with liberty and justice for all.

APPOINTMENT OF ACTING PRESIDENT PRO TEMPORE

The PRESIDING OFFICER. The clerk will please read a communication to the Senate from the President pro tempore (Mr. BYRD).

The legislative clerk read the following letter:

U.S. SENATE,
PRESIDENT PRO TEMPORE,
Washington, DC, June 4, 2008.

To the Senate:

Under the provisions of rule I, paragraph 3, of the Standing Rules of the Senate, I hereby appoint the Honorable BENJAMIN L. CARDIN, a Senator from the State of Maryland, to perform the duties of the Chair.

ROBERT C. BYRD,
President pro tempore.

Mr. CARDIN thereupon assumed the chair as Acting President pro tempore.

RECOGNITION OF THE ASSISTANT MAJORITY LEADER

The ACTING PRESIDENT pro tempore. The assistant majority leader is recognized.

SCHEDULE

Mr. DURBIN. Mr. President, today, following my remarks and the remarks of Senator MCCONNELL, there will be a period of morning business until 11:30 a.m., with the time equally divided and controlled. The majority will control the first 30 minutes, and the Republicans will control the next 30 minutes.

Following morning business, the Senate will proceed to the consideration of the budget conference report. There will be 15 minutes for debate equally divided prior to a vote on adoption of the conference report. Therefore, Senators should expect the first vote to begin at 11:45 a.m.

Upon disposition of the budget conference report, I expect the Senate to begin consideration of the climate change bill.

RESERVATION OF LEADER TIME

The ACTING PRESIDENT pro tempore. Under the previous order, the leadership time is reserved.

MORNING BUSINESS

The ACTING PRESIDENT pro tempore. Under the previous order, the Senate will proceed to a period of morning business until 11:30 a.m., with Senators permitted to speak for up to 10 minutes each, equally divided and controlled between the two leaders or their designees, with the majority controlling the first 30 minutes and the Republicans controlling the second 30 minutes.

The Senator from North Dakota is recognized.

Mr. DORGAN. Mr. President, my understanding is that I am recognized for 20 minutes. I ask unanimous consent to be recognized for 20 minutes.

The ACTING PRESIDENT pro tempore. Without objection, it is so ordered.

CLIMATE SECURITY

Mr. DORGAN. Mr. President, we will be once again taking up the pending bill dealing with global warming. It is a substantial piece of legislation. I am planning to speak later in the day as well, but I wish to take some time during morning business to talk about the overall bill as well as an amendment I may file later today on this legislation.

In terms of the issue of global warming, first let me say that there is little question left that something significant is happening to our planet. There is something happening to our climate that sometimes we don't quite understand. But among almost all scientists, there is nearly universal consensus that in the last 100 years, the temperature of the Earth has slightly warmed by 1.1 to 1.6 degrees. Through 2050, we expect further temperature increases unless we begin to address the continued concentration of greenhouse gases in the atmosphere.

We are seeing evidence of these impacts. While no specific event is directly linked, we see droughts occurring more often, and this is certainly happening in my State of North Dakota. Heat waves are becoming more frequent, more intense, and more damaging. Further, the number of category 4 and 5 hurricanes has nearly doubled in the past 50 years. It is quite clear something is happening that we have

● This "bullet" symbol identifies statements or insertions which are not spoken by a Member of the Senate on the floor.

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not seen before. I think the consensus of scientists now is at a point regarding this climate change that is beyond natural change, and we certainly ought to take some no-regret steps. At least at the very minimum, we should be taking more substantial steps to try to respond to it and deal with it.

Now, one of the interesting things about this bill that is on the floor of the Senate is that it requires a commitment to emission reductions, technology investments and other actions through 2050. It is sometimes hard to see ahead 5 years or 10 years, let alone 30 or 40 or 50 years. We have economists who can't remember their own phone numbers who make predictions 10 and 15 years into the future. At the same time, we still have to be seriously thinking about our future pathway for action. What is our destination? What do we aspire to achieve for this country? What do we want to have happen as we move ahead?

Let me say that almost everyone believes that our present energy course is unsustainable. Energy use primarily from fossil fuel combustion in the U.S. and around the world is a significant contributor to climate change, according to most energy and climate change experts. We cannot maintain the current path.

So what do we have to do? Well, the legislation in front of us is significant. It says that we ought to do a lot of things. Yes, some of the proposals here are controversial. Some will likely be changed during this debate or future deliberations, but the reality is that a debate on mandatory emissions cuts must occur.

I will offer an amendment I will describe a little later, but chief among the things we need to do are the more rapid development of new sources of energy, especially with advanced technology. There are renewable sources of energy that do not emit greenhouse gases or other pollutants. They produce no effluents or no carbon dioxide. This includes wind, geothermal, and solar energy, and we ought to be moving much more aggressively on these and other opportunities. This has not been what the U.S. has done historically though. We have initially been early leaders in cutting edge energy technologies and then fallen behind.

Let me give an example of how pathetic this country's response has been in recent years and how much more aggressive it must be in future years. When the U.S. started exploring for oil and natural gas at the start of the last century, this Congress adopted, in 1916, long-term, permanent, very substantial tax incentives to encourage that development.

It gave a clear signal that, if you go out and discover oil and gas, then we have big tax incentives for you. Industry understood that it was beneficial to find oil and gas through these long-term, permanent tax incentives.

What do we do for wind energy, solar and other renewable energy technologies? The Congress put in place a production tax credit in 1992. These ended up being very short term and rather shallow. It has been extended for the short term, in many cases by 1 year, five times since we first passed it. It is a stutter step approach—start, stop; start, stop. It has been a pathetic, anemic, and weak response by a country that should be much more aggressive and bold in providing a direction to develop our renewable energy resources.

There are substantial renewable energy resources available in this country, and we need to get about the business of providing the funding for research and the aggressive incentives for a long-term determination of where we are going to head with renewables.

In 2007, I introduced legislation to encourage a broad range of renewable and clean energy approaches as well as additional infrastructure. That legislation signaled that our country should be on a course to say to the investors in the U.S. and around the world, where we are headed for a decade. Count on it. Believe in it. The production tax credit which will expire at the end of this year should be extended not for 1 year, it ought to be extended for a full decade to let America know where we are headed. We want more renewable energy that is not polluting.

Now, having said all of that, there are so many things we can do. We need much more extensive deployment of conservation and efficiency, including more efficient vehicles and buildings. We are going to increase fuel economy standards with a 10-mile-per-gallon increase in 10 years that we required with the Energy Independence and Security Act passed by Congress in December 2007. I was proud to be a part of that effort to increase fuel economy standards. We are doing a lot of things that make it easier to move forward with efficiency and conservation measures. Further, I wish to talk for a moment about an amendment that I am going to offer with respect to the advancement of clean coal technologies.

Now, I understand some say that, in order to deal with climate change, you are going to have to find a way to wean yourself off of fossil fuels. I understand they say that, but I also understand that is not going to happen in the very near term. Let me tell my colleagues what is happening with respect to energy use in this country. Almost 50 percent of our electricity comes from coal. Without questioning it, we get up in the morning, flick on a switch, turn a knob, and turn a dial. We do all of these things with our hands, and energy flows. One-half of those activities are made possible because of the electricity that comes from coal. Does anybody really think we are not going to use coal in the future? The problem is, when we use coal, we have CO_2 that is emitted into the air. This CO_2 and other greenhouse gases contribute significantly to cause global climate change. So we need to find a way to capture that CO_2 and to store or sequester CO_2 in geological formations or other means.

How do we use coal in the future? We use coal in the future by being able to capture this emitted CO_2. So how do we do that? The question isn't whether we are going to use coal. The question is how are we going to use coal in the future.

There are some who say: Well, it is not possible to capture CO_2. It is possible. Of course it is possible. At this point the technology isn't fully proven, and it is expensive. Yet, we can see several technology options ahead.

Let me describe to my colleagues a plant in North Dakota, the only one of its kind in North America. It produces synthetic gasoline from lignite coal. Let me tell my colleagues what we do with the CO_2 in that plant. We capture the CO_2 and use it for enhanced oil recovery. It is one of the world's largest examples of CO_2 capture at an industrial facility. Half of the CO_2 produced at this facility is now captured. This CO_2 is put in a pipeline under pressure and sent to Saskatchewan, Canada. Oil industry interests there pump it underground to enhance oil recovery. We are successfully using CO_2 by capturing it, keeping it out of the atmosphere, investing it underground in Canada, and enhancing their oil recovery. That makes a lot of sense, and we need more of these types of projects. Is it possible? It is very possible. That one of the world's largest applications is being demonstrated in Beulah, North Dakota.

Now, what else can we do dealing with carbon and the capturing of CO_2? If you are going to unlock the mystery of how you continue to use fossil fuels that we must use without impacting our environment and our planet, we need to have kind of a moonshot approach. We can't just tiptoe around the issue. We have to decide we are going to significantly commit funding—billions of dollars—to the research and demonstrations in science and technology.

Let me give you some examples. I was in Phoenix, Arizona recently, and I toured an electric utility called the Arizona Public Service. The organization in Arizona is producing CO_2 at a coal-fired electric generating plant. What they are doing with it is very interesting. They are taking a stream of CO_2 off their stack in a coal-fired electric generating plant and putting it in very long greenhouses, and they are producing algae. This pictures shows one example of greenhouses where they are doing it in tubes.

Most of us know what algae is. Algae is single-cell pond scum. Every kid knows what that is. You have been to a little pond where stagnant water has hung around for a while and you see green slime or single-cell pond scum called algae. Algae grows in water. What does it need to grow? It needs two things—sunlight and CO_2.

When I became chairman of the Energy and Water Appropriations Subcommittee on the Senate side, I discovered that the research that used to go on with respect to algae was discontinued nearly 15 years ago. Last year, for the first time, I reestablished funding to continue algae research.

Let me tell you what they are doing in Arizona. In Arizona, they are trying to demonstrate growing algae in these greenhouses which are next to a coal-fired electric generating plant. They take the CO_2 from the plant and use it to grow this pond scum. In these very long greenhouses where they are producing algae from the plant's CO_2, they harvest the algae and produce diesel fuel. So what they are doing is taking something that we want to get rid of to grow single-cell pond scum called algae, which increases its bulk in hours.

