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TOWN OF HARVARD

OPEN SPACE & RECREATION PLAN

2024



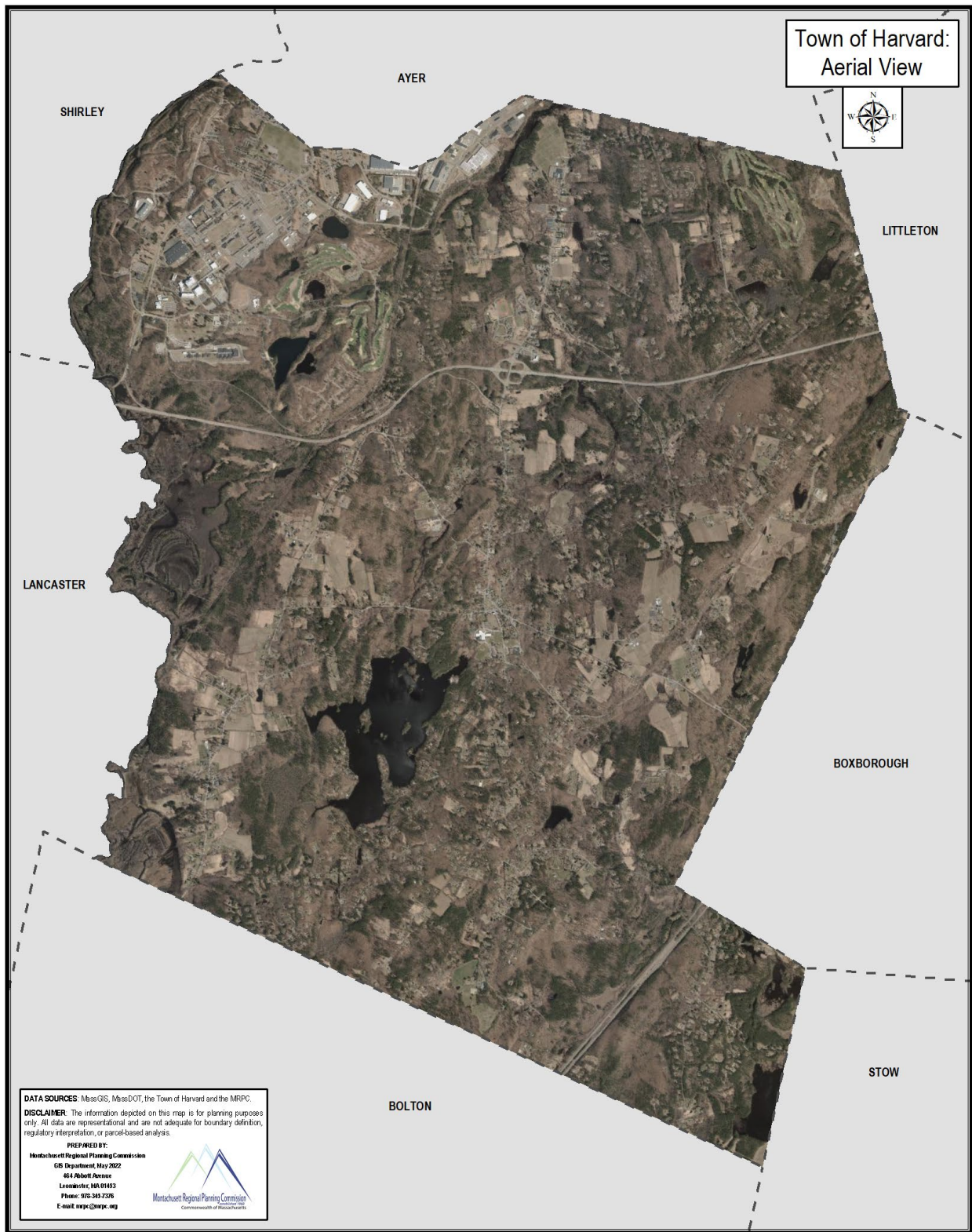
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Photography: Liz Allard, Gina Ashe, Peter Dorward, Kerri Green, Anne McWaters, Tom Murray, Jessie Panek, Jack Shelton, Wendy Sisson, and Joanne Ward



Map 1.1 - Town of Harvard – Aerial View

Section 1: PLAN SUMMARY

This Open Space & Recreation Plan represents the Town's comprehensive approach to protecting its abundant scenic and natural resources, and to provide recreational opportunities for the public. It is intended to be used as a tool by local leaders to help ensure that the Town maintains its scenic beauty and landscape character, while working to accommodate growth and the increased demand for recreational facilities.

The Plan contains:

- A compilation and analysis of the Town's natural resources - its waterways, forests, and wildlife habitats
- An existing inventory of all permanently protected and unprotected open space and outdoor recreational facilities within the Town
- Detailed maps showing special landscape features, water resources, open spaces, habitat and zoning

The Open Space Committee elected to not include the portions of Devens that fall within the Town of Harvard boundaries in this plan as Devens has developed its own Open Space and Recreation Plan.

Over half of the Town of Harvard is currently open space which defines the Town's rural character that its residents value so highly. Almost half of the open space is not permanently protected. The largest part of this unprotected land is currently in agriculture which is a prime candidate for development.

In a town-wide survey, the residents of Harvard overwhelmingly reaffirmed that they value the open space in Town and the Town's recreational facilities for organized sports and individuals. The survey also showed that most residents think the Town needs more open space and recreational facilities, but at the same time the Town must do a better job of maintaining existing open space and recreational facilities.

The product of the public input to and analysis in this Plan is a 7- year action plan which includes:

- Provide an adequate & reliable funding stream to obtain and protect Open Space
- Protect, enhance, and preserve the rural character and historic landscapes
- Protect Harvard's agricultural land
- Protect Bare Hill Pond as an important shared resource
- Provide an interconnected trail network and walkways
- Provide high-quality recreational opportunities for all Harvard residents
- Protect water resources, including groundwater and wetlands
- Protect native plant and animal species
- Maintain and improve the Town's Open Space

Section 2: INTRODUCTION

A. Statement of Purpose

According to the Massachusetts Audubon Society report, *Losing Ground*, Harvard is within the sprawl frontier centered around the Interstate 495 and Route 2 corridors – where important natural resources are under the greatest threat of being lost or degraded due to impending rapid growth and development.¹ While Harvard's growth has been modest, surrounding towns have experienced much higher rates of growth. Residential and business growth along the Route 2 and Interstate 495 corridors is putting pressure on open space for more housing and more business development. Rising land values and high property taxes drive older residents who own large land parcels to sell property for development. Agricultural land, which comprises a significant portion of Harvard's open space, is a prime candidate for development especially as the current generation of farmers and orchardists retire.

A majority of homes and businesses in Harvard depend on wells fed by groundwater - one of our most important assets that we must protect. Lakes, ponds, rivers, streams, and wetlands of all types have been given priority consideration in this Plan. Orchards, working farms, open fields, woodlands, wetlands, all with diverse plant and animal habitats, support a healthy ecosystem. Vistas east and west, old stone walls, glacial remains, winding roads, antique houses, and old farmsteads provide beauty and educational opportunities to the community. All these elements in their unique combinations create the Town's unique character.

Changing demographics and increased youth sports participation have led to overuse of the Town's athletic fields. The shortage of fields was further compounded by the loss of two ball fields caused by the construction of the new elementary school. Finding land for additional playing fields has been identified as a priority for the Town.

This seventh revision of the Harvard Open Space and Recreation Plan provides a community supported action plan to be used for maintaining the Town's rural nature, retaining its individual character, providing recreation facilities, as well as providing its citizens with a safe, healthy, and pleasant place to live. The Plan is designed to meet the Massachusetts Open Space & Recreation Plan requirements set forth by the Executive Office of Energy & Environmental Affairs, Division of Conservation Services, and will make the Town eligible for State grants for open space acquisition, protection, and recreational facility improvements. The Plan is available to everyone on Harvard's website www.harvard-ma.gov.

¹ Ricci, E.H., J. Collins, J. Clarke, P. Dolci, and L. de la Parra. 2020. *Losing Ground: Nature's Value in a Changing Climate*. Massachusetts Audubon Society, Inc., Lincoln, Massachusetts, 33 pp. (<https://www.massaudubon.org/our-conservation-work/policy-advocacy/local-climate-resilient-communities/publications-community-resources/losing-ground>)

B. Planning and Public Participation

The Harvard Open Space and Recreation Plan (OSRP) underwent a total rewrite in 2003, and was updated in 2008 and 2016. In 2022, the Town received a District Local Technical Assistance grant from the Montachusett Regional Planning Commission (MRPC) to update the OSRP. The Harvard Open Space Committee (OSC) and MRPC collaborated on the latest update.

The 2024 update of the Harvard OSRP focused on updating the Town's demographics, and obtaining public input to create new goals and a new 7-year action plan. Public input was solicited via an online survey which is attached in Appendix 2. Survey responses were collected from May 24, 2022 to June 30, 2022, and 472 responses were received. The survey results, along with the goals and action plan derived from them, are contained in Sections 6 – 9.

C. Town of Harvard Open Space Committee

Recognizing that the Harvard Conservation Commission's time was consumed with wetland protection and the management of existing conservation lands, in 2019 the Conservation Commission and the Harvard Conservation Trust petitioned Harvard's Select Board to create an Open Space Committee (OSC) focused on protecting Harvard's open space. The Select Board agreed to the request, forming an ad hoc committee with the added role of identifying land suitable for active recreation facilities. The OSC was also tasked with updating Harvard's OSRP as required. In 2022, the Select Board made the OSC a standing committee reporting to the Select Board. The OSC's composition and charter are listed in Appendix 3.

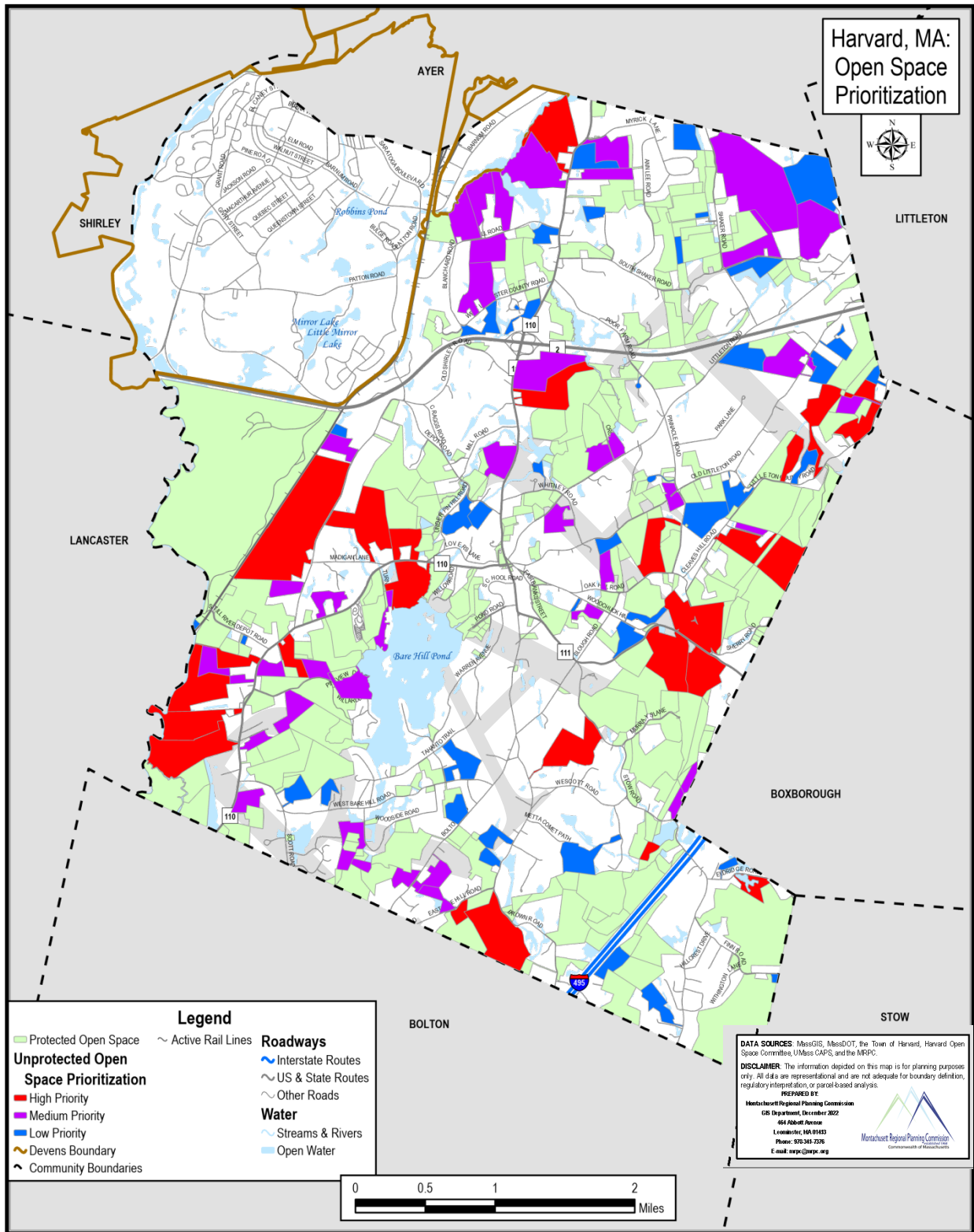
One of the first tasks the OSC undertook was the need to develop a way to systematically evaluate Harvard's open space – one of the objectives of the 2016 OSRP. To avoid having to do this manually, the OSC developed a Graphical Information System (GIS) tool to analyze Harvard's open space for suitability for conservation or active recreation (see Appendix 4 for details).

Based on the community input to the 2016 OSRP, the OSC selected four criteria to identify the highest priority open space to be protected:

- Preserving agriculture and farmlands
- Protecting ecologically sensitive areas
- Creating open space corridors
- Protecting water and wetlands

The highest priority open space to be protected using the above criteria is shown in Map 2.1.

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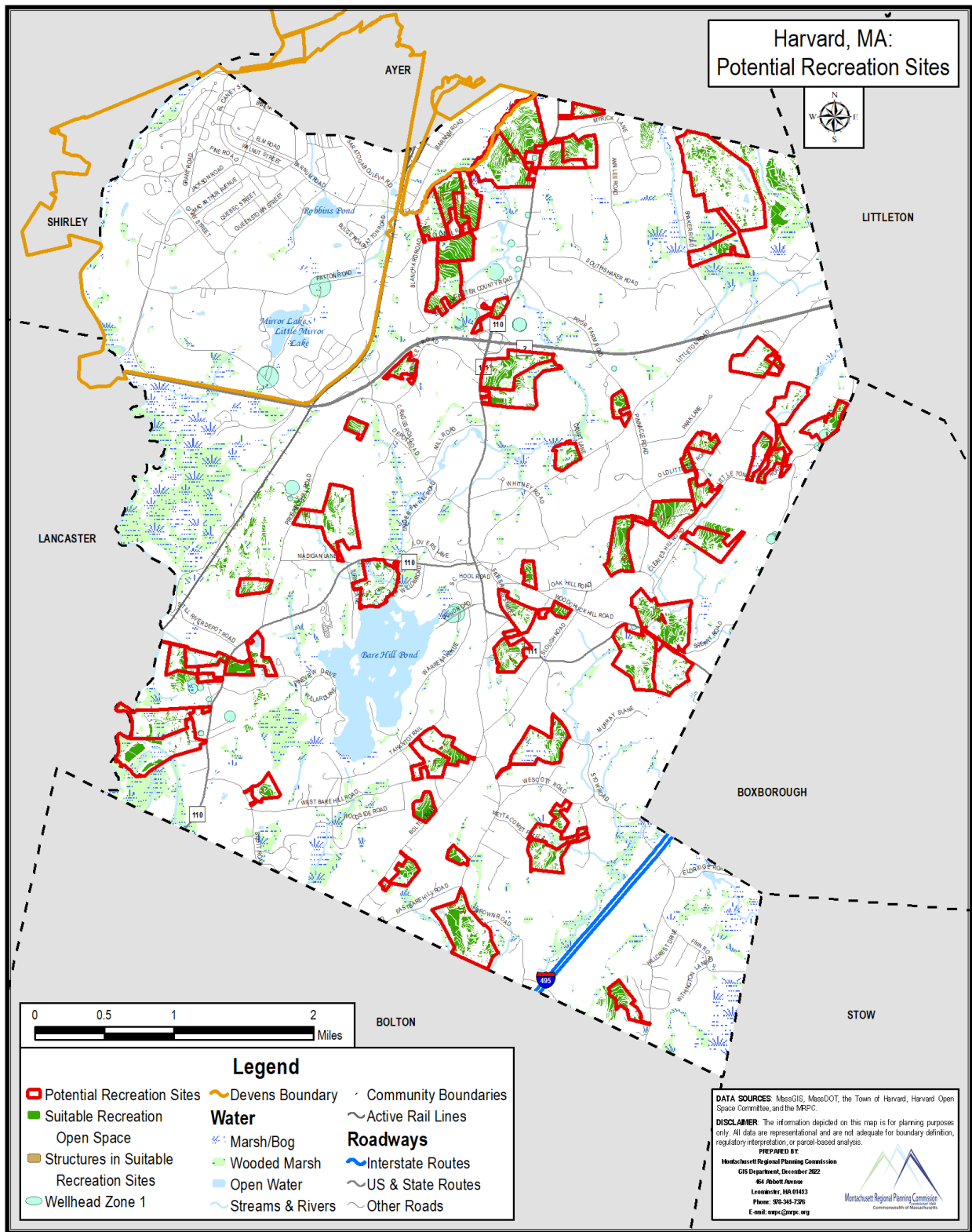


Map 2.1 - Prioritized Open Space Parcels to Protect

To identify potential sites for active recreational facilities, the OSC chose to look for potential sites that have:

- ≥ 3 Acres of land with $< 4\%$ slope outside of water, wetland, and zone 1 wellhead buffers
- $\geq 50'$ of road frontage

The potential sites suitable for active recreation facilities using the above criteria are shown in Map 2.2.



Map 2.2 - Potential Sites for Active Recreation

D. Accomplishments since the 2016 Action Plan

The following actions were accomplished from the 2016 OSRP Action Plan.

1c: Work with other non-profits and government agencies to protect open space:

- Open Space Committee formed with a representative from Harvard Conservation Trust
- The Conservation Commission partnered with the Harvard Conservation Trust, Sudbury Valley Trustees, and Community Harvest Project to purchase the development rights to the CHP Prospect Hill Orchard
- Nashua River Watershed Association obtained Partnership Wild and Scenic Rivers designation for sections of the Nashua, Squannacook, and Nissitissit Rivers, as supported by Annual Town Meeting

2a: Maintain the Town's historic villages: Harvard Center, Still River Village and Shaker Village:

- Town Hall renovations
- Old Library renovations
- New sidewalks and curbing placed around Town Common
- Stonewalls repaired in Town Center
- Town petitioned legislature to lower speed limits throughout Town to calm traffic
- Town adopted "thickly settled " Town wide 25 MPH speed limit

3a: Create a prioritized inventory of unprotected agricultural land

- Open Space Committee created Open Space protection model to prioritize land to protect (Appendix 4)

3b: Publicize land that needs to be preserved

- Agricultural Advisory Committee created "Harvard Grown Local Products From Our Families to Yours" brochure

3c: Allocate funding for the protection of agricultural land (Agricultural Preservation Restriction and purchase)

- Open Space Committee Open Space protection model includes preserving agriculture
- Conservation Commission and Harvard Conservation Trust secured funding through the Community Preservation Act to be allocated toward the Agricultural Preservation Restriction for Community Harvest Project on Prospect Hill Road

4a: Maintain and improve the health of the Bare Hill Pond

- Continued coordinating deep winter drawdowns on an annual or biennial basis.
- Maintain storm water runoff controls as needed
- Continued comprehensive monitoring of nutrient levels and invasive plants on an annual basis

4b: Balance and regulate recreational use of the Pond and the beach

- Beach house restrooms were upgraded, and the beach house was painted.
- 7 Boats are being stored in the boathouse.
- The recreation management plan for water activities was updated, including ; specifying the number and type of boats on the water during peak times.

5a: Develop a system of interconnected trails for non-vehicular travel

- Harvard Conservation Trust updated on-line trail maps
- Open Space Committee identified Open Space parcels to create Open Space corridors
- Harvard Conservation Trust purchased 100 acres from New England Power Co. to connect several areas of protected open space
- Worked with private landowners to provide easement access between trails on protected land

5c: Provide safe walkways to and within Town Center

- New sidewalks and crosswalks created around Town Common
- Installed signage ("Share the Road") along Town roads alerting drivers to walkers, bikers and others using the roads within the Town Center and Still River Village

6a: Expand recreational opportunities for residents of all ages

- Open Space Committee was formed to identified potential Open Space suitable for recreation fields
- Conservation Commission's Land Stewardship Subcommittee provides semi-annual walks to scenic vistas
- Harvard Conservation Trust provides annual New Year's walk on its land, along with other walks and activities including "Run for the Hills"

7b: Develop more fields to allow rotation and prevent overuse

- Open Space Committee was formed to identified potential Open Space suitable for recreation fields

8a: Identify and protect open space critical to protecting Harvard's water resources

- Included in Open Space Committee Open Space (OSC) prioritization model (Appendix 4)
- OSC charter includes identifying funding for Open Space protection which includes water & wetlands
- OSC created a plan for Open Space protection based on past spend
- Harvard Conservation Trust purchased Horse Meadow Knoll to protect the headwaters of Elizabeth Brook and the Assabet River, with a conservation restriction held by Sudbury Valley Trustees

8b: Educate townspeople on the importance and function of wetlands

- Updated the wetlands pamphlet
- Updated the Town website with current information

9b: Preserve habitat for native plants, animals and threatened species

- Harvard Conservation Trust purchased Horse Meadow Knoll to protect the headwaters of Elizabeth Brook and the Assabet River, with a conservation restriction held by Sudbury Valley Trustees

9c: Educate townspeople on invasive plants

- Annual invasive plant removal days

10c: Create a full-time Conservation Agent position

- Position created in July 2023

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Section 3: COMMUNITY SETTING

A. Regional Context

The Town of Harvard is located in North-Central Massachusetts, in the northeastern corner of Worcester County. The Massachusetts Department of Environmental Management Landscape Inventory refers to this area as the Upper Nashua Valley-Shrewsbury Ridge Unit of the Massachusetts Central Upland. The Shrewsbury ridge runs from Littleton through Harvard to Shrewsbury and provides many excellent vistas of the surrounding countryside. The scenic western views from the Wataquadock Hills (Shrewsbury ridge) to the Wachusett Hills have been appreciated for their natural “grandeur and beauty” since the great Catacoonemaug sachem, Makamachekamuck, spied them from atop the hill that once bore his namesake and is now known as Prospect Hill. Harvard was then, and is now, unique within the region, as its rolling hilltops afford both a pleasant perch with stunning views as well as fine fields with fertile soils. Most other prominent hilltops affording similar views offer far less productive soils and, on the contrary, are usually comprised of exposed bedrock ledge or “gneiss” fields full of quartz, feldspar, and mica.

The region has a long history of agricultural land uses and Harvard maintains a strong heritage of land husbandry² and stewardship where the long-term concern for the well-being of the land and its value as a natural and cultural resource has not been lost. Harvard, like many of its neighboring towns has evolved into a suburban community, however, unlike many of its neighboring towns, Harvard has not lost its rural character or landscape. In recent decades, this region has become one of Massachusetts' prime growth areas for both housing and business. Interstate 495 runs east of Harvard and divides the Town in the southeast. Harvard is also divided by the east-west Route 2 corridor. Harvard's location at the junction of Route 2 and I-495, with direct access to both, providing convenient travel to Boston, Metro-West, and the Merrimack Valley has brought significant suburban growth to the Town. Maintaining the Town's rural character and landscape despite its geographic location at the very junction of two primary highways connecting two of the fastest growing regions in the state will take thoughtful planning and wise decision-making with regard to land use and open space protection.

Harvard lies at the headwaters of three major river basins. The central and western portion of Town drains into the Nashua River Watershed. A portion of the southeast corner of Harvard drains into the Assabet River, part of the Sudbury, Assabet, Concord River, or SuAsCo basin through Elizabeth Brook and unnamed tributaries of Great Brook in Bolton. In the northeast portion of town Bennett's Brook and Black Pond Brook drain into the Stony Brook Watershed, part of the Merrimack River watershed. Lying in the upper reaches of the watersheds, Harvard has no large rivers with extensive flood plains, but its many wetlands help to moderate downstream flooding by absorbing heavy rains and delaying release of runoff to the valleys below.

