

MEMORANDUM

To: Whiting Reservoir Study Committee, City of Holyoke

From: Patty Gambarini, Pioneer Valley Planning Commission

Re: Local Technical Assistance FY21 on Whiting Street Reservoir and Recreational Use – Part 2

Date: November 8, 2021

BACKGROUND

The Whiting Reservoir Study Committee (WRSC), an ad-hoc subcommittee of the Holyoke City Council, requested technical assistance from the Pioneer Valley Planning Commission (PVPC) via the Local Technical Assistance program to investigate what restrictions to use and access the Commonwealth of Massachusetts places on drinking water supply lands, including those with reservoirs not currently in use but still protected as drinking water supply in order to maintain water quality. Findings from this first part of the LTA request was summarized in a June 30, 2021 memo to the Committee from PVPC staffer Corrine Meise-Munns.

The Committee made a follow up request for an additional 9 hours of work to further understanding about the Whiting Street Reservoir and recreational access. There were two aims under this follow up work:

- Further explore location of deed information to ascertain any restrictions on the Whiting Street Reservoir property (2 hours)
- Provide a set of examples of reservoir properties that provide for recreational access with some insights into allowed uses, management, and stakeholder involvement (7 hours)

DEED EXPLORATION

Through Hampden County Registry of Deeds electronic records, PVPC learned that the Whiting Street Reservoir property book and page number are: 32 – 5. The name on the property is Holyoke Water Works and it was recorded in 1950. There is also an associated plan date of

1946 that shows just the northern part of the reservoir. The name Hampden-Hampshire Corp appears on the plan. There may be other associated parcels with the current day property and far more information.

PVPC then turned to the Holyoke Assessor to determine whether there might be any information in City records. The Assessor replied in an e-mail message that all deeds are kept by the Hampden County Registry of Deeds.

In a follow up consultation with Hampden County Registry staff, PVPC learned that reviewing property transactions and determining restrictions for this property is a significant undertaking. Registry staff suggested that the Holyoke Water Department already has access to this information within their own records and if not, the City could hire a Title Attorney practiced in this type of research to learn more.

EXAMPLES OF RESERVOIR PROPERTIES WITH RECREATIONAL ACCESS

Below is a description of four reservoir properties—all active water supplies—to provide examples of how drinking water protection and recreational access combine on certain properties. Two examples are drawn from each Connecticut and Massachusetts. Connecticut examples involve West Hartford Reservoirs operated by the Metropolitan District Commission and Water Supply Lands operated by the Town of Manchester Water Department. Massachusetts examples involve Ludlow Reservoir operated by the Springfield Water & Sewer Commission and Fresh Pond Reservoir/Reservation operated by the Cambridge Water Department.

Staying geographically local seems to make sense since the challenges in terms of water supply, recreational culture, and even water rights are most similar than looking further afield for examples in other parts of the nation.

Among the examples researched, Fresh Pond Reservoir/Reservation provides a thoughtful pathway for considering recreational uses. The property is located in a rather densely urban location where water supply protection and access to outdoor open space are seen as important dual goals for the Fresh Pond Reservoir/Reservation. Perhaps of greatest interest, Cambridge did a Shared Use Plan for the property in 2011 with the Consensus Building Institute. A link to the plan is provided below.

Six questions for the example properties were identified in consultation with PVPC's primary point of contact on the Whiting Reservoir Study Committee, Kate Kruckemeyer. The questions asked are as follows:

Types of passive uses allowed

What types of passive uses are allowed on water supply lands?

What types of uses are prohibited?

Circumstances that allowed for a change in level of recreation if any

Was there something specific that enabled recreational use on these lands or enabled an increase of recreational use on these lands?

How stakeholders and partners involved in enabling and supporting such uses:

Are there partners or a non-profit, friends or neighborhood group that helps with supporting recreational uses?

How structure, coordinated, funded:

If yes, how is this group structured, coordinated, funded?

If no, how does the water department oversee recreational uses?

Implications of recreation on endangered species and their habitats:

Does the water department have any concerns, precautions taken to avoid impacts on endangered species and their habitats?

Environmental justice and equitable access considerations:

In allowing recreational uses of water supply lands, has there been any effort to reach out to populations in the area that are typically marginalized--due to race, language, or income--and might not have easy access to recreation or open green space? If yes, what did you do for this outreach?

