NEWTON CONSERVATORS

SUMMER ISSUE

NEWSLETTER

Newton's land trust working to preserve open space since 1961

WWW.NEWTONCONSERVATORS.ORG • SUMMER 2017

The Great Dam at Watertown

By Elisabeth Cianciola, Aquatic Scientist, Charles River Watershed Association (CRWA)

Watertown Dam from the southern bank of the Charles River looking upstream, May 31, 2011

The practice of damming the Charles River has a rich history that begins at the site of today's Watertown Dam. A fish weir was constructed here in 1632, not far above what was then the head-of-tide on the Charles River. One century later, historical records indicate that upstream watershed residents complained that the Watertown Dam impeded fish passage, and mill operators were ordered not to replace the stones at the dam until May 1st.

By 1814, a new dam with a fishway was constructed here. In the following years, various industries including grist mills, a fulling mill, a sawmill, a cotton mill, a foundry, the paper mill that manufactured the first paper bag, and even Bakers Chocolate Company established their roots around the Watertown Dam. In response to damages incurred to the existing dam in 1955 as a result of Hurricane Diane, the 8'-high, 180'-long concrete dam we have today was built in 1966. The Denil fish ladder was added in 1972.

Despite the colorful history of the Great Dam, one thing hasn't changed: upstream watershed residents and environmental advocates continue to complain that the dam impedes fish passage. While the Charles River has a healthy run of river herring, with more than 300,000 fish returning to the Charles to spawn every spring, video monitoring and acoustic tagging studies performed by the Massachusetts Division of Marine Fisheries indicate that the fish ladder passes very few male American shad and no female American shad.

Female American shad are the largest fish that would use a fish pass at the Watertown

Massachusetts Department of Fish and Game Division of Marine Fisheries cleans the fish ladder at the Watertown Dam, May 28, 2010

Continued on page 2

…The Great Dam at Watertown continued from page 1

Dam, and the low water level in the pool at the bottom of the existing fish ladder deters them from attempting the summit. American shad were quite plentiful on the Charles, providing a source of food for humans and wildlife alike, until the construction of new dams and the degradation of water quality began to stress the population in the mid-1800s. Fewer than 100 American shad now return to the Charles to spawn each spring.

River herring found in the fish ladder at the Watertown Dam, May 28, 2010

Given the dam's age and urban location, it comes as no surprise that the Office of Dam Safety has rated the dam as a significant hazard, meaning that its failure could cause loss of life and damage to homes, industrial and commercial facilities, and infrastructure by unleashing the water stored in the impoundment. As such, the Massachusetts Department of Conservation and Recreation (DCR), the dam owner, is required to have the dam inspected every five years.

Structures such as the footbridge immediately upstream from the dam and the Bridge Street road crossing farther upstream would likely become destabilized if the dam failed. Because the dam no longer serves the purpose of powering mills, this is a good time to evaluate any purpose the dam may be able to serve, such as providing flood control, before it needs to be replaced due to its age.

To explore the possibility of removing the Watertown Dam, CRWA submitted an application to the Massachusetts Department of Fish and Game Division of Ecological Restoration's Priority Project Program in 2016. Because our application was approved, the Division of Ecological Restoration staff will provide their dam removal expertise to assist CRWA and DCR in gathering data regarding the dam's impact on the river and identifying potential challenges and opportunities associated with removing the dam through a feasibility study.

Like most historic dams across New England, it will be important to determine the composition of sediment in the impoundment behind the dam and to develop a sediment management plan that ensures that any undesirable contaminants, such as lead and copper, will not cause harm to fish and other wildlife in the river as a result of removing the dam. However, in addition to improving fish passage and protecting public safety by removing a potential hazard, removing the Watertown Dam could improve recreational fishing and boating opportunities and improve flood storage in the river's floodplain.

Although CRWA and DER already laid the groundwork for a feasibility study by working with Stantec Consulting Services to conduct a site reconnaissance study in 2011, large infrastructure projects such as dam removals take years to plan and execute. CRWA appreciates the support that the Newton Conservation Commission provided in the 1970s to advocate that the nearby Bemis Dam not be reconstructed after it was breached, in order to provide fish passage. We look forward to collaborating with partners in Newton and other Charles River watershed communities to continue to improve fish passage in the future.

Please come to a talk co-sponsored by the Newton Conservators and Charles River Watershed Association: Studying the Watertown Dam, November 9th, 7:00 PM - 9:00 PM at the Newton Free Library. ■

Newton Upper Falls Greenway

By Jim Lerner, member Newton Bicycle and Pedestrian Task Force

Editor's Note:

At the Newton Conservators annual dinner held on May 3, the Newton Conservators honored George Kirby, Jerry Reilly, and Jim Lerner with Environmentalist of the Year awards for their work in creating the Newton Upper Falls Greenway (see Newton Conservators' Annual Meeting article by Margaret Doris). The following article adds background information about the history of the Greenway, now a mile long walk located parallel to Needham Street in Newton.

The Newton Upper Falls Greenway has direct ties to the successful development of Newton and Boston from 160 years ago through today. Back in 1849, factory owner Otis Pettee began construction of a railroad line from Brookline to Dover to transport supplies and finished goods between his cotton mill and the markets. Ten years later, when Boston's Back Bay started to be filled in, the same railroad line was used to carry sand and gravel from an esker in Needham Heights to the swampy areas around Boston Neck. Forty-car trains ran every 45 minutes for four years to bring in the fill.

Graphic showing the extent of the Upper Falls Greenway

By the 1880s, both freight and passenger services were running on the line. Passenger service was discontinued in 1927 while freight continued. A spur line was built across Needham Street in 1953; you can still see the tracks crossing near Jiffy Lube. 2002 saw the last freight train, and by 2008 the Bay Colony Railroad discontinued service on the line (which extended south to Woonsocket, RI).

In late 2010, the Newton Bicycle/Pedestrian Task Force (BPTF), which had just successfully wrapped up advocacy for rehabbing the abandoned railroad bridge over the Charles River in Newton Lower Falls, was looking for a new opportunity. The idea of converting the abandoned railroad line to a linear park was very appealing, and we'd learned some lessons about how to gain grassroots approval from our previous project.

With those lessons in mind, the BPTF began taking city officials and neighbors on walks along the corridor to highlight the potential. In the spring of 2011 we had our first cleanup of the site, hauling out massive amounts of trash (sofas, TVs, tires, shopping carts, concrete pipes, etc.). As a boundary between residential and industrial areas, the railroad right-of-way had been everybody's favorite dumping ground as well as an encroachable piece of real estate. By making it something of value and a point of pride, the neighborhood and city could enjoy a better use.

At a community meeting in 2012 we introduced the idea of a linear park to a wider audience and were pleasantly surprised by strong community support and lack of opposition, even among abutters. With public backing clear, the newly-formed Upper Falls Area Council unanimously approved the request to support the creation of a park by the city. After passing through several aldermanic committees and then the full Board of Aldermen, the city agreed to pursue a 99-year lease from the MBTA, hired a contractor to remove the rails and creosote-soaked ties, and laid down a permeable stone-dust base. It was a long and dramatic construction process, but clearly worthwhile.

