“Today more than ever before, science holds the key to our survival as a planet and our security and prosperity as a nation.” These words by President Barack Obama describing his recent Presidential Memorandum on Scientific Integrity ring true not only at the national level, but are also relevant for the work being done from our small office in Vienna, Maryland. In addition to conservation, collaboration, communication and education, the Nanticoke Watershed Alliance identified scientific integrity as one of our organization’s five core values. We rely on sound science to assess the health of the watershed and share information with the community.

Scientific integrity refers to the commitment to objectivity when conducting research, analyzing data, and sharing results, and is fostered through continuously monitoring processes, and procedures. The Alliance’s dedication to scientific integrity is exemplified through the Nanticoke Creekwatchers Citizen Water Monitoring Program.

Nanticoke Creekwatchers began in July 2007 after a rigorous development process that focused on proper scientific protocols and review. We are in our 6th year and recently released the first Five Year Report Card (see page 5). Since 2007, over 80 citizen volunteers have participated, and each one has completed a comprehensive training program. The strength of the program is due to the dedication and serious commitment of the volunteers, the leadership of our Volunteer and Outreach Coordinator, Beth Wasden, and the focus on scientific integrity.

A detailed Quality Assurance Project Plan is renewed and approved annually. In addition, the program follows standard operating procedures established by Envirocorp Labs to ensure that water samples are gathered and transported properly so that the lab can analyze the samples with accuracy, precision, and within detection limits. All of these reasons have allowed this program to grow to a total of 36 sites monitored bi-weekly during an eight-month season to measure a broad suite of parameters. The Nanticoke Creekwatchers is not only a bi-state award winner (see page 6), but is also one of only two citizen monitoring programs in the Chesapeake Bay watershed whose methodology is approved by the US EPA.

In addition to providing the backbone of Nanticoke Creekwatchers, scientific integrity also drives the Alliance’s dedication to collaboration and education. Information is shared with the public in a non-biased manner. As the Nanticoke Watershed Alliance embarks on a new environmental education program, the importance of sound science will be critical to educating the next generation.

I would love to hear from you and can be reached at 410-430-3273 shellybaird@nanticokeriver.org.
I have lived in eastern Wicomico County in a small town called Parsonsburg for most of my life, excluding a few semesters I spent away at McDaniel College and living off campus at Salisbury University. While at McDaniel College in Westminster, MD, I was never homesick, but I was happy when I had the chance to go home for long weekends or for summer and winter break. The trip would take a little less than three hours by car. To pass the time, I would anticipate the landmarks on the way home.

Most of the landmarks on the Western Shore were a blur as the open three and four lane highways of 795, 695, and 97 lend themselves better to speeding. But as I reached Route 50 and approached Annapolis, I knew I was getting ever closer to home as I passed by the tall buildings of Annapolis, the Red, Hot and Blue, and the Wawa on exit 29 before the Bay Bridge. After the excitement of crossing the Bridge, I would cruise through Kent Island, zip by the outlets at Queenstown and cross the small bridges over Skipton Creek. My journey would take me through the town of Easton and I would try to avoid getting stuck at one of the traffic lights. I would pass through Trappe and by Pop’s Market. Soon I’d arrive at the bridge over the Choptank and the town of Cambridge. After Cambridge, there was only one more landmark I would long to see.

The bridge ascends high over the Nanticoke River and the orange, overhead lights illuminate the road in the darkness of night. I was passing by the town of Vienna and crossing the Nanticoke River and the sight of the bridge raised my spirits, as I knew I would soon be home. At the end of the bridge, my final landmark, there is a sign that says “Welcome to Wicomico County.” I would still have another 25 minutes on my commute, but it was enough for me to be back in Wicomico.

With my CCC year now over, I am preparing to move to Cecil County, where I have accepted a job as a seasonal ranger at Elk Neck State Park. Doubtless, I will be making many long drives back home to Wicomico County, noting the landmarks as I pass. But the bridge, the town of Vienna, and the Nanticoke River will hold another meaning to me as this place has become a home away from home to me since I started working at the Nanticoke Watershed Alliance last August. During my term of service I have planted hundreds of trees near the banks of the river south of Vienna, collected macro invertebrate samples in the watershed, collected water samples for the Ag Buffers program, and worked to restore the Tom Tyler Nature Trail, all the while becoming fonder of the Nanticoke and its many natural beauties.