² Stewart, P.J. 1981. Forestry, Agriculture and Land Husbandry. The Commonwealth Forestry Review, 60(1), pp. 29-34.

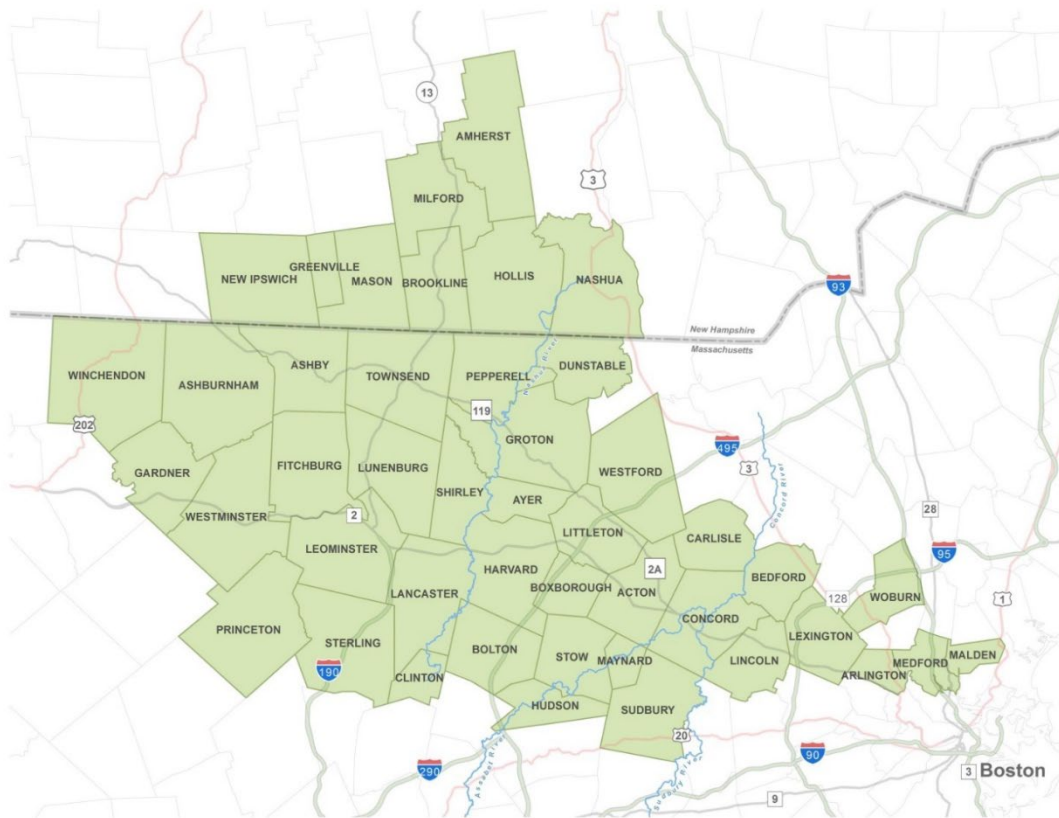
Harvard is one of 45 communities in north central Massachusetts and southern New Hampshire that make up the Freedom's Way National Heritage Area (FWNHA). Established by Congress in 2009, it seeks to foster a close working relationship with communities and state, national and regional partners to preserve the historic and cultural identity of the region. The goal of the FWNHA is to "...to fulfill the vision and mission conceived and expressed in its enabling legislation's statement of purpose to manage preserve, protect and interpret the heritage areas cultural, historic, and natural resources for the educational and inspirational benefit of future generations."³ The FWNHA is one of 49 Heritage Areas affiliated with the National Park Service.

National Heritage Areas are based upon areas possessing a unique, strong, or special cultural identity or common heritage that was formed over time based on the relationships between people and the land and their influence upon one another which somehow shaped the people and the landscape in a way that is common to that region and unique from other places both near and far. National Heritage Areas aim to preserve and tell the stories related to the formation of that unique natural, cultural, and historical heritage by identifying and exploring theme-related linkages that celebrate local, regional and national resources. The themes for the Freedom's Way Heritage Area are: Rediscovering the Native Landscape; Inventing the New England Landscape; and Shaping the Landscape of Democracy. Eventually, fully developed connections of trails, scenic roads, rivers, bikeways, historic walks and historic "Paths of the Patriots" will link the communities and celebrate their unique heritage.

Freedom's Way partnered with the Massachusetts Department of Conservation and Recreation (DCR) to conduct feasibility studies and heritage landscape reconnaissance surveys in 22 communities. Harvard was one of those towns selected to conduct such a survey and followed up that effort by producing a pilot project for DCR to review the Town's Scenic Roads Bylaw and other related issues. That model project is now available as a guide for other communities. Also available online at www.freedomsway.org is the Town of Harvard's history page that includes its Revolutionary War sites.

Fruitlands Museums, another regional resource, is a not-for-profit museum with four buildings, several outdoor sites, a restaurant, and a museum store. The museum buildings include the Fruitlands Farmhouse, the Shaker Museum, the Indian Museum, and the Picture Gallery. The Museum owns over 200-acres, 150 of which are wooded, with panoramic views over the Nashua Valley. The Museum's collections and interpretive trails tell stories and explore evidence about New England cultures and their expression in the landscape. Fruitlands Museum is a National Register Historic District, and the Fruitlands Farmhouse is National Register Historic Site. Fruitlands contains two miles of recreational trails adjacent to the Oxbow National Wildlife Refuge. In 2016, The Trustees of Reservations (TTOR) acquired Fruitlands and will integrate the Museum as one of its reservations. The acquisition provides stronger financial stability for the Museum to grow and prosper.

³ Freedom's Way Heritage Association, Inc., "Freedom's Way National Heritage Area Management Plan", June 2015, page 1.



Map 3.1 - Freedom's Way National Heritage Area

Regional connections through conservation and wildlife refuge lands include the Bowers Springs Conservation Land (Harvard and Bolton), Delaney Wildlife Management Area (Harvard, Bolton, Boxborough and Stow), Bolton Flats Wildlife Management Area (Lancaster, Bolton and Harvard), Oxbow National Wildlife Refuge (Harvard, Devens, Shirley and Ayer), as well as on-going efforts to link conservation lands in Harvard with Bolton and Littleton.

A portion of southwest Harvard, which includes the Oxbow National Wildlife Refuge, Bolton Flats Wildlife Management Area, Fruitlands Museums, and private lands, lies within the Central Nashua River Valley Area of Critical Environmental Concern (ACEC). A second ACEC, the Squannassit ACEC, also lies partly within Harvard and includes the portion of the Nashua River within Devens along the northwest border of Harvard. An ACEC is a formal designation made by the Secretary of Environmental Affairs to protect and preserve areas of environmental significance. This designation notifies regulatory agencies and the public that most development activities under State jurisdiction within ACEC's must meet high environmental quality standards. The ACEC's are displayed on Map 4.1.

B. History of the Community

Native American Life

Long before the first European settlers arrived in the area that was later to become known as Harvard, the Nashaway Indians inhabited the region along the Pennacook (Nashua) River, including parts of present-day Harvard. They lived off game from the forests, fish from the rivers and ponds, berries and nuts from the native bushes and trees, and corn, squash, and beans (known as the “*three sisters*”) grown in seasonal planting fields.

It was the custom of Native Americans of the Northeastern Woodlands to set fires in the late fall to burn off the grasslands and woodlands near their villages when the land was driest to encourage habitats for wildlife and berry growing. This practice kept the land open and ready to cultivate and made it very attractive to the European settlers. However, it was not only the open, park-like woodlands containing native fruit trees, nut groves, abundant wildlife, and springs that attracted the English prospectors: The lands along the banks of the Nashua River, then known as the Penacook River, contained miles of broad, treeless intervals with a dense growth of flowering herbs and shoulder-high grasses not found in most other parts of the Massachusetts frontier. Such uncommon “natural pastures” in the low-lying areas along the river combined with the open forests, beautiful vistas, abundant streams and springs, and good soils among the upland hills made this area “A desirable place as any in the country”, according to one Sergeant Phillips upon his return to Cambridge from a visit to the area in 1650.⁴

According to Henry Nourse in “History of the Town of Harvard”, the Nashaways gained spiritual inspiration from the long vistas across the magnificent valleys and woodlands, with Mount Wachusett to the West, and the New Hampshire mountains to the Northwest. Apparently, the same views now admired from atop Prospect Hill, north of Bare Hill Pond, were also once esteemed by the regions native Nipmuc and Pennacook people, in fact the same hill was once known as Mahmacheckomok, or Makamachekamuck’s Hill, likely after the great Catacoonamaug sachem.⁵ Other local and nearby native people were connected to the land around Mahmacheckomok and lived among the hills, mountains, rivers, ponds, and streams between the Concord River, included Nashoba, Naumkeag, Nipmuc, Pennacook, Quaboag, Souhegan, Wachuset, Wambesit, and Washacum (a localized group of Nashaway inhabiting the land between two ponds of the same name in Sterling).⁶

While it is not known with absolute certainty if a native settlement existed within Harvard, references to an “Old Indian Planting Field” and “Wigwam Meadow” within an early land assignment at the northern end of Bare Hill suggest that it is a highly likely possibility. At the very least it provides a strong clue that the presence of at least a small seasonal community or family settlement did occur within Harvard at that location.⁷

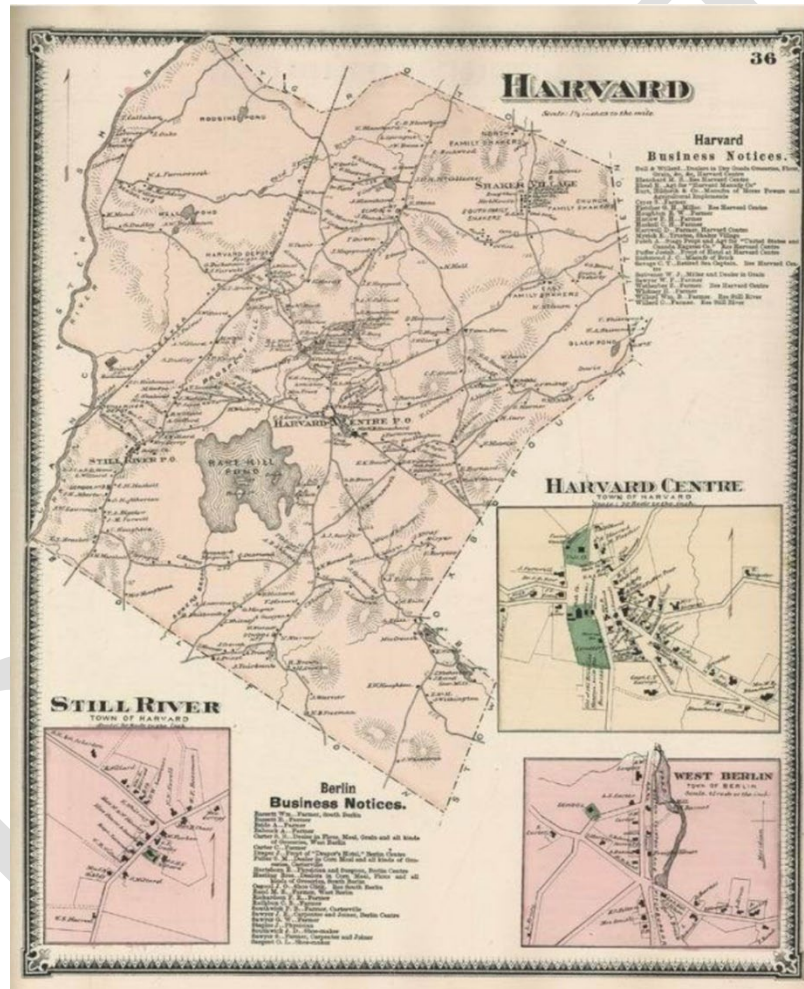
⁴ H. S. Nourse. History of the Town of Harvard, Massachusetts: 1732–1893. Harvard: Printed for Warren Hapgood. 1894

⁵ R.A. Douglas Lithgow. Native American Place Names of Massachusetts. Applewood Books edition. Reprinted from Dictionary of American-Indian Place and Proper Names in New England. 1909.

⁶ Sherburn Friend Cook, The Indian Population of New England in the Seventeenth Century, p. 13

⁷ H. S. Nourse. History of the Town of Harvard, Massachusetts: 1732–1893. Harvard: Printed for Warren Hapgood. 1894

Regardless, it is certain that nearby areas were inhabited by both the Nashaway and Nashoba people. It is believed that the local native people were of Nipmuc decent, however, it is also possible that they may have been the southernmost occurrences of Western Abanaki. Regardless of the precise location of their inhabitations, or ancestry, it is accepted that both the Nashaway and Nashoba were likely part of a regional confederacy of native people and villages associated the Penacook, an Algonquian-speaking people of southern New Hampshire and portions of north-central and north-eastern Massachusetts.⁸



Map 3.2 – Harvard c. 1870⁹

⁸ Sherburn Friend Cook, The Indian Population of New England in the Seventeenth Century, p. 13

⁹ Published by F. W. Beers & Co.

Village Life

In 1642, the Nashaway Indians sold some of their land to traders from Watertown and Boston. Groton and Lancaster developed out of this land. In 1683, the Town of Stow was created out of the un-appropriated land between Groton and Lancaster, and Harvard grew out of these lands. There were some large land holdings that were originally held by a few, but the average settler held a small parcel. Villages were established in three parts of town: Still River, Shaker Village, and the Town Center. Early inhabitants were robust, hardworking, and able to survive with few material advantages. Most were self-reliant farmers and their families, who cleared the land when needed, and grew their own food. They built their own houses and wove the fabric for the clothes they wore. Life was hard and there were many early deaths, particularly among the numerous children that were born. Social life centered on church activities and group events, like barn raising.

Good relations with the Native Americans in the area eventually deteriorated, and there was always the fear of an Indian attack. Garrison houses were established for protection of the settlers. The Sprague house at the corner of Still River Road and West Bare Hill Road is an example of a garrison house. Wars between the Native Americans and the settlers broke out in the 1670s and atrocities were committed by both sides.

In 1730, villagers in the Bare Hill area filed an article at the Lancaster Town Meeting to create a new Town, Harvard. After two years of negotiations with Lancaster, Groton, and Stow, Harvard was incorporated. In 1732, there were 325 people in Town providing a sufficient number of families to support their own minister, and land petitioned as common land to build their own meetinghouse. A training field and a burying place, (where Town Center cemetery is currently laid out), were also established, as well as land for “other Public uses.”



Cattle Pound and Powder House - Town Common

Industry

Throughout the Town's history, there have been numerous short-lived, small industries, in fact, the first colonial building erected within the area was the Grist Mill erected by John Prescott (1667-72) on Nonacoicus Brook, or present-day Bowers Brook, at Old Mill Road. The slate of Pin Hill was quarried until the 1880's. There are records of potash works, cider and vinegar manufacturing, tanneries, and brick making. A number of mills were built over the years, including sawmills, gristmills, a fulling mill (a process for cleansing, shrinking, and thickening cloth by moisture, heat, and pressure), and a trip hammer mill. In several places, especially along Bowers (formerly Nonacoicus) Brook, the foundation stones and other remains of these mills may still be seen.

In 1848, the railroad came to Harvard. Depots were located in Still River and northwest of the Town Center at what is now called Depot Road. The railroad made it easier to ship goods. The New England Brick Company, the Union Paving Company, Haskell's Vinegar Works, and the Watt Dairy Farm produced goods in Harvard and shipped them by rail.

Agriculture

Agriculture was the major livelihood for the Town throughout the eighteenth and nineteenth centuries.

Throughout its history, Harvard farms have produced hay, grains, and a wide variety of vegetables. Dairies were an important industry, especially after the railroad came to Town. By the mid-1800s, dairying, cattle, and swine accounted for approximately 25% of the total value of agricultural goods.

Orchards existed in the Town's early years but did not become large commercial businesses until the late 19th and early 20th centuries. Commercial agriculture, especially dairy farms and commercial fruit-tree orchards, especially apple orchards, have a long and storied history in Harvard, going back many decades.



Carlson's Orchard – Oak Hill Road
(Courtesy of Carlson's Orchard)

During the first half of the 20th century, agriculture was an important part of Harvard's economy, being a primarily agricultural community. In the 1920s, the Still River could claim to ship more milk to market than any other town in Massachusetts. Decades later in the 1940s, there were more than fifty commercial orchards shipping more apples than any other town in the Commonwealth. Although the prominence of agriculture as the centerpiece of Harvard's economy has declined over the years, it remains an integral component of Harvard's economy, character, and sense of community. Today, agriculture in Harvard is diverse in both scale and form, consisting of commercial farmers and family-owned hobbyists, plant-based and animal-based food production, and is large- and small-scales operations for both commerce and individual sustenance.

To preserve and bolster this important aspect of the community, Harvard established an Agricultural Advisory Commission (AAC) and adopted the Right-to-Farm bylaw in 2006. The Town of Harvard AAC consists of five members appointed by the Select Board, the majority of which must be substantially engaged in the pursuit of agriculture within Harvard, and all members of the Commission must either be residents of the Town, or owners and farmers of agricultural property within the Town. The role of the AAC is to evaluate, promote, enhance, and protect agricultural resources and provide educational resources and technical assistance to the community and its farmers and property owners of agricultural lands.

Recently, the importance of planning for the Town's future agricultural livelihood, resilience, and sustainability has been recognized as an important priority. To that regard multiple studies, and corresponding reports and plans related to preparing for the potential impacts of climate-change on Harvard's agricultural resources, have recently been commissioned by the Town and its AAC. *The Impact of Climate Change on Agriculture* (2019)¹⁰, funded by the Massachusetts Executive Office of Energy and Environmental Affairs (EOEEA), Municipal Vulnerability Preparedness (MVP) program, aimed to assess Harvard's agricultural resources and markets relative to forecasted future changes in climatic conditions, and to develop strategies to respond to potential vulnerabilities, or utilize existing strengths or potential opportunities to increase resiliency. Similarly, a study was conducted by the Montachusett Regional Planning Commission for Harvard's AAC to identify strategies and resources for implementing the Action Items identified within the summary of findings of the 2019 report. The report of that study, *Town of Harvard Agricultural Advisory Commission Study* (2022)¹¹ summarized the mission, duties, and status of the AAC and the Agricultural Climate Action Plan Goals and identified strategies, procedures, and funding sources to implement them. Finally, the *Apple Country Natural Climate Solutions Project Report* (2022)¹², funded by the EOEEA, MVP program.

Communities within the Community

One of Harvard's unique characteristics is the number of religious and sociological experiments that have taken place here. One notable group is the Shakers. They established a community of worshippers and practitioners that flourished from the 1790's

¹⁰ Town of Harvard. (June 2019). *The Impact of Climate Change on Agriculture: Harvard, Massachusetts*.

¹¹ Town of Harvard. (February 2022). *Town of Harvard Agricultural Advisory Commission Study*.

¹² Towns of Harvard, Bolton, and Devens Regional Enterprise Zone. (2022). *Apple Country Natural Climate Solutions Project Report*. <https://climateresilient.wixsite.com/applecountry>

to 1919. At its largest, the Harvard Society of Shakers numbered about 200. They owned hundreds of acres of land, and lived communally as a self-contained community, almost independent of the Town. The land they acquired was considered some of the worst for farming, but the industrious Shakers rerouted watercourses and improved the soil until they could subsist through agriculture. They eventually manufactured simple goods to sell in the outside world. Their product lines included brooms, bottled herbs, applesauce, and packaged garden seeds.

In 1843, a group of Transcendentalists conceived of a communal agricultural experiment that they named Fruitlands. Bronson Alcott, a friend of Ralph Waldo Emerson and Henry David Thoreau, and father of Louisa May Alcott of Little Women fame, led the group. The group intended to become self-sufficient vegetarians who would not use animals at all, even to plow their fields. They purchased a farm overlooking the Nashua River Valley at Prospect Hill. Starting with ten people, including children, the group worked for the summer. They were, however, unable to provide themselves with enough food and supplies to survive the winter, and so ended the experiment.

In the early 1900s, Fiske Warren, a wealthy Bostonian, and follower of Henry George's single tax plan, bought large amounts of land in Town. By 1909, Warren was ready to test the single tax plan in Harvard. He established an enclave called Tahanto, which eventually consisted of a group of trustees, and 50 leaseholders on 748 acres. Leases were for 99 years, and enclave members shared expenses for farming and maintenance, and communally made decisions about the land. The leaseholders paid an annual fee to the trustees, and the trustees paid a single tax on the land as a whole to the Town. The leaseholder could make improvements or construct buildings on the land, and could sell these for their own profit, but they did not own the land. Any increase in value to the land itself went to the enclave. Warren believed that the single tax system would prevent greedy landowners from exploiting the common man. A second enclave called Shakerton was started in 1921 on land that Warren had purchased from the Shakers when their community dissolved. In *A Guide to Nashaway North Central Massachusetts*, authors Marge Darby, Jean McCrosky, and Mildred Chandler say that Fiske Warren at one time owned almost one-third of the land in Harvard. College professors and various professionals leased much of the land for summer residences. Warren's single tax plan theories were never proven, and when he died in 1938, his dreams died with him. His heirs inherited the land, and most of it has been sold.

In 1917 the United States Army established Camp Devens as a temporary Army base. By 1931 over 2,270 acres had been acquired for use as a permanent post, Fort Devens. The surrounding Towns of Lancaster, Ayer, and Shirley also had land taken for this purpose, making the total area of the base approximately 9,289 acres. By the beginning of World War II, the Fort was being used as the reception center for all New England draftees. The population of the Fort had a major impact on the Towns for over 75 years, until its official closing in 1995.

In 1993 the Massachusetts Legislature created the Devens Regional Enterprise Zone (DREZ) (Chapter 498 of the Acts of 1993) now called Devens. In 1994, Harvard, Lancaster, Ayer and Shirley ceded jurisdiction to the Commonwealth for the Devens land within their boundaries. In 1998, a State agency, MassDevelopment, was created, which merged previous governing boards. MassDevelopment has responsibility for the

developing the north and main posts for commercial, recreational and residential use. Section 23 of Chapter 498 requires that the Towns, MassDevelopment and the Devens Enterprise Commission (DEC) work to establish a plan for permanent governance of Devens, with a report to the Governor required “on or before July 1, 2033.

The St. Benedict Centers and Abbey are another distinctive group in the more recent and current history of Harvard. In 1949, Father Leonard Feeney was dismissed from his Jesuit order for his beliefs, and eventually censured from the Roman Catholic Church. In 1958, he and a group of followers established their religious community in Still River, in a beautiful setting overlooking the Nashua River valley with Mt. Wachusett in the distance. Over the years, the group has operated a monastery, convent, school, farm, bakery, religious articles store, and publishing company on over 175 acres of land. At times, they have divided over issues into as many as six legally independent communities. Three currently remain in Harvard. They are the St. Benedict Abbey, the Sisters of St. Benedict, and the Slaves of the Immaculate Heart of Mary. Reconciliation with Rome occurred in 1987 for the Sisters of St. Benedict, in 1993 for St. Benedict Priory when the Abbey was formed, and in 2002 for the Slaves of the Immaculate Heart of Mary. The three factions are legally independent from each other and are independent landowners. Currently, their land is used for growing hay, for a schoolyard, and for places of quiet contemplation and meditation.

Post War Growth

A large growth spurt began when Route 2 opened in 1950 and it continued when I-495 followed in the 1960s; both roads pass through the Town. Between 1945 and 2002, many subdivisions developed in Harvard during this period, particularly in north Harvard. Harvard’s population quintupled.

The 21st Century in the Common Era

The Town of Harvard’s population has been more stable than it was during the post-war growth years. Population growth and demand for property generated by the high performance of the still independent school system has prompted large increases in land values. Changes in shared revenue from the State, combined with higher demands on the educational system have produced substantial tax increases. High land values and constant development pressure, along with increased agricultural competition from other states and countries, is putting pressure on farm and orchard owners, as well as long-term residents to sell their land.

The ecological effects of rising global temperatures and changing climatic conditions and patterns are already being experienced at local levels, and in Harvard, a town with a large agricultural heritage and a commercial producer of orchard fruits, particularly apples – a crop that is especially sensitive to even minor changes in weather patterns, the risks of climate change are a real threat. Recent work and initiatives such as Municipal Vulnerability Planning and Community Resilience Building, Harvard’s Climate Initiative, Apple Country Nature-based Solutions Project, and other similar local efforts are imperative to preserving an important part of Harvard’s and the region’s natural heritage. The protection of forests, wetlands, farmlands (and prime soils), and other important attributes of open space may be the only meaningful solution to achieving resiliency.

