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Protecting and Restoring America's Great Waters: Long Island Sound

Chairman Cardin, Ranking Member Crapo and distinguished members of the Subcommittee on Water and Wildlife, on behalf of New York Governor David A. Paterson I want to thank you for the opportunity to testify before you today on New York State's efforts to protect and restore Long Island Sound. My testimony today will address the actions which New York State has taken to date, in concert with our counterparts in Connecticut and the United States Environmental Protection Agency (USEPA), to restore Long Island Sound. I will also address the state's recommendations regarding legislation to reauthorize the important federal laws which oversee our restoration and stewardship of Long Island Sound. I encourage the Subcommittee to consider legislation that will enhance our jointly-made efforts to restore the Sound's water quality and bountiful natural resources.

The Importance of Long Island Sound to New York State

Long Island Sound is one of our Nation's greatest treasures, and its restoration is a priority for Governor Paterson. More than 120 species of finfish are found in its waters. Over 20 million people live within 50 miles of the Sound, and millions use the Sound for boating, commercial and sport fishing, swimming and beach going. About \$8.5 billion is generated annually for the regional economy from these uses.

The ability of the Sound to support activities such as these is dependent on the quality of its waters, living resources and their habitats. The current value and quality of the Sound are partly the result of investments in water pollution control, habitat protection and fishery management programs made over the past two decades.

The achievements that we have made to date have occurred under the auspices of the Long Island Sound Study (LISS), which was created jointly by USEPA, the states of New York and Connecticut and other concerned parties. This 25-year cooperative project involving federal, state, interstate, and local entities, universities, environmental groups, industry and the general public is part of the National Estuary Program, administered by USEPA, and is designed to address major environmental problems in estuaries of national significance. The study culminated with the approval of the Comprehensive Conservation and Management Plan (CCMP) for Long Island Sound in September of 1994, as reaffirmed in 1996 and 2003. The plan is being implemented as a blueprint to improve the health of the estuary while ensuring compatible human uses within the Sound ecosystem.

The CCMP has identified seven priority areas for implementation in the Sound: low dissolved oxygen (hypoxia, the top priority); toxic contamination; pathogen contamination (closure of shellfish beds and bathing beaches); floatable debris; health of the living resources and their habitats; land use; and public outreach and involvement. It also laid out 232 specific actions to protect and improve the health of the Sound while ensuring compatible human uses within the ecosystem.

During the summertime, over one-half of the Sound's bottom waters experience dissolved oxygen below the state standard of 4.8 mg/L, greatly stressing marine organisms in a phenomenon known as "hypoxia." Hypoxia, one of the most significant problems facing New York's coastal waters, has been found to impair the feeding, reproduction and growth of aquatic life. Through research and monitoring/modeling, excessive nitrogen was determined to be the cause of the summertime hypoxia.

Nearly 20 years ago, New York and Connecticut agreed to the first steps in controlling nitrogen loads to Long Island Sound. The LISS adopted a phased approach that froze wastewater treatment plant discharges of nitrogen (Phase I), then committed to reduce these discharges (Phase II) using low-cost upgrades and process modifications. By 1997, a reduction of 3,300 tons of nitrogen per year had been reached. In 1998, agreement was reached on Phase III, including a commitment to reduce nitrogen from New York and Connecticut by 58.5% from 1994 baseline levels by 2014 through a Total Maximum Daily Load (TMDL). This TMDL was approved in 2001.

The phased nitrogen goals included a Phase IV to review out-of-state air and watershed sources of nitrogen and management actions coordinated by USEPA. In combination with these phases, Phase V actions consider several non-treatment technologies, such as aeration and tide gates on the East River.

In addition to the issue of hypoxia, some fish and wildlife are contaminated with polychlorinated biphenyls (PCBs) and consumption advisories are in place to protect public health. Advisories exist for the consumption of striped bass, American eel, and bluefish and the tomalley (i.e., the liver, which is considered a delicacy) of lobsters. The New York State Department of Environmental Conservation (DEC) worked with the Connecticut Department of Environmental Protection (CTDEP) to update our knowledge of chemical residues in important fisheries, and in fisheries with existing health advisories or having a significant potential for health advisories. Striped bass, bluefish, weakfish, American eels and American lobster (hepatopancreas only) were collected and analyzed for PCBs (as Aroclors) and mercury. In addition, lobster (hepatonpancreas) were analyzed for cadmium and chlorinate dioxins and furans. A report of the bistate effort, supported by USEPA, was just released and fish consumption advisories were updated in June 2009 to reflect the new knowledge (e.g., PCBs have declined while mercury levels have increased in fish tissue). Studies such as these are important, because elevated levels of contaminants in sediment cause impairments to resources and make it more difficult to dispose of dredged material.

Pathogens are another major issue for LIS resources. Long Island Sound beaches are periodically closed, along with 73% of New York's productive shellfish beds because of high

levels of pathogens. Pathogens are potentially disease-causing organisms that are a public health concern when a certain concentration is reached. A majority of these pathogens reach the Sound through stormwater. As it travels across the ground, stormwater picks up multiple pollutants, include pathogens, and carries them to local waterbodies.