We now have a popular, well-used one-mile recreational path running from Easy Street (next to National Lumber), past the Depot Café and the Biltmore Café, all the way down to an overlook at the Charles River. Residents and

Continued on page 4

…Newton Upper Falls Greenway continued from page 3

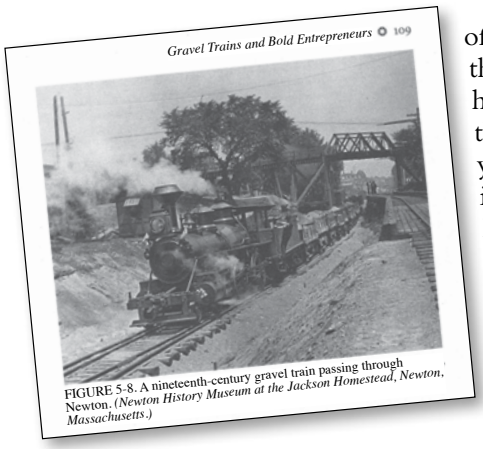

Gravel Trains and Bold Entrepreneurs ✪ 109

FIGURE 5-8. A nineteenth-century gravel train passing through Newton. *(Newton History Museum at the Jackson Homestead, Newton, Massachusetts.)*

office workers walk the Greenway at all hours of the day throughout the year. The Greenway is managed by Newton's Parks & Recreation Department and gets a lot of TLC from abutters and Upper Falls residents.

During NewtonSERVES this year, there were approximately 80 volunteers at work. The development process, a combination of public and private contributions, has resulted in stronger relationships with the commercial entities that call Newton their home and in a more meaningful set of relationships between residents and their representatives in City Hall.


PHOTO: JIM LERNER

Encroaching jungle on the Greenway path

There are still several important opportunities ahead to improve the Greenway. We're working with the Avalon apartment complex to remove the chain link fence separating their property from the Greenway, an area that they intend to turn into gardens. Thirty Avalon residents cleared Asian bittersweet and barbed wire from the fence, and Avalon Bay property management is eager to create additional gateways.

CrossPoint and Northland, commercial landlords of numerous properties in the area (including Nexus, Marshalls Plaza, the former Clark's building, and others) have been very supportive of the Greenway. Both have donated benches and kiosks to the Greenway and see the path as an amenity for their tenants. As part of their special permit, CrossPoint has promised to convert the private spur along the south side of the Nexus property to a connecting path once the primary construction on the building site is completed. CrossPoint will also restore the brook that runs alongside, and they have already removed invasives from the border.

The Friends of the Greenway hope to construct a stairway to connect the Greenway at the Charles River, where there is a very steep embankment, to the Charles River Pathway (near river level, running along the river bank). Longer term, with the permission of several landowners on the other side of Needham Street, it's possible to connect the privately-owned spur via the DCR bridge at Christina Street with the DCR's Charles River Pathway on the Needham side of the river.


PHOTO: JIM LERNER

Current path for the Upper Falls Greenway

And in the very near term, we are tackling removal of invasives growing near the trail. We're pulling garlic mustard and cutting Asian bittersweet vines. We also have to deal with Japanese knotweed, glossy and common buckthorn, and Norway maple. It seems that we've won the battle against black locust, which had established a large and dense stand.


PHOTO: JIM LERNER

Newton SERVES cleanup crew

If you'd like to explore the Greenway yourself, there are several access points. From north to south, there's an entry at the end of Easy Street, a short public pathway running from Chandler Place to the Greenway, as well as from Chestnut Street near Oak Street (next to the Depot Café).

If you're looking for more details or would like to get involved, please check out http://www.upperfallsgreenway.org/, http://www.facebook.com/UpperFallsGreenway, or info@UpperFallsGreenway.org. ■

50th Anniversary Celebrations for the Environmental Science Program's 50th Anniversary!

In the Conservators' Winter 2017 Newsletter, we announced that the Environmental Science Program is turning 50 this year. Now we'd like to add details about the Program's history, plans for the upcoming celebration, and also some of the effects that the Program has had on people who have passed through it since its founding.

Mt. Washington Lakes of the Cloud Hut (early 1990s) — Garen Corbett with Leea Regan and others

The Environmental Science Program of Newton began as a Ford Foundation Project in 1967 headed by Dick Staley and Pete Richter, Newton High School science teachers, with support from Ernie Ruber, a biologist from Northeastern University. In the late 1960s, there was a growing awareness of "ecology" and the environment several years before related political activity around the country led to the first Earth Day in 1970.

The "Envi Sci" Program channeled some of that energy and excitement into an outdoor educational program that let students learn about science while they were enjoying the outdoors and making friends.

Testimonials

I've been fortunate to contact many people who were students or leaders over the 50 years that the Program has operated. Some of them have written about how it changed their lives.

Stuart Freudberg, *a Student Coordinator in the 1970s told me:*

"…I would say the program had a very profound impact on my life and my career — I developed a huge interest in environmental science and meteorology — and decided in 1970 to go to college in environmental engineering… what I gained back 50 years ago has made a tremendous difference personally and professionally."

From Ralph Keyes, *who was in the Program in the 1970s:*

"…ESP instilled in me a love for field science and outdoor life sports. All these years later I am a high school teacher and outing club advisor. [My organization] Teens To Trails supports and promotes high school outing clubs in Maine, and we are looking to share our success here in Maine with other states."

Pam Mahoney Peak, *Student Director '93; Director '96 said:*

"…I loved the Program, and being a leader in the Program even became the basis of my college essay/interview!"

Program Challenges

The Envi Sci Program had some ups and downs over the years, including some years when the enrollment was low and the finances were tight. In an article published in the Newton TAB in March of 1997, the then-staff advisor Leea Thomases said, "This is one of the best-kept secrets in Newton. Not a lot of people know about the program. We want people to be aware so the program doesn't die."

The article went on to describe the day trips and activities of the program, including studying wildlife in tide pools, canoeing on the Charles River, and climbing mountains, all activities that are still part of the Program.

Leea Thomases talked about something else that the Program still does today. "I took away a belief in myself that wasn't there before. I hope the program continues [to provide current] students with that self-confidence."

Continued on page 6

…Celebrations for the Environmental Science Program's 50th Anniversary continued from page 5

Recent Years

Fast-forwarding to recent years, it is reassuring to read a parent's letter about her son's experience:

"[My son] has found it challenging to find summer programs in line with his interests, but Envi Sci's mix of science, outdoor experiences, and physical endeavors like hiking and canoeing has proved to be the perfect combination. Even more important than these elements, Envi Sci has offered opportunities [for him] to grow in more intangible ways — helping him to build confidence, social skills, and leadership abilities."