C. Population Characteristics

Population and Household Trends

Harvard is home to approximately 5,154 people and 1,849 households (2017-2021 ACS 5-year estimates). Table 3.1 shows that from 1930 to 2000, population growth in Harvard (excluding Devens) consistently outpaced that of Central Massachusetts; however, this trend was reversed between 2000-2010, as the Town's population decreased slightly for the first time since 1930 while the County as a whole grew by over 6%. While Harvard's population grew slightly (1.8%) between 2010 and 2020, Worcester County's population growth increased by 7.4% from the last decade, again exceeding local population growth. Harvard is not alone. Many of the state's developing suburbs that grew quickly for several decades have also experienced a significant slowdown in population growth since 2000.

Table 3.1 - Population Change in Harvard, 1930-2020

| Year | Local Population (Without Devens) | Percent Change | Worcester County Population | Percent Change |
|------------------------------------------------------------------------------------------------|--------------------------------------|-------------------|-----------------------------------|-------------------|
| 1930 | 987 | - | 490,737 | - |
| 1940 | 1,119 | 13.4% | 504,470 | 2.8% |
| 1950 | 1,315 | 17.5% | 546,401 | 8.3% |
| 1960 | 1,840 | 39.9% | 583,228 | 6.7% |
| 1970 | 2,962 | 61.0% | 638,114 | 9.4% |
| 1980 | 3,744 | 26.4% | 646,352 | 1.3% |
| 1990 | 4,662 | 24.5% | 709,705 | 9.8% |
| 2000 | 5,230 | 12.2% | 750,963 | 5.8% |
| 2010 | 5,063 | -3.2% | 798,552 | 6.3% |
| 2020 | 5,154 | 1.8% | 862,111 | 7.4% |
| Source: Harvard Master Plan 2002, Table 2.6; Census 2010, Census 2020 and RKG Associates, Inc. | | | | |

Population Density

Except for small pockets of compact development in the historic villages, Harvard's density is low. At 210 people per sq. mi., its density is much lower than all adjacent towns, with only, Bolton, having less than 300 people per square-mile. While Bolton is the only adjacent town coming close to approximating Harvard's lower population density, its total population (and density), like the other towns, increased substantially compared to Harvard's over the past decade. For example, the population density of Ayer increased from 834.5 people per sq. mi. to 952.7, and Boxborough, a town with similar rural-residential characteristics, increased from 485 people per sq. mi to 534. Harvard's density is limited by water and sewer infrastructure and 1.5-acre minimum lot size throughout town. In the Town Center, which developed prior to the adoption of zoning and now has water and sewer systems, the median lot size of single-family homes, is ½ acre.

Table 3.2 - Population Density 2010 vs. 2020

| Location | | 2010 | | 2020 | |
|----------------------------------------------------------------------------------------------|---------------------|------------|----------------------------------|------------|----------------------------------|
| | Land Area (sq. mi.) | Population | Population Density (per sq. mi.) | Population | Population Density (per sq. mi.) |
| Harvard | 24.6 | 5,063 | 205.8 | 5,154 | 209.5 |
| Ayer | 8.9 | 7,427 | 834.5 | 8,479 | 952.7 |
| Bolton | 20.0 | 4,897 | 244.9 | 5,665 | 283.3 |
| Boxborough | 10.3 | 4,996 | 485.0 | 5,506 | 534.6 |
| Devens* | 26.4 | 6,520 | 247.0 | 6,851 | 259.5 |
| Lancaster | 27.5 | 8,055 | 293.0 | 8,441 | 306.9 |
| Littleton | 16.5 | 8,924 | 541.0 | 10,141 | 614.6 |
| Shirley | 15.9 | 7,211 | 454.0 | 7,431 | 467.4 |
| Stow | 17.3 | 6,590 | 381.0 | 7,174 | 414.7 |
| Source: U.S. Census: Census 2010, Census 2020. (*Devens population includes FMC inmates). | | | | | |

Population Age

Harvard's demographic profile has long differed from that of the Commonwealth and region in terms of distribution by age. School-age children (aged 5-14) have traditionally composed larger shares of Harvard's population and exhibited proportions greater than state averages. However, for the first time since 1980, Harvard's 5-14 age cohort is not above that of the state average. The youngest age cohort <5, which had dropped to almost half of the state average in 2010 has since doubled and is now almost 2% above the state average. This indicates that school aged children (5 to 14) should be similar to the state average over the next 5 to 10 years, however, that is still a change in the past trend which exceeded state percentages for this category. Given that school enrollments began to fall when the 2010 federal census occurred and continued to decline drastically between 2010 and 2021, it is promising that the percentage of residents age 5-14 is projected to stabilize, that portion of the population is still expected to be lower than it had been since 1980 and 2010.

As shown in Table 3.3, in 1980 5.9% of the population was under 5 years; by 2010, it dropped to 3.4% and by 2021 had increased again to 6.8%. The 5-14 age cohort in Harvard decreased from 17.6% (7.5% above the state average) in 2010 to 10.7% (just below the state average) in 2021. Young adults aged 20-24 and 25 to 34 continue to remain well below state averages in Harvard, however, it is promising to note that the 25 to 34 age cohort experienced an increase of almost 6% between 2010 and 2021 bringing it closer to the state average for that age-group. That same age-group had previously experienced a decline of almost 12% between 1980 and 2010. An increase in this age-group is a positive sign toward achieving a more balanced spread of population demographics, especially considering that adults in the 35-54 age-cohort continue to make up 1/3 of the population, and may be, in part, attributed to the fact that Harvard has excellent schools.

Prior to 2010, as the number of householders of child rearing age decreased, the number of "Baby Boom" empty nesters and retirees typically increased in Harvard. For the first time since 1980, the 55-64 age cohort has decreased in Harvard and is below the state average, something that has not happened since 1990. However, those 65 and over increased from 12.7% to 15.5% of Harvard households between 2010 and 2021. This increase is up from 5.6% in 1980. The leading edge of Boomers, those born in 1946, turned 65 in 2011 and 75 in 2021. Data from the 2017-2021 American Community Survey reflects this increase in the 65+ population. The period of time between the 2010 Census and the 2020 Census may have seen the peak of the "Baby Boomer" bubble in Harvard's population demographics. Table 3.3 below represents Harvard's population demographics over time.¹³

¹³ U.S. Census; American Community Survey (ACS) 2017-2021, 5 Year Estimates.

Table 3.3 - Population by Age in Harvard

| | 1980 | | 1990 | | 2000 | | 2010 | | 2021* | |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------|-------|---------|-------|---------|-------|---------|-------|---------|-------|
| Age Cohort | Harvard | State | Harvard | State | Harvard | State | Harvard | State | Harvard | State |
| <5 | 5.9% | 5.6% | 6.5% | 6.9% | 6.5% | 6.3% | 3.4% | 5.6% | 6.8% | 5.1% |
| 5 to 14 | 19.5% | 14.2% | 15.6% | 12.1% | 19.0% | 13.6% | 17.6% | 12.1% | 10.7% | 11.1% |
| 15-19 | 9.5% | 9.4% | 7.2% | 6.8% | 6.4% | 6.5% | 8.4% | 7.1% | 8.2% | 6.7% |
| 20-24 | 4.2% | 16.2% | 4.5% | 8.5% | 2.0% | 6.4% | 2.9% | 7.3% | 2.9% | 7% |
| 25-34 | 15.4% | 16.3% | 9.5% | 18.3% | 5.8% | 14.6% | 3.6% | 12.9% | 9.4% | 14.2% |
| 35-54 | 34.1% | 21.2% | 41.6% | 25.2% | 39.7% | 30.5% | 32.6% | 29.0% | 33.8% | 25.7% |
| 55-64 | 5.6% | 10.6% | 8.0% | 8.6% | 12.2% | 8.6% | 18.8% | 12.3% | 12.5% | 13.7% |
| 65+ | 5.6% | 13.2% | 7.0% | 13.6% | 8.5% | 13.5% | 12.7% | 13.8% | 15.5% | 16.6% |
| Sources: Harvard Master Plan, Table 2.8; Census 2010, and RKG Associates, Inc. *ACS 5-Year (2017-2021) as Census 2020 data was not published at this level yet. | | | | | | | | | | |

Disability

Approximately 5.9% of Harvard's population (approximately 300 people) has some type of disability: a long-lasting physical, mental, or emotional condition that severely limits activities such as walking, dressing, bathing, learning, or remembering. A disability can make it very difficult or impossible for people to leave their home alone or go to work. In Harvard, seniors make up about 70 percent of the total disability population.

Environmental Justice Populations

There are no Environmental Justice populations in Harvard.

Income and Poverty

Harvard has evolved from a rural-agricultural enclave to a prestigious, low-density suburb within the orbit of the Boston and Worcester metro areas. Not surprisingly, the economic position of Harvard households is higher than that of households in most Worcester County towns. Overall, Harvard residents have higher levels of educational attainment and better-paying jobs, and they are more likely to have more wage earners, too. Table 3.4 presents a set of standard wealth indicators for Harvard, Worcester County, and the state. Harvard has remained a town with high household income and high housing values even during the years following the economic recession (2007 to 2009), now known as “The Great Recession”. Despite Harvard’s high median income and housing values, a number of residents do live below the poverty threshold (earning less than \$12,880 for a single individual, \$21,960 for a family of three in 2021). The most recent data from the U.S. Census Bureau estimate that 33 Harvard families (2.2%) lived below the federal poverty threshold in 2021, of those 10 owned their own homes and 23 rented. Of the 182 residents living in poverty, 35 were children under the age of 18, and 36 were adults 60 or older.¹⁴

Table 3.4 - Comparative Economic Indicators

| | Harvard in 2021 | | |
|----------------------------------------------------------------|-----------------|------------------|-----------|
| Indicator | Harvard | Worcester County | State |
| Median Family Income | \$183,906 | \$104,022 | \$112,543 |
| Per Capita Income | \$61,897 | \$41,528 | \$48,617 |
| Median Home Value | \$588,900 | \$314,900 | \$424,700 |
| % Population with College Education or Higher | 63.1% | 38.1% | 45.2% |
| % Management, Business Science and Arts Employment | 68.5% | 44.6% | 49.0% |
| Source: American Community Survey 5-Year Estimates (2017-2021) | | | |

¹⁴ U.S. Census; American Community Survey (ACS) 2017-2021, 5 Year Estimates. In the 2010 Census there was a high incidence of poverty (36.2%) among residents – all male - living in “other living arrangements,” possibly the supportive (transitional) housing for veterans at Devens. (2020 Census data for this same level of analysis is not yet published at the time of this Plan, and hence, a comparison could not be made.)

D. Growth and Development Patterns

Harvard's distinctive personality and the factors affecting the evolution of its character are discussed in a report on Planning for Harvard's Rural Landscape: Case Studies in Historic Conservation¹⁵. The report states that a "key premise is that the experience of Harvard's rural character today" is largely defined by four factors:

1. Traditional settlement patterns of village centers contrasted with open farmland
2. The presence of active agriculture
3. The view from the road
4. Historic resources

A 2006 study, titled Harvard Reconnaissance Report¹⁶ and conducted in conjunction with the Massachusetts Department of Conservation and Recreation, asked residents to identify priority landscapes in the community. Participating Harvard residents "were emphatic that the character of their Town was defined by the whole Town, not by isolated areas", choosing to identify instead "a series of critical concerns related to heritage landscapes and community character". These concerns included the need to preserve Harvard's character as defined by the four factors listed above and added the additional factors listed below:

- The moderation of light pollution at night, "including sky glow, glare, light trespass, light clutter, decreased visibility at night and energy waste".
- The resolution of the future jurisdiction of Devens in the northwest corner of Harvard, that was formerly an Army base.
- The linkage of open space parcels currently owned by a combination of the Town, the Harvard Conservation Trust and private and/or institutional organizations.
- The protection of specific trees "either for their physical characteristics, prominent location or historical associations" and certain species of trees in decline.
- The protection of Harvard's waterways, including the Nashua River, Bowers Brook, Nonacoicus Brook, Bennett's Brook and Bare Hill Pond.

Patterns and Trends

Central Massachusetts' typical pattern of development was that of compact villages organized around 19th century mills, which were then surrounded by farms in outlying areas. Harvard too followed this development model. When, in the middle of the 20th century, farming became uneconomical, many farms were abandoned. The Town slowly became a low-density residential community for people working elsewhere. Its lack of infrastructure and creative zoning helped the Town to retain much of its rural character. This trend accelerated with the enlargement of State Highway 2 and the building of I-495. Although retaining several large apple orchards and a few farms, the Town is today primarily a residential community.

¹⁵ Berg, S.P., and C.W. Dempsey. 1997. Planning for Harvard's Rural Landscape: Case Studies in Historic Conservation. Harvard Rural A Historic Landscape Committee

¹⁶ Mass. Department of Conservation and Recreation, Massachusetts Heritage Landscape Inventory Program: Harvard Reconnaissance Report, 2006.

Harvard's land use pattern still contains fields, orchards, forests, and wetlands, but over time housing and to a lesser extent, commercial and institutional structures have been built on once-vacant land.¹⁷ Single-family homes on large lots are the predominant type of housing found in Harvard. Where other housing types exist, they tend to occur in the villages that developed organically, prior to the adoption of zoning, and mixed-income housing developments approved under Chapter 40B. Harvard has impressive and treasured view sheds with expansive open space, forested hills, wetlands, and scattered homes. However, the number of homes that dot the landscape increases every decade and in all corners of town. Efforts to protect open space through conservation restrictions and land acquisitions have helped to preserve quite a bit of land in Harvard, owing to the efforts of Harvard's Conservation Commission, the Harvard Conservation Trust, and others. Still, many parcels in town, including large farms, could still be developed.

Infrastructure

The Town of Harvard is served directly by Interstate 495, and Routes 2, 110, and 111. Highway travel is the primary method that most residents use for commuting and shopping. Many residents utilize public transportation as part of their daily commute or for other routine or occasional travel needs. Access to the Fitchburg-Boston Line of the Massachusetts Bay Transit Authority (MBTA) commuter rail from Harvard is relatively convenient with stations in the abutting towns of Ayer, Littleton, and Shirley, and nearby South Acton.

Other public service infrastructure include: a public water and public sewer district (closely mirroring each other in a small area near to the Town center), Town Hall, Harvard Fire Department Center Station (Headquarters), Harvard Fire Department Station #2 (Still River Station), Harvard Police Department & Public Safety Building, Harvard Ambulance Service, Harvard Department of Public Works, Harvard Public Library, Wastewater Treatment Plant, Transfer Station, Village Nursery School, Hildreth Elementary School, Hildreth House*, Bromfield School*, Community Solar Gardens photovoltaic arrays, Town Public Wells, Private Community Water Systems (Offices at Harvard Park, The Appleworks, Harvard Plaza), trails and paths, open space lands (parks, playgrounds, forests, conservation lands) electrical grid power lines, roadways, culverts, and drainage.

Pedestrian and Bicycle Accommodations

In 2019, Harvard received a Complete Streets grant for \$370,000 to replace existing substandard sidewalks and add new sidewalks in the Town Center, which features many civic buildings, churches, and schools. The Board worked with the Department of Public Works Director, engineering consultant, The Engineering Company (TEC), and the Select Board to ensure that the final design meets all Complete Streets criteria, enhances safety, and is a workable design that fits the character of the Town Center. Construction of the project was completed in the spring of 2020. The Planning Board is considering future Complete Streets projects to continue developing the pedestrian circulation system and related road improvements in Harvard.

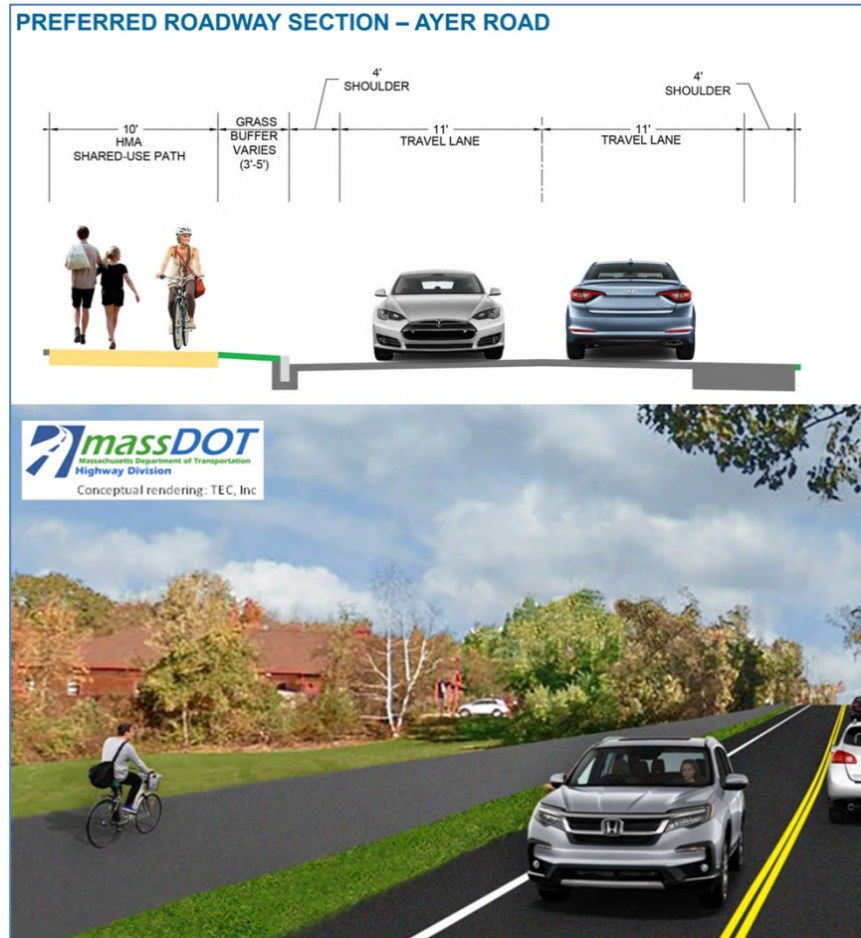
* Emergency Shelter location.

¹⁷ Based on land coverage figures from MassGIS Land Use, 2005.

In its rather large holdings of Federal, state, and local conservation land, numerous hiking trails provide opportunities for residents to enjoy Harvard's outdoor resources. In 2013 MRPC created an inventory of trails in Harvard. Including Devens there are about 70 miles of trails in the inventory. As the Town acquires additional conservation lands over time, the Town should seize opportunities to develop new trails that will connect sites to create longer distance trails and provide links to villages and points of interest in town. It may eventually be possible to create a circumferential trail around Harvard with spokes radiating to popular destinations. To that end, new development guidelines established for the Commercial District along Ayer Road call for connecting properties via paths and sidewalks to make the area more pedestrian-friendly. Currently, sidewalks are non-existent at that location, a highway with high traffic volumes and vehicle speeds, posing a serious risk to pedestrians and cyclists trying to access the areas residential, commercial, or recreational resources. Connecting paths to common destinations, such as Dunkin Donuts and McCurdy Track, should alleviate safety concerns of walkers and bicyclists, especially children. In part to the new development guidelines, and in response to the increasing public safety concerns, recent planning efforts, backed by state and Federal funding and community support, aim to finally accomplish a major first step toward implementing this long-standing and important community need and goal.

Two important shared-use trail and bicycle infrastructure improvement projects are currently in the planning, review, and/or design stages. These two projects could provide the impetus and critical first steps toward achieving the community need and vision for a town-wide trail and pathway network – a vision that has existed since as early as 2005 and which has been expressed in multiple previous iterations of this Plan. The need for a town-wide network of connected trails and pathways that provides non-vehicular access to and from the Town-Center and which connects to existing trails and pathways and Open Space and Recreation lands, including Conservation lands and active and passive recreation areas, has been recognized by the Open Space Committee as well as by several other Town Departments, Boards, Commissions, and Committees for several years in several different plans and reports. It has been a high priority of not only the Open Space and Recreation Plan, but also the Town Center Action Plan (2005), Town Center Transportation Study (2016), and Master Plan (2016). The projects described below have the potential to finally bring that longstanding vision into focus and eventual realization.

The first project, the Ayer Road Reconstruction Project, will include a 10' wide multi-use pedestrian and bicycle path along Route 110/111 (Ayer Road) between Route 2 and the Ayer town-line. The project is currently being designed (2022 - 2023) and constructed (FY 2024) by the Massachusetts Department of Transportation (MassDOT) under the Statewide Transportation Improvement Program (Project No. 609213) with Federal Aid (80%) and State Funds (20%) at a cost of \$10.0 Million.



The other project, Old Mill Road Bicycle Path and connection to Devens (Harvard Transportation Advisory Committee), and Action Item of the 2016 MP, will include a bicycle connection from proposed Ayer Road Shared-Use Path to Devens. The project will include bicycle access along shared-roadway (to be marked with “sharrow” pavement marker symbols) and a multi-use, stone-dust path connecting to existing recreational pathways at Devens via the Railroad underpass at Old Mill Road. It will provide connections to existing pathways at Devens and a connection to the Depot Road Connector Trail via Blanchard Road (to be marked with “sharrow” pavement marker symbols). When viewed in the scope of the greater goal of trail connectivity and the community vision of a community-wide trail network, this will not only be a step in the right direction, but a major leap forward toward achieving the greater goal of a town-wide circular network with connective spokes.

Future expansions of this project have also been proposed including a potential extension via Lancaster Road (utilizing sharrow pavement markers) which would provide access to another important Town recreation area, McCurdy Track and beyond to Poor Farm Road and Oak Hill Road (using sharrow pavement markers and/or separated stone-dust shared-use pathways where feasible or necessary). That extension could then be expanded to create the first half of a loop connecting to Town Center which, along the way, could provide access to several important Open Space & Recreation Areas, including the Harvard Town Forest, Ohlin Trails, Harvard Community Gardens, Coke Trails, and even Carlson Orchard. The loop could then be extended beyond the Town Center along Lovers Lane and Upper Pin Hill Road which would provide access to the Depot Road Fields, Ryan Land Park, Prospect Hill Trails, and back to the Depot Road Connector Trail, thence completing the circular network.

Harvard has been disconnected from Devens since the Army established Fort Devens during WWI, when it closed the vehicular connections to Town. Re-establishing that connection via will result in a convenient commuting link for the 6,000¹⁸ employees and 800 residents currently working and living at Devens. In addition, it will provide a recreation amenity and create better access for Harvard and Devens residents to participate more fully in each other's civic affairs. State and federal funding is frequently available for such projects due to transportation and recreation benefits. Efforts should be made to secure funding for this proposed project and its potential future extensions.

These projects will represent major improvements. Currently, most of Harvard's rural roads do not adequately accommodate bicyclists due to constrained shoulder widths. There is little signage for bicycle routes or for bicycle safety, and the narrow, winding, scenic roads, while enjoyable for bicyclists, create conflicts with motorists. Despite the challenging conditions and lacking accommodations, Harvard's scenic and hilly roads are a destination for bicyclists from Harvard and the surrounding area. While there is limited local demand for off-road bicycle facilities, opportunities to accommodate visiting bicyclists more safely on existing roads could be explored, perhaps by improving shoulders to allow vehicles to pass cyclists safely. Making Harvard more bikeable and creating a circular network of bike- and pedestrian-friendly accommodations and pathways will have to address those challenges and others posed by rural roadways. Achieving such a vision will be a major undertaking requiring thoughtful planning, extensive funding, and continued community support and dedication, however, accomplishing such a goal may be a task worthy of the toil.

