

Mr. BIDEN addressed the Chair.

The PRESIDING OFFICER. The Senator from Delaware.

Mr. BIDEN. While the chairman of the Foreign Relations Committee is assuming his seat, I wish to say to my colleagues, I know of no one else on this side who wishes to speak today. I am anxious to hear what my friend from North Carolina has to say. I will sit here and listen to all of it. And I sincerely am anxious to hear it. But I want my colleagues to know for scheduling purposes, I indicated to Senator KYL I am going to respond specifically to some of the points he raised because—again, I am not being solicitous—I think he is one of the best lawyers in this place. He knows this area very well. I think each of his points warrants a very specific response. But I will attempt to do that on Tuesday when we are back in. So I want to put people on notice, I am prepared to debate the issue if people wish to, but as far as I am concerned, we do not intend on using any more time today, unless for some reason my colleagues conclude I should.

I yield the floor.

Mr. SESSIONS addressed the Chair.

The PRESIDING OFFICER (Mr. WARNER). The Senator from Alabama.

#### PRIVILEGE OF THE FLOOR

Mr. SESSIONS. Mr. President, I ask unanimous consent that Steve Shope be granted floor privileges in the proceedings today.

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

Mr. SESSIONS. I want to share a few additional thoughts.

Earlier today I discussed my belief that if the United States is going to be a leader for peace, it needs to be a leader militarily in the world. It has fallen uniquely to be our responsibility, our burden, our role to do that. I think if we fail to do that, history will record that we abdicated a responsibility. That is critically important.

Presiding in the chair is the chairman of the Armed Services Committee. We have had a number of days of hearings—some top-secret, code-word briefings and hearings. Some have been public.

I want to share a few things, as I interpret what occurred in those hearings. It is consistent with the headline as has been cited earlier in the New York Times: "Experts Say Test Ban Could Impair Nuclear Arms Safety." That is the way it was interpreted by a New York Times reporter. That is the way I believe it is fair to be concluded.

The lab Directors were pressed aggressively by Senator LEVIN, one of the finer questioners that I have ever observed in this body. He asked them firmly and consistently: Were they on board? They maneuvered around a bit, but they eventually did say they were on board. But Senator ROBERT BYRD astutely noted they were "uneasy" with those answers. In fact, they indicated they were on board only after a good deal of insistence and debate about

signing on to the CTBT concept. They indicated that they would sign on and be on board, if the six safeguards could be included. These are employees of the executive branch of the United States Government. They work for the President. They know the Secretary of Energy was testifying there at the same time.

The chairman of the committee noted that their testimony was inconsistent with the testimony of the Secretary of Energy at the same hearing on the same day. The Secretary of Energy is a fine person, but he is not a nuclear engineer. He has not been given the responsibility to monitor the safety and security of our weapons. He says they are OK. The President says they are OK. But the experts didn't quite say that. In fact, they said it could impair nuclear arms safety. I think that is important. We do not have one voice about this matter.

They talked about the Stockpile Stewardship Program, and they were not nearly so confident in that program as some would suggest. In fact, it almost seemed, I suggest, that they were saying that the President, in 1993, just unilaterally said: We are not going to test, so they are not doing that. This apparently gave them some belief that they could have some other kind of testing, so that is better than nothing. I may be misinterpreting those comments, but I don't think so. I think they basically said stockpile stewardship was not a guaranteed thing, but that they would do their best with it, as patriotic Americans. They said they could not be sure the Stockpile Stewardship Program would work, and they admitted there would be no way to validate the Stockpile Stewardship Program other than through live-fire tests—tests of explosions, nuclear explosions.

I ask, is this, indeed, in the best interest of the United States to tie our invaluable deterrent responsibility to an undeveloped, untested, and unvalidated simulation regime?

The preamble to the treaty states that cessation of testing is an effective measure of nuclear disarmament. Dr. Robinson, Director of the Sandia Lab, testified that nonnuclear components in today's weapons will ultimately become obsolete and irreproducible—they cannot be reproduced. That is, without testing, our nuclear capability will vanish. If it does, it is a distinct possibility that other states will find the world's situation having changed significantly, and they may decide to determine to expand their own capability. It will, in fact, be, and these words irritate a number of people, but it has a ring of truth to it. It will be a form of unilateral disarmament, we, being the world leader, signing a piece of paper that ultimately leads us to a point where we cannot continue to be the world leader.

We know a test ban can't prevent nations from acquiring nuclear weapons. Tests by India and Pakistan showed

that. The Sandia Lab Director further testified that, "[t]hose who claim that by ending nuclear testing, we will close off the threat of terrorist development and use of nuclear explosives mislead themselves." And Congress should not accept such arguments as a basis for endorsing a test ban treaty.

I hope, Mr. President, we can develop a way to continue to reduce the presence of nuclear weapons. This Congress, this Senate has supported massive reductions in the number of weapons we possess. We have continued to explore other treaties and agreements.

I like limited, bilateral agreements with nations such as Russia or China or England or France, where we know what we are doing and it has an end time. We have an agreement. We have a precise understanding of the benefits and risks involved. These broad treaties, to which we are committing with the whole world of nations, many of whom are not going to comply with them, make me nervous. It is not necessarily good for a great nation to do that. A great nation has to be cautious. A great nation can't blithely go out and start signing up to a bunch of treaties and thinking that it will all work out sometime in the future. It is a serious matter.

I am glad the chairman and others, Senator KYL, Senator HELMS, have taken such a lead in this. I am glad to see Chairman HELMS here. Chairman HELMS has said consistently, this treaty is not good for America. He has refused to endorse it. He opposes it. Now we have had hearings and debate, and a growing number in this Senate are agreeing with him. I don't believe there are votes sufficient to pass it, because I do not believe that it is good for the country. I think the opinion of Senator HELMS on that is being validated daily by the experts, as well as Members of this body.

Mr. President, I thank the chairman for his leadership. I appreciate Senator BIDEN's ability to articulate and to advocate. It makes us all think carefully about what we are doing. I think it has been a good debate. I think we have learned a lot. In the end, I think this Senate will conclude this is not the time to ratify this treaty.

I yield the floor.

The PRESIDING OFFICER. The Senator from Delaware.

Mr. BIDEN. Mr. President, I am going to take about 5 minutes to respond to my friend from Alabama. He may have to catch a plane or something. I hope he will understand that, if he is not on the floor.

First of all, I find it fascinating, I think he may want to amend the record—I am being a bit facetious, a little tongue in cheek—amend the record by suggesting that he has greater faith in headline writers and reporters than he does in the transcript I am about to read.

I don't know whether he has ever been bitten by a headline. We all know headline writers read—and no one

knows this better than my friend from North Carolina—the part of the copy that is given to them, and they get to write the headline they want. Sometimes it bears little resemblance to what happened. I hope we don't put any faith in a headline. I am not suggesting we shouldn't put faith in what is written by reporters sometimes. What was said in this article is accurate, but it is not complete. As my friend from Alabama said, we do not have one voice speaking on this, but we do have one record, one record from the hearing. I have a copy of the record from the hearing conducted in the Armed Services Committee yesterday, page 59. I will read the whole thing. It will take a minute.

Senator LEVIN. Therefore, what you are telling us is that if this safeguard [the Strategic Stockpile Program] and other safeguards are part of this process that you can rely upon, that in your words, Dr. Robinson, you are on board in terms of this treaty; is that correct?

Dr. ROBINSON. I am on board that science-based stockpile stewardship has a much higher chance of success and I will accept it as a substitute.

Going on to page 60.

Dr. ROBINSON. As a substitute for requiring yield tests for certification.

The tests he is referring to are nuclear tests. Then further on down, Dr. Tarter says:

I can only testify to the ability of stockpile stewardship to do the job. It is your job, about the treaty.

Senator LEVIN. Are you able to say that, providing you can rely on safeguard F—

My description: Safeguard F is the safeguard that allows the President to get out of the treaty if the lab Director certifies that he is not able to certify the safety and reliability.

Senator LEVIN. Are you able to say that, providing you can rely on safeguard F and at some point decide that you cannot certify it, that you are willing under that condition to rely on this stewardship program as a substitute for actual testing?