By the way, an equivalent acre of corn produces, in terms of ethanol fuel, about 300 or 400 gallons. An equivalent acre of soybeans I believe is around 80 to 100 gallons.

An equivalent acre of algae harvested for diesel fuel produces 3,000 to 4,000 gallons. Think of this. We use much coal to produce electricity and that increased manmade CO_2 is destructive to the atmosphere. Yet capturing the CO_2 and producing fuel is very beneficial.

An Austin, TX, company came to see me. They have two demonstration projects in Texas. They are taking flue gas off a coal plant, and they are producing several byproducts hydrogen, chloride, and baking soda. Isn't that interesting? These small demonstration projects take the flue gas from a coal electric generating plant, chemically treat it, and then produce these byproducts.

Take a look at this chart. Here is the baking soda, and it contains the CO_2. Instead of emitting it into the atmosphere, it is embedded in the CO_2. It can be put in a landfill, but you can also make cookies. I happen to like the idea of eating cookies from this process. They said: Do you want to have some cookies produced from coal? It tasted pretty good because it was produced with, among other things, the baking soda which was a byproduct from coal.

Here is another example of what we can do. I have in my hand some sandstone. You can find this in many geologic formations, including 10,000 to 15,000 feet underground in North Dakota. There also might be a very viable way to capture and store the CO_2 underground. The carbon dioxide under pressure is pumped underground, attaches itself to sandstone and is therefore sequestered. We have examples, as I said previously, of CO_2 being used in marginal oil wells.

We suck out oil all across the planet every single day. We stick straws into the Earth, and we suck out 85 million barrels a day. We use one-fourth of that oil produced every day in the United States. We have a prodigious appetite for this energy. When you stick a drilling rig into the ground and find oil, in many cases, you are only getting about 30 percent of the oil pool pumped up. At that point, it is difficult to produce any more without some extra help or advanced technology. If you pump CO_2 down into that ground under pressure, you enhance oil recovery. You have a way to get rid of the CO_2 by putting pressure on the oil to bring it up. You have gotten rid of the CO_2, protected the environment, are still able to use coal and have enhanced the recovery of oil from domestic sources.

Why do I tell you all this? I think we need to produce substantial wind and other forms of renewable energy. We also have all kinds of needs for efficiency and conservation opportunities. But, if we don't find a way to unlock the opportunities to continue to use our fossil fuels, especially coal, we will not solve the problem that is brought to us with this piece of legislation on the Senate floor. How do we solve the problem of being able to use coal in a carbon constrained future? Perhaps by producing baking soda or algae, we can end up producing more cookies or biodiesel. Perhaps it's a dozen other innovative approaches.

How do you do that? By investing in research and technological capability. This will require substantially more funding. I was visited by Craig Venter, who is one of the two fathers of the Human Genome Project and an unbelievable American. He has now turned his attention to energy. They are working on sophisticated things that I have a difficult time fully describing in simple terms. They are working on creating new kinds of organisms and bacteria that could eat coal in underground seams and produce liquid fuels. The Department of Energy's Office of Science is also studying the gut system of termites with our scientists because we know there are 200 microbes in the intestinal tract of a termite. When they eat your house, and they love to eat wood, it produces methane. Most living things do. But termites are able to break down cellulose. If we are going to have a revolution in the use of biofuels, we need to understand what these termites accomplish naturally. We are trying to figure out what is it in the gut system of termites that allows this insect to eat wood and break down cellulosic materials. If we can figure that out, we unlock another part of the mystery of how to produce more non-oil based fuels.

So here is the proposal I will offer today. It is an amendment that would shift a substantial amount of money and dramatically increase the amount of money available for research and technology for advancing coal research. We would unlock the mysteries of going from research to demonstration to commercial application of carbon capture and storage or other beneficial uses. If they don't do that, the goals of this bill will fail. If we don't solve the problem without solving how to expand technology to use coal in a near zero emissions way, we can not meet the goals outlined in this bill.

We have to make substantial investments in technology, science, and research. I was part of six of us in the Senate who said, some years ago, pushed to double the amount of money we spend at the National Institutes of Health because it is not spending, it is an investment in the future. If we invest in cures for cancer, ALS, Parkinson's, diabetes, heart disease, and so many more diseases, it will be beneficial to generations around the world. We made the commitment and doubled the amount of funding at the NIH.

We need the same kind of commitment with respect to our energy future. We need to decide we are going to make a commitment. Just as NIH deals with the health of people. This bill and the technology we need to develop relates to the health of our economy, of our country, and of the expanded opportunities in this country. We need to make a similar commitment right now.

I propose an amendment that would take the underlying bill which has about $17 billion for advancing coal research in the first 12 to 14 years. This is a good start but is not enough. I propose to shift about $20 billion to that $17 billion and try to provide about $37 billion in total. That $37 billion in this cap and trade bill would be coupled with the $500 million that I have each year through appropriations for clean coal research. By the way, this President's funding recommendation on research in fossil fuels has largely been largely flat and very inadequate to our needs. He has mostly paid lip service to our tremendous needs. There is no evidence the White House is very interested in this. Through such an amendment I propose to create a fund of at least about $3.5 billion a year, starting in 2009, because these can start with the first auctions and the funding can be available on the first opportunity after passage of a piece of legislation. If this could be accomplished, we would have about $3.5 billion a year for 12 to 14 years.

I am convinced we can do this. I am convinced that investments in these technology opportunities allow us to address the climate change challenge and still continue to use the most abundant source of energy in this country without injuring our environment. There are people out there who are some of the best and the brightest scientists and engineers in our country. We need these people working on this issue. There are many technological leaps that need to be made. The best minds should be working on ways to take CO_2, produce baking soda, and make cookies. They should be working on ways to have beneficial use of carbon, which is destructive to our environment, but can be constructive if you invest it in algae and harvest the algae for diesel fuel.

Frankly, the amount of money that has been committed to research and

technology and development has been pathetic, just pathetic. It is not just this, it is also solar, wind, and other technologies. But Jeffrey Sachs, a professor at Columbia University, has written a wonderful essay in Time Magazine this week. I commend him for saying we need a moonshot here. My amendment is going to give us that opportunity—$37 billion invested in the opportunity to unlock the mysteries of how we use our most abundant resource and still protect our environment.

We can do this, but we cannot move forward and will not move forward in a way that says to our country we need to make investments. I believe we can produce a number of zero-emission, coal-fired electric generating facilities. It will not happen by accident. I chair the Committee on Appropriations that funds all our national laboratories. The thousands and thousands of the best scientists in this country are a national treasure. We are now seeing many of them being furloughed and leaving our Federal payroll. We have so much to do, in such a short time, to unlock the opportunities to address this issue I have described. I hope we can move forward very aggressively.

Finally, in closing, I will speak at greater length on the floor today on this subject, and I may file an amendment today. But this, it seems to me, is the first key to unlock the opportunities that will give us a future in which we can protect our environment and continue to use the resources we must use. This must be part of the step if the promise of not only this bill but future bills dealing with the great challenge of global warming are to be fulfilled.

I yield the floor.

The ACTING PRESIDENT pro tempore. The Senator from Florida is recognized.

Mr. NELSON of Florida. Mr. President, I will speak on the climate change bill. How much time do we have under this order?

The ACTING PRESIDENT pro tempore. The Senator has 8½ minutes remaining on the Democratic side.

Mr. NELSON of Florida. Is this in morning business?

The ACTING PRESIDENT pro tempore. We are in morning business.

Mr. NELSON of Florida. Mr. President, what I wished to share with the Senate is how I come to the table on the question of the climate change bill.

We clearly understand something is happening to the Earth. The Earth is heating up. Obviously, there are interests that are going to be affected—special interests—if we go about changing the way we are doing business, the kinds of pollutants we are putting in the air, and those business interests will claim that, in fact, they are being harmed. I understand that. That is part of the body politic we have to come together and find a solution on what will be the least detrimental to folks as we are trying to change the Government policy of all this stuff we are putting in the air. Indeed, we have been putting this in the air ever since we started changing our society in the Industrial Revolution because the burning of fossil fuels is starting to accumulate carbon in the air. That carbon is acting as a shield in the upper atmosphere, creating a greenhouse effect, that when the Sun's rays come in and hit the Earth, and they reflect off; normally, they would radiate out into space. But the fact that we are creating a cap, similar to a greenhouse, with these gases—primarily carbon dioxide—they are trapping that heat and, as a result, the Earth is heating up.

In the course of this debate, we will have a lot more scientific evidence that will come forth and tell us how many parts per million of carbon in the air you can get before it becomes almost irreversible. We certainly wish to avoid that. But that means we have to come back to the political policy and make the decisions that will prevent us from ever getting to that concentration of carbon in the atmosphere that becomes the point of no return, that at that point the Earth continues to heat up to the point that it has all the consequences—the consequences of the ice sheet in Greenland, which I have been on, which is melting, and that in itself is 2 miles thick. It is freshwater because of the hundreds of thousands of years of the rain coming and the rain turning into snow and the snow packing and, year after year, the same thing happening. It is 2 miles thick in the center of Greenland. It is all freshwater.

If that melts, the seas are going to rise somewhere between 10 and 15 feet—the entire seas of planet Earth are going to rise. What happens to Antarctica and the icecaps there? We will have testimony, and we will have scientific evidence on all this. We cannot let that happen. So we are going to have to make the policy changes; that is, we are going to have to have the political will in order to make the policy changes, and the tough thing about this is that it is not just this country. We have to get the rest of the countries to do it. But America is the one that has to lead, and in the last decade, America has not led.

Let me just show this chart. This is my State. What would happen if the seas rise? If they rise 10 feet, which is the red—here is the State of Florida. We are familiar with it, the peninsula with the Florida Keys. If the seas rise 10 to 20 feet, Florida is going to look like this, just the gray. All of this red and blue is going to be underwater.

Mr. President, I say to my colleagues, most of the population of Florida is along the coast. I don't want that to happen to my State. My State has more coastline than any other State in the continental United States. Only Alaska has more coastline than our State. That is in excess of 1,500 miles of coastline. That is where the population lives in Florida. I don't want that to happen to our State.