Mt. Monadnock summit, 2016

50th Anniversary Celebration Plans

This year, through the work of a volunteer committee that communicated with a list of alums, we have replaced our preliminary plans for "A Night at the Hut" with three other events in early August:

Friday, August 4th: A day hike at Mt. Monadnock for former students, leaders, and family members. We will provide transportation details to people who have RSVP'd Yes for this hike.

Saturday, August 5th: The main event: a reunion party in the afternoon and evening at Margarita's Restaurant (227 Moody Street, Waltham, MA) with a buffet, slides, video, and stories. There will be a full-moon canoe trip on the Charles River, just outside of Margarita's, with a guide from Charles River Canoe and Kayak. (Please RSVP specifically if you plan to go on this canoe outing!).

Sunday August 6th: An informal brunch for attendees to meet and talk with other former leaders and students, hosted in a Newton home.

What You Can Do To Help Spread the Word

We have created an online registration page so people can sign up in advance: http://bit.ly/2s8NK5X

We are asking people to help us spread the word by contacting anyone in their networks whom they know from Envi Sci. We already have registrations from leaders and advisors from the 1970s, 1980s, and 1990s who are planning to come.

All three events are included in the price of the celebration weekend: $67 — AND you get the 50th anniversary edition of the Envi Sci T-shirt. We ask you respond by mid-July so that we can arrange for the food and seating accordingly.

We have posted this information on the Envi Sci website: www.newtonenvisci.org/50years/index.html

We are encouraging people to go to the Envi Sci 50th Facebook page and post stories, videos, and photos: http://bit.ly/2pMtEi1

Sustaining The Program For The Future

Finally, this reunion is about connecting different people who have enjoyed the Envi Sci experience during the past 50 years. We hope that everyone recognizes the positive power of the Program and stays connected, to sustain it for another 50 years.

With that in mind, we hope that anyone who hears about the reunion, whether they attend it or not, will contribute whatever they can to the Environmental Science Program Anniversary Fund. You can do that by using the online registration/donation form, using the link on the Envi Sci website, www.newtonenvisci.org/50years/index.html or at: https://epay.cityhallsystems.com/?key=newton.ma.us&type=ev

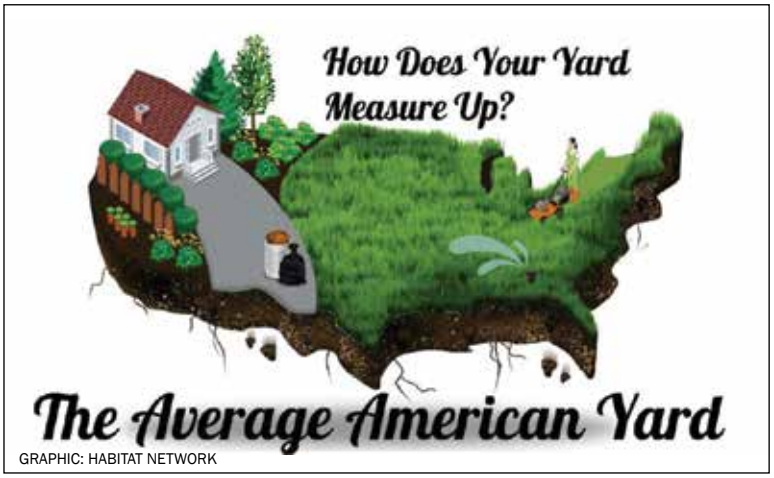
If you or someone you know has been part of the Envi Sci Program, and would like to participate in the 50th anniversary events, please contact the Program's Executive Director, David Backer, at contact@newtonenvisci.org for more information. ■

David Backer

Habitat Network:
From the Actions of You and Your Neighbors, Habitat Can Emerge!

By Megan Whatton, Habitat Network Project Manager North America Regional Office

When you think of the typical American yard, you might picture a home or apartment with a few ornamental plants and lots of lawn. Having a lawn is fine, but why do we need so much of it? Did you know the United States has more than 40 million acres of lawn, in which approximately 30 billion dollars, 7 billion gallons of water, and 3 million tons of pesticides are invested annually to care for and maintain spaces that provide minimal ecological benefit to wildlife or people?



The average American yard consists of 59.5% manicured Lawn, 19.3% building/hard surfaces, 3.7% veggie Gardens, and 17.8% other. This image depicts the average American yard in relation to the Continental United States © Habitat Network

If we convert just a part of all this uniform looking, inefficient lawn and make small changes in how these landscapes are designed and managed, we can add wildlife habitat, reduce strain on streams and rivers, support migratory species, and turn barriers into bridges for wildlife. These enhancements to diversify yards and public spaces add beauty and value to homes and neighborhoods and provide opportunities to spend more time enjoying nature closer to home.

An example of a small action that reduces our lawns, provides resources and habitat, all while adding beauty to our properties © Megan Whatton

Habitat Network (www.habitat.network) is a citizen science program that serves a variety of purposes, which resonate with users in different ways. Whether it's a desire to provide habitat to support nature and conservation close to home or to improve the aesthetics and functionality of an outdoor space (i.e. yard, school yard, patio, office building, or park), Habitat Network strives to inform, inspire, and transform residential landscapes into more diverse habitats that can support wildlife and connect people to nature in communities around the world.

The network consists of scientists, garden enthusiasts, birders, educators, students, wildlife enthusiasts, landscape designers, and organizations that collectively and consciously take action to improve outdoor spaces for the benefit of wildlife and people. No matter the size or location of your property, Habitat Network can help you learn about practices that can support a diversity of plants and animals, build resilience into residential landscapes, and benefit people.

What is Habitat Network?

One of the key activities to engage with on the site is the Map feature. The Tool Shed allows you to map the various layers of your yard or project area, from the basics of the property outline to naming habitats and placing objects such as specific features like trees, shrubs, planters, and flower beds. Once you have these details filled in, the tool will ask you for more important information, such as how often you water, whether you use synthetic herbicides or fertilizers, and what are your mowing and yard maintenance practices.

Once you have finished your map, you might be thinking, "Now where do I begin?" Not to worry, our Explore and

Continued on page 8

…Habitat Network: From the Actions of You and Your Neighbors, Habitat Can Emerge! continued from page 7

A habitat map created by a Habitat Network user demonstrates the mapping process, details of data collection, and beauty in participating in our network © Habitat Network

Learn tools help answer some of those hard questions like "What plants are native to my region?" or "What habitat features are best," and "Where should they go in my yard?" These topics, and many others (over 160) on how and why to make decisions and take action to achieve specific outcomes, can be found on Habitat Network.

Outcomes from using techniques learned on Habitat Network can include more bird sightings, more efficient use of energy and water, and more pollinators, such as bees and butterflies (which can yield better garden bounties). Also, being part of the network provides inspiration and motivation from seeing what others are doing and setting specific actionable goals.