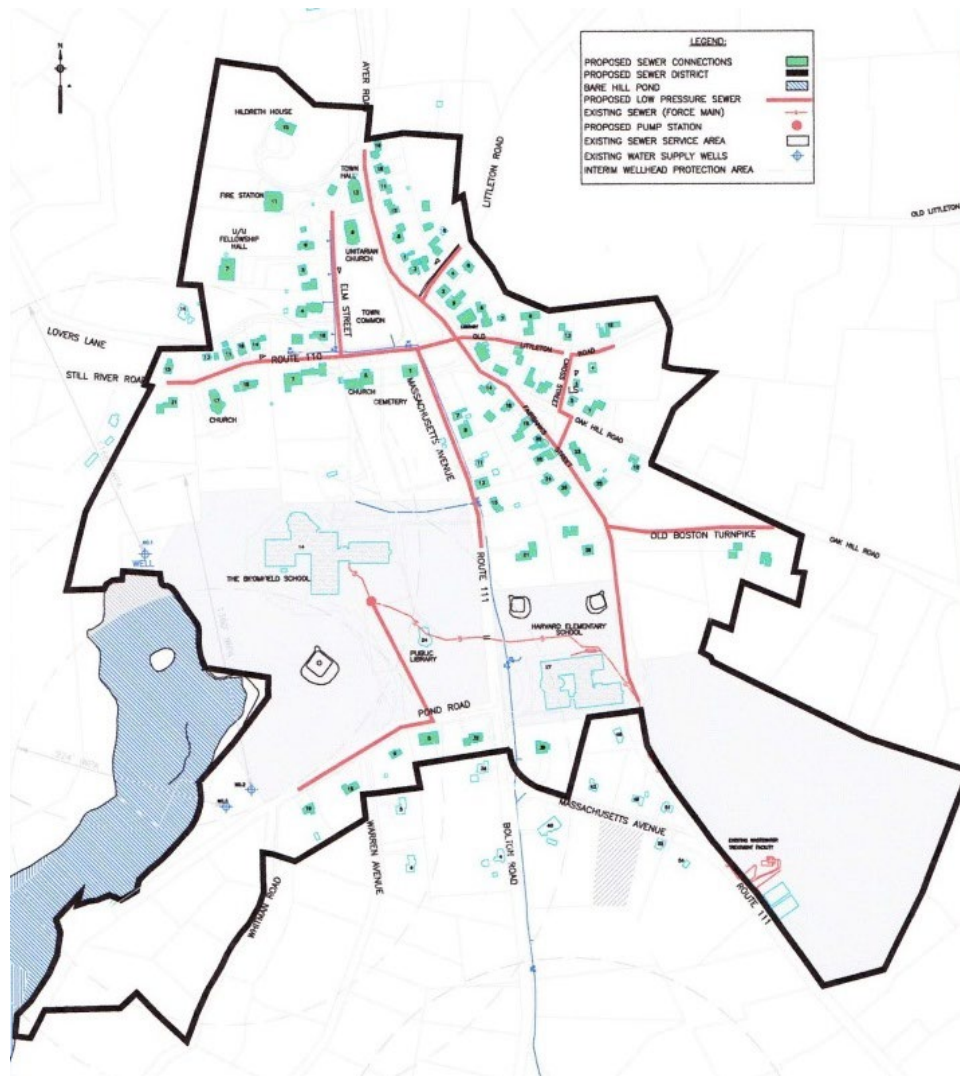
¹⁸ <https://www.massdevelopment.com/assets/pdfs/Devens-Economic-Profile-and-Contribution-062020.pdf>

Town Water Supply

The Water Department provides drinking water to a small service area of properties within the Town Center, consisting of 99 individual water service connections. Water is pumped from two bedrock wells located east of Bare Hill Pond, both drilled to a depth of approximately 500 feet, and delivered to customers through a 13-mile network of recently upgraded water mains. A third well on Bolton Road is available for emergency backup, but it is rarely used, and activating it requires MassDEP approval. Since the actual aquifer recharge area for these wells has not been identified, MassDEP has assigned an Interim Wellhead Protection Area (IWPA) to each well, which varies with the well's pumping rate. In 2016, the Town pumped approximately 7 million gallons per year from the two wells combined. In 2022, the total number of gallons pumped was 6.5 million gallons of water, 500,000 gallons less than in 2016. MassDEP considers both water supplies to be at moderate or high risk of contamination due to their proximity to underground fuel tanks, storage of hazardous materials, lawns, and septic systems. The water system is regulated by an appointed Water and Sewer Commissions, which has authority to set water rates for customers in the Town Center.

Town Sewer System

The Water and Sewer Commissions also oversees a new sewer district that Harvard established with approval from the state Legislature under Chapter 37 of the Acts of 2010. The sewer district (Map 3.1) closely mirrors the water district and includes portions of Ayer Road, Massachusetts Avenue, Elm Street, Pond Street, Still River Road, and Fairbank Street in the Town Center. Its service area is limited to 12 nonresidential properties, 43 multifamily dwelling units, 38 single-family homes, and 8 public buildings. The sewer system has a limited remaining capacity. Its intent was primarily to provide existing uses in the Town Center with reliable treatment and to remove failing septic systems that posed a threat to the municipal wells.



Map 3.3 - Harvard Common Sewer District

Long Term Development Pattern

Harvard's first rudimentary Protective (Zoning) Bylaw was passed at Town Meeting in 1951. In 1970, the Town published its first Master Plan, and its findings and recommendations provided the necessary direction to guide the growth and development of the Town. At that time, a questionnaire was distributed to the inhabitants, who replied emphatically that they wished to keep the rural aspect of the Town. They expressed a strong preference for the conservation of wetlands and other open spaces, a preference for large building lots. They wished that the Town not court commercial development and the resulting traffic, nor did they wish to become a densely settled bedroom community. Subsequent questionnaires have affirmed these positions. Town zoning keeps commercial uses separate from residential and agricultural uses. Industry is no longer permitted.

Over the past seven years, since 2016, Harvard has added 16 single-family homes, 49 condominiums, and 42 senior apartments to its total housing supply.¹⁹ The fact that multi-family condominiums and rental units surpassed the production of single-family homes is not indicative of a long-term trend, for many towns that experienced a shift in demand toward multi-unit dwellings and smaller housing units a decade ago and have since witnessed a reversion to single-family home development. Most multi-family housing in Harvard has developed via the comprehensive permit process, which is why the new condominiums and apartments include low- or moderate-income units. They provide an additional public benefit as well: on average, Harvard's multi-family units occupy just 0.38 acres per unit, compared with the 3.7 acres per unit for single-family homes. Nevertheless, it is worth noting that two-thirds of Harvard's affordable housing units (built with comprehensive permits) are located off Ayer Road north of Route 2, largely but not entirely in areas the Town has zoned for commercial uses.

Table 3.7 shows the change in residential land use acreage between 2012 and 2022 based upon Assessors land use codes. Overall, Harvard grew slowly as the amount of land in residential use increased by 77.7 acres. The largest amount of growth occurred in condominiums; no condominiums existed in 2002, but by 2012 144 acres were in this category and by 2022 this amount increased to 156.83 acres. In Harvard, as in other areas, the market responded to a recent demand for alternatives to detached single family homes, and developments such as Harvard Green and Harvard Common were built under the comprehensive permit process increasing the availability of market rate and affordable condominiums within the Town. Condominium growth out-paced single family home constructions, which gained 67.3 acres during this 10-year stretch.

Table 3.5 - Change in Residential Land Use in Acres

| Use Type | | Acres in 2012 | | Acres in 2022 | Change in Acres |
|-------------------------------------------|--|---------------|--|---------------|-----------------|
| Detached Single Family | | 4,965.0 | | 5,029.7 | 64.7 |
| Multi-Family | | 102.8 | | 59.9 | -42.9 |
| Apartments | | 6.7 | | 22.8 | 16.1 |
| Condominiums | | 114.0 | | 156.8 | 42.8 |
| Multiple Residence | | 190.6 | | 181.9 | -8.7 |
| Mixed Residential-Commercial | | 14.3 | | 20.0 | 5.7 |
| Total | | 5,393.4 | | 5,471.1 | 77.7 |
| Source: Assessor's Parcel Database, 2023, | | | | | |

¹⁹ Harvard Assessor's Parcel Database, 2022

Harvard's first Zoning Bylaw in 1951 established one district for the entire Town. Separate use districts followed in 1965, including Agricultural/Residential (AR), Business (B), Commercial (C), and Industrial (I). Like many environmentally conscious towns, Harvard established a Watershed Protection (W) District in 1968, a few years before the state passed the Wetlands Protection Act (WPA). In 1972, the Town adopted commercial use regulations and abolished the industrial zone. With the current Zoning regulations, the only practical ways to develop multi-family housing in Harvard are with a Chapter 40B comprehensive permit or with the issuance of a Special Permit for a mixed-use development located in a specific vicinity of Ayer Road (Route 110), known as an Ayer Road Village-Special Permit (ARV-SP). Bowers Brook, a 42-unit senior apartment complex on Ayer Road, took advantage of the ARV-SP process. Map A.1 shows the existing zoning districts in Harvard today (2022).

Table 3.6 - Zoning Districts by Area

| District | Acres | Percent |
|-----------------------------------------------|--------|---------|
| Agricultural Residential | 11,753 | 81.7% |
| Business | 3 | .02% |
| Commercial | 346 | 2.4% |
| Watershed Protection and Floodplain | 2,275 | 15.8% |
| Acres subject to Harvard Zoning | 14,378 | 100% |
| Acres in Harvard subject to Devens Reuse Plan | 2,600 | |
| Source: Town of Harvard, GIS zoning map | | |

In recent years, development has largely been a matter of construction of single-family homes on individual lots. Harvard has not had a conventional subdivision in over two decades. Harvard's zoning does allow for backland lots, i.e., lots with reduced frontage but having a large area, and common driveways may serve up to four lots. These techniques have helped to provide alternatives to large subdivisions and have preserved large amounts of open space in private ownership. The Protective (Zoning) Bylaw contains a provision for cluster development, but its current version has only been used just once since its adoption. The Planning Board passed a revised version in late 2023 with the intention of creating more open space set-asides in new residential developments.

Section 4: ENVIRONMENTAL INVENTORY & ANALYSIS

A. Geology, Soils, and Topography

Geology

Harvard's present day geology is primarily the result of the tectonic forces during the Paleozoic era of prehistory, some 230 to 600 million years ago. Toward the end of this period, approximately 250 million years ago, the continental plates of Africa and North America collided. Under the tectonic pressures created by this event, bedrock was compressed and folded upward into the Appalachian Mountains. The formations underlying Harvard today, including the town's hills and ridges, are the eroded remnants of these once towering mountains. An example of this is the ridge line of Oak Hill, continuing northeast to southwest, as described by Old Littleton, Slough and Bolton Roads. The geomorphology of the visible landscape today is also the result of eons of wind and water erosion followed by periodic glaciation, all of which transformed the entire region of New England.

There are three major rock types present in Harvard bedrock: Worcester phyllite, composed of metasedimentary graphitic phyllite, and slate; Ayer granite, an igneous intrusive rock that is more resistant to erosion than other rock types; and the metamorphic Brimfield schist/Nashoba formation which contains primarily gneisses and schist with some limestone deposits embedded. The three major types of bedrock lie in three broad swaths running roughly northeast/southwest across the Town. The southeastern swath is Worcester phyllite, the center swath (including Oak Hill) is resistant Brimfield schist and north of the common is Ayer Granite.

Two pockets of different bedrock are worthy of note. Limestone, a less resistant bedrock of marine origin, underlies the Black Pond area. This explains the depressed topographic elevation and the more basic or "sweet" soil found there. Then, on the sharp southwest-northeast ridge known as Pin Hill, a combination of rocks known as Harvard conglomerate can be found. This conglomerate contains a mixture of phyllite, schist, quartzite, and slate and is dark bluish-gray in color.

The type of underlying bedrock does not generally determine whether or not land in Harvard can be developed. Bedrock can affect the quality of water from wells, however. The water from many wells in Harvard is treated for high levels of iron; other minerals, including arsenic also taint the groundwater in various locations. Also, fractures in the bedrock, which cannot be practicably located, can allow leachate from older (pre-Title V) septic systems to infiltrate groundwater.

Surficial Geology

The surface geology of Harvard is varied, and has more implications for development. Our landscape has been shaped by the forces of continental ice sheets up to a mile thick as they advanced and receded over a period starting nearly a million years ago and ending about 10,000 years ago. The glaciers have left a layer of glacial till, unstratified rocks, and rock particles once suspended in the glacier over most of Harvard's bedrock foundation. (See Map A.8)

Glaciers leave characteristic deposits when they are advancing, stagnated, or receding. Drumlins are formed under advancing glaciers and are mounds of fairly compacted clay, sand, and gravel. More than a dozen of these smooth elongated hills can be seen in Harvard; most visibly when they have been cleared for orchards or pasture. One noticeable drumlin, part of the Williams land on Stow Road, has been preserved as conservation land and is a prime sledding hill in winter. Drumlins are favorable sites for orchards and many are still in agricultural use. The scenic qualities of drumlins, preserved until the present as orchards, combined with their lack of bedrock make them particularly susceptible to development.

Landforms that have resulted from melting or receding glaciers such as kame terraces, kettle ponds, and eskers, are evident in southeast Harvard along the Boxborough line from the Cisco site off Littleton County Road, to the Delaney complex, and in the northeast corner of Harvard at Devens. Unlike the unconsolidated and thin deposits of till typical of most of Harvard, the outwash gravels and sands found on Devens are useful and exploited for construction material. Glacial stream outwash material, which is more rounded and better sorted than glacial till, ranges from 40-feet thick kettles to 100-feet thick deltas. Glacial lake outwash deposits are of similar quality and average 30 feet thick. Some of these formations are found on Devens areas zoned for Open Space and Recreation, but much of the land surface located on the former military base has been modified over the years.

A significant ice age legacy in the area is glacial Lake Nashua. There was once a large glacial lake in the Nashua River valley, resulting from a stage when the glacier's waters melted and were naturally dammed within the valley. The lake level fluctuated as water was alternatively gained and released to create outwash patterns or channels throughout the region. The outwash deposits of sand and gravel store great volumes of groundwater and are classified as aquifers. To the west of Still River may be found the stratified clay lakebed remnants representing variations in lakebed deposition. Such clay deposits are non-permeable, and consequently not suitable for development.

Two other reminders of the glacial period remain visible in Harvard; one is the presence of striae or grooves on exposed bedrock where the glacier's erosive power scratched the rock as it moved over it. These grooves are a good indicator of the direction in which the glacier moved in the area. A more violent effect of the glacier's movement known as plucking may have caused the steeper south and southeast faces of major hills such as Oak Hill and Pin Hill. As the glacier moved up and over these hills, it would "pluck" or loosen huge boulders of the bedrock on the lee side, thus accounting for a steeper, more rugged slope. Steep slopes and areas of bedrock outcropping require special engineering when they are developed.

Soils

Geology and soils are important considerations for development. Bedrock and clay deposits hinder drainage. As a result of bedrock on or near the surface in many areas of Harvard, permanent and seasonal wetlands have developed. The prevalence of bedrock and “tight” or poorly drained soils create problems for the construction of septic systems and leaching fields; so much of Harvard does not lend itself to high-density development.

As mentioned under “Surficial Geology,” concentrations of glacial outwash deposits are found in the northwest and southeast corners of Harvard. These areas of permeable soils are much more easily exploited for development than areas of unstratified glacial till that covers most of Harvard. Both these areas are undergoing intensive development: Devens to the north and Cisco/ Trail Ridge housing development to the southeast. At the same time that the pervious nature of these outwash



Glacial Erratic on Burgess - Brown Land

soils allows for development, it also allows surface water to move into the ground forming important areas of groundwater recharge that are vulnerable to contamination and require protection. Wells on Devens, municipal wells for the Town of Ayer, and high-yield wells to irrigate Shaker Hills golf course tap this major water resource in northern Harvard and neighboring Ayer. Harvard’s second aquifer in the southeast part of Town was expected to supply a proposed housing development on Town land on Stow Road (the “gravel pit”), but at the 2006 Annual Town Meeting the Town voted to reject additional funding of the project, fearing it would be an inappropriate size of this scenic road.

The USDA Natural Resources Conservation Service (formerly the Soil Conservation Service) has mapped the developed areas of Devens as *urban land complex*, having been so modified by development that original soil characteristics are no longer readily identifiable. Devens and the lowlands on the eastern edge of Harvard, have natural soils of the Hinckley-Merrimack-Windsor Association, with very deep, excessively drained soils located on outwash plains. Sandy side slopes adjacent to the many plateaus and developed areas of Devens are prone to erosion, and should be treated with care to minimize erosion. At the other extreme, poorly drained, high organic- and silt-content soils found along the floodplains of the Nashua River and its tributaries are not good areas for development because they cannot support septic systems and the land is subject to flooding. Fortunately, most of the Nashua River floodplain in Harvard is protected as a

National Fish and Wildlife Reserve. The bulk of Harvard is classified as Chatfield-Hollis, moderately deep and shallow upland soils. (See Map A.8).

Topography

Harvard lies on the eastern escarpment of the Worcester Plateau, which is considered to be part of the central New England peneplain or upland physiographic region, and where narrow valleys, steep slopes, low cliffs, and sharp ridges mark the landscape. Harvard's uplands, which rise to a maximum elevation of 620 feet above sea level, afford long views west to Mt. Wachusett, north to New Hampshire's Mt. Monadnock, and east to Boston's skyline. The land falls to the Nashua River Valley to the west and the Assabet River watershed to the east. (See Maps A.2, A.3 & A.8).



Mt. Wachusett from Prospect Hill

B. Landscape Character

The special character of Harvard is defined by the diversity of the landscape, the variations from fields to forest, the hills and valleys, the presence agriculture, past and present, scenic roadways, wetlands and water bodies, and traditional settlement patterns of village centers contrasted with open farmland. It is these aspects of the landscape that define the experience of Harvard's rural character and contribute to the quality of life that Harvard residents cite as their main reason for wanting to live in the Town. This special character is in marked contrast to many nearby Towns that have visibly succumbed to suburban sprawl.

Coming into Harvard from any direction one gets an introduction to the town's overall scenic beauty, agricultural heritage, preserved resources. From the north travelling on Ayer Rd, one sees open fields and views of forested hills and orchards. From the southeast Mass Ave winds its way into town through active orchards, horse farms and wooded hills. From the south along Bolton Rd., one is greeted with small open fields, and views first to the east stretching to Boston, and then to the west to Mount Wachusett. From the west, Route 110 traveling through the quaint village of Still River gives dramatic views of open fields and grand vistas of the entire Nashua River Valley. From the east, along Old Littleton Rd. one really gets a feel for the "Hills of Harvard" as you wind your way up through deep woods speckled with numerous apple and peach orchards. All of these routes into town although main thoroughfares are typically designated "scenic" by those who travel them.

Once in the town center one gets a glimpse of one of the town's major natural landscape features, the Bare Hill Pond section of the Bowers Brook waterway. Bowers Brook runs south to north through town and is a unifying feature in many of Harvard's preserved landscape. The designation of historic districts in the Town Center and in Shaker Village, the acquisition of conservation restrictions, and the purchase of conservation lands that can be seen from the roads have made a significant contribution to the preservation of Harvard's visual resource. Preservation of natural, historic, and scenic resources such as Pin Hill, Holy Hill, Horse Meadows, Black Pond area, the Great Elms/Williams land, Burgess/Brown Farm, Dean's Hill, the Sprague, Barba, Clapp Scorgie Tufts, Luongo, and Willard conservation lands adjacent to Bare Hill Pond and conservation land along sections of Bowers Brook have contributed to the protection of significant landforms and areas of scenic interest. They also provide access to some of the interior areas less well known.



Willard Farm – Still River

"The Massachusetts Landscape Inventory: A Survey of the Commonwealth's Scenic Areas," commissioned by the Department of Environmental Management in 1982, "focuses on the Commonwealth's very best landscapes which make up about 9% of the land area." These landscapes encompass several square miles and transcend Town boundaries. Scenic areas in this report are characterized as being Distinctive, noteworthy, or common. Distinctive refers to those areas of the highest visual quality which make up only about 4% of the State, noteworthy, about 5%, and common, the remaining 91%. Harvard has several areas listed in the distinctive and noteworthy categories in the C2 Upper Nashua Valley-Shrewsbury Ridge Unit. Within this unit in Harvard, Prospect Hill, Still River, Shaker Village, Black Pond, Herman Orchards/Rodriguez/Ohlin conservation lands, sections of Bower's Brook, Horse Meadows, and Oak Hill areas are classified as distinctive. The substantial noteworthy areas stretch from Harvard's eastern boundary with Boxborough through the Center reaching north and west and also encompass the Nashua River area.

The 2006 Harvard Reconnaissance Report, conducted in conjunction with the Massachusetts Department of Conservation and Recreation, defines Heritage Landscapes as those "special places created by human interaction with the natural environment that help define the character of a community and reflect its past." A list of such Heritage Landscapes was generated by local participants at a meeting held May 10, 2006, and incorporated into the report. The landscapes are listed below by land use category, with the disclaimer that there are undoubtedly others.

Agriculture

Arnold Farm
Calkin Farm
Carlson Orchards
Burgess/Brown Farm
Dean's Hill Orchard
Doe Orchards
Double Stone Wall
Endicott Farm
Evans Farm
Firefly Farm
Great Elms Farm
Hazel Farm
Westward Orchards
William Park Farm
Murray Lane Goat Farm
Oak Hill Orchards
Sheehan's Farm
Westward Orchards
Whitney Lane Farm
Willard-Watt Farm
Willard Farm
Williams Farm

Archaeological

Mill
Mill Ruins

Burial Grounds and Cemeteries

Grave by Charlie Brown Farm
Harvard Center Cemetery
Shaker Cemetery
Smallpox Grave

Civic/Village

Harvard Center
Hildreth House
Shaker Village
Still River Village
Town Common
Town Hall

Industrial

Slate Quarry

Location

57 Old Mill Road
146 Littleton County Road
225 Oak Hill Road
Murray Lane
Prospect Hill Road
Ayer Road
Still River Road
44 Littleton County Road
Still River Road
Corner of Brown & E. Bare Hill Road
Stow Road
150 Ayer Road
Littleton County Road
Ayer Road
Murray Lane
Carlson and Westward Orchards
177 Massachusetts Avenue
Oak Hill Road/ Massachusetts Avenue
Whitney Lane
12 Still River Depot Road
Still River Road
61 Stow Road

Location

Sherry Road
Mill Road

Location

Murray Lane
Massachusetts Avenue
South Shaker Road
Poor Farm Road

Location

Harvard Town Center
27 Ayer Road
Shaker Road
Still River Road
Ayer Road
13 Ayer Road

Location

Pin Hill

Institutional

Devens
Fruitlands Museums
Green Eyrie Girl Scout Camp
Harvard Public Library
Holy Hill
Oak Ridge Observatory
Old Public Library
South Village House
Shaker Herb Drying Shed
Shaker Spring House
Shaker Stone Posts
Shaker Whipping Stone
Still River Baptist Church
St Benedict's Abbey Complex

Miscellaneous

Festivals
General Store
Horse Trough

Natural

Dean's Hill
Drumlin
Magnetic Hill
Shrewsbury Ridge

Open Space/Parks

Blomfelt Land
Burgess/Brown Farm
Dolan-Mason Field
Oxbow National Wildlife Refuge
Harvard Park

Residential

Fiske Warren House
Ralph Houghton Garrison House
Old houses (Underground Railroad)
Pollard House

Transportation

Ayer Road – Scenic Gateway
Harvard Depot
Littleton County Road – Scenic Road
Stow Road – Scenic Road

Location

Former Fort Devens
102 Prospect Hill Road
Bare Hill Pond
4 Pond Road
Ann Lees Road
Pinnacle Road
7 Fairbank St.
101 South Shaker Road
Shaker Road
Green Road
Shaker Village
South Shaker Road
215 Still River Road
Still River Road

Location

Harvard Town Center
1 Still River Road (Town Center)
Northeast of Harvard Town Center

Location

Prospect Hill Road
William's Conservation Land, Stow Road
Stow Road at William's Conservation Land
Oak Hill

Location

Ann Lee Road
Murray Lane
Corner of Slough and Woodchuck Hill
Eastern bank of the Nashua River
35 Lancaster County Rd.

Location

42 Bolton Road
204 West Bare Hill Road
39, 74, 90 East Bare Hill Rd
327 Still River Road

Location

South of Route 2
End of Depot Road

Waterbodies

Bare Hill Pond
Bennetts Brook
Black Pond
Bowers Brook
Cold Spring Brook
Golden's Pond
Williams Pond

Location

Access from Pond Road
Shaker Village
Access from Littleton County Road
Bisects Town from Bolton South to Ayer North
Littleton/Harvard Boarder
Old Mill Road
Stow Road

Harvard's scenic beauty in combination with development along Interstate 495 has progressively increased development pressures on the Town and area. The viability of the orchard industry and rising real estate taxes are additional concerns. While many landscapes have been preserved through conservation purchase, APR, and conservation restriction, some orchards and large parcels have been sold and developed. Piecemeal and unplanned development has the potential to erode the existing integrity and quality of Harvard's landscape resources, natural, cultural, and historic, and to compromise wetlands, watersheds, and ponds. The 2016 Master plan outlines strategies to encourage development to be engaged in protecting environmental, scenic, and cultural resources through protective land use policies.