I would like to thank the NWA staff, board, and volunteers for helping me during my CCC term of service. I have learned many things and gained valuable experiences that I’m sure will help me throughout my career. It was a pleasure working with and getting to know everyone. Surely I will miss things like celebrating with staff after a successful NWA event, stopping in at Millie’s for a bowl of hot lima bean soup on a cold day, or seeing the tundra swans fly overhead on a cool, damp day in February. But I look forward to seeing the Vienna Bridge in the distance as I return for NWA events like the holiday dinner and the annual fundraiser and hope to see the familiar faces of the folks who I’ve come to know during my time at the Alliance.

We welcome Amanda Anastasia, our new Chesapeake Conservation Corps member, to the NWA team. Amanda will be with us through August 2014.
THE CONOWINGO DAM: CLEAN WATER IMPACTS, PERSPECTIVES, AND SOLUTIONS

By Shelly Baird

“The Conowingo Dam: Clean Water Impacts, Perspectives, and Solutions” community meeting, sponsored by the Nanticoke Watershed Alliance was held on April 17 at the Dorchester County Library in Cambridge. Nearly 90 participants attended this discussion of the water quality challenges and opportunities associated with the Conowingo Dam. Don Rush, News Director of Public Radio Delmarva, moderated the following discussion panel: Dr. William Dennison, Vice-President of Science Applications, University of MD Center for Environmental Science, Ron Fithian, Chair, Clean Chesapeake Coalition and Kent County Commissioner, Charles D. “Chip” MacLeod, Attorney, Funk & Bolton P.A., and Dr. Beth McGee, Senior Water Quality Scientist, Chesapeake Bay Foundation.

Presenters offered viewpoints in a respectful manner, and while disagreements may remain, the overall outcome included discussion of collaboration and moving forward. An audience question and answer session was included. The NWA feels that initiating the conversation between groups that may not always communicate is a positive outcome, and hopes to provide similar forums in the future. The Alliance remains dedicated to being an advocate for collaboration.

You can view a recording of this meeting at the following link: http://vp.telvue.com/preview?id=T01961&video=151635

1ST ANNUAL TOAST TO THE NANTICOKE

By Shelly Baird

The Toast to the Nanticoke event, which celebrated 20 Years of the Nanticoke Watershed Alliance, was a huge success! Set amidst a gorgeous evening at Layton’s Chance Winery, over 150 guests enjoyed great food, wine, and live music while celebrating the Nanticoke River and its community.

Reflections on the history of the Alliance and the Nanticoke River were provided by Tom Horton, Environmental Journalist, and Lisa Jo Frech, the first Executive Director of the NWA, who made the trip all the way from Oregon to a wonderful reception from friends and colleagues. Former Board President Dave Nemazie provided the “Toast to the Nanticoke,” and special remarks were provided by Special Assistant to U.S. Senator Barbara Mikulski, Linda Prochaska and Maryland State Delegate Addie C. Eckardt. Current Board President Tom Darby and Executive Director Shelly Baird presented an overview of NWA programs and recognized the event sponsors. This event would not have been possible without the generous support of those sponsors, including our Diamond and Platinum sponsors Perdue and KJ Grace. A special thanks to Fog After Midnight and George, Ossi, & Friends for filling the evening with live music and to Layton’s Chance Winery for offering the perfect venue.

Thank you to everyone who attended this event! It was a wonderful evening of fun and friendship to celebrate the Nanticoke River, while also serving as a successful fundraiser to support the growing programs of the Nanticoke Watershed Alliance. We look forward to seeing you all next year!
Sharptown is now a community of approximately 609 residents. It lies on the northwestern tip of Wicomico County, along the Nanticoke River, approximately two miles from the Delaware line.

Once inhabited by Indian tribes, this small town was recognized as a settlement around 1769. Sharptown was a thriving shipbuilding town during most of the 19th century and into the early part of the 20th century. Located on a stretch of high ground where the Nanticoke River runs relatively straight, Sharptown became the ideal spot for building sailing vessels because there was an abundance of lumber nearby.

Founder of the Sharptown Marine Railway, which ran from Sharptown to Baltimore, Matthew Marine was one of the first settlers. He owned the largest fleet of schooners of any one person on the river. The Sharptown Marine Railway Company is now owned by R.M. Elzey and Brothers.