The Planning tool available on the Habitat Network allows you to analyze your mapped property and to see where you are meeting certain goals such as managing water, conserving resources, or supporting wildlife and how and where you can take specific actions to improve. The Planning tool allows you to opt in to actions you'd like to do or opt out of suggestions you cannot implement. The actions and goals update as individual property maps are updated, allowing you to track and stay motivated along your path.

In addition to learning, the Habitat Network is an online conservation community, focused on sharing strategies, maps, and successes to build more wildlife habitat. This social networking tool intends to build a community of like-minded people, who can share their knowledge and experience with friends and neighbors to inspire more diverse yards and outdoor spaces. The Forum posts facilitate chatting with other users and sharing what you're doing. The Groups feature lets you find and join a group or create your own. Groups have been created around shared interests, such as removing invasive species or to map and enhance a shared space or neighborhood.

How can you become part of the movement?

You can join the network by visiting www.habitat.network and signing up to join the movement to contribute to conservation science and to create more habitat to support wildlife and people.

Once you have joined and begun the mapping process, join our Boston Habitat Network Group to help us track our efforts in the Boston Metro Area and to connect to those around you. As of this writing, Conservator board members Pete Gilmore, Ken Mallory, and Beth Wilkinson, have started to create maps of their property that you can access by going to http://app.yardmap.org/map#!/groups go to "find group" search with the word "newton," click on "Habitat Newton," and click on the icon MAPS just below the map and it will lead you to properties in our group. One other suggestion: if you create your own map, go first to https://youtu.be/EP0N07o9ApY and it will help you understand the mapping process.

We hope to see you on the map! ■

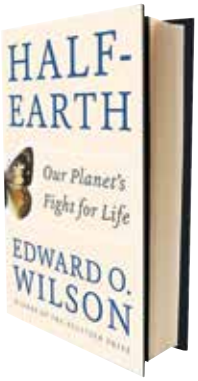
Cygnets

Trillium at Cold Spring Park

Importance of Resilience for Open Space

At the Conservators' annual meeting and dinner on May 3, our speaker was Andy Finton, Lands and Climate Director of The Nature Conservancy of Massachusetts.

Andy's topic was resilience, which is land's "ability to recover from disturbance." Disturbance can come in the form of a tornado. Climate change, however, is one of the major disturbances that concerns Andy's team. As climate change makes their current habitats increasingly inhospitable, plants and animals will fare best in resilient lands.

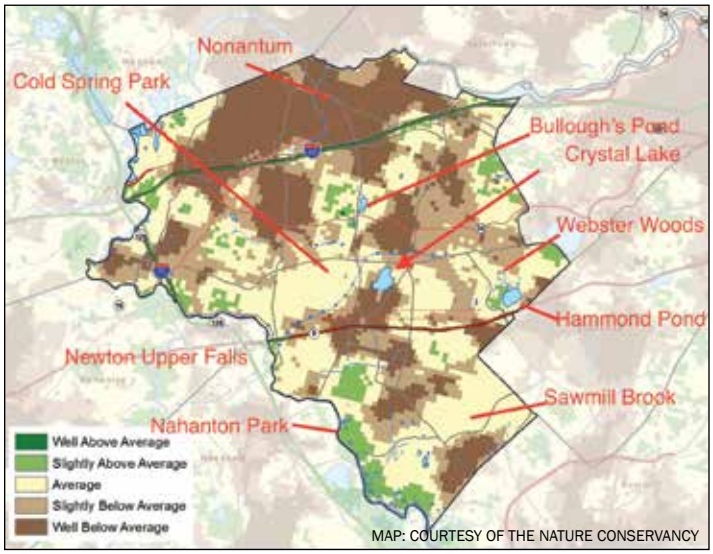


Through analyzing sites in the state, Nature Conservancy researchers discovered that resilience of a piece of land is a combination of landscape diversity (the number of microclimates it has) and landscape connectivity (its attachment to other parcels of open space).

The combination of diversity and connectedness allows animals — and even plants — to migrate to new areas that will support them.

Andy presented a map of Newton that shows our most resilient sites. The area in the southwestern tip of the city — around Nahanton Park and the Helen Heyn Greenway — is the largest region of resilient land. In the coming year, members of the Conservators will work with Andy to better understand the implications of the map for how we preserve and maintain the city's open space.

Andy explained that the good news for Massachusetts is that we are the leader in New England for state and federal money for land conservation, which he sees as the key to preserving the environment. He recommended reading E.O. Wilson's *Half Earth* to understand the importance of land conservation.



A map of Newton that shows our most resilient sites. The area in the southwestern tip of the city — around Nahanton Park and the Helen Heyn Greenway — is the largest region of resilient land.

In the question period after his talk, Andy further explained that we can make all of our open spaces more resilient by working to increase the biodiversity they contain (by, for example, preventing the monocultures created by invasive plants) and by increasing the connections between them (even by using culverts).

Please join us as we begin to assess and to improve the resilience of Newton's conservation land and parks. ■

Beth Wilkinson

MISSION

Newton Conservators, Inc.

The Newton Conservators promotes the protection and preservation of natural areas, including parks, playgrounds, forests and streams, which are open or may be converted to open space for the enjoyment and benefit of the people of Newton. It further aims to disseminate information about these and other environmental matters.

A primary goal is to foster the acquisition of land, buildings and other facilities to be used for the encouragement of scientific, educational, recreational, literary and other public pursuits that will promote good citizenship and the general welfare of the people of our community.

The Newton Conservators was formed as a not-for-profit organization 56 years ago in June 1961.

The Newton Conservators Newsletter© is published four times each year by the Newton Conservators, Inc., in June, September, December, and March. Deadlines for these issues are the first Friday of each month in which an issue is scheduled to be published.

We welcome material related to our mission from any source. Send proposed articles or letters by email in MS Word or rich text format to bethwilkinson@mac.com. Digitized photographs, maps and diagrams are also welcome.

Editor:	Ken Mallory	617-965-1908
Design/Layout:	Suzette Barbier	617-244-0266
Production:	Bonnie Carter	617-969-0686

Thanks to the following contributors to this edition of the Newsletter: Elisabeth Cianciola, Jim Lerner, David Backer, Megan Whatton, Beth Wilkinson, Margaret Doris, Karen Bray, Ann Berwick and Ken Mallory. As always, thanks to Doug Leith for his excellent proofreading.

Newton Conservators' 56th Annual Meeting

The Newton Conservators' 56th Annual Meeting, held on May 3, 2017, provided the opportunity to celebrate six individuals with four awards recognizing their efforts to protect, preserve and reclaim Newton's natural areas for the enjoyment and benefit of the people of Newton, and for their efforts to educate and disseminate information about these and other environmental matters.