Dr. TARTER. Yes.

Further down, same page:

Dr. BROWN. Senator LEVIN, if the government [the laboratories] provides us with the sustained resources, the answer is yes, and if safeguard F is there, yes.

Now I am not suggesting all else that is quoted is not accurate. But it is useful to have a punchline at the end of the quotes. It may be viewed as tortuous; it may be viewed in any way you want. I don't think my friend from Alabama means that because these renowned scientists happen to work for the Federal Government—they also, by the way, are in the employ, if I am not mistaken, of outside laboratories and industries as well, or at least on loan from them—I hope nobody is suggesting—and I am sure he is not—that they would alter their testimony because the President of the United States or the Secretary of Energy takes a position that is consistent with theirs, and that is why they are taking it.

I know my friend from Virginia will want to respond to this today, or Tues-

day, or whenever he wants to do it. We will have plenty of time. I did not want there to be a hiatus between the comments of my friend from Alabama and my responding. I will conclude, I say to my friend from North Carolina. I think we should be—and believe me, I need this admonition for myself as well—a little careful about some of the words we use, such as “unilateral disarmament.” I don't think anybody is arguing we are unilaterally disarming.

At any rate, I see my friend from Virginia has come down from on high and I assume wants to respond.

I yield the floor.

(Mr. INHOFE assumed the Chair.)

Mr. WARNER. Mr. President, I am anxious to receive the remarks of our distinguished chairman. But I was right there when Senator LEVIN asked the questions. I will put in the RECORD my edification of their replies.

We have to understand, this Stockpile Stewardship Program, SSP, is basically a computer and other adjuncts, scientific devices that we are going to put in place—that is the key, “put in place”—at the minimum, 5 or 6 years from now, but more likely 10 years from now. In the opinion of the Director of Sandia Laboratories, it could be 20 years. That is all in the RECORD in response to my question.

These Directors carefully said: Yes, we are meeting the current milestones in putting together this computer and other high-tech test programs, but we are a long way away. It could be as much as 20 years. So we could go to a period of, at a minimum, 8 to 10 years without any testing of the type that is a substitute for actual testing. Today, the stockpile is safe. Tomorrow, it is credible and safe. But as the years go on—and Senator BYRD used the words, as the years go on—the natural degradation under the law of physics of metallic parts, of chemical parts, and other parts takes place.

Therefore, this hope for SSP, in sum, is almost a dream, but these men conscientiously are working on it day and night. Hopefully, in a period of anywhere from 6, 7, 8, 9, 10, maybe 20 years, it will be on line for that type of database which actual testing will give.

In the meantime, we are going through with part of the SSP program, but not all of it—bits and pieces of it—largely relying on the test data of a bank of information we have in this country developed over the period of 50 years in which we did actual tests.

I thank my colleague.

Mr. BIDEN. Mr. President, I will pursue this more on Tuesday. I respectfully suggest that argument was based on a fallacy, and that is, the Stockpile Stewardship Program will not stay at zero until it is completed. We began this years ago. It is already working. We already use testing methods that do not require nuclear explosions.

The Senator will remember the chart James Schlesinger had with the arrows going up and down, and I quote from Dr. Sig Hecker, the Director of Los Al-

amos in 1997, whom everybody quotes these days, wrote a letter to the Senator from Arizona and said:

... there have been several instances since the cessation of nuclear testing in September 1992, where we have found problems ... for which in the past we would have turned to a nuclear test in the kiloton range to resolve. In the absence of testing, we have used the methodology of [Stockpile Stewardship] to evaluate the problem and suggest fixes if required.

This has included more extensive calculations, non-nuclear laboratory experiments, comparison to previous nuclear test data, and the extensive experience of our designers and engineers. Moreover, our assessment has been checked against the rigors of peer review by the Lawrence Livermore National Laboratory. We have examined several problems of this nature during this year's certification cycle.

At this time, we have sufficient confidence in our solutions to certify the stockpile without a resumption of nuclear testing. If our confidence in the fixes were not sufficiently high, we would not certify the stockpile.

He is no longer the lab Director, but I assume my colleagues all believe him to be an honorable man. When they say testing is not needed at this time—that is, the Directors—I ask my colleagues whether or not they agree with Jim Schlesinger, who said it is not needed at this time and he doubts it will be needed in the future.

Let me explain. We are using data from 1,000 past nuclear tests—as my friend says, from nonnuclear subcritical experiments and from high-tech simulations to understand what is happening and what may happen in the weapons stockpile.

Four facilities that will not be ready until 2005 are—they are called the National Ignition Facilities—a contained firing facility, dual-access radiographic hydrodynamics test facility, and the Atlas Plus power facilities. These facilities—and this is important—are all logical successors to older, less capable facilities. Our scientists are pushing the envelope but are not engaging in flights of fancy. That is why our labs and the Department of Energy are confident the National Ignition Facility will work, even though it has cost overruns. These facilities will serve several purposes and increase knowledge of basic physics of nuclear weapons. That new knowledge will lead to more accurate and precise computer simulations. The facilities can also be used to test the particular weapons problems. That is why I say our weapons will still be tested, even without full-scale nuclear weapons testing.

Another key tool we are developing is this advanced supercomputing accelerated strategic computing initiative, another generation of supercomputers that will be able to synthesize test data from the past, and all of the testing done on weapons components, to provide three-dimensional simulations of all aspects of nuclear weapons and how they react. Already, our scientists and engineers are working with industry and several universities to develop

computers that are capable of running more than 3 trillion operations per second. That is a new record level of computing power, and it gives us new safety.

Our goal, admittedly, over the next 5 years is for those supercomputers to be able to do 100 trillion operations per second. That is not something we need in our stockpile today. In fact, it represents a 100,000-fold increase in today's computational ability, and everybody says today's computational ability is sufficient to guarantee the stockpile. But when our weapons reach their so-called shelf life, then it is going to be needed, and we anticipate needing that sophisticated modeling. No one thinks that sophisticated modeling is needed now.

Finally, I have real questions about my colleagues' concern that the stockpile stewardship cannot work. Our scientists are the best in the world. They know what they are doing. They define scientific challenges that must meet the military performance and reliability standards. After defining these challenges, they believe they can meet them. I believe they know what they are talking about. But I see one problem. The one problem the Stockpile Stewardship Program faces now and in the future is that some may not fund it. That is what our colleagues at the laboratories are talking about.

Let me quote and conclude from a news release released today by the Department of Energy. I will submit it for the RECORD. It is "For Immediate Release," dated October 8, 1999, and is a joint statement by Directors of three nuclear weapons laboratories—I note parenthetically that my guess is they probably read the New York Times article—C. Paul Robinson, Sandia; John C. Browne, Los Alamos; C. Bruce Tarter, Lawrence Livermore National Lab.

I will read only from the fourth paragraph:

While there can never be a guarantee that the stockpile will remain safe and reliable indefinitely without nuclear testing, we have stated that we are confident that a fully supported and sustained stockpile stewardship program will enable us to continue to maintain America's nuclear deterrent without nuclear testing.

Mr. President, I ask unanimous consent that the entire statement be printed in the RECORD.

There being no objection, the material was ordered to be printed in the RECORD, as follows:

[From the DOE News, October 8, 1999]

JOINT STATEMENT BY THREE NUCLEAR WEAPONS LABORATORY DIRECTORS

(C. Paul Robinson, Sandia National Laboratories; John C. Browne, Los Alamos National Laboratory; and C. Bruce Tarter, Lawrence Livermore National Laboratory)

"We, the three nuclear weapons laboratory directors, have been consistent in our view that the stockpile remains safe and reliable today.

"For the last three years, we have advised the Secretaries of Energy and Defense through the formal annual certification

process that the stockpile remains safe and reliable and that there is no need to return to nuclear testing at this time.

"We have just forwarded our fourth set of certification letters to the Energy and Defense Secretaries confirming our judgment that once again the stockpile is safe and reliable without nuclear testing.

"While there can never be a guarantee that the stockpile will remain safe and reliable indefinitely without nuclear testing, we have stated that we are confident that a fully supported and sustained stockpile stewardship program will enable us to continue to maintain America's nuclear deterrent without nuclear testing.