In the early 1800s, the town became prosperous and attracted new settlers. By 1845, the town established a post office. In 1877, there were four dry good stores owned by John Smith, Thomas J. Twilley, J.R. Twilley, and S.T. Cooper. A basket company in town manufactured grape and peach baskets, desk plugs, tunnel wedges, wood and iron turning, and fruit crates and baskets. Other shops in town included a blacksmith shop, two ship carpenter/smith ships, and a ship carpenter/sailmaker.

Sharptown has a permanent carnival area that is open in August/September. The Sharptown Fire Department purchased a 51-acre farm at a public auction on May 22, 1937. The fire department turned 14 acres into the carnival and sold the rest back to the farmer.

The town’s main recreational attraction is Cherry Beach on the Nanticoke River. When visiting, you will enjoy a sandy beach, picnic tables, a playground, a pavilion, a public boat launch, and scenery of wetlands and forests on the main stem of the Nanticoke River. This is an excellent spot to see Bald Eagles soaring over the river. This park has removed bulkheads to create soft natural habitat through living shorelines. The park will also be undergoing more stream restoration through a Governor O’Malley’s Stream Restoration Challenge Grant that the Nanticoke Watershed Alliance received in July. We will be involving local schools and the community in a tree planting at Cherry Beach and behind the Wastewater Treatment Facility this coming March.

Source: Sharptown Historical Commission

HOMEOWNER WORKSHOPS

By Beth Wasden

Just over 30 homeowners participated in the Nanticoke Watershed Alliance’s inaugural Homeowner Workshops in the months of April, May, and June. These workshops focused on bringing knowledge, resources, and tools together to improve water quality in Bethel, DE, and Hebron, MD. The NWA hosted three distinct workshops, all of which were funded by the Town Creek Foundation.

“Your Water, Your Watershed” offered an in-depth look at the watershed’s characteristics, water quality issues, and backyard Best Management Practices (BMPs).

“Soil Testing” provided participants with free soil tests and in-person results in conjunction with the University of Delaware’s Cooperative Extension Service’s Soil Testing Lab. “Rain Barrels” issued participants a 45-gallon EarthMinded Rain Station and covered installation, usage, and maintenance. The workshop also gave an overview of rain gardens.

Since 1996, the amount of developed surfaces in the watershed has increased from 2% to 7% (Sources: 1996 Nanticoke River Watershed Atlas and 2012 Nanticoke River Watershed Atlas), which makes implementing backyard BMPs even more crucial. Since participating in the workshops, homeowners have been logging and sharing information about the amount of water captured, the amount of rainwater used, and how the rainwater has been used. With such an intensely rainy summer, the rain barrels have been put to excellent use. The NWA looks forward to continuing to work with homeowners in the future.
Thanks to the hard work and diligence of the over 70 Nanticoke Creekwatchers who participated in the program from 2008-2012, the Nanticoke Watershed Alliance launched its first Nanticoke River Five Year Report Card in July at the Seaford Riverfest and at the Nanticoke River Wade-in at Sharptown’s Cherry Beach. The new report card takes a look at the four primary indicators of water quality (dissolved oxygen, water clarity, total phosphorus, and total nitrogen) that the Nanticoke Creekwatchers Citizen Water Monitoring Program monitors, along with *fecal enterococcus* bacteria data on the mainstem of the river from the Seaford Boat Ramp to the Nanticoke Harbor.

The report card pointed out declining water clarity in the Upper Nanticoke subwatershed (Seaford Boat Ramp to Sharptown’s Cherry Beach). Water clarity also dropped at other sites, such as Bethel and at Phillips Landing in the Broad Creek subwatershed and at the Mardela Springs Boat Ramp in the Lower Creeks. The watershed’s problem indicator continues to be total nitrogen, which was very high throughout the watershed over the entire five year period. Total phosphorus was moderate, and surface dissolved oxygen tended to be good.

In addition, Bacteria levels were high throughout the mainstem of the river, with the exception of the two most southern sites in the Lower Nanticoke—the Bivalve Wharf and Nanticoke Harbor. The NWA looked only at data from Memorial Day through Labor Day to determine the number of passing bacteria data. Due to the Nanticoke’s abundant wetlands and forests, the amount of natural bacteria is higher than in more urban systems. The NWA does not perform source tracking due to costs involved, so it is impossible to point to exact sources.