The Environmentalist of the Year Award

George Kirby, Jerry Reilly and Jim Lerner

The Environmentalist of the Year award was initiated by the Newton Conservators in 1981 and has been presented nearly every year to a local citizen or group who has contributed to improvements in the city's environment. This year the Conservators recognized the team of George Kirby, Jerry Reilly, and Jim Lerner as Environmentalist of the Year for their work in "transforming an unused rail bed from an eyesore into a green path to be enjoyed by the community," recounted Director Michael Clarke. "What began in 1853 as the Charles River Branch Railroad, then in the 1980s became the Bay Colony Railroad, and was then owned by the MBTA is now the Upper Falls Greenway — with hopes of soon connecting to the Charles River Pathway and eventually to the Bay Colony Rail Trail across the Charles River to Needham and beyond."

And persistence is the key word. When the ribbon was finally cut celebrating the opening of the Upper Falls Greenway in September, 2016, Village 14 blog took note by proclaiming "Better Late Than Never." Greenway construction started two years earlier and was only supposed to take two months. Instead, the contractor ran into trouble and ultimately walked away from the job, leaving proponents with no clear path to completion.

Little did Village 14 know how really late it was. In 2012 George Kirby, chair of the Newton Bicycle/Pedestrian Task Force, shared the Charles Johnson Maynard Award with fellow Newton Bicycle Pedestrian Task Force member Sean Roche and State Representative Kay Kahn for their efforts to turn an unused and dangerous old railroad bridge in Lower Falls into a lovely, pedestrian friendly green space. That was the same year the City agreed to take over development of the Upper Falls Greenway project. When Kirby presented on the proposed Greenway project in April 2011, he and some of his fellow Upper Falls residents had been working on the project for several years.

Jerry Reilly, a freelance system software engineer and editor of the Upper Falls News, was a familiar figure to Upper Falls residents as he repeatedly canvassed the streets that border on or are adjacent to the rail bed seeking community support. A self-characterized "serial instigator" of various community-based projects (Feast of the Falls, Tour de Newton, Upper Falls Greenway, Eggcelent Breakfast, Newton Nomadic Theater, Nomadic Story Slam) and "goofy projects with no apparent redeeming social value" (Museum of Bad Art, King Pong, Disposable Theatre, Human Foosball), Reilly and his family have lived in Upper Falls since 2009.

Jim Lerner is no stranger to awards — he and his wife Anita Springer were recipients of a 2011 Newton Beautification Award. Learner had no time to rest on his laurels, however, as he was repeatedly called upon to defend the Upper Falls Greenway project against charges that it would derail attempts to expand light rail service into the area.

"While I, along with the other Newton Bicycle/Pedestrian Task Force members, would welcome improved public transit along Needham Street — including a light rail, this seems extremely unlikely to happen in the next 10 to 20 years and the park is something we can build today, at little or no cost to the taxpayers," he was explaining to the TAB back in February, 2012. "[It] would convert an eyesore into an asset without precluding any alternative future uses." The MBTA does not currently have any plans to build in the corridor, he repeatedly explained over the next several years. The Greenway Project did not preempt later transportation use, but would simply remove the same obsolete and deteriorated tracks the MBTA would have to remove if it ever decided to build.

The Directors' Awards

This year the Conservators also presented Directors' Awards to Jennifer Steel and Dan Brody...

"I know from first-hand experience that Jennifer is smart, thoughtful, thorough, and committed to the environment," explained Director David Backer in presenting the Directors' Award to Jennifer Steel, Newton's Senior Environmental Planner. "The Conservators are pleased to recognize Jennifer for her work in enhancing public access to Newton's conservation areas through the installation of new trailhead

signs and maps and the creation of the Conservation Area Stewards program."

Steel, a graduate of Wesleyan and Duke Universities, has over 20 years of experience in environmental planning and

Jennifer Steel and Dan Brody

management. She has worked in regional coastal research and management with the EPA and NOAA, the Advocacy Department of Mass Audubon, and the conservation departments of several local communities. With her work with the City's Conservation Commission, she facilitates the efforts of the City Council-appointed volunteers to manage 20 conservation areas, totaling over 280 acres of woods, fields, wetlands and hills in the city. She also reaches out to the general public in a variety of ways, including as a contributor to the Conservators' newsletter.

The Newton Conservators have always relied on public education as a means of promoting its programs. While our core mission has remained unchanged for more than a half century, the ways of communicating it have not. Ten years after the Conservators recognized Dan Brody as Environmentalist of the Year for "for his vision, skill, and dedication in building and maintaining the Conservators' Website," thereby dramatically expanding the Conservators' paper newsletter subscriber list reach with an environmentally friendly, "invaluable educational and informational tool for our community," the Conservators again recognize him with a 2017 Directors' Award for his use of new technology to allow the public an enhanced interface not only with our website but with the environment.

Brody has had a varied career in government, politics, nonprofit financial management, and urban planning. He is currently a consultant to Field First Strategies, which provides public engagement services to political campaigns and nonprofit organizations. He has previously served as chief financial officer of a non-profit start-up (The Boston Museum), as chief financial officer for the John F. Kennedy School of Government at Harvard University, and as Deputy State Budget Director for the Commonwealth of Massachusetts. He has a bachelor's degree from Harvard and a master's degree in city planning from the University of California at Berkeley and has twice been elected by the delegates of the Unitarian Universalist Association General Assembly to serve on the UUA Board of Trustees in the position of Financial Advisor

"Dan is a steady and long-time contributor to the Board, who has maintained the Conservators' extensive website, and advised us on many technology issues," Director David Backer explained. "The Conservators are pleased to recognize Dan for his work in enhancing public use of Newton's Conservation Areas by developing and installing QR codes in Newton's parks and open spaces and for his creation of the associated pages on the Newton Conservators' website."

Charles Johnson Maynard Award

And the final award goes to Carol Schein. The Charles Johnson Maynard Award is given each year to recognize efforts to "improve biodiversity, habitat reclamation, and natural resource protection."

Carol Schein

"Charles Johnson Maynard was a well-known naturalist, ornithologist, taxidermist, author and publisher who was born and lived in Newton from 1845 until his death in 1929," Director Chris Hepburn reminded the audience. "His 172nd birthday would have been next Saturday. "A focus of Maynard's work was the "modifications of breeding habitats of birds caused by persecutions of man," Hepburn continued, and so it was only fitting that the Conservators make the award to Carol Schein, Newton's Open Space Coordinator since 2004.

"In that role," Hepburn explained, "she has helped the city and its residents understand the need to preserve or revitalize many places in our city, including Newton Centre Playground, Nahanton Park, the Crystal Lake Bath House area, the old home of the Parks and Recreation Dept. on Vernon Street, Waban Reservoir, and many more. She also is the manager of the city's adopt-a-space program and the memorial donations program. In many of these projects, she has collaborated with the Newton Conservators or other environmental groups such as the Friends of Nahanton Park and Crystal Lake Conservancy." ■

Margaret Doris

Leaf Blower Restrictions

Intro by Karen Bray

On January 17, 2017, Newton City Councilors voted 20-4 in favor of a New Noise Ordinance that increases restrictions on leaf blowers. This ordinance is currently in effect. Now, it is very important that we do our job: Reporting violations. If you feel that leaf blowers are disturbing you or if you believe that a leaf blower is being operated illegally, call the Newton Police non-emergency line at **(617) 796-2123**.