"If that turns out not to be the case, Safeguard F—which is a condition for entry into the Test Ban Treaty by the U.S.—provides for the President, in consultation with the Congress, to withdraw from the Treaty under the standard "supreme national interest" clause in order to conduct whatever testing might be required."

Mr. BIDEN. Mr. President, let me conclude by pointing out that I find it kind of interesting. The very people who stand up here and say, as I happen to believe, that they have confidence that our scientists in the future are going to be able to shoot out of the sky like a bullet meeting a bullet incoming nuclear weapons over the ocean traveling at multithousand miles per hour and do it with certainty and accuracy—they have faith in the ability of that to occur, but they don't have faith in the ability of our scientists at the three laboratories, who say they are well on their way to doing that, to be able to say what they need.

I find it kind of interesting. I must admit it is a double-edged sword. I find my Democratic colleagues who do not support any national defense initiative—because they say this star wars notion can't work, it is too far out—I do not know how they come and rely so easily upon the likelihood that a \$45 billion investment is going to guarantee these supercomputers will function to the degree they are needed to when these weapons reach their shelf life. But let's be fair. You can't have it both ways. I would respectfully submit that the ability to guarantee MIRV nuclear warheads fired in the hundreds or the thousands at the United States could be blown out of the sky with impunity by a missile defense initiative on our part is a mildly greater scientific feat than what the stockpile requires.

As someone said: "The faith of our father"—"the faith of our father"—has always been that if we put our mind to it, if we invest the money, we have the intelligence, the ingenuity, and the know-how to get it done. I would respectfully suggest our three present laboratory Directors and all the doubts they express are primarily related to whether or not Safeguard F and funding of \$45 billion for the stockpile would be forthcoming.

I yield the floor.

The PRESIDING OFFICER. The Senator from Virginia.

Mr. WARNER. Mr. President, the best deterrent from keeping those

thousands of missiles coming in is precisely what we have had these 50-plus years—a credible safe deterrent in our stockpile. And the person whose finger is on the button firing those missiles knows that.

I am reading from yesterday's proceedings of the Senate Armed Services Committee on page 50 where the chairman, myself, asked the following questions. This is one of the laboratory Directors testifying:

"We moved this year toward the development of the SSP, and last year toward putting in place the supercomputers on a path that we think we need to have. We are on a path that by 2004 we will have a supercomputer in place that begins—"begins—"to get us into the realm of what we need to do this job"—namely certifying the stockpiling.

"The issue that I think you are trying to address"—this is the hardest point I think as a scientist—"is that we cannot predict that by such and such a date we will know everything we need to know."

"It is an evolving process. Each year we learn something else."

Bit by bit, year by year.

I then asked: "My time is running out."

And it is running out. We want to control time.

"Give us your best estimate, doctor," Senator WARNER said.

"Dr. Brown: I think we are going to be in the best position sometime between 2005 and 2010."

"Chairman WARNER: Dr. Tarter."

"Dr. Tarter: I agree with Dr. Brown."

"Dr. Robinson: My guess is somewhere in the 10 years hence to 20 years hence period."

There it is, short answers directed to the question.

Mr. BIDEN. Would my friend yield for a question? From what page of the record was he reading?

Mr. WARNER. Page 50 of the official transcript of the Armed Services Committee.

Mr. BIDEN. I don't doubt it. I read from page 59 to get the significance?

Do you get the significance?

That was stated on 50 and 51 and 52. This is 59. After all is said and done, the question was asked: Do you believe with the safeguards you can rely upon the stockpile, the strategic stockpile, approach as opposed to nuclear testing?

They said yes.

It follows. Page 59 and 60, I am reading from. Maybe there is something after page 61 in the testimony that would undermine what I have just said. I respectfully suggest I am unaware of it if it is. I stand ready to hear it if it has been.

It is one of those deals, folks. You have to go to the end. It "ain't over until the fat lady sings." It ain't over until you read the whole transcript. The last thing stated was: We have confidence.

Then, after the testimony, after the testimony and after the New York

Times article, the Department of Energy and in the name of the three scientists quoted—and I will read it again.

“While there can be no guarantee”—the point he is making on page 50—“that the stockpile remains safe and reliable indefinitely without nuclear testing, we have stated that we are confident that a fully supported and sustained stockpile stewardship program will enable us to continue to maintain America’s nuclear deterrent without nuclear testing.”

I yield the floor.

Mr. WARNER. Mr. President, it is 117 pages. I sat there for 5 hours 10 minutes. How well I know the various parts of this system. I was weary after 3 days of testimony. But it is all here for all Senators to read. I invite them to spend as much time as they can on the record.

It comes down to honest men, well-intentioned individuals—men and women on both sides of the issue—cannot agree, and should we move forward with a treaty that will vitally affect our security interests, unless the preponderance of the evidence is overwhelming, and beyond a reasonable doubt? Give us the certainty to make that step.

I yield the floor.

The PRESIDING OFFICER (Mr. WARNER). The Senator from Oklahoma is recognized.

Mr. INHOFE. Mr. President, I have a few brief comments to make in response to the very eloquent remarks from the Senator from West Virginia, in which I thought he covered it quite well. He had a concern for whether the intelligence estimate was going to be forthcoming.

I would suggest, and get into the RECORD at this time, that back in December of 1995 we were waiting for the NEI report to come out. And it came out.

That report said we would not have to defend ourselves in the United States of America for a limited attack in terms of—the discussion, of course, was the national missile defense—until approximately 15 years, not any less than 15 years.

We found out later that was actually imminent at that time.

I can recall so well writing the Chairman and Joint Chiefs of Staff, General Shelton, on the 24th of August of this last year—1998—and asking him to be specific in terms of taking the national intelligence estimate and all the information that he could garner and tell me at approximately what date North Korea would be able to fire a missile, a multiple-stage rocket. He came back and said it would be more than 5 years.

Seven days later—on the 31st of August, 1998—they fired one.

I think we all know right now that they have another type of missile that can reach Washington, DC, from any place in the world in about 35 minutes, and we don’t have any defense against that.

I don’t think, if we are going to rely on the NEI information, we are relying

on something that is going to be in the best interests of defending our country.

The Senator from West Virginia also talked about the ratification process and about needing more time.

We hear over and over again from every single person who stood up to defend the CTBT we need more time, we have to have more time. Yet if one reads what those same individuals are saying, the President of the United States said on the 16th of May, 1998:

Now it’s all the more important that the Senate act quickly, this year, so we can increase the pressure on, and isolation of, other nations that may be considering their own nuclear test explosions.

Also the President said:

... I ask the Senate to approve it [CTBT] this year.

That was 1998—last year; here it is 1999.

Vice President AL GORE said the same thing:

The U.S. Congress should act now to ratify the Comprehensive Test Ban Treaty.

That is July of 1998.

Secretary Albright said:

We need this Treaty now.

That was on September 23, a few days ago, this year.

She said, further:

For American leadership, for our future, the time has come to ratify CTBT—this year, this session, now.

I could go on and on; the leaders have said we have to do it now.

As far as taking up this treaty, knowing what is in it, the treaty has been there for 2 years. We have all had an opportunity. Have I read the entire treaty? No, but I read the areas that concern me on verification, on zero-yield thresholds, things where I know we cannot verify what would be done. Verification is not there.

I remind Members, every Senator, including the illustrious Senator from Delaware, had the opportunity to object to the unanimous consent request propounded and agreed to a few days ago calling for the vote to take place after the 14 hours of debate which should be some time on Tuesday or Wednesday.

The only Senator from that side who is not openly supporting this yet is the Senator from West Virginia who said, by his own mistake, he was not able to get down in time to object to the unanimous consent request.

We had an opportunity for every Senator to have slowed this train down so they wouldn’t have to vote on it and they elected not to do it.

I think it is very important we all keep that in mind. This is significant. It is something we have reviewed over a long period of time. It is something we understand. We have heard the professional testimony. We have attended many meetings. I along with the Presiding Officer, have sat through hours of committee meetings and sub-committee meetings that I have held in my committee on this very subject. I think we understand it and I agree

with the statements of all of those, including the President, Vice President, and the Secretary of State, who I quoted. We need to do it now.