In the closing minutes that I have—Mr. President, will you tell me how many minutes I have.

The ACTING PRESIDENT pro tempore. The Senator from Florida has 2½ minutes.

Mr. NELSON of Florida. Mr. President, I wish to share with the Senate what I saw from the window of a spacecraft. It is very typical that space fliers, on the first day in space, will be looking for things. On the 24th flight of the space shuttle over two decades ago, I was at that window—when you can get time and you don't have much time because every minute is planned—and I was looking for things. I was looking for the cape where we were launched.

By the second day in space, your perspective has broadened and you are looking at continents. And by the third day in space, you are looking back at home, and home is the planet. It is so beautiful, it is so colorful, it is such an alive creation suspended in the middle of nothing, and space is nothing. It is an airless vacuum that goes on and on for billions of light years—and there is home. It is so beautiful.

Yet when you look at it, it is so fragile. You look at the rim of the Earth. There is a bright blue color right at the rim that fades off into the blackness of outer space. And right at the rim of the Earth, you can see the thin little film that sustains all of life, the atmosphere. Even from that altitude, with the naked eye you can see how we are messing it up. Coming across Brazil in the upper Amazon region, the color contrast will show you where they are destroying the rainforests.

I came away from that profound experience of seeing home from a different perspective, with a new feeling that I needed to be a better steward of what God has given us—our home, the planet. If we continue to abuse the planet, Mother Nature will not work in syncopation and in balance.

The ACTING PRESIDENT pro tempore. The Senator's time has expired.

Mr. NELSON of Florida. For that reason, I am supporting this Lieberman-Warner bill.

I thank the Chair.

The ACTING PRESIDENT pro tempore. The Senator from Texas is recognized.

Mr. CORNYN. Mr. President, I ask unanimous consent that the first half of our morning business time, the 30 minutes, be divided equally among myself, Senator CHAMBLISS, and Senator SESSIONS.

The ACTING PRESIDENT pro tempore. Without objection, it is so ordered.

The Senator from Texas is recognized.

Mr. CORNYN. Mr. President, I first wish to raise the concern I have that this extraordinarily complex piece of legislation, I have been advised that this 342-page bill we have on our desks that we all assumed was the working document to which we have been drafting amendments, is actually not going

to be the document we are going to be working from as early as this afternoon. I have been informed—and I ask colleagues whether this is, in fact, the case—that there is actually another bill, not 342 pages long but 491 pages long, that will be laid down this afternoon by Senator BOXER.

It is very difficult for any of us to be prepared when the target continues to move. To those who are concerned, as the Senator from California and the majority leader have been about the speed with which we address this bit of legislation, this does nothing but slow us down and make our job harder. I hope that is not the case, but that is what I am reliably informed.

To me, it is counterintuitive to say the least that we would undertake to pass legislation with a pricetag of $6.7 trillion that will actually raise gas prices by 147 percent when families in my State and across the country are already paying an extra $1,400 a year for gas prices as a result of congressional inaction. Actually, I guess it is wrong to say congressional inaction because Congress has actually acted to impose a barrier to developing America's natural resources right here at home to the tune of roughly 3 million barrels of oil a day which, if it was made available and Congress would simply get out of the way, that would be additional supply which would bring down the price of oil which would give us some temporary relief as we transition to a clean energy future for our country and for the world.

By that I mean by developing things such as greater use of nuclear power, using good old-fashioned American ingenuity, research and development to develop clean coal technology and the like.

In the near term, I think we all have to acknowledge the obvious fact that oil is going to continue to be part of our future, but hopefully it will be a bridge to a future of clean energy independence, but not unless Congress acts. Congress is the problem.

I suggest when we look around for the causes of our current energy crisis that Congress simply look in the mirror because we are the problem. It is unfortunate that when the Senate had an opportunity recently to vote on the American Energy Production Act that only 42 Senators voted for it. That was when gas was about $3.73 a gallon. Today the average price of a gallon of gas is $3.98 a gallon.

I asked the question then, and I will ask it again today: Is the Senate going to reject an opportunity to develop America's natural resources and bring down the price of gasoline at the pump when gasoline is at $3.98 a gallon? How about when it is at $5 a gallon or $6 a gallon? Where is the tipping point at which Congress is finally going to wake up and realize it is the reason Americans are paying too much at the pump?

Instead of dealing with that urgent need that affects every man, woman, and child in this country, this Congress has decided to head down another path, and that path is bigger Government, more taxes, higher energy costs for electricity and gasoline, and with the uncertainty that any of this will actually have an impact on climate, especially given the fact that countries such as China and India, of a billion people each, are not going to agree to impose this on themselves. So America is going to do this, presumably, while our major global competitors are not, and we are going to suffer not only those higher prices but job losses, reduction in our gross domestic product, and a competitive disadvantage with the rest of the world. Why would we do that to ourselves?

At the same time, we see this Rube Goldberg bureaucracy that would be created. Yesterday, Senator DORGAN said this bureaucracy would make HillaryCare pale in comparison with its complexity as reflected on this chart. This is the kind of huge expansion in Government power over our lives and over the economy that is unprecedented in our country, and I suggest is the wrong solution, is the wrong answer to what confronts us today.

In my State in Texas, it has been estimated under that Boxer climate tax legislation that as many as 334,000 jobs would be lost as a result of the increased costs and taxes associated with this bill, with a $52.2 billion loss to the Texas economy, and an $8,000 additional surcharge on each Texas household. That is over and above the $1,400 that each Texas family is already paying because of congressional inaction on oil and gas prices. Electricity costs, 145 percent higher; gasoline, 147 percent higher.

I don't know why, at a time when the American people and the American economy are already struggling with a soft economy in many parts of the country, why we would do this to ourselves. It simply does not make any sense to me.

I would like to have an explanation from our colleagues who are advocating this particular legislation how they can possibly justify this bill. What could be the possible rationale for legislation that would do this to my State and have this sort of Draconian impact on the economy of our country?

I have heard some talk that said that gas prices have increased during the time President Bush has been in office. This is what has happened since our friends on the other side of the aisle have controlled both the House of Representatives and the Senate. We see there is a huge spike in gas prices during a Democratic-controlled Congress. But this should not be a partisan issue. This is a matter of the welfare of the American family and of the American economy. Why in the world would we not want to work together to try to develop the natural resources that God has given us to create that additional 3-million-barrel supply of oil so we can reduce our dependence on imported oil from foreign sources?

The alternative proposed by our colleagues on the other side of the aisle is, OK, we are going to impose higher taxes on the oil industry which, of course, would be passed along to consumers and raise the price of gasoline even more or they say we are going to have another investigation into price gouging when the Federal Trade Commission has investigated time and time again and found no evidence to justify a charge of price gouging when it comes to gasoline prices or they say we are going to sue OPEC, the Organization of Petroleum Exporting Countries, which has to be the most boneheaded suggestion I have heard because, of course, what in the world would you ask the judge to order if you were successful in suing OPEC? I presume to open the spigot even wider so we would be more dependent on foreign oil and not less.

It is time for a real solution. This bill is not it. I call on my colleagues to do what we can to open America's natural resources to development and bring down the price of gasoline at the pump.

I yield the floor.

The ACTING PRESIDENT pro tempore. The Senator from Alabama.

Mr. SESSIONS. Mr. President, what is the time agreement at this stage?

The ACTING PRESIDENT pro tempore. The Senator is allocated 10 minutes.

Mr. SESSIONS. Mr. President, our Nation wants progress toward energy security, affordable energy. It wants to reduce pollution and it wants to fight global warming. There is no doubt about that. It wants us, this Congress, to do something. But it wants us to do the right things, wise things, prudent things, not wrong things.

I traveled my State this past week, all week, from every corner of it. My wife and I traveled around and we talked to a lot of people. One thing that is absolutely clear to anybody who has eyes to see and ears to hear is that the American people are terribly concerned about surging gasoline and electricity prices that are rising, and this is hurting them. This is not an academic matter we are talking about. Average families, carpooling and driving to work, are going to the gas pump and finding that when the month is over, their bill is now $50, $75, or $100 more for the same amount of gasoline that they bought 2 or 3 years ago, and it impacts their budget. They have less money to pay other bills with, to fix the brakes on the car, or purchase a set of tires, or take a trip, or have a medical expense, or buy a new suit of clothes. These things are reduced when we have now added to their normal expenses $50, $75, or $100 a month for fuel.

Some of that, I believe, we can do something about; some of that we may not. We have to be honest with our constituents. But they want us to do something. They are not happy, and they should not be, that we are importing 60 percent of the gasoline and oil that we will need to run our country

from foreign countries, many of which are hostile to us. We are transferring out of our country $500 billion to purchase that oil. It is the greatest wealth transfer in the history of the world. No one has ever seen anything like it before, and it is, in my opinion, without any doubt a factor—a major factor; perhaps the major factor—in the economic slowdown we are seeing today and making us less competitive, and it is reducing and threatening the health of our economy.

Now, when you talk to people in my State, and I think any State that you would consider, and you tell them: Well, we are going to be talking about energy matters next week, and we have a cap-and-trade bill that is on the Senate floor, our good and decent and trustworthy citizens, the ones who still have a modicum of confidence in Congress, you know what they think? You know what they think? They think we are going to set about in Congress to do something about surging energy prices, to contain the increase in gasoline prices, to reduce our dependence on foreign oil and this incredible wealth transfer leaving our Nation's security at risk. They think we are going to take steps to strengthen the American economy.

Why shouldn't they? Isn't that what they pay us to do? But, oh, no, they would be shocked to learn that the Democratic leadership, the leadership of that great Democratic party which claims to represent middle-class Americans, is uninterested in these matters but is now attempting to pass legislation that will raise taxes, substantially raise energy costs, gasoline prices, by 50 cents plus a gallon, will cause worker layoffs, and will hurt our economy and leave us less competitive in the world marketplace. That is what this bill will do. It is the opposite of what the American people, our dutiful citizens who send us here, would expect us to be doing at this time.