Along with the Nanticoke Creekwatchers themselves, huge thanks go to Envirocorp Labs Inc. for their excellent lab service and support, to the Chesapeake Bay Trust, the Delaware Department of Natural Resources and Environmental Control (DNREC), and the Community Foundation of the Eastern Shore for their financial support, to the Integration and Application Network at the University of Maryland Center for Environmental Science, and the Mid-Atlantic Tributary Assessment Coalition for their technical assistance.

The report card is available online at [http://nanticokeriver.org/programs/volunteer/creekwatcher/creekwatcher-reports/](http://nanticokeriver.org/programs/volunteer/creekwatcher/creekwatcher-reports/). Copies are also available at the NWA office in Vienna, at libraries, chambers of commerce, town halls, and businesses throughout the watershed, and at the NWA outreach booth at selected events in the watershed (see events list on page 6).

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**ENVIRONMENTAL EDUCATION**

By Lisa Baird

The Nanticoke Watershed Alliance is excited to announce its new Environmental Education initiative. We have a jam packed schedule for our new program, “Our River, Our Responsibility: Water Quality in the Nanticoke River” that seeks to educate students on the water cycle, watersheds, water quality, water conservation, sources of pollution, and best management practices.

We began this past spring where we presented an Enviroscape watershed model to 7th graders at North Dorchester Middle School that gives a clear visual of exactly what is going on in your watershed. In June, we partnered with Dorchester Soil Conservation District to do a week long “Land and Water Connections” summer camp which was a great experience. We did a lot of exciting things, including canoeing, a bison farm tour, an oyster/fish hatchery tour, lessons on soils and forestry, and a Native American demonstration. In August, NWA hosted a 3 day teacher workshop that focused on the “Food, Land and People” curriculum. NWA received excellent feedback from the teachers and made good connections with them to move forward with the next step of our EE program; in classroom lessons, schools yard field days, off campus field trips, and action projects with select classes. One Environmental Education action project will include a tree planting at Cherry Beach in Sharptown, MD. We will involve Mardela Spring Middle and High School students with lessons on forested buffer zones and their benefits.
Friends of the Nanticoke Watershed Alliance, along with Delegate Addie Eckardt, a Salvation Army youth camp, and folks from DNREC, DNR, and The Daily Times, gathered together on July 18 to participate in the 15th Annual Nanticoke River Wade-In.

The “Wade-In” activity is based on former State Senator Bernie Fowler’s “sneaker index,” which provides a fun way to get communities excited about water quality and to provide residents with a non-technical, symbolic method of measuring the health of their waterways. Led by Delegate Eckardt, the hand-holding chain of participants waded in the river until they could no longer see their feet (or white sneakers!) and measured the depth. This year, the clarity depth was only 17 inches.

**Looking for something to do? Grab your calendars and check out these upcoming events:**

- September 28: National Public Lands Day throughout the area (included free admittance to national parks and national wildlife refuges)
- **October 5:** Nanticoke River Jamboree (Handsell House, near Vienna)
- October 5: East New Market Heritage Day
- October 5: Wings & Wheels Fall Festival (Georgetown)
- October 6: Coast Day (Lewes)
- October 11-12: Apple Scrapple Festival (Bridgeville)
- October 12: Chesapeake Wildlife Expo (Salisbury)
- October 12-13 Wild Goose Chase Bicycle Ride for Women
- October 13: National Wildlife Refuge Week Kickoff (includes free admittance to Black Water National Wildlife Refuge)
- October 25-28: Cambridge Tall Ship Schooner Rendezvous
- October 27: 8:00 AM Bird Walk at Blackwater with Harry Armistead
- October 29: Nanticoke Historic Preservation Alliance Annual Meeting and Music of 1812 Presentation (Cambridge)
- November 1—3: Punkin Chunkin (Bridgeville)
- November 14: A Brief Historical Portrait of the Indian Nations of the Eastern Shore, presented by Celine Carayn (Nabb Gallery)
- November 24: 8:00 AM Bird Walk at Blackwater with Harry Armistead
- December 1: 8:00 AM Bird Walk at Blackwater with Harry Armistead
- December 21: Vienna Luminaria

Regular occurring events:
- Horn Point Lab Tours (Cambridge) Saturdays from 10:00-11:30 AM

**NWA will be attending**

The Nanticoke Creekwatchers received the 2013 Maryland Governor’s Service Award and is now a bi-state award winning program. Congratulations Creekwatchers for your dedication, enthusiasm, and hard work!