

Technologies Created to Reduce Nutrient and Sediment Pollution in the Chesapeake Bay Previewed by the Maryland Technology Development Corporation and the Chesapeake Bay Foundation

Annapolis, Md., (July 21, 2010) – More than 100 invitation-only attendees with vested interest in the health of the Chesapeake Bay came together today to discuss issues and initiatives to prevent bay pollution. The event, **“Technologies that Can Save the Bay: Reducing Nutrient and Sediment Pollution,”** which was sponsored by the Maryland Technology Development Corporation (TEDCO) and the Chesapeake Bay Foundation (CBF), highlighted nine technologies from private industry, non-profit associations and research universities that are being developed and deployed to improve water quality and improve the overall health of the Chesapeake Bay by reducing pollution. The event took place at CBF’s Phillip Merrill Environmental Center.

The event featured keynote remarks by Tom Horton, noted environmental journalist and Chesapeake Bay expert, and J. Charles “Chuck” Fox, senior advisor on the Chesapeake Bay and Anacostia River to the U.S. Environmental Protection Agency (EPA). Jim Poulos, vice president of Technology Transfer and Commercialization at TEDCO, Allen Hance, executive director of the Chesapeake Bay Trust, and Amanda Bassow, director of Chesapeake programs at the National Fish and Wildlife Foundation, delivered a special presentation on funding opportunities for entrepreneurs interested in Chesapeake Bay conservation. Attendees and presenters enjoyed a networking, poster, and exhibit session at the end of the event. Closing remarks were made by CBF President Will Baker.

“Today’s showcase was extremely exciting for TEDCO because it highlighted our ability to help facilitate technology-based advancements that benefit the Chesapeake Bay and the overall health of our local environment,” said John Wasilisin, acting president of TEDCO. “The Chesapeake Bay and surrounding watersheds are crucial to Maryland’s economic development and quality of life and TEDCO is proud to support the efforts of the Chesapeake Bay Foundation by bringing innovative technologies that can combat the harmful effects of pollution in the Chesapeake.”

“Environmentalists, business leaders, entrepreneurs and those concerned with the health of the Chesapeake Bay have come from all over the region to learn about these emerging green technologies,” said Will Baker, president of CBF. “We are pleased to work with TEDCO to promote the awareness of these technologies and are eager to see more environmentally-focused business models transfer to the marketplace.”

Technologies presented at the event include:

- *Creating Green Stormwater with Bioretention, Allen Davis, University of Maryland College Park:* Bioretention, a soil and plant-based stormwater management practice, is used to filter runoff from developed communities. Also known as a rain garden, a bioretention facility consists of a porous soil covered with a thin layer of mulch and is designed to mimic natural vegetated areas and filter pollutants from water.
- *Porous Asphalt, Kent Hansen, National Asphalt Pavement Association* – Porous asphalt is an environmentally friendly tool for storm water management. It can conserve water, reduce runoff and promote infiltration which cleanses stormwater, replenishes aquifers and protects streams.
- *Smartslope: Living Retaining Walls, Michael Furbish, The Furbish Company* – The Furbish Company designs, sells, installs and maintains plant-based building systems. “Living Walls” enable building owners and occupants to benefit from improved comfort and health, lower utility bills, increase asset value and help to restore the environment.

•*Reclamation of Water and Prevention of Animal Waste Runoff, Carol Collins, Spiralcat* – Spiralcat, a women-owned corporation that harvests water, energy and biofuel from diverse waste sources in order to transform waste into valuable energy and water resources. The company's technologies support local food economies, provide clean water, create usable resources, manage nutrients for soil fertility and deliver energy in an affordable manner.

•*Molecularly Imprinted Polymers for the Selective Capture of Environmental Phosphate, Tracy Terry, JHU Applied Physics Laboratory (APL)* – Phosphorus and nitrogen are major pollutants that enter water via runoff from sewage plants and farmland. Currently, there are no filtering systems that can selectively remove these two elements. APL is working on a system that has the potential to reduce contaminant concentrations of phosphorous and nitrogen to any arbitrary level through staging.

•*Slow Release Fertilizer, Wayne Swann, NutriGrown, LLC* – NutriGrown, LLC is developing a line of matrix-based soil nutrient products designed to reduce nutrient leaching while enhancing plant growth. Greenz™ technology is exclusively licensed from the USDA/ARS and is based on a formulated matrix of natural organic and inorganic compounds with high ionic exchange capacity. The matrix components bind and retain nutrients for both short and long term plant utilization.

•*Regenerative Stormwater Conveyance and Floating Wetlands, Keith Bowers, Biohabitats, Inc.* – Biohabitats, a conservation and ecological restoration company, is developing floating artificial wetlands. These wetlands are composed of recycled plastic bottles wrapped in biodegradable fiber mats in the entrances to the Bay such as the Inner Harbor in Baltimore. These wetlands act not only as filters but as regenerated wetlands.

•*SkyGarden: Green Roof Media, Emlyn Stancill, Stancills, Inc.* – SkyGarden specializes in engineered soils and mineral formulations for the greenroof industry. A green roof system is an extension of the existing roof which involves a high quality water proofing and root repellent system, a drainage system, filter cloth, a lightweight growing medium and plants.

•*Pelletizing Seeds for Habitat Restoration, Robert Murphy, EcoSystem Solutions Inc.* – Ecosystem Solutions, Inc., a small, privately owned, environmental consulting firm based in West Warwick, RI, specializes in wetland science, ecological solutions and soil science. They work with pelletized seeds to increase the success rate of habitat restoration. Pelletizing seeds are seeds wrapped in a clay pellet, which is a simple technique for hiding and protecting the seed until it can germinate.

The Maryland Technology Development Corporation (TEDCO), an independent entity, was established by the Maryland General Assembly in 1998 to facilitate the creation of businesses and foster their growth in all regions of the State. TEDCO's role is to be Maryland's leading source of funding for seed capital and entrepreneurial business assistance for the development, transfer and commercialization of technology. TEDCO connects emerging technology companies with federal laboratories, research universities, business incubators and specialized technical assistance. For the fifth consecutive year, TEDCO was recognized as the most active seed/early-stage investor in the nation in the August 2008 issue of Entrepreneur magazine and received the national Excellence in Technology-Based Economic Development award from the State Science and Technology Institute (SSTI) for the Maryland Technology Transfer & Commercialization Fund (MTTCF) program in October 2008. For more information on TEDCO and its programs and resources, visit www.MarylandTEDCO.org.

The Chesapeake Bay Foundation (CBF) is the largest independent conservation organization working to restore the Chesapeake Bay and its rivers and streams. CBF works for effective, science-based solutions to the problems ravaging the Bay and its 64,000-square-mile watershed through education, restoration, advocacy, and, when necessary, litigation. CBF fights for strong and effective laws and regulations, and works collaboratively with government, business, and citizens in partnerships to protect and restore the Bay. Through award-winning education programs, we provide on-the-water experiences to more than 40,000 students and teachers annually. Our mission and motto, **Save the Bay®**, is a regional rallying cry for our ongoing campaign: The Biggest Fight For Clean Water This Nation Has Ever Seen.

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