On Monday, my good friend, Senator REID, the Democratic leader—and I do admire him, and he has a tough job, there is no doubt about it. I know he can't make everybody happy—seemed hurt Monday that the Republican Leader MITCH MCCONNELL said bringing this bill up demonstrated he was out of touch. Well, I say that is maybe too nice a term. Maybe ''clueless'' would have been a legitimate term. Senator REID is such a wonderful guy. He comes from Searchlight, NV. I suggest he go back to Searchlight and talk to real people. What are they going to say, that they want us to raise prices of gasoline? Give me a break. They are not going to tell him that in Searchlight, just as they didn't tell me in Alabama to come here and pass higher taxes on gasoline, to create bureaucracies the likes of which we have never seen, to create high energy prices, to drive up the price of energy by this complex, sneaky cap-and-trade tax system that the Wall Street Journal calls the greatest wealth transfer since the income tax, or to create a bureaucracy that is going to monitor this complexity throughout the country.

It is an unbelievable 342 pages, this bill that is now before us, and it is not the right thing. It would represent an injection of Washington into the most marvelous thing we have, in many ways, in our country—the free American economy. It would be an injection of Washington into that economy of unprecedented proportions.

The goal of this legislation is to reduce CO_2 emissions in our country, they say, by 71 percent by 2050. That means to reduce the amount of carbon fuels we use by 71 percent by 2050. But the population is increasing in our country during this time significantly, by every poll that I think is accurate, and when you calculate that, it means we are going to reduce carbon emissions per American—per capita—by 90 percent. It means virtually the elimination of coal, natural gas, and gasoline and oil—eliminate those from the American economy. We do not have the science and the technology to get us there as of now, yet this bill would put us on a direct glidepath toward that direction.

So the fact that this is a tax, that it would drive up energy costs—indeed is a sneaky tax on the American people—is indisputable. Nobody disputes that. To borrow a phrase from former Vice President Gore, the debate is over on that question. This bill will increase the cost of energy, and high energy prices will reduce economic output, reduce our purchasing power, lower the demand for goods and services, make us less competitive in the world, and ultimately cost American jobs. That is a fact. Supporters will argue that it creates a fund to alleviate high energy costs for low-income Americans by reallocating some of the trillions of dollars to people, according to the political whims of, I guess, this Congress, to decide who will win and who will get money back and who won't get money back. The current increase in gasoline prices alone amounts to about 50 cents a gallon, as I indicated, under this legislation. And, amazingly, it does nothing, zero, to produce any more clean American energy and to lower the price of gasoline to produce our energy here at home. I worry about that.

In the years to come, we are going to be using a lot of oil and gas and coal. We could use clean coal to create liquid fuels that we could burn in our automobiles. All of that absolutely can be done to reduce our dependence on foreign oil. Let me tell you, there is a big difference economically, if you take a moment to think about it, in sending $500 billion to Venezuela and Saudi Arabia and UAE to buy oil with than if we spent that money at home creating American jobs for American workers.

I tell my colleagues that this is a bill that is unjustified and unwise. It is change, but change in the wrong direction, and I urge its defeat.

I yield the floor.

The ACTING PRESIDENT pro tempore. The Senator from Georgia is recognized.

Mr. CHAMBLISS. Mr. President, I first of all commend my colleague from Alabama, and I associate myself with his remarks because he is dead on target.

I also rise today to discuss the Climate Security Act that is before the Senate. First, I thank all of our colleagues who have been responsible for bringing this bill to the floor because we need to debate this issue. It is a critical issue that is important to all Americans, not only this generation but future generations. I have two grandchildren, and I want to make sure we leave our grandchildren an America better than we inherited it. So it is a critically important debate.

The Climate Security Act will require the transformation of the U.S. economy to reduce greenhouse gas emissions in an attempt to lower the average world temperature in 2050 and beyond. I note, however, that in a study done by the University of Georgia, released last year, it was determined that over the past 100 years the actual temperature in America had been reduced by 1 degree, not raised any at all but actually reduced.

It is estimated the Climate Security Act will generate increased revenues of $6.7 trillion using allowances and auctions. A large portion is given directly to various Federal and State programs outside of the normal budget and appropriations process. However, this amount of revenue must come from somewhere, and unfortunately, under this bill, it is going to come from you, me, and from American individuals and families who will pay higher costs for the energy we use to live.

Economic models have overwhelmingly shown this bill will affect consumers directly through higher gasoline and electricity prices, resulting in lower household incomes and millions of jobs being lost in America. Moreover, the national economy will be harmed as gross domestic product is expected to drop considerably over the next 40 years, should this bill be enacted.

We also know this bill will constrain the supply and significantly raise the cost of transportation fuel. Like many of my colleagues, I spent the Memorial Day recess traveling around my home State. The average price of a gallon of diesel was $4.77 per gallon, and regular gasoline averaged $3.98 per gallon. These are the highest prices ever recorded in my home State of Georgia, and this is my constituents' No. 1 issue.

So it troubles me, as we are seeing almost $4 per gallon gasoline in my home State, that some in this body want to enact legislation that would further increase the price of a gallon of gas. I hear from hundreds of Georgians every day who are struggling to fill their tanks to get to work or to take their kids to school or to run their necessary errands.

I will be honest, I don't know how the average American, the average Georgian in particular, is coping with this issue—with the rapid increase in the price of a gallon of gas.

EPA models show that the gasoline prices will rise by a minimum of 53 cents per gallon if this bill were implemented. Why would we do that to the American people, who are already hurting at the pump?

Regrettably, the legislation before this body would do nothing to increase our domestic supply of oil and help alleviate the lack of supply of gas that is driving the prices up.

Instead, this bill will only keep prices rising. The Energy Information Agency study predicts that gasoline prices will increase anywhere from 41 cents per gallon to $1 per gallon by 2030 due to this legislation. Some estimates have gasoline prices rising by as much as 145 percent in my home State of Georgia. This is unacceptable to the people of my State and unacceptable to the people of this country.

Nobody disputes the fact that the United States is dependent on foreign sources of oil. We currently import 60 percent of our oil—actually a little greater than 60 percent—and nobody disputes that this problem has been in the making for decades. Over the past 30 years, the United States has reduced our domestic exploration options and left our refining capacity stagnant.

The rising cost of fuel requires a multi-pronged strategy to respond. That is why we must take commonsense action and increase our domestic supply of oil by exploring where we know there are resources available and encouraging the development of alternative fuels, such as cellulosic ethanol, to decrease our reliance on foreign oil.

We must find both short-term and long-term solutions to provide energy security for our Nation and give relief to Americans.

This bill will attack citizens at the pump and increase their electricity costs, thus exacerbating job losses to overseas markets.

Higher energy costs to businesses and the necessity to invest in expensive low carbon technologies will force companies to raise the prices of their products, opening the market up to low-cost international competition, or move businesses to China or Mexico, where environmental regulations are lacking. Millions more jobs will be lost in America as a result. One study estimates that between 1.1 and 1.8 million jobs will be lost by 2020 as U.S. companies close or move overseas. Another study shows that up to 4 million jobs will be lost by 2030 inside the United States if this legislation becomes law. It has been estimated that in Georgia alone we may lose as many as 155,400 jobs, should this legislation be enacted.

Manufacturing jobs will be one of the hardest hit sectors as the Energy Information Administration projects that manufacturing output will decline by up to 9.5 percent in 2030. This country has already lost 19 percent of its manufacturing jobs since 2000. This legislation will only help push those jobs outside of our borders.

The cost to American families will be too much for many to bear. An EPA study estimates that the cost per household in Georgia will be as much as $608 in 2020, and nearly $4,400 per year in 2050. The median household income in Georgia is $64,000. CRA International states that the average increased cost to families is $1,740 per family in 2020.

Workers keeping their jobs would be subject to much lower wages, due to increased competition and increased costs. Even with lower incomes, families would be expected to pay more to heat their homes and fill up their cars. The Environmental Protection Agency has stated that electricity prices will increase an additional 44 percent by 2030. In Georgia, the estimated cost will be 135 percent higher if this legislation is enacted.

This will be devastating to families across the country.

According to Housing and Urban Development, poor families spend almost five times as much of their monthly budget in meeting their energy needs—19 percent—as wealthier Americans, who spend approximately 4 percent.

Increases in energy prices due to carbon limits would hit the poor five times harder, which certainly will be unsustainable. This bill, by some estimates, will hit the average Georgia household in an amount equal to $7,231.

The effects this legislation will have on consumers is outrageous: higher gasoline prices, higher electricity prices, lower household incomes, and job losses.

In closing, let me touch on some specific aspects of the bill. While the bill includes a market-based cap-and-trade system——

The PRESIDING OFFICER (Mr. NELSON of Nebraska). The Senator has 1 minute remaining.

Mr. CHAMBLISS. I believe this bill could be more fair and equitable. We also should work to make it more predictable for businesses and understandable to taxpayers and consumers. One of the greatest challenges to any climate bill will be to ensure that it does not stymie economic growth and protects American jobs. We need to continue to seek the best way to generate the greatest benefits for the lowest cost. We cannot burden our children and our grandchildren with increased energy costs.

A climate bill must be flexible to adjust to changing science, economic conditions, and the actions of other countries. The Climate Security Act attempts to encourage other countries to reduce emissions, but does not appear to be flexible enough to ensure Americans are not disadvantaged because of the inaction of other nations.

The details of the Climate Security Act will greatly affect every American and are extremely important. Have no doubt about it, a vote for cloture on this bill is a vote to increase gas prices by a minimum of 53 cents per gallon.

I yield the floor.

The PRESIDING OFFICER. The Senator from Delaware.

Mr. CARPER. Mr. President, I ask unanimous consent the remainder of time for our business for the next 27 minutes be allotted to me.

The PRESIDING OFFICER. Without objection, it is so ordered.

