

**Testimony of
John Hanger, Secretary
Department of Environmental Protection
Before the Senate Appropriations Committee
Governor's Proposed 2010-2011 General Fund Budget
Monday, March 1, 2010**

Chairman Corman, Chairman Costa and members of the committee, thank you for the opportunity to appear before you today to discuss Governor Edward G. Rendell's 2010-2011 Executive Budget for the Department of Environmental Protection.

The department is presenting a \$157 million General Fund budget as part of its \$890 million fiscal year 2010-2011 budget, that includes \$314 million in special funds and \$389 million in federal funding. DEP's General Fund budget has been reduced by 2.33 percent compared to current operating levels.

Interest in Pennsylvania's Marcellus Shale formation is greater than ever before. The department's goals remain to protect the state's waters and produce the gas. And progress is being made with less water than expected being returned during the drilling process. More water that does return is now being reused. The department is moving forward to strengthen regulations that protect our vital water resources, as well as adding staff to its oil and gas activities for the second year in a row.

Drilling wastewater is high in Total Dissolved Solids (TDS). TDS is a measure of all elements dissolved in water and can include carbonates, chlorides, sulfates, nitrates, sodium, potassium, calcium and magnesium. Importantly, TDS can come from discharges from sewage treatment plants, stormwater runoff, metal mining, mining, meat packing plants, vegetable processing plants, grain milling plants, bakeries, beverage processing facilities, agricultural chemical manufacturing, oil and gas drilling, petroleum refining, leather processing, primary metal industries, fabricated metal products, electric services, refuse systems, scrap and waste material industries and Abandoned Mine Drainage.

The problem of TDS is a threat to Pennsylvania's waterways. In 2008 and 2009, TDS levels exceeded drinking water standards along the Monongahela River. This serves as a reminder and a warning that rivers and waterways can only dilute so much pollution before water quality reaches unacceptable levels. In addition, Pennsylvania's water treatment plants are not equipped to remove TDS from drinking water, and these pollutants are delivered through our pipes and out of the taps to our residents.

To address this problem, the department has proposed a rule regulating TDS discharges. The department also took action and issued the Permitting Strategy for High TDS Wastewater Discharges on April 11, 2009. This strategy presents an approach that allows the department, until the proposed regulation is finalized and approved, to effectively deal with the increasing demand for assimilative capacity in the surface waters.

In addition, the department is encouraging the reuse and recycling of wastewater, which will cut down on water withdrawals and dramatically reduce the amount of water being taken to treatment facilities. The department believes that up to 50 percent of operators are reusing at least a portion of the wastewater, with some operators reporting nearly 100 percent reuse. The reuse of wastewater will reduce the overall disposal needs for high TDS wastewater throughout the state.

DEP also is working to improve its well construction standards to protect the public from gas migration events. The department has developed draft regulations in conjunction with its Oil and Gas Technical Advisory Board that will strengthen well-casing and cementing requirements.

DEP's work to amend Pennsylvania's oil and gas regulations will strengthen well construction standards and define a drilling company's responsibility for responding to gas migration issues, such as when gas escapes a well or rock formation and seeps into homes or water wells. Specifically, the new regulations will:

- Require the casings of Marcellus Shale and other high-pressure wells to be tested and constructed with specific, oilfield-grade cement;
- Clarify the drilling industry's responsibility to restore or replace water supplies affected by drilling;
- Establish procedures for operators to identify and correct gas migration problems without waiting for direction from DEP;
- Require drilling operators to notify DEP and local emergency responders immediately of gas migration problems;
- Require well operators to inspect every existing well quarterly to ensure each one is structurally sound, and report the results of those inspections to DEP annually; and
- Require well operators to notify DEP immediately if problems such as over-pressurized wells and defective casings are found during inspections.

But, regulations and protections do very little if the department does not have the staff necessary to inspect well sites and oversee the environmentally protective development of this resource. Through the increased well permit fees, the department was able to add an additional 37 people to its regional permitting, compliance and enforcement staff in 2009.

In January 2010, Governor Rendell directed DEP to hire an additional 68 oil and gas permitting, compliance and enforcement staff in response to the continued dramatic growth and interest in the Marcellus Shale. These positions will be 100 percent fully paid with money generated by new, higher permitting fees instituted in 2009 that are based on well length and type. The permit fees had not been increased since 1984. Similarly, the department is also proposing fee increases for other regulatory programs to cover the cost of the administration of these programs.

No energy source is perfect. Each has its strengths and weaknesses. But natural gas is one of the cleaner fuel options we have available to us today. Natural gas exploration is a critical part of what must be our nation's strategy to decrease our dependence on foreign oil. Using natural gas will also help cut down our soot, carbon and mercury emissions. DEP is working everyday to ensure gas production meets strong environmental rules and boosts Pennsylvania's economy.