Burgess - Brown Land

C. Water Resources

Harvard's wetlands (see Maps A.2 & A.3) are valued for groundwater recharge, water filtration, flood control, storm damage and pollution prevention, wildlife habitat, and scenic beauty. Activities in wetlands and their 100-foot buffer zones are regulated by the Massachusetts Wetlands Protection Act (MGL Ch. 131, §40), which is administrated locally by the Town's Conservation Commission and by the Department of Environmental Protection (DEP) at the State level. Harvard also has its own wetlands bylaw (the Harvard Wetlands Protection Bylaw, Chapter 119 of the Code of the Town of Harvard), and implementing regulations which strengthen the Act and gives isolated wetlands and vernal pools protection they do not enjoy under State Law. Given the innate natural values of wetlands and their natural connectedness along watercourses, wetlands are prime components of an open space system. Wetlands that are not already part of the Town's conservation lands are priorities for future protection.

Forested wetlands, specifically red maple swamps, intermingled with more open shrub swamps are the most common wetlands in Harvard. Those connected with Bowers Brook include the large wetlands stretching from Bowers Springs to Bare Hill Pond and again at the outflow of Bare Hill Pond through to Depot Road. Equally significant are the Bowers Brook wetlands of the Coke and Ohlin conservation lands and the wetland bounded by Route 2 and Poor Farm Road. Near Shaker Village, the headwaters of Bennett's Brook rise from extensive red maple swamps. The wetlands of Elizabeth Brook and the Delaney area have been noted. Finally, Black Pond off Littleton County Road is surrounded by forested wetlands. This is a special area because the alkaline soils here support plants that do not grow in other parts of Town.

Riparian habitat bordered by scrub-shrub and emergent wetlands is found in Bolton Flats and the Oxbow NWR. The importance of this habitat to threatened wildlife has prompted its State designation as an Area of Critical Environmental Concern (ACEC). This extensive protected riparian system of 12,900 acres includes land in Bolton, Lancaster, Harvard, and Leominster.

A special kind of wetland, the vernal pool, is found throughout the Town. Vernal pools are depressions that hold water for only a portion of the year. Because they dry up in summer, they do not support fish and serve as safe breeding sites for an assortment of specialized creatures including fairy shrimp, several species of salamanders, wood frogs and various turtles. Vernal pools can be as small as a dining table and easily go unnoticed. To date twenty-two vernal pools in Harvard have been State certified and one in the Harvard section of Devens as well. There are a number of additional potential pools identified but not yet documented.

Surface Waters

The hills and ridges of Harvard that offer long views east to Boston, west to Mount Wachusett and north to New Hampshire, also direct water in as many different directions. Water in Harvard flows into three large watersheds that ultimately drain to the Atlantic at Newburyport via the Nashua, Concord, and Merrimack Rivers. Bolton Road and Slough Road follow the ridge that divides two of these watersheds. To the west, water descends to the Nashua River that flows north through Ayer, Groton and Pepperell and on to New Hampshire where it joins the Merrimack. Water on the east side of Bolton Road and Slough Road flows down via Elizabeth Brook to the Delaney wetlands and on through Stow to the Assabet River in Maynard. The Assabet then flows northeast becoming the Concord River and joins the Merrimack in Lowell. The northeast corner of Harvard, including Shaker and South Shaker Road neighborhoods, drains to Stony Brook, which travels northeast through Littleton and Westford to Chelmsford where it empties into the Merrimack. The land bordering Littleton County Road also drains directly to the Merrimack.

As the home of headwaters to streams that carry water through a good portion of northeastern Massachusetts, Harvard is blessed with relatively high-quality surface waters and a responsibility to protect these headwaters.

Within the Nashua River watershed, Harvard's major stream, Bowers Brook, flows across the length of Harvard from south to north. It rises in the two ponds at Bowers Springs Conservation Area straddling Bolton and Harvard. From there it threads in several channels through an extensive area of red maple swamp and hummocked shrub swamp before it flows into the south end of Bare Hill Pond.



Bower's Brook

Bare Hill Pond is one of Harvard's primary visual, recreational, and natural resources. A natural lake has existed on the site since the retreat of the glacier at the close of the last Ice Age. During colonial times, the pond was only about 200 acres in size. In 1838, a dam was built that flooded the surrounding pasturelands and increased its size to 300 acres. Bare Hill Pond averages about 10 feet in depth. The original 200-acre pond forms a deeper basin with an average depth of 13 feet, while the 121 acres of flooded flats average only 4.5 feet. Soundings made in August 1977 show the deepest part of the pond to be 24 feet, at a point west of Whitney's Island. Bare Hill Pond is designated by the Commonwealth as a "Great Pond," which gives the general public access to its waters for fishing and boating.

In the late 1990's Bare Hill Pond was designated as endangered by the Massachusetts Department of Environmental Protection due to excessive phosphorous levels (0.44 mg/l) and invasive aquatic species. This made the Pond eligible for Section 319 watershed protection funding and the Town's Bare Hill Pond Watershed Management Committee under the regulatory supervision of the Town's Conservation Commission used grant funding to protect and restore the Pond and its watershed by carefully conducting winter draw downs and installing storm water controls in Town Center and along Pond Road. The result was a significant reduction in phosphorous to below the endangerment level (0.30 mg/l) and in invasive milfoil, fanwort and water chestnut (the latter by repetitive harvesting), and a restoration of numerous native aquatic plant species. Annual monitoring of the watershed is used to determine the need for continued intervention to protect the Pond.

The risk to Bare Hill Pond has increased in the past few years as a result of increasing temperatures and less regular rainfall due to climate change. Like many other lakes and ponds in Massachusetts, these changing conditions increase the likelihood of lower oxygen levels that stress the ecosystem and alter the biology of the water column. When temperatures rise, dissolved oxygen declines at lower depths and anaerobic organisms release bound phosphorous from the sediment on the bottom of the Pond. This results in a significant risk of cyanobacteria algal blooms. In 2020 and 2021, Bare Hill Pond experienced algal blooms. Measures such as the draw down in the winter are being evaluated as means to increase the resiliency of Bare Hill Pond to climate effects by reducing the baseline levels of phosphorous in the water column.

The pond has three beaches, one located along the northern shore at the Green Eyrie Girl Scout Camp, and Town-owned beaches off Pond Road and Warren Avenue. Public access to all three beaches is restricted, but the general public can launch boats at the Town beach and gain pond access through Harvard conservation land. Recreational activities on the pond include swimming, boating, sailing, canoeing, kayaking, rowing, fishing, water skiing, ice-skating, and ice fishing. Residents heavily use the Town beach in summer months; it is the center of recreational and social activity for families with young children. A beach program that includes lifeguard training and staffing, swimming, and boating lessons operates under the aegis of Harvard's Park and Recreation Commission.

The State is also considering designated additional forest surrounding Bare Hill Pond for protection under the Natural Heritage and Endangered Species Program. The forested areas adjacent to the Town Beach abut existing protected areas, provide important wildlife connection corridors, and provide important water filtration and habitat in the Bare Hill Pond Watershed.



Town Beach

Flowing out of the north end of Bare Hill Pond through the dam and spillway, Bowers Brook enters another extensive hummocked shrub and red maple swamp. Water flows through a culvert under Route 110, which bisects the swamp, and continues past the transfer station, under Depot Road to a series of millponds. The brook then passes under Ayer Road where it is released again to spread into a broad marsh bounded by apple orchards to the west and cornfields to the east. Here the brook is dammed by beavers before it passes through more forested land, travels under Route 2 into another wide marsh and red maple swamp below Poor Farm Road, then back under Ayer Road heading north until it is joined by Cold Spring Brook just before the Ayer town line. Cold Spring Brook rises in a wetland north of Mirror Lake in Devens and meets Bowers Brook just east of Barnum Gate to Devens. A chain of ponds surrounded by heavy development in Ayer drain into Bowers Brook, after which the stream changes its name to Nonacoicus Brook, receives Willow Brook and discharges into the Nashua River. All told, the stream has traversed 30 miles from its origin at Bower Springs.

Bowers Brook is classified by the State as a Class B water body (swimmable and fishable). While it originates in protected and undeveloped land, the numerous ponds and impoundments along its course degrade its water quality, contributing to low dissolved oxygen content in particular. Studies are being considered that will improve the culverts along Bowers Brook to allow for less impoundment and improved stream flow.

Bowers Brook directly north of Bare Hill Pond is considered to be a Natural Heritage and Endangered Species Program (MA NHESP) BioMap 3 core habitat. The Bare Hill Pond area is considered Local Aquatic Habitat. As of August 2021, MA NHESP has identified seven State-designated Priority Habitat areas within Harvard and the Harvard section of Devens as well. Due to reporting requirements Harvard has lost two areas previously designated as Priority Habitat since 2008, including those associated with Bower's Brook.

The main stem Nashua River starts in Lancaster at the confluence of the North and South Nashua Rivers and with the Still River running parallel to it on the east forms a broad alluvial bottomland. Nearly 1,000 acres of this floodplain are protected as Bolton Flats Wildlife Management Area (WMA), an important feeding site for migratory waterfowl. The northern tip of Bolton Flats lies within Harvard where the Still River joins the Nashua. From here, the Nashua meanders north, describing the western boundary of Harvard. The floodplain here is broad and flat, owing to its ancient history as the lake bottom of glacial Lake Nashua. Like today's tributaries to the Nashua, Lake Nashua flowed southeast toward Worcester. When the lake finally drained at the end of the last Ice Age, outwash stopped its southward flow and the river drained north, accounting for the odd pattern in this watershed of tributaries flowing in one direction, then turning 160 degrees to join the main stem river flowing in the opposite direction. These sharp turns slow the current in the main stem river and make the water more susceptible to oxygen depletion from pollution.

The newly augmented Oxbow National Wildlife Refuge (NFW) protects a total of 1,547 acres of river bottom and floodplain with its vernal pools and special plant communities of alluvial red maple swamp, small river floodplain, and bogs. Public access to the refuge including a canoe launch is maintained at the refuge entrance on Still River Depot Road. Much of the Oxbow NWR and Devens South Post constitute a state-designated MA NHESP Rare Wetlands Wildlife site. This whole area plus Bolton Flats WMA represents such a large, relatively undisturbed haven for wildlife that it is identified as a core habitat area by MA NHESP BioMap.

The MassDEP's *Nashua River Watershed 2003 Water Quality Assessment Report* lists the 14.2-mile reach of Nashua River Main Stem from the confluence of the North Nashua River to the confluence with the Squannacook River in Shirley as impaired for primary contact (swimming), and as alert status for secondary contact uses (boating), primarily due to wet weather discharges. NRWA data confirms impairments with regard to E.coli bacteria after rainstorms, and recommends swimmers wait three days after a rainstorm to swim in the river. The *Massachusetts Integrated List of Waters, November 2021* (a listing of the conditions of MA waters) lists the reach as impaired due to excessive nutrients, biology, and sediments. The city of Fitchburg has worked to eliminate combined sewer overflows to the river, and improvements in nutrient removal at wastewater treatment plants has provided continued improvements to water quality.

The southeast quadrant of Harvard lies in the Sudbury/Assabet/ Concord River watershed. Suburban sprawl had made the Assabet one of the most degraded rivers in the State, but installation of sewage treatment plants has helped to improve its water quality. In the 1950s, the Army Corps of Engineers impounded wetlands on the border of Harvard and Stow for purposes of flood control in the Assabet and Concord River basins. The Division of Fisheries and Wildlife manage the dams and surrounding 560 acres of land for wildlife management, hunting, and recreation. Delaney Dam has created a 103-acre pond complex; a smaller dam maintains a large marsh on Great Brook; and a third dam allows the management of roughly 60 acres of marsh along Assabet Brook. The Delaney attracts an especially large number of bird species due to the varied habitats and nesting and migrating waterfowl use the open water and the marshes. The entire Delaney Wildlife Management Area is designated a MA NHESP 2021 Priority Habitat of State Listed Rare Species and Established Habitat of Rare Wildlife, as well as the portion north of Finn Road

is designated a “Habitat of Potential Regional or Statewide Importance” under the Massachusetts Endangered Species Act. The Delaney is heavily used by the public from a parking lot and boat ramp off Harvard Road in Stow.

The streams that feed the Delaney complex (the headwaters of the Assabet) include a tributary of Great Brook that drains Brown Road and several branches of Elizabeth Brook. The main branch of Elizabeth Brook rises in a large wetland called Horse Meadows that lies between Littleton County Road and Sherry Road, and then flows south between Codman Hill Road and Interstate 495 until it meets its tributaries at the intersection of Stow Road. One of these tributaries rises in wetlands near the Westward Orchards farm stand on Massachusetts Avenue, flows through the Williams land, down along Stow Road below Great Elms where it is joined by another stream that drains the land along Slough Road. Another tributary is the swamp that stretches along the west side of Interstate 495 where the highway passes through Harvard. All of these watercourses meet and fan out in a wetland complex at the intersection of Stow Road and Codman Hill Road. Interstate 495 and Stow Road bisect this complex and constrict flow to culverts that conduct water to the Delaney wetlands. Early spring runoff swells Elizabeth Brook and its tributaries to the point that periodically water floods over Stow Road. Water quality of Elizabeth Brook is good, but the high gradient and volume of spring runoff carry sediments downstream to settle out in slower reaches.

The northeast corner of Harvard lies in the Merrimack watershed. Bennetts Brook drains many acres of forested wetlands favored by beavers along Shaker Road, then flows north through historic Shaker Village, crossing into Ayer as Stony Brook and on to Forge Pond in Littleton. The low density of residential development and forested canopy protect water quality in these headwaters.

Flood Hazard Areas

Definition of the major floodplain and floodway areas are contained in the Flood Boundary and Floodway Maps of the National Flood Insurance Program for the Town of Harvard. These maps are published by the Federal Emergency Management Agency (FEMA), and are dated July 4, 2011. These indicate areas subject to 100- and 500-year floods within the Town. The Massachusetts Wetlands Protection Act includes jurisdiction over the 100-year floodplain and the Massachusetts Rivers Protection Act includes jurisdiction over lands adjacent to perennial streams and rivers to protect important buffer zones. The FIRM maps for Harvard identify the 100- and 500-year floodplains in connection with the following water courses:

- Nashua River
- Willow Brook (draining Robbins Pond in Devens)
- Bowers Brook and its tributary, Cold Springs Brook
- Bennetts Brook
- Elizabeth Brook
- Black Pond Brook

Floods in Harvard, associated with heavy rainfall, snowmelt, and tropical storms have resulted in localized damage. Fully functioning wetlands can absorb tremendous volumes of water and mediate the effects of floods. This is one reason to protect wetlands and their 100-foot buffer zones from development. Fortunately, the largest watercourse in Harvard, the Nashua River is bounded by protected open space, so that floodwaters do not do great damage to human activities other than agricultural fields. The streams in Town are also well endowed with associated wetlands that function faithfully to absorb floodwaters; these require protection to continue to perform this service during flooding. Town zoning districts delineated in the Town of Harvard Protective Bylaw prohibit building for human occupancy and sewage disposal systems in wetlands and lands subject to flooding.

Aquifer Recharge Areas

Two pockets of sandy glacial outwash are underlain by groundwater aquifers in Harvard. One extends under the eastern portion of Devens in a lobe from the millponds in Ayer down to Mirror Lake. Within this vast medium-yield aquifer is a large high-yield core. This valuable natural resource is vulnerable to contamination because of its porous soils plus past military and current commercial/industrial land use. According to the 2001 Communities Connected by Water study, groundwater quality monitoring has shown minimal contamination to this aquifer. The Devens Water Protection Report, 1994, cites the existence of four high-capacity wells that can supply the full build out needs of Devens. A second medium-yield aquifer lies under the Delaney Wildlife Management Area with a high-yield pocket straddling the Harvard-Boxborough line at Codman Hill and Stow Roads. Neither aquifer is tapped by public supply wells in Harvard. (See Maps A.2 & A.3).

Harvard has no water supply reservoirs, but does have Town wells that supply waters to the public schools and buildings in the Town Center. The two primary Town wells are off Pond Road. An emergency backup well on Bolton Road produces water high in iron and manganese. In the 2016 review of the Town's water assets the Water System Study Committee (WSSC) examined the current challenges to the security of the Town's system and recommends responses to stabilize water resources. WSSC believed that by shielding and preserving available wells the Town could continue to pump from both wells and maintain a safe and quality water supply. The WSSC activated for another source to diversify the Town's well recharge locations and contamination risk exposure. These efforts would provide the Town with a water supply with the best available security and quality at the most affordable cost possible¹. In 2023 the Town voted to expend \$4,850,000 for the design and construction of a water main and booster station to provide a permanent water connection with Devens to supply water to the Town.

The majority of residents in Harvard rely on private wells for home use. These wells average 125 to 500 feet in depth. However, a number of shallow wells do exist. Groundwater from private wells are sampled on a regular basis, primarily related to real estate transfer. The water in Harvard is generally found to be of good quality. Naturally occurring health hazards, arsenic and radon, have been found in some areas. Some wells contain slightly elevated levels of fertilizers in the Still River area. The well at the Highway Department had very high concentrations of sodium and chloride when sampled in 1986. Recent sampling for the emerging contaminant PFAS has identified some impacted wells in the northwest area of Harvard adjacent to the Former Ft. Devens. Other isolated wells across Harvard have shown evidence of PFAS.

The Board of Health is responsible for private well water quality and has regulations in place to protect the residents of Harvard. These regulations include the sampling of wells at the time of well construction and real estate transfer. MA Title 5 regulates septic systems and is enforced by the Board of Health to further protect water quality. The coexistence of septic systems and wells on every house lot makes the quality of septic systems of direct importance to public health.

D. Vegetation

Harvard, located at 42° 30' North latitude and 71° 35' West longitude, is situated in a physiographic region that is referred to as the central uplands. The ecoregion is the Gulf of Maine Coastal Plain. Harvard's forest geography is the result of the interaction of environmental factors such as climate, hydrology, soil type, and topography. The forest vegetation zone is the transition hardwood/hemlock/white pine where the oak-hickory forests of more southerly regions mix with more northern species such as yellow birch, black birch, sugar maple, and beech.

The forests have not been static over time. Forests of today are distinctly different from the pre-settlement forests as a result of over three hundred years of human activities and changing land use. In many instances, forest compositional trends can be tied to prior land use. Harvard's forests also reflect a history of natural disturbance such as hurricanes and natural and introduced pests and pathogens such as chestnut blight and Dutch elm disease.



Maidenhair Fern

Harvard's landscape of ridges, hills and valleys in combination with the Town's forests, meadows, orchards, ponds, streams, wetlands, and vernal pools provide a variety of habitats which support a diversity of trees, under-story trees, shrubs, and a diverse ground cover-mosaic of woody species, wildflowers, ferns, clubmosses, grasses, sedges, and rushes. General plant communities in Harvard include the oak forest hilltop, mid- and low-slope, mixed mesophytic forest, post agricultural, marsh, wet meadow, shrub swamp, wooded swamp, bog, rock ravine, stream bank, field, and meadow.

Specific natural communities as defined in *Classification of Natural Communities of Massachusetts, March 2020*, include: white pine-oak; oak-hemlock-white pine, successional white pine, mixed oak, oak-hickory, dry, rich acidic oak forests, northern hardwoods-hemlock-white pine, successional northern hardwoods forests, red maple swamp, hemlock ravine community and a variety of palustrine communities such as red maple swamp, deep and shallow emergent marsh, shrub swamp, and woodland vernal pool. Uncommon natural communities in the Oxbow/Bolton Flats area and Devens South Post as documented in *Focus Areas for Wildlife Habitat Protection in the Nashua River Watershed* include Pitch Pine/Scrub Oak Barrens, Alluvial red maple swamp, small river floodplains, and bogs.

Detailed inventories and surveys of plants have been conducted in three areas: Devens (published 1995 in *Rhodora*), the Oxbow National Wildlife Refuge (managed by the U.S. Fish and Wildlife Service), and Fruitlands Museums (*Ecological Inventory and Conservation Management Plan for the Fruitlands Museum in Harvard, Mass.*) Devens and Oxbow include area beyond Harvard's boundaries; Fruitlands is entirely within the Town.



Red Trillium

Table 4.1 - Uncommon Plants Found in Harvard

| Scientific Name | Common Name |
|------------------------------|-------------------------|
| Acer pensylvanicum | Striped maple |
| Actea pachypoda | White Baneberry |
| Adiantum pedatum | Maidenhair fern |
| Aquilegia canadensis | Canadian columbine |
| Aralia nudicaulis | Bristly sarsaparilla |
| Arctostaphylos uva-ursi | Bearberry |
| Asplenium platyneuron | Ebony spleenwort |
| Ceanothus americanus | New Jersey Tea |
| Clintonia borealis | Clintonia |
| Cornus florida | Flowering dogwood |
| Cystopteris fragilis | Fragile fern |
| Epigaea repens | Mayflower |
| Fraxinus nigra | Black ash |
| Gentiana clausa | Bottle gentian |
| Hepatica nobilis var. obtusa | Round-lobed Hepatica |
| Lobelia cardinalis | Cardinal flower |
| Lupinus perennis | Wild lupine |
| Matteuccia struthiopteris | Ostrich fern |
| Orobanch uniflora | One-flowered cancerroot |
| Panax trifolium | Dwarf ginseng |
| Polygala sanguinea | Milkwort |
| Rhus vernix | Poison sumac |
| Sanguinaria canadensis | Bloodroot |
| Saxifraga virginensis | Early saxifrage |
| Trillium erectum | Red trillium |
| Vaccinium macrocarpon | Cranberry |
| Viola conspersa | Dog violet |
| Viola pedata | Bird's-foot violet |

Table 4.2 - State-listed species documented in Harvard as listed by the Natural Heritage and Endangered Species Program (NHESP) 2021

| Scientific Name | Common Name | Taxonomic Group | Status |
|-----------------------------------------------|---------------------|------------------------|---------------|
| <i>Alnus viridis</i> ssp. <i>crispa</i> | Mountain Alder | Vascular Plant | SC |
| <i>Amelanchier sanguinea</i> | Round-leaf Shadbush | Vascular Plant | SC |
| <i>Carex typhina</i> | Cat-tail Sedge | Vascular Plant | T |
| <i>Eleocharis ovata</i> | Ovate Spike-sedge | Vascular Plant | E |
| <i>Lygodium palmatum</i> | Climbing Fern | Vascular Plant | SC |
| <i>Nabalus serpentarius</i> | Lion's Foot | Vascular Plant | E |
| <i>Ophioglossum pusillum</i> | Adder's-tongue Fern | Vascular Plant | T |
| <i>Platanthera flava</i> var. <i>herbiola</i> | Pale Green Orchis | Vascular Plant | T |
| <i>Sparganium natans</i> | Small Bur-reed | Vascular Plant | E |
| <i>Veronicastrum virginicum</i> | Culver's-root | Vascular Plant | T |

SC-Special Concern, E-Endangered, T- Threatened

Table 4.3 - State-listed species documented in the Oxbow National Wildlife Refuge

| Scientific Name | Common Name | Status |
|--------------------------|--------------------------|---------------|
| <i>Eleocharis ovata</i> | Ovate Spike Sedge | SE |
| <i>Liatris borealis</i> | New England Blazing Star | SC |
| <i>Lygodium palmatum</i> | Climbing Fern | SC |
| <i>Sparganium natans</i> | Small Bur-reed | SE |

SE-State Endangered, SC-State Concern, ST-State Threatened, WL-Watch List

Shade Trees

The volunteer Elm Commission was created by the Town of Harvard in the early 1970s when it became apparent that the many old majestic elms that defined the town center Common and other public lands were threatened by Dutch Elm Disease. A robust fungicide injection and a pruning program saved over 40 old elms, located primarily in the Harvard Town Corridor (Pond Road north to Harvard Park and west to Prospect Hill).

Sixteen years ago, the Elm Commission, working jointly with the elected Tree Warden, developed a program of independent professional care which changed yearly treatment to rotating fungicide injections every three years and moved toward planting diversified shade tree species—including disease resistant elms. While many of the old elms live on, their maintenance is costly, so the Elm Commission has prioritized care of 16 of the original inventory. No fungicide injections are performed on new plantings.

The ongoing activities of the Harvard Elm Commission include tree planting, watering, giving nutrient supplements, pruning, managing fungicide injections, fundraising, and coordinating a yearly first grade tree planting event, with gift trees to each student and teacher. The Elm Commission's budget was combined with the Tree Warden's budget and an annual newsletter was established, with the aim of raising funds exclusively for town tree care, watering and planting. The Elm Commission and Tree Warden have worked with other stakeholders in Harvard to select and locate new tree plantings. Large projects such as local school and library renovations have prompted the planting of a host of diversified tree species. In addition, the volunteer Elm Commission has planted over 80 trees in the Town Corridor. The table below shows the diversified species set, quantities and survival rates for trees planted in the last approximately 16 years, as of November 2016.