Mr. CARPER. Mr. President, I want to take a moment on the heels of the comments of my friend and colleague from Georgia to look at some of the hard and fast numbers. We can conjecture here all we want about what is going to happen to the price of gasoline going forward. He suggested it is going up by 100 percent or 150 percent—who knows? Here is what happened. This we do know. We do know the price of gasoline starting back here in 2001 was at about $1.50 a gallon and has risen today to almost $4 a gallon. We do know that. We can conjecture until the cows come home about what might happen in the future, but we do know what happened in the past under the watch of the current administration. It is not pretty. If we want to make sure this trend continues, we will not come up with ways to reduce our consumption of oil; we will not produce more energy-efficient cars, trucks, and vans; we will not reduce the amount of miles we travel in our communities and our States; we will not find a whole host of ways to conserve energy; we will not come up with ways to conserve energy through renewables. If we don't do any of those things, this kind of thing will continue. Our challenge here today and the way to make sure this doesn't continue is to pursue legislation along the tracks of that which is before us today and this week.

I begin today by commending the work of Senator BOXER, Senator LIEBERMAN, Senator WARNER, and others in developing this global warming legislation. Let me say to my colleagues, your initial bill was a good start. I believe the version that has been brought before the Senate this week represents a significant improvement over that original proposal. The leadership of this troika—it is actually tripartisan leadership—a Democrat, a Republican, and an Independent—your leadership gives me hope we will pass landmark legislation on this front, not this week, not this month, probably not this year, but in the not too distant future when hopefully we have a new administration, regardless of who is President, who is more amenable, more supportive, more understanding of addressing global warming. I plan to do all I can in the meantime to make sure we do not lose that opportunity.

As a lot of my colleagues may know, addressing global warming has been an important issue for me since my early days in the Senate. I think the facts are indisputable today. Our planet is growing warmer. We human beings are a major contributor to that.

My passion on this issue began about a dozen or so years ago when I first met two doctors, Dr. Lonnie Thompson and Dr. Ellen Mosley-Thompson, as they received something called the Commonwealth Award for Science in Wilmington, DE for their pioneering work on global warming. The Thompsons are natives of West Virginia, as am I, and they are both professors at Ohio State University, where I received my undergraduate degree, and both are world renowned for their research on the effects global climate change is having on glaciers and ice fields throughout the world. Measuring levels of carbon from ice core samples that go back nearly 1 million years in time, they focused on glaciers and ice caps atop mountains in Africa and South America. They have concluded that many of them—that being the mountains and glaciers, the ice caps on the mountains and glaciers—will probably melt within the next 15 years or so because of global warming. They fear little can be done to save them. It is up to us in this body to prove the skeptics wrong, to show we can do something, we can pull together and we can address this threat to our planet.

Three years ago during our Senate debate on this same issue, I stressed that the Arctic sea ice had shrunk by 250 million acres over the past 30 years, an area about the size of California, Maryland, Texas—and maybe Delaware—combined.

Today, I am sad to say, the Arctic sea ice has shrunk by not 250 million acres but 650 million acres, an area the size of Alaska and Texas combined or the size of 10 United Kingdoms combined. If we continue down this path on which we have started, the consequences for our planet and our country and our people will be catastrophic. It is up to us to ensure that America leads the world down a different path. We must and we should.

The EPA estimates that unless global warming is controlled, sea levels will rise by as much as 2 feet over the next 50 years. I have heard even greater amounts over the next 100 years. For island nations and coastlines, that could mean entire cities and beaches are wiped out. It is up to us in this body to ensure that those beaches and those cities, those coastlines, are preserved.

I have a chart here I want to share with my friends. For those of you who have not been to Delaware, this is Delaware: About 100 miles end to end, and from east to west, maybe 50 miles here. This is the outline of our coast. This is Lewes. This is Cape Henlopen. This is Rehoboth Beach, Dewey Beach, Bethany Beach, Fenwick Island, the Nation's summer capital. This is where the beach is today. Fifty years from now, if we don't do anything about global warming, sea level rises will have been 2 feet and this will be the beach in Delaware. This is Dover, DE, our State capital. This past Sunday we hosted 150,000 people from all over the country—NASCAR race. In 50 years from now, if we are not careful, this will not be Dover, it will be Dover Beach. We won't be having NASCAR races at Dover Beach. We may be having sailing regattas, we may have motorboat races, but we will not be having stock car races unless we do something about it, so this is imperative for a lot of reasons, including some that are close to my heart.

Since our last Senate debate on this issue we have seen the scientific community come together on this issue. The Intergovernmental Panel on Climate Change has undeniably affirmed that the warming of our climate system is linked to us, human activity. We also know the United States is one of the world's two largest emitters of greenhouse gases, along with the Chinese. In fact, they may have overtaken us by now. We account, in this country, for almost 20 percent of the world's greenhouse gas emissions and for almost one-quarter of the world's economic output. I believe our Nation has a responsibility to reduce our emissions of CO_2. In short, we have a responsibility to lead.

Unfortunately, we have not seen a whole lot of leadership coming from the White House or enough from the Congress on this front. At least not yet. That has to change and that change is starting, I hope, this week. Others, in the meantime, have begun filling the void. We have another chart here. This is a chart of our country. There is a lot of green, light green, dark green, and blue. The light green areas are the areas where the States are actually developing their own climate action plans. They have been waiting for us. They have given up on that. They started to take the bull by the horns. Light green is where States have something in progress in terms of developing their climate action plans. The dark greens are the States where they completed action. The blues are where they have revisions in progress—about 38 States. They have been waiting for us. They are tired of waiting for us, and I don't blame them. One of those States is Delaware. We have a plan in my State and a lot of other States will soon have plans to reduce their own carbon emissions.

The States are not the only ones filling the void of Federal inaction. Fortunately, our Nation's businesses, a number of them, are doing the same thing. Companies such as DuPont, a global manufacturer headquartered in my home State of Delaware, have taken steps to reduce their own carbon emissions.

DuPont CEO Chet Holliday has said:

> As a company, DuPont believes that action is warranted, not further debate. We also believe the best approach is for business to lead, not to wait for public outcry or government mandates.

Contrary to concerns that combating global warming will hurt American businesses, DuPont's actions have had major positive impacts on its bottom line. In the mid-1990s, as part of a climate change initiative, DuPont began aggressively maximizing energy efficiency. That initiative has allowed DuPont to hold its energy use flat while increasing production. As a result, DuPont reduced its greenhouse gas emissions by more than 70 percent. By doing so, the company actually saved $3 billion—billion, with a ''b.'' But a patchwork of State initiatives combined with good corporate stewardship, however welcome, is not enough. We must have a comprehensive national approach, not only to give a signal to corporate America that this is a priority, but to the world, the United States is prepared at long last to be a leader on this front as well.

I have enough faith in American technology, American ingenuity and know-how, to believe we can provide that leadership without endangering our Nation's economic growth.

In fact, if we are smart about it, we will end up strengthening our Nation's economy, we will end up creating hundreds of thousands of new green jobs and we will end up creating products and technologies we can sell and export around the world.

I would quote Thomas Edison on opportunity. This is what Thomas Edison loved to say about opportunity: A lot of people miss out on opportunity because opportunity comes along wearing overalls and is disguised and looks a lot like work.

You know, some people look at global warming, our dependence on foreign oil or emissions or bad stuff in the air, and they see a problem. I see an opportunity. It is an opportunity that brings with it economic advantages and the possibility of creating jobs and products that flow from that, including technology and jobs and products.

Well, that is one of the big reasons I support the approach of the Lieberman-Warner Climate Security Act, to provide a solid framework for creating a national, mandatory program to dramatically reduce greenhouse gas over the next 40 years or so.

I am pleased to see Chairwoman BOXER's substitute makes several improvements over the bill we passed in the committee last year. Specifically, I applaud the chairwoman's efforts in strengthening the recycling and cost-containment sections of the bill.

Let me take a minute here, if I can, colleagues, to focus on the importance of recycling and combating global warming.

A lot of times people say: What can I do as an individual to help on global warming? As it turns out, everybody can recycle. Everybody can do that. Here are a couple of reasons why.

In 2006, the United States threw away literally, in cans of trash, some 82 million tons of material, with a recycling rate of about one-third—we recycled about a third of that stuff. Let me back up. Let me say that again. In 2006, the United States recycled about 80 million tons of materials. That is about one-

third of all that we would otherwise throw away, offsetting the release of some 50 million tons of carbon. That is equivalent to the emissions we save by recycling some 39 million cars each year, because we recycle. However, we only recycle about one-third of what we could. However, each year Americans discard enough aluminum to rebuild our entire domestic airline fleet every 3 months.

Put simply, increasing recycling cuts greenhouse gas emissions. To encourage recycling, the bill compels States to bolster recycling programs by requiring that no less than 5 percent of carbon credit revenues allocated to States must be used for improving recycling infrastructure to help States and local communities recycle more. I wish to thank the chairwoman again for working with me on this important issue.

Let me talk about cost containment next. I am also pleased with the cost-containment provisions Senator BOXER included in the substitute, such as the extra pool of allowances available in the early years to help contain high prices and the allowances that are returned to customers to keep energy prices down. I believe these provisions are moving us in the right direction to address any runaway costs that might occur in a new market.

Although this bill is a good start, I believe we can make some significant improvements in it, particularly in the area of pollution control, in the areas of output allocations and transit, encouraging people to get out of their cars and take a bus, take a train to get where they need to go.

Let me start off by addressing the four p's. It stands for the four pollutants. I appreciate that this bill acknowledges that dangerous air pollutants, including sulfur dioxide, nitrogen oxide, and mercury, are emitted by the power sector in this country. However, acknowledging a problem is not the same as solving that problem. I believe that in addition to reducing greenhouse gases, we must additionally pass a comprehensive bill that also reduces these other three harmful pollutants.

As some of my colleagues know because I have driven you crazy over the last 5 or 6 years on this, visiting many of your offices, 12 of my colleagues and I introduced the Clean Air Planning Act of 2007, or CAPA. We believe CAPA provides an aggressive, yet achievable, schedule for powerplants to reduce emissions and alleviate some of our worst air-related health and environmental problems, such as ozone, acid rain, mercury contamination, and, of course, global warming. This multipollutant approach fits perfectly within the framework of this comprehensive global warming bill. I believe we would be foolish to address only one pollutant coming out of our Nation's smokestacks, however important it is—carbon dioxide—while others—sulfur dioxide, nitrogen oxide, and mercury—threaten our health and our environment too.