I will be here to object to any unanimous consent that would in some way vitiate the vote that we believe should be imminent next week.

I yield the floor.

Mr. BIDEN. Mr. President I will take 1 minute.

The President doesn’t need any more time; he read it and negotiated it. I don’t need any more time; I spent over 100 hours on that. It is my job on the committee of responsibility. The Senator presiding doesn’t need more time; he spent hundreds of hours. The Senator from Oklahoma doesn’t need more time because he spent hundreds of hours on it. I defy anyone to find five other Members of the Senate who have spent as much time.

Usually what happens is we take on the responsibility to inform our colleagues based on our committees because we have more expertise when assigned the job. When it is tax policy, I don’t know what the Tax Code says on major changes, but I rely upon the committee headed on the Democratic side by my friend from New York to tell me what is in it from spending hundreds of hours going through the detail.

This is a different way to do business. I don’t ever remember Members having voted on a treaty without there being a significant report from the relevant committees on the floor.

The President doesn’t need any more time. I don’t need any more time. Senator BYRD says he needs more time, and I don’t know anybody more conscientious than Senator BYRD. But the reason for more time is there haven’t been any hearings.

I yield the floor.

The PRESIDING OFFICER. The chairman of the Senate Foreign Affairs Committee, the Senator from North Carolina.

Mr. HELMS. Mr. President, I assure my friend from Delaware, the ranking Democrat on the Foreign Affairs Committee, I enjoy hearing him and hearing him and hearing him.

I guess it is sort of similar to what the President said in one of his strong moments not long ago: I guess it depends on what the definition of “is” is.

This afternoon in Canada, President Clinton held a press conference in which he explicitly rejected the offer I made along with a number of other Republican Senators that the Senate would put off a vote on the CTBT if the President requested in writing (a) that the treaty be withdrawn and (b) that it not be considered for the duration of his presidency.

Considering that the President acknowledged he does not have the votes to ratify the treaty, this seemed to many of us a generous offer which the President rejected with a strange rhetorical outburst.

When asked about our offer today, he said:

They want me to give them a letter to cover the political decision they have made that does severe damage to the interest of the United States and the interest of nonproliferation in the world? I don't think so.

The Mr. President further suggested, strangely and absurdly, that the reason we made the offer in the first place was because, as he put it, Republicans are afraid to go though with a vote. He said:

... they want to [kill the treaty] and don't want to get up and defend it before the American people in an election year. . . . [They think] that some letter from me will somehow obscure [that fact] . . .

Mr. President, among those who are urging that the Senate kill this dangerous treaty are: six former Secretaries of Defense, four former National Security Advisors, four former Directors of Central Intelligence, and two former Chairmen of the Joint Chiefs of Staff.

Yet, Mr. Clinton suggests that Republicans are afraid to vote? The fact is, the President and his advisors have done everything possible to discourage a solution.

Let's make it clear so the President can get his confusing rhetoric straightened out: Since he has rejected our offer, I will object, along with many of my Republican colleagues, to any effort to put off next week's vote on the Comprehensive Test Ban Treaty.

This is a dangerous treaty, contrary to the national security interests of the American people. The Senate should go on record as planned: The Senate should vote this treaty down.

Mr. President, may I make an inquiry how much time has expired on each side since this morning when the Senate convened?

The PRESIDING OFFICER. The Chair advises the distinguished chairman of a remarkable coincidence: The opponents have used 204 minutes, the proponents, 208 minutes.

Mr. HELMS. Mr. President, pursuant to the unanimous-consent agreement by the Senate, consideration has begun regarding an arms control treaty that has been the longest-sought, hardest-fought item on the unilateral nuclear disarmament agenda. Strangely, the Clinton administration has used every fanciful reasoning in its attempt to portray the Comprehensive Test Ban Treaty (CTBT) as an agreement long pursued by every administration since President Eisenhower, a claim that is bewilderingly untrue. Even the administration's own negotiator acknowledged that the administration's claims are "hyperbole."

You see, Mr. President, the truth of the matter is that not one administration (prior to the current one) ever proposed a zero-yield, unverifiable, permanent duration test ban. Indeed, as Ambassador Ledogar admitted, even the Clinton administration itself did not want such a treaty initially.

Someone has commented that the CTBT now before the Senate is the clearest case of "parchment worship"

ever seen. It was neither carefully negotiated nor well-thought through. It does not even define exactly what it bans.

Instead, the CTBT is the product of a mad scramble to: (1) Create an arms control "legacy" for the Clinton-Gore administration; or (2) provide an excuse for this administration's lack of any nonproliferation policy; or (3) obscure the fact that this administration presided over the collapse of the single-most significant reduction in nuclear weapons with Russia ever negotiated—the START II Treaty—which would have eliminated all MIRVed ICBMs and the SS-18 missile. (The likelihood is that all three played a major role in the administration's decision to try to ram through this Senate this unwise and dangerous treaty.)

Unfortunately, in the race to fashion a last-minute rickety "legacy", the Clinton administration abandoned longstanding United States policy on nuclear testing and signed up to a "zero yield," unverifiable, permanent duration test ban. As several of us have noted, for a number of reasons relating to verification and U.S. nuclear weapons requirements, this is something to which no other administration ever agreed. For instance, President Eisenhower—who has been repeatedly and mistakenly blamed with authorship of the CTBT—insisted that nuclear tests with a seismic magnitude of less than 4.75 be permitted.

The reason that the United States historically has refused to sign on to a zero yield test ban is that five problems are created by such a prohibition. First, confidence in the safety and the reliability of the weapons stockpile will erode. Second, warheads cannot be "remanufactured" to capitalize upon modern technologies. Third, no further designs or capabilities can be added to the nuclear stockpile. Fourth, critical infrastructure and hardware cannot be thoroughly "hardened" against nuclear weapons effects. Fifth, the U.S. can have no confidence that other countries are abiding by the CTBT because a zero yield ban cannot be verified.

By preventing the United States from testing, the CTBT will erode our ability to discover and fix problems with the nuclear stockpile and to make safety improvements. Confidence that the weapons will perform as needed will erode. Already, leaders of our own nuclear weapons design laboratories have stated that problems with the stockpile have arisen that formerly would have prompted nuclear tests.

Further, several of the weapons are not as safe as they could be. As this chart demonstrates, only one warhead of the nine in the stockpile is equipped with all of the modern surety features available. One weapon—the W62—does not have any safety features at all, and three of the weapons—the W76, W78, and W88—are only equipped with "enhanced detonator safety" measures.

Mr. President, several important safety improvements cannot be made

to these weapons unless subsequent nuclear testing is allowed to ensure that modified devices will function properly with these changes. I will underscore that for Senators. The CTBT will prevent the United States from making critical safety improvements to its warheads. I, for one, agree with the Governor of North Dakota who wrote to me opposing the CTBT stating:

As a governor of a state that hosts a sizable percentage of our nation's nuclear weapons, I have an obligation to the people of North Dakota to ensure that these warheads are as safe and reliable as they can be made. It troubles me that several U.S. warheads do not contain the most modern safety features available, such as fire-resistant pits and insensitive high explosives. Yet these warheads cannot capitalize upon such improvements without nuclear testing.

I hope Senators will understand that the CTBT will gradually undermine the safety of the U.S. deterrent by precluding the incorporation of modern safety features.

Moreover, nuclear testing is essential if the United States is to discover and fix problems with the stockpile. These problems usually are associated with aging. The materials and components of weapons can degrade in unpredictable ways and can cause the weapon to fail. Many weapons believed to be reliable and thoroughly tested nevertheless developed problems which were only discovered, and could only be fixed, through nuclear testing. In fact, one-third of all the weapon designs placed in the stockpile since 1958 have required and received post-deployment nuclear tests to resolve problems.

In three quarters of these cases, the problems were identified and assessed only as a result of nuclear testing, and only could be fixed through testing.

The United States has chosen to remanufacture aging weapons in the enduring stockpile rather than designing and building new ones. This presents problems because many of the materials and processes used in producing the original weapon are no longer available. New materials and processes need to be substituted, but they can only be validated to assure that the remanufactured weapon works as intended through nuclear testing.