Important to note are the regulations in each state that address recreational use at reservoirs.

Connecticut – The Connecticut Department of Public Health has jurisdiction over the regulation of drinking water sources and public use is regulated by Section 25-43c of the Connecticut General Statutes. Recreational uses are outlined in the statute and drinking water suppliers must first seek approval from the Department of Public Health to permit such uses.

In 2011, the State of Connecticut passed a new law (which now appears to be part of Section 25-43c) that extends recreational liability protection to municipalities and the MDC. This followed a May 2010 jury verdict of \$2.9 million for a mountain biker who was injured at the Metropolitan District Commission (MDC) Reservoir in West Hartford. Governor Dannel P. Malloy signed into law (P.L. 11-211) on July 13, 2011.

Massachusetts – In Massachusetts, the Department of Environmental Protection regulates all inland waters, including those used for drinking water supply. MGL Chapter 111, Section 159 states:

The department of environmental protection, in this section and sections one hundred and sixty to one hundred and sixty-six, inclusive, called the department, shall have the general oversight and care of all inland waters and of all streams, ponds and underground waters used by any city, town, water supply or fire district or public institution or by any water or ice company or any person in the commonwealth as sources of ice or water supply and of all springs, streams and watercourses tributary thereto. It shall be provided with maps, plans and documents suitable for such purposes, and shall keep records of all its transactions relative thereto. It shall give notice to the attorney general of any violation of law relative to the pollution of water supplies and inland waters.

310 CMR Section 22.20B on Surface Water Supply defines land uses and other activities, including certain recreational activities, prohibited in surface water supply areas. These prohibitions on recreational uses are stated as follows:

No person shall swim, wade or bathe in any public surface water source and no person shall, unless permitted by written permit by the Board of Water Commissioners or like body having jurisdiction over such source, fish in; enter or go in any boat, seaplane, or other vehicle; enter upon the ice for any purpose, including the cutting or taking of ice; or cause or allow any animal to go into, or upon, any surface water source or tributary thereto.

In addition, public water system operators are charged with protection of the Zone A, B, and C of its surface water source(s) and required to conduct regular inspections, take prompt enforcement, and report annually to MassDEP on inspections and any enforcement actions.

**West Hartford Reservoirs – 1420 Farmington Avenue/Route 4 and Reservoir 6,
2900 Albany Avenue/Route 44 Avon Mountain**

Information sources: MDC website and conversation with Nick Salemi, MDC Communications Office | 860-278-7850

Property owned by Metropolitan District Commission (MDC) with four active reservoirs and two water treatment facilities. Provide clean and safe drinking water to more than 400,000 people in the Hartford Region. Includes 3,000 acres of woodlands and trails

Types of passive uses allowed

30 miles of paved and gravel roads for joggers and bicyclists, hiking trails, wheel-chair accessible picnic groves, cross-country skiing and snow shoeing

Prohibited: swimming or wading in the reservoirs or tributaries by humans or pets; fishing, hunting, trapping, or boating; horses

MDC officials estimate that 70,000 people visit the reservoir each year (*Hartford Courant* 12-26-95)

Circumstances that allowed for a change in level of recreation if any

Happened so long ago, that answer is not known.

Clearly articulated that the land is public water supply watershed land that protects the quality of MDC reservoirs and drinking water. This is not a public park and public use is regulated by the Connecticut Department of Public Health (Section 25-43c of the Connecticut General Statutes) and enforced by MDC police.

How stakeholders and partners involved in enabling and supporting such uses

None currently. Idea of Friends Group has been kicked around, but difficult to have outside group be involved in management. This is not a park and security around water supply of utmost importance. Police officers patrol.

How structure, coordinated, funded

NA

Implications of recreation on endangered species and their habitats

No development to disturb. Always a concern no history of issues.