My State of Delaware, along with the States around us—Maryland, Virginia, Pennsylvania, and New Jersey—we are at the end of the Nation's tailpipe. We continue to breathe dirty air. During the summer months, when ozone pollution is at its worse, more than 10,000 Delawareans cannot work or carry out daily activities. Nationally, some 27 million children age 13 and younger are being exposed to unhealthy levels of ozone.

We have another chart here. Not only do we have problems with folks breathing bad air, which is harming their lungs and their respiratory systems, for young children being carried in the mother's womb, mothers ingest large amounts of fish that contain mercury. This year some 630,000 infants will be born with high levels of mercury exposure. As a result, they could have brain damage. A number of them will have developmental delays, some will have mental retardation, and some of them will have blindness.

Sulfur dioxide emissions, meanwhile, from powerplants will cause 24,000 Americans to die this year—24,000 this year, 462 this week, 66 today, and 1 or 2 during the time I am speaking here will die because of exposure to sulfur dioxide emissions from powerplants. I do not know how many people are going to die from climate change, from global warming, from CO_2 emissions in this country in this year. I can tell you how many will die from sulfur dioxide—24,000. Twenty-four thousand. That is almost as many people who live in Dover, DE—24,000 people. Fossil fuel-fired powerplants are the single largest source of pollution that is causing these health problems.

If we do not act to tighten our emissions of these pollutants, too many communities will continue to live with the air that is unhealthy to breathe and mercury will continue to pollute our communities and bring harm to pregnant women and to children.

I believe it is not only the right thing to do but also the economic thing to do. Strict caps for all four pollutants, not just carbon dioxide, can help drive technology toward a comprehensive mitigation rather than a piecemeal approach. That is why I am introducing an amendment, along with Senator LAMAR ALEXANDER of Tennessee, that achieves similar reductions for sulfur dioxide, nitrogen oxide, and mercury that are in CAPA but are adjusted to fit the Lieberman-Warner timetable.

The bottom line is, as we develop an economywide solution to global warming, we cannot lose sight of the simultaneous need to enact stricter caps on mercury, nitrogen oxide, and sulfur dioxide from powerplants.

Next, let me turn to something called output allocations, the way we allocate the credits to polluters that emit carbon dioxide. I applaud this bill's provisions that provide important funding for zero- and low-carbon technology as well as funding to encourage the commercialization of carbon capture and sequestration for coal-fired generation of electricity.

However, I believe we are going to use coal for a long time. We have to figure out how to capture the other major pollutants as well, and the sooner the better. I believe the Boxer substitute can do better to support clean and efficient power generation. I am concerned this legislation still provides too many subsidies to dirty, less-efficient power generation at the expense of new, clean technologies.

Global warming legislation should make wind and other renewable energy products more economically viable. Affordable clean energy should be one of our main goals.

Unfortunately, this bill still continues on the same old paradigm of rewarding the historical polluters by distributing pollution allowances on an ''input'' basis. This means allowances to emit CO_2 in this bill are allocated based on historic emissions and the fuel being used rather than with respect to the efficiency with which power is generated.

Output-based allocation is an important policy tool to ensure that existing powerplants—particularly coal-fired plants—are made far more efficient and clean within a reasonable period of time. That is why I am planning on offering an amendment to change the distribution of allowances in the fossil fuel-powered sector from an input allocation to an output allocation.

It seems to me, colleagues, here we are trying to figure out how to apportion those allowances to emit CO_2. Why not provide more allowances to those utilities that create more electricity by using less energy? That is what we should be doing. Unfortunately, what we do in this bill is we provide more allocation to emit CO_2 to powerplants that use more energy rather than less energy. We should really provide the allocation and distribution of allowances—to some extent, at least—to reward those that provide a lot of electricity without using a lot of energy.

In addition to providing allowances to efficient fossil fuel facilities, my amendment—our amendment—would also provide allowances for new entrants generating electricity from other renewable forms of energy.

I have a couple of thoughts on this one. I and some of my colleagues are strong supporters of safe—underline ''safe''—and secure—underline ''secure''—nuclear power and believe it must be a prominent part of any global warming solution.

The resurgence of nuclear power in the United States gives us a unique opportunity to rebuild a carbon-free energy industry and create, in doing so, tens of thousands of highly skilled jobs for building the plants and operating them in the future. But to do this, we must provide support and incentives to the nuclear manufacturers to redevelop the workforce—especially facilities—and capacity to participate and ultimately lead the world in quality nuclear manufacturing. That is why I

have joined Senator WARNER and Senator LIEBERMAN in an amendment we will offer that provides a sense of the Senate that supports workforce training for the nuclear industry.

Next, transit. Finally, I wish to discuss a very important provision in the Boxer substitute that funds transportation alternatives.

I talked to you earlier about the importance of getting us out of our cars, trucks, and vans and getting us to take alternative forms of transportation that use less energy and produce less pollution. The transportation sector is responsible for about 30 percent of our Nation's carbon dioxide emissions, almost one-third. That is why Congress passed legislation that I coauthored with a number of my colleagues last year—Senator FEINSTEIN and others—to increase auto fuel economy from an average of 25 miles per gallon to 35 miles a gallon by 2020. The bill before us today also includes a low-carbon fuel standard and funding for alternative fuels.

Let's look at this chart here on my left. This line right here shows what CO_2 emissions are from our car, truck, and van fleet starting in 2005 by incorporating the new CAFE standards for 35 miles per gallon by 2020. Here is where we end up in CO_2 emissions for cars, trucks, and vans. Great progress. Unfortunately, if we keep driving more and more every year, the great reductions in CO_2 which could be recognized here are going to end up with no reduction at all unless we do something about vehicle miles traveled and reduce the amount of time we spend in our cars, trucks, and vans rather than continue to see that grow as we have over the last decades.

Living in sprawling areas without transit literally can double a family's greenhouse gas emissions. The negative consequences go beyond impacting our environment. With gas prices approaching $4 a gallon, longer commutes and increased distances required for errands costs money too.

Public transportation has saved Americans from an additional 286 million hours of sitting in traffic. So we included a provision in this bill—Senator CARDIN was very active on this—to use some of the auction proceeds to provide people with an alternative to driving, additional alternatives to people to driving. This provision in the bill would provide transit to more communities and would also expand transit where it already exists. That is good for our environment, it is good for our pocketbooks, and it is good for our peace of mind.

While this provision is important, we need to find a way to give communities a greater say in how they can spend their transit dollars. Transit is needed across our Nation. However, many communities would benefit from improved bike and pedestrian infrastructure, be they sidewalks, crosswalks, traffic calming, bike lanes—you name it. In rural areas, increasing freight rail capacity might be the most effective way to reduce vehicle pollution. Ideally, I think we ought to leave it to the local communities to determine which strategy works best for them and therefore allow all communities to take steps to address this portion of transportation pollution. Having said that, the provisions in this bill are a good first attempt to address this problem. We ought to do those, but we can do more and should do more.

As the only Member of the Senate who serves on all three transportation-related committees, I look forward to attempting to bring those three committees together and agree on a comprehensive approach to reducing carbon emissions from the transportation sector before we address climate change next year.

Mr. President, how much time do I have remaining?

The PRESIDING OFFICER. The Senator has 3½ minutes remaining.

Mr. CARPER. I thank the Chair.

In closing, I appreciate the significant progress that has been made already to improve this legislation. I applaud the efforts of my colleagues, Senators BOXER, LIEBERMAN, and WARNER, for the work they and their staffs and our staffs have done. The authors of the bill can be proud and their staffs should be commended, our staff should be commended.

We have seen forward-looking companies such as DuPont show leadership and vision to develop a business plan for operating in a carbon-constrained economy. We have seen States such as California, Delaware, and a few others take action to reduce our carbon emissions.

What we have not seen yet is leadership from our Federal Government. While we continue to do nothing, or too little, our international competitors are already developing new technologies and preparing for the future.

President John Kennedy once said:

> There are risks and costs to a program of action. But they are far less than the long-range risks and costs of comfortable inaction.

I recognize that despite the hard work of our staffs, Members, and leaders on this issue, there is a good chance this conversation will need to continue next year. It will and it should. I believe we must act on this issue next year, if we ultimately are unable to find common ground this year. That is why I am committed to joining Senators BOXER, LIEBERMAN, and WARNER in leading discussions today and throughout the year and bringing together all involved interests and parties to forge a path forward toward a solution that can pass the Congress early in the next administration. As Members of the Senate, we have a responsibility to ensure that our country provides leadership for the world in which we live on any number of fronts. The time has come for us to fulfill that responsibility with respect to global warming.

For some people, this is a political exercise. They will offer amendments to try to embarrass one side or the other, maybe embarrass the authors of the legislation, to basically ensure we don't get anything done, to tie us in knots and walk off and leave this legislation behind at the end of this week or sometime next week. That would be unfortunate. The American people know we have a problem. The problem is, the planet is getting warmer. If we don't do something about it eventually, we will not be able to turn it around. It is important for us to get serious. The American people want us to figure out how to work together. Our next President, whoever she or he might be, is going to provide us with much stronger, more positive leadership on this front. It is incumbent on all of us—Republicans, Democrats, and one Independent—to figure out how we can work with that next President and with ourselves, with folks in the business community, the environmental community, to come up with a plan of action to reduce and eventually eliminate the threat that global warming poses to our planet but to do so in a way that seizes on what Tom Edison said: Some people do actually miss out on opportunity because it comes along wearing overalls and looks a lot like work. This is one of those opportunities. We should seize the day—as we say in our State, carpe diem—not squander the opportunity but make the most of it.

I yield the floor.

The PRESIDING OFFICER. The Senator from Missouri.

Mr. BOND. Mr. President, good morning. Let's be clear as we begin this discussion. I, along with a vast majority of my colleagues, support cutting carbon emissions. We want to cut down on any kind of air pollution we have. We have done a great job over the years in improving our air, and we need to do more. But we must cut carbon without raising prices on gasoline, diesel, electricity, all the things that drive our economy. When American families are suffering record pain at the pump, a home mortgage crisis, and a soft economy, this is not the time to put the Government in a position of raising energy prices far higher than anything we have ever seen.