The extraction of natural gas from the Marcellus Shale could create hundreds of billions of dollars in new wealth and tens of thousands of new jobs, profoundly changing Pennsylvania. The Pennsylvania Economy League predicts that 26,000 full and part time jobs will be created this year, and 100,000 jobs by the end of the decade due to the Marcellus Shale boom.

As of December 31, 2009, DEP had permitted 2,500 Marcellus wells. Of those, more than 1,000 wells have been drilled, with 763 wells were drilled in 2009 alone. The industry has informed DEP that it expects to permit 5,200 Marcellus wells in 2010, tripling the number of these wells now permitted in Pennsylvania.

As the nation's consumers and businesses continue to deal with the fluctuating costs of power and fuel, our investments in natural and alternative energy resources and programs will become increasingly important to our economy.

During the budget address, the Governor again called for the strengthening of Pennsylvania's Alternative Energy Portfolio Standards Act. By increasing the use of solar and other renewable sources and developing new technologies, Pennsylvania will create new jobs, lower energy costs and cut pollution that harms human health.

Strengthening our standards will maintain Pennsylvania's place at the front of the pack when it comes to alternative energy development. At the time this legislation was enacted in 2004, it was one of the most ambitious standards in the nation. The law required that by 2021, 18 percent of all retail electricity sold in Pennsylvania had to be from clean and renewable resources.

Pennsylvania's standards have already helped to attract major new energy and technology companies like Gamesa, but other successful businesses already located in the state, like Voith Hydro in York County and Hodge Foundry in Mercer County are benefiting from these standards as well.

In the six years since the standards were adopted, other states have raised the bar by enacting more aggressive requirements for renewable energy. Maryland now has a renewable requirement of 20 percent by 2022; New Jersey's renewable requirement of 22.5 percent by 2021; and Illinois -- the seventh largest coal producing state in the nation -- has a 25-percent-by-2025 requirement.

We also have to take another look at solar energy. Pennsylvania's solar requirement is currently one-half of one percent by 2021, which is below other states like: New Jersey whose solar requirement is 2.12 percent by 2020; Maryland that is two percent by 2015; and Illinois requirement is six percent by 2015.

When other states enact higher requirements for renewable energy, they make their own states more attractive for future investments and put Pennsylvania's competitiveness at risk. We need to preserve the commonwealth's position as a leader in alternative energy and protect our investments and the thousands of associated jobs by raising our requirements for renewable energy.

Since 2003, Pennsylvania has invested more than \$1 billion in alternative energy, leveraging more than \$5 billion in private investment. By being a clean energy powerhouse in energy conservation, natural gas, solar, carbon capture and storage technology, as well as wind, geothermal, hydro, bio-diesel, and cellulosic ethanol, Pennsylvania will create hundreds of thousands of new jobs and cut substantially the pollution of our air, land, and water that harms ecosystems and sickens human beings.

And the demand for these sources is growing. Pennsylvania and the nation are looking to sources like wind because it's an alternative source of energy from a domestic resource that can be produced at a stable, competitive price. Nationally, 35,000 megawatts of wind power has been installed with close to 10,000 megawatts of generating capacity just added in 2009. Pennsylvania added 388 megawatts of capacity in 2009, more than doubling the existing capacity. The commonwealth has 16 wind farms currently in operation producing more than 748 megawatts of electricity. That's enough to power 224,000 homes.

And Pennsylvania's solar industry is also growing at a rapid pace and putting people to work. Through the PA Sunshine Program, the department has certified 465 solar installers to install solar systems on homes and small businesses. Companies like Aqua PA Inc. in Chester County, institutions of higher education like Edinboro University in Erie County, as well as our health care facilities like the Lehigh Valley Hospital will soon be generating clean energy and reducing energy costs as a result of the installation of new solar technologies.

Pennsylvania currently has 10 megawatts of solar technology installed that is expected to generate 12,000 megawatt hours of electricity, enough to power approximately 1,200 average homes in Pennsylvania annually. In addition, Pennsylvania has approximately 80 megawatts worth of solar projects in the pipeline for 2010 that are expected to generate about 96,000 megawatt hours of energy, enough to power approximately 9,600 average homes in Pennsylvania annually.

In, July 2008, Governor Rendell signed Act 70 calling for a Climate Change Action Plan. A 21-member committee was charged with advising and assisting DEP in creating a comprehensive report on potential climate change impacts and economic opportunities for the commonwealth. The committee and DEP then developed an action plan to implement cost-effective strategies to reduce or offset the state's greenhouse gas emissions.

The Climate Change Action Plan coupled with the actions Pennsylvania has already undertaken are expected to result in the net creation of 65,000 new full-time jobs and add more \$6 billion to the commonwealth's economy by 2020. The Climate Change Advisory Committee has created a blue print to help Pennsylvania businesses and households alike reduce energy consumption and save money.