Exact replication, especially of older systems, is impossible without testing. In part, this is because documentation has never been sufficiently exact to ensure replication. Nuclear testing is the most important step in product certification; it provides the data for valid certification. As a case in point, the United States attempted to remanufacture both the W52 and W68 warheads on the basis of simulations. However, when actually tested, both weapons had a measured yield well short of what test-experienced weapons designers predicted. This is a lesson that the administration, in supporting the CTBT, seems willing to forget.

The CTBT also will prevent the United States from developing new weapons to counter new technological advances by adversaries. Nuclear testing is essential to such modernization.

Without it, the nuclear triad will become obsolete.

I fail to see the logic behind the argument that the United States has no need to modernize its deterrent if Russia, China, and others are similarly constrained. Such a claim just won't fly; in fact, given the demonstrable inability to verify a total test ban, I am persuaded that such assertions are founded upon the mistaken presumption that nuclear weapons modernization is driven by the evolution of other nuclear deterrents. Historically, this simply has not been the case.

Indeed, nuclear weapons modernization is generally driven either by new mission requirements, or by non-nuclear technological evolution in defensive systems. For instance, during the cold war, advances in air defense and anti-submarine warfare created needs for new weapons. Nuclear testing was needed to create the B83 bomb, a gravity bomb—a “laydown weapon” because it enabled the B-1B to drop its payload, at low altitude and high speed, and thereby escape the resulting explosion.

This weapon was needed in response to advances in air defense capability. For the same reason, the U.S. developed the nuclear air-launched cruise missile, which allows U.S. bombers to fulfill their mission outside of air defense ranges.

Nuclear testing was needed for the Trident II missile's warheads, W76 and W88. Testing was essential to optimize the system, giving the missile, and thus the submarine as well, increased striking range. This was needed in response to advances in anti-submarine warfare. Without the ability to test and modernize, the airmen and sailors aboard our bombers and submarines will be put at increased risk as they try to perform their duties with obsolete technology. Senators should think carefully about the implications of the CTBT, and the risk it poses—not just to the nuclear weapons themselves—but to our servicemen.

Our clear, future need facing the United States is the requirement to develop new or modified warheads to respond to developments in missile defense—particularly in the area of directed energy. It would be impossible to adapt to such developments under a complete test ban.

Further, without the ability to design new weapons, such as a warhead optimized to kill biological plagues or to destroy deeply-buried targets, the U.S. will be unable to respond to serious emerging threats to our security. I could not agree more with one of the former Directors of Lawrence Livermore National Laboratory, Dr. Roger Batzel, who warned that: “A nuclear arsenal which is unable to keep pace with a changing security environment is unlikely, in the long run, to prove much of a deterrent.”

Fourth, the CTBT would make the United States increasingly vulnerable to foreign nuclear programs. Critical

systems such as satellites cannot be hardened and thoroughly protected against electro-magnetic pulse attack without nuclear testing. Computers cannot simulate a nuclear environment. Neither can controlled radiation sources. It takes a nuclear explosion to create the heat and complex interplay of radiation needed to evaluate the resistance of systems to these nuclear effects.

Historically, the United States often has been surprised by how systems which seemingly performed as needed during non-nuclear simulations then failed to function properly in an actual nuclear environment. Indeed, surprises have been found in the vulnerability to nuclear effects of all U.S. strategic nuclear systems except the Minuteman II. The CTBT will allow countries to exploit a growing U.S. vulnerability brought about by an increasing reliance on high-tech weaponry and a decision not to test in order to harden systems.

Finally, a “zero yield” test ban is not verifiable. While the exact thresholds are classified, it is commonly understood that the United States cannot detect nuclear explosions below a few kilotons of yield. Countries are able to resort to a number of techniques, ranging from “unattended detonations” to seismic decoupling, that will enable them to conduct significant nuclear explosions with little chance of being detected.

The proposed verification regime under the CTBT offers scant reassurance in this matter. The seismic detection thresholds of the International Monitoring System are sufficiently high that a large amount of clandestine testing could occur without fear of seismic detection. Moreover, the on-site inspection regime is riddled with loopholes and deficiencies.

The bottom line is that if the Senate were to make the mistake of approving this treaty, the United States would scrupulously adhere to the CTBT, thereby losing confidence in its nuclear deterrent. Other nations, however, most likely would violate the treaty and escape detection, building new weapons to capitalize upon the U.S. deficiencies and vulnerabilities created by the CTBT. For these reasons, I oppose the CTBT and I am gratified that more and more Senators are making clear their opposition to ratification of an unwise, even dangerous, proposal to deprive the American people of the protection they need and deserve.

Mr. President, for just a moment I suggest the absence of a quorum and then I will resume.

The PRESIDING OFFICER. The clerk will call the roll.

The legislative clerk proceeded to call the roll.

Mr. HELMS. Mr. President, I ask unanimous consent that the order for the quorum call be rescinded.

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

Mr. HELMS. I thank the Chair.

Mr. President, I ask unanimous consent that it be in order for me to suggest the absence of a quorum and the time be divided equally from both sides.

The PRESIDING OFFICER. Is there objection?

Without objection, it is so ordered.

Mr. MOYNIHAN addressed the Chair. The PRESIDING OFFICER. The Chair recognizes the senior Senator from New York.

Mr. MOYNIHAN. Mr. President, I rise simply to express the thanks of this Senator to the eminent chairman of the Committee on Foreign Relations for the careful discourse he has presented to us, for the facts, they are complex. No one understands complexity better than he or is more willing to live with it. If we do not come to the same conclusions, it is not for lack of respect and, indeed, a reverence.

Mr. HELMS. Mr. President, I do thank my friend from New York—our friend from New York—whom we will sorely miss before very long.

I thank the Senator and suggest the absence of a quorum.

The PRESIDING OFFICER. Hearing no objection to the unanimous consent request from the Senator from North Carolina, without objection, it is so ordered. The clerk will call the roll.

The bill clerk proceeded to call the roll.

Mr. MURKOWSKI. Mr. President, I ask unanimous consent that the order for the quorum call be rescinded.

The PRESIDING OFFICER (Mr. HELMS). Without objection, it is so ordered.

Mr. MURKOWSKI. Mr. President, the Senate will soon exercise its constitutional duty of “advice and consent” for international treaties. This is a solemn task. And the treaty before us, the Comprehensive Test Ban Treaty or “CTBT,” relates to an issue of utmost importance, the proliferation of nuclear weapons.

As I have evaluated this treaty, I have kept one question first and foremost in my mind: Will ratification of this treaty by the United States serve to protect the national security of the United States? And after careful consideration, my position is that the CTBT weakens the national security of the United States, and I will therefore oppose ratification.

Although I support the lofty goals of the Test Ban Treaty—preventing the spread of nuclear weapons—I think only the good guys will play by the rules. Test ban advocates argue that setting a good example will lead others to play by the rules. The United States has not tested a bomb since 1992, but India and Pakistan went ahead with testing bombs, despite U.S. sanctions and condemnation.

Test Ban advocates also argue that the threat of sanctions will keep countries in line. As my colleagues will recall, North Korea violated the Nuclear Non-Proliferation Treaty—in fact, are still violating the NPT—and the Clinton Administration has rewarded the

DPRK with aid, and more recently, with the removal of sanctions. I suspect the same pattern if rogue nations like North Korea ever ratify the CTBT.

But even more fundamentally, I believe this zero-yield treaty of unlimited duration fundamentally threatens the United States' nuclear deterrent by preventing nuclear testing essential to maintaining the safety and reliability of our nuclear stockpile. Our nuclear weapons are the most sophisticated designs in the world, yet over time, the nuclear materials and high explosives triggers deteriorate, and we lack the experience in predicting the effects of these changes.

According to expert testimony, one-third of all weapons designs introduced into the nuclear weapons stockpile since 1985 have required and received post-deployment nuclear tests to resolve problems. In three-fourths of these cases, the problems were discovered only because of on-going nuclear tests. In each case, the weapons were thought to be reliable and thoroughly tested.

How confident can we be in the reliability of our nuclear stockpile if we are unable to test these weapons to determine the degradation effects of aging? If we cannot be confident in our own weapons' effectiveness, what do you suppose other nations will conclude? The use of nuclear weapons as a deterrent is only effective when other parties believe in their capability as well.