How much would Lieberman-Warner raise energy prices? We can quote from the sponsors of the legislation themselves. This is what the junior Senator from California has said Lieberman-Warner would raise: $6.735 trillion. It takes two charts to put up all the zeroes that this would increase energy prices and, thus, tax American consumers. As we can see, too big to fit on any one board.

The bill's sponsors claim they are trying to hit energy companies with the cost of this program. Does anybody doubt what will happen when we increase taxes on producers? That has to be passed on. It will be passed on to families, workers, farmers, truckers in

the form of higher energy bills and more pain at the pump. The bill's sponsors point to the customer relief they intend in the form of $800 billion over 40 years for tax relief and $900 billion to utilities to help consumers. That would still mean only $1.7 trillion was returned to an American public paying $6.7 trillion in higher energy costs. That is a $5 trillion loss. That complicated Soviet-style scheme would be based on the wisdom of some small group of bureaucratic czars who would decide who gets the money. It seems they are writing Congress out of the responsibility of handling the Treasury. They want to go around and turn a small group of wise men into the ones who decide who gets the allowances, who gets the relief, and where any relief will go.

The problem with the $6.7 trillion in higher energy prices is gas prices are already at record levels. Gas prices topped $4 in many parts of the country and are approaching that in the rest. Drivers are suffering at the pump. I was back in Missouri and traveled all over the State, from one corner to the other, over the Memorial Day recess. I heard firsthand from commuters, farmers, average citizens, businesses looking at absolute catastrophe from these higher energy prices. They are all fed up with higher gas prices. Regrettably, higher gas prices, higher diesel prices are the result of Congress's action or inaction in blocking for 30 years the production of new energy in the United States.

I visited truck stops in Joplin in southwestern Missouri and Palmyra in the northeast part of the State. I heard from truckers about the record diesel prices. Things are getting so bad that many are laying off drivers. Some are even going out of business. This is a real problem for our country. When truckers suffer, we all suffer. If they go out of business, we will not have trucks to deliver the goods. Transportation costs make up a significant part of the cost of almost every consumer item. When diesel prices go up, prices go up, and families will pay. In many areas, we may not have the trucking infrastructure to deliver the goods we need.

How much will Lieberman-Warner increase our pain at the pump? The Environmental Protection Agency estimates Lieberman-Warner will increase gas prices by 53 cents per gallon by 2030 and by $1.40 per gallon by 2050. Supporters of this bill tell us this is no big deal; it only represents 2 cents a year. A good statistician can try and make any number look not quite so bad. I can't speak for folks in other States, but I can tell you the folks back home have a minimum amount of high enthusiasm for Congress taking more action to raise prices.

Mr. President, $1.40 is $1.40. That increase in the price of gasoline is totally unacceptable, particularly when it comes with increases in prices in all other forms of energy. Yet that is the path the supporters of this legislation want us to trod.

Some Senators say that since gasoline prices have risen 82 cents since the beginning of the year, it is OK that Lieberman-Warner will only raise prices another 53 cents to $1.40. Does anybody ever stop and think that we are going in the wrong direction? We ought to be talking about what we can do to increase supply, to bring prices down, not figuring out how to come up with a cockamamie scheme that is going to increase prices even more. I find the logic a little bit disturbing, if you can call it that. The 82-cent rise in gas prices over the last year has not been OK with the people in my State. A further 53-cent increase by 2030 in gas prices is not OK. A further $1.40-increase in gas prices is not OK with the people in Missouri. I can tell you that if we don't change the path we are on now, the increase in prices will be even greater.

The bill's sponsors say the demand for oil will go down under Lieberman-Warner. Such a claim seems fantastical, until you examine the source of the study. It is a study by the International Resources Group. That name seems normal enough. But then looking at a copy of the study, it shows it was guided by the close involvement of the Natural Resources Defense Council. They are the ones who are behind it. The NRDC study used by the other side assumes we will get 50 or 60 percent of our energy by 2050 from renewable sources such as wind and solar. I am all for clean wind and solar power. But nobody in their right mind will believe we will go to generating 50 percent of our power from wind and solar. That isn't going to happen. You talk to the experts. I have listened to experts, experts who are very knowledgeable about biofuels and others. They say biofuels can help. Wind and solar can help at the margin. But we are still going to depend upon fossil fuel for most of our energy costs, particularly our transportation costs.

On oil demand, the NRDC study makes more outlandish assumptions. They predict the fleet efficiency for cars and light trucks will go up to 52 miles per gallon. Congress just finished raising CAFE standards to 35 miles per gallon. Now the NRDC says: No problem, we will move it up to 52 miles per gallon. That would mean we would have a fleet of golf carts hauling our produce. I wonder how many golf carts it would take a farmer to deliver the hay to cattle in the field, how many golf carts to pull a wagon full of corn, how many golf carts to take a large family to school. A fleet of golf carts is a wonderful thing.

The NRDC says we will get 52 miles per gallon by moving the vehicle fleet to hybrid and plug-in vehicles. That is another startling assumption, 100 percent hybrids and plug-ins. Don't get me wrong. I am a big fan of the potential of hybrid cars using advanced vehicle battery technology. These are things we ought to be working for.

Over the recess, as part of my six-city tour of Missouri I mentioned earlier, I visited the Ford assembly plant in Kansas City, where they make the hybrid Escape SUV. Kansas City is a national leader in hybrids and battery technology. We have the Ford hybrid SUV plant. We have a GM plant assembling hybrid sedans and SUVs, and we are an international leader in all kinds of battery technology, starting from the original lead batteries to lithium-ion batteries to lithium-ion polymer batteries.

All these things will help. But Ford is only making about 20,000 of these cars a year. They don't have enough batteries to meet the needs. I wish to expand on the use of advanced vehicle batteries for hybrids and plug-ins. I believe we need to jump start it.

The PRESIDING OFFICER. The time of the Senator has expired.

Mr. BOND. I ask unanimous consent for an additional 2 minutes.

The PRESIDING OFFICER. If it comes out of the Republican time.

Mr. BOND. How much time remains on the Republican side?

The PRESIDING OFFICER. There is 17 minutes.

Mr. BOND. I ask my colleague how much time he needs.

Mr. VITTER. I need about 8 minutes.

Mr. BOND. I ask unanimous consent for 2 additional minutes.

The PRESIDING OFFICER. Without objection, it is so ordered.

Mr. BOND. If we can get a domestic manufacturing supply base for hybrid batteries to get the volume up and the prices down, that would be good. Right now we are all depending upon a Japanese battery manufacturer. We need to have those batteries manufactured in the United States and not be dependent solely on an external source. That is a twofer. We could expend the use of clean cars, burning gasoline only occasionally, expand the number of blue-collar manufacturing jobs—good for the environment and good for workers. But I do not think we can rely on the idea that we will achieve 100 percent hybrid and plug-in use during this bill. The NRDC study also assumes massive new production from carbon captured from powerplants and used for enhanced oil recovery. I support this too. But to think we can cut oil imports by 58 percent because we are expanding domestic production from burned-out wells through enhanced oil recovery is beyond the possible.

So if we set studies aside by environmental groups supporting the bill and manufacturing groups such as NAM opposing the bill, that leads us to the mainstream Government agencies such as EPA. They say gasoline prices will rise 53 cents per gallon by 2030, $1.40 by 2050. If you add a $1.40-per-gallon Lieberman carbon surcharge to the current price of $4-a-gallon gasoline, you get gas prices at $5.50 a gallon.

I can tell folks back home right now there is no way I can accept the Lieberman-Warner offer of $5.50-a-gallon gasoline. When I tell my Missouri constituents we are on the floor debating a bill, when we have $4-a-gallon

gasoline, and the bill would significantly increase energy costs rather than increasing supply that would reduce the price of oil, they cannot believe it.

We are on the wrong track. We need to cut carbon. We do not need to increase energy prices on the American public.

The PRESIDING OFFICER. The Senator's time is expired.

Mr. BOND. I thank the Chair.

The PRESIDING OFFICER. The Senator from Louisiana.

Mr. VITTER. Mr. President, I have been allotted 8 minutes, and I ask the Chair to notify me when 6 minutes of that 8 have expired.

The PRESIDING OFFICER. The Chair will so notify the Senator.

Mr. VITTER. Thank you, Mr. President.

Mr. President, like my colleague from Missouri, last week I traveled all around my home State. I had about nine townhall meetings and many other meetings of all kinds in every part of the State.

In these townhall meetings, gas prices—the price at the pump—was not the first question that always came up. It was the first eight questions that always came up. In fact, of all of the discussion I had in all of these townhall meetings put together, about two-thirds of that entire discussion—that entire time—was about rising gasoline prices and energy prices. It is obviously affecting folks all across the country, certainly including in my home State of Louisiana.

In early 2006, when this new Democratic Congress was sworn into office and came into power, the average price at the pump was $2.33 a gallon. The new leadership vowed they would do something about those sky-high prices. Well, apparently they did because now the average price at the pump is $3.98 a gallon—a staggering increase in a relatively short amount of time.

So in this context, when Americans all over our country, certainly including Louisiana, are suffering from these sky-high prices that continue to rise—as they go into the summer driving season, many hoping to take family vacations, realizing they cannot this summer because of these costs—I think a very reasonable question to ask is, What is this Lieberman-Warner climate change bill going to do to an already dire situation with regard to energy prices?

Unfortunately, I have concluded it is going to make that already dire situation much worse. It is going to add on to gasoline prices, as my colleague from Missouri has stated. It is going to add on to electricity and other energy prices significantly.

On the job site, it is going to also encourage and exacerbate a very worrisome trend of exporting jobs to other countries. After all of that, it will do little or nothing with regard to the fundamental climate change challenge because it mandates nothing on the part of other industrialized powers such as China and India.

Several economic studies have specifically examined these questions. Let's start with the price at the pump.

The Energy Information Administration estimates that this bill will cause gasoline prices to increase—in addition to everything that is going on now—between 41 cents a gallon to $1.01 a gallon by 2030. Now, again, we are facing dramatically rising prices at the pump now, and there seems to be no end in sight, in large part because we in Congress have not acted in a bold manner to increase supply and do other things to help ourselves at home. Yet this bill would move us even further in the wrong direction: between 41 cents and $1.01 more per gallon by 2030.

