

Testimony of:

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Chairman Simpson, Ranking Member Moran, and members of the Committee, thank you for the opportunity to appear before you today. My name is Howard Neukrug and I'm the Commissioner of the Philadelphia Water Department. I'm proud to have the opportunity to share with you my unique experience and insights, based on my work with our team of more than 1,800 dedicated, innovative professionals serving the greater Philadelphia region 24 hours a day, 7 days a week. Our teams deliver integrated water, wastewater and stormwater services, treating about 300 million gallons of drinking water and 465 million gallons of wastewater and stormwater every day, while keeping our commitment to protect public health and the environment, and to support the sustainable growth of our city.

As part of my work as Commissioner, I serve on the Board of Directors of the National Association of Clean Water Agencies (NACWA), which represents the interests of more than 350 municipally owned wastewater treatment agencies and organizations who collectively treat approximately 80 percent of the nation's wastewater and who are public servants working each and every day to meet the objectives of the Clean Water Act. It is my pleasure to be testifying on NACWA's behalf today as well as the City of Philadelphia.

America's water and wastewater utilities provide valuable services to our environment, our economy, and our health. By collecting and treating wastewater from households and businesses, these clean water facilities deliver cleaner rivers, lakes, and coastal waters that sustain growing fish populations, enable water-based recreation, increase adjacent property values, and improve and protect public health. These outcomes, in turn, generate jobs that stay in America, increase economic output, and enable businesses to locate in the U.S. and grow.

Since passage of the Clean Water Act (CWA) in 1972, the estimated investment in the Nation's wastewater infrastructure totals \$1.4 trillion. While the successes to date under the Act have been impressive and a majority of waters that once were impaired now meet CWA standards, data over the past several years suggest that we may have hit a plateau in terms of water quality gains and that the gains made to date may be at risk absent additional investment and a smarter approach to prioritizing an increasingly complex web of water quality compliance requirements.

#### **Decreasing Federal Investment Harms Municipalities and Ratepayers**

Modernizing and replacing the country's aging water infrastructure may be the single largest public works need that our Nation faces, and it will require a serious investment. The U.S. Environmental Protection Agency's (EPA) most recent needs survey estimates \$293.7 billion is needed today by clean water agencies to comply with the CWA. A similar story can be told on the drinking water front: \$334.8 billion in drinking water infrastructure investments is needed over the next 20 years.

On top of these needs, a 2009 assessment on the costs needed by drinking water and wastewater agencies to confront the realities of a changing climate indicated that as much as \$1 trillion over the next 30 years will be necessary to improve resiliency in the face of more frequent and extreme weather events like Hurricane Sandy and the persistent drought that has gripped places like Texas and other states.

While the funding gap is well known, it is of greater importance to identify its impacts and potential solutions to address it. The lack of federal funding has been extremely hard on municipalities, who currently shoulder approximately 97% of the costs of clean water projects and face a backlog of over \$40 billion in local clean water infrastructure projects. In addition, according to a recent survey of NACWA members, our member agencies are spending approximately 26% of their annual operating budgets to service their debt. This is important because increasing sums are going toward debt service as opposed to new infrastructure investments.

To meet their current clean water challenges and existing debt obligations, clean water utilities have raised rates by more than double the rate of inflation for the last ten years. Today, 40% of households across America are already paying more out of their disposable incomes for wastewater management than the EPA says is affordable (i.e., 2% of their median household income). Given the current economic situation with high unemployment and poverty rates, utilities are reluctant to ask ratepayers to pay even higher rates and strain their pocketbooks further.

### **We Need a Stronger Federal Partnership in Meeting the Nation's Clean Water Needs**

As Congress works to reduce the deficit, it is important that the federal government remain a reliable partner in helping communities meet their CWA obligations. The Clean Water State Revolving Fund (CWSRF) has been one of the more successful federal-local partnerships, providing \$47.9 billion to nearly 15,300 job-producing projects around the country. The short- and long-term improvements

made possible by the CWSRF have delivered significant environmental, economic and public health benefits as well.