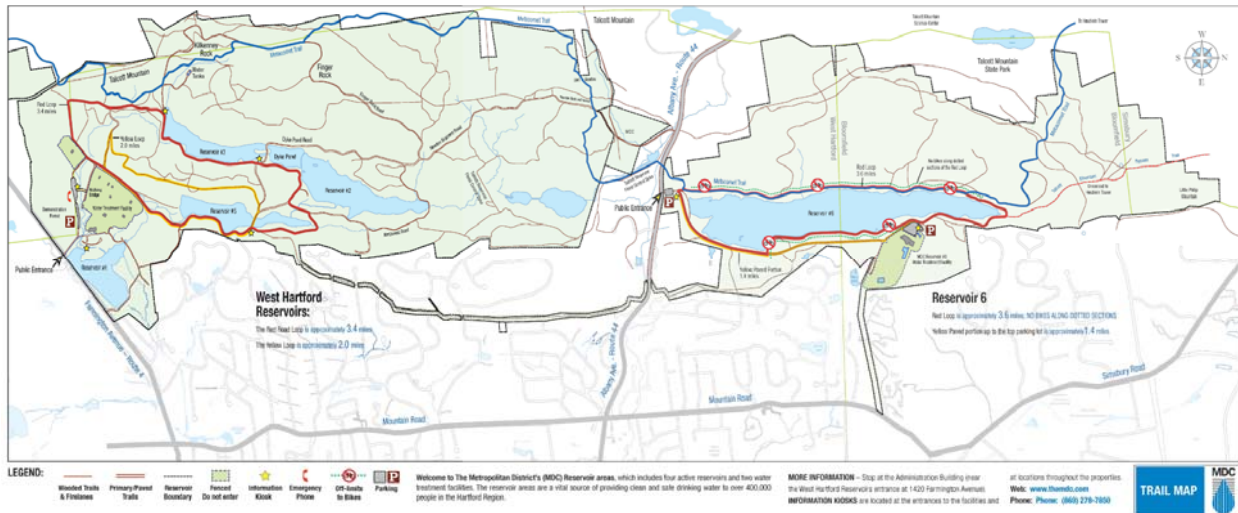
Environmental justice and equitable access considerations

Mr. Salemi noted that these properties are not well located to provide easy access to environmental justice populations. While anyone can use the property whenever they want, Farmington Avenue and Route 44 are very busy routes and not easy to access without a vehicle.

Links and additional notes:

Map: https://themdc.org/app/uploads/2020/01/TrailsMapWeb_12_2013.pdf

Rules and Regulations: <https://themdc.org/app/uploads/2020/01/RULES-AND-REGULATIONS-RESERVOIRS-update2.pdf>



See map at: https://themdc.org/app/uploads/2020/01/TrailsMapWeb_12_2013.pdf

Town of Manchester, CT, Water Department

Various reservoir properties

Information sources: Town of Manchester Water Department website and phone conversation with Kyle Hopkins, Manchester Water Department Field Maintenance Supervisor |o: 860-647-3216 | c: 860-729-4709 | khopkins@manchesterct.gov

Water supply is managed by the Town of Manchester Water Department and includes both surface water from reservoirs and groundwater from wells. There are seven surface water reservoirs (and ten active wells). Reservoirs are as follows: Globe Hollow, Porter, Lydall #1 and #2 and Howard reservoirs located in Manchester; Risley Reservoir located in Vernon; and Buckingham Reservoir located in Glastonbury.

Types of passive uses allowed:

Participants can enjoy walking, hiking, jogging, running, cross-country skiing, controlled orienteering or nature photography on established trails on the lands that surround Globe Hollow, Porter, Howard and Lydall reservoirs in Manchester and Buckingham Reservoir in Glastonbury. A trail system also exists around Risley Reservoir which is owned by the Manchester Land Trust. A small section of this trail passes through water department property. Dogs must be leashed on Water Department property and no swimming, fishing or hunting is allowed.

The passive recreation program only authorizes residents of Manchester, Manchester property owners, Town of Manchester employees, and customers of the Manchester Water Department. Use of a driver's license, state ID card, tax or utility bill and/or town employee ID can be used as proof of eligibility. Minors are allowed to use the passive recreational areas while in the company of a parent, legal guardian or adult over the age of 21 years old. Given staffing, none of the above is enforced in any way.

Mr. Hopkins noted that while there are many people who enjoy and responsibly use water department lands for passive recreation, management has been tough for the few staff that oversee the 4,000 acres of land. The field crew spend most Mondays picking up litter from weekend use of the properties. Mountain bike users who are cutting and blazing new trails have been an especially big problem for water department personnel. Some people also try to get away with ATV riding, fishing and swimming, which are expressly prohibited. With Covid, the number of people using the properties exploded. In one location, visitor parking became a major problem for nearby residences. If water department personnel are alerted to such issues by residents, they often call the police for help.