Although the Stockpile Stewardship Program should be pursued, we must remember that the Program is in its infancy. Deciding in 1999 to rely on an untested program that will be operational in 2010 is reckless. In the future, I hope that nuclear tests can be replaced by computer simulations and laboratory-based experiments. But I am not willing to bet my grandchildren's security on it.

In light of hearings this past year before the Energy and Natural Resources Committee on Chinese espionage allegations, I also am not comfortable placing the results of our nuclear testing in the memory banks of the National Labs' computers which are vulnerable to espionage or sabotage.

Finally, I would like to address the problem of verifying other nations' compliance with the Comprehensive Test Ban Treaty. Recent reports from the intelligence community indicate that we are unable to monitor low-level nuclear tests precisely enough to distinguish between a conventional explosion, a low-level nuclear test, or even natural seismic activity. The United States cannot now, and may not in the foreseeable future, be able to confidently detect and identify militarily significant nuclear tests of one kiloton or less. That is roughly 500 times the size of the blast which destroyed the Murrah Building in Oklahoma City.

Twice last month Russia carried out what might have been nuclear explo-

sions at its Novaya Zemlya testing site in the Arctic. It was reported that U.S. surveillance satellites have repeatedly observed the kind of activity that usually precedes and follows a low-level nuclear test. Yet, data from the CIA's seismic sensors and other monitoring equipment were reportedly insufficient to reach a firm conclusion as to the true nature of the explosions. If it is not possible to confirm tests such as these, how are we going to verify that countries such as Russia and China are complying with the Comprehensive Test Ban Treaty?

Mr. President, this Treaty is not in the national interest and I urge my colleagues to reject its ratification.

Mr. LUGAR. Mr. President, the Senate has begun consideration of the Comprehensive Test Ban Treaty. I regret that the Senate is taking up the treaty in an abrupt and truncated manner that is so highly politicized. Admittedly, the CTBT is not a new subject for the Senate. Those of us who over the years have sat on the Foreign Relations, Armed Services, or Intelligence Committees are familiar with it. The Senate has held hearings and briefings on the treaty in the past.

But for a treaty of this complexity and importance a more sustained and focused effort is important. Senators must have a sufficient opportunity to examine the treaty in detail, ask questions of our military and the administration, consider the possible implications, and debate at length in committee and on the floor. Under the current agreement, a process that normally would take many months has been reduced to a few days. Many Senators know little about this treaty. Even for those of us on national security committees, this has been an issue floating on the periphery of our concerns.

Presidential leadership has been almost entirely absent on the issue. Despite having several years to make a case for ratification, the administration has declined to initiate the type of advocacy campaign that should accompany any treaty of this magnitude.

Nevertheless, the Senate has adopted an agreement on procedure. So long as that agreement remains in force, Senators must move forward as best they can to express their views and reach informed conclusions about the treaty.

In anticipation of the general debate, I will state my reasons for opposing ratification of the CTBT.

The goal of the CTBT is to ban all nuclear explosions worldwide: I do not believe it can succeed. I have little confidence that the verification and enforcement provisions will dissuade other nations from nuclear testing. Furthermore, I am concerned about our country's ability to maintain the integrity and safety of our own nuclear arsenal under the conditions of the treaty.

I am a strong advocate of effective and verifiable arms control agreements. As a former Vice-Chairman of

the Senate Arms Control Observer Group and a member of the Foreign Relations Committee, I have had the privilege of managing Senate consideration of many arms control treaties and agreements.

I fought for Senate consent to ratification of the INF Treaty, which banned intermediate range nuclear weapons in Europe; the Conventional Forces in Europe Treaty, which created limits on the number of tanks, helicopters, and armored personnel carriers in Europe; the START I Treaty, which limited the United States and the Soviet Union to 6,500 nuclear weapons; the START II Treaty, which limited the U.S. and the former Soviet Union to 3,500 nuclear weapons; and the Chemical Weapons Convention, which outlawed poison gas.

These treaties, while not ensuring U.S. security, have made us safer. They have greatly reduced the amount of weaponry threatening the United States, provided extensive verification measures, and served as a powerful statement of the intent of the United States to curtail the spread of weapons of mass destruction.

I understand the impulse of the proponents of the CTBT to express U.S. leadership in another area of arms control. Inevitably, arms control treaties are accompanied by idealistic principles that envision a future in which international norms prevail over the threat of conflict between nations. However, while affirming our desire for international peace and stability, the U.S. Senate is charged with the constitutional responsibility of making hard judgments about the likely outcomes of treaties. This requires that we examine the treaties in close detail and calculate the consequences of ratification for the present and the future. Viewed in this context, I cannot support the treaty's ratification.

I do not believe that the CTBT is of the same caliber as the arms control treaties that have come before the Senate in recent decades. Its usefulness to the goal of non-proliferation is highly questionable. Its likely ineffectuality will risk undermining support and confidence in the concept of multi-lateral arms control. Even as a symbolic statement of our desire for a safer world, it is problematic because it would exacerbate risks and uncertainties related to the safety of our nuclear stockpile.

The United States must maintain a reliable nuclear deterrent for the foreseeable future. Although the cold war is over, significant threats to our country still exist. At present our nuclear capability provides a deterrent that is crucial to the safety of the American people and is relied upon as a safety umbrella by most countries around the world. One of the most critical issues under the CTBT would be that of ensuring the safety and reliability of our nuclear weapons stockpile without testing. The safe maintenance and storage of these weapons is a crucial concern. We cannot allow them to fall

into disrepair or permit their safety to be called into question.

The Administration has proposed an ambitious program that would verify the safety and reliability of our weapons through computer modeling and simulations. Unfortunately, the jury is still out on the Stockpile Stewardship Program. The last nine years have seen improvements, but the bottom line is that the Senate is being asked to trust the security of our country to a program that is unproven and unlikely to be fully operational until perhaps 2010. I believe a National Journal article, by James Kitfield, summed it up best by quoting a nuclear scientist who likens the challenge of maintaining the viability of our stockpile without testing to "walking an obstacle course in the dark when your last glimpse of light was a flash of lightning back in 1992."

The most likely problems facing our stockpile are a result of aging. This is a threat because nuclear materials and components degrade in unpredictable ways, in some cases causing weapons to fail. This is compounded by the fact that the U.S. currently has the oldest inventory in the history of our nuclear weapons programs.

Over the last forty years, a large percentage of the weapon designs in our stockpile have required post-deployment tests to resolve problems. Without these tests, not only would the problems have remained undetected, but they also would have gone unrepaired.

The Congressional Research Service reported last year that: "A problem with one warhead type can affect hundreds of thousands of individually deployed warheads; with only 9 types of warheads expected to be in the stockpile in 2000, compared to 30 in 1985, a single problem could affect a large fraction of the U.S. nuclear force." If we are to put our faith in a program other than testing to ensure the safety and reliability of our nuclear deterrent and thus our security, we must have complete faith in its efficacy. The Stockpile Stewardship Program falls well short of that standard.

The United States has chosen to remanufacture our aging stockpile rather than creating and building new weapon designs. This could be a potential problem because many of the components and procedures used in original weapon designs no longer exist. New production procedures need to be developed and substituted for the originals, but we must ensure that the remanufactured weapons will work as designed.

I am concerned further by the fact that some of the weapons in our arsenal are not as safe as we could make them. Of the nine weapon designs currently in our arsenal, only one employs all of the most modern safety and security measures. Our nuclear weapons laboratories are unable to provide the American people with these protections because of the inability of the Stockpile Stewardship Program to completely mimic testing.

At present, I am not convinced the Stockpile Stewardship Program will permit our experts to maintain a credible deterrent in the absence of testing. Without a complete, effective, and proven Stockpile Stewardship program, the CTBT could erode our ability to discover and fix problems with the nuclear stockpile and to make safety improvements.

In fact, the most important debate on this issue may be an honest discussion of whether we should commence limited testing and continue such a program with consistency and certainty.