Given the magnitude of these challenges, New York cannot succeed in restoring Long Island Sound alone. We appreciate our partnership with USEPA, other federal agencies, our counterparts in Connecticut, local governments, not-for-profit organizations, and a very committed citizenry. Through our joint efforts, much already has been accomplished. New York's concern is that, without a much higher level of commitment from the federal government, we will not be able to sustain the improvements that we've made in the Sound's water quality and habitats. With continued federal fiscal support we will be able to sustain and continue to build upon the improvements that we've made in the Sound's water quality.

The Need for Federal Involvement in Long Island Sound's Restoration

To combat these serious problems, New York State, county and local governments anticipate spending an estimated \$1.1 billion, in addition to the millions already spent on wastewater treatment upgrades. These funds will reduce nitrogen discharges to the Sound which cause hypoxia. State and local funds also are being used to restore aquatic habitats, control nonpoint sources of pollution, acquire valuable open space, provide public access opportunities, and to undertake many other essential projects for the residents of New York who live and work along the Sound.

In 2000 – more than 10 years after New York and Connecticut began to restore the Sound – Congress approved the Long Island Sound Restoration Act (P.L. 106-457, Title IV, as reauthorized by P.L. 109-137), in recognition that New York and Connecticut should not be expected to upgrade sewage treatment plants along the Sound, an Estuary of National Importance, or implement the priority actions of the CCMP, without federal assistance. LISRA, as the Act is called, authorizes federal appropriations up to \$200 million to assist in the Sound's restoration – matching the funds which New York already has provided for Long Island Sound improvements through the Clean Water/Clean Air Bond Act of 1996 and other sources. LISRA funds can be used for a wide variety of projects, including habitat protection and restoration, sewage treatment plant upgrades, program management, monitoring, education, research and special projects. The LISS Management Committee determines the uses of the LISRA appropriations to best meet the needs of the Sound.

To date, the two states have had only limited success in securing the federal appropriations which could be of significant benefit in funding the sewage treatment plant upgrades needed to protect Long Island Sound's water quality and natural resources. Since Federal Fiscal Year 2001, the first year for which funds could be appropriated pursuant to LISRA, less than \$50 million has been appropriated by Congress, although the \$7.8 million appropriated in FY 2010 encouraged New Yorkers to believe that Congress is recognizing, as we do, the great importance of the Sound economically and environmentally. To date USEPA has only included modest amounts in its budget request, which, in our view, do not reflect the intent of Congress in enacting LISRA, even though the funding necessary for nitrogen removal is projected to be in

excess of \$1 billion in New York state alone. New York hopes that future appropriations will be more robust, in keeping with the substantial sums that Congress has approved for estuaries in other parts of the country.

New York appreciates the commitment Congress has demonstrated to Long Island Sound through the enactment and reauthorization of LISRA, as well as the sustained support for the appropriations which have been secured. In particular, we appreciate the hallmark efforts of New York's Congressional Delegation, particularly the advocacy of Congressmembers Israel, Bishop and Lowey, Senator Schumer and Senator Gillibrand for the State's Long Island Sound needs. We also are grateful for our partnership with USEPA, and their consistent efforts to provide funding for LIS projects. Without the continued advocacy of Congress for this important estuary, however, we fear that the state's efforts alone to restore Long Island Sound will not achieve restoration goals. For this reason, your interest today in reauthorizing LISRA is greatly appreciated by the state of New York and its citizens.

The Impacts of Sea Level Rise on Wastewater Treatment

Each of the issues I have raised, while important in its own right, is subsumed by the critical issue of sea level rise and its potential impacts on Long Island's natural resources, water supplies and communities. DEC's natural resources staff has already begun to observe detrimental impacts of sea level rise on ecosystems in southeastern New York. Sea level rise is changing wetland delineations, which had never before been envisioned. In addition to working to reduce the level of greenhouse gases that result in climate change, actions are needed to address the likely impacts of sea level rise on sensitive communities – particularly those in the Long Island Sound watershed. According to the Intergovernmental Panel on Climate Change, sea level rise is likely to result in more intense hurricanes and temperature increases in the Atlantic Ocean, both of which will have unanticipated consequences for the people who live and work in the Long Island Sound area, along with the natural resources which are so abundant in this region.

Sea level rise may, in part, determine future wastewater treatment needs. New York City is evaluating the issue of how to protect its infrastructure and water quality from rising sea level, and other Long Island Sound communities need to do so as well. The New York State Sea Level Rise Task Force is developing guidance to municipalities to protect infrastructure and natural resources. The Long Island Sound Study, with significant input from New York State, is working on a monitoring plan to quantify the environmental changes brought about by climate change and use that information to make management decisions.

American Recovery and Reinvestment Act Funded Projects

Several projects in the Long Island Sound watershed have received federal stimulus fund, including the two wastewater treatment upgrades described below. Stimulus funds were awarded to "shovel-ready" projects that are now stimulating the local economy while improving the Sound's water quality.