According to the EIA, the average American uses 500 gallons of gasoline every year. The average vehicle is driven more than 12,000 miles per year. So even now, at $4 a gallon, a 12-gallon gas tank costs over $50 to fill, and we are going to increase that significantly? That is moving in the wrong direction.

What about electricity and other important sources of energy? According to the Environmental Protection Agency, this bill will increase those prices—electricity prices—by 44 percent by 2030. Again, our consumers are struggling under energy prices right now, including electricity.

Winters are a tough time for folks in the Northeast. In my part of the world, summer is the time of peak electricity load, and that is a real price burden right now. Yet we are considering a bill that is going to increase that, an already challenging and dire situation, by 44 percent?

Then, what about the jobs picture. We debate in this body all the time how we can keep and expand and grow manufacturing jobs in this country, how we can get away from the trend of exporting those jobs overseas. Yet this bill will only make that problem worse as well.

The higher energy prices caused by the bill will force U.S. manufacturers to compete unfavorably with lower cost countries overseas. Realistically, companies will move their manufacturing base out of the United States to an even greater extent, and many American jobs will leave with them.

This country has already lost 3 million manufacturing jobs since 2000. We cannot afford to lose more. But what does the rigorous analysis of this bill's impact show? Well, the National Association of Manufacturers says up to 1.8 million jobs additionally—in addition to all of those figures I have already quoted—could be lost by 2020 and 4 million jobs additionally could be lost by 2030.

The PRESIDING OFFICER (Mr. CASEY). The Senator has 2 more minutes.

Mr. VITTER. Thank you, Mr. President.

Switching from coal plants to natural gas will drive job loss, particularly in the chemical and fertilizer industries. The chemical industry is extremely important to my State. Over 100,000 chemical jobs have already been lost in the last 5 years due to the high price of natural gas. Out of 120 new chemical plants under worldwide construction, only one is being constructed in the United States.

So like the price of gasoline, like the price of electricity, on the jobs front we have a very dire, challenging situation already, and this bill would make it far worse.

The real kicker to all of this is that after all of that damage to Americans, to their lifestyles, to our economy, what would this bill do in terms of climate change?

I am very concerned it would do little or nothing because, of course, it mandates no action on the part of other major powers and energy consumers around the world, specifically China and India. Think about it. As we push these jobs overseas, out of our country, where are those jobs going? They are going to countries such as China and India that would not be taking similar action, that would be continuing to build coal-fired powerplants and use outdated technology, that would contribute to the climate change problem. So much higher gasoline prices, much higher electricity and other energy prices, significant job loss—and what impact on the problem are we trying to address? In my opinion, little or none.

Mr. President, I hope all of our colleagues on both sides of the aisle hear from the American people, hear from them about the challenges they face right now as they fill up their automobiles, as they try to take summer vacations, as they struggle with other energy prices, as they hope to keep their jobs right here in America.

The PRESIDING OFFICER. The Senator has used 8 minutes.

Mr. VITTER. If our colleagues hear that message, I am confident they will vote down this dangerous bill.

Thank you, Mr. President. I yield back my time.

The PRESIDING OFFICER. The Senator from New Mexico.

Mr. DOMENICI. Mr. President, parliamentary inquiry: Does the Senator from New Mexico have time under the regular order?

The PRESIDING OFFICER. There is 5 minutes remaining under morning business.

Mr. DOMENICI. Mr. President, on Monday, I came to the Senate floor and discussed the rising price of gasoline and the additional increases that will result from the Boxer bill. These are not talking points. They are facts from several economic studies done by the EIA, the EPA, and many other groups.

Later today I will speak on the accomplishments we have already had in working together to advance policies that will strengthen our energy security and reduce our greenhouse gas emissions. We have not been asleep. We

have done quite a bit. I will also speak about the bill before us and the many concerns I have about its effectiveness, or lack thereof.

Right now, I want to speak on the impact this bill will have on the American economy. Like many Senators, I believe global climate change is a great challenge that our Nation should address. I joined Senator BINGAMAN in expressing that sentiment in a bipartisan Senate resolution 3 years ago. That does not mean anybody has produced a bill or legislation that matched up, in my opinion, with the concerns. The way we are doing it in this bill is one way. It has never worked any place it has been tried. I do not know why it should be expected to work in America.

I have great respect for the Senators who have drafted cap-and-trade legislation, but I remain deeply concerned about the steep costs and dire consequences this bill will have on our Nation's economy. I am troubled it will have very little, if any, environmental benefit.

To those who are continuing to say this is an absolute environmental necessity, I hope they will try to gather from the experts who have looked at it just how much environmental benefit we will get from this bill.

The EPA, the Environmental Protection Agency, has concluded this bill would reduce global greenhouse gas by just over 1 percent by 2050. According to the IPCC's own benchmark, such a reduction would reduce average temperatures by one-tenth of 1 degree Celsius in 2050. These rates of reduction are far below the levels needed to mitigate the most serious effects of global climate change.

Now, again, Mr. President, fellow Senators, I am not here just giving a speech. I am trying to give you facts. If facts are the things that come from studies by experts, we have facts on this bill. I repeat, the rates of reduction are far below the levels needed to mitigate the most serious effects of global climate change.

I am troubled by the various studies on this bill. Everyone has concluded it will increase energy prices and decrease economic growth. Especially in a time of record energy prices and economic slowdown, our Nation simply cannot afford this bill. That is not just speculation or clamor. It is a true probability that we cannot afford it.

While these studies confirm that the bill will have a negative impact on our economy, they also reveal significant uncertainty as to what that impact will be. According to CRA International, the only group that included the low carbon fuel standard in its study, motor fuel prices could increase by more than 140 percent by 2015. The EIA projects that the bill could reduce industrial activity by up to 7.4 percent by 2030. The Heritage Foundation estimates that 600,000 jobs could be lost by 2026.

Another cause for concern on the economic side is the estimate of the impact on gross domestic product. While all studies project a negative impact on GDP, estimates vary from a low of $444 billion, I say to my friend, the occupant of the chair, to a high of $4.8 trillion. That range of $4.5 trillion is as massive as it is inconclusive. It is equivalent to $15,000 for every American. A careful review of these studies should shake everyone inside of this Chamber.

We must realize that cap and trade is neither our best option nor the only option for reducing greenhouse gas emissions. In fact, the Congressional Budget Office Director recently testified that a rigid cap-and-trade program is up to five times less efficient than a carbon tax.

The experience of the European Union, which instituted an emissions trading scheme in 2005, should be highly instructive in this debate.

The EU's emissions have continued to rise under cap and trade, by about 1 percent per year. While the EU's system has failed to reduce emissions, it is having an adverse economic impact with energy prices rising and other carbon intensive businesses fleeing to the developing world.

Europe's difficulties are not the only example of the shortcomings of cap and trade. Last December, it caught my attention when, during an interview on the Charlie Rose Show, former President Clinton lamented the fate of the Kyoto Protocol, saying: 170 countries signed that treaty and only 6—6 of 170—reduced their greenhouse gases to the 1990 level, and only 6 will do so by 2012 at the deadline.

Our best projections, combined with the precedent of failing cap and trade regimes already in place, show that America should take a different path. We have been told that this bill is a market-based approach, but then we read a section that says, ''an emission allowance shall not be a property right'' and, ''nothing in this Act or any other provision of law shall limit the authority of the Administrator to terminate or limit an emission allowance.''

Let me explain. These are allowances that are being paid for, in most cases, and the CBO treats them as revenues and outlays. And, the proponents of the bill expect these allowances to be traded like stock and other securities. However, the bill fails to even provide a property right for allowances and permits the EPA Administrator to take allowances or limit them at any time, and in any way. This is the very opposite of a market-based approach, and I will have an amendment in the coming days to remedy this problem.

Furthermore, this bill allows nonemitters to hold possession and trade these allowances. Presumably they will enter into contracts, derivatives, swaps, and other complicated arrangements that may undermine the oversight, transparency, and integrity of the market. This is precisely one of the factors that led us to today's mortgage crisis, and maybe this bill creates that blueprint for carbon.

My concerns with this bill are no different today than those that were shared by the full Senate in 1997, when we passed a resolution expressing our opposition to the Kyoto Protocol if brought to the Senate for ratification. Our economy expanded by 5 percent in the quarter before that vote. In the midst of robust growth, the Senate overwhelmingly rejected the idea of a treaty that did not include developing nations or ''could result in serious harm to the United States economy.''

With many factors now limiting our economy, and with China's emissions today much greater than in 1997, our resolve should be stronger. High energy prices, a housing crisis, and a credit crunch limited our growth to 0.9 percent last quarter. Clearly, we have plenty of challenges to overcome. Our dependence on foreign energy is great, our trade deficit is high, our national debt continues to rise, and our dollar is weak.

As we debate this Boxer bill, we should ask ourselves two questions: What will it achieve, and at what cost? I believe the answer to the first question is very little—even by 2050, this bill will not provide meaningful global environmental benefit. The answer to the second question, however, is too much—this bill will disrupt our economy, add to consumers' pain at the pump, and weaken our Nation's ability to compete in the global marketplace.

Mr. President, I yield the floor.

CONCLUSION OF MORNING BUSINESS

The PRESIDING OFFICER. Morning business is closed.

CONGRESSIONAL BUDGET FOR THE UNITED STATES GOVERNMENT FOR FISCAL YEAR 2009—CONFERENCE REPORT

The PRESIDING OFFICER. Under the previous order, there will now be a period of 15 minutes of debate equally divided with respect to the conference report to accompany S. Con. Res. 70.

Who yields time?

The Senator from North Dakota is recognized.

Mr. CONRAD. Mr. President, as we begin the debate, first I thank my colleague, the ranking member of the Budget Committee, Senator GREGG, for his continuing graciousness and his professionalism as we have sought to find a way to conclude our work on the budget for this year. I also thank his staff. We appreciate very much the relationship we have and the very constructive dialog between us as we have searched to find a way to bring this debate to a close.

With that, I wish to describe the conference agreement in general terms. This agreement, we believe, will strengthen the economy and create jobs. It will do that by investing in energy, in education, in infrastructure. It