Leafblower Ordinance as Approved by City Council on 01-17-17 20 YEAS, 4 NAYS (Councilors Cote, Gentile, Harney & Lappin)

(h) *Restrictions on use of leaf blowers.* Notwithstanding the provisions of sections 20-13 (f) and (g), on or after January 1, 2017 no person, including any City employee or contractor, shall use or operate a leaf blower within the City of Newton from Memorial Day through Labor Day in each year, except that one 65 dB(A) electric or battery powered leaf blower per lot may be used during this period. At all other times leaf blowers may be operated subject to the following provisions:

PHOTO: HTTP://WWW.HUSQVARNA.COM

(1) Permitted hours of use. Leaf blowers may be operated only during the following times:

Monday – Friday: 7:00 a.m. – 5:00 p.m., except that the City of Newton, through its Parks and Recreation Department, shall be allowed to use leaf blowers prior to 7:00 a.m. for the sole purpose of maintaining city village centers.

Saturday: 8:00 a.m. – 5:00 p.m.

Sundays and legal holidays: prohibited except for operation by a resident of the property on which the leaf blower is operated between 9:30 a.m. and 5:00 p.m.; and except for operation of leaf blowers on contiguous lots under single ownership that total a minimum of thirty acres used for institutional or recreational purposes between 9:30 a.m. and 12:00 p.m.

(2) Only leaf blowers meeting the following criteria are permitted for use:

A. Leaf blowers must be manufactured after January 1, 2005 for EPA Class 4 engines and after January 1, 2008 for EPA Class 5 engines;

B. Leaf blowers must bear an affixed manufacturer's label indicating the model number of the leaf blower;

C. Leaf blowers must bear an affixed manufacturer's label documenting a noise rating of 65 dB(A) or less; and

D. Leaf blowers may only be used with any muffler, full extension tube and sound attenuating devices supplied by the manufacturer of the leaf blower. Non-factory modifications are not permitted.

(3) During times of emergency caused by a storm or other special circumstance, the Mayor or his designee may temporarily suspend application of all or a portion of this section for purposes of cleaning up from such storm or other special circumstance.

(4) The provisions of section 20-13 (i) shall not apply to leaf blower operation. (i) *Permits for exemptions from this ordinance and for extensions of time to comply with this ordinance.*

(1) The mayor or his designee may grant a permit for any activity otherwise forbidden by the provisions of this ordinance upon a determination by the mayor or his designee that compliance in the conduct of such activity would cause undue hardship on the person or persons conducting such activity or on the community, taking into account: (i) the extent of noise pollution caused by not requiring such compliance; and (ii) whether reasonable efforts have been made to abate the noise. The mayor or his designee shall establish appropriate procedures for the processing of requests for such permits, including such hearings as the mayor or his designee deems appropriate. In granting any such permit, the mayor or his designee may impose such appropriate conditions as he deems necessary pursuant to this section. Copies of all such permits shall be filed with the clerk of the board of aldermen promptly after issuance. Promptly after issuance, copies of all such permits shall be filed with the clerk of the board of aldermen and to each ward alderman for the affected ward.

(2) The mayor or his designee may extend to a specified date the time for compliance with this ordinance in the case of any particular activity with respect to which a determination is made that such extension is necessary to provide a reasonable opportunity for such activity to be brought into compliance. No such extension shall be

granted which has the effect of exempting such activity from compliance with this ordinance. The mayor or his designee shall establish appropriate procedures for the processing of requests for such extensions of time, including such hearings as the mayor or his designee deems appropriate.

(j) *Judicial Review.* Any person aggrieved by the grant or denial of a permit pursuant to subsection (h)(1) or an extension of time pursuant to subsection (h)(2) may seek relief therefrom by a civil action in any court of competent jurisdiction as provided by the laws of the Commonwealth of Massachusetts.

(k) *Penalties.* Violation of any of the provisions of this section shall constitute a misdemeanor and any person, upon conviction of such violation, shall be fined an amount not to exceed three hundred dollars ($300.00). Each day that such violation continues shall be considered to be a separate offense.

(l) *Enforcement.* The Newton Police Department and the Inspectional Services Department shall be responsible for enforcement of this ordinance. Each department shall document the disposition of all complaints by written report available to the public. The written report shall clearly indicate whether the complaint resulted in a warning or fine. If a warning or fine was not issued for a complaint, the responding city employee shall clearly indicate the reason.

(m) *Non-criminal disposition.* In addition to the penalties set forth in subsection (j), where non- criminal disposition of specified sections of this ordinance by civil fine has been provided for in sections 20-20 and 20-21 of the Revised Ordinances, as amended, pursuant to the authority granted by G.L. c. 40, sec. 21D, said violations may be enforced in the manner provided in such statute. The civil penalty for each such violation is set out in Sections 20-21(c) and 20-21(d).

(n) In the event the person in violation of section 20-13 (h) pertaining to leaf blower use is a contractor, the property owner shall be notified of the violation and of any warning or other enforcement issued to the contractor.

(o) *Severability.* If any provision(s) of this ordinance or the application of such provision(s) to any person or circumstances shall be held invalid, the validity of the remainder of this ordinance and the applicability of such provision to other persons or circumstances shall not be affected thereby. (Ord. No. R-331, 6-20-83; Ord. No. T-62, 12-4-89; Ord. No. T-200, 12-16-91; Ord. No. V-286, 3-6-00; Ord. Z-32, 7-14-08; Ord. No. Z-78, 02-22-11; Ord. No. Z-104, 04-02-12) ■

Energy Efficiency: What It Is and Why It Matters

By Ann Berwick

Editor's Note:

Ann Berwick is Newton's Co-director of Sustainability, and her recent talk in Green Newton's lecture series called "Continuing the Course of Greening Our Community" reminds us how important the threat of climate change is to all of us. Whether we are championing solar energy or concerned with land use and protecting biodiversity, we all need to take measures to reduce our carbon footprint. The following article reminds us of how important energy efficiency is in achieving these goals.

Energy efficiency sounds so dull….

Ann Berwick

Here's why it's sometimes referred to as the "first fuel" and why it's way more important than you might think.

First, what is energy efficiency? People often include "conservation" in the general heading of energy efficiency. Sometimes it's hard to tell which is which, but it doesn't really matter: both save energy and are fairly grouped together.

In the energy context, conservation means taking actions that result in the use of less energy. Turning off the lights when they're not in use, putting the heat on a cooler setting or the air conditioner on a warmer setting, and even riding a bike instead of driving are all examples of conservation.