Outside of the Town Corridor, Harvard is characterized by a predominant forest cover typical of that in central Massachusetts. In addition to plant invasive species, of special concern for our native forest are the invasive characteristics of the Norway Maple. The Town abides by the Massachusetts General Laws, Chapter 87 as it pertains to shade trees. In addition, Harvard's Scenic Road by-law protects trees along all non-arterial roads.



Disease Resistant Elms (foreground) and Mature Elms (background) in front of Old Bromfield

Table 4.4 – Shade Trees Planted in the Town Corridor

| Common Name | Planted | Surviving | Survival Rate |
|--------------------------------------|------------|------------|---------------|
| Town Corridor | | | |
| Princeton Disease Resistant (DR) Elm | 10 | 9 | 90% |
| Accolade DR Elm | 3 | 3 | 100% |
| New Harmony DR Elm | 3 | 0 | 0% |
| Washington DR Elm | 3 | 2 | 67% |
| Liberty DR Elm | 3 | 2 | 67% |
| Patriot DR Elm | 1 | 1 | 100% |
| Horse Chestnut | 2 | 2 | 100% |
| Tulip | 3 | 1 | 33% |
| Red Maple | 7 | 7 | 100% |
| Green Mt. Sugar Maple | 20 | 18 | 90% |
| Armstrong Sugar Maple | 3 | 3 | 100% |
| Crabapple (golden raindrops) | 3 | 3 | 100% |
| Crabapple (donald wyman) | 3 | 3 | 100% |
| Hawthorn (Winter King Green) | 3 | 3 | 100% |
| Red Oak | 7 | 6 | 86% |
| Scarlet Oak | 4 | 2 | 50% |
| Pin Oak | 3 | 3 | 100% |
| White Oak | 3 | 1 | 33% |
| Burr Oak | 1 | 1 | 100% |
| London Plain | 2 | 2 | 100% |
| Ginko | 3 | 3 | 100% |
| Dawn Redwood | 2 | 0 | 0% |
| Magnolia | 1 | 0 | 0% |
| Valley Forge | 2 | 2 | 100% |
| Cherry | 2 | 1 | 50% |
| Pear | 2 | 2 | 100% |
| Spruce / Fir | 6 | 5 | 83% |
| Columnar Oak | 10 | 6 | 60% |
| American Hornbeam | 3 | 3 | 100% |
| Sweetgum | 1 | 1 | 100% |
| Little Leaf Linden | 1 | 1 | 100% |
| Harvard Park | | | |
| Sugar Maple | 2 | 2 | 100% |
| Red Leafed Maple | 2 | 2 | 100% |
| Cedar /Arborvitae | 5 | 5 | 100% |
| Kousa Dogwood | 3 | 3 | 100% |
| TOTAL | 132 | 108 | 82% |
| HES New Plantings | | | |
| River Birch | 3 | 3 | 100% |
| Honey Locust | 10 | 10 | 100% |
| White Oak | 5 | 5 | 100% |
| Black Tupelo | 6 | 6 | 100% |
| Red / Sugar Maple | 15 | 15 | 100% |
| Tulip Tree | 1 | 1 | 100% |
| White Fir | 7 | 7 | 100% |
| TOTAL | 47 | 47 | 100% |
| Grand TOTAL | 179 | 155 | 87% |

E. Fisheries and Wildlife

Harvard's diverse vegetative communities provide habitat for a variety of wildlife species. Some key features in Harvard are wetlands and transition zones, streams, ridges and ledges, undeveloped land, sheltered south-facing slopes, north-facing cool, damp slopes, margins of orchards, and variety of habitat diversity in contiguous areas. In recent years, these features have been impacted by drought conditions leading to loss of some habitat that depends on higher levels of rainfall.

Besides the usual squirrels, chipmunks, mice, moles and other small mammals, species found throughout Harvard include fisher, raccoon, skunk, red fox, river otter, mink, ermine, coyote and deer. Deer populations are slightly above to above average in our area, according to state biologists. In response to the threats to the natural vegetation the Conservation Commission formed the Deer Management Subcommittee. Bobcat and black bear have been documented a number of times in recent years at various locations in Town. Bears have been particularly attracted to bird feeders and bee hives. There are also reports of moose (Oxbow and Black Pond/Vesenka area) track or sign.

There is a predictable array of New England nesting birds in Harvard and the combination of unusual habitats provides for a variety of birds. An example of this variety is documented in "The Ecological Inventory and Conservation Management Plan for the Fruitlands Museums" which lists fifty species counted on the property during eight dates in June and July of 1999. The Nashua River Watershed is named an Important Bird Area by Mass Audubon and both federally and state listed bird species have been documented there. There are many migrating waterfowl and birds that pass-through Harvard. Some excellent birding spots are Oxbow, Delaney, Bolton Flats, Black Pond, Bowers Brook, Bare Hill Pond, and the adjacent conservation lands.

Bare Hill Pond, Bowers Brook, and the Nashua River together with the many streams and small ponds in Harvard provide habitat for many species of aquatic wildlife. Bare Hill Pond has an excellent fish population and samplings have discovered largemouth and small mouth bass, chain pickerel, brown bullhead, bluegill, pumpkinseed, white perch, yellow perch, golden shiners and black crappie. Bare Hill Pond is also home to frogs, painted turtles, snapping turtles, black water snakes, native mussels and crayfish. For the past three years, Bare Hill Pond has provided a home to a bald eagle pair that has raised a young eagle each year. The nest can be observed on the East side of Sheep Island. The sustainability of eagles along with Blue Herons, which are predator species for the fish and amphibians, indicates improvement in the habitat.



Blue Spotted Salamander – Oxbow NWR
(Courtesy of Tom Murray)

Vernal pools are temporary bodies of fresh water and provide crucial habitat to several vertebrate and many invertebrate species. Vernal pools contain many obligate species, organisms that are unable to complete their life cycles without this habitat. Vernal pools are also an important habitat resource for many birds, mammals, reptiles, and amphibians, including many State-listed rare species. The marbled salamander (*Ambystoma opacum*) and the blue-spotted salamander (*Ambystoma laterale*), both threatened species, are obligate species of vernal pools that have been documented to occur in Harvard. Certification is one of the best ways to protect vernal pools. There are currently 23 vernal pools in Harvard certified with the Natural Heritage and Endangered Species (NHESP) program. With this in mind the Conservation Commission revised the Wetland Protection Bylaw in 2006 to include the protection of vernal pools and a 200-foot buffer zone around those pools. Since many species that breed in vernal pools migrate several hundred yards into the upland it is important that the upland habitats surrounding these pools be equally protected.

Detailed inventories and surveys of wildlife have been conducted in several areas of Harvard, notably for the Oxbow National Wildlife Refuge and for Fruitlands Museum. A species list for the Oxbow NWR is available through the U.S. Fish and Wildlife Service in the Eastern Massachusetts NWR Complex office in Sudbury, MA. which manages the Refuge. The "Biodiversity Days" sponsored by the Friends of the Oxbow National Wildlife Refuge in 2000 identified over 850 individual species of plants and animals. A list of mammals, birds, invertebrates, reptiles and amphibians for Fruitlands Museums is included in the "Ecological Inventory and Conservation Management Plan for the Fruitlands Museum in Harvard, Mass." The report notes that the "mix of forest and open meadow provides important interior forest and grassland habitat for regionally declining bird species, and the wooded uplands complement the adjacent lowlands of the Oxbow National Wildlife Refuge." The purchase of the adjacent Watt land that was incorporated into the Oxbow in 2001 provides permanent protection for additional forest, meadow, and critical grassland habitats.

Continuous open spaces, especially in association with rivers or water bodies, can be important transit routes for wildlife. These corridors extend regionally wherever open space exists as a continuous system. The Nashua River corridor, containing the Oxbow NWR and Fruitlands, is a noteworthy example.

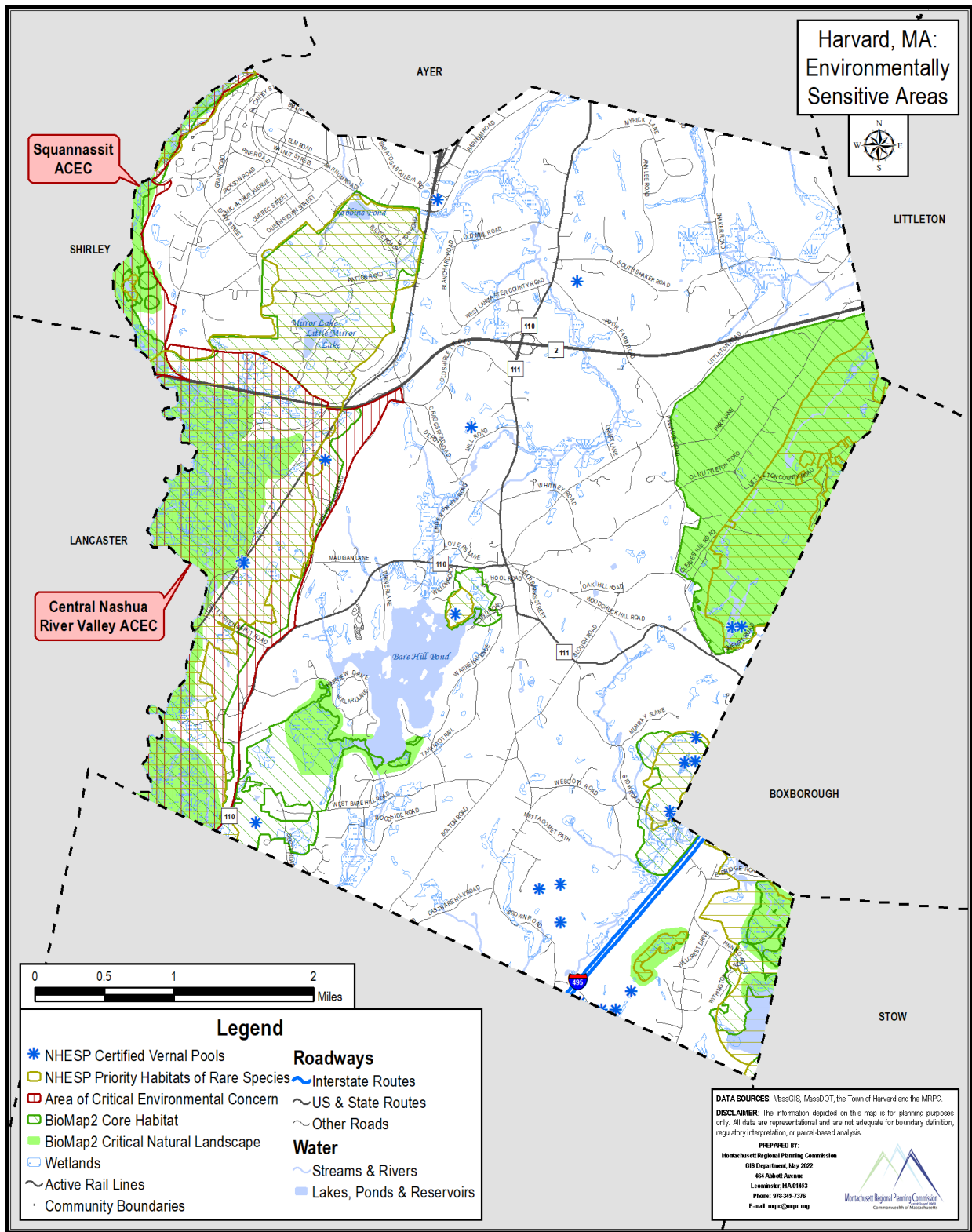
Many animals establish extensive hunting or browsing routes so a matrix of routes allowing multiple paths over a sufficiently wide area is desirable. In addition to the Oxbow NWR (787.5 acres), Bolton Flats (87.8), and Fruitlands Museum (133 acres), large uninterrupted blocks of forest land in Harvard include the Delaney Wildlife Management Area (261 acres), Clapp/ Scorgie/Tufts-Smith Conservation land, Black Pond/Vesenka Conservation lands, and Great Elms Conservation land and adjacent privately owned forest land. In 2022, the Harvard Conservation Trust acquired 100 acres of undisturbed forestlands roughly paralleling Interstate 495 from New England Power Co. These parcels provide valuable connections between established and future conservation lands, and have enlarged several uninterrupted blocks of forestland

Bowers Brook, which runs south to north through Harvard, is a stream corridor with some substantial sections of protected open space. Other wetland systems with some protection in Harvard include the Horse Meadows, Bennetts Brook/Shaker Village area, Black Pond, and Delaney/Elizabeth Brook areas. Continuous open spaces in association with ridges can also be corridors for wildlife. The Shrewsbury Ridge runs from Littleton through Harvard and into Shrewsbury.

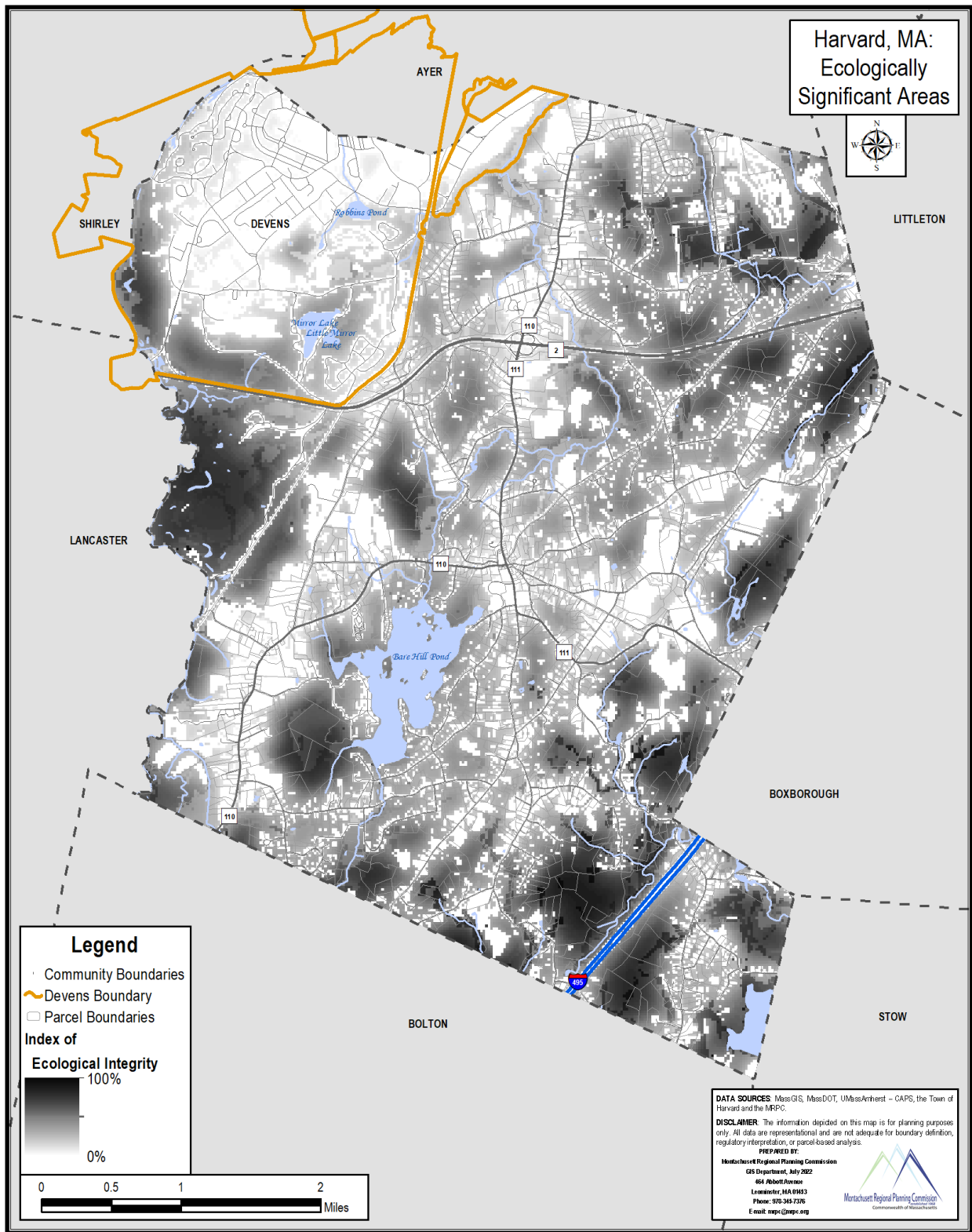
According to the 2022 *BioMap*, Harvard (including its part of Devens) contains 4,302.8 acres of Core Habitat, including 8.7 acres of Priority Natural Communities, 674.9 acres of Wetland Cores, and 725 acres of Aquatic Cores.. It also includes 1,841.9 acres of Critical Natural Landscape, including 620.4 acres of Wetland Core Buffers, and 661.6 acres of Aquatic Core Buffers. Within Harvard and the Harvard section of Devens there are nine areas designated as Estimated Habitats of Rare Wildlife on the Natural Heritage and Endangered Species Program map (dated August 2021).

In addition, the area around the Oxbow National Wildlife Refuge, Bolton Flats Wildlife Management Area, and Fruitlands Museums has been designated an Area of Critical Environmental Concern. This "Oxbow/Intervale/Bolton Flats" area is also cited in a report, "Focus Areas for Wildlife Habitat Protection in the Nashua River Watershed," as a large wildlife habitat focus area of 8,476 acres. These areas with a large amount of relatively undisturbed interior are "cornerstones of a habitat reserve design for the Nashua River Watershed."

In 2016 Harvard lost most of the land area that had been designated as priority or estimated habitat for endangered and threatened species, primarily in the Bower's Brook corridor, because of a lack of documentation rather than actual species loss. It is a policy of NHESP that if a species is on the list has not been re-identified in a community within a 25-year period it is removed from the list. These designations of Core Habitat, Critical Natural Landscape, Estimated Habitats of Rare Wildlife, and ACEC warrant further habitat and resource protection in Harvard: only 2,607.7 acres of Core Habitat and 1,363.5 acres of Critical Natural Landscape in Town is currently protected.



Map 4.1 - Environmentally Sensitive Areas



Map 4.2 - Environmentally Significant Areas

**Table 4.5 - State listed wildlife species documented in Harvard
by the NHESP, 2016**

| Scientific Name | Common Name | Taxonomic Group | Status |
|------------------------|-------------------------|------------------------|---------------|
| Ambystoma laterale | Blue-spotted Salamander | Amphibian | SC |
| Ambystoma opacum | Marbled Salamander | Amphibian | T |
| Ammodramus savannarum | Grasshopper Sparrow | Bird | T |
| Antrostomus vociferus | Eastern Whip-poor-will | Bird | SC |
| Ixobrychus exilis | Least Bittern | Bird | E |
| Podilymbus podiceps | Pied-billed Grebe | Bird | E |
| Rallus elegans | King Rail | Bird | T |
| Williamsonia litneri | Ringed Boghunter | Dragonfly/Damselfly | T |
| Cicindela purpurea | Purple Tiger Beetle | Beetle | SC |
| Notropis bifrenatus | Bridle Shiner | Fish | SC |
| Emydoidea blandingii | Blanding's Turtle | Reptile | T |
| Glyptemys insculpta | Wood Turtle | Reptile | SC |
| Terrapene carolina | Eastern Box Turtle | Reptile | SC |

SC-Special Concern, T-Threatened, E-Endangered

**Table 4.6 - State listed species documented in the
Oxbow National Wildlife Refuge**

| Scientific Name | Common Name | Status |
|------------------------|-------------------------|---------------|
| Ambystoma laterale | Blue-spotted Salamander | SC |
| Glyptemys insculpta | Wood Turtle | SC |
| Emydoidea blandingii | Blanding's Turtle | ST |
| Sorex palustris | Common Water Shrew | SC |
| Terrapene carolina | Eastern Box Turtle | SC |

SC-State Concern, ST-State Threatened, WL-Watch List



Blanding's Turtle – Oxbow NWR
(Courtesy of Tom Murray)

F. Scenic Resources and Unique Environments

Scenic variations from field to forest, orchards, hills and vistas, valleys, wetlands and water bodies, stone walls, winding country roads, the historic districts of the Town Common, Shaker Village, and Still River Village all contribute to the scenic resources and unique environments that comprise Harvard's rural character. These rural characteristics are valued by the citizens of the Town and are consistently cited as one of the main reasons for wanting to live in Harvard. The area's most frequently mentioned in previous plans, a variety of reports, and our survey are included below. (See Map A.5).

Bare Hill Pond: This 300-acre Great Pond is visible from the Town Center and other vistas and provides many recreational opportunities for residents as well as natural habitats for wildlife along its shores and adjoining wetlands. The pond is accessible via a Town beach and through several adjacent parcels of conservation land. Protection of the watershed is critical to preserve both the scenic and natural quality of this area.

Nashua River Valley: Some of the most valuable and beautiful scenic resources of Harvard are the vistas from Still River, Prospect Hill, and Fruitland's Museums overlooking the Nashua River. The open fields of the museums, former Watt dairy farm, and private holdings along Prospect Hill and Still River Roads afford views to Mt. Wachusett in the west and Mt. Monadnock in New Hampshire. The Watt dairy farm has been protected by a major effort between the Harvard Conservation Trust, the Town of Harvard, the U.S. Fish & Wildlife Service, and the Trust for Public Lands. The large holdings of the Fruitlands Museum will be protected by integration into the Trustees of Reservations however the religious orders located on Still River Road, as well as two private farms are not in permanent protection. Protection of these view sheds is critical to this resource. As was brought to the forefront during the drive to attract a major pharmaceutical manufacturing plant at Devens, this view shed remains a critical and integral part of Harvard's scenic resources. Cooperative efforts with neighboring Towns along with Devens, presently controlled by Mass Development, is essential to maintain this view shed and the rural character of Harvard.

Nashua River: The Nashua River designated a Scenic River by the Commonwealth of Massachusetts, is an excellent recreational, conservation, and wildlife resource. Access to the river is by way of the Oxbow National Wildlife Refuge. Additional protection of this river corridor and greenway from the Massachusetts Division of Fisheries and Wildlife's Bolton Flats in the south to the Oxbow is critical to maintain this resource. The U.S. Army still has holdings at Devens' South Post, south of Route 2. However, Federal legislation now provides for the transfer of those lands to the U.S. Fish & Wildlife Service for inclusion in the Oxbow National Wildlife Refuge upon the Army's departure.

In 1996, the Department of Environmental Management designated 12,900 acres in North Central Massachusetts as the Central Nashua River Valley Area of Critical Environmental Concern (ACEC). The ACEC includes 1,850 acres in Harvard, including Still River Village (the west side of Rt. 110 and Prospect Hill Rd), Oxbow National Wildlife Refuge, Bolton Flats Wildlife Management Area, Fruitlands Museum, and private lands. In 2002 a portion of Devens land within Harvard was similarly protected by the Squannassit ACEC.



Nashua River Valley from Prospect Hill

Pin Hill: In this area along Bowers Brook there are historic slate quarries and scenic rock outcroppings, as well as remnants of mills, which are scenic vestiges of Harvard's historic past. From certain areas of this ridge, which extends from the Town Center, there are vistas out to the west, east to the orchards, and south to Town Center.

Black Pond: Noted for its botanic, geologic, and historic interest, the area around Black Pond has been consistently cited as an important scenic and environmental resource, and it is an area noted as "distinctive" (areas of highest visual quality which make up only about 4% of the state) in the Massachusetts Landscape Inventory. Fifty-four acres of this area are under Conservation Commission protection along with the abutting twenty-three acres of Vesenska land, and access is provided by an easement through private land.

Horse Meadows: The cliffs, outcrops, rocky basins, mature woodlands, wetlands, and small ponds of Horse Meadows provide a naturally secluded and wild enclave on the eastern side of Town. The meadows are the best example in Harvard of a depression formed by glacial plucking. The Town owns 20 acres and the Conservation Trust owns 28.8 acres of this area. Along Sherry Road, there are curious stone rows, mounds, and standing stones. Harvard University's James Mavor and Byron Dix in their book *Manitou* present a theory that the Indians native to this area created rock structures, particularly rows that connect a feature of the landscape with another, like water to a hilltop. These can also connect a constructed rock feature with a natural one like a ridge or a boulder. Mavor and Dix speculated that these rock formations might have been used at some time for astronomical observations and planting calendars.

Holy Hill and Shaker Village: Shaker Village was placed on the National Register of Historic Places in 1989. Included in the district are 15 contributing buildings, 11 sites, 5 structures, and 9 non-contributing buildings. The Shaker Village is significant as the location of one of the utopian religious communities known as Shakers, a name derived from behavior during worship ceremonies. The Shakers were founded by Jane Wardley and more notably by Mother Ann Lee around 1747 and thrived from the late 18th century into the early 20th century. It was one of only 20 such communities in the country and contains important examples of Shaker architecture and agricultural artifacts. The Shakers created a thriving farming community, and historically significant Shaker architecture as seen in the Church Family and South Family settlements. The Village also contains a cemetery with rare cast-iron markers, an outdoor worship/dancing ground (Holy Hill of Zion), a mile-long aqueduct from a distant springhouse, and extensive and beautiful stone work.

In 2002, Town Meeting allocated \$3,100 from the Community Preservation Fund for an assessment of a magnificent stone Shaker herb drying shed owned by the Town. Additional funds to complete the restoration of the herb shed were approved in subsequent Town Meetings through the use of Community Preservation Funds. This historic and scenic area is partially protected on the west by the Holy Hill conservation land comprising 126 acres, including 41 acres of land under conservation restriction, and to the east by Shaker Hills Country Club and adjoining woods and wetlands. Adjoining the golf course is a 24-acre APR parcel owned by the New England Forestry Foundation.



Shaker Village, c. 1905

Upper Stow Road: Adjacent rolling meadows, open fields, stone walls, the Williams Pond, Great Elms Farm and the Brown Conservation land offer rural vistas. Eighty acres of this area, including a prominent drumlin, pasture, and a pond, are protected for conservation. Trails through the area provide access to ponds, wildlife habitats, and scenic vistas.



Williams Land from Stow Road

Bowers Brook: Bowers Brook, flowing through Bare Hill Pond, winds through town from south to north and joins the Nashua River in Ayer. Various portions of this stream corridor are under Conservation Commission and Trust protection. Trails parallel and cross the stream at scattered locations throughout Town. The combination of steep cliffs, open meadows, and wetlands provide a great diversity of habitat and scenic interest along this corridor. A scenic overlook exists on the Sprague land with a vista of Bowers Brook emptying into Bare Hill Pond. Much of the land along Bowers Brook is privately owned and not permanently protected. This land has been identified as a high priority to protect the Bare Hill Pond watershed.

Orchards throughout Town: Orchards dominate many of the hills in Harvard and are an important aspect of the rural character of the Town. The scenic vistas from roads over orchards to the north and west and vistas from roads to hillside orchards are noteworthy. A number of these areas are in the “distinctive” category of the Massachusetts Landscape Inventory. Protection of these orchards and their continued agricultural use are critical to Harvard’s landscape. Although a number of the orchards are in the “distinctive” category local it does not protect them from the increase demand for large house lots. More and more of these orchards are being sold off piecemeal to the detriment of the larger view shed. Also, because of decreasing open space the orchards are being forced to fence out the deer population.



Community Harvest Project Orchard from Prospect Hill Road

Town Common: The Town Center is a historic district listed on the National Register in 1977, which is comprised of scenic commons, adjacent historic and public buildings, and private residences. The district includes significantly intact residential, civic, and religious buildings dating from the 18th through the 19th centuries. Its architectural richness is illustrated in a wide variety of architectural styles. These buildings are an essential part of Harvard's rural village character and the Boston Globe has described the Common as a "nearly perfect" traditional New England village. The elm trees that grace the commons and roadways are an endangered treasure. The Town has an Elm Commission that actively treats, maintains, and protects these beautiful trees that have been lost in most Towns because of Dutch elm disease. In recent years several significant elms on and around the Common have succumbed to Dutch elm disease and The Harvard Elm Commission is actively treating the existing elms to protect them and is systematically introducing disease resistant elms each year.



**Harvard Unitarian Universalist Church
from the Town Common**

Still River Village: Primarily residential/agricultural, Still River has a post office, fire station, the Still River Baptist Church, owned by the Harvard Historical Society, and several religious communities. Bounded largely by fields affording views to the west and north, this is a scenic area that is being negatively affected by piecemeal development of the open fields and meadows. The repair of septic systems has altered the Still River village and unsightly mounds have been sprouting up in the district. The Town was granted a portion of land purchased from the Watt family by the US Fish and Wildlife dedicated to serving as a communal septic system for the village. To date the system has not been designed nor implemented, and septic repairs in the village continue to chip away at the village's scenic beauty.

Old Bromfield: Old Bromfield was the original high school in Harvard and is located at the heart of the Town Center. The building is an architectural gem, designed by Peabody and Stearns circa 1878. It was used by the Town as a school until 2003 when it closed due to the structure's inability to serve as a modern academic building and the expansion project at the Bromfield School was completed.

In 1999 the Town agreed to convert Old Bromfield into a new larger library facility. The new library was formally dedicated and opened to the public in April of 2007. It is a wonderful integration of the old and new, with the addition echoing the Peabody and Sterns architecture; it beautifully preserves this Town icon. The 11,500-square-foot addition expands the library as a resource for the whole community and was selected as a winner of Building Design and Construction's 2008 Reconstruction and Renovation Awards, which go to the best projects based on design, engineering and construction, as well as on overall community involvement with the project.



Old Bromfield / Town Library from Massachusetts Avenue

Delaney Wildlife Management Area: This 560-acre area crosses four town lines: Bolton, Harvard, Stow, and Boxborough and contains 3 flood control dams. Owned by the State and maintained by the Massachusetts Department of Fisheries and Wildlife, the area provides opportunities for hunting, fishing, canoeing, and wildlife viewing. The size and nature of the area (mostly wetlands) make this an important area for wildlife habitat protection.

Shrewsbury Ridge in Harvard: The Shrewsbury Ridge is a long escarpment that runs from Littleton MA to Shrewsbury MA. It is an analog of the Allegheny ridge and valley terrain. This prominent ridge of resistant rock (known in sections of Harvard as Oak Hill) runs northeast to southwest and has an elevation of 500 to 600 feet. It is visible from a distance and affords views east to Boston and west to Mt. Wachusett. There are areas of botanic interest in the valleys off the steep southeast slope where there are stringers of marble and historic pre-revolutionary lime quarries, located in the Black Pond area previously cited. The valley area is an important flyway for migratory birds.

G. Cultural and Historic Resource Areas

Districts

The Harvard Town Common was established in 1733 by a gift of thirty acres from the Lancaster proprietors. By 1830, only “nine acres and eighty-three rods” and burial ground remained of the common land. Thus by encroachment, trespassing, and some downright illegal appropriations, the little village of Harvard center was established.

Today the Town Common is a Historic District. The Town Center includes the Common, the First Congregational Unitarian Church, Bromfield Academy (1878), and the Evangelical Congregational Church (1832). Also located in the Town Center are St. Theresa’s Church (1925) which has a stained glass window made by German artisans, the Atherton-Royal House (1734) which was once a way-station and horse change on the old Boston to Montreal turnpike, and the Benjamin Nourse House (c. 1750) which was once the Unitarian Parsonage. The Harvard General Store (The General) built in 1816, A Civil War Memorial, Veterans Memorial, watering trough, powder house, pound, and flag pole, are located in the center, along with an old millstone from the site of the Jonas Prescott mill given by George W. Golden in memory of his mother with a bronze town marker, and a granite step given by the late Mrs. Michael Griffin as a gift to the Harvard Historical Society. Plantings around the Common were selected under the guidance of Mr. Richard Larkin, Assistant Curator of Old Sturbridge Village and Gary Koller, Curator of the collection at the Arnold Arboretum. The Harvard Park and Recreation Committee and the Harvard Garden Club maintain the plantings on the Common and the Garden Club plants flowers yearly in the window boxes.



Town Hall

Shaker Village and Shaker Cemetery, a Local Historic District, are located in the northeast corner of Harvard, off South Shaker Road to Shaker Road. The Shakers came to Harvard in 1781. By the 1790’s, they had developed into a thrifty, resourceful, and peaceful group. By 1919, the Shakers had abandoned their holdings in Harvard. A number of Shaker buildings have survived and are well maintained by their present owners. All the homes in the village are private. In 1972, the Conservation Commission was authorized to acquire for the Town the Holy Hill of Zion. Holy Hill was established by the Shakers as an outdoor worship area and was popularly known as “the Dancing Ground.” The Holy Hill area is marked and has a small lot for parking cars. In 2006 new signage to the entrance of Holy Hill was installed. The sign details the history of the Shakers.

Buildings

William Emerson, father of Ralph Waldo Emerson, founded Harvard's first public library in 1793. The building was built largely with funds from the estate of Augustus Sawyer. When these funds ran short, a public subscription made up the difference with a large contribution having been donated by Warren Hapgood. Later, Mr. Hapgood gave a further sum to build the Hapgood wing in the rear of the building. This building, now known as the Hapgood Building, was used as a library until the spring of 2007, with the last book checked out by long-term resident and library trustee, Dr. Jeffrey Harris, on March 10, 2007. Since that time the building has been used occasionally for committee meetings and for other events, and more recently housed town departments during the renovation of the Town Hall. It is expected that this important building will continue to be an active hub for the entire community, contributing to maintaining a vibrant Town Center.

In the Still River and Prospect Hill areas, although not included in the Local Historic District, are several buildings important to Harvard's history. The Still River Baptist Church (1832) was listed on the National Register of Historic Places in 1996. The building contains the original Baptist sanctuary and pipe organ. It is said that the 1807 bell located there originally hung in Massachusetts Hall at Harvard University. It is now owned by the Harvard Historical Society and serves as their headquarters. The Henry Willard House (c. 1730) is now owned by the St. Benedict Abbey. The Ralph Houghton Garrison House (1648) is on the east side of Still River Road. The earliest portion of this house was built on land from a grant from the King of England. Occupied by seven generations of Houghtons, it has a chimney made of bricks from the property. The chimney has nine flues, one of which is intended for smoke curing meat.



The Ralph Houghton Garrison House

On top of Prospect Hill, wealthy Bostonian Clara Endicott Sears built her summerhouse, The Pergolas, in 1910 with a marvelous view of the Nashaway intervale. Founders of the 19th century Transcendentalist Movement, Bronson Alcott and Charles Lane and fellow transcendentalists used this site from June 1843 until January 1844 for the Fruitlands experiment. Ms. Sears preserved their farmhouse to start Fruitlands Museums. The original farmhouse was opened to the public in 1914. In 1918, Fiske Warren sold the Shaker Men's Shop to Miss Sears who had it removed to its current location at Fruitlands. These and other buildings acquired by Miss Sears that currently make up the museums are the Fruitlands Farmhouse, the Shaker Museum, the Art Museum, the Native American Museum and the Wayside Visitor Center. In 2016, Fruitlands Museum became part of The Trustees as its 116th reservation.



Fruitlands Museum

The 5.7 acre Hildreth House property was the summer residence of the Hildreth family, a major philanthropic supporter of the Town. The house and surrounding property is an important historic and institutional Town resource, currently serving as the Town Hall Annex for the Land Use Boards and Building Department offices.

On West Bare Hill Road Abraham Whitney, Jr. built Bowers Place, now called Bowerbrook which was built in 1774 with hand-pegged chestnut and white oak timbers grown on the grounds and cut at the sawmill on the brook to the north. The Atherton-Whitney Farm on Bolton Road is probably a part of the original land grant of the Lancaster Properties to the family (1694).

Road Island on Woodchuck Hill Road is the Joseph K. Willard house (Sturdy House) of revolutionary period, with 1807 additions. It is located on the original Liberty Turnpike, which was a toll road.

Enterprise

From 1784 to 1789, Colonel Henry Bromfield and 24 associates operated silver mine on the east slope of Oak Hill, south of Old School House Road. The mineshaft was driven 50 feet into the solid rock, sometimes by blasting and sometimes by heating the stone and throwing water on it. The mine was abandoned when the work yielded no silver.

One of the most heavily quarried areas is Pin Hill in Harvard, an area of about 75 acres. The area's carvers quarried the rock under a sharing arrangement that gave them access to the source and the preparation area. Each carver marked his own slate with an initial or mark for identification and then finished the stones according to his own style. A disastrous attempt was made in the 1840's to blast the slate away from the side of the hill instead of the more painstaking method of cutting it by hand. The result was mostly unusable rubble, and weakened slabs that could not withstand the weather.

The Oak Ridge Observatory, (aka the George R. Agazzi Station), established in 1933 is located on Pinnacle Road and operated the largest optical telescope east of Texas with a 61" Wyeth Reflector and 84 foot steerable radio telescope. It was operated by the Harvard-Smithsonian Center for Astrophysics as a facility of the Smithsonian Astrophysical Observatory. The observatory was closed in August 2005.

H. Recreation

Harvard has a number of outdoor recreational facilities for the community to enjoy. One of the largest facilities that draws young and old alike is Harvard Park. Completed in December of 2002, this privately-funded track and field facility is built on a 30-acre parcel of land on Lancaster County Road. Used for active recreation. Harvard Park includes a track, field events area (shotput, javelin, discus), soccer/lacrosse field, playground, XC running course, walking trail, and stone sitting/memorial area. Just across the street from Harvard Park, on Lancaster County Road, is another recreational facility known as the Charlie Waite fields. Here sit 2 soccer fields, used by both the school and youth sports teams in town, including soccer and ultimate frisbee.



Harvard Park
Track and Soccer/Lacrosse Complex



Playground



Charlie Waite Soccer Fields

Another large area of active recreation in Harvard is on Depot Road, where one can find close to 120,000 sq feet of playing fields for soccer, frisbee, lacrosse, etc. In addition to the “Upper Depot” and “Lower Depot” rectangular playing fields, there are two diamond fields – one for youth baseball and one for softball/baseball/t-ball. This baseball/softball complex is referred to as the Ryan Land Playing Fields.



Ryan Land Baseball Field



Upper and Lower Depot Soccer Fields

In an effort to make travel between the recreational facilities on Lancaster County Road and Depot Road easier and safer for those on foot, bike, or other non-motorized means, a trail was created by the Parks and Recreation Commission in 2009. This “Rec Trail” funded through Community Preservation Act funds and the state Recreation Trails Program, is a multi-use trail that serves to connect these two parts of Town without users having to use venture onto Ayer Road on foot or bike.

Another spot where community members can enjoy active recreation is on Ann Lees Road. Here sits a softball field, newly revamped in 2022, where Bromfield softball teams, as well as many youth softball teams take to the field as spectators enjoy watching.



Ann Lees Softball Field

In the center of Town, and on the campus of the schools, are the remainder of Harvard’s outdoor recreational facilities. In front of The Bromfield School is a field owned by the Bromfield Trustees, but used by the schools, youth sports, and community groups for things such as field hockey, lacrosse, and other sports. Behind the high school are the Town tennis/pickleball courts and an outdoor basketball court. Also behind the school is Pond Road Field, which contains another soccer field as well as a full-sized baseball diamond, utilized by the Bromfield Baseball team as well as many youth travel-league baseball teams. This field is also a favorite for older members of the community who enjoy pickup softball games on the weekends.



Tennis / Pickleball Courts



Pond Road Soccer and Baseball Field

Just down the road from the soccer and baseball fields on Pond Rd, is Bare Hill Pond, one of Harvard's greatest treasures. The pond is the site of much outdoor recreation, especially in the summer, but also throughout the year. During the summer months, community members of all ages gather at the beach for swimming, sailing, kayaking, canoeing, paddle boarding, motor boating, fishing, and general recreation. A volleyball area and playground on the beach allow those looking for a break from the water to still have fun at the pond. During the spring and fall months, rowers from the Bare Hill Rowing Association, as well as those community members who like the quieter months on the pond, enjoy boating. Come winter time, Bare Hill Pond is often busy with skaters, cross-country skiers, and ice fishers.



Bare Hill Pond Beach Swimming Area



Bare Hill Pond Canoe and Kayak Racks

Finally, when it comes to recreation in Harvard, trails are one of the most impressive things the Town has to offer. Harvard boasts over 2,000 acres of protected conservation land on which more than 50 miles of trails provide something for everyone. Whether looking to run, walk, hike, bike, cross-country ski, horseback ride, snowmobile, bird-watch, or simply explore nature, one can find a trail to suit their needs Harvard. The Harvard Conservation Trust publishes an extensive online Harvard Trail Guide, which is a great resource with maps and descriptions of each trail. In addition to the many conservation land trails, Harvard Park and Recreation also has the two previously mentioned trails - the Rec Trail and the Harvard Park Walking Trail.

I. Environmental Challenges

Development

Development significantly impacts open space and water supplies. Finding a balance between protection of land and water resources and developed land poses a major challenge both in Town and regionally. Currently, point source pollution, or dumping of toxins directly into wetlands and waterways has largely been controlled by Federal and State regulations that make it illegal and offer stiff penalties to violators. As a result, private and industrial waste is no longer being poured directly into wetlands and waterways. Non-point source pollution, from agricultural uses, development, and roadways, is now the greater threat to wetlands and surface waters.

One on the top priorities in the Executive Office of Energy and Environmental Affairs five-year plan is related to non-point source pollution (NPS). The United States Environmental Protection Agency and the Massachusetts Department of Energy and Environmental Protection identify NPS pollution as the leading source of water quality degradation. Every household plays a part in this type of contamination.

The most common household originated NPS pollutants are pesticides, bacteria, salts, oil, grease, toxic chemicals, and heavy metals. Inadequate septic systems, animal waste and large amounts of grass clippings, leaves, and other natural material also cause hazardous waste to get into the natural water supply. Other sources of NPS pollution in our region are soil eroded from construction sites, fertilizers from fields and lawns, metals and oil from automobiles, and road salts.

The more developed the area becomes, the greater these impacts are. Even if people do not live near wetlands, pollutants from each home find a way into surface runoff. This water reaches storm drains and eventually finds its way into wetland systems. Paved surfaces prevent water from percolating into the ground, cause runoff to accumulate and funnel into storm drains at high speeds. Quickly moving water can undermine banks and edges of roadways, moving silt and sediment into wetlands, causing them to fill in, damaging ecosystems, and impacting the lives of fish and other aquatic life. It is often difficult for Town boards to monitor outflow of storm drains because the Town does not currently have a map of the drainage system.

Pollution and traffic from an increased population may become more problematic as Devens reaches its full build out, and commercial development continues near the Harvard borders of Ayer and Boxborough. Dealing with air, noise, and light pollution, and storm water run-off poses a significant challenge throughout the area. Increased automobile traffic conflicts with recreational uses of the roads. Many bicyclists, runners, equestrians, and pedestrians use Harvard roads, which have limited sidewalks or shoulders.

Oil Contamination

Harvard currently has two active waste sites and three waste sites with temporary solutions. All sites have been reported to the Massachusetts Department of Environmental Protection. Historically, oil has been the most common contaminant in the Town's hazardous waste sites.

The Town of Harvard utilized a sanitary landfill until September of 1984 when it was closed. The location is now used as the Town Transfer Station.

Flooding

In 1996 the voters of the Commonwealth passed a ballot referendum that prohibited or restricted the use of certain types of traps and required a permit for the trapping of beavers. As result beaver populations spiked causing a rise in crop and road damage. State licensed trappers have been active in Harvard since 2002, with approximately 40 beavers being trapped between 2017 and 2021. The removal of these beavers has not reduced their activity around culverts that are regularly blocked, and therefore require constant monitoring by the Department of Public Works.

In the spring of 2016, the Conservation Commission contracted Beaver Solutions™ to install a Flexible Pond Leveler™ in the William's Pond at the corner of Stow Road and Murray Lane. This device is designed to control the water level at the beaver dam without interference from the beavers. An additional eight devices have been installed since 2016 around Town, helping reducing the number of beavers removed by trapping.

While most associate beavers with the killing of trees, they are beneficial to the environment around us. As a keystone species beavers create valuable wetlands, improve flow and quality of water, recharge water aquifers and maintain better stream flow during droughts.

Erosion and Sedimentation

Most of Harvard's roadways are "country roads", meaning they were not constructed to engineering standards, and, thereby, making them susceptible to erosion in many locations. The lack of catch basins and improved roadway shoulders allows for washouts along the roadways and for sand sediment and debris to enter streams and wetlands.

The installation of Mass Highway catch basin to collect the sediment and debris before it enters the wetlands and streams is the best answer. In addition, the installation of raised curves along the roadways would prevent washout. However, these solutions are very costly. The Public Works Department has been addressing many problem washout areas by installing rip rap stone along the shoulders especially on hills to reduce washout.

In 2021 Town Meeting passed an Erosion Control bylaw that established minimum requirements and procedures to control the adverse effects of soil erosion and sedimentation, construction site runoff, increased post-development stormwater runoff, decreased groundwater recharge and nonpoint source pollution associated with new development, redevelopment and other land-disturbance.

Road Run Off and Winter Road Treatment

Road run off carries oil, salts and other pollutants directly into adjacent wetlands and waterways. In Harvard, winter sanding of Town and State road surfaces cause significant sandy sediments to fill wetlands. Allowing outflow to sheet across vegetated areas rather than funnel directly into wetlands allows for absorption of particles and nutrients into the soil.

Water Pollution

Land-use patterns along Bowers Brook in Harvard are low-density residential settlement interspersed with agricultural land and protected open space. The threats to Bowers Brook water quality in Harvard include roadway runoff (asphalt, oil, salt, sediment), and concentrated residential development (fertilizers and pesticides from lawns, leaching from old septic systems), especially around Bare Hill Pond.

Surface waters returning to groundwater include recycled septic water so it is important that septic systems are monitored and upgraded when necessary. Underground fuel storage tanks represent the most serious potential source of water pollution and likewise require monitoring. Two hundred and fifty underground tanks were identified in 1986, but most have since been removed as a requirement of change of ownership of property

The main stem Nashua River from the confluence of the north and south branches in Lancaster to the Ice House Dam (10.6 miles) supports recreational uses for which there is intimate contact of the water with a possibility of ingestion by primary-contact recreational use, such as swimming or wading, and secondary-contact recreational use, such as boating and fishing. The recreational use status can change both downstream and upstream due to elevated fecal coliform counts, urban runoff, and increased turbidity as the Nashua winds its way through the region. The river has not been assessed for fish consumption. Clean up activities since the mid-1970s, however, have improved the ranking of many sections of the river to Class B making it suitable for recreational uses.

Land bordering the Nashua as it flows through Harvard is either in non-intensive agriculture or protected open space (Oxbow National Wildlife Refuge) so pollution from non-point sources of contamination is less of a concern. However, dense residential, commercial, and industrial areas upstream in Fitchburg and Leominster affect water volume and quality. The mainstream Nashua shows high phosphorus levels and some high bacteria counts. (Notable spikes in bacteria levels during summer and fall may be attributed to decreased dilution during summer months when tributary flows are lowest.) Treated wastewater accounts for about 30% of the Nashua River's summertime flow, making the river vulnerable to malfunctions at treatment facilities. Combined sewer outflows that carry both wastewater and storm water originating in upstream urban areas of the larger Nashua watershed also degrade water quality of the main stem. Polluted runoff and sedimentation is an increasingly serious issue in rapidly developing upstream communities. (*Nashua River Basin 1998 Water Quality Assessment Report*. DEP, DWM)

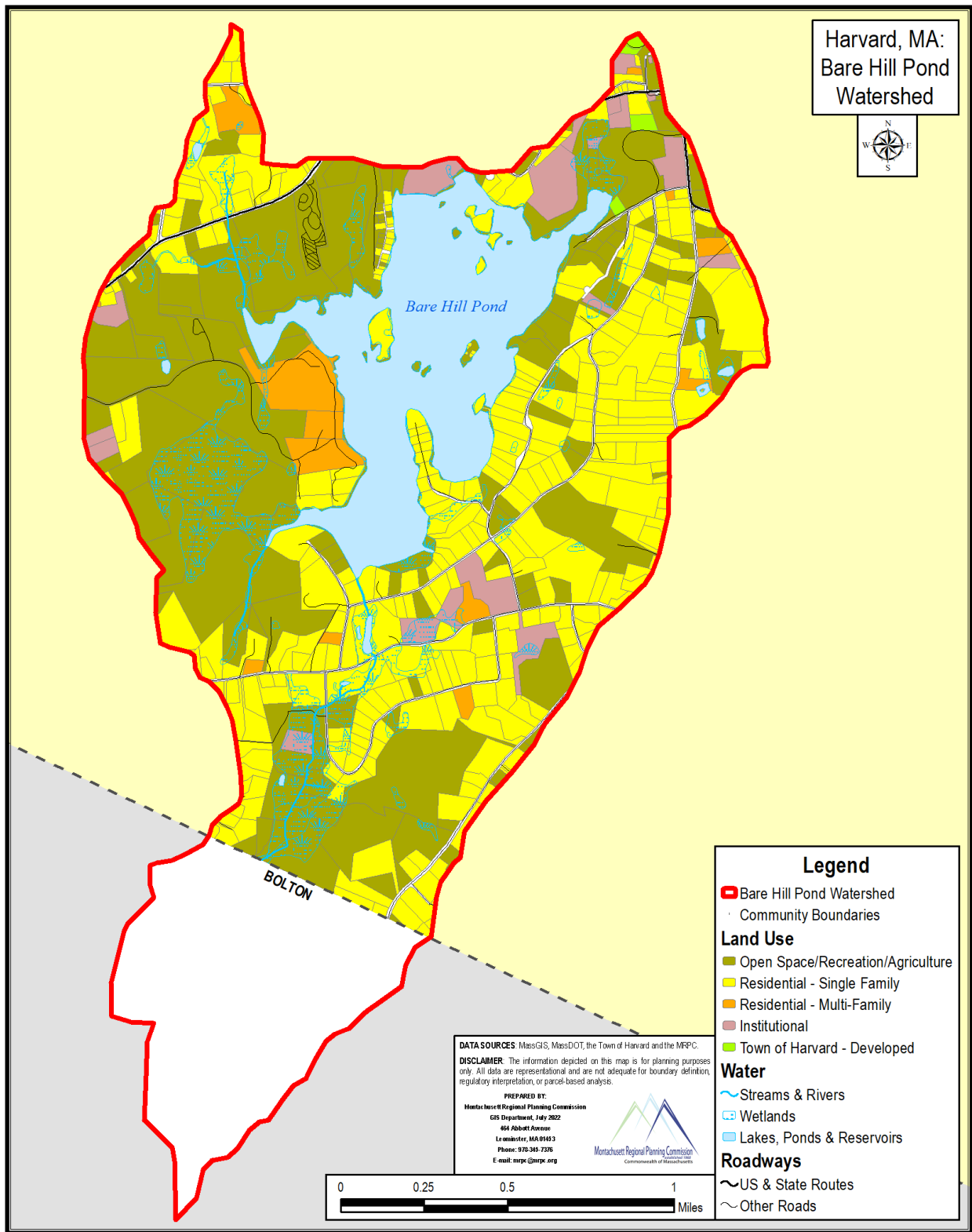
As of July 2022, Massachusetts Department of Public Health has issued a freshwater fish consumption advisory for Bare Hill Pond and Mirror Lake. Pregnant women, nursing mothers and children under 12-years old are advised not to eat Large Mouth Bass if caught in either of these water bodies due to mercury contamination. Both lakes support both primary and secondary recreational uses.

Bare Hill Pond

Bare Hill Pond is the largest and most prominent water body in Harvard. The greatest threats to Bare Hill Pond include shoreline development and high nutrient levels.

Arguably Harvard's most significant natural resource, Bare Hill Pond has had a history typical for Massachusetts ponds that became prime real estate first for summer camps and later for year-round residences. While much of the Pond's shoreline remains wooded, most of it appears to be developed. The rate of development accelerated from 1.1 units per year prior to 1931 to 1.7 units per year between 1931 and 1960. Development in the past 10 years has largely involved reconstruction of existing homes and conversion of summer residences to year-round use. There are numerous undeveloped parcels within the watershed of Bare Hill Pond. The Town itself owns a significant portion of the undeveloped land. If the Town's intention is to preserve its lands in perpetuity, then the Town should consider the adoption of additional restrictions to be put into place either through conservation restrictions or other deed restrictions

Shoreline development may have contributed significantly to water quality problems at Bare Hill Pond, which numerous water quality studies have documented, but studies also note that as a shallow man-made Pond that covered former sheep pasture, there is excessive nutrient loads in the Pond bottom that absent drawdowns would continue to endanger the water column. Weed problems had become acute by the mid-1950s, when approximately 100 camps or homes existed. By the late 1990's Bare Hill Pond was designated as endangered by the Massachusetts Department of Environmental Protection due to excessive phosphorous levels (0.44 mg/l) and invasive aquatic species (predominately milfoil, fanwort and water chestnut). Water quality has since improved due to a number of measures – deep drawdowns during winter, installation of storm water controls in Town Center and along Pond Road and mechanical and manual removal of invasive plants. The current phosphorous level has been reduced by roughly 50% from its historical high and is below the endangerment level (0.30 mg/l). In spite of these recent improvements to water quality the increasing temperatures and droughts due to climate change likely make the need for yearly deep drawdowns necessary for the foreseeable future – along with annual monitoring of nutrient and invasive plant levels.



Map 4.3 – Bare Hill Pond Watershed

Insects and Disease

In the region as a whole, and in Harvard, three types of trees—elm, hemlock, and ash—are currently under attack by insects and disease, resulting in major declines in their populations.

Dutch Elm Disease, a fungus that attacks the water conducting part of the tree, has killed most American elms (*Ulmus americana*) and many other elm species. Harvard has an Elm Commission that has carefully monitored the situation for many years. They inject fungicide into trees on Town-owned land to protect against infection and are replacing dead elms with disease resistant varieties.

Hemlock Woolly Adelgid is an insect that introduced into Massachusetts in 1988; it is killing native eastern hemlock trees (*Tsuga canadensis*). Harvard has a large population of hemlocks in our forests, and the effect of the adelgid is very visible in certain areas of Town such as Warren Avenue near Bare Hill Pond. Infestation is clearly visible because woolly white masses containing the eggs are present at the base of most needles, affected trees appear grey-green, and their foliage is thin. Trees generally succumb in three to five years. This insect is manageable in the landscape if found early and treated by applying horticultural oil or pesticide treatment. In the forest, trees affected by Hemlock Woolly Adelgid are very difficult to treat effectively or economically. The loss of hemlocks in our forests will have a major effect on the forest ecosystem because hemlocks are our primary shade tolerant evergreen tree.

Throughout the northeast and Midwest, a disease called “ash yellows” is believed to be responsible for the decline of *Fraxinus* sp., especially white and green ash trees. The disease is caused by microbes and is thought to be transmitted by insects. Generally, it takes five to 10 years to kill a tree. There is no known cure for this blight, which has already made a significant impact on the woodlands of Harvard where dead and dying white ash trees are common. Ash is also vulnerable to the Emerald Ash Borer (EAB), which was first detected in Massachusetts in 2012. This small flying beetle is native to Asia and can kill a tree in just a few years because it bores directly under the bark. Since being discovered in 2002 the EAB has killed millions of trees in North America. As of July 2022, 68% (239 municipalities) have confirmed the presence of EAB, including Harvard.

The Asian Longhorned Beetle (ALB) was discovered in Worcester in 2008. By 2011 a 110 square mile area, including parts of Worcester, Shrewsbury, Holden, West Boylston and Boylston were being regulated to suppress and control ALB. ALB is a major concern because Harvard is within the Northern hardwood forest, a vast contiguous forest, found in northern New England. The ALB uses a wide variety of species as its host, including our many maples, and could change our forests and our Town more dramatically than any other disease or pest to date.

The latest insect introduced to Massachusetts is the Spotted Lanternfly. The Spotted Lanternfly was first detected in Pennsylvania in 2014. By 2020 it had been detected in Massachusetts and by 2021 it was detected in communities close to Harvard. The main host for this insect is Tree of heaven, but it can attack a variety of trees, shrubs and vines, including apple and peach trees. This insect has the potential to impact a broad range of agricultural commodities within our community, including maple syrup. These sap-feeding insects congregate in large numbers on an individual plant. Females lay eggs on or near

trees and plants they feed on as early as September. Removal of these egg masses can reduce the risks associated with this insect.

Invasive Plants

The Massachusetts Invasive Plant Advisory Group (MIPAG) has listed 72 plant species, categorized as "Invasive," "Likely Invasive," or "Potentially Invasive" that have been found in Massachusetts. Many of them are present in Harvard, invading our forests, fields, streams and ponds. The most prevalent invasives in Harvard include:

Table 4.7 – Invasive Plants in Harvard

| Scientific Name | Common Name | Status |
|------------------------------------|-----------------------------------------|-----------------|
| <i>Acer platanoides</i> | Norway Maple | Invasive |
| <i>Ailanthus altissima</i> | Tree of Heaven | Invasive |
| <i>Alliaria petiolata</i> | Garlic Mustard | Invasive |
| <i>Ampelopsis brevipedunculata</i> | Porcelain-berry; Amur peppervine | Likely Invasive |
| <i>Berberis thunbergii</i> | Japanese Barberry | Invasive |
| <i>Cabomba caroliniana</i> | Carolina Fanwort | Invasive |
| <i>Celastrus orbiculatus</i> | Oriental Bittersweet | Invasive |
| <i>Cynanchum louiseae</i> | Black Swallow-Wort | Invasive |
| <i>Elaeagnus umbellata</i> | Autumn Olive | Invasive |
| <i>Euonymus alatus</i> | Burning Bush | Invasive |
| <i>Frangula alnus</i> | European Buckthorn; Glossy Buckthorn | Invasive |
| <i>Iris pseudacorus</i> | Yellow Iris | Invasive |
| <i>Ligustrum obtusifolium</i> | Border privet | Likely Invasive |
| <i>Lonicera morrowii</i> | Morrow's Honeysuckle | Invasive |
| <i>Lonicera x bella</i> | Bell's Honeysuckle | Invasive |
| <i>Lythrum salicaria</i> | Purple Loosestrife | Invasive |
| <i>Myriophyllum heterophyllum</i> | Variable Water-Milfoil | |
| <i>Myriophyllum spicatum</i> | Eurasian or European Water-Milfoil | Invasive |
| <i>Najas minor</i> | Brittle water-nymph | Likely Invasive |
| <i>Phragmites australis</i> | Common Reed | Invasive |
| <i>Polygonum cuspidatum</i> | Japanese Knotweed | Invasive |
| <i>Potamogeton crispus</i> | Crisped pondweed; curly pondweed | Invasive |
| <i>Robinia pseudoacacia</i> | Black Locust | Invasive |
| <i>Rosa multiflora</i> | Multiflora Rose | Invasive |
| <i>Trapa natans</i> | Water-Chestnut | Invasive |

Invasives supplant native plants -- species that are valued in their own right and that are critical components in their local ecosystems -- they redesign the landscape and can limit human access to open space. By 2008, invasives were clearly in evidence in natural areas and the conservation community was sounding the alarm about this threat to landscapes and biodiversity. In the 2008 Open Space and Recreation Survey respondents commented that Harvard "should take care of the open space we have," and local organizations concurred. Since then, initiatives to control invasives in Harvard have been undertaken and recognized as exemplary models for other towns in the Commonwealth.

The first initiative has been ongoing in its current form since 2002 in response to non-native aquatic plants choking the waters of Bare Hill Pond. The Bare Hill Pond Watershed Management Committee (BHPWMC) has led a massive effort garnering research studies from consultants, funding from federal, state and town sources, requisite permits, plus public education and involvement to carry out storm water management in the watershed and annual drawdowns and hand weed-pulling in the pond to control the main culprits -- Eurasian milfoil, fanwort and water chestnut.

Harvard's Conservation Commission began its efforts in 2009 by authorizing a member to represent the Town on the newly formed SuAsCo Cooperative Invasive Species Management Area, an invasive plant consortium in the Sudbury, Assabet and Concord River SuAsCo) watersheds. This consortium, with early leadership from Mass Audubon, National Park Service, US Fish & Wildlife, and New England Wildflower Society offered an exchange of information among land managers learning to control invasives, as well as training and guidance to its members. With this support and the revitalization of the Commission's Land Stewardship Subcommittee in 2010, planning to control invasives on Town conservation land began to take shape.

The program for invasive plant management on Town conservation land, supported by Community Preservation Act funds, has been in place now for ten years. The greatest need and early focus had been in rehabilitating fields overrun by invasives. Fields on the Powell land, Great Elms, Williams, Clapp-Scorgie, Bare Hill Wildlife Sanctuary, and Herman Orchard have all benefited from significant work and are now able to be maintained with routine care. Currently, fields on Holy Hill, Dean's Hill, Shaker Reservoir and Haskell are active projects. Removing invasives that have spread into forested areas is another focus of the program. The extensive Japanese barberry infestation on Clapp-Scorgie has been mostly removed after years of concerted effort. Barberry will remain a priority target in woodlands while attention turns to glossy buckthorn and Norway maple as well. While variable year to year, annual spending has averaged \$13,000.

Harvard's conservation lands are highly valued by the community. Besides protecting the ecological integrity of conservation land so as to fulfill its roles cleaning water, supporting native plants, beneficial insects and wildlife and buffering the effects and mitigating drivers of climate change, invasives control makes land and trails physically accessible, esthetically enjoyable and can lower the density of deer ticks. Once invasives are brought under control, lands can be maintained more sustainably and often with less mowing. We are also protecting our landscape heritage as lands not heavily degraded by invasives become increasingly rare. One additional lesson learned from invasives, is the importance of consolidating larger areas of conservation land rather than smaller, scattered pieces of land that are vulnerable to invasives on abutting private land.



Before, during and after treatment of the Herman Orchard

Harvard Conservation Trust (HCT) also has an initiative for invasives on the protected lands they manage as an essential component of land stewardship. Through professional contractors and volunteers HCT has undertaken efforts on the Muller, WestOak, Dolan Mason and Burgess-Brown, Barba's Point, Callahan, Coke, Brehm, Horse Meadows Knoll, Eastern Greenway, May, the Crescent Valley CR trail easement and Stone Family Farm properties. Additional HCT support provided to the town's Conservation Commission at Clapp-Scorgie-Tufts, the Small Nature, Tripp and Shaker Spring House trails.

HCT intends to scale efforts to effectively manage invasives across all properties. Informed by experts on the Board of Trustees, as well as the Land Trust Alliance, MassLand and others, the HCT Stewardship Committee has been developing Management Plans for each property, which detail a range of issues that drive specific invasive species management protocols and interventions.

As part of the management plans, several properties are mowed regularly by volunteer stewards including a mowed path on WestOak, John's Field, the field on the May property, Dolan-Mason, and the fields at Burgess-Brown.

HCT's invasive management volunteer efforts have been expanded through a collaboration with the Bromfield School. As part of Bromfield's commitment to encouraging active citizenship and volunteerism, students must complete 40 hours of community service in order to graduate. In 2020, HCT and Bromfield collaborated to enable students to be of service to their community and learn about the natural habitats here in Harvard at the same time. Students are trained in HCT's "Boot Camp" to act as trail managers, invasive species strike teams, and new trail blazers. Currently student trail managers are trained to identify and effectively remove burning bush, multiflora rose, garlic mustard, Japanese barberry and honeysuckle. Supervisors for student trail teams - volunteers themselves - share their knowledge about the plants, wildlife, wetlands, orchards, even the old stone walls that make Harvard's natural landscape so unique. Now in its third year, students are clearly passionate about leaving a natural legacy here in Harvard.



2022 Bromfield student Trail Managers, with HCT Stewardship Committee member Gina Ashe, working to remove invasive plants at WestOak and Muller properties.

Climate Change

Through the town's Municipal Vulnerability Preparedness Project in 2019, the realities of climate change were reflected in the top issues of concern by residents: (1) Pests and invasive species, (2) Extreme precipitation and now drought, (3) Extreme temperatures and temperature swings, and (4) Ice storms.

Given the town's agricultural lands and the importance town residents place on these lands, these lands will be vulnerable to unseasonable weather like early springs, late frosts, ice storms, and damaging hail. The challenge of maintaining working agricultural lands as part of Harvard's landscape is growing, and possibly threatened by development, if the farmers cannot sustain their farms due to these challenges.

The forests and their biodiversity of plant and animal life is also threatened. Climate change threatens what can survive and thrive in a changing environment. As noted in an earlier section, changing climate is impacting the Bare Hill Pond watershed. Increased temperatures accompanied by drought and less frequent but larger storms, are stressing Bare Hill Pond, reducing dissolved oxygen and putting fish and aquatic species at risk.

Climate change brings threats to humans too. Outdoor related health risks such as mosquito and tick-borne illnesses are likely to increase. Adequate water supply, threats of forest fires during times of drought and storms that can down trees and power lines pose a increasing threat.

Climate change is proven to be caused by the greenhouse gases being emitted into the earth's atmosphere mostly due to fossil fuels which heat our buildings and power our cars. The data from a greenhouse inventory of Harvard in 2018 showed that 41% of Harvard's emissions are from buildings and 56% are from transportation. The Harvard Climate Initiative Committee is dedicated to reducing the carbon footprint by setting goals and actions the town and its residents can take.

One particular analysis of what Harvard can do to address climate change came from the Apple Country project. The Apple Country project was state funded and provided an analysis of the land, waterways and built environment in Harvard, Bolton and Devens, and recommended nature-based solutions. Nature based refers to conservation, ecological restoration and land management practices that protect, restore or enhance ecosystem carbon banks and carbon sequestration capacity in ecosystems such as forests, wetlands, grasslands and agricultural lands (Griscom et al 2017). One of the most important recommendations in addressing climate change is to protect land through purchase and conservation.

Wetlands, undisturbed soil and forests are important for carbon sequestration. Maintaining lands in conservation and adding more high priority lands, through purchase by the town or local land trusts, will not only add to reducing the town's carbon footprint but it will also protect biodiversity and intact ecosystems. Protection of wetlands and floodplains (identified by FEMA and otherwise) with their capacity to absorb flooding and retain water in drought will also be important to protect human interests in water resources.

Harvard is fortunate to have so many forested and open space lands and by protecting them, Harvard is not only reducing its greenhouse gases for the town, but other towns as well, as climate has no boundaries. What Harvard can do to protect these sensitive lands helps everyone, particularly those communities who do not have an abundance of natural resources. The land is something Harvard should strive to protect while the residents are encouraged to take the steps needed to reduce personal carbon footprints.



Wild Turkeys in April

Section 5: INVENTORY OF LAND

This section details the open space in Harvard – both protected and unprotected. Protected land includes all land that is protected from development by Article 97, Agriculture Preservation Restrictions (APR), Conservation Restrictions (CR), Preservation Restrictions (PR) and other means. It includes lands that are permanently protected by the Federal Government, Commonwealth, the Town, non-profit organizations or privately.

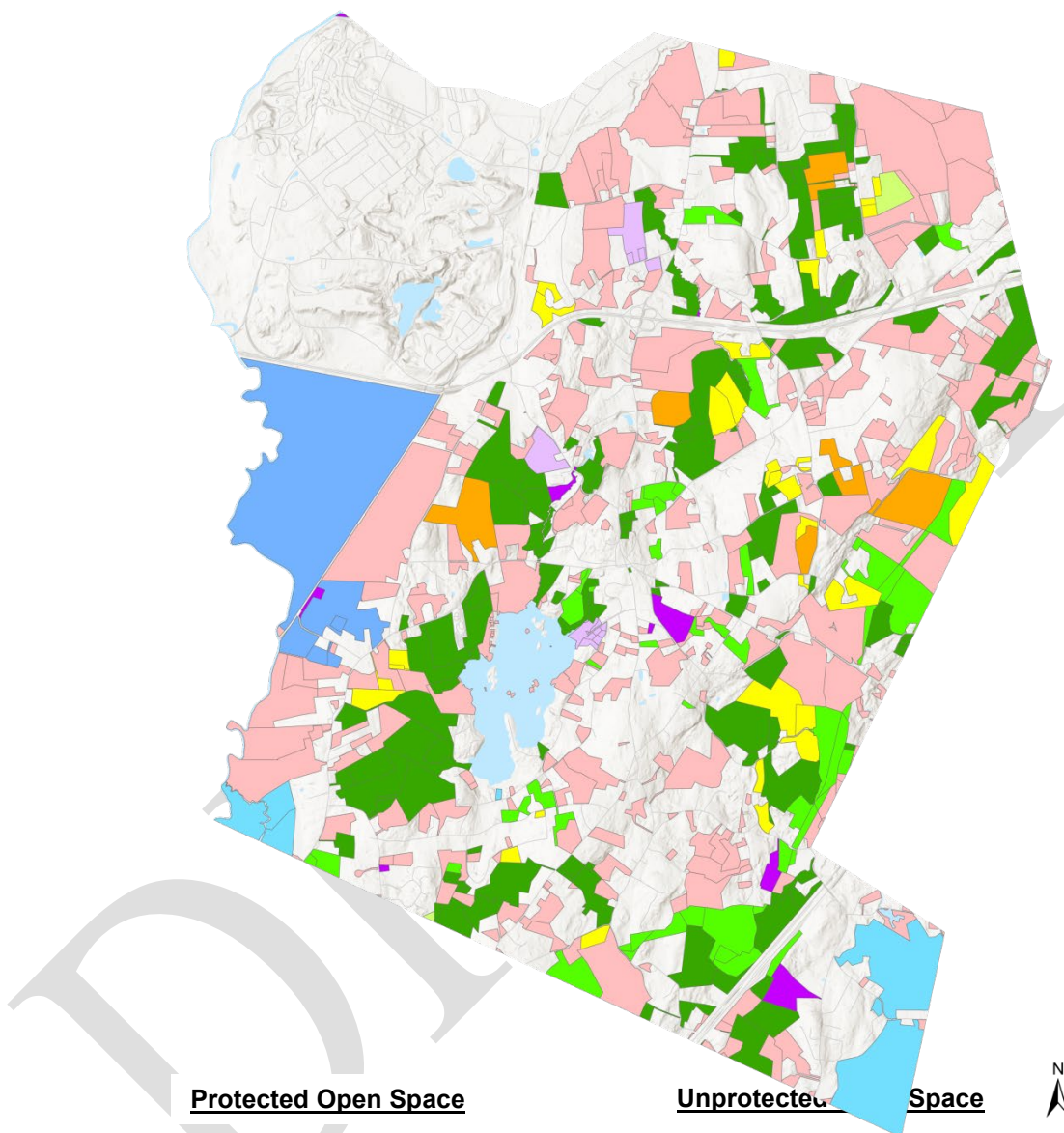
Unprotected land includes Municipal and Institutional land, which is vulnerable to development, as well as land held by the Harvard Conservation Trust and other non-profit organizations on which there is no Conservation Restriction. Other unprotected lands include those areas known as Chapter 61 land. These lands give a landowner the opportunity to reduce their property taxes in exchange for providing important benefits like clean water, wildlife habitat, rural character, wood products, food and outdoor recreation.

Table 5.1 - Open Space Land in Harvard

| Land Category | Acres | % of Harvard |
|--------------------------------------|--------------|--------------|
| Protected Open Space | | |
| APR | 295 | 2% |
| ComCom | 1675 | 12% |
| Federal & State | 1142 | 8% |
| Harvard Conservation Trust (with CR) | 69 | 1% |
| Park & Rec | 91 | 1% |
| Private CR, PR | 597 | 4% |
| TOTAL Protected Open Space | 3800 | 28% |
| Unprotected Open Space | | |
| Chapter 61 (forest) | 627 | 5% |
| Chapter 61a (agriculture) | 1211 | 9% |
| Chapter 61b (recreation) | 452 | 3% |
| Harvard Conservation Trust (w/o CR) | 473 | 3% |
| Non-profit Organizations | 490 | 4% |
| Private Open Space | 747 | 5% |
| Town without buildings | 452 | 3% |
| TOTAL Unprotected Open Space | 4453 | 33% |
| TOTAL all Open Space | 8253 | 61% |
| TOTAL all Harvard | 13611 | 100% |

This data was calculated from the Town of Harvard Assessor's 2022 database by examining land use codes. This is a departure from past OSRP's where the data was manually tabulated. As such, a comparison of data from previous OSRP's may not be valid due to methodology differences such as inclusion of "private open space" in this summary. It is believed that this new methodology provides a more accurate representation of the Town's open space. Notably, inclusion of privately owned open space not in Chapter 61 increases the percentage of open space in Harvard to 63%, only 29% of which is protected. Also of note is that large (e.g., 5+ acre) residential parcels are not included in the open space totals unless the land is listed as Chapter 61x land.

The assessor's database however does not identify APRs, CRs and PRs so these must be tabulated manually. To avoid double counting these protected parcels, they must be backed out of the data derived from the assessor's database. Since the restrictions do not necessarily cover an entire parcel, this can lead to small inconsistencies in how the parcels are categorized.



Map 5.1 - Protected and Unprotected Open Space in Harvard

A. Protected Land

Protected land