Circumstances that allowed for a change in level of recreation if any:

Under authorization from the State of Connecticut (authorized under Section 25-43c of Connecticut General Statutes), the water department is able to allow passive recreational activities in designated areas of these watersheds.

Special permission may be granted for a group event, research project or activity beneficial to the ratepayers of the Manchester Water Department. Requests for these types of activities must be made in writing and directed to the Administrator of the water department at least two weeks before the event. The water department reserves the right to require insurance, refuse pickup, traffic and crowd control, and other reasonable measures to ensure protection of the water supply and the department's property. Such requirements will be at the sole discretion of the water department. The procurement of these requirements, including costs, shall be the responsibility of the permittee.

How stakeholders and partners involved in enabling and supporting such uses:

Connecticut Department of Environmental Protection helps with some enforcement issues and does some occasional patrols.

Manchester Land Trust helps to maintain some trails that run through Water Department property, but the group is mostly elderly now and have limited physical ability to do trail work. Mr. Hopkins indicated there is also concern about the appearance of others actively maintaining trails with chain saws and the possibility of encouraging bad behavior among others unauthorized to undertake such activity. This presents a liability for the water department.

How structure, coordinated, funded:

NA

Implications of recreation on endangered species and their habitats:

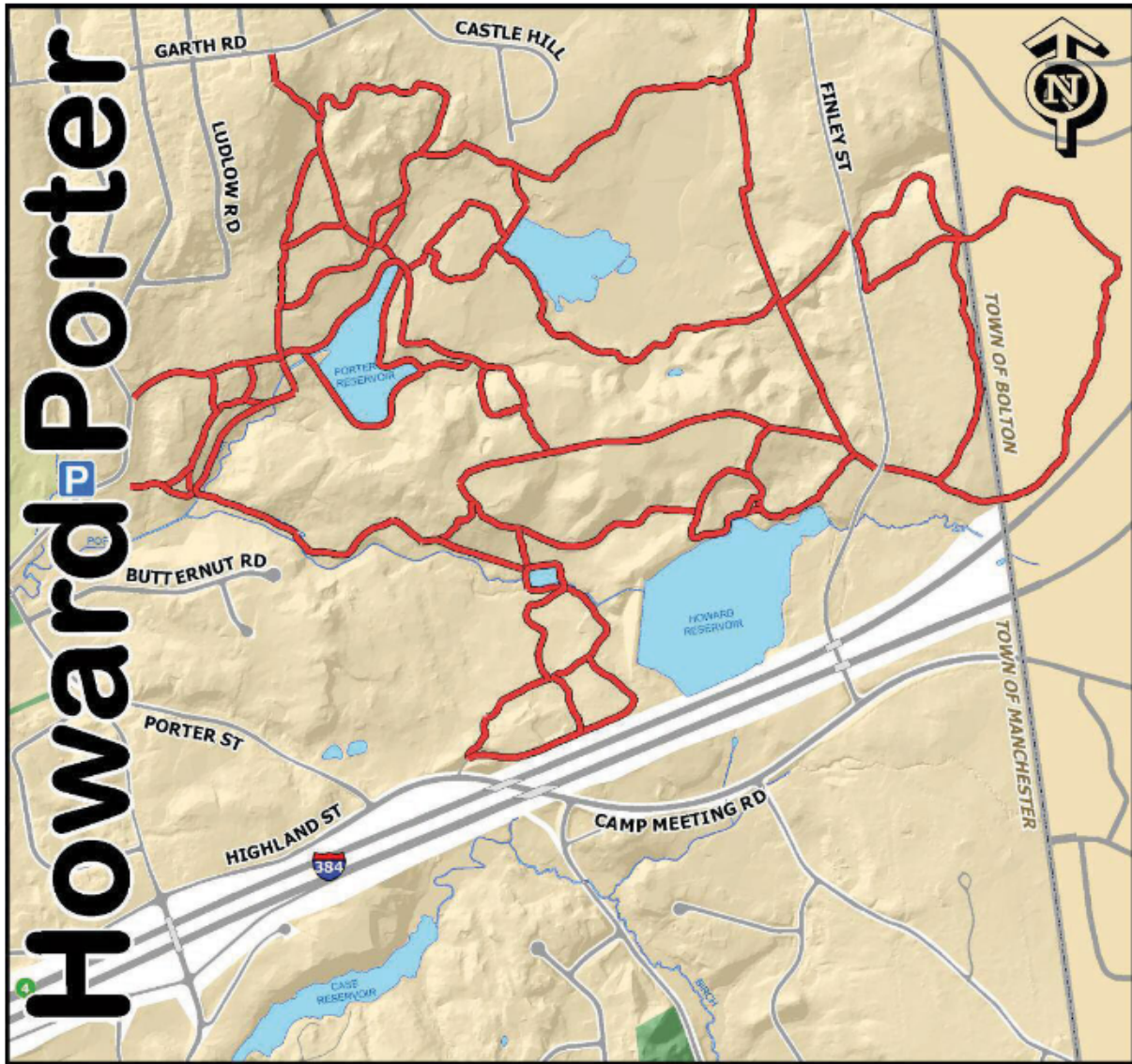
There is a policy not to interfere with wildlife and signs are posted in numerous locations.