Given the enormous and growing investment need, decreasing federal support for the CWSRF at this time is extremely ill-advised. In fact, we need a more reliable and sustainable way to put money into the CWSRF that keeps the federal government at the table without subjecting the CWSRF to the unpredictability or pressure of the annual discretionary budget process. NACWA supports the establishment of a Clean Water Trust Fund, to ensure that a dedicated and non-discretionary source of funding exists for the CWSRF. A Clean Water Trust Fund, similar to those that provide stable funding for highways and airports, would create a reliable revenue stream to supplement existing local and state investments. This would address the backlog of clean water projects and ensure that the sector is able to continue meeting the goals of the Clean Water Act. NACWA also believes that other federal financing tools that put new money on the table deserve serious consideration, including methods to increase private capital into the system, loan guarantee programs that complement the SRFs, and concepts like a national infrastructure bank so long as water infrastructure receives equal consideration as investments in transportation and ports.

As important as new funding opportunities are, it is more important to ensure that the existing funding mechanisms are not harmed. NACWA, in line with the U.S. Conference of Mayors, the National League of Cities, and the National Association of Counties, urges Congress to maintain the tax-exempt status of municipal bonds, a principal source of financing for wastewater projects. In the last decade, municipal bonds have financed more than \$258 billion in water and sewer infrastructure projects, more than total municipal bond-based investment for roads and highways, public power projects, or mass transit. If the tax-exempt status of municipal bonds were limited or eliminated, it would increase the costs of local borrowing by billions of dollars. In Philadelphia, for example, the elimination of tax-exempt bond status would likely mean over \$40 million in additional interest and coverage related expenditures every year for every \$1 billion in new capital borrowing (a 40% increase!), which would either be passed onto ratepayers who cannot afford it or simply diminish the level of greatly needed infrastructure investment. Neither of these options are advisable at a time when jobs are scarce and the physical state of our public water works and other municipal infrastructure are deteriorating.

#### **Investment in Clean Water Infrastructure Spurs Economic Growth and Creates Jobs**

Increasing federal investment in clean water infrastructure would not only help reverse declines in water quality and help overcome a well-documented investment gap, it would expand Gross Domestic Product (GDP) and create hundreds of thousands of jobs. In fact, for every \$1 billion spent on clean water infrastructure in the U.S., 28,500 new jobs are added, \$3.4 billion is added to the GDP, and personal income is boosted by \$1.1 billion.

Capital invested in clean water infrastructure is proven to generate more jobs per dollar than a comparable investment in schools, transportation infrastructure, energy infrastructure, or broad-based tax cuts. Clean water infrastructure is critical for private sector development as well. For every \$1 billion in new investment in core infrastructure, we can expect an extra \$840 million added to GDP each year from the private economy, of which about \$141 million is increased output from the manufacturing sector. These economic impacts are clear in cities where clean water investments have revived waterfronts, spurred new recreational opportunities such as kayaking and fishing in urban waters, and have lead to a rebirth of once abandoned green space along the water.

### **Clean Water Utilities Are Transforming into Agents of Resource Recovery**

We believe that the federal government must remain a reliable partner in improving our water infrastructure, however clean water agencies also understand that we will continue to shoulder most of the burden. Knowing this, utilities have had to get smarter and look for ways to make each dollar stretch as far as possible. A broad shift is taking place in the clean water community as utilities transform from basic providers of wastewater services to full blown resource recovery agents, capturing waste heat and generating renewable energy on-site, reclaiming and reusing water, extracting and finding commercial uses for nutrients, and using green infrastructure to manage stormwater and improve urban quality of life more broadly. The result is savings and even revenue generation for the utility but also a more attractive and sustainable urban environment.

This concept is one of the ideas that we consistently keep top-of-mind at the Philadelphia Water Department. Our vision is for our utility to meet the complex responsibilities and opportunities of our times and our environment, and we work every day to uphold and advance that charge.

To this end, our major resource recovery efforts focus on green power and waste heat use, as well as the recycling of biosolids. We're extremely proud, for example, of the work in progress on the

construction of our innovative Biogas Cogeneration Facility in Northeast Philadelphia. The Cogeneration facility will use the methane gas produced by the existing digesters at our adjacent wastewater treatment plant to safely generate more than 80% of the power and heat for the facility; this will account for a reduction of 44 MWh/ year in our previous power consumption at this site.