President Reagan's words "trust but verify" remain an important measuring stick of whether a treaty serves the national security interests of the United States. The U.S. must be confident of its ability to detect cheating among member states. While the exact thresholds are classified, it is commonly understood that the United States cannot detect nuclear explosions below a few kilotons of yield. The Treaty's verification regime, which includes an international monitoring system and on-site inspections, was designed to fill the gaps in our national technical means. Unfortunately, the CTBT's verification regime will not be up to that task even if it is ever fully deployed.

Advances in mining technologies have enabled nations to smother nuclear tests, allowing them to conduct tests with little chance of being detected. Similarly, countries can utilize existing geologic formations to decouple their nuclear tests, thereby dramatically reducing the seismic signal produced and rendering the test undetectable. A recent Washington Post article points out that part of the problem of detecting suspected Russian tests at Novaya Zemlya is that the incidents take place in a large granite cave that has proven effective in muffling tests.

The verification regime is further befooled by the lack of a common definition of a nuclear test. Russia believes hydro-nuclear activities and sub-critical experiments are permitted under the treaty. The U.S. believes sub-critical experiments are permitted but hydro-nuclear tests are not. Other states believe both are illegal. A common understanding or definition of what is and what is not permitted under the treaty has not been established.

Proponents point out that if the U.S. needs additional evidence to detect violations, on-site inspections can be requested. Unfortunately, the CTBT will utilize a red-light inspection process. Requests for on-site inspections must be approved by at least 30 affirmative votes of members of the Treaty's 51-member Executive Council. In other words, if the United States accused another country of carrying out a nuclear test, we could only get an inspection if 29 other nations concurred with our request. In addition, each country can

declare a 50 square kilometer area of its territory as off limits to any inspections that are approved.

The CTBT stands in stark contrast to the Chemical Weapons Convention in the area of verifiability. Whereas the CTBT requires an affirmative vote of the Executive Council for an inspection to be approved, the CWC requires an affirmative vote to stop an inspection from proceeding. Furthermore, the CWC did not exclude large tracts of land from the inspection regime, as does the CTBT.

The CTBT's verification regime seems to be the embodiment of everything the United States has been fighting against in the UNSCOM inspection process in Iraq. We have rejected Iraq's position of choosing and approving the national origin of inspectors. In addition, the 50 square kilometer inspection-free zones could become analogous to the controversy over the inspections of Iraqi presidential palaces. The UNSCOM experience is one that is best not repeated under a CTBT.

Let me turn to some enforcement concerns. Even if the United States were successful in utilizing the laborious verification regime and non-compliance was detected, the Treaty is almost powerless to respond. This treaty simply has no teeth. Arms control advocates need to reflect on the possible damage to the concept of arms control if we embrace a treaty that comes to be perceived as ineffectual. Arms control based only on a symbolic purpose can breed cynicism in the process and undercut for more substantive and proven arms control measures.

The CTBT's answer to illegal testing is the possible implementation of sanctions. It is clear that this will not prove particularly compelling in the decision-making processes of foreign states intent on building nuclear weapons. For those countries seeking nuclear weapons, the perceived benefits in international stature and deterrence generally far outweigh the concern about sanctions that could be brought to bear by the international community.

Further, recent experience has demonstrated that enforcing effective multilateral sanctions against a country is extraordinarily difficult. Currently, the United States is struggling to maintain multilateral sanctions on Iraq, a country that openly seeks weapons of mass destruction and blatantly invaded and looted a neighboring nation, among other transgressions. If it is difficult to maintain the international will behind sanctions on an outlaw nation, how would we enforce sanctions against more responsible nations of greater commercial importance like India and Pakistan?

In particularly grave cases, the CTBT Executive Council can bring the issue to the attention of the United Nations. Unfortunately, this too would most likely prove ineffective, given that permanent members of the Security Council could veto any efforts to punish

CTBT violators. Chances of a better result in the General Assembly are remote at best.

I believe the enforcement mechanisms of the CTBT provide little reason for countries to forego nuclear testing. Some of my friends respond to this charge by pointing out that even if the enforcement provisions of the treaty are ineffective, the treaty will impose new international norms for behavior. In this case, we have observed that "norms" have not been persuasive for North Korea, Iraq, Iran, India, and Pakistan, the very countries whose actions we seek to influence through a CTBT.

If a country breaks the international norm embodied in the CTBT, that country has already broken the norm associated with the Non-Proliferation Treaty (NPT). Countries other than the recognized nuclear powers who attempt to test a weapon must first manufacture or obtain a weapon, which would constitute a violation of the NPT. I fail to see how an additional norm will deter a motivated nation from developing nuclear weapons after violating the longstanding norm of the NPT.

On Tuesday the Senate is scheduled to vote on the ratification of the CTBT. If this vote takes place, I believe the treaty should be defeated. The Administration has failed to make a case on why this treaty is in our national security interests.

The Senate is being asked to rely on an unfinished and unproven Stockpile Stewardship Program. This program might meet our needs in the future, but as yet, it is not close to doing so. The treaty is flawed with an ineffective verification regime and a practically nonexistent enforcement process.

For these reasons, I will vote against ratification of the CTBT.

Mr. DASCHLE. Mr. President, today the Senate formally begins consideration of whether to ratify the Comprehensive Nuclear Test Ban Treaty, CTBT. Each party to this treaty pledges not to carry out any nuclear weapons tests and to refrain from helping others to carry out such tests. CTBT has been signed by over 150 nations, 51 of which have already ratified the treaty. The question before the Senate now is whether we should join this group in an international effort to limit the spread of nuclear weapons.

Although I will have more extensive remarks on the substance of the treaty shortly before the Senate votes, I would like to say a few words now about why I believe the Senate should ratify this important treaty. As in the case of previous arms control agreements, each Senator must ask himself or herself the following series of questions: Is U.S. national security enhanced by Senate ratification of the CTBT? Is this nation better off with the CTBT? Will Senate ratification of CTBT lead to a safer world for our children?

In my view Mr. President, the answer to each of these questions is an un-

equivocal, unqualified yes for one simple, straightforward reason: a world with fewer countries possessing nuclear weapons is a safer, more secure world for our national security interests, our nation and our children. Senate ratification of CTBT will help us achieve just such a world.

Opponents of the treaty raise two issues: can we verify that other nations are complying with the treaty and would U.S. compliance with the treaty permit this nation to maintain a safe and reliable nuclear deterrent? On the first issue, opponents assert that it is impossible to verify a prohibition of all nuclear tests. Mr. President, let me state now that they are absolutely correct on that point. The intelligence community has confirmed that neither the United States nor the International Monitoring System that would be established under CTBT would ensure the detection of every single nuclear explosion, regardless of size and location.

However, this feature is not unique to CTBT. No arms control treaty is 100 percent verifiable. In just the last two decades, the Senate has ratified numerous treaties knowing full well at the time that it would be possible for a country to successfully skirt one provision or another for some period of time or another. The standard for the Senate on previous treaties and the standard we should apply to this treaty is "effective" verification. In the case of CTBT, effective verification means we will be able to detect, with a high degree of confidence, any tests that could undermine our nuclear deterrent. After examining the information and analysis provided by our intelligence community, our senior military leaders have testified that we can effectively verify this treaty.

Furthermore, with or without CTBT, we need to monitor the nuclear testing activities of other countries and will face the exact same problems people are assigning exclusively to CTBT—with one major difference. In a world of CTBT, the United States would have additional tools at its disposal to determine what has happened. The treaty would permit us to have access to data collected at any of the 321 monitoring sites established as part of the CTBT's International Monitoring System. Under the treaty, we will also be able to conduct on-site inspections of facilities when we suspect questionable activity has occurred. These are resources available to us only if we ratify CTBT.

As for the safety and reliability of our existing nuclear weapons, I am convinced that the science-based stockpile stewardship program will permit us to preserve our nuclear deterrent without testing. I acknowledge up front that this program, for which we are spending \$4.5 billion annually, is still evolving and it will be a few more years before we will know for certain its effectiveness. However, critics must also acknowledge three other facts.