Environmental justice and equitable access considerations:

Given struggle to maintain current public use of properties for passive recreation, trying to keep numbers to a minimum, not advertising anywhere.

Links and additional notes:

<http://waterandsewer1.townofmanchester.org/index.cfm/passive-recreation/>



trail stats

- **Trail Head:** Ferguson Road Parking Lot
- **Hours:** Dawn to Dusk
- **Length:** Varies
- **Surface:** Varies rough ground/grass
- **Difficulty:** Moderate

highlights

- This trail system is located on watershed properties that protect and provide buffers to the Towns' reservoirs and tributaries. Not wheelchair accessible.

prohibited activities

- Drinking & Motorized Vehicles

See map that includes some water supply lands at:

http://recreation1.townofmanchester.org/NewRecreation/assets/File/Trail%20Guide_Update_S19.pdf

Springfield Water & Sewer Commission – Ludlow Reservoir

Information sources: Springfield Water & Sewer Commission Website, and e-mail correspondence with Katherine Shea, Educational Outreach and Communications Specialist, Springfield Water and Sewer Commission | 413-452-1311 (t) | 413-627-4238 (m) | katherine.shea@waterandsewer.org

The Ludlow Reservoir, sometimes referred to as the Springfield Reservoir, was built in 1872 to supply the City of Springfield and Town of Ludlow with drinking water. Today the reservoir serves as an emergency water supply and is surrounded by 1,366 acres of protected watershed forest. The Springfield Water & Sewer Commission has opened a portion of Ludlow Reservoir watershed area for passive recreation. The Commission stresses that the area is different from a park – it is a public drinking water supply.

Types of passive uses allowed:

Hiking, running, jogging, walking, biking on paved and dirt roads
Fat-tire bicycles on dirt roads in publicly accessible areas
Non-commercial hunting/fishing in designated areas with valid state license

The following activities are prohibited:

Access to Cherry Valley or Ludlow Dams; treatment & maintenance facilities; canals/canal roads; and all associated structures
Camp/open fires, cookouts, picnics
Camping
Filling, storing, placing, dumping
Introduction of non-native plant, animal or insect
Activities affecting drainage, flood control, water conservation/quality, erosion, etc.
Domestic animals/livestock
Drunkenness, breach of peace, profanity, disorderly conduct
Vandalism
Construction of any object or structure
Swimming or wading
Organized sports, including orienteering, road races, etc.
Public assemblies of 10+ persons unless with written authorization
Motorized vehicles of any kind
Boats, with or without motors
Metal detectors or use of similar devices

Circumstances that allowed for a change in level of recreation if any:

- Memorandum of Understanding (MOU): SWSC, EOEА (now EOEEA), MДФW, and DEM (now DCR) entered into a MOU on June 13, 2001.
- As part of the agreement a conservation restriction (CR), held by DFW, was established. The CR is on approximately 2,500 acres of land owned by the Commission in Ludlow and Belchertown.
- Conservation Restriction (CR): CR was signed on March 18, 2002 prohibiting the development of the property for anything other than water supply and passive recreational purposes, as long as recreation is consistent with maintaining the Ludlow Reservoir and its tributaries as a backup water supply.
- Land Management Plan: Prepared by Epsilon Associates in October 23, 2001 and amended in November 14, 2001 for the Commission and EOEA and approved by the Commission and MДФW. Plan describes existing conditions and details management guidelines and recommendations associated with opening the land for passive recreation.
- The MOU is included as an appendix to the Ludlow Management Plan.
- The state paid SWSC \$1 million as part of the agreement. In 2001, as a newly formed Commission (established in 1996), this was significant and much needed funding to support SWSC operations.