In addition, the Philadelphia Water Department is currently piloting a heat recovery system that will eventually be used in all of our water pollution control plants. This system warms the facility with heat extracted from wastewater, eliminating the need for gas or oil heat. We anticipate significant costs savings in operational overhead as a result of its implementation.

Last year, we also began full-scale production at our new pelletization facility at our Biosolids Recycling Center, where we are successfully re-purposing the treated biosolids that would have become environmental waste, into a vital nutrient resource for fertilizing farmlands. Farmers in Pennsylvania, Maryland, Virginia, and Florida are now benefiting from the application of these pellets to help the growth of their crops.

Philadelphia has been nationally recognized as well, for the work our Water Department did in developing the state-of-the-art Contamination Warning System, drinking water contamination warning system to protect the public from acts of terrorism and other assaults on the water supply by providing timely detection of water contamination events.

This is not our only celebrated effort in protecting the water supply. The Philadelphia Water Department's newly launched *Green City, Clean Waters* partnership with the EPA has garnered notable media attention, and this program, which restores local waterways and manages stormwater runoff with cost-effective community beautification green stormwater infrastructure practices, has become a model for other U.S. cities. We've gotten support for it locally with the employment of mandates on developers in our city, now requiring them to meet certain on-site stormwater management standards for all new construction. These sites will account for about one-third of the green space *Green Cities, Clean Waters* will eventually create.

These are just a few examples which illustrate that in everything we do, the Philadelphia Water Department is committed to delivering maximum environmental benefits at the least cost to society.

We're keenly aware that our efforts to increase operational efficiencies in a manner that protects our environment also directly affects our ability to offer rates that remain among the lowest in our region – a value that becomes increasingly important as we recognize the limited ability of our customers, and customers around the country, to pay more.

Although we are working diligently, there is so much more to be done, and we need tremendous support in order to accomplish it. In Philadelphia alone, there are over 6,000 miles of water and sewer mains, the bulk of which will require upgrading or replacement in the coming years, in order for us to continuously distribute safe, drinkable water and provide reliable wastewater services to the more than two million people who rely on us.

Please be aware that we are using every tool in the book to manage our capital expenses, from improved asset management and long-term capital planning, to financial planning for improved bond ratings, and strategic planning to prioritize our capital activities, well into the future. In addition, we are diligently establishing public-private partnerships for help funding our large projects like the Cogeneration Plant and the Biosolids Pelletization Facility, and we are working with groups like NatLab, the Living Cities Foundation and the William Penn Foundation to identify innovative approaches to bringing private equity to our capital programs, with a focus on nurturing new business models for managing stormwater.

Indeed, our massive undertaking, to green and update our infrastructure for the 21<sup>st</sup> century and beyond, is absolutely essential, but is in reality, only fully possible with the continued, reliable and increasing support of our partners in federal government. In addition to vital fiscal investment, it's imperative that our federal partners remain abreast of the challenges facing our efforts and offer facilitation support. We're pleased to see this happening with EPA's recognition that current methods and requirements for CWA compliance present significant obstacles for our communities, and that more flexibility, without sacrificing water quality, is necessary. In June 2012, the EPA released its integrated planning framework, which allows communities with an approved integrated plan to sequence their clean water investments and work on projects that will yield the greatest water quality benefit first. Philadelphia is proud to be among the EPA's first partners in implementing an integrated approach to water management.

It's this kind of support -- which reflects an understanding of our core mission to deliver the greatest benefit to the public in everything that we do -- that will allow U.S water utilities to successfully continue our work as providers of one of life's ultimate essentials, and consequently, as leaders in service to our nation's cities.

### **Conclusion**

We are at a crossroads. Forty years after the passage of the Clean Water Act, our industry is struggling to balance three core principles -- the amount of time needed to comply with federal regulations; the level of flexibility needed to prioritize competing compliance requirements; and the appropriate levels of federal/state/local investment needed to achieve these shared clean water goals. With committed federal support in all of these areas, utility leaders across the country will continue to transform our industry and stretch their ratepayers' investments to guarantee another four decades of water quality and environmental improvement that is sustainable and unrivaled.

Thank you for the opportunity to appear before you today, I look forward to any questions the Committee may have regarding my testimony.