Public Hearing

before

SENATE ENVIRONMENT COMMITTEE

"Testimony from invited individuals and the public on beach erosion and fisheries management issues; representatives from the New Jersey Department of Environmental Protection, the United States Army Corps of Engineers, local governments, academic institutions, and the fishing industry have been invited"

LOCATION: LMH Room
Dover Township Municipal Building

DATE: August 4, 2006
1:00 p.m.

Toms River, New Jersey

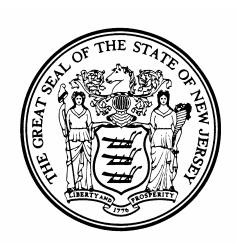
MEMBERS OF COMMITTEE PRESENT:

Senator Bob Smith, Chair Senator Andrew R. Ciesla

ALSO PRESENT:

Assemblyman David W. Wolfe

Judith L. Horowitz Lucinda Tiajoloff Office of Legislative Services Committee Aides Brian Alpert Senate Republican Committee Aide



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lb: 1-75 rs: 76-128 SENATOR BOB SMITH (Chair): Our meeting today -- the New Jersey Senate Environment Committee -- to take testimony on beach replenishment issues and on the status of our fisheries management here in New Jersey. A record of today's proceedings is being taken so that we can share all this information with the other members of the Senate and Assembly. So what you say today will provide information to a lot of people.

We're blessed to be in Dover Township, one of the most beautiful places in New Jersey, and Mayor Paul Brush, who is the leader of this community, would like to welcome us and get a few words in.

Mayor, if you would come forward.

MAYOR PAUL BRUSH: Is this on? (referring to PA microphone)

SENATOR SMITH: That's just for recording purposes, Mayor. That goes into the transcript. So, I guess, you just have to speak up, unless you want to come up and speak here from the dais?

MAYOR BRUSH: Actually, I can use this microphone here.

SENATOR SMITH: Great.

MAYOR BRUSH: Can you hear me now?

SENATOR SMITH: Yes.

MAYOR BRUSH: Sounds like I've heard that line before. (laughter)

Thank you, Senator.

I want to welcome the senators and the staff of the Senate Environmental Committee to come into Dover Township and discuss an issue which is really uppermost on our minds here, because of the tremendous hurricanes and nor'easters we have. Senator Ciesla, being a resident of Brick, knows that the nor'easters are oftentimes more damaging than hurricanes are here in the northern Ocean County, Jersey shore. And so this is a very, very serious problem, and we really need help. We need help from the State, we need help from the Federal Government.

I appreciate, Senators -- and Assemblyman Wolfe, welcome to Dover Township, as usual. I appreciate your coming here, listening to the officials and the public. And what I would say is probably what you're going to hear from a lot of others: Without help from the Federal Government, we're probably in trouble. Because there's so much money involved with this, and the need for the Army Corps to do this work. We had the regional coordinator -- whatever his title is -- Steve Kemp, from the EPI, a member of the Ocean County Mayors Association a couple of months ago, and gave us a nice update on what Homeland Security is doing in this area and everything. The point was made that the dunes and the beach provide the first line of protection in the event of storms or whatever to those residents on the barrier island. And we also have to be -- look, we're politicians, too. We have to be mindful of the fact that the residents of the barrier island pay a tremendous amount of money in property taxes which benefit the entire community. And as you know, tourism is such an important part of our economy here in New Jersey, and particularly here at the Jersey shore. So the need for beach renourishment, which to my understanding has not been done in decades in this part of Ocean County -the need is more than just so that people go to the beach. And our beach is so completely dissolved. But it's also a protection of our residents. The maintenance of -- or creation and maintenance of dunes, done

professionally by the Army Corps to -- so that there will be a long-lasting protection and natural renourishment of the beaches, shoring up -- no pun intended -- our tourism economy. And frankly, we can't afford it. The Federal Government has to help us. I know the State will help us. I understand the Realty and Transfer Tax generates about \$25 billion a year, but, of course, that's not all dedicated to the Jersey shore. That goes to all the causes. So perhaps the State needs to look at other sources of revenue.

One other point I want to make is, I want to commend Mayor Bill Dunbar of Mantoloking for organizing a task force of mayors, and county officials, and council members, and so on in the nine or so contiguous municipalities of northern Ocean County -- from Manasquan Inlet down to Barnegat Inlet -- in getting this into the papers and raising the public's awareness of it. I know that the Senate Environmental Committee is very conscious of this and very interested in this.

And once again, I'm very grateful that you can come here to Ocean County, particularly Dover Township and Toms River, I should say, to hold this meeting.

Thank you, Senator.

SENATOR SMITH: Thank you, Mayor, for your kind welcome. And you beat me a little bit to the punch. We're blessed today having Senator Ciesla, Andrew Ciesla, who represents this district and serves on the Senate Environment Committee with us; and also, Assemblyman David Wolfe, who represents this district as well -- and who are thoroughly familiar with shore issues. But it's a pleasure to have them with us.

And that being said, so that there's a logical presentation for the people who are going to read the transcript, we're going to do beach replenishment issues first, and then we're going to do fisheries second.

So I'd like to start with Dr. Tom Herrington from the Stevens Institute of Technology, to be followed by the U.S. Army Corps of Engineers, to be followed by DEP. And that's the order in which, I believe, that the three groups have asked to put forward information for our consideration.

Mr. Herrington. You are with the Stevens Institute of Technology, sir?

THOMAS O. HERRINGTON, Ph.D.: No. I am just -- with the Army Corps.

SENATOR SMITH: Okay. Go ahead.

DR. HERRINGTON: Okay. Is this on? (referring to PA microphone)

SENATOR SMITH: Yes, but that's for recording purposes.

DR. HERRINGTON: Okay.

SENATOR SMITH: That means you really have to speak up so everybody can hear you.

DR. HERRINGTON: Okay, I will.

Senators Smith--

UNIDENTIFIED PERSON FROM AUDIENCE: Can't hear.

SENATOR SMITH: Yes, there is a hearing problem.

DR. HERRINGTON: Okay.

SENATOR SMITH: Is there anyway to get a microphone-- Or you know, the other alternative -- come on up here. We'll have every speaker speak at the dais.

MAYOR BRUSH: I'm sorry. I thought those mikes were also part of our microphone system.

SENATOR SMITH: No. We need another one over there. Do we have one that works on the table there?

Hold on one second?

DR. HERRINGTON: Sure.

SENATOR SMITH: Give that a try.

DR. HERRINGTON: Okay? Everybody can hear me?

SENATOR SMITH: Terrific, terrific.

DR. HERRINGTON: Okay.

First, I'd like to say, Professor Michael Bruno, who was originally invited, is unable to make it and he thanks you for that opportunity to speak to the Committee and sends his regrets.

Senator Smith, Senator Ciesla, Assemblyman Wolfe, thank you for the opportunity to provide input to the Committee's deliberations regarding an issue of critical importance to New Jersey, namely the impact of long-term beach erosion on the future vulnerability of the state's coastal communities, to catastrophic damage to private and public property, the potential loss of life, and irreplaceable damage to our natural coastal resources.

It has long been recognized by coastal researchers that New Jersey has no known natural sources of sediment to offset the offshore losses of sand due to episodic storm events. The lack of sediment supply

makes the proper management of our limited coastal resources imperative. Of the many shoreline stabilization alternatives available, beach nourishment has been shown to be the most cost-effective method of sustaining the state's coastline, with the added benefit of restoring lost coastal resources. I would like to take the next couple of minutes to elaborate on the importance of effective shoreline management through the existing New Jersey beach nourishment program.

Within the past six decades, the New Jersey coast has been impacted by three catastrophic coastal storm events: The hurricane of 1944, the March '62 nor'easter, and the December 1992 storm. Each of these storms generated extremely large storm surges, completely eroded the beach and dunes, and generated millions of dollars in public and private property damage.

The 1944 and '62 events additionally resulted in the loss of life and the destruction of 100 homes. I have provided the Committee with more detailed information about these events in my written testimony, but for brevity I'll move onto some more important points.

One common characteristic of the three severe coastal storm events in the last six decades is the breaching and the loss of the coastal dune system. This process occurs very quickly once the waves reach the seaward toe of the dune. The dune is typically the highest land elevation along our barrier coast. And once this last line of defense is breached, the water quickly runs downhill across the islands, generating significant damage due to the velocity of the flood waters.

As you know, after the December 1992 Nor'easter, the New Jersey Legislature, recognizing the economic and societal importance of the

shore, acted quickly to establish a stable shore protection fund for use in pursuing the restoration and stabilization of the New Jersey coast. The majority of the fund is earmarked as matching dollars for long-awaited Federal shore protection projects designed to reconstruct the lost shoreline through beach nourishment. Three percent of the annual funds are allocated to the New Jersey Coastal Protection Technical Assistance Service created by the same legislation and located at Stevens Institute of Technology. Created to both inform and counsel citizens and government officials on the advances in shore protection technologies, the Technical Assistance Service has evaluated over 20 innovative shore protection structures and methods since 1993.

I should also mention that the response to the Technical Services activities has been so positive that Stevens has partnered with the New Jersey Marine Sciences Consortium's Sea Grant Program, in 2000, to create a cooperative extension program to provide our citizens with additional outreach and education on all aspects of coastal science, engineering, and policy. In addition to the technologies evaluated, the service actively evaluates the performance of the seven existing Federal beach nourishment projects located in New Jersey. And most recently, we have been analyzing the use of artificial surfing reefs as a method to stabilize renourished beaches while enhancing lost recreational opportunities.

The vast majority of the innovative technologies evaluated are designed to extend the longevity of beach nourishment projects in an effort to make them more cost-effective. This mirrors the evolution of thinking among coastal scientists and the 1995 position taken by the National

Research Council that beach nourishment is the only engineered shore protection method that directly addresses the lack of sand along the beach.

After 1993, the State decided to pursue such a long-term program of beach nourishment in partnership with the Federal Government in an effort to manage the state's eroding shoreline. By adding sand from sources outside the eroding system, a wider beach is created that improves the natural protection, while also restoring lost environmental resources. The wider beach acts as a sacrificial protection for the back beach dunes, eroding as it would naturally during severe storms, but at the same time preventing the undermining and breaching of the critical dune system. As indicated by our knowledge of the impacts of past coastal storms, the protection of the dune system is imperative to reduce the exposure of our coastal communities to damage from the high-velocity floodwaters of a storm surge.

The wider beaches created by nourishment do not try to stop natural forces, but rather mimic nature by efficiently absorbing the incident wave energy during a storm. Field studies in Florida have shown that structural damage is reduced significantly on wider beaches when compared to beaches protected with alternate methods, and that an incrementally wider beach results in a exponential reduction in the damage to the built environment. Additional studies in North Carolina have shown that during Hurricanes Fran in 1996, and Dennis and Floyd in 1998, that over 1,200 structures were destroyed or threatened on unnourished beaches, while not one structure within the limits of a large, federally-sponsored beach nourishment project were threatened by erosion. These studies and others

have repeatedly proven the value of beach nourishment projects at reducing storm damage, versus other alternatives.

Beach nourishment, however, does not address the underlying cause of beach erosion. The nourished beach will erode at the same rate as the native beach, reducing the protected value of the beach over time. In order to maintain a minimum level of prevention, it is imperative that sustained beach renourishment and a management program be maintained throughout the desired life of the project. Neglecting the proper management of our coastal protection projects will result in potentially dangerous conditions in the future, just as neglecting the maintenance of a bridge or a highway will result in hazardous driving conditions in the future.

It is also imperative that we construct and maintain a mature and sufficient back-beach dune line along our coast to provide that last line of defense against severe coastal storm surges. Post-storm surveys from Florida and North Carolina again suggest that a stable, vegetated dune with a minimum frontal area of 1,100 square feet per foot above the 100-year flood level is necessary to provide ample protection against breaching during severe coastal storms. Without a sufficient dune system, the sacrificial beach fills along our coast may completely erode during an event and expose our coastal communities to potential damage. Although the importance of dunes is quite obvious from our past history, few communities have established sufficient dunes even in light of the damage caused in 1944 and 1962.

I would like to now briefly discuss some of the environmental, recreational, and safety impacts of beach nourishment that have recently garnered much attention in the media. As a scientific community, we are

still refining the design and maintenance of beach restoration and preservation projects. This is, in part, due to the relatively recent construction of large-scale beach restoration projects in New Jersey and, in part, due to the advances in our ability to measure the physical processes that affect beaches and how the beach responds to those processes. Perhaps the major contributor to this increased understanding is our ability to measure and forecast local coastal weather, wave, and beach conditions through new real-time observing systems like the Stevens New Jersey Coastal Monitoring Network, which was initiated through funding from the Stevens is leading this effort in coastal ocean Legislature in 1996. measurement and forecasting, along with our partners at Rutgers University, Stockton College, and Monmouth University. New Jersey citizens should be proud of the fact that our State is now viewed as a national leader in the field of coastal science and management.

Two concerns have often been raised regarding the potential negative impacts of beach nourishment on the environment, namely the increase in turbidity and the burial of coastal organisms and habitat during the construction of the beach. Numerous scientific studies conducted within the last 10 years, including an 8-year study funded by the New York District of the Army Corps of Engineers on the environmental impacts of the Monmouth County beach restoration project, have concluded that turbidity impacts are confined to fish activity during fill placement, and that the populations of organisms impacted by burial tend to fully recover within one to two years.

One must recognize that beaches naturally transition through periods of extreme erosion and accretion in which the location and elevation of the beach can change significantly in a relatively short period of time. Organisms that inhabit this coastline are uniquely adapted to survive such conditions. Additionally, repetitive cross-shore surveys of restored beaches by the Coastal Research Center at Stockton College have shown that the bar-berm features of our natural beaches are recreated within six to 12 months, indicating that the features of the near-shore habitat recover within one season. It should also be noted that many organisms that inhabit the dry beach benefit from the restored width of the beach during the restoration projects. Locally, research funded through the New Jersey Marine Sciences Consortium has found that the piping plover and the horseshoe crab are two species that greatly benefit from beach nourishment in New Jersey.

In almost all instances, the impact of beach nourishment on recreational opportunities and swimmer safety is likewise limited in duration. As the natural beach profile and offshore sandbars are reestablished by wave action, the surf zone characteristics return to their preconstruction form, limiting the impact of the project on surfing, body surfing, boogie boarding, and swimming. As the beach transitions from its construction profile to a natural beach profile, steeper beach slopes may form and waves breaking close to the shoreline can create hazardous conditions. However, to my knowledge, these conditions have never resulted in an increased frequency of bather injuries in New Jersey, nor has there been a call for the analysis of such conditions from public officials or our citizens. The greatest negative impact of beach restoration projects appears to be the loss of rock habitat and the associated surf fishing and

scuba diving opportunities, due to the burial of near-shore wrecks, groins, and jetties.

In summary, we know from the historic record that severe coastal storms have impacted New Jersey in the past, resulting in the breaching of the dunes, loss of life, and catastrophic damage to private and public property. Studies conducted by the Heinz Foundation indicate that complete economic and societal recovery from such events can take anywhere from a few years to decades. To mitigate the potential damage and loss of life from coastal storms, we must be diligent in our effort to construct and maintain sound, cost-effective shore protection projects. Beach nourishment and coastal dune construction has proven to be an environmentally sound and effective means by which to stabilize our eroding beaches, recreate lost coastal resources, sustain our coastal tourism economy, and provide protection to our coastal communities from natural disasters.

I commend the foresight of the members of this Committee and others in the Legislature for choosing beach nourishment as the primary shore protection effort in the State of New Jersey, and I urge you to continue your efforts towards restoring, maintaining, and protecting all of New Jersey's beaches in the future.

Thank you very much.

SENATOR SMITH: Thank you, Dr. Herrington.

I'm going to ask, with future witnesses -- and you have just become our poster child -- you did a terrific, four-page statement which contains this wonderful information, which we're going to attach to the transcript. But especially when you have a written presentation, I would try

to summarize. We have a little over 30 people who would like to testify, and it's a Friday afternoon. I don't want anybody to get tired and leave because they didn't get a chance to speak. So I'm going to ask everybody to try and summarize it, within five minutes, if you can.

Doctor, thank you for that wonderful information.

Our second group of speakers on beach issues is the U.S. Army Corps of Engineers. I believe that's Mr. Ed Voigt. Is that right? Yes, sir.

E D V O I G T: Senator Smith, Senator Ceisla, other members of the Committee, good afternoon. My name is Ed Voigt, and I am the Chief of Public and Legislative Affairs for the Philadelphia District, U.S. Army Corps of Engineers. On behalf of our district commander, Lieutenant Colonel Gwen Baker, who could not be here today, I would like to thank you for the invitation to present testimony at this hearing.

The Philadelphia District plays a critical role in addressing shoreline erosion along the Atlantic coast of New Jersey. We identify problems, gather data, complete analyses, and make recommendations in the Federal interest. Upon congressional authorization, appropriation of funds, and execution of cost-sharing agreements with the New Jersey Department of Environmental Protection, we then construct projects along the Jersey shore to reduce potential storm damages and also combat erosion.

For virtually every linear foot of shoreline within our district boundaries from Manasquan Inlet to Cape May Point, there's a project under study, in design or waiting construction, being constructed, or finished initial construction and awaiting periodic renourishment. Mostly, beach filled dune systems all are built to protect New Jersey's vast coastal infrastructure. At the direction of Congress, we carry out projects that are technically, economically, and environmentally sound.

At this point, I would like to introduce Jeff Gebert, Chief of the Philadelphia District's Coastal Planning Section, who will get into some specific details of our coastal program in New Jersey.

JEFF GEBERT: How does that work? All right?

SENATOR SMITH: It seems to.

MR. GEBERT: All right.

This was geared towards 10 to 15 minutes, and I will be happy to accelerate it to five minutes to accommodate you. So I'm Chief of the Coastal Planning Section in the Philadelphia District. We have jurisdiction for the Delaware River Basin. And of course, one of the most important parts of what we do is the coast of New Jersey. If anybody is actually interested in this information, we can make it available on our Web site so that it isn't necessary to take notes. And copies of these slides are with the court reporter.

There's three principal areas we're involved with on the coast: The oldest mission we have is navigation, which is keeping coastal inlets open; shore protection is the second, and the subject of today's meeting; and of course, more recently, we've been involved with ecosystem restoration.

I want to do three things today in five minutes. One is to give you an idea of where New Jersey is with respect to the nation in terms of shore protection. I think you'll see, as Tom alluded to earlier and you'll probably hear later, New Jersey is a national leader in shore protection. I have colleagues across the country in other core districts. The program in

New Jersey is the envy of other coastal states and districts in the country. I'll give you a very brief recap of the history of shore protection and how it's been applied and developed in New Jersey, and go over the status on a couple of our projects.

(begins PowerPoint demonstration)

There's our great country, and we occupy a very small part of it. This is a very telling statistic. New Jersey has less than 3 percent of the nation's ocean and gulf coastline. We have a 125-mile ocean coast out of 4,800, and that excludes Alaska and Hawaii. In the United States, there are a total of about 300 miles of shoreline on the Atlantic, Gulf, and Pacific coasts that are protected as joint state and Federal shore protection projects.

Right now, in 2006, New Jersey actually has 51 of those 300 miles of protected shoreline. And sometime within, conceivably, the next decade or so -- you'll notice I have 20-something -- the remaining-- There's about 42 miles that are presently developed and are not part of existing protection. For the last eight, 10 years, especially prior to the hurricane seasons of '04 and '05 in the Gulf of Mexico, New Jersey has consistently been the leading state in the country -- not Florida, not North Carolina, not California, not New York -- in terms in the amount of Federal dollars that your -- our -- I'm a New Jersey resident -- that our congressional representatives have been able to get for shore protection.

SENATOR SMITH: Jeff, what's the number that's up there for New Jersey?

MR. GEBERT: That is a total over eight years. That's \$180 million.

SENATOR SMITH: Thank you.

MR. GEBERT: The second highest number is 157 for Florida. Of course, events in the Gulf have made things in the last two years -- the Gulf of Mexico, because of hurricanes in Florida, Louisiana, and Mississippi -- skew that, but that's an emergency situation.

Here's a statistic that drives a lot of what has happened in the 20th century and continues to drive the New Jersey coastal protection program. I've drawn a line there -- the red line that extends from Sandy Hook to Cape May, New Jersey's ocean coast. I've also got the counties that lie within 100 miles of the New Jersey coast. One out of eight people in the entire country live inside that zone -- 35 million people. So there's a big demographic demand. The rest of the country -- as the other seven out of eight people -- one out of eight live inside that zone, a day's drive from the New Jersey shore.