How stakeholders and partners involved in enabling and supporting such uses:

- MДФW holds the CR on the property and need to review Forest Management Plans and activities that occur on Commission property surrounding the reservoir. As CR holders they also complete annual monitoring of the property.
- MassDEP – regulates drinking water supply protection and water treatment operations at Ludlow Reservoir
- Friends of Ludlow Reservoir – volunteer group that assisted the Commission with the administration of public access hours. The group was active from 2010-2017 and dissolved in 2017.
- Town of Ludlow
- MA Environmental Police
- The parties to the MOU that created the Ludlow Reservoir Water Reserve include:
 - EOEEA
 - MДФW
 - DCR, formerly DEMSWSC

How structure, coordinated, funded:

- Ludlow Reservoir, and surrounding 1,386 acres of watershed property, is owned, and maintained by the Commission.

- Policies for use of the reservoir and surrounding watershed property are regulated by Drinking Water Supply Regulations, the Conservation Restriction (CR), and SWSC Rules and Regulations, which are approved by the Board of Commissioners.
- Approximately 95% of the Commission’s budget, including for maintenance and operations at Ludlow Reservoir, is from revenue generated from ratepayers for water and wastewater services.
- Daily operations and the public access program at Ludlow Reservoir are overseen by the Commission’s Field Services Division. The Commission’s Water Operations Division oversees watershed management activities including forest management, water quality monitoring, and slow sands operations.

Implications of recreation on endangered species and their habitats:

- Ludlow Reservoir contains a mapped habitat for the Common Loon.
- MDFW have completed vernal pool surveys.
- The Natural Heritage and Endangered Species Program (NHESP) implements the Massachusetts Endangered Species Act regulations and their Endangered Species Review Analysts/Biologists are able to assess whether or not recreation will impact habitat associated with endangered or threatened species.

Environmental justice and equitable access considerations:

- Ludlow Reservoir is open to all members of the public free of charge to enjoy limited passive recreation. Visitor accessibility is enhanced by a 2.5-mile paved pathway and public restroom.
- The overriding goal of the Ludlow Reservoir Management Plan is to protect the public drinking water supply for emergency use. Careful planning was put into the Ludlow Reservoir Management Plan to balance recreational opportunities with this priority.

Links and additional notes:

<https://waterandsewer.org/education/recreation/>

Interactive map: <https://swsc-gis.maps.arcgis.com/apps/MapJournal/index.html?appid=7d236b0d7e084dc79c289b33d9867537>

Fresh Pond Reservoir/Reservation, City of Cambridge

Information sources: Cambridge Watershed Management Webpages Website, and phone conversation with Chief Ranger Jean Rogers | 508-562-7605. Referred by Vince Falcione, Site Supervisor of Fresh Pond Reservation | 617 349-4762 | vfalcione@cambridgema.gov

The City of Cambridge gets its drinking water from a 24-square-mile watershed located in the Towns of Lincoln, Lexington, and Weston and the City of Waltham, beginning at Hobbs Brook Reservoir (upper reservoir) then flowing to Stony Brook Reservoir (middle reservoir) and ultimately to Fresh Pond Reservoir, a glacial kettle-hole lake located in Cambridge.

The City of Cambridge notes that Fresh Pond serves as an important buffer to protect the health and quality of drinking water supply. The Reservation is also an important open space for Cambridge residents and visitors. Due to limited space on paths, trails, and open areas, as well as increasing popularity due to restoration efforts, occasional conflicts among users can arise. To address these conflicts, the City sought to engage the public in order to develop a shared vision for future use and a clear implementable plan between the Summer 2010 and Spring 2011. The result of this process was the Shared Use Plan with the intent to accomplish the following objectives, which the authors indicate are in no particular order:

- Protect the flora, fauna, and overall ecosystem and water supply,
- Promote a welcoming and safe place,
- Provide for a multitude of recreational activities,
- Promote mutual respect and civility among users,
- Improve communication among users and with those managing the Reservation,
- Provide for additional education and opportunities to participate in stewardship,
- Enhance user safety and enforcement through rules that are easy to understand, posted, and enforceable,
- Provide for enjoyment by current and future generations.