First, our nuclear weapons are safe and reliable today and are likely to remain so for another decade—with or without a stockpile program. Second, although not fully up and running, the stockpile stewardship program has already demonstrated its viability. Although we stopped testing nuclear weapons seven years ago, for the past four years the Department of Energy has been able to certify that our nuclear stockpile is safe and reliable. In order to make this certification, the Department has relied in part on data generated by the early phases of the stockpile stewardship program. Third, the President submitted, and I strongly support, a condition to the treaty that would permit the United States to withdraw from the treaty and resume nuclear testing if we have anything other than the highest confidence in the safety and reliability of our nuclear weapons.

Having said all of this, I would like to raise another important issue today. Regardless of where members stand on the merits of the CTBT, I think there are two things every member of this body should agree upon. The process of treaty ratification is one of the most important responsibilities our founding fathers vested in the United States Senate. In the course of this nation's history, the Senate has never taken this responsibility lightly. It would be a mistake to do so now. Second, it is hard to imagine a treaty with more significant ramifications for our national security for decades to come than the treaty before the Senate today. In the few brief days that this issue has been before us, I have heard senior Senators, members who have cast thousands of votes, state that their vote on CTBT could well be one of the most consequential of their Senate careers. I agree with that assessment.

Unfortunately, we are on the verge of ignoring these two truths. For some unknown reason, the CTBT has become a political football in a high stakes, highly partisan debate. It appears that some are seeking to score political points instead of carefully weighing this nation's national security interests and our role and responsibilities in the world. If politics should stop at the waters' edge, so too should it stop at the door to this chamber when we are deliberating treaties with such tremendous national and international ramifications.

Instead, after over 2 years of inaction, the Senate now finds itself locked in a sprint to a vote that is equally unfair to both the opponents and proponents of this treaty. No member of this body can truly believe he or she has all the information needed to render such a momentous decision. No member can truly state that the Senate has lived up to the founding fathers' expectations of how this chamber should conduct itself when giving its advice and consent on treaties. No member can really assert with a clear conscience that this was a fair and thorough process for dealing with any issue, let alone one of this magnitude.

Proceeding before we have given full airing to the numerous and complex issues surrounding the CTBT is unfair to the Senate, unfair to our national security and unfair to the American people. Before we begin the calling of the roll asking where we stand on this treaty, we should all take a step back and give ourselves time to study these issues. For the good of our nation's security and Americans for generations to come, I ask members on both sides of the aisle to join me in this effort.

#### LEGISLATIVE SESSION

Mr. WARNER. Mr. President, I ask unanimous consent that the Senate resume legislative session.

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

#### AGRICULTURE, RURAL DEVELOPMENT, FOOD AND DRUG ADMINISTRATION, AND RELATED AGENCIES APPROPRIATIONS ACT, 2000—CONFERENCE REPORT

Mr. WARNER. I ask the Chair to report the pending business.

The PRESIDING OFFICER. The clerk will report.

The legislative clerk read as follows:

A conference report to accompany H.R. 1906, making appropriations for Agriculture, Rural Development, Food and Drug Administration, and Related Agencies for the fiscal year ending September 30, 2000, and for other purposes.

The Senate resumed consideration of the conference report.

#### CLOTURE MOTION

Mr. WARNER. Mr. President, I send a cloture motion to the desk.

The PRESIDING OFFICER. The cloture motion having been presented under rule XXII, the Chair directs the clerk to read the motion.

The legislative clerk read as follows:

#### CLOTURE MOTION

We the undersigned Senators, in accordance with the provisions of rule XXII of the Standing Rules of the Senate, do hereby move to bring to a close debate on the conference report to accompany H.R. 1906, the Agriculture appropriations bill.

Trent Lott, Thad Cochran, Tim Hutchinson, Conrad Burns, Christopher Bond, Ben Lighthorse Campbell, Robert F. Bennett, Craig Thomas, Pat Roberts, Paul Coverdell, Larry E. Craig, Michael B. Enzi, Mike Crapo, Frank Murkowski, Don Nickles, and Pete Domenici.

#### MORNING BUSINESS

Mr. WARNER. Mr. President, I ask unanimous consent that the Senate proceed to a period of morning business, with Senators permitted to speak for up to 10 minutes each, with the exception of the distinguished Senator from West Virginia, who will take such time as he may require to deliver a very important address to the Senate.

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

#### KEEPING ALCOHOL OFF CAMPUS AND ON THE SHELF

Mr. BYRD. Mr. President, over the years, the culture of college has gradually changed from one of academics and concentrated study to one consumed with partying. Gathering at the library with classmates to prepare for an exam has taken a back seat to sitting around swilling beers at keg parties or ordering a round of shots at the closest bar.

Sadly, the process does not always begin in college. Often times, experimentation with alcohol begins in high school, or even earlier. Large numbers of young people are drinking. According to the 1998 Monitoring the Future Study conducted by the University of Michigan, approximately thirty-three percent of high school seniors, twenty-one percent of tenth graders, and eight percent of eighth graders reported being drunk at least once in a given month. Yes, Mr. President, drunk.

With such startling statistics at the pre-college level, it has become increasingly important for institutions of higher education to take an even more active role in informing and educating highly impressionable, yet extremely vulnerable, college freshmen about the many dangers of this practice. Last year, I added a provision to the Higher Education Act Amendments of 1998 to establish a National Recognition Awards program to identify a select number of colleges and universities with innovative and effective alcohol and drug prevention programs in place on campus. Under the program, each award recipient receives a grant ranging from \$40,000 to \$75,000 to assist in the continuation of its important efforts. I am pleased that I was able to obtain \$850,000 in the Senate's Fiscal Year 2000 Departments of Labor, Health and Human Services, Education, and Related Agencies Appropriations bill to continue funding for this important initiative.

The U.S. Department of Education has recently named seven colleges and universities as recipients of this first-ever grant award. Mr. President, it is encouraging to know that institutions of higher education from all corners of the country are taking aim at the problem of alcohol abuse among our nation's youth through new and creative approaches.

The six recipients of this award include Bowling Green State University at Bowling Green, Ohio; Hobart and William Smith College at Geneva, New York; the University of Arizona at Tucson, Arizona; Pennsylvania State University at University Park, Pennsylvania; the University of Northern Colorado at Greeley, Colorado; the University of Missouri at Columbia, Missouri; and Utah State University at Logan, Utah. The Bowling Green State University Peer-Based Misperception program, for example, is designed to change attitudes, behaviors, and the campus social environment with an emphasis on first-year students, mem-

bers of Greek fraternal organizations, and athletes. This program incorporates small group survey research to uncover and dispel misperceptions among peer groups such as a sorority, fraternity, athletic team, or members of a residence hall. Award funds will be used to continue the program, to implement it at other institutions, and to reduce the overall binge drinking rate.

Pennsylvania State University has been recognized for its alcohol-free "HUB Late Night" program, a model alternative activity program offering students multiple forms of free entertainment as a means of curbing high-risk drinking. The goals of the program involve delivering quality entertainment, providing a variety of alcohol-free programs for a diverse student body, encouraging student involvement in designing and implementing programs, and increasing awareness of the program. Approximately 71 percent of participants reported that participation in this program resulted in less drinking for themselves and for other students.

I am pleased that a higher education institution in my state, West Virginia University (WVU), has adopted an approach similar to that at Pennsylvania State University in addressing alcohol abuse among students. West Virginia University recently created the WVUp All Night program which each Thursday, Friday, and Saturday night offers students concerts, games, movies, free food, and study rooms as attractive alternatives to bars and nightclubs. According to WVU President David Hardesty, the program has been a great success from the start, attracting an average of 4,000 students each Thursday, Friday, and Saturday night.

While this grant program will certainly serve these seven schools well in providing them with the means to administer and expand their prevention programs, it is my true hope that this grant program will span far beyond dollars and cents. Soon, the Department of Education will be producing a publication highlighting these model programs, and will make this document available to high school counselors throughout the nation. When thinking about college, it is important for students and parents alike to be informed about good alcohol and drug prevention programs. This document will serve as an important tool in helping students and their parents to make even wiser decisions about where to pursue their college education.

Moreover, the grant recipients of this year's award ought to serve as models to all higher education institutions throughout the country. Each August, many schools face the formidable challenge of determining how best to address the use and abuse of alcohol by underage students. With these model schools, new information will be available to schools still grappling with alcohol abuse problems. I encourage all Senators to pass along this information to institutions of higher education in their respective states.