Energy efficiency means using the energy that does get used more efficiently and, thereby, using less of it. Using more efficient light bulbs like LEDs instead of incandescents, air source heat pumps instead of baseboard electric heaters or window air conditioners, and low-emitting cars instead of SUVs are all examples of using energy more efficiently. Installing wall or roof insulation or better-insulating windows is referred to as an energy efficiency because such measures enable fuel to be used more efficiently: less fuel delivers the same level of comfort.

Second, why is energy efficiency sometimes called the "first fuel"? The reason is that in lots of circumstances it's a cheaper way of achieving the same amount of work (e.g., heating, cooling, moving from place to place) than the alternatives. Think about an LED as compared to an incandescent light bulb. The LED is more expensive to buy, but because an incandescent looses 90 percent of its energy to heat (remember how hot it is when you touch it) and an LED wastes much less of its energy, over time the LED supplies light at a lower cost.

The same principle applies to insulation. It costs money to insulate a house, but over time it saves money on heating. In Massachusetts currently, energy efficiency measures cost the equivalent of about three to four cents per kilowatt-hour, while generating electricity with conventional power plants costs about three times that amount. Of course, there's a point of no return: at some point a house is so well insulated that you can't save money by insulating it further.

Energy efficiency is also sometimes referred to as "negawatts." This is because the size of an electric generating plant is often measured in "megawatts." Avoiding the use of electricity generation — often done with coal or oil — can be thought of as using negative watts, or negawatts.

Third, why is it so important? Everyone who believes in science knows that climate change is mostly caused by human activity — mostly by the use of fossil fuels — and is a huge threat to human health, biodiversity, and even to the continued existence of life on the planet.

And although addressing climate change is a huge political challenge, many of the technical solutions are well within reach. We mostly use energy for three purposes: to power electric appliances, for building heating, and for transportation. For the first purpose — generating electricity — it's possible to substitute clean resources like wind and solar power for coal, oil, and natural gas. In other words, we can clean the electric grid; but the fossil fuels that we use to heat buildings (mostly oil and natural gas) and power vehicles (mostly gasoline and diesel fuel) can't be made much cleaner. However, we can use the cleaner electricity to heat buildings and drive cars. The politics are tough, but the solutions are remarkably uncomplicated: use less energy; generate electricity with renewable resources like the wind and the sun; and electrify everything. Using less energy — energy efficiency — is the first step.

In fact, reducing the use of fossil fuels through energy efficiency and clean electric generation has significant additional benefits, besides limiting climate change. Coal, oil, and natural gas all cause air pollution, leading, for example, to smog and causing asthma and other respiratory difficulties. Energy efficiency and renewable power reduce that pollution. They also mean lots of jobs, doing things like installing insulation and solar panels that can't be outsourced to other countries. ■

President's Message

Dear Conservators,

Thanks to those who attended the annual meeting on May 3 and heard Andy Finton talk about resilient nature and the importance of supporting biodiversity and increasing connectedness. Many thanks to those intrepid volunteers who have shown up in cold, gray, and sometimes drizzly weather to pull invasive plants on Newton Serves Day and more days since then. What a team!

Thanks, too, to the knowledgeable leaders who share information about Newton's open spaces on our spring walks. If you missed the opportunity to attend a walk, you'll have more chances again in the fall.

In March, several board members attended the Massachusetts Land Conservation Conference. It was an amazing and inspiring experience to be in an auditorium with more than six hundred other dedicated people who share the mission of land conservation.

We learned so many things: methods for defending a conservation restriction, potential new formats to use for our trail guide revision, information about edible plants, ways that the Worcester Land Trust has been successful in creating a new Greenway, and so much more. It was almost too much to absorb in just one day.

For me, the highlight of the day was hearing E.O. Wilson interviewed by Laura Johnson, former President of the Mass Audubon Society and former Northeast Region Vice President for The Nature Conservancy. As Ms. Johnson said, "If there is any rock star for people who work on land conservation and biodiversity, it is E.O. Wilson, acknowledged as the creator of the scientific disciplines island biogeography and sociobiology."

Professor Wilson pointed out that there are an estimated 10 million species of organisms in our world. Of that number, we have discovered/identified only 2 million. Thus, we don't know even the identity of 80% of the species on Earth.

Wilson also talked about the escalating rate of extinction of species, caused largely by the effects of human activity. He explained that the rate of extinction is 100 times the rate before humans developed and that rate is skyrocketing to 1000 times more. Of all the species listed as being at risk of extinction, scientists have been able to slow or reverse the decline of only 20% of them. Thus, many of the 80% of the unknown species may become extinct before we even know they exist.

E.O. Wilson worked with ecologist Robert McArthur to develop the *Theory of Island Biogeography*, which shows that there's a strong relationship between the amount of area on an island and the number of species that could be sustained on it. Wilson calculated that if we view the earth as an island, we must preserve half of the land and half of the ocean waters in order to save 85% of the species currently on the earth.

Wilson believes that it would be "straight forward" to preserve 50% of the oceans. Preserving 50% of the land would be harder. Right now, he estimates that 15% of the land on the earth is safely set aside in preserves.

To learn more about E.O. Wilson's prescription for saving the important diversity of life on our planet, read his book *Half Earth*, in which he describes the locations of land that would help us to reach the 50% allocation and in which he explains that his plan would not require currently occupied land to be vacated.

Laura Johnson ended her interview with a quotation from Wilson's book *The Future of Life*: "A conservation ethic is that which aims to pass on to future generations the best part of the non-human world. To know this world is to gain a proprietary attachment to it. To know it well is to love and take responsibility for it."

Beth Wilkinson

Boston Harbor Islands National Park Area

Peddocks Island Boston Harbor Islands National Park Area

Boston Light looking toward Boston Harbor

Over Hull and Worlds End looking back to Boston Harbor

Following Professor E.O. Wilson's March address to the Massachusetts Land Trust meeting that drew attention to National Parks as corridors for preservation of plant and animal species, a brief introduction to the Boston Harbor National Park area seems all the more pertinent to Newton Conservators and their mandate to preserve open spaces.

Designated a national park by an act of Congress in 1996, the 34 islands range in size from less than one acre — Nixes Mate, The Graves, Shag Rocks, and Hangman — to Long Island's 274 acres. All of the islands lie within the large "C" shape of Boston Harbor. The farthest island out, The Graves, sits 11 miles from shore.

Great Egret chicks on one of the harbor islands

Once an expanse of marshy plains and elongated, gently sloping hills called drumlins, the basin containing the Boston Harbor Islands National Park Area was produced by a retreating glacier 15,000 years ago. When the sea level rose, it flooded the lower lying land around the drumlins, forming many of the harbor islands.