See shared use plan at:

<https://www.cambridgema.gov/Water/freshpondreservation/aboutfreshpond/shareduse>

Types of passive uses allowed:

The Water Department does not expressly list what activities are allowed though fishing is expressly prohibited and there is a perimeter fence around the reservoir. The Fresh Pond Reservoir web page shows several categories of regulations for public use of the property related to: Water Quality Protection, Vehicles, Commercial Purposes, Animal Control, Public Assembly, Safety and Security. Two additional areas of specific interest within these regulations are provided here:

Recreational Activities:

- Picnics are only permitted in Kingsley Park.
- Camping and fires are prohibited on the Reservation.
- No person shall discharge or have in his/her possession a dangerous weapon, bow and arrows, firearms, fireworks or any explosive.
- No person may hunt, shoot, trap or otherwise harm animals or birds in the Reservation.
- Possession or use of alcoholic beverages or controlled substances is prohibited.
- The Cambridge anti-noise pollution ordinance is applicable to Fresh Pond Reservation and shall be enforced.
- Other recreational activities are permitted as long as they are conducted in an orderly manner and are in consideration of the other users of Fresh Pond.

Laws, Regulations and Limitations:

- All persons in the Reservation shall obey the lawful directions of regulatory signs, police officers, dog officers, rangers or Water Department employees.
- All federal, state and local by-laws, ordinances and regulations must be observed and shall be enforced.
- The City of Cambridge, the Water Board and its employees are not responsible for any damage to or loss of property sustained by any user, or for any injury or loss of life, which may be incurred in connection with public use.
- Any violations of these rules and regulations may result in revocation of privileges.
- The Water Board reserves the right to amend, alter, suspend or revoke these rules and regulations pursuant to the City of Cambridge ordinance Chapter 19, Sections 4, 25-34.
- The Water Board also reserves the right to prohibit acts, which are not specified herein which harm the Reservation or the Pond.

For activities involving 25 people or more, the water department has a use permit that must be approved by the Cambridge Water Board. See:

<https://www.cambridgema.gov/Water/downloadforms/Forms/F/freshpondpermit>

There is an extensive public engagement program with two reservation rangers and active volunteer and series of programs at Fresh Pond Reservoir:

<https://www.cambridgema.gov/Water/freshpondreservation>

Circumstances that allowed for a change in level of recreation if any:

Ms. Rogers related a long arc of history at Fresh Pond Reservation that led to today's recreational use program. She noted, the reservoir and surrounding lands had been more intensely used in the past. Many adjacent lands were owned privately, including a hotel and beer gardens, and there was once steamboating, sailboating, and fishing and fowling on the

waters of today's reservoir. Even then, the Reservation was a place for respite from the more densely urbanized areas of the city. Starting in the 1850s, the City of Cambridge came to see Fresh Pond as an important water supply area. They obtained ownership of the pond and used eminent domain to secure ownership of many surrounding lands. For the Water Board that oversees use of the property, protection of water supply remains paramount though recreation is an important.

How stakeholders and partners involved in enabling and supporting such uses:

There are several associated organizations. Friends of Fresh Pond Reservation started about 15 years ago. Through well-organized volunteer activities, they helped to get public education programs started. First professional watershed manager started a bit before then and needed help in finding ways to work better with the public. Emphasis was on promoting understanding that the Reservation is different than a park and eliciting behavior from public that reflects appreciation of water and surrounding lands. Friends group never organized as nonprofit as they wanted to stay informal. There was one main person who coordinated and got the ball rolling, Elizabeth Wylde.

More recently, there has also been an active nonprofit organization called Earth Wise Aware that generates a lot of citizen science data collection. They have a permit to operate at Fresh Pond from the Water Board and they share data with the Water Department.

The Cambridge Sportsmen Union also hosts races every Saturday at 10 a.m., but not really a friends' group.

How structure, coordinated, funded:

Friends of Fresh Pond Reservation had \$10 dues, but many members provided far more in contributions that went to support programs. The group was all volunteer but had a steering committee to direct activities.

Implications of recreation on endangered species and their habitats:

Ms. Rogers said that the area is so urban there are no endangered species. They do have an active native plant program that now seems to be bringing back certain animal species, including nesting green herons, eagles, mynx, owls, etc.