For example, the Village of Greenport in Suffolk County received ARRA and other short-term financing for the costs associated with planning, design, and construction for improvements to its

wastewater treatment plant (WWTP). These include full-scale biological nitrogen removal, ultraviolet light disinfection upgrade, and other improvements to the facility. This \$4 million project will ensure the Village's compliance with the CCMP.

ARRA funds are also being used for the design and construction of biological nutrient removal and other upgrades at the Mamaroneck Wastewater Treatment Plant in Westchester County. ARRA funding of \$55 million, necessary to ensure that this facility meets goals set in the CCMP, demonstrates the necessity of significant state, federal and local financial commitments to meet the goals set by LISRA and the CCMP.

Actions to Improve upon LISRA

As I have already mentioned, the need for continued Congressional involvement in this biologically important and heavily populated region remains important. At the same time, we believe that it's time to change direction somewhat, so that the actions we take in the future can be even more effective.

While the need for federal support continues for wastewater treatment upgrades so that serious pollutants such as nitrogen discharges to the Sound are significantly reduced, we believe that it is also critically important that efforts be made now to address stormwater discharges to the Sound. Closures of shellfish beds for harvest are clearly linked to stormwater discharges. Through targeted stormwater control efforts, New York is in the final steps of re-opening the outer portion of Hempstead Harbor for shellfishing after it had been closed for more than 50 years. With sufficient resources to improve stormwater infrastructure, we should be able to open other areas for commercial and recreational harvest to support both commercial and recreational fishermen.

In order to reduce pollutant loading from stormwater discharges to Long Island Sound, a wide range of sources, from urban areas to landscaped green space, must be addressed. Effectively controlling urban runoff involves a comprehensive inventory of the contributing impervious areas, the installation of stormwater management practices, and the improvement of existing stormwater controls. Implementation of a retrofit program to improve existing stormwater infrastructure with enhanced treatment systems, an accelerated maintenance program, reduced fertilizer applications and an effective public education program, are other important goals and should be incorporated into sub-watershed plans to ensure cost-effective solutions. Creative actions, not envisioned when LISRA was first enacted, such as the encouragement of green infrastructure, must now be incorporated into the CCMP's plans and goals.

While water quality improvements are integral to restoring the health of Long Island Sound, so are actions to restore habitats of this biologically productive region. Along with New York State and local governments, federal assistance is needed to restore eelgrass and tidal and freshwater wetlands, shellfish spawner sanctuaries, and to mitigate barriers to fish passage. New York established a Seagrass Task Force which in 2009 completed a management strategy for marine district seagrass, including the Long Island Sound area.

Invasive species – a pervasive problem across the Long Island Sound watershed – also must be a targeted component of efforts to restore the Sound. As an action which goes hand-in-hand with

restoring habitats, the establishment of no discharge zones for marine vessels – and inexpensive but important means of protecting water quality and habitats and controlling invasives – also must be considered in LISRA reauthorization efforts to complement the activities already underway in New York and Connecticut. Most recently, Hempstead Harbor and the Oyster Bay/Cold Spring Harbor complex were both designated as no discharge zones and DEC is working on achieving such designation for all of Long Island Sound.

Finally, I want to briefly mention LISRA's sister statute, the Long Island Sound Stewardship Act (LISSA). LISSA was enacted in 2006 to identify, protect and enhance special places around Long Island Sound. LISSA acknowledges the necessity of the federal role in protecting habitats along the Sound, in both New York and Connecticut, not only to preserve the environmental quality of the Sound, but to ensure public access to it. By authorizing appropriations of \$25 million annually for this purpose, for Fiscal Years 2007 through 2011, the Act recognizes the importance of federal financial contributions to these stewardship projects.

LISSA is being to show results, and this Spring we expect to complete an important acquisition through this program. New York believes that amendments could be made to streamline this law, and possibly fold it into LISRA. As things currently stand, LISRA and LISSA compete against one another for funds; a single, comprehensive funding source for all Long Island Sound-related projects would be an ideal solution. And, given the serious fiscal constraints which New York, like other states, now faces, New York strongly urges the Senate to consider decreasing the current 50-50 match for Long Island Sound projects to a 75% federal -25% non-federal match. The state would be willing to revisit this issue in the future, once the state has regained sound financial footing.

Summary

In summary, Long Island Sound has been one of the most beautiful and ecologically productive regions of the country, meriting the strong support of Congress and the federal government in efforts to improve its water quality and ecosystems. While many actions to improve the Sound have been made by New York, Connecticut and our federal, local and other partners over more than two decades, much more needs to be done. For Long Island Sound, we are at a crossroads – the success of our past endeavors shows that actions can be taken to reduce hypoxia and restore healthful water quality. In order for our past efforts to be successful, however, it's time for the states and local governments to redirect their efforts toward new – and in some cases very costly – efforts to reduce pollutant loads to the Sound. For this goal to be met, the federal government must enhance its commitment to this Estuary of National Significance. New York is confident that, with the support of Congress, we can achieve the long-hoped for goals for the Sound.

On behalf of Governor Paterson, I thank you again for holding today's hearing and for your interest in New York's views on Long Island Sound restoration. I am happy to answer any questions that you might have.