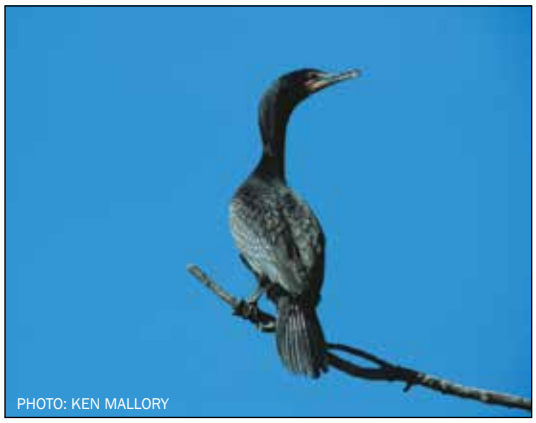
After farmers, land developers, and the military finished cutting down the trees during the founding of Boston, the islands took on the appearance they have today: patches of native flora dominated by grasses and staghorn sumac, mixed with aspen, birch, pine, and white poplar.

Three rivers — the Charles, the Mystic, and the Neponset — arranged like spokes on a wheel, feed into the harbor. The result: a network of urban estuaries where wildlife thrives, despite its proximity to one of the nation's most populated metropolitan regions.

As the park opened for visitation this spring beginning May 13, ferryboats to Spectacle and Georges Island offered a first look at some of the harbor's large variety of wildlife including migrating and resident birds. Then beginning in late June and running to Labor Day, additional ferry service is available to Bumpkin, Grape, Lovells, and Peddocks, where overnight camping facilities are available.

According to the park's web site, the Massachusetts Natural Heritage Program lists six rare species known to exist within the park, including two species listed as threatened and four of special concern. They are the Barn Owl, Common Tern, Least Tern, and Northern Harrier representing the birds, and the Sea Beach Dock and American Sea Blite representing the plants.

The park also notes that field surveys have identified more than 200 bird species, including gulls, terns, herons, ducks, geese, hawks, plovers, sandpipers, doves, owls, woodpeckers, and perching birds. During migration, large numbers of shorebirds utilize the mudflats and salt marshes around the harbor, while transient hawks and songbirds regularly make



Double-crested Cormorant

Black-crowned Night Herons are usually well hidden in tree thickets on some of the harbor islands

Black-backed Gull

use of the more remote islands or those with suitable habitat. In late fall and winter, great flocks of waterfowl gather in harbor waters.

As former editor of a Down East publishers book called the *Boston Harbor National Park Area*, I can attest to the amazing opportunities for viewing birds in the harbor. At one of the breeding islands where island visits by the public are strongly discouraged, I saw three different species of birds: the Great Egret, the Black-crowned Night Heron, and the Double-crested Cormorant, all nesting in the same tree.

Memories of peregrine falcons nesting atop Boston's Custom House Tower (where they can still be observed in a live web feed), snowy owls in winter at Logan Airport, and visits by Oyster Catchers are fresh in my mind. And based on the advice of harbor rangers, Peddocks Island in particular offers a look at shore birds and a large marsh area along with camping facilities, a visitor center, and access to drinking water.

If you are a birder, check out the birds nesting on, or passing through, the islands. Record your own sightings on the eBird checklist and enter what you see at eBird.org — one of the largest biodiversity data resources in existence. A list of birds that have been observed in the harbor can be accessed at http://www.bostonharborislands.org/downloads or for information on operating hours and season information: http://www.bostonharborislands.org ■

Ken Mallory

Do You Use Amazon for Purchases for your Home or Business?

Welcome to amazon smile

As explained in past newsletters, Amazon Smile is a program through which Amazon donates 0.5% of most purchases (yes, $5 of every $1000) to a nonprofit (501c3) organization of your choice (the Newton Conservators, we hope!).

How does one use Amazon Smile? Instead of going to Amazon.com, you go to Smile.amazon.com. On your first visit, you will be asked to choose a nonprofit organization to receive the bonus donation. Enter "Newton Conservators," and you are ready to go. The rest of your shopping proceeds exactly the same as if you had logged in to Amazon.com initially.

Even with relatively few members using the program so far, the rewards have grown. For the first quarter we participated in 2014, we received $22.32. For the most recent quarter in 2016, we received $38.31.

We do encourage you to support our local bookstores, but as most people know, you can buy almost anything on Amazon, and we hope that you will let your purchases work on behalf of open space in Newton.

If you have any further questions about the program, check the FAQ page: http://smile.amazon.com/about.

Jonathan Elcock Photo Gallery

Newton Resident and
Winner of the 2016 Boston Harbor Islands Photo Contest

All photos ©Jonathan Elcock

Photos from left to right, top to bottom: Eastern Bluebird, Osprey Landing on Nest, Marsh Wren, Great Blue Heron, Piping Plover Chick and Parent

Newton Conservators' Questionnaire

Since this is the inaugural issue for me as the Newton Conservators newsletter editor, I would like to thank Conservator President Beth Wilkinson for her help easing the way for my new position on the Conservator Board. Beth's leadership and expertise in past issues of the newsletter have inspired me and offer a challenging standard that I hope I can aspire to. As past Editor-in-Chief of Publishing Programs at the New England Aquarium and a board member of Green Newton, I hope to bring my experience from these conservation-minded organizations to create a publication that will inform and educate you. I also want to invite our readers to complete the following questionnaire to help guide me with ideas they want to see in future issues.

Please assist the Board of Directors of the Newton Conservators by filling out the short questionnaire below and mailing it to Ken Mallory at 37 Oak Terrace, Newton Highlands, MA 02461. Thank you.

1. Which Conservators' activities are of most interest to you or are you most likely to attend?

- Walks ☐
- Invasive Pulls/open space maintenance/cleanup ☐
- Talks sponsored by the Newton Conservators (usually at Newton Free Library) ☐
- Other _____

2. The Newton Conservators needs volunteers to help with activities and projects. Are there any that you would be willing to help with? Please indicate below and leave your name at the bottom, or contact the president at President@Newtonconservators.org

- Monitoring our property Conservation Restrictions ☐
- Leading walks ☐
- Reviewing city land-use proposals and decisions ☐
- Managing membership records and renewals ☐
- Newsletter preparation/mailing ☐
- Other _____

3. What kinds of articles are you interested in for the Conservators' newsletter?

- General conservation issues on the national front ☐
- Local conservation issues ☐
- Conservation work done by the Newton Conservators ☐
- Land use issues ☐
- Wildlife issues ☐

4. Suggestions

_____

_____

_____

This questionnaire is from 1 person or 2 people. (*Please circle*)

NEWTON CONSERVATORS, INC.
P.O. Box 590011
Newton Centre, MA 02459

RETURN SERVICE REQUESTED

Non-Profit Org.
US Postage Paid
Newton, MA 02459
Permit No. 55629

NEWTON CONSERVATORS

SUMMER ISSUE

NEWSLETTER

Newton's land trust working to preserve open space since 1961

WWW.NEWTONCONSERVATORS.ORG • SUMMER 2017

Find us on Facebook

IN THE SUMMER ISSUE:

Magnolia Warbler
photo by Haynes Miller

Go Green! **...and all the other colors of the rainbow. You can view this newsletter at http://bit.ly/2rXvnit. To elect not to receive a paper copy of the newsletter, update your membership profile at www.newtonconservators.org**