Historically, the numbers are different, but the percentages are similar. The New York, New Jersey, Philadelphia, D.C. corridor has historically been the first place that was developed and remains the most densely developed. Our program would not exist -- New Jersey would not have the status it does if it weren't for the fact that our non-Federal sponsor, New Jersey DEP -- that we work with every day-- And, of course, the fact that the New Jersey Legislature has taken it into advisement to support the New Jersey Shore Protection Program with an annual appropriation. Only one other state in the country has that situation, Florida.

Very quickly, this is -- on the right here, you see 25 million that the New Jersey Legislature presently provides. The cost-sharing formula for shore protection projects says that if the Federal Government can provide 65 percent of the funding of a cost of a project, the non-Federal interest -the combination of the state and local -- must come up with the other 35.
The present cost-sharing formula the State uses means that the State has to
come up with about 26 percent of the project costs, and 9 percent at the
municipal level. So that \$25-million-a-year annual appropriation leverages
a lot of Federal money. Without the Federal money, you'd still have the
25, or whatever was appropriated, but it wouldn't go as far.

Our mission, of course, is to reduce storm damages. We no longer say *prevent* storm damages because there's always a storm out there that's big enough and long lasting enough that will -- can overwhelm anything. The point is, it's simple science at its rudiments. The more sand there is on the beach, to a point, the higher your level of protection. Just a couple of examples here within Ocean County: In the March '62 storm -- more recently, Bay Head in '92, a large storm -- '92, curiously, didn't cause as much damage as the benchmark storm of March 1962. More damage than '92.

New Jersey has a very long and involved history in shore protection, nationally. Back at the turn of the century, that is around the year 1900, the New Jersey and metropolitan areas of -- between New York and Philadelphia were developing along the coast. As people moved to the coast -- I have a couple of examples here from 1920. That's Point Pleasant Beach, in Manasquan Inlet, at the time. As people moved to the coast, as boaters required access to the ocean from the back bay, it was necessary to begin New Jersey's various experiments, at the time, largely without the Corps of Engineers. The Corps of Engineers was not very much in the business of shore protection in the '20s. A lot of the experiments were done

by State -- at State, county, and municipal level. Even the density of development in 1920, in Monmouth County, and some of the experiments in ways to-- You can see how narrow the beach is, in the previous shot too.

We'll skip Cape May County for now. 1922 was the year that the New Jersey Legislature -- back then, 84 years ago -- established a Board of Commerce and Navigation for New Jersey. It was a predecessor of what has become the mission of NJDEP. So more than 80 years ago, New Jersey recognized the need to have a professional group looking at the problems of erosion protection. By the way, there's a very interesting landmark document, in 1922. It documents the State of New Jersey's coast along the entire length -- Sandy Hook to Cape May. And if you go in and read that, it shows some things haven't changed and some things have, but there's a common thread of people wanting to be at the coast.

In 1926, the early days, the American Shore and Beach Preservation -- arguably the most effective national lobbying group for shore protection interests and beaches in the country -- was founded in New Jersey in 1926. This year is the 80th anniversary meeting being held in Long Branch.

I'll give you a real quick view of our project. Philadelphia District is responsible for Manasquan Inlet to Cape May. Our sister district, New York, has the northern 25 miles from Manasquan up to Sandy Hook. In red are the three projects that have not been authorized -- three reaches of coast that have not been authorized by Congress yet. Those in white are the projects we have built within the last 15 years, 16 years -- the first one being Cape May in 1990. You can see the bulk of the work that was done to date has been in the southern half of the state and not so much

in Ocean County. That should change with the work that we're initiating. It actually got started last year on Long Beach Island. The present stretch, if the coast we're in here, falls within the Manasquan and Barnegat Inlet project, and it's up for authorization by Congress, **f** Congress gets to a WRDA in 2006. There has not been a Water Resources Development Act since 2000. I'll skip the--

SENATOR SMITH: All right. There's nothing that New Jersey, the State of New Jersey, hasn't done on this end of it to allow the Congress to move forward? It's a matter of the Congress making that decision?

MR. GEBERT: Congress has not passed a WRDA in six years.

SENATOR SMITH: Do you have a rough, back-of-the-envelope cost on those projects?

MR. GEBERT: Manasquan to Barnegat is on the order of \$70 million, total project cost.

SENATOR SMITH: And again, that would require the split.

MR. GEBERT: And it's too big a project and too much money -- would never be-- It requires a 65/35 Federal/non-Federal cost sharing.

SENATOR SMITH: Right.

MR. GEBERT: And because of the other legitimate competing demands within the state for the Federal money, it's too big a project to, in my experience and my ability to predict, it's too big a project to be built in a -- continuously from beginning to end, because of the amount of money it would require in a single or multiple fiscal years. So it's likely to require multiple years. But right now, the project has not been authorized. It cannot have money appropriated to it until it's been authorized by

Congress. So it's a multiple-step process that requires a WRDA as the next step.

We've been busy for the last 15 years working with NJDEP, even if we're in Ocean County. We've been busy and have not yet built the Manasquan to Barnegat, and just started the LBI project. Cape May: After 50 or 60 years of no sand in front of the seawall in the city of Cape May -- for 16 years now, we've built and maintained the beach in the city. Ocean City, Cape May Point-- I'm not going to give you examples. In addition to beach fill, we've also done-- We have a couple of seawall construction jobs. This one's in Avalon, New Jersey.

The other function that the Corps provides, and I won't go into any length at all, is the coastal navigation. But many people who use the beach are also boaters or know somebody who is a boater. So the Corps has the responsibility from Manasquan, Barnegat, Absecon, and Cape May Inlets. These projects don't require a Federal cost-share for us to do maintenance dredging at them to keep them open.

The first year, indicated there, is the year the project was completed. The second year, in the case of Barnegat and Manasquan, is the year we completed significant improvements. If you've been through Manasquan Inlet, you'll recognize the dolos precast concrete units that were placed from about 1979 to '81 to stabilize the outer ends of both jetties. Barnegat Inlet, with the State of New Jersey -- New Jersey did cost-share the construction of the new south jetty at Barnegat Inlet. That was about a total of \$35 million construction job. That was completed in about -- effectively, in 1991. We dredge in there multiple times a year with the dredge, Currituck.

Just to wrap this up, New Jersey and the position it occupies as sort of having the best program in the country, both at the State level as well as in terms of the Federal effort -- why is that? There's a demand for it. There are people who want to be at the coast. It's part of the culture of New Jersey. I'm a New Jersey native from birth to the present, and going to the beach in the Summer or at other times of the year is simply part of what people want to do. People want to live there, people want to go there.

We have a highly motivated sponsor to work with the Corps and the Federal Government. The Legislature provides the funds. NJDEP does the implementation. We have a very good working relationship. New Jersey has very effective congressional representation in Congress. As I showed you, they are the most effective of any state delegation in bringing shore protection.

And I bring your attention to the last statistic here. Presently, there are 93 miles of developed coastline in New Jersey, between Sandy Hook and Cape May Point. The remaining 20, roughly -- the remaining 30 miles are undevelopable State Park, protected shoreline, and inlets. Okay, so New Jersey is built out-- Right now, we are at the 51-mile mark. So a little over 50 percent of the State's developed shoreline is presently protected.

So with that, I'll conclude.

(ends PowerPoint demonstration)

SENATOR SMITH: I appreciate it. That was very, very informative.

Dave Rosenblatt, from DEP.

Mr. Rosenblatt.

You need to push the -- small mike-- Right. No, no, no, no, the other one.

Thank you. There's a stand there if it will make it easier.

DAVID ROSENBLATT: I know it was my idea to follow Mr. Gebert. Now I'm sorry. (laughter)

Mr. Chairman, Committee members, I would like to thank you on behalf of Commissioner Jackson for inviting the Department to speak today. My name is Dave Rosenblatt, Administrator of the Office of Engineering and Construction in DEP. We perform coastal engineering, dam safety engineering and permitting, and flood control engineering. I would like to provide you with a brief summary of the work we have done toward shore protection in the past two years, and the work we anticipate performing in the near future.

I would also like you to hear the comments I made recently to the Federal Office of Management and Budget, which visited the U.S. Army Corps of Engineers, New York District, about two weeks ago. They were soliciting comments about the Federal funding mechanism, the problems it may cause, etc. My comments weren't profound, but they're very relevant to today's discussions.

With the \$25 million we are entrusted with each year for Realty Transfer fees, we have matched Federal dollars to the U.S. Army Corps of Engineers for major beach replenishment projects and funded preconstruction analysis of where we take sand from offshore. That is principally done by the New Jersey Geological Survey. We fund post-construction analysis of where we have put the sand on shore. That is

performed primarily by Stockton State College for us. How well are the projects holding up? How well are the unprotected beaches holding up?

SENATOR SMITH: How well are they holding up?

MR. ROSENBLATT: Mr. Farrell, are you speaking today?

UNIDENTIFIED PERSON FROM AUDIENCE: Yes, sir.

SENATOR SMITH: How well are they holding up?

UNIDENTIFIED PERSON FROM AUDIENCE: Excellently.

I will be presenting information in a few minutes.

MR. ROSENBLATT: We also do preconstruction analysis of our engineering designs, thanks to Stevens Institute of Technology, Tom Herrington principally.

Recently completed projects: the Brigantine City Beach renourishment, Cape May Meadows renourishment, the city of North Wildwood seawall, the Barnegat Inlet bulkhead, the Wreck Pond outfall in Spring Lake. The purpose of that project was to prevent sand from continuing to move into Wreck Pond, thereby making it shallower and more stagnant; also: to move the discharge further offshore away from recreational bathers. The Deal Lake flume is currently under construction.

SENATOR SMITH: Is Wreck Pond the one that's the cause of the most beach closings in New Jersey?

MR. ROSENBLATT: Yes, yes.

SENATOR SMITH: All right.

MR. ROSENBLATT: The Deal Lake flume is currently being extended in anticipation of the Federal project in the Asbury Park area, but also because the herring runs were being inhibited -- prevented by the shallow waters in which the current flume was discharging.

Future projects: Of course, the Long Beach Island beach nourishment project, the Long Branch Beach renourishment project -- we expect both of those to start this Fall; Cape May City Beach nourishment and North Wildwood Beach nourishment. North Wildwood Beach nourishment is a project we're going to be doing with the city and the State alone, without the Corps. The Corps is nowhere ready near to start funding that project and we need to move forward. We'll be doing projects in Villas, Reeds Beach, and we're currently working with the Corps on the Cape May Meadows Environmental Restoration project. The Ventnor City groin has been spurred by the beach fill in Atlantic City and Ventnor that occurred two Summers ago. Margate and Long Point to the south of Ventnor did not participate in the project, so we had no stabilizing factor at the southern end of Ventnor. The sand just moved off into Margate and Ventnor, and Ventnor lost a good portion of its paid-for project. By putting a groin in place, we expect to stabilize that project for the next round of renourishment and also prevent -- redesign the project to not harm Margate's beaches. We anticipate doing work on Island Beach State Park; and in Keyport; and Sea Breeze, in Fairfield Township.

Municipalities need to know, as Mr. Gebert pointed out, that there is a cost-share required of them as we move forward with any project. It does amount to about 9 percent on the dollar for each municipality. These municipalities need to know, of course, that they will need to provide public access both to the beach, on the beach, parking, and restroom facilities.

Depending on the passage of WRDA, the next project we'll be looking at, the next large portion, will be the Manasquan Inlet in Barnegat -

- that's the Barnegat Inlet project, providing hurricane damage protection to those municipalities listed. (microphone falls)

SENATOR SMITH: I knew when that came out of the stand we were in trouble. (referring to PA microphone)

MR. ROSENBLATT: There.

SENATOR SMITH: Go ahead.

MR. ROSENBLATT: The total cost for this project is about \$60.5 million in 2002 dollars, which gets me--

SENATOR SMITH: Do me a favor, flip back to those projects. No, no, no. One more ahead. These. I got an idea from the Army Corps where they were on some of the projects. This looks like a separate list. Where are these projects with regard to Federal funding?

MR. ROSENBLATT: These are all in the current WRDA.

SENATOR SMITH: WRDA meaning?

MR. ROSENBLATT: Water Resources Development Act. The one that's being debated right now. It has not passed yet. If this were to pass this year, as Mr. Gebert said, these are the municipalities that would benefit from this project authorization. Although the authorization doesn't mean funding, of course. That requires appropriation.

SENATOR SMITH: Right. When you say WRDA, you're talking a Federal--

MR. ROSENBLATT: Yes.

SENATOR SMITH: So this is currently before the Congress.

MR. ROSENBLATT: Yes.

SENATOR SMITH: If they come up with their portion, then it's our job to come up with our portion.

MR. ROSENBLATT: Yes.

SENATOR SMITH: And the municipalities to come up with their portion, yes?

MR. ROSENBLATT: Yes.

SENATOR SMITH: And are we, as the State of New Jersey, committed to these projects?

MR. ROSENBLATT: Yes.

SENATOR SMITH: Okay.

MR. ROSENBLATT: It's one project -- those municipalities that are impacted by it.

SENATOR SMITH: Oh, okay. All right.

MR. ROSENBLATT: Yes. I believe there are people in attendance that will testify to the importance of these projects, etc.

The cost -- 60.5 million is in 2002 dollars, which gets me to the Office of Management and Budget discussion I had at the New York district. We're never going to get \$60.5 million all at one shot. Just like we didn't get \$71 million for Long Beach Island all in one shot. We get \$3 million one year, \$5 million another year, thanks to the hard efforts of our congressional delegation. What we have to do then is figure out how do we spend the limited money we get on an annual basis. Ideally, we would do-In this project, we would start at Barnegat Inlet and move north to Manasquan Inlet all at one time. Just like in LBI, we would start in Loveladies and move south all the way through Holgate. That is the most effective way to provide protection, to do the project. But we don't get the money all at once, so we have to segment this. What that means is, we're

constructing on a very inefficient schedule. Each time we have to demobilize a construction crew it costs money -- a million dollars often.

Someone used to say -- the person here who was in my job before me used to say, when asked how much will this project cost or how much will the sand cost, "Well, the first bucket of sand will cost you several million dollars. After that, it's about \$10 a bucketfull or so." And that is mobilization. Not only is it inefficient, but it's ineffective.

Without -- as we saw in Ventnor -- without a stabilizing feature at the down-drift side of the project, you have a good likelihood of losing parts of that project. So when we pick out where to begin in each of these areas, we're going to have to look at what is going to cause the most effective project, because of the way you have to do construction.

And lastly, I would say that--

SENATOR SMITH: By the way, this is not a function of stupidity on the part of the State of New Jersey?

MR. ROSENBLATT: No.

SENATOR SMITH: No. Okay. This is this drip, drip, drip policy from the Federal Government?

MR. ROSENBLATT: This is Federal.

SENATOR SMITH: Okay. Yes.

MR. ROSENBLATT: And I didn't use that word in talking to OMB, but they got the point.

As I said, the dollar figure that I presented was in 2002 dollars. A \$60 million project in 2002 probably is going to increase in 2006, 2007, 2008, whenever we wind up getting appropriation started. So that's

another downside of this segmented form of funding for these large construction projects. When you're--

ASSEMBLYMAN WOLFE: Excuse me?

MR. ROSENBLATT: Yes.

ASSEMBLYMAN WOLFE: I don't have a microphone, but it took almost 10 years from Manasquan up to Sandy Hook for that project? How many years was that?

UNIDENTIFIED PERSON FROM AUDIENCE: (indiscernible)

MR. ROSENBLATT: He's saying about 10 years, yes.

ASSEMBLYMAN WOLFE: Ten years, okay.

MR. ROSENBLATT: So you know -- and this is not on the ocean side, but on the bay shore side. I don't have my notes, but I would say that we have one project that's about \$130 million. I know the project that's in the \$40-to-\$50 million range. So there's a lot of competing projects just in New Jersey for these large amounts of moneys. And those projects, too, will have to be analyzed for how we can segment whatever dollars come in, to do these effectively.

SENATOR SMITH: Yes. How do you make a decision? How does DEP make a decision, if there's a limited amount of dollars, which project to do? How do you set up the priorities?

MR. ROSENBLATT: Well, usually the priority is set by where the Corps is designated to put the money.

SENATOR SMITH: In other words, it ends up becoming a Federal decision?

MR. ROSENBLATT: Excuse me?

SENATOR SMITH: It's a Federal decision as to the priority?

MR. ROSENBLATT: Yes.

SENATOR SMITH: Okay.

MR. ROSENBLATT: We try to put -- we have input. The Corps and our office discussed this, but it's largely a Federal decision at that point that the money is appropriated. When money is appropriated for a project, then we have to decide: well, where within that project area do we do the construction, actually? And that becomes a technical issue.

SENATOR SMITH: Okay.

MR. ROSENBLATT: Okay. So lots of competing interest in New Jersey. A lot of decisions to be made.

Thank you very much.

SENATOR SMITH: Thank you very much.

I think that concludes the Federal and State overview of the beach replenishment issue. We have a number of elected officials who represent this area who wanted to get their licks in.

Let me ask Mr. Bill Dunbar, the Mayor of the Borough of Mantoloking, who apparently has a group of towns working together on this effort; Mayor Scarpelli, of the Township of Brick; and David McKeon, Ocean County Board of Freeholders. If the three of you would come up, maybe you'd let us know, from the public official's side, what you think we should be doing, or what the Corps should be doing, or what DEP should be doing. We'd like to hear what you have to say.

And guys, among yourselves, you can decide the batting order. Who'd like to go first?

Not that one, the tall one -- that one. (referring to PA microphone) That's the one that has the voice to it.

MAYOR WILLIAM DUNBAR: Good afternoon. I'm Mayor Bill Dunbar from Mantoloking. Mantoloking has been in the forefront of trying to push the Federal beach renourishment project for the past 10 years. We've hired a lobbyist in Washington, Howard Barlow (phonetic spelling) Associates, to help the town of Mantoloking and to reach -- to push this project. And it's looking better and better everyday, as we see that the water bill is finally up before the Congress and the Senate.

A few months ago, we were very discouraged whether the water bill was going to be approved, and I called on our neighboring mayors from Bay Head, Point Pleasant Beach, all the way down to the Seasides, to see if we could work together and fund this project ourselves, along with the State help. We've have a couple of meetings, and we've had a lot of interest from the mayors in our region. If the water bill, the Federal money does not come, then we might be able to do something ourselves.

In Mantoloking, I have \$7 to \$8 million homes that are less than 10 feet from falling into the ocean. These homes provide great rateables for Ocean County and the State. And so it's very important that we try everything we can in our power to try to get either the Federal funding; or else we're going to organize, and need State help in doing it ourselves.

Thank you.

SENATOR SMITH: Thank you, Mayor.

Freeholder, Mayor, who'd like to go next?

Freeholder.

DAVID McKEON: Thank you, Senator.

I'm actually David McKeon, the Planning Director for Ocean County. And on behalf of the Board of Chosen Freeholders, I'm here to repeat their long-standing support for the federally- and State-funded beach projects. These projects not only protect our residents, but they protect our recreation and tourism concerns, which are vitally important here. These projects do work. And you've heard testimony -- and you will also, I believe, from Dr. Farrell -- about the success of these projects. There may be spot areas that don't work, hot spots that need special treatment, but the vast majority of these projects do work.

It should also be remembered that in a lot of cases these projects serve to restore critical habitat, particularly for the piping plover. There are now many areas along the Jersey coast that serve as a habitat for these species that were not there for decades. And towns have learned to do that, to live cooperatively together with the environmental concerns. There may not be 100 percent agreement on the benefit or the need to do beach restoration projects, but I think that the concerns that are expressed are a fraction of the benefits of these projects, which cannot be overlooked. We need to be focused on the primary purpose, that is the protection of the residents and the resources of this area; and we need to act immediately to move these projects forward.

Thank you.

SENATOR SMITH: Okay.

Mayor Scarpelli.

MAYOR JOSEPH C. SCARPELLI: (knocks over microphone)

SENATOR SMITH: Dover won't send you a bill.

MAYOR SCARPELLI: Mayor, you better not.

MAYOR BRUSH: Mr. Chairman, a housekeeping note. That microphone is very sensitive. If you just slide it around from the base, it should stay in its place.