The plan recommends a 30 percent reduction in Pennsylvania's greenhouse gas emissions below year 2000 levels by 2020. The report identifies 52 specific actions that, when combined with the state's recent achievements, has the potential to reduce our annual emissions by as much as 42 percent below year 2000 levels or the equivalent of more than 120 million tons of greenhouse gas emissions. Of the 52 recommendations made by the committee, 39 were adopted unanimously or close to it.

With help from funding made available through President Obama's American Recovery and Reinvestment Act, Pennsylvania is beginning to emerge from the recession. Over the past year, DEP has had the responsibility to manage and invest more than \$367 million of ARRA funding that is strengthening our economy, protecting the environment and creating jobs for Pennsylvania's hardworking men and women.

To date, DEP has invested its share of Pennsylvania's ARRA funding that includes:

- \$219 million for drinking water and wastewater projects that will create at least 5,600 jobs. Two successful examples of these dollars being used wisely are:
 - A \$3.5 million wastewater project in Cresson Borough, Cambria County received \$2.29 million in recovery funding from PENNVEST. The project will prevent flows of raw sewage into the Conemaugh River and help bring the wastewater treatment facility into compliance with requirements of the Clean Water Act. This project will protect public health by eliminating raw sewage overflows into the Conemaugh River, improve the operation of the Cresson Borough wastewater treatment system and create 45 new construction jobs.
 - The Lackawanna River Basin Sewer Authority's Throop treatment plant, received \$30.6 million in funding through PENNVEST in July 2009 that included \$5.1 million in ARRA funds, \$1.5 million in Commonwealth Financing Authority funding and \$24 million in PENNVEST funds. The project increases the treatment plant's design average flow from 7 million gallons per day to 10 million gallons per day and provides for nutrient reduction upgrades.
- \$114.9 million of Recovery funding has been obligated or invested in 152 alternative energy projects that hold the promise of creating nearly 800 new permanent construction jobs and retaining more than 2,000 jobs in communities throughout the commonwealth. Two successful examples of alternative energy and conservation projects include:
 - Crayola, LLC received \$1.27 million in Green Energy Works! Solar ARRA funding to develop a solar powered facility at its headquarters and manufacturing site in Easton. The project represents 10 percent of the power consumed by the entire plant and one third of the energy consumed for crayon manufacturing. The project will consist of 26,200 photovoltaic panels and produce over 2.4 million kilowatt hours of electricity annually helping to offset electricity costs and

preserve 1,187 jobs at their manufacturing and research facilities. This project broke ground in fall 2009 and when completed, the solar arrays are expected to offset approximately 4.6 million pounds of carbon dioxide annually.

- The Shriner's Hospital in Erie County received \$250,000 in PA Conservation Works ARRA funding to improve its lighting, air handling and boiler systems. The hospital's project will result in an energy saving of 36 percent. Once complete, the hospital estimates an annual savings of \$62,000 in utility costs, cutting the hospital's electrical energy use by 315,367 kilowatt hours per year, reduce the consumption of natural gas by 3,380 million cubic feet per year, and preventing the use of 28,000 gallons of water annually by reducing the operation level of the hospital's humidifier.
- \$6.1 million to clean up sites where historic abandoned underground tanks are hindering economic development due to concerns about possible contamination and potential cleanup costs:
 - Currently, DEP contractors have initiated field work at 35 of the sites. Corrective actions include removing leaking and abandoned tanks and contaminated soil, as well as investigating the extent of contamination.
 - During the fourth quarter of 2009, the 10,300 hours worked by environmental technicians, equipment operators, drilling technicians and various environmental professionals on these projects accounted for 20 full-time equivalent jobs. It is expected that approximately 90 full-time equivalent jobs will be funded by these Recovery Act investments.

As I stated during the appropriation hearings last year, the termination of the Recycling Fee is set for January 1, 2012 and the Act 101 Grant Programs administered by the department will be reduced starting this year. DEP requests your support to authorize the extension of the fee that supports the recycling programs of Pennsylvania's counties and municipalities.

Recycling and its related programs provide many benefits to the citizens of the commonwealth. Pennsylvania's recycling industry is directly responsible for more than 52,000 jobs with an annual payroll of \$2 billion and generates \$20 billion in gross receipts. These important programs reduce our dependence on raw materials and reduce greenhouse gas emissions through the use of recycled material during the production of marketable goods.

In closing, I am proud of our staff and the way they have responded to the challenges during a difficult year to carry out our mission to protect drinking water supplies for more than 12 million people; ensure the safety and reliability of our nuclear power plants and other electrical generation facilities; monitor and inspect the state's dams and flood control projects; inspect and regulate our mines and quarries; oversee the operation of municipal waste landfills and the safe disposal of millions of tons of waste each year; and respond quickly to natural and man-made emergencies.

Chairman Corman, Chairman Costa and members of the committee, I thank you for your time and attention. I'd be happy to answer any questions you have at this time.