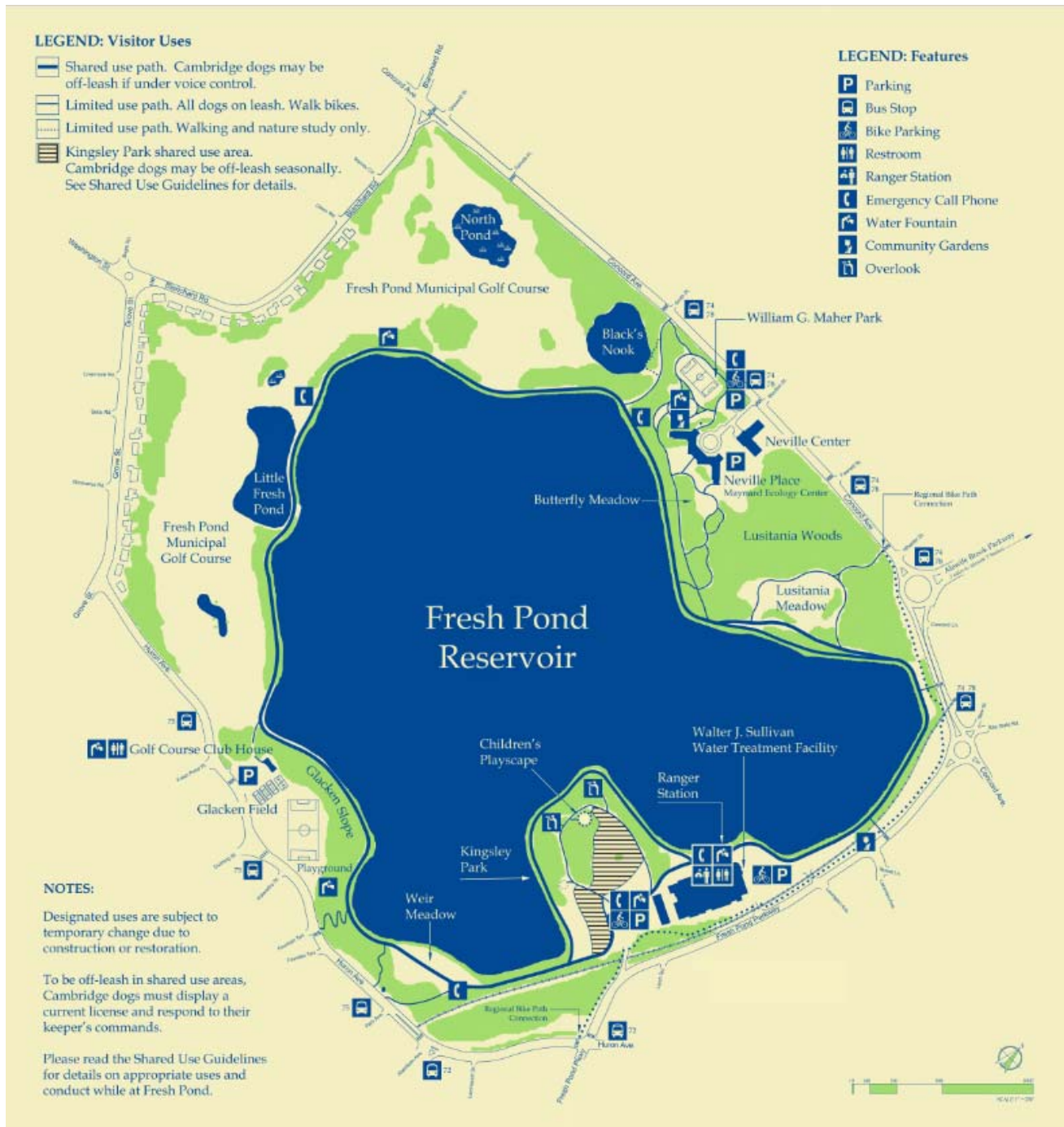
Dogs have been a major ongoing problem but seems that City policy is now helping to drive better behavior across all properties more recently.

Environmental justice and equitable access considerations:

Two major programs help to bring lots of families from across the City: Fresh Pond Day and the Butterfly Festival. The Reservation also works with public schools, which have a field investigation facility on site. As a result, the Reservation becomes a place that lots of kids know and love.

Links and additional notes:

<https://www.cambridgema.gov/Water/watershedmanagementdivision/wheredoesourdrinkingwatercomefrom>



See map at: <https://www.cambridgema.gov/-/media/Files/waterdepartment/freshpondreservation/Education/fprmapnostar.pdf>