MAYOR SCARPELLI: We'll let you do it, Mr. Mayor. This is your chamber.

MAYOR BRUSH: We can't afford the good equipment that you have up there in Brick.

MAYOR SCARPELLI: No, not really. This is a beautiful facility.

Mr. Chairman, thank you so very much for allowing me to speak at this hearing, which is so very, very important. I want to compliment you, because I look at this Committee -- both the Senate Committee and the Assembly Committee, because we interact with both of them -- as champions. You guys are champions of the environment, and I want to thank you for that. Because we need your support. And I want you to know Brick Township is 100 percent behind Mayor Dunbar's initiative of this alternative. I know many of the communities, especially those communities south of us, that are talking about putting money up -- lots of money -- to do what the Federal Government should do. So I want to compliment, first, Mayor Dunbar for leading this initiative, and to the Ocean County Board of Freeholders for pledging their support.

I would agree with you that it's absolutely necessary that we do this. I would be remiss if I didn't talk about two things, two issues, that I need your support, your input, and your continued heads up on -- two

issues which directly affect beaches and our fishing industry. First, effects on the fishing industry -- and we have been talking about -- we have a lot of supporters here today -- is the Oyster Creek Nuclear Power Plant relicensing effort. They want to stay around for another 20 years. And you talk about the circle-of-life period -- they have destroyed millions and millions of aquatic life in that Barnegat Bay. And if we're not (indiscernible) the fact of what they're doing there, we're going to have trouble. If there's an accident at this nuclear power plant, we don't have to worry about beach replenishment or the tourism industry. So I just wanted you to know that -- that here in Ocean County, I think I have the support of all the mayors in Ocean County, at least the majority of them, about this issue.

And the second issue I wanted to talk about, and I think it's something we mayors can get involved in -- not only we mayors. Everybody here has the effects of this greenhouse gas effect on our livelihood. It's a global warming issue. And if we don't face this issue again -- you're going to have professionals here who know a lot more than I do, who are going to tell you -- if we don't do something now, in 30 or 40 years that ocean, that beachfront is going to be 500 feet east of where it is now. So again, we won't need all this effort, and maybe that's what some people are watching and waiting on, and waiting on.

So what I need is your support and input to kind of nudge mayors like myself and the general public. There are things that they can do, like greening their communities. And by greening their communities, they're going to put a slowdown to this greenhouse gas effect. And if the mayors alone would sign on to the United States Conference of Mayors' Climate Control Agreement, to pledge to reduce greenhouse gas effects by 5

to 7 percent below the 1990 levels, this would be a step in the right direction.

So these two issues, Mr. Chairman, I think are so very, very important. We in Brick Township have greened our community -- talking about solar and cleaning products, pesticides, nonpesticides on our ball fields, hybrid cars. I think it's so very important. It all fits in to what you -- all of you up there -- have been trying to do in the Senate and the Assembly for years, that we have talked about 10 years ago -- Assemblyman Wolfe talked about -- that little bit -- talked for 10 years. Mayor Dunbar, I don't know where we're going to be in 10 years; but we hope it's a lot sooner than that.

Thank you very much.

SENATOR SMITH: Thank you, Mayor.

Thank you all for coming.

Let me ask a number of representatives from environmental groups to come forward. Let me ask Jeff Tittel, of New Jersey Sierra Club; Leann Foster-Sitar, from the American Littoral Society; and Mr. Pisauro, from the Environmental Federation. You would like to talk about beach replenishment issues or not?

Is Jeff here? He was here, I thought, a minute ago.

How about Leann? Leann's here for sure.

Bill -- New Jersey PEER -- Bill Wolfe? Is that an environment--Did you guys have a position on beach replenishment? Or are you here for fisheries? (declines from audience)

New Jersey PIRG, Doug O'Malley. Did you have anything you wanted to say on beach replenishment, or are you a fisheries guy?

Any other environmental groups presents that-- What group is that, sir?

JOHN J. WEBER: I'm with the Surfrider Foundation.

SENATOR SMITH: Come on up. Pull up a chair. And your name, sir?

MR. WEBER: John Weber.

SENATOR SMITH: Okay, John. Pull up a chair.

All right, Leann. We'd like to get a little environmental perspective on beach replenishment.

Of course, if we can get the microphone to stand up. (referring to PA microphone)

LEANN FOSTER-SITAR: I'm scared to death to touch this thing. (referring to PA microphone)

Thank you very much, Mr. Chairman. Leann Foster-Sitar, American Littoral Society. Good afternoon, Senator, Assemblyman.

(microphone falls) I didn't do it. (laughter)

SENATOR SMITH: I know you didn't do it. Maybe you just have to hold it by hand, just in front of you, like you would a normal microphone.

MS. FOSTER-SITAR: I'll try holding it and we'll see how this goes. I can't dance in my position. I hope that's all right.

I guess, from the Littoral Society's perspective, we have a bit of a different angle on beach nourishment, as well as a different perspective on erosion, as not just a problem in and of itself that needs solving, but a symptom of several larger problems. I'll address that first. I think Mayor Scarpelli actually started the conversation moving towards an effort to think

about the group of problems that ultimately result in beach erosion. One of them is obviously global warming sea level rise. That's something that I think we all, as members of the global community, have to take steps to resolve.

But what I'm here to talk about is, the Littoral Society believes erosion is a symptom of a serious legal and regulatory failure to control inappropriate coastal land use in New Jersey. The problem is unwise development in high-hazard areas. We're also extremely concerned that increased demands for nourishment and the use of alternative funding sources, in the absence of the clear State regulatory requirement for pubic access, will jeopardize the public's right of access to the beach in the nourishment process.

We welcome the opportunity to discuss with you and members of the Committee, as soon as this Fall, our agenda for land-use reform in the State of New Jersey, specifically directed at addressing the problems of coastal overdevelopment, beach erosion, and many of the things that we talked about today.

The first item on our agenda is that we believe adverse impacts in development along the New Jersey coastline must be limited by reforming existing law and policy, to provide greater control over land use in sensitive and high-hazard coastal areas. This means we've got to take a hard look at CAFRA. Loopholes for development must be closed. Impervious cover limits must be lowered so that any and all development in the coastal zone receives the highest level of scrutiny and environmental impacts analysis. Development in high-hazard areas must be prohibited and current exposure to hazards reduced.

We've talked a lot about the problems that erosion presents for the beach and for the beach community. These are also problems that people, as the mayors well know, are being brought into because they live in these eroded areas. Now, beach nourishment is traditionally used as a quick fix. We at the Littoral Society don't believe we ought to be looking at nourishment as a quick fix. We've got to look at solving the problems. It's a package. It's a global approach to solving the problem.

And speaking about beach nourishment in particular, public access to beaches and waterfront areas must be protected and improved. No sand -- and the Littoral Society, as well as the Department of Environmental Protection, have been very adamant in taking this position -- no sand should be provided to any community for the purpose of beach nourishment without first securing easements for public access and providing for support facilities, including ample public parking and restrooms.

I believe it was the representative from the Army Corps mentioned -- people want to live here. People want to go to the beach here. Well, if we use nourishment as a way to fill up our beaches full of sand, without right for public assess that's not going to happen.

My third and final point -- and I'll be brief -- beach nourishment should not continue to be used as a quick fix. It should be a competent and comprehensive effort to control development in erosion prone areas and where people and property are at risk. We at the Littoral Society have an alternative opinion about the success of beach nourishment. We believe it fails to restore. We the create vital beaches and shoreline systems for the long term. And projects are usually

segmented as (indiscernible) -- do the flooding limitations, so that by the time the entire stretch of beach is done, you've got to go back to the first beach you started with and put more money there. That's not a cost-effective approach.

Nourishment is also possible only at great cost to both State and local government, as you well know. And Federal participation, as well as funding levels, are every year increasingly in question. Other necessary elements of the program, to prevent development in high-hazard areas and not just compensate for it, should, therefore, be in place before we, as a State, make any further commitments for sand or funding to maximize the long-term benefit of this approach. These elements, we believe at the Littoral Society, would include stronger setbacks; regulations of the beachfront development; and/or reestablishment of the Blue Acres program, which would acquire at-risk and repeatedly damaged properties.

Thank you very much.

SENATOR SMITH: Thank you, Leann.

Doug O'Malley, from New Jersey PIRG.

Doug.

DOUGLAS O'MALLEY: Thank you, Chairman.

I had wanted to thank Leann and, also, Mayor Scarpelli for their comments. And I will be brief as well. I do want to touch a little more in depth on two of the overarching problems facing the shore, which is (indiscernible) and the long-term impact of global warming; and then also recommend specific amendments to CAFRA.

We obviously, all along the shore -- we also know that developers along the shore have all been assured that (indiscernible)-- And

I think it's important to remember that the trends are most high on the shore. Ocean County and Monmouth County are the two largest counties with the amount of new acres, undeveloped between '95 and 2000. There were 10,000 acres in Ocean County and there were 9,700 acres in Monmouth. And that has a direct impact on our water quality. Not just when it rains and closes down the beach, but also on the ecology of our oceans. The EPA rated 35 percent of its sites they tested in 2004 as ranking as poor. This is obviously a connection that is not -- it's very easy to connect the dots here. And I think it's important to remember, too, that not only is it controlling overdevelopment of unprotected water qualities, also about protecting us, protecting communities. And that we know the shore is always going to be vulnerable to very serious storms. And we've been lucky enough to dodge the bullet of a hurricane.

But we have to know that if we don't control development, we are literally putting our safety at risk. We shouldn't have to wait for another giant storm that we can see up on the board of the Army Corps (indiscernible) show. We should be acting now.

But obviously, on the next topic, I wanted to thank you, Chairman, for being proactive on promoting legislation for rebuilding, as well as for mandatory (indiscernible) production. It is so obvious that we are facing global warming, even Pat Robertson, after this heat wave, acknowledges that it's happening. That's great. The tough part is figuring out what we do now. And as you know, New Jersey PIRG, as well as the Sierra Club and the Environmental Federation -- we're working to get Governor Corzine to commit to being a national leader on this issue and to commit to taking aggressive stands on reductions.

The area that we're going to face the biggest threat is going to be right here on the shore. Princeton University did a study last year by Dr. Michael Oppenheimer. And the study said that over the course of the next century, about 2100, we can expect to see a sea level rise of two to four feet. We're going to see that, obviously, most impact the shore. We're going to see 3 percent of the state submerged, 9 percent face chronic flooding. And it's not that hard to figure out where those areas are going to be. Areas that would be submerged would include Atlantic City, include LBI, include the Delaware Bay shore, include a good portion of Cape May County. And it's important to remember that those are relatively conservative estimates.

James Hansen, a Ridgewood native, one of the folks who testified before Congress in the early 1980s, has gone as high as an 80 foot estimate. At that time -- but even two to four feet would be catastrophic. And so, really, we need to be proactive on both these threats, and specifically looking at CAFRA and what we can do with it.

I know Jack will talk later about closing the infamous 24 (indiscernible) loophole. I just want to focus on two specific areas: one, to amend CAFRA for regular reconstruction and redevelopment of high-hazard areas. And right now, as you know, current law provides a right to rebuild storm and flood-damaged structures, and does not adequately limit new development in these high-hazard areas. Basically, we're not learning from our mistakes, and it's hurting all of us.

SENATOR SMITH: Come down to the capital when we have a heavy rainstorm.

MR. O'MALLEY: It's not that-- It's going to -- obviously going to be a little tougher to go down to the cafeteria in the future, right?

The other key area that we need to amend, not only CAFRA, but also the use of the Land Use Law. And some towns have actually done a great job at kind of being proactive at this -- is to be looking at our evacuation plans. Specifically, we are requiring global warming adaption strategies, but overall, to improve our hazard planning and to improve our requirements for emergency response. We know we can't rely on FEMA models. We know that we can't wait for the next storm surge. Some towns have taken the lead on this, that's great. We need to make sure that every town is prepared. We need to make sure that's in CAFRA and in (indiscernible).

That's all I have. Thank you for the opportunity.

SENATOR SMITH: Great. We appreciate that.

Your name, sir, is?

MR. WEBER: It's John Weber. I'm with the Surfrider Foundation. I'm going to actually try and fix this microphone because that's my nature. If you will allow me, if the Committee will allow me? (referring to PA microphone)

SENATOR SMITH: Send the invoice to Mayor Brush.

MR. WEBER: Sorry?

SENATOR SMITH: Send the invoice to Mayor Brush.

MR. WEBER: Okay. Now I see why this doesn't work. Oh, this thing definitely was made-- Okay, never mind.

SENATOR SMITH: Go ahead.

MR. WEBER: Yes. Again, my name is John Weber. I work for the Surfrider Foundation. We're an international nonprofit group dedicated to the protection and preservation of the world's oceans, waves, and beaches. We have 50,000 members in the United States; 2,000 here in New Jersey and in Pennsylvania.

I am here to tell you about the other side of the beach replenishment story, I just feel that's not being told, that was addressed a little bit by some of the previous speakers. I'm going to let my written testimony fill you in for the most part. I'm just going to skim through parts of that. But I did want to talk about the impacts on recreation and safety of these projects: the fact that unwise development does follow these projects, as these two have alluded to; and the process by which these projects come from the Federal Government to the State, and to these local municipalities; and the DEP's position on the fact that property protection is the primary goal of these projects.

I do want to add one other comment. I heard, twice, people mention piping plovers. That's great. They're an endangered bird. They like beaches, too. What's not being said by the Army Corps is, if piping plovers land on a replenished beach, you have to close that beach. And they don't tell the people that are getting these projects that if that's the case, they're going to close the beach to foot traffic and everything. So that's just another part of the equation there.

These projects do impact recreation because -- imagine if you built a beach out 100, 200 feet, you're going out, you're going past the sandbars, you're covering the rock groins or jetties. And that has an impact on marine life associated with those groins and jetties. And in our case, with the sport of surfing, that's associated with those jetties and those sandbars. The sandbars are the first line of defense against incoming wave energy. And if you bury those sandbars in 10 feet of sand, you no longer

have that defense. And people who like to engage in the sport of surfing would no longer have the sport of surfing.

Our sport is growing dramatically. It's grown 90 percent in the last six years, according to the Sporting Goods Manufacturers Association. They just came out with a report. That's quite a big increase. There's certainly a large economy associated with that. So there are, again, problems with recreation.

We also have concerns about the quality of sand, and also the fact that—There have been a couple of cases where the Army Corps has damaged municipal infrastructure. And if—For example, in my town of Bradley Beach, the town has had to pay a quarter of a million dollars to fix an outflow pipe that was damaged by the Army Corps in the process of doing the project. That was the New York district, so no harm done for the folks from the Philadelphia district in the room here. But I mean, that's a reality. I think that the State could take a look at that and say, "If you damage infrastructure, you need to fix that at your expense, not at the local municipality's."

And one other thing that's happened in Monmouth County: In addition to the loss of recreation like surfing, they notched the jetties. And in a lot of cases, the beaches were covered with bowling ball- and softball-sized rocks from the notched jetties. And the Army Corps just left them there. So people say, "Oh, no one goes to the beach in Asbury Park." Well, I got a picture in here; you'll see why. Because it's covered with bowling ball sized rocks. It's not a pleasant place to be at all. I think that the Army Corps should come back and clean up if they make a mess like that.

The effects on development: Our concern is after these projects come in, the development just seems to run rampant. In Long Branch and Asbury Park, we had golden, once-in-a-lifetime opportunities to pull back the building setback from the ocean as they redeveloped -- in both cases. If you go to Long Branch, you can see how close the buildings are in these redeveloped areas to the ocean. You would never know that they replenished. They built a 200-foot wide beach, and the edges of the structures right now in Long Branch are like 75 feet from the ocean. So, guaranteed, someone is going to have a nice slideshow presentation, and they're going to show the water underneath McLoone's at Pier Village in Long Branch, in five years, and we're going to say, "We really need to replenish." This is a vicious cycle of: build too close to the ocean, replenish, look the other way at some building codes, or change CAFRA rules, or something. I don't know how exactly it happens, but -- and then that furthers the need to replenish. And that's got to stop, because we're just burdening future generations with the cost of our bad decisions today. And we think that's a bad idea.

Dr. Herrington stressed the importance of protective dunes. Great, we love that. I agree with that 100 percent. How is it that towns get beach replenishment -- they're allowed to use State money for replenishment and they're not required to build protective dunes? You have towns like Avon and parts of Spring Lake where there are no dunes; except in the Winter, they bulldoze up sand, sort of like a faux dune, and they think it does the job. And then in the Spring, they bulldoze that sand dune down and they flatten it out. We don't understand why that's

allowed. Why shouldn't they bulldoze that thing up once, plant it with grass, fence it, and leave it alone? Protective dunes, just like--

SENATOR SMITH: Yes, that does not sound kosher. It sounds to me like DEP would go crazy with something like that.

MR. WEBER: The towns get a -- what do they call that permit, Dave, do you know? They get a beach maintenance permit every year. They get these permits from the town; they get them from the State. I mean, the town gets them. It's not every time they move a grain of sand they have to get a new permit. They get one blanket permit. It's pretty much good for a year and it happens every year. I've called their office about it.

SENATOR SMITH: Okay.

MR. WEBER: I'm glad you think so.

SENATOR SMITH: I appreciate your comments.

MR. WEBER: Sure.

SENATOR SMITH: You're going to give us a written statement, right?

MR. WEBER: Absolutely.

SENATOR SMITH: I believe we put them right into the record, correct?

MR. WEBER: Absolutely.

SENATOR SMITH: Anything else you'd like to say?

MR. WEBER: Just a couple of other things on development. We see cases where there are private beach clubs being built where they're on publicly funded, replenished beaches. Again, going back to Long Branch, the plannings in Asbury Park, this is a bad idea.

And currently, right now, in Long Beach Island, in Ship Bottom, we have a case where the town is going to do a land swap with the owner to get the construction easement. The town is going to allow the property owners to expand the buildable portion of their oceanfront lot, meaning they'll be able to build a bigger, more expensive house if they'll sign their construction easement. Again, this is just giving rise to that more and more coastal development, that we feel, down the road, is going to further the need for beach replenishment. So we actually don't think that this is a good way to go.

In my handout, you're going to see that I have a couple of opinion pieces; as well as I wrote something for the towns of Long Beach Island, for the elected officials, because they have the right to ask for modifications to the projects. And one of our concerns is that they are completely, completely unaware of the fact that they have any rights to ask for modifications to the projects as proposed to them.

One of your Senate colleagues, Leonard Connors, has been the Mayor in Surf City for 40 years. He told me personally over the phone that Surf City has absolutely nothing to do with this project. It's all being run by the Federal Government. It's the most unbelievable statement. They're going to alter the state of his town for good, and he says the town has nothing to do with it. So the reason -- the package that is addressed to Mayor Connors just outlines a lot of these things that I've been talking about. Just for you benefit, you know, I didn't write a letter to Mayor Connors.

We also included a couple of-- There's one study -- it's a study of studies from the Army Corps. Again, Dr. Herrington referenced a New

York district study on the effect of marine organisms. We don't feel it's worth the disk that it was printed on because, in this case, when they're looking at fish, they say -- they talk about percentages of fish before the project and percentages of fish that they caught after the project. Now, you're going to hear from some fishermen later. But I bet you, if I asked Tom Fote, I said, "If you went fishing and you told your wife we caught fish -- 30 percent of the fish we caught were striped bass and 18 percent of the fish we caught were flounder, and 22 percent of the fish we caught were kingfish" -- if he came home and told his wife that after fishing, she would think that he needed to take his medication or something. Because this is not the way people talk about fishing. They go fishing, they talk about numbers of fish they caught. They don't talk about them in percentages. So, yes, the Army Corps did a study before and after. They talked about organisms and percentages, and we feel that's not even, again, worth the disk it was printed on. So there's a scientific study assessing all their studies along those lines. I'll leave my written testimony for that.

Thanks very much for your time.

SENATOR SMITH: Great. We appreciate you bringing that information to our attention.

Mr. Tittel, from the Sierra Club.

JEFF TITTEL: Thank you.

And we'll also be bringing in some written testimony and a report that we've all worked on, for you to take a look at at your leisure.

I just wanted to start off by saying that protecting our coast is more than a day on the beach. And one of the things that struck me from the Army Corps' presentation is that they talk about, basically, a 200-foot-

wide strip of land from Cape May to Sandy Hook. But it's not just what's happening on the beach that's important, it's what's happening on both sides of the beach, whether it's in the ocean or on the mainland. And you cannot protect that beach, no matter how much sand you pump onto that beach, without looking holistically at what's happening along our coastline in both the water and on the land, because they're interrelated.

We want to make sure that we have a great beach to use in the future. But we also have to make sure that the water quality is going to be there for the future; and that we don't pave over our landscape -- and all the assorted problems that come with it. At many times, it's the State of New Jersey that's, I think, a major part of the problem.

And I just wanted to talk a little bit about the CAFRA, or the Coastal Areas Facility Review Act, which is now about 35 years old. It had some amendments in 1993. Back in the '93 amendments, we linked it to the State plan. One of the problems -- when we linked it to the State plan, we came up with a system where the growth areas in CAFRA were based on a planning document that wasn't based in any natural resources, that areas up and down the coast became designated for growth not because there was an analysis done on environmental constraints or natural resources, but because at one time some of the areas were in an old sewer service area mapping that goes back to the '60s. They didn't look at whether there's potable water. They didn't look at what the impacts of the development was going to be on the estuaries of the bays or the ocean.

And because of that problem, I think we're starting to see other things happening along our coast. We see dissolved oxygen levels, especially at the bottom, dropping all up and down our coast. We see

problems in Barnegat Bay. And so I think it becomes time, as we want to look at our oceans and look at our beaches, we need to look at the CAFRA law, which is the one that is most responsible, and start looking at some of the changes that are out there that we need to start to try to take advantage of. Because we need to start making those changes now. We may not have the same ocean, we may not have the same landscape in the future.

A couple of points I wanted to make is, under the CAFRA law there is no -- we don't look at hazard planning any more, meaning the high-hazard areas for storm surges. In fact, the State Planning Commission, and now the DEP, just designated a center in Ocean Township -- a mile from a nuclear power plant in an area that floods -- and now they can go up to 80 percent impervious cover, which is ridiculous when you think about the ecosystem and the importance of the coast when you're dealing with storm water.

Our CAFRA rules and regulations allow 80 percent impervious cover in regional and town centers, 90 percent in cities, 30 percent of planning area too. Well, anyone who knows anything about storm water knows that when a watershed is 10 percent impervious cover, it gets impacted for pollution. When it's at 30 percent impervious cover, it's permanently damaged. And yet, we have a law that's supposed to help manage the coast, supposed to be our part of the Coastal Zone Management Act -- it says it's okay to do 80 or 90 percent of impervious cover, without even looking at the impacts from storm water to the bays or to the ocean. And that's really the problem.

You mentioned Wreck Pond. The reason Wreck Pond causes all that pollution -- it's become a detention base. And what we've done,

instead of really fixing the problem in that watershed and moving the pipe further out so as let it discharge further off the coast -- the problem is that we have to start looking at how we treat storm water better. And we need to come up with ways to retrofit some of the areas where we have large amounts of development, because that's the best way to try to protect the future.

We also need to look at one of the things we did when we upgraded our sewer plants -- we did move a lot of the pipes off the coast. And again, along the coast, 120 million gallons a day goes out to sea that's no longer going into streams. And so places like Barnegat Bay, which have lost, in the dry months, probably close to a third of their freshwater flows, has seen the salt water coming in, lower levels of dissolved oxygen, and for the first time you start seeing jellyfish. The Bay was always brackish, you never would see jellyfish. And so we need to go back and reexamine the laws and programs at the State level, and start making those proactive changes so that we have a coast for the future.

To me, one of the problems I saw in the last CAFRA rules that came out: We can build casinos on piers in Atlantic City. But one good hurricane and, I guess, maybe Camden gets a casino. Maybe it will do some good for urban renewal there. It's ludicrous to build something like a casino on a pier in an ocean when you have hurricanes and nor'easters. We keep building our houses higher with higher piers. And what will end up happening is, a good storm and those houses will be like houseboats. We need to realize that we have to start pulling people back from harms way. We really need to plan for sea rise and storms along our coast, especially with hazard planning. We figured out evacuation routes and so many other

things. Because, quite frankly, we all love the shore. This is one of the best days to be down at the shore. It's a great day. The water's clean. It's a perfect time of year, and we all love our coast. But yet, we need to start planning for the future so that we have this coast in the future.

One thing I wanted to mention on the beach replenishment: and I strongly think we need to commit to making sure that any town that gets any beach replenishment dollars from the State, there has to be public access. I know it's been controversial, but it's the public benefit for all of us who put our moneys forward.

SENATOR SMITH: Right.

MR. TITTEL: Because there are also a lot of environmental downsides to beach replenishment. So we need to do things to mitigate for that. The Sierra Club doesn't like beach replenishment. One of our policies says it's harmful to the environment. It's not a holistic way of dealing with the beaches. And they're right. But this is also New Jersey, and we need to look at ways of offsetting and mitigating for some of the problems that we do with beach replenishment -- for the environment, for the recreational folks as well.

Because again, I just wanted to close with -- 16 years ago, Governor Jim Hunt of North Carolina, when he signed his coastal zone law, said that he was signing this law today because he doesn't want North Carolina to look like New Jersey. And at the time, I thought that was an insult to our state from someone who didn't know our state. But the point that I'm making is that we have problems -- and to some people from other places, they think that the Jersey shore is a joke. It's all -- whatever. But

the New Jersey shore is our gem and it's our treasure. And we need to act to make sure that it's going to be there in the future for all of us.

SENATOR SMITH: Thank you, Mr. Tittel.

We're going to do a citizens panel on beach replenishment. We have a number of citizens who asked to testify, and then we're going to switch to fisheries, so we don't lose the fisheries people. We've done, now, an hour and thirty-five minutes on beach replenishment, and we're trying to get everybody's perspective. A number of citizens have indicated a desire to testify. I'd ask that you try to go right to the point. We have Mutya Shaw, Property Owners for Better Replenishment; Carolyn Groissier, Property Owners for a Better Project; Doris Spiegle, from Beach Haven. If you'd all come up, I'd appreciate it. And let us know that you're here so that we can -- I'd like to get at least four citizens up here. Dorothy Jedziniak. Dorothy, would you come up, please. And let's see how we fit there with citizens.

And I'm not sure who is who. If you'd identify-- If you'd take that broken microphone and identify yourself.

DORIS SPIEGLE: I'm Doris Spiegle, from Beach Haven.

SENATOR SMITH: Hey, Doris. Just before you get your comments in, Doris, what would you like to tell us about beach replenishment?

MS. SPIEGLE: I would just like to put a little bit of input into this. I'm an oceanfront owner in Beach Haven, and I have been in excess of 50 years. I was there in the '62 storm. We did have the bulkhead in front of our property, but we had no major damage. After the storm we had added more bulkhead. We now have, like, 400 feet of bulkhead. The storm that was mentioned in 1993 was a severe storm and, yes, it did

damage, but not to my property whatsoever. There was no emergency. The bulkheads held very well. But it's interesting, too, this beach replenishments idea of '93, where they came in and they started pushing their sand -- they went out to the water's end. They'd wait until low tide, and they would take a -- they'd even go into the water. They'd take the bucket of sand and they'd drag it up and they'd put it back on the beach. And this went on for 12, 13 years until the beach salivation was so low that every time high tide came in, it was almost coming up to the bulkhead. They put it in on Monday, Tuesday it took it away. They put it in on Wednesday, Thursday took it away.

But the main point here I'd like to make -- this was all done on private property. They had no easement. They never asked me for one. They went over 30 feet into my land. They pushed the sand so high and sort of said -- Well, I have pictures that I'll show you. It's loose sand. They never planted it, they made no attempt to hold it. And finally, in 2004, I went to my apartment and -- bear in mind, this is my only source of income -- I couldn't even get in the front door for rental purposes. I hired a contractor to come in and move the sand. Now understand, the sand wasn't 22 feet high. It was maybe 10, 15, but it was a major project. Not one grain of sand was removed from the oceanfront. I know the value of the dune. My children started planting grass in '62 and have done it ever since, and we've even added grandchildren to this project -- the planting of vegetation. So I did this, and I returned it to the beach. Much to my surprise, all of a sudden, I'm getting an administrative order from the DEP with a fine of \$10,000.

SENATOR SMITH: For what?

MS. SPIEGLE: For returning the sand and restoring the beach. I restored this dune. I fenced it. I (indiscernible) it in such a way as to catch the sand, whether the wind went north or south. And this is out of my pocket. I'm paying for this, not the taxpayers. It was \$10,000. Well, I was shocked. I went and got a lawyer. And of course, my lawyer responded. And once they found out I was going to contest this thing, the fine went to \$5,000 immediately. Well, the preliminary hearing came, and we were surprised. The statement made by their attorney was -- "Well, we're satisfied the dune has been restored. We've offered to cut the fine in half, to 2,500." Well, that's not acceptable to me yet. This is going on for two years. It went from 2,500 to 2,000. Finally, it went down to 15,000 It finally went down to 1,250. And finally they said, make a settlement with us for \$1,000. All right, I said, "Look, I'm not going to say I'll make a settlement, but I'm willing to talk. I don't want to be uncooperative here. I'm willing to talk." So this last offer of \$1,000 came in on a Thursday. The trial was set to take place on the following Monday. What they sent me for the settlement, it took me five minutes to know that if I signed it I would be worse off than if I lost the case. It was no settlement as far as I was concerned. I finally said, no.

Well, the next thing I got -- this is the age of Fax, computers -- you get responses immediately within the hour. Well, why don't you write what you want to do and we'll get together. Well, we did this. And then they tried to say, "Well, if you go to court, it's going to cost you more money than the settlement." Well, I have six grandchildren, one is going to be in medical school this Fall, the other one is going for a doctorate, and I'm thinking, "Well, let's see, two days in court can be another \$3,000,

\$4,000. You pay your attorney from the time he leaves until he gets there." And I'm thinking this would go a long way towards my kid's education, so I said, "Okay, I'm willing to do this." So the court case gets called off temporarily and the settlement -- and we make a -- we settled. But what I submitted -- and this is the surprising thing about it -- was we signatured every page. Every page that went to the DEP had my signature on it. What came back was an entirely different document. It took me three hours to even organize -- in the age of computer we have copy, move, delete. There was no reason to confuse this, for me not to know what came in. The only thing that was constant was the last page from my document, with my signature on it -- was stapled to this document that came.

Now, in all fairness, I must say the change they made was insignificant. It really wasn't important. Had they called me on the phone and said, "Look, we need to insert another paragraph and we'll explain to you why," I probably would have said yes. There was nothing wrong with it. But the approach that was taken and the misuse of the document that was sent to me, I was very appalled and I didn't think it was right.

SENATOR SMITH: The first part of your comments that the--MS. SPIEGLE: Beg your pardon?

SENATOR SMITH: The first part of your comments -- said the beach replenishment was done in such a way that adversely affected your property, I think, was right on point for this hearing. The interaction with the DEP, which sounds like kind of a nightmare to me, is something that I don't think we can -- we, as a Committee, can address.

Is the DEP still here? Guys, would you meet with this lady and see if there's some resolution here? The picture that's being painted is not a

pretty picture. We, I don't think, can do much about what's going on, but we can hopefully direct you to the right person.

Do you have anything else on beach replenishment?

MS. SPIEGLE: Well, our Mayor is saying what they have done. But I question-- I'm not against beach replenishment.

SENATOR SMITH: Right.

MS. SPIEGLE: I just don't think this program, as it affected me, is the way to go. I think there needs to be more input. They need to talk to the oceanfront owners. They need to listen to them. And then they need to come up with a program that's acceptable. Because I'm sure there is a way.

SENATOR SMITH: I appreciate your comments.

Would you pass the microphone over to the next lady?

Ma'am, would you identify yourself?

DOROTHY JEDZINIAK: Yes. I'm Dorothy Jedziniak, my husband Ted (indicating), we're from Ship Bottom, Long Beach Island.

SENATOR SMITH: Thank you.

MS. JEDZINIAK: I'm going to start by saying this is a flawed project, and here is why we feel that way -- and a group of our people who are with us feel.

SENATOR SMITH: It's a what kind of project, Ma'am?

MS. JEDZINIAK: Flawed.

SENATOR SMITH: Oh, flawed.

MS. JEDZINIAK: This beach replenishment -- flawed. I'm sorry, sir, if I'm not clear. I'm not fancy like all your people that spoke

before us. I'm not knowledgeable like they and show pictures. We're just like, you would call, Mr. and Mrs. John Doe.

SENATOR SMITH: Right.

MS. JEDZINIAK: We're average people.

SENATOR SMITH: Is this a project that is proposed for the future--

MS. JEDZINIAK: Yes.

SENATOR SMITH: --or it's already been done?

MS. JEDZINIAK: It is -- I'm from Long Beach Island. As these two gentlemen before said.

SENATOR SMITH: Okay.

MS. JEDZINIAK: We recognize the need to protect this priceless natural resource. And we support the project locally and at the State level. But I'm sorry, this is a flawed project in this respect: First of all, the costs. What was done six years ago -- an estimation -- we all know salary, material, products, hourly wages have all gone up. I don't think their estimate of the \$71 million is applicable today. I think that it will cost a lot more. And as it was mentioned before by these two gentlemen, there's no guarantee with the money. It is doled out in increments of \$5 million and so on.

The second, as this lady said, there has been no compromise. There has been no talking to the people of the beachfront owners. When we bought there, we knew we took a risk. Everybody on Long Beach Island knows. We're not God, we cannot control storms. If I got this Category II, we better get off the island if we can. We have no meeting. We have property rights. Eighty percent of our property is dune. We take very good

care of it. We belong to environmental groups. We took part in a Rutgers study on beach and waves. So we do care. We're not a bunch of spoiled rich, pampered people. Okay?

SENATOR SMITH: No, no, no. Nobody takes that position.

MS. JEDZINIAK: Okay.

SENATOR SMITH: But let me ask you a question, Dorothy.

MS. JEDZINIAK: The second is--

SENATOR SMITH: Dorothy, Dorothy, let me ask you a question. You are familiar with this project, obviously?

MS. JEDZINIAK: Very much so, sir, to my limited layman's knowledge.

SENATOR SMITH: I understand that. If you could change it, how would you change it?

MS. JEDZINIAK: I would take the word *perpetuity* out. They are taking my land forever. Will I give them a limited license, perhaps a year or two, put their sand, take their money? Let's face it, money is at the bottom of all of this.

SENATOR SMITH: All right. You're subject to -- your property is subject to condemnation, is that what's going on?

MS. JEDZINIAK: I don't know, sir. There's been so much vague reporting -- lies, contradictions, and so on. And none of our viewpoint has gotten to the press. The meetings we've gone to, the press was not there. So, no, first we hear Connors says, "No," they can't afford it. The next is a threat. The next is a deadline. Then the deadline was a soft one. Next, we hear 100 percent righting is necessary on these

easements. The next we hear the compromise with 66. So that's the press we've gotten, sir.

SENATOR SMITH: All right.

You have an opportunity here, Dorothy. The head of the program in the State is here.

MS. JEDZINIAK: We've spoken to them many times. They will put nothing in writing. And most important, this easement they want us to sign is assignable. So once we sign, it's no longer our property -- 80 percent -- and everyone to my right and left. But they can do what they want with it. And we suspect, with the insisting on toilets and parking lots -- I won't see it, perhaps, sir. Maybe my children might even see a boardwalk. They laugh at it. They deny it, but they won't put it in writing -- on the structures not permitted.

Thank you, sir.

SENATOR SMITH: Well, one of the things that -- and I'm not practicing law here -- but when you do an easement document, you want to make sure that your attorney makes certain that the easement is carefully crafted--

MS. JEDZINIAK: We are doing that, sir.

SENATOR SMITH: --so it's clear what can be done and what can't be done. You want to protect yourself.

MS. JEDZINIAK: Except we've done that, sir. But it hasn't gotten to the press. And I thank you for this opportunity and this meeting, which by the way was a very guarded secret. We called up several Freeholders that didn't know it was happening. We went to your courthouse. We went everywhere. Finally, we found you, thank God. And

I thank you again for the chance for giving us a little opportunity of what we feel -- homeowners, not spoiled rich people. And if people on Long Beach Island -- what we really need with this money is a second bridge. Because we cannot get off that island. There's floods, and the bay comes first.

SENATOR SMITH: I appreciate the comments.

MS. JEDZINIAK: All right. Thank you, sir.

SENATOR SMITH: And listen, one of the things that this hearing has persuaded me is that there is an awful lot of good thinking down here that we in the State Legislature don't get enough of. And I'm thinking about making this an annual hearing so that every August we're going to have a chance for the people in Ocean County and surrounding areas to come in and talk to us about some of these issues. Because, quite frankly, a lot of the things that people said today were eye-opening and very, very interesting. So I want to thank you for coming.

If you'd pass the microphone to the next gentleman, we can find out--

MS. JEDZINIAK: May I just make one comment?

SENATOR SMITH: Sure.

MS. JEDZINIAK: That in New York, the Nassau County, Long Beach, rejected -- 500 people rallied and rejected their program. They certainly don't have a good reputation in New Orleans, and admit publicly in the papers that those levies should have been higher. I say come and put levies on our Long Beach Island for the bay.

Thank you.

SENATOR SMITH: Thank you for your comments.

Yes, sir. Would you identify yourself?

JEDZINIAK: My name is Ted Jedziniak. My wife and I have lived in Ship Bottom for four years. In fact, we were the last person to close the gap in Ship Bottom that existed between the dunes. We also, when we had a hotel there, you walked close to the front porch and you walked onto the beach. Well, to make a long story short, we respect the dunes. Most of our land is out there. And I don't understand, in this country, that I have to be summoned and to be brought before a judge nine -- four times because we're in there planting on our dunes. We're trying to protect ourselves. And they're applying all sorts of -- even political pressure, or something like, that which is not right. I have a right to be happy. I fought in World War II, and I didn't fight for these guys to take the land from me. And that's the way I feel about it very strongly. Into perpetuity is not in our book. If you want my land, and you want to -- need it, we're willing to give you a license. But you're not just going to come over and take it. And then when I want to live on it, I got to be harassed. And I'm tired of it.

Thank you very much.

SENATOR SMITH: Thank you for your comments.

If you'd pass it that way. The other microphone, sir. (referring to PA microphone) That one just records for the transcript. That's the one that amplifies your voice.

VICTOR GROISSIER: My name is Victor Groissier. I'm also a resident of LBI. My wife and I have lived there 40 years and have raised our three children there. We feel -- just as our neighbors here feel -- that we have been not truly represented. The edicts, and the papers, and the

statements of the ACE, DEP, and the municipality were really thrown out to us to be heard sometime in the Winter. And most of us come down to LBI for the Summer. So to come on a Wednesday afternoon at 4:00 or 2:00 on a Thursday is really a flaunting of people, and successfully keeping them from representing themselves properly.

Additionally, we also feel bad as to how we've been treated. There have been any number of changing dates. If we don't get all the signatures from homeowners along the shore by June 15, the program won't go forward. And that changes for another month or two. It's also a changing field. Also, we're told that if the populace does not totally agree -- those lining the shore -- we can't go ahead to do any type of beach replenishment. Then it changes to 66 percent. Now we don't know where it is. We're told that we need everyone to agree to sign an easement. We couldn't really go ahead. And now we hear, "Well, if four blocks of easements have been signed, maybe we'll do that pocket of replenishment." We're still seeking answers.

SENATOR SMITH: Well, you have the top guy in the program here. You might want to talk to him.

MR. GROISSIER: Okay.

SENATOR SMITH: I mean, this is an opportunity. What was the gentleman's name again? Dave Rosenblatt.

MR. GROISSIER: A number of us have spoken to Mr. Rosenblatt.

Now, what would we do if we could change it? We would not necessarily accept the statement that was made -- perhaps it was the ACE, I don't know, we walked in -- that most of the time it's been a success. But

many times, the ACE, unfortunately, has been a failure. And the U.S. Senate recently talked about considerable boondoggling; over-expenditures of funds, funds that were not necessary; and the projects that were not necessarily the most important; and also alluded to failings in New Orleans before the flooding. And as a consequence, the U.S. Senate, just a few weeks ago, you probably know, voted to have all projects over \$40 million inspected by a review committee. Forty million dollars to be given to the Army Corps of Engineers.

So there's concern. There's an investigative reporter for the Washington Post who went around the country and said that many of the projects were not as promised. Now, the Army Corps of Engineers, to us, is like motherhood. We want the beach replenishment. We want to have the beaches strengthened. There's no doubt about that. We are not in a position of coming up against what's been proposed now with a negative attitude. Ours is very positive.

We are concerned also that as the berm from the dunes meets the shore -- I'm told that there has been some increase in drownings and spinal injuries. Because if it comes down at an angle, such that it would not be favorable to swimmers, a swimmer can take a step off the beach and go down two feet, two steps and be down to four to six feet. And with the waves crashing, have the bodies hit against the packed-in sand there, particularly bad for older people and children. We're concerned about safety.

We're concerned about recreation. The beaches are beautiful. They're probably the most beautiful beaches in the world. To push us out another 250 feet means that people will have to struggle to get to the edge

of the beach. We are concerned about the sand. The sand in Monmouth beaches is brown sand. It's not silky as the sand in Long Beach Island. That's after the replenishment -- Monmouth County after replenishment. We'll tell them. "Don't worry." Because of the "don't worry, brother, we'll take care of you," we need better evidence of the type of sands that are being shown to us.

The funding is a genuine concern. Because after building these high dunes and these big berms, it has to be replenished. We don't know what the government is going to do in terms of funding in the future. We have no idea. Nor are any statements made or any "guarantees," or even a statement that we can guarantee so the population knows what's going to happen. So the funding issue is of concern.

In one of the stretches of our beaches, we're told that \$400,000-plus was spent to enforce the beaches about eight months ago. We never knew about that. That's a huge amount of money. And if you take that money and you take that space -- that \$400,000 was used to replenish -- and divide it into the amount of space that the replenishment project would require, you're up to \$200, \$300, \$400 million, using just this particular expenditure for this particular space and time.

SENATOR SMITH: And actually, if you remember the testimony earlier from the gentleman who heads the program, the way this is funded is crazy.

MR. GROISSIER: Right.

SENATOR SMITH: They do a couple of million dollars at a time. They have to get the workers back. And it costs extra millions. It sounds like a very silly process.

MR. GROISSIER: So we're asking for Mr. Rosenblatt, the other heads, to meet with us over a period of time. They've been very nice, Mr. Rosenblatt is -- his telephone calls, etc. -- but I don't know that we all agree with what's been said back and forth, and we would need better-And I have to tell you, that in Harvey Cedars there has been harassment of those beach owners who have not signed the easement.

SENATOR SMITH: Who's harassing them?

MR. GROISSIER: The municipality. One item of harassment: Those people who did not sign, as of a certain time -- it could have been two months ago, a month and a half -- had their names posted in City Hall as people who did not sign the easement. There have been telephone calls -- harassing telephone calls from neighbors saying you're rich and you're spoiled, etc. It's just foolish. It's senseless, but there was harassment. There are any number of telephone calls from City Hall or from people who believe in what City Hall is doing.

SENATOR SMITH: The only suggestion I can make there, you should go to the a township council meeting and indicate this is-- Assuming the facts that you say are absolutely correct--

MR. GROISSIER: Sure, I understand.

SENATOR SMITH: --and there's no other facts, somebody should indicate that's pretty outrageous and expose it for that particular tactic. In any case, anything else on beach--

MR. GROISSIER: I'll just end.

SENATOR SMITH: Please.

MR. GROISSIER: Again, the easements themselves, as a document or a position-- I'm not a lawyer--

SENATOR SMITH: Right.

MR. GROISSIER: --but any number of lawyers who have been asked about that document have said it doesn't give you any specifics. I would never ask a client to sign any kind of a document -- if they were selling their house or buying their house, etc. It's empty. It doesn't talk about when does this start, it doesn't talk about the funding or the problems with funding, it doesn't address most issues that you would want to know about.

SENATOR SMITH: I appreciate your comments.

And taking the latitude all politicians have, there were some people that we actually invited to speak on beach replenishment. The last panel that we're going to invite up on beach replenishment, because we really do have to go to the fisheries issues -- Dr. Stewart Farrell, from the New Jersey Marine Science Consortium; Dr. Norbert Psuty, from Rutgers; and the New Jersey Shore Partnership, Peter Reinhart. If the three of you would come up, I'd ask that you tell us about anything that we haven't heard about with regard to beach replenishment.

Let me thank the citizens for coming in. You were very, very helpful.

MS. JEDZINIAK: Sir, may I ask that-- All those that you mentioned, our Mayor, our Council, these two gentlemen -- they are nice gentlemen -- but nothing. They "yes", they "no." We're liable for any accidents. We get nowhere, sir. Absolutely nowhere. They don't talk. They come back to the original, as this gentleman said. There's no bending, there's no compromising, there's nothing.

MR. JEDZINIAK: And for the record, we've been to every town meeting, and we're not too welcome.

SENATOR SMITH: You guys are in the same town.

MR. JEDZINIAK: Thank you.

SENATOR SMITH: You're in the same town?

MS. JEDZINIAK: Ship Bottom, yes.

SENATOR SMITH: Everybody is Ship Bottom? Okay.

Dr. Ferrell, Dr. Psuty, and Mr. Reinhart.

I said three, I got four. Oh, okay.

Guys, I'd ask you to just focus on what we haven't heard.

NORBERT PSUTY, Ph.D.: Right.

My name is Norb Psuty. I'm a professor at Rutgers University. I'm going to just thank you very much for this opportunity to make a presentation and discuss a couple of things. I'm a scientist interested in sort of the general, long-term condition of our shoreline. And I urge the Committee to sort of take a broad view, as well as the immediate view, of the changes that are taking place. I'm just going to reiterate a few things, and I'll try to be very, very quick.

It was said several times that the shoreline is not receiving any new sediment, so that basically everything we have, right now at the coastline, is at a state of being sapped away slowly. Every storm takes something away. There are no major rivers bringing sand to the shoreline. The result is we have a finite amount of material there which is slowing leaking away. That being said, the only way you can sort of counter that is by returning some of the sand, which is what you're doing in a form of

beach nourishment. It's a kind of redepositing something in the checking account, and you're trying to maintain the balance.

The issue is that the erosion, the natural erosion, the natural loss is continuous. It's not going to change. If anything, it's going to accelerate. Therefore, your future -- the future of any kind of sediment management of the shoreline is more and more sand over shorter intervals, and probably at a higher cost because you're going to exhaust the easy sources first. And the result will be that 10 years from now, when you have to look for more and more sand, it will be into deeper waters, farther areas, higher costs for the technology. Because in all intents, there will be an increase in costs in pursuing the beach nourishment.

I think that the situation -- the global climate change, that has been introduced here, is a very important one, I think, both in terms of changing dynamics, in terms of increasing the amount of energy along our coastline, in terms of sea level rise. The sea level has come up about 16 inches in the last century. The same data that shows 16 inches in the last century, say 24 inches in the next century. So we're talking about an encroachment of the sea upon our beaches, an encroachment of the sea upon the land that exists along our shoreline. I think it is a very important variable -- to think that there's something that, once again, takes into account the long-term changes.

We also think that we need a little bit more science standing behind some of our decision making along the coast. I think we have to do a little bit more in terms of gathering information about the wave climate. I think we need some instruments out there. I think we need some measurements. I think we need to be able to model the results of the longterm data for wave climate. I think we can model where the sediment is going, because there may, in fact, be locations of sediment sinks that may, in fact, be retrievable. I think we ought to get into the business of managing our sediment in the form of returning it -- that there may be locations we can recycle sand. I think there are places where we can actually improve the transfer of material -- the long shore transfer, the maintenance of the sediment in our near shore zone. I think some of our structures, for example, now actually disperse sediments farther out to sea, and they don't come back. I think we ought to try to get a little bit of the sediment bypassing at inlets.

I think if you look at the history of structured inlets along our shoreline, you'd find one shore has a hell of a lot of material, the other one is suffering erosion. We should be able to do something about that. We should be able to transfer materials from the positive side to the negative side. That's something that's within our capability -- to maintain sediment flow along our shoreline.

A couple of items, I think, as a Committee -- I think you should consider, as well, is the bayside of our barrier islands, the bayside of our shoreline of our state. They're suffering the same kind of changes that we see along our ocean shoreline. There is erosion going on. There is affect of sea level rise. Can you imagine another two feet of sea level rise along most of our bayside communities? They won't take that very much. That is, they will undergo a lot of structural changes associated with it. I think, as a Committee, you should certainly think about that longer term effect of shoreline displacement associated with rising sea level over the foreseeable future. You don't have to wait a century to see a two foot rise. You could

wait a couple of decades and see a half-a-foot rise, and you could see that that's going to change a heck of a lot of the conditions that are taking place along our shore.

Let me say, as a scientist, I really look to see the measurements, the gathering of the data that help us in terms of our decision making along the coast.

Thank you.

SENATOR SMITH: I appreciate the comments.

Yes, sir.

S T E W A R T F A R R E L L, Ph.D.: I'm Dr. Stewart Farrell, from Richard Stockton College, Coastal Research Center. I would like to bring up the fact, to the Committee's interest, that for 20 years the Coastal Center has been collecting data on the changes, conditions, and movement of sediment along the New Jersey coast at 100 different locations -- at least one per coastal community, and many of the larger communities have as many as four -- cross sections that go across the dune, across the beach, and into water about 15 to 20 feet deep. This information is funded, presently, through the public law of 1994 creating the stable funding of the New Jersey shoreline, supervised by the Office of Engineering and Construction, Mr. Rosenblatt's shop.

The information that we've been collecting since 1986 has shown conclusively that storms control beach erosion. The seasonal changes, back and forth, from the Summer accretion of material on berm to mild Winter storms taking it away and carrying it offshore, seems to come out nearly dead even. I concur that there are trickled down losses at most of the sites, although not every one.

The other piece of information that's come out of this research is that inlet shorelines are the least stable, with the exception of things that have solid rock jetties. So unjettied shorelines and inlets tend to be the least stable. The centers of barrier islands and the long stretches in between are more stable.

Of the reaches that have been focused on by the Army Corps -and one thing is an accommodation to the Division of Engineering and Construction -- is that 20 years ago they decided to look at New Jersey in the form of island reaches. They defined the coast in segments -- Sandy Hook down to Asbury Park, and actually Deal Lake; Deal Lake down to Manasquan Inlet; Manasquan Inlet -- I meant Shark River Inlet, sorry --Shark River Inlet to Manasquan Inlet was a reach. This all moved forward in the 1990s and late 1980s into the Army Corps associated projects. These projects were not brought to the state with no state input. The State was proactively, dynamically, seeking to partner with the Army Corps to gain that financial leverage that 65 percent funding gave. And so, all of the attempt-- Initially, the Legislature provided bond funding to do beach nourishment. We figured, over years of time, this was less desirable than pay-as-you-go by using the Real Estate Transfer Tax revenues. So the \$25 million is heavily leveraged by getting 65 cents for every dollar that the State puts up. And between the State's and the local, I look at it this way: For every million dollars of a project, the local municipal share is \$87,500 under the current funding formula. That's a heck of a bang for the buck, in terms of these large-scale projects.

And the other thing that our data has shown is that the Monmouth County project had naysayers that said, "Five years, it's all

going to be gone." Well, 12 years later, 93 percent of the sand is still right where they put it -- on the beach, along the shoreline. Distributed, yes, but functionally still there, as a beach, protecting the infrastructure it was designed to do so.

The changes to some places like Sea Bright, Monmouth Beach have been profound. In 1994, it was a rock wall with eight feet of water in front of it at low tide. The only people very unhappy about that were the surf fishermen who used to stand on the wall and cast into the ocean directly from the wall. Well, now it's 300 feet of sand to cross to get to the shoreline, and the beach has prevented overtopping of the wall, flooding, and other such problems that had occurred in 1992. That was the last storm.

Now, one thing is true: Since 1998, there have been no disaster declarations for storm damage in the State of New Jersey. It was a partial declaration for Atlantic and Cape May County in March -- oh, actually it was declared in March, but the storm was in February of 1998 -- a pair of back-to-back northeast storms.

SENATOR SMITH: But, Doc, are you saying that that's because of our beach replenishment, or are you saying we got lucky in storms?

DR. FARRELL: Well, the lack of storms has been very important. The beach replenishment is giving us the edge. If we do get a Category III hurricane make landfall, or a replay of the 1992/1991 perfect storm events, we're much more ready in that 51 miles of shoreline, that Mr. Gebert was talking about, than we are elsewhere.

SENATOR SMITH: So in a nutshell, you're telling us we are getting a pretty good bang for our buck in terms of property protection.

DR. FARRELL: We are getting a good product for our money. We're getting a stable shoreline in the reaches that have been taken care of. And right now, I'm categorically saying that the most vulnerable section of the New Jersey shoreline is Long Beach Island, without a doubt.

SENATOR SMITH: Because?

DR. FARRELL: Because the beach is narrow -- 30 to 50 feet. The dunes vary in height from about 10, 11 feet to as high as 20 feet, but they're artificially perched in front of the properties. They're narrow and tall. They're not natural in the sense that they grew over centuries or even decades of time. They were bulldozed into place, planted, and they sit there as a token defense to a fairly narrow--

SENATOR SMITH: So if you were the guy making the priority decision about where beach replenishment projects should be, what the next one should be, it should be at LBI?

DR. FARRELL: Long Beach Island should be built tomorrow. It should be started tomorrow, that's how--

SENATOR SMITH: Strongly you feel about it.

DR. FARRELL: --serious the situation is.

SENATOR SMITH: And the other comment you made about the inlets, where do they stand? I know that one or two of them do have the gabions or the reinforcement.

DR. FARRELL: The only un-- Let's see. The Sportsman's (phonetic spelling) Inlet has no structures whatsoever. The Hereford Inlet has a seawall on the North Wildwood side that's just been completed under

a State and Federal funded project. Most of the rest -- of course, Shark River, Manasquan River, and Barnegat Inlet are fully protected by structures. One of the things of that new Barnegat Inlet jetty, that was talked about, is that the largest accretion of sand in New Jersey -- 2,400 feet of shoreline advance, seaward, occurred right at the jetty, as sand piles in behind the new jetty construction. So, in some places, this shoreline has advanced by hundreds and hundreds of feet as a result of manmade changes.

Now, Barnegat is not part of the Long Beach Island project, because they have plenty of sand. And in fact, many have suggested, "Well, pump it out of there and send it south." But the DEP has rules about disturbing dunes. Anyway, the sediment is available. It should be done.

The easement issues: New Jersey is a high tide ownership state. A private individual or corporation can own to the high tide line in the State of New Jersey, even beyond it if they've managed to acquire riparian grants and other sorts of instruments that allow ownership into the ocean itself. This has not surfaced in the extent that it has on Long Beach Island, or potentially in northern Ocean County, because-- Like, for example, in Atlantic City, Ventnor, most of the beach was wholly owned by the municipality. So easements weren't really an issue. The town had to grant the easement. The easement is a document which allows the Corps, in perpetuity, to manage the beach. That means put sand on it, grade the dunes. The municipality is usually in charge of dealing with the planting of the grass.

So where private ownership includes the dune, includes the dry beach to the high tide line, these easements are required by the Federal side a swell.

SENATOR SMITH: Statutory requirements?

DR. FARRELL: These are requirements. I don't know whether it's statutory, but it's certainly policy requirements.

SENATOR SMITH: Appreciate the comments. They're very, very helpful.

Peter.

PETER S. REINHART: Thank you, Mr. Chairman.

I'm here as the Chairman of the Jersey Shore Partnership. We were the organization formed right after those early 1990's storms. And we're actually the ones that this whole thrust for the \$25 million stable funding-- And we're happy that that's in place. And as you heard from other speakers, it supplies the dollars that support the magic Federal dollars.

I've given copies of my testimony there. And attached at the back is some before and after shots of Sea Bright and Long Branch -- beach restoration that Dr. Farrell alluded to. And you can see the dramatic change that has been made there. And the dates that are on there will further support that it hasn't fallen apart in a few years, as was predicted by the naysayers.

Just a couple of other statistics: Aside from the obvious visual enhancements and benefits to protecting life and property associated with the beach replenishment projects, the economic benefits cannot be ignored. From a return on investment, ROI analysis, the combination of Federal and State dollars of about \$300 million over the roughly 10-year period have

helped the New Jersey tourism industry produce economic value of over \$36 billion per year, of which about \$16 billion alone comes from the four coastal counties, which translates to about \$1.9 billion a year in taxes from those four counties. You cannot dispute the economic value of having good Jersey Shore beaches.

To me, there's no real debate about the benefits of beach replenishment. Even those citizens that are objecting don't disagree with the benefit. It's just the public access issue that's at stake. Our position is, let's get that resolved. Because no one benefits by postponing these projects. Again, as Dr. Farrell report at Long Beach Island, waiting until two days from now may be too late.

In conclusion, we cannot take the *shore* in Jersey Shore for granted. It would be a shame for our current generation, and future generations, to be deprived of the memories that we all have of our Summers spent at the Jersey Shore. Our residents who live on and near the shore, those who visit the shore, those whose livelihood depends on the shore, and, frankly, our State tax coffers depend on having the shore in Jersey Shore.

Thank you.

SENATOR SMITH: We appreciate the comments.

WALTER KIMM: Mr. Chairman, I just ask for the chance to speak.

I'm Walter Kimm. I'm a former councilman in Spring Lake for four terms, council president. I've been involved in the partnership of the American Shore and Beach Preservation Society. And I know about the

replenishment, because we got it. So I'm here to answer some misinformation that's gone on.

Replenishment works. It has helped magnificently in Spring Lake. It is safe. It is more than safe for swimming, surfing, diving, all recreational sports. The misinformation out there that it causes injuries is ridiculous. And I invite the Committee to come to Spring Lake, and I'll walk you through it.

The whole issue about beach replenishment is infrastructure. It's infrastructure. The levies were infrastructure, the beaches are infrastructure, dredging is infrastructure. This is not just about oceanfront owners. It's about everyone behind them, and the economy behind them. It's about the economy a mile away from here. It's just not about an oceanfront house. It's about evacuation routes. This project has worked magnificently. And there's a campaign, always, about misinformation.

The sand is very good. The sand has held up, especially in hot spots.

And access: I just want to let the Committee know access is an issue in a lot of places, is -- Summer at the Jersey Shore comes to maybe 10 weekends -- 10 busy weekends -- 20 busy days -- tradeoff a lifetime of protection, of generations who can go back to that oceanfront house, or the house six blocks back. So I just want to speak as a witness that it works.

And, also, statements were made here-- We're the envy of the country. We're not the laughing stock. California, Florida, the Carolinas, Texas, New York, New England-- They look at New Jersey and wonder how well we've done with our beach replenishment projects.

SENATOR SMITH: I thought the \$180 million figure was pretty impressive.

MR. KIMM: It's impressive. And the other figure here, when we talk about \$70 million for a reach-- A house at the Jersey Shore, within five blocks, is \$500,000 average. That's 140 houses. What do you protect out of a reach of 70 million? If the banks and the insurance companies knew people didn't want this, I would think there would be a riot, or no more mortgages given or insurance. This is a bigger issue than one person in one house. It's to protect the long-term interests of our coast, our economy, and our way of life.

Thank you, Mr. Chairman.

SENATOR SMITH: We appreciate your comments.

And we are now switching into a fisheries mode.

I'd ask that the--

BILL WOLFE: Can I slide in and say one thing on beach replenishment?

SENATOR SMITH: If you can do it in 30 seconds, Bill.

MR. WOLFE: Thirty seconds, you got it.

SENATOR SMITH: Just identify yourself.

MR. WOLFE: Certainly.

My name is Bill Wolfe. I'm the Director of PIER. I want to make two very quick points with respect to whether this is a unanimous assessment of the ethicacy of beach replenishment and whether or not it's misinformation or not.

From DEP's Federal Postal Zone Management Assessment Report, I want to read a perspective from DEP, reporting to the Federal

government, that you're not hearing today, because you're hearing from the engineering section.

The Department views the beach replenishment issue in a multiple-faceted way. And it's perceived and written down as an "impediment." And I will quote a section of that report for the record. "Many parts of New Jersey's densely populated coastal areas are highly susceptible to the effects of the following coastal hazards: flooding, storm surge, episodic erosion, chronic erosion, sea level rise, and extratropical storms. Reconstruction of residential development, and the conversion of single-family dwellings into multi-unit dwellings continues in hazardous areas. The value of property at risk is increasing significantly. With anticipated acceleration of sea level rise, increasing storm frequency and intensity, the vulnerability to the risk of coastal hazards will not abate. It will only become more costly."

In concluding that section, the Department talks about impediments to the reform to prevent these hazards, to mitigate these hazards, and take people and property out of harm's way. And they conclude, "All of the impediments to meeting this 309 programmatic "objective that appeared in the last" -- the 2001 assessment -- "remain. These include lobbying efforts of special-interest groups, legal challenges to DEP permit decisions, provision of flood insurance through the National Flood Insurance Program, and 'public perception that large-scale beach nourishment projects eliminate vulnerability to coastal hazards."

So the mere presence of this program creates a false impression in the public mind that it's safe to locate and develop on the beach. And that's impeding sound public policy in land use and coastal zone management. So it's not misinformation. It's a different view of the program.

The second point I want to make, with respect to New Jersey and the national picture is, when I went to college in the '70s, my first environmental planning course that I had was a-- The first book we read was a classic by a guy named Ian McHarg, who ran a planning program at U. Penn. The book was named "Design With Nature." And it used New Jersey's shoreline as a case study in how not to manage a shoreline.

Thank you.

SENATOR SMITH: Thank you, Mr. Wolfe.

We're going to go to fisheries.

Beach replenishment -- Tom Fote.

Tom.

TOM FOTE: I had basically asked to speak on beach replenishment also, because the fishermen are complaining about the access.

I mean, we were promised all kinds of pie-in-the-sky when we basically did the beach replenishment in northern Monmouth County -- that they would put in parking lots, basically make access to the fishermen. And they didn't do that.

You basically say, "Yeah, you come over." You can't park your car. They ticket you all the time. You put signs at the end of the street like they did in Deal Lake over the years. That's not beach access.

And I agree with the Commissioner, Lisa Jackson, on what she's trying to do in Long Beach Island. If you're going to spend the public's money-- I live on a lagoon. If I have to -- my bulkhead caves in, I have to pay for it. I'm not asking the State to pay for it. As a matter of fact, I've

got to pay for the permits that are responsible for rebuilding that bulkhead and everything else that's involved. If those people want the beach replenishment -- and we have never really been a supporter of beach replenishment because of the affect it has on fisheries-- If those people want beach replenishment, then they need to basically give the public access. And they need to sign the waivers.

We get promises. One year goes, two years go by, and then all of a sudden the signs come back and, basically, we're denied access to those areas. If you want to spend our money -- that's public money -- we want to have access to those beaches.

SENATOR SMITH: Thank you, Tom.

All right, we're moving into the status of our fisheries.

Guys, can you say it in 30 seconds, because we have people--

And I appreciate the fact that you came.

UNIDENTIFIED SPEAKER FROM AUDIENCE: Can I stay until the end and then speak? I took the time to come up.

SENATOR SMITH: Sure. We'll take you at the end.

UNIDENTIFIED SPEAKER FROM AUDIENCE: Thank you.

SENATOR SMITH: Yes, sir.

JACK FULLMER: I'm Jack Fullmer, Legislative Committee Chairman of the New Jersey Council of Diving Clubs.

SENATOR SMITH: Right.

MR. FULLMER: I don't know, in 30 seconds, what I'll be able to say here. But in 1997, we got involved with the beach replenishment project, because one of these large dredges destroyed a shipwreck off the Jersey Coast. I was one that dove on that wreck afterwards. And it turned

out that dredge was outside of the borrow area. These are, like, 500-foot vessels.

SENATOR SMITH: Right.

MR. FULLMER: And they were outside the borrow area. And there was another wreck inside that borrow area. They put, like, little grid marks down. And they tell them to stay out. And that dredge just drove right on through that.

So if you think that they're going to respect the borrow areas and stay away from the shipwrecks, you're wrong. The jetties and, what we call, *beach wrecks* are located right along the shoreline. And they were the-They're going to be buried. There's at least five of them between Manasquan Inlet and the Barnegat Inlet. There's probably a lot more.

SENATOR SMITH: You're asking that when DEP and Army Corps does this, they try to be sensitive to divers' needs and avoid the shipwrecks, correct?

MR. FULLMER: That's correct.

I doubt if it's possible to avoid them in the sense that even if you don't dump the sand on top of them, the natural processes will cover them anyway.

SENATOR SMITH: It flows.

Well, you know, maybe you should say quid pro quo, get me another wreck. (laughter)

MR. FULLMER: The Abandoned Shipwreck Act guaranteed recreational exploration of shipwrecks. And I'm just a little curious how burying them with -- with 10 feet of sand over them is going to guarantee that.

SENATOR SMITH: I understand your point. And I agree that does not foster that diving experience.

I'm PADI certified, by the way.

MR. FULLMER: Okay. We're not against beach replenishment projects. We're against the large-scale projects that have such an environmental impact, especially on the shipwrecks and the jetty.

Thank you.

SENATOR SMITH: We appreciate your comments.

Okay.

Moving into fisheries, I'd ask the panel to come forward of Dr. Weinstein, from the New Jersey Marine Sciences Consortium; Mr. Powell, from Rutgers University, from the Haskin Shellfish Research Lab; our DEP expert, Mr. McCloy; and then the king of fishing, Tom Fote. If you guys would all come forward, maybe you can tell us how our fisheries are doing in New Jersey.

Tom, I think I'm going to save you for last on the panel so that you get a chance to agree or disagree from a recreational fishing point of view.

And I see John Hazen is here.

John, you can organize the batting order.

JOHN HAZEN: Thank you, Mr. Chairman.

I appreciate it, and always look forward to being in front of you, and seeing Senator Ciesla and Assemblyman Wolfe.

With me is Tom McCloy. He's the Administrator of the DEP's Marine Fisheries Administration.

And I just wanted to kind of give you an overview to start off. The benefits of maintaining a healthy, vibrant fisheries are--

SENATOR SMITH: Oh, we're there. We believe in a healthy environment for fisheries.

MR. HAZEN: Right.

SENATOR SMITH: Tell me about how our fisheries are doing in New Jersey.

MR. HAZEN: Okay.

Well, let me turn it over to Tom to give you an overview on the--

TOM McCLOY: I think there's prepared testimony that Mr. Hazen has provided to you to look at, at your leisure.

But in the interest of time, just to give you an overview-Generally speaking, most of the marine fish that we manage in the State of New Jersey are managed on a coast-wide basis, or at least a regional basis. And in order to do that, we do it through the Atlantic States Marine Fisheries Commission, which includes representatives from all the states from Maine to Florida. There's also the Mid-Atlantic Fishery Management Council, which is the Federal council for our (indiscernible) New York to North Carolina. So there's a lot of interaction between these different bodies at different levels. Our staff is involved at all levels of these organizations in order to try to collectively manage the species based on the best data we have available for fisheries management.

One of the issues that comes up all the time -- and if you've been reading the papers recently -- and I'm sure Mr. Fote will probably refer to it when he gets the chance--

SENATOR SMITH: Me, too.

MR. McCLOY: --is the Summer flounder issue.

SENATOR SMITH: I went out and I caught 10 flounder. I couldn't keep one.

MR. McCLOY: And this is probably a rather significant year for that. But these kinds of controversies erupt with all species, all the time. And a lot of that has to do with the interpretation of the data, or lack of data, in some cases. And when you don't have the science behind what you want to do, or the interpretation is -- the science is such that the interpretation can be many different ways, it makes it much more difficult to accomplish the objectives.

SENATOR SMITH: Well, let me ask you this question. Is it your view that we don't have the science necessary for a good decision to be made?

MR. McCLOY: Well, yes and no. It could always be better. But there are certain areas where some of the science -- and I use science loosely here, because there are surveys and things like that. But there are some areas where the science could be vastly improved.

Just as a real quick example, there's a national survey called the Marine Recreational Fisheries Statistics Survey. It's a survey that's used on coasts to determine how many fish fishermen catch of what species. And then they take that number, essentially, and apply that to the quota you've been reading about in the paper, and determine whether a state has overharvested their quota for a year, or underharvested. So it ultimately then results in the regulations that you have to work under.

SENATOR SMITH: All right.

With regard to the Summer fluke-- And I'm reading the *Asbury Park Press* or the *Home News*. They have that section on fishing that they put in one day a week, which is -- I find to be fascinating. One of their writers said that the biomass for fluke has increased dramatically, but it's not quite at what the Marine Council would like to see it. And so now there's a discussion of raising the size of the Summer fluke -- the prohibition about taking it--

MR. McCLOY: Right.

SENATOR SMITH: What do you believe to be the truth about the population of fluke off the Jersey Shore?

MR. McCLOY: Well, we have to say that the population of fluke is improving. It's not just-- It's not improving as fast as the plan calls for. And I believe that biomass, right now, is about half of what it's supposed to be come 2010. So, in order to get there, and what's being proposed by the National Marine Fishery Service, is a very restrictive quota for 2007.

SENATOR SMITH: And what is the proposal for 2007?

MR. McCLOY: It's like 5 million pounds.

SENATOR SMITH: How much?

MR. McCLOY: Five million pounds, in round numbers. It was 23 million pounds this year. This is coast-wide.

SENATOR SMITH: Which would mean what size fluke would be-- It's 18.5 inches now, right?

MR. McCLOY: The specific measures would be different, depending on what our state is now, and where they have to go. This also includes the commercial-size things, also. So 5 million pounds for a

commercial and recreational fishery is -- Summer flounder -- from essentially North Carolina to Massachusetts, is not a lot of fish. And that's going to have some severe consequences, both socially and economically, I think, for New Jersey; but other states, as well.

SENATOR SMITH: And how far along is that rule?

MR. McCLOY: The jury is still out. And Mr. Fote attended the meeting the other day, so he may want to add something when I give him a chance. But the Mid-Atlantic Council recommended a quota of roughly 20 million pounds, as opposed to the 5 million pounds being recommended by the National Marine Fishery Service.

There seems to be some -- have been some commitments at the meeting to take another look at the data, see if there's a different way to interpret it, or if it was interpreted correctly the first time. And I believe we're looking for something in late Fall, early Winter, to try to resolve where we're going to be going for 2007.

SENATOR SMITH: Okay. It's a decision in flux.

MR. McCLOY: Yes, it is, to say the least.

SENATOR SMITH: Okay.

Anything else you want to tell us about the status of fisheries?

MR. McCLOY: Generally speaking, fisheries are better off today than they were 30 years ago, I think. There's a lot more requirements on the State, as well -- all of the states.

One of the things I do want to mention is that through the Atlantic States Marine Fisheries Commission, under Federal law since 1973 -- 1993, all the states are required to comply with the provisions of any plan. And those compliance criteria include things such as implementing

the appropriate regulations, enforcing those regulations, as well as collecting biological samples -- the data we're talking about -- to make these decisions in the future. And it's becoming, for all the states, more difficult to collect all that information because of the number of plans that we're faced with. We have probably 16 or 17 ASMFC fishery plans that New Jersey has an interest in and, therefore, must comply with. And it's becoming more difficult to maintain all of our expectations and to keep up with the requirements of those plans, just because of the amount of work that's involved with that.

SENATOR SMITH: Great. Thank you very much.

Sir, if you would, identify yourself.

MICHAEL P. WEINSTEIN, Ph.D.: I'm Dr. Michael Weinstein, President and CEO of New Jersey Marine Sciences Consortium, and New Jersey Sea Grant College Program Director.

I have a relatively brief statement to read.

But let me just amplify on what your question -- came before.

SENATOR SMITH: Because, you know, we can read the statement. Tell us what you really want to tell us.

DR. WEINSTEIN: Here's what I'd like to say. I'm just trying to pick out some of these facts.

Two-thirds of the world's fisheries are either in the state of overexploitation, or near exploitive levels, in danger of dropping below one-third the quota of healthy. One of the things that we've all learned since the Stratton Commission, and the EEZ, and the build out of our fleets is that we can, relatively easily, overexploit our fish populations.

With respect to New Jersey -- I'm not going to comment on how many fluke should be recorded. That's out of my purview. But what I can say is that the fish do not recognize state boundaries, national boundaries, international boundaries. What happens-- New Jersey has ripples around us -- what happens around us has potential ripples in New Jersey. We all need to be cognizant of that.

Without reading from the statement-- Let me also make this comment, because I carried one of these here. I'm New Jersey Sea Grant College Program Director. This has direct bearing on what I was going to say. Since the inception-- Since we reached national status in 1986, New Jersey has -- New Jersey Sea Grant has awarded more than \$22 million in grants, statewide, to New Jersey investigators on virtually every topic we've heard about today, including fisheries and aquaculture. So we're a player at the table.

If you look at the international numbers, the FAO is talking about a roughly 70 percent increase in the pro capita increase of seafood over the next 25 years. And within that number, about 80 to 90 metric tons will have to be supplied by aquaculture, because the worldwide capture fisheries have essentially stabilized for the foreseeable future. So I wrote this down to make one point today. It portends a relatively bright future for aquaculture.

If we're going to talk about managing fisheries, how does aquaculture fit in? I wrote that as a question. And I've attended many of the aquaculture meetings. New Jersey needs to answer the question of whether aquaculture is right for this state. And what I suggest that we do, as a community -- statewide community -- is take a -- reexamine the

aquaculture plan, perhaps do a feasibility study -- getting down to the cost benefits, the economics, the value, technology transfer, all aspects of whether or not aquaculture is right for New Jersey, including things like offshore aquaculture.

Related to that is-- As the Sea Grant Director, I not only review proposals that our scientists submit to us, but I've served on a multitude of scientific advisory panels because of my own expertise in fisheries around the country and even internationally. And I have to say this, because I'm a Rutgers graduate, as well -- and I can comment very briefly on that. New Jersey must -- has to make a better commitment to higher education to develop far more expertise than we have in our state, particularly in finfish aquaculture and fisheries management, from bottom-up, top-down (indiscernible). Tom Fote wrote a nice article in his newsletter about bottom-up fisheries management.

We have top-notch people in this state. One of them is sitting right next to me. There's another one on this campus, there's another one on that campus. The University of Washington has a college for fisheries. There are many other state institutions, flagship universities like Rutgers, that have whole institutes, critical masses dedicated to-- It makes you much more competitive. You have a synthesis of ideas. And I can give you a statistic. We have these national strategic investment competitions from the National Office of Sea Grant that go out to every coastal university that competes for Sea Grant funds. As a state, we fair generally poorly, I think for the reasons that I'm saying.

When I was a student at Rutgers, in 1969 -- is when I graduated with a master's degree. I believe we were ranked 48th in the

nation in State commitment -- State funding of higher education. I think we've reached the lofty number of -- ranked 42nd in the nation. This is the richest state in the country. Something needs to be done.

SENATOR SMITH: Nolo contendere.

DR. WEINSTEIN: Okay.

SENATOR SMITH: There is no contest on that argument.

DR. WEINSTEIN: Let me just talk a little bit about bottomup management, as Mr. Fote described in his article. We know we can easily overexploit the adults. We know if we manage judiciously, we can be successful. The striped bass is a prime example.

Once again, we do not have the R&D capacity in our university system to look at the affects on habitat alteration -- the nonpoint source pollution we heard about, any other form of coastal impacts on the ability of the shallow water habitats in our back basin along the coast to produce the recruits that successfully become the next generation of adults.

We do good work in that area. I'm one of the scientists. I think I do good work. But, once again, we don't have the institutes to really manage this well in New Jersey.

Thank you.

SENATOR SMITH: Thank you.

ERIC N. POWELL: Eric Powell, Director of the Haskin Shellfish Research Lab at Rutgers University.

The statute that basically governs fisheries management for this state, and the rest of the East Coast, is the Magnuson-Stevens Fishery Conservation and Management Act. It requires, as a goal, that the fish stocks be managed at a biomass that yields the greatest quantity of fish to

commercial and recreational fisheries. It's called *biomass at maximum* sustainable yield. It's a great goal.

The estimate of biomass at maximum sustainable yield is not easy. It's heavily dependent on accurate and detailed databases on fish stocks and landings, and on the development and implementation of sophisticated mathematical models. Unfortunately, the scientific infrastructure was not in place to support this new statutory requirement at its inception. And although much progress has been made since then, every stock assessment, that I've been involved in at least, continues to suffer from inadequacies associated with the specification of the fisheries models used in the assessment, the adequacy of survey and ancillary data to drive these fisheries models, and the increasingly complex regulatory climate --without verification that the regulations imposed are achieving the affects desired. There's too much guesswork and too much uncertainty. And this continues to lead to poor regulations, failure to achieve goals, and precaution that limits fishery yield.

The result of these failures -- everybody has heard about many of them. And I want to emphasize that this is due dominantly to the inadequacy of funding to support the basic science necessary to provide the sophisticated database models required.

Now, despite all this, many of the fish in the mid-Atlantic have been rebuilt to what we think is maximum sustainable yield biomasses. There are a number of very impressive success stories. But that has stretched the limit of the science infrastructure. And climate change now threatens the foothold of sustainability that has been made.

Now, in response to this -- and this is a bright light -- the recreational and commercial industries of New Jersey, recognizing the critical need to fill these gaps in knowledge, have undertaken the task of developing cooperative science programs between academics, and State and Federal regulatory agencies, and the fishing industry. Some of these programs have achieved renown -- and among these are the cooperative survey program for surf clams and ocean quahogs, one of New Jersey's most important commercial fisheries; the cooperative assessment program for the oyster industry in Delaware Bay -- it involves us and DEP; the new multispecies finfish survey off New Jersey, which now is in it's fourth year.

To achieve this, the recreational and commercial fisheries have raised funds each year since 1997. This year, 2006, I estimate that this effort will raise in excess of \$1 million in research funds supporting cooperative research. These are moneys obtained from, essentially, the small businesses and private anglers, all of whom have a common concern for husbanding the resources and the recognition that there's just not enough support for science to deal with the assessment problems that are facing these industries.

The funds have been put to good use. The oyster industry in Delaware Bay now operates a sustainable fishery. The recreational industry is actively investigating how to set back the size limits on catch to minimize discard mortality. The surf clam and ocean quahog industries have developed improved survey designs that resulted in quota increases while maintaining sustainability. The squid industry has reduced bicatch of juveniles of recreationally and commercially important finfish species

without loss of yield. So there are a lot of good examples of what can happen.

However, the needs continue to outpace the gains. The demands of sustainable management, husbanding of essential fish habitats, and minimization of unwanted mortality due to discarding cannot be met simply through the resources raised by industry sources. These groups have already committed, and will continue to commit, all that they can. The State of New Jersey, unfortunately, has not made the same commitment. In 1997, I think, DEP estimated that New Jersey ranked 12th of 14 east coast states in state support for the seafood industry. The State of New Jersey has not increased its commitment since then. In fact, privately raised dollars to academic institutions to support sustainable science -- according to my estimates -- now outranks State dollars by more than a factor of 10 to 1. In fact, to be blunt, I don't think this is a hyperbole. I think I'll raise more money from industry sources for science for fisheries this year than the State of New Jersey has appropriated since the year 2000.

The paltry commitment cannot but do harm to the future of the state's saltwater resources and the industries, both recreational and commercial, that depend upon them. It's time that the State take its place as a partner in supporting the sustainability of the fish resources so important to its coastal economy, its estuarine and oceanic ecology, and the cultural milieu of its coastal towns and townships.

Now, what do you get back from the investment in science? The surf clam/ocean quahog research program that we started in 1997 has generated a return on investment of approximately \$126 for each dollar invested. The sea scallop program, which is conducted, actually, primarily

out of the Virginia Institute of Marine Science and a group in Massachusetts, has returned, minimally, \$166 for each dollar invested. The monkfish survey program is -- probably exceeds the value of \$200 for every dollar invested. The multispecies survey has permitted the Winter squid industry to recover its original fishing grounds. The return on this investment approaches the value of the entire Winter squid fishery. Each of these programs involves improvements in survey technology that were necessitated to meet sustainability goals. A recruitment enhancement program for oysters, begun in 2005, is already estimated to return \$40 for every dollar invested at the time of harvest in 2008. And this year's program is almost certainly going to improve on that record.

Each of these investments has been supported solely by industry funds or, in the case of the oyster program, by combination of industry funds and Federal earmarks; along with some seed money, in that last case, from the State of New Jersey. It is amazing, I think, that so lucrative an investment portfolio would be forgone by the State of New Jersey, yet the State persists in ignoring so great an opportunity. I'm personally amazed.

SENATOR SMITH: Mr. Powell.

MR. POWELL: Yes.

SENATOR SMITH: Let me-- Just an FYI, Hal Haskins used to be a very good friend of mine. He was a wonderful man. And I think the research lab does outstanding work.

Your figures on return on investment are stunning. I'd appreciate it if you could elaborate -- if you do a letter to me and elaborate on the return on investment in some of these examples. I'd be happy to

take that letter to the Governor and say, "Governor, we're really missing in action on this. And this is a chance to really help New Jersey citizens." If you do that -- you get me the letter -- I'll take it to him.

MR. POWELL: I'll be pleased to do that.

SENATOR SMITH: Okay. Anything else that you want to say, other than we've totally underfunded higher education and fishery management programs, to which we plead guilty? (laughter)

MR. POWELL: Only three suggestions to leave with you: In the year 2000, the Legislature created the Fisheries Information and Development Center. The mission of the FIDC was to provide critical data for the fishing public -- recreational, commercial, and party/charter boat -- addressing the most urgent needs of the fishing industries in the State of New Jersey, through the development of cooperative science programs between academia, State government, and industry; and through the leadership of the fishing community. The FIDC was only funded in one year -- the year of its creation. Fully funding the FIDC would address the -- would go a long way to address the most critical science infrastructural needs facing the State of New Jersey.

The second suggestion I have is that the revitalization of the oyster populations in Delaware Bay continues to be the most critical environmental and economic need for the Delaware bayshore region. The recruitment enhancement program that began in 2005, through the support of the U.S. Congress, seed money from the State, significant contributions from the oyster industry, and Bridgeton/Port Norris Empowerment Zone has already borne fruit. But it's important to recognize that without continued intervention, the loss of this critical resource in this bay is

literally only a decade away. It is absolutely essential that the State take an active interest in maintaining this recruitment enhancement program.

And, finally, I'll just throw out a couple of words about horseshoe crabs, although I hate to use the word -- it's not four letters. I haven't gotten it into four letters yet, but it's close. One of the suggestions that has been made, and we -- DEP and our lab have been involved in trying to put together a proposal to do this -- is that the State might consider a horseshoe crab stock enhancement program, using an aquaculture approach to spawn and release horseshoe crabs. Sort of the salmon idea, but for horseshoe crabs. And that would go a long way, potentially, toward minimizing the confrontational aspects of the horseshoe crab management issue.

Thank you.

SENATOR SMITH: We appreciate the comments.

And now our anchorman, Mr. Fote.

MR. FOTE: I'm not going to read any of these long pages that I have in front of me. You can read them at your leisure.

I'd like to welcome you. The Mayor welcomed you to Dover Township. I'm going to welcome you to the Barnegat Bay Estuary. One of the hats I wear is of the policy committee of the Barnegat Bay Estuary Program.

When you came-- If you came from Trenton, once you went past Great Adventure, you were in Barnegat Bay. Because everything that comes from that area -- all the way through Jackson and Manchester -- comes downstream. If you came down the Turnpike or the Parkway, when you got to Exit 100 on the Parkway you were in Barnegat Bay. You might

not have been in the water, but you were in the water that's going to come into the Bay eventually. If you came from the southern part, the same thing.

Senator Singer, when he was an Assemblyman, put forward about \$100,000 appropriation to do the Barnegat Bay Watershed Management Plan. That plan has grown into the Barnegat Bay Watershed (indiscernible), an estuary program, and basically has done a lot of research.

When we get to fisheries management-- Fisheries management is only as good as the environment that we're dealing with. One of the problems we're dealing with, with the Summer flounder, is they set a target of 204 million pounds. I asked them where they got the target level at. They said, "Well, back in the 1930s-- We think that's how high the Summer flounder stocks will be." I said, "Well, let me see. We've lost 70 percent of the wetlands along the Eastern Seaboard since 1930. We have different kinds of water problems than we had. And we built power plants -- a lot of power plants that kill a lot of fish eggs and all kinds of critters that the fish depend on." Summer flounder comes in -- they spawn (indiscernible) about a hundred miles off shore. It comes into the bays and estuaries when it's about this size -- about a half-inch. Dr. Ken Able at Rutgers lab has done a lot of work on this, because they basically catch them as they're coming in after they spawn. They grow about nine to 11 inches in that first -- in the bays and the estuaries.

If we don't have the bays and the estuaries, we don't have the foreign species in those bays and estuaries for them to feed on. Then there will never be 204 million pounds of Summer flounder. Maybe a hundred million is about as good as we can get. And the other thing they're basically

trying to do is build all these stocks, at the same time, for the maximum level to be at-- In fisheries management, as we all know -- in an ecosystem -- that doesn't work. Some species will be up, some species will be down. The way the Magnuson Act is written, every species is supposed to be at the top of the load in 10 years. So that's one of the problems.

Funding, we talk about all the time. It's a crime that in this State, in its budget, only allocates \$1 million -- about 1.2 -- to manage the resources of -- the marine resources of this state. That's how much the Division gets from the State coffers. The rest comes from wild grow money, which is recreational -- excise tax money. And the rest comes from Federal grants, which comes from wild grow money, in the back door.

Jeff Tittle was here. And I basically, before Jeff left-- I reminded him that the original environmentalists -- and we still are -- all the hunters and anglers actually started the Sierra Club, they started the Audubon -- they came from the hunters and anglers of the New Jersey State Federation of Sportsmen's Clubs, and things like that.

We have to deal with the environmental issues in the state. That is the crux of it, and the money needs to be put into research. I understand the budget this year doesn't allow that. But we need to look for the future growth. We really need to look and create a message.

Everybody wants to say, "Well, we should tax the anglers to do that." Well, the anglers basically pay in a lot of money already. All the money that comes in for fishing licenses and everything else are contributed. We need to find other sources.

SENATOR SMITH: What portion of it-- What are the license fees? And what portion goes for research?

MR. FOTE: Well, the freshwater part of the State Fish and Wildlife is run by license fees that come from freshwater anglers and hunters. So they basically put in a majority -- I think it's only 12 million. Tom could probably answer that. And a small percentage comes in other areas.

When it comes to saltwater, there is no license. So we have no license. There's some commercial--

SENATOR SMITH: But you're not advocating one either, right? (laughter)

MR. FOTE: At this time, I'm not advocating. The Magnuson Act is going to deal with it. Maybe someday we'll have a discussion of it when you talk about -- you want to get into controversy. You want to talk about beach replenishment, or wind mills off the coast-- Don't even want to go near saltwater fishing licenses at this time.

SENATOR SMITH: Right.

MR. FOTE: It gets to be very controversial, because it has a huge economic impact.

We have 1.3 million anglers in New Jersey that fish. They make about 4.5 million trips. Almost 30 percent of those -- 500,000 -- come from out-of-state. If they wouldn't come into New Jersey because of a license, basically that's \$500 million we lose in income. That's what we're concerned about.

The businesses in New Jersey that depend on the recreational fishing industry, and the commercial industry, are suffering on tough times. The fuel costs are going outrageous. A person that-- A commercial fisherman that wants to go out -- someone can talk about it -- commercial

fisherman that wants to go out and harvest Summer flounder -- if he can't bring enough Summer flounder back to pay for the trip, he's not going out. And with the gas prices, that's affecting what he does, as well as health care -- everybody else's costs.

I've brought a few books over here. They basically teach youth how to fish, crab, and clam in the Barnegat Bay. But they work throughout the state.

Jersey Coast Anglers Association put a lot of money into it in the last couple of years. We do-- We spent, this year alone, \$10,000 on mercury studies and basic tests, recreational caught fish. We're also doing \$10,000 to help supplement that information on Summer flounder. Last year we put in 20,000, the year before we put 40,000. We don't have a lot of money, but we figured that's one way we could help the state. We couldn't get any research on those items. Whatever is going to happen with Summer flounder is going to be an interesting discussion.

The one thing-- Fisheries and environmental issues have always been along the coast. And I've been dealing with Congress for about 20 years. It's always been bipartisan. It was Congressman Hughes and Congressman Saxton I worked -- put together. And this last letter that went in on -- I sent a copy of the letter around and in my testimony. Congressman Pallone came there and spoke for Congressman Saxton. The two of them have basically helped to preserve the shore and do that battle. There are no greater friends that we have in environment in New Jersey. And what we said a lot (indiscernible) is now voicing their opinions on fisheries management.

New Jersey stands at the front-- We might be at the front of all who are getting money on -- for beach replenishment. But we are at the front lines of fisheries politics. We deal with it, because-- Jersey Coast, Garden State Seafood Association, and RFA -- we're basically known in Washington. And really the rest of the coast looks at us for the example of basically how to get the job done.

We have good scientists in the Division. We don't have enough of them anymore. Bruce Freedman (phonetic spelling) is sitting down here. And Bruce just retired from the Division. He was an important player in that for like 30 years. There was no replacement to basically replace Bruce. So Tom McCloy is trying to basically do the job that-- He lost Bill Fickley (phonetic spelling). He lost about six people in the last year-and-a-half. None of those people have been replaced. You can't do the job.

In 1992, when I started getting involved -- Governor's appointee on the Atlantic States Marine Fisheries Commission -- we had a couple of fishery management plans: striped bass, we had to bag limit being pulled by the Federal government; we had a Fall fish, per person -- Andy Ciesla can remember that -- for blue fin tuna. And we had a regulation of 13 inches on Summer flounder.

We now have 37 regulations on every type of fish you want to catch. We have 26 management plans that they have to supply information-- They have all these hearings they have to go with. And yet they probably have a tenth of the personnel they had back when we first started this.

SENATOR SMITH: And I can't take any fish home when I catch them.

MR. FOTE: And that's a problem. The ratio right now is probably somewhere at 20 to 1 on Summer flounder. I don't know what you've been doing, Senator, on your trips. But that's what most of my people have said. I know Pat Donnelly, who sits on the Marine Fisheries Council, went out two weeks ago and had 140 flounder with his kids. They don't want to go flounder fishing because they had to release, and only had four keeper fish. That basically discourages the kids from going fishing.

It also creates a different problem. And that's called *hook and release mortality*, which means we're killing more fish than we're allowing people to take home. And that's bad fisheries management.

I know there are a lot of people who want to speak on this.

One other thing is, if you go over the bridge from here to Seaside Park, and you look on the outside, there used to be oysters there. People used to harvest oysters commercially there as late as the 1930s and '40s. They are all gone. Luckily, Jeff Hillman (phonetic spelling), from Rutgers, is trying to put some oysters back in the bay and some clams back in the bay. We need to do--

As we talk about (indiscernible) being enforced, the rules need to be in place, because it becomes bogged down. It comes from Great Adventure down to here, (indiscernible) to catch fish on.

SENATOR SMITH: Tom, thank you.

Doc, you wanted to get one last word in.

DR. WEINSTEIN: Senator, I have two follow-up comments.

First, on the account of State support for fisheries research. Whatever formula takes -- ultimately evolves out of this -- and hopefully there will be one. There's an FIDC reauthorization, or whatever-- I ask -- and this is driven more by Congress than coming down through the states -- that the proposal process be openly competed, and that the proposals (indiscernible) external peer review the first time.

Secondly, I'll give two very brief examples -- one that's just happened, and one that's been around a long time. A "Fish Lake Erie" license plate has just been issued in Lake Erie. It costs \$25. Fifteen of those dollars will go to the Ohio Sea Grant College Program and the Stone Laboratory to fund research on development. Harbor Branch Foundation, which gets \$9 million from the state of Florida, has a license plate that gives them \$15 million a year in revenues. So a license plate may be something to give serious consideration to.

The other thing I've said -- and you can see how it can get magnified out of control. There's a box on our tax returns. It's purely voluntary. I can give you a dollar for people who are running for office. You give a dollar, \$5, \$10 to environmental sustainability in New Jersey. Let us get behind it, as individuals.

SENATOR SMITH: The fishing license plate is a great idea. Judy, any idea what we make on license plates?

Anybody have an idea on how much?

MR. FOTE: Since Jersey Coast and Federation were involved in the first one, which was the ones -- nongame endangered species-- A large portion of that went into the nongame endangered species. I think the regular price-- Basically, what it would cost you for regular license

plates. And everything went into the Division of Nongame Endangered Species enforcement. That plate is still out there.

The problem is, with the proliferation of plates that we have -that we don't raise the money anymore, because it's one of the-- There's a
bill related to a striped bass plate that would go to law enforcement and
things like that. The problem is, we have all these plates now, and we're
kind of (indiscernible).

SENATOR SMITH: All right.

Thank you for the comments.

Gentlemen, thank you for all your comments.

MR. POWELL: Mr. Chairman, can I make one comment about fluke, since we've talked so much about it?

SENATOR SMITH: Okay.

MR. POWELL: Flukes a good example of where there's a lack of science. I've been involved, in one way or another, in the fluke assessment since the late '90s. And the problems that exist now have really existed for quite a number of years. This is sort of technical, but they've revolved around the relationship of the number of adult fluke and how many babies they have.

SENATOR SMITH: Right.

MR. POWELL: It's a basic science issue associated with a life cycle. And unless, in some way or another, there's a significant science program developed to shed some light on that, in my personal opinion, the fluke quota is going to continue to deteriorate. And you could see this fishery cease to exist. It's a real urgent need. We don't have four or five years to figure out how to resolve this. The State of New Jersey needs to be

looking at funding a research program in fluke this year. Even if it starts this year, it will take a couple of years to get the data together. And you're not going to change this assessment substantively unless something like that happens.

MR. FOTE: Can I just follow up quickly on that?

SENATOR SMITH: Sure.

Sure.

MR. FOTE: If you look at the information I've given you, you realize that we started out in '93. We started our (indiscernible) document. We started our spawning stock biomass that produces young of this. We have tripled that spawning stock biomass from '93 to now. It's gone up to 67 million fish spawning.

But what's happened is, when we were at 20 million spawning stock biomass back in '93, we had great recruitment. We had a lot of small fish drop. In the last four years, with triple the spawning stock biomass, we actually have poor recruitment. And one of the things was the scientist -- Dr. John Gorman from National Marine Fisheries Service -- at Wednesday's hearing basically said that -- it's part of my statement -- saying, "We're not sure what's going on. We have no idea." So NMFS is basically looking to do that research too, and maybe work with the State of New Jersey.

DR. WEINSTEIN: That's the bottom-up aspect. What happens to the young? Do they get recruited to the adult stage? There's a huge information gap.

SENATOR SMITH: Thank you, gentlemen.

Our last panel is Greg DiDomenico, from Garden State Seafood. Are you here? (affirmative response)

Mr. Wolfe, did you want to get your licks in on this section?

MR. WOLFE: I'll be the last guy up to summarize and put it in context.

SENATOR SMITH: You're welcome to jump up.

Mr. Fullmer, did you already get your licks in?

MR. FULLMER: Yes. That was for the sand replenishment, not for--

SENATOR SMITH: Okay, great.

Mr. -- is it Rella or Della -- Clean Ocean Action. Are you here?

And Helen Henderson, from Save Barnegat Bay.

Helen, are you here?

HELEN HENDERSON: I'll go up when Bill's up.

SENATOR SMITH: Bill is going to be Helen. Is that what we're saying? We're doing a Bill replacement?

MS. HENDERSON: No, I'm going to go with him.

SENATOR SMITH: All right. Who is coming up? Whoever is coming up--

UNIDENTIFIED SPEAKER FROM AUDIENCE: There are a couple of groups who want to testify on fisheries from the environmental community.

SENATOR SMITH: Okay. Who are they?

UNIDENTIFIED SPEAKER FROM AUDIENCE: I'm one.

SENATOR SMITH: And you are?

BENSON CHILES: Benson Chiles. Chiles is the last name, C-H-I-L-E-S.

SENATOR SMITH: Okay. Benson Chiles.

MICHAEL L. PISAURO JR.: And Mike Pisauro here.

SENATOR SMITH: Okay, guys, come on up.

We have one gentleman on the last topic that we're saving for the end.

You're the anchorman.

And Mr. Pringle made it.

Garden State Seafood, please take the ball and run with it.

PAUL J. MATACERA: Chairman Smith, thank you very much.

I'm Paul Matacera, from MBI-GluckShaw, representing the Garden State Seafood Association. We want to thank you for being here, in Dover Township. And as Senator Ciesla told me, I'm appropriately dressed for a Friday afternoon meeting at the -- on the Jersey Shore. So we want to thank you.

I'd like to introduce you to Greg DiDomenico, who is the Executive Director of the Garden State Seafood Association, which represents the commercial fishing industry here in the State of New Jersey, and our 98 seafood houses and over 2,000 employees.

Greg.

SENATOR SMITH: Greg, let me ask the same favor I asked everybody. If you have a written statement, we're going to read it. Tell us what you want us to hear.

GREG Di DOMENICO: I'm going to give it to you as quick as possible, sir.

I will try to hold that. (referring to PA microphone)

Mr. Matacera was kind enough to tell me to wear a sport coat, but he forgot to wear one himself. (laughter)

Thank you very much for giving us this opportunity. Let me just tell you a few things, and I'll hit the high notes, because they're very important. They've been somewhat overlooked in the State of New Jersey.

I serve as the Executive Director of the Garden State Seafood Association. Our members are those who catch fish, those who process fish, those who chart fish, and those who service the vessels and the plants in those collateral supporting industries: welders, aluminum shops, mechanics, diesel. It's a very large industry.

I'd like to say that we've provided you several pieces of testimony here. I'm going to go through a couple of them. Before I say that, I want to tell you a little bit about our industry, what we do.

First, we provide quality seafood for those who can't catch it themselves. And that is something that our fishermen feel is a privilege. They wanted me to tell you that. They do feel that way.

We conduct research, as your esteemed colleagues before me told you a little bit about. And we solve problems in the management industry -- in the management field through different types of gear, participating, research. And we're doing it, and we're staying in business, and things are going well.

A few things: Our fishermen are from Point Pleasant, Belford, Long Beach Island, Viking Village, Atlantic City, and Cape May. They catch fish, they catch scallops, they catch clams, they catch mackerel, squid, monkfish, Summer flounder, black sea bass. We catch it all through a variety of gears: trawls, gill nets, dredges, pods. We do it all. And we're, again, privileged to do so.

A few of the numbers: This is what the value is of the seafood that we land, port by port; which, by the way, is continually in the top 10 throughout the entire coast. And unfortunately, because we don't give that same-- I should say that our New England compatriots have a bit of a nicer look about them. You have that image of the man with the nice beard and the pipe. Unfortunately, that's not the image portrayed here in New Jersey. But we're working on that.

Cape May and Wildwood catches -- \$68 million worth of seafood in 2004. Long Beach and Barnegat caught \$20.6 million worth of seafood. Point Pleasant caught \$19.2 million worth of seafood. Atlantic City caught \$17.7 million worth of seafood.

Let me say a couple of things -- couple important things about our clam industry. Our clam industry in this state is the world's leading producer of clams, providing 80 percent of all surf clams and 40 percent of all quahogs consumed anywhere. When you compare our seafood-valued landings to our grain crops and our farmers here in New Jersey, we're very competitive.

A couple other things, please. I'm not going to belabor the fact of Summer flounder. It was covered before. I just would tell you that our fishermen have enjoyed the management and the recovery of Summer flounder. Our prices -- our (indiscernible) prices have doubled through management and through the right (indiscernible).

I'd also like to tell you that there absolutely is a need for funding. We're doing it by ourselves on a bit of a shoe-string budget.

SENATOR SMITH: You're talking about funding for research? MR. DiDOMENICO: Yes.

SENATOR SMITH: Okay.

MR. DiDOMENICO: And we'll continue to do that, but it's very difficult.

Lastly, I think I've hit all the most important points about our industry, and how important we are, and our economic impact. I would like to say that, today, we want to tell you just a little bit about striped bass. You'll read in our testimony that the consumers in this state are deprived of what we like to call *New Jersey fresh striped bass*. We cannot harvest those fish and bring them for purchase in this state. That's something we'd like the State to consider. And it's something that goes very far beyond just us. Consumers have been denied that precious fish.

SENATOR SMITH: Stop for a second.

MR. DiDOMENICO: Yes.

SENATOR SMITH: Tom, is that a part of the Marines Fishery Council regulation?

MR. McCLOY: No, it's not. It's part of the Legislature's-- It's in the statute.

SENATOR SMITH: We did it.

MR. McCLOY: Correct.

SENATOR SMITH: And that was because we wanted to deal with the recreational--

MR. DiDOMENICO: That fishery is now recovered, and we'd like to share an abundant resource. We believe it's fair.

Lastly, we put in some quick comments about windmills. We would like to tell you that windmills off the coast of New Jersey will displace this industry from historical fishing grounds. They propose a

navigation -- hazard to navigation and a safety issue. And they will not meet the needs of New Jersey's energy. And they will not reduce our dependency on foreign oil. We are not in favor of windmills. We're not going to ask them to be put anywhere else. But we've given our testimony on windmills several times.

Lastly, I would like to read one thing to you. This is a press release from NOAA. This is part of the government regulatory agency that handles fisheries. "In 2005, NOAA scientists determined population levels for 206 fish stocks and multispecies groupings known as complexes. Of these, 152, 74 percent, were not overfished. NOAA scientists also determined the harvest rates for 237 stocks and found that 192, 81 percent, were not subject to overfishing." I wanted to give you just a little bit different view beyond New Jersey, to give you a bit of a report on what exactly is going on with fisheries in this country.

And I thank you very much for allowing me to speak. And please--

SENATOR SMITH: We appreciate you bringing that information.

MR. DiDOMENICO: Any questions, if you have time-- I'd be more than happy to answer them. I know we're running out of time. But there's plenty to know about this industry. And it's, quite frankly, all good. So keep eating seafood.

Thank you.

SENATOR SMITH: We appreciate you getting them for us.

Mr. Chiles.

MR. CHILES: My name is Benson Chiles. I work with Environmental Defense and the Coastal Ocean Coalition.

The Coastal Ocean Coalition is a group of environmental organizations in the state, and nationally, that have come together to work on state coastal and ocean policy in New Jersey and other places, also. In New Jersey, we have an agenda that we've developed. And some of the issues that we want to see put before the State were raised earlier today.

I'd like to focus on just a couple of fisheries-related issues. And I'll keep my comments very brief. The research we did to develop our agenda relied largely on the reports of the U.S. Commission on Ocean Policy and the PEW Ocean Commission. I've submitted reports to the Committee so you can peruse them at your leisure.

Those reports said that the oceans are in trouble. And a lot of people talked about some of the ecosystems issues today that we're facing. And New Jersey is no exception. We have a number of problems that people haven't discussed.

As it relates to fisheries, there are a few things that I think the Legislature could do to improve our overall management of this important resource. The first thing is to begin thinking and managing fisheries on a ecosystems basis. The last panel -- most invariably, people said we need more information, we need to consider all the impacts on fisheries. I think this is an important policy that the State could implement. And I'd be happy to work with the Committee on that -- on a proposal.

The second thing that we see as important is that the management bodies, both at the State and Federal level, should be balanced. They should have representation from the public and from the

scientific community, not just from the fishing industry or largely from the fishing industry itself.

The third thing that I suggest is that science-based management of fisheries is important. A few people talked about some of the issues related to inadequate science. In the face of inadequate science, it's important to practice precaution. So I think that that's one of the considerations that we need to keep in mind. So, anyway, we should make sure that the State focuses its decision making on science, as well.

And, finally, there's room for improvement in the way we deal with bicatch and wasteful fishing practices. And we have some ideas for how to improve that.

SENATOR SMITH: Have you put that in the written testimony, the specific ideas?

MR. CHILES: I haven't put my-- I've given the report as a-I've submitted the report, but I haven't given you my written testimony.
I'd be happy to do that.

SENATOR SMITH: We'd appreciate it.

Good.

Mr. Pisauro, from the Environmental Lobby.

MR. PISAURO: Good afternoon, Senator Smith, Senator Ciesla, and Assemblyman Wolfe. Thank you very much for taking the time and the interest.

I will provide some written testimony. I'll just hit some highlights. Our oceans are in trouble from various and many sources. You heard some, earlier, about beach nourishment. We're doing things on our land, far from the ocean and the bays, that are having an affect on our bays.

We're having runoff, we're having low oxygen, we're having many things that are affecting our enjoyment of the ocean or our bays.

One of my happiest moments -- or memories as a child is going out with my father, my grandfather, my brother fishing in Barnegat Bay. The last time I did it, we were out for hours and caught nothing. Either we're bad fishers, or there is not what there used to be. And even when you catch fish, or you buy fish, it may not be healthy for you, despite what the medical community and health industry is telling you -- eat more fish, you may get fat.

The fish have mercury, PCBs, dioxin, and other pollutants in it. And EPA, DEP has, on their Web sites, advisories. If you don't want to have more than one in a 10,000 chance of developing cancer, maybe you should only have one meal of striped bass a month. If you're pregnant or at high risk, you shouldn't probably eat it at all. I think that's a very scary concept that we're having -- that you must look at what you're eating and decide how much risk you're willing to undertake.

Part of that is because of our land-use practices. Part of it is because of what we emit into our air. And we need to start addressing that and the ecosystem as a joint solution, not as a piecemeal-- "We're going to look at air, we're going to look at water, we're going to look at land." We've got to look at it all together.

One-third of the fishing stock which are considered highly prized in New Jersey are being overfished or subject to overfishing. That is not good. That is not good for the fish, obviously. It is not good for fishermen and not good for the people who enjoy eating fish. We need to use our resources sustainably. We need to have the science there. We need

to support the science. But when the science isn't there, we need to act with caution and say, "We're going to be conservative because, in the long run, it's going to benefit everyone;" not, "Well, we hope the science is wrong, and we hope this is not going to turn out bad." I think we do that quite too often.

The solutions are not easy. The solutions are not single shot. We must address all of them. We must address all of them in a concerted and determined manner. And it will benefit everything.

And I want to thank you.

And I will provide written testimony.

SENATOR SMITH: Great.

Thank you, gentlemen, for coming forward.

Mr. Wolfe, did you want to say anything -- Clean Ocean Action? And I believe you are the last two, with the exception of Mr. Irvine.

Yes. If you would, identify yourself, please.

MS. HENDERSON: Which mike are we using?

SENATOR SMITH: Just use that. The broken microphone is the real microphone.

MS. HENDERSON: Hi. Thank you for the opportunity.

My name is Helen Henderson, and I'm here today on behalf of Save Barnegat Bay. We're a not-for-profit environmental group, working for clean watershed throughout Barnegat Bay.

I want to thank Tom Fote for kind of giving me an entry here, because fisheries is pretty much not something that we would come out and talk about. But when I hear Mr. Fote say that he needs a clean, healthy bay

to support Summer flounder, it gives me the opportunity to tell you that we have anything but a clean, healthy bay.

Barnegat Bay is suffering from the effects of overdevelopment. There's been a lot of reports out. And particularly one scientist -- professor from Rutgers University, Michael Kennish, has been talking about the utrification that's happening in the bay, the low oxygen levels. I think the overdevelopment, all the storm-water runoff-- These are all land-use issues that have to be addressed in order to clean up the bay, in order to get possibly to fisheries and the scientific based findings that we heard about today.

Something that we would never think is really even connected to this -- anything in this hearing today, is looking at water supply. And when we look at the health of Barnegat Bay, we have to consider that the overdevelopment requires a lot more water to support all the people and development that's come along. And if we're pulling more water from the base flow that feeds our streams, and the fresh water isn't making into the bay, you're seeing more and more problems there.

So one of the common threads that everyone talked about today was CAFRA reforms. I think that's important. There are some thresholds that have to be looked at. And just overall watershed base management -- any way possible to clean up the bay.

That's our local grassroots perspective. Someone mentioned the Oyster Creek Power Plant. They are the biggest thermal polluter in the area. And I don't think anybody really knows how it's affected the bay over the last 30 years. But with a 20-year license renewal in front of us, I think

we had best -- better know what it's done to the bay over the last 30 years, and really look for those cooling towers. Those are a necessity.

Perhaps a State master plan that would monitor the nitrogen that's running off from all the new development -- that would help with sea nettle problem. All these cumulative impacts need to be looked at.

Thank you.

SENATOR SMITH: Thank you for your comments.

Mr. Wolfe.

MR. WOLFE: My name is Bill Wolfe. I'm Director of a group known as PEER. That's Public Employees for Environmental Responsibility.

I would just like to personally thank you for holding this hearing. I think you have developed a wonderful record, in terms of testimony. I think we've heard some very good testimony, particularly from the Rutgers people, on shore erosion and fisheries management science.

SENATOR SMITH: Well, you know, you really should thank Senator Ciesla. Senator Ciesla said, "You know, we need to have a hearing down the shore about shore issues."

SENATOR CIESLA: It's going to cost me a vote now. (laughter)

SENATOR SMITH: In any case, it was his idea. It's a great idea. And, you know what? I think we might do this every year. I mean, it's really a good thing to come down and see what the status of the coast is and how we can help it.

MR. WOLFE: And let me urge you to go one step further.

In my last life, at DEP, I had the privilege to work with you and OLS in developing the introduced version of the Highlands Act. And that is a major step forward. And the relationship to today is that, when you're serious about solving a problem, you establish an institution, you establish laws and regulations, funding, to look at a problem comprehensively, develop a plan, develop policies, and then implement and enforce them.

The Highlands Act did exactly that. And maybe we ought to really think about pulling together the bundle of issues we've heard today in an institution for the shore, whether it's academically housed, or whether it's an independent, stand-alone type of commission. That was contemplated in the '80s by former Governor Kean -- a coastal commission -- to pull together both the science, and the policy, and the plan to do -- and reform some of the need we heard today. Because as a coastal state with major economic issues at play -- major environmental issues, and strong public support-- I would urge that that be really seriously considered; and you hold additional hearings on this topic, maybe expand the agenda. Because I feel I'm coming in and trying to hijack the agenda a little bit, outside the scope of purely a fisheries--

SENATOR SMITH: It's a great country.

MR. WOLFE: Right.

So I just thank you for holding this hearing. And my testimony is written, and it has very specific recommendations on how to reform specific provisions of CAFRA. It's been 13 years since we've amended that Act. I think we ought to acknowledge -- I think it's been largely a failure, the '93 amendments. And I would urge -- I brought along -- don't have it with me here. The *Star-Ledger* of -- I think it was April 30, on their Sunday

Jersey Section, framed it well: How much is enough: Overdevelopment at the shore. It was a beautiful picture and a fairly good summary of the '93 amendments, and why they didn't work.

SENATOR SMITH: We appreciate your comments, Mr. Wolfe.

Let me mention that Dave Pringle is here, from the Environmental Federation.

We appreciate your presence. Did you want to say anything? (affirmative response) Okay.

And then Mr. Irvine is up.

Mr. Pringle.

DAVID PRINGLE: Thank you.

And I will be very brief, because many of the comments have already been made.

Sorry I didn't attend the beginning of the hearing. I was at a wake, and then got stuck on the Jersey Shore Friday afternoon traffic.

I just wanted to concur with my colleagues from the Ocean Coalition, Sierra Club, PIRG, the Environmental Lobby, and PEER on the issues of coastal land-use reform and ecosystem management around the oceans.

We're not formally part of the Coalition, because the Federation doesn't get involved in fisheries issues. But on those first two points -- the coastal land-use reform and ecosystem management around the oceans -- we very much support the recommendations that our colleagues have talked about today.

And I just wanted to expand on one point -- or two or three points -- very quickly. Given the threats of global warming-- And even President Bush admits it's a problem, even though he doesn't want to do much about it. The hurricanes' flooding, and utrification of Barnegat Bay -- all of which are very much related to this. We need to rethink the amount of money we're spending building, rebuilding, and replenishing beaches at the shore. The amount of taxpayer dollars that are going to that, that could be better spent addressing these problems -- it would be well worth it.

In fact, the amount of money -- especially the rebuilding in harm's way and replenishing our beaches in the ways that we're doing -- to essentially protect development that shouldn't have been put there in the first place -- at taxpayers', as opposed to private property rights' expense -- is sickening.

The one form -- point that I wanted to focus on, that hasn't been yet touched -- with, from my colleagues, around CAFRA, is that the flood hazard areas and the buffers within CAFRA, we think should be consistent within -- at least as strong, if not stronger than the stream encroachment buffers in inland waters. And we anticipate the Corzine administration proposing new buffers inland. And we think that when that occurs, that those same types of buffers should be mirrored at the Jersey Shore.

I'd also like to focus a little bit on energy policy, given its links to-- I mean, the biggest threat to the Jersey Shore is global warming. And the State's energy policy, to date, currently doesn't reflect that reality. And I'd like to just highlight seven things -- about one-liners -- on each.

We need to shut down Oyster Creek for a variety of reasons that have been attested to. And we're very pleased that Governor Corzine recently announced he's now opposing the relicensing of the 20 years. We need that opposition. We need the Legislature to be more engaged in that opposition. We need our Federal representatives to be more engaged in that opposition. Because at the end of the day, the NRC -- which, ultimately, is the decision-maker -- is, relatively speaking, a wholly owned subsidiary of the nuclear industry. And we need a united front in New Jersey to shut that plant down. If we can't shut that nuclear plant down, no nuclear plant ever will be shut down in this country.

Second, we need to do a lot more on energy efficiency. There was an appliance bill that passed the Legislature a couple -- two years ago now. It was a very good bill. But it was watered down through the legislative process. There are many more appliances. That bill, as watered down as it was, was half an Oyster Creek. So one relatively small bill provided half the energy savings that one energy -- than a nuclear plant presents.

Two, I know you're working, Senator, on some green building legislation that we very much support. And it is a critical way we can be building much more efficiently when it comes to energy. And if we did that, we can-- It's easier to shut down the Oyster Creeks of the world and not site new nuclear plants -- which is a push that's going on.

Fourth (*sic*), we need to do a lot more in conservation. I find it ironic that folks don't turn their heat above 65 degrees in the winter, yet they need to have their energy in the room -- I'm willing to guess it's about 65 or 66 degrees in here now. And it's nice coming in from outside. But it

would be just as pleasant and cool, and we'd save a ton of a lot of energy, if it was at 70 degrees right now. And I think most folks -- if we figured out ways to provide that kind of conservation, and recognize the savings would mean cleaner air and fewer Oyster Creeks in the world, it would be a tradeoff that 99 percent of the public would happily take.

We need a new -- a lot more in solar energy. The Clean Energy Fund has been critical to solar energy, and it's critical to our long-term solution, not withstanding the criticism of that program going on currently in terms of accounting. But from a programmatic standpoint, that program has been incredibly successful, and is critical if we're going to be protecting the Jersey Shore in the long-term.

Six: We need wind in New Jersey, and we need wind offshore in New Jersey appropriately sited to take in fishing, and shipping, and birds and everything else that needs to be sited. And when we do that, it may turn out that there aren't appropriate places to put wind off the shore. But to suggest that we shouldn't even look -- which many would suggest is ludicrous. And to suggest that producing energy by wind wouldn't help reduce reliance on fossil fuels or foreign oil belies common sense.

And then, finally, we-- There is a push to not go for energy efficiency, not go for conservation, not go for renewables, and, rather, go back to the 1950s technology on coal plants and nuclear energy. And that's the wrong way to go, especially before we explore all these other options.

So we need to address global warming and the threats of our energy policy. And that's the way to go.

And in conclusion, I was very disappointed to see a DEP spokesperson quoted in the *Gloucester County Times* and the *Easton Express*

Times yesterday, when asked about whether the Corzine administration was going to be pushing for new beach protection measures. And she was quoted as saying, "We have laws and regulations in place." And I don't think anybody can come away from today's hearing suggesting that the rules, and regulations, and laws in place in New Jersey are doing an adequate job protecting our beaches. Yes, enforcement needs to be better. But we need stronger rules and protections in place.

And I thank you for helping document that. I hope that DEP spokesperson misspoke, and that's not, in fact, an accurate reflection of the Corzine administration's policies.

Thank you.

SENATOR SMITH: We appreciate your time and your comments.

And our anchorman for today's hearing is Mr. Robert Irvine.

Mr. Irvine, you've waited patiently. We're all ears.

ROBERT F. IRVINE: Thank you.

It was worth the wait for me.

I'm a full-time resident -- oceanfront resident of Long Beach Island. And I'm here to talk about a certain aspect of the beach replenishment that I don't think has been properly addressed.

This is the first time publicly that I've been able to talk at a forum, other than after the fact, after the project was formulated. And I believe that many of the problems that exist on Long Beach Island, with the problems with the project, are due to the fact that there were no formal meetings. There was no involvement of the citizens in the formulation stage of the project. And that's-- It's an important project for the Island.

And I want to read a letter that was dated June 29, 2006, to Long Beach Township Mayor Dianne Gove. And this is from Richard J. Maraldo, Chief of Programs and Project Management of the Corps. "It is not a requirement of the Corps of Engineers project process to hold formal public meetings. A formal public meeting was not held at the conclusion of the feasibility study." That's the study that ended in 1999. So there was no public involvement at all. And they're stating that it's not necessary.

They go on to say, "However, numerous informal --informational and coordination meetings were held over the years, up to the
present, attended by representatives of the Corps, the State, local municipal
officials from each borough and Long Beach Township."

Well, I have gone to my township, and I have asked the Mayor for dates and minutes of those meetings. None are available. So I don't know what they did. And I have a problem with the public not being involved. Just this forum today-- Had something like this been going on in the formulation stage, I believe that many of the problems that exist today could have been worked out years ago, certainly since the project was finalized in 1999. There was no meeting until this past December of 2005.

The executive summary of the Corps' feasibility study states, "The following recommendation is made, given consideration to all the significant aspects of overall public interest, including environment, quality, social effects, and economic effects. A project has been identified that is socially and environmentally acceptable, and has broad support."

My question to the Committee is: How could the Corps make a statement on having overall public support without having the public involved?

SENATOR SMITH: I don't disagree with a word that you're saying. One of the things you have to understand -- Federal government, State government. Army Corps of Engineers is a Federal United States government agency. And I think that what we do in New Jersey is a lot better.

In New Jersey, you want to do a road -- major project -- DOT. They have public participation. There's a requirement for it. You have to have public hearings, you have to send out notices, you have to publish in the newspaper. And I agree with you, with the basic concept that the more the public's involved in a project, the better a chance that it gets to the finish line, and it gets done right.

Suggestion to you: You might want to contact your Congressman and suggest that they amend the rules with regard to Army Corps' projects, where they require a public participation element at the end of a feasibility study.

MR. IRVINE: And that's an excellent suggestion. However, within this process, in the State of New Jersey, the Department of the Environment, is intimately involved, as well.

SENATOR SMITH: Is our replenishment guy here?

MR. IRVINE: They left.

SENATOR SMITH: John, do you know what our public participation requirements are on beach replenishment, if any?

MR. HAZEN: (speaking from audience) I believe that we follow the feds.

SENATOR SMITH: You have to do whatever the feds tell you to do?

Listen, you might want to mention to the Commissioner that maybe there is some way that if New Jersey is involved, we should have a public participation element. I think the comment is very well-taken. People feel aggrieved when they have no chance to comment on a proposal before it gets locked into stone.

MR. IRVINE: My recommendation to the Committee is along those lines. I recommend that this Committee introduce legislation allowing the public to be involved, similar to the New Jersey legislation process for passing laws, like you do -- just that we have an involvement, that we can come and testify.

SENATOR SMITH: It's not a bad idea.

MR. IRVINE: Now, the other thing that I'd like--Unfortunately, Mr. Rosenblatt is not here for me to address this question. But as a resident of Long Beach Township, I was at a meeting, and they--

Let me just drop back. We have sent letters to Mr. Rosenblatt -- some of the concerned citizens and some of our groups -- and to Keith Watson, the head of the project for the Corps of Engineers. We have not received any responses to those letters. Three weeks ago, I was at a meeting at the Chamber of Commerce, and their numbers involving -- where Mr. Rosenblatt was speaking at. And there are aspects of this project -- vertical easements, which is access to the beach, involving Long Beach Township;

additional parking, which is additional cost for Long Beach Township; as well as bathrooms.

And I asked Mr. Rosenblatt a simple question: What participation is the State going to make, in terms of a percentage of those costs, as far as how much Long Beach Township would have to pay and how much the State would pay?

SENATOR SMITH: You deserve an answer.

John, would you find out if a response is on its way to Mr. Irvine?

MR. IRVINE: And I could not get an answer.

SENATOR SMITH: And we're going to look into your idea about the public participation on the beach projects.

MR. IRVINE: Thank you.

SENATOR SMITH: Because we're involved in it -- State dollars, as well.

MR. IRVINE: And that's why I stayed.

SENATOR SMITH: Thank you for giving some good ideas.

MR. IRVINE: Thank you for coming.

SENATOR SMITH: And thanks to everybody for coming and your participation.

Everybody have a great day.

(HEARING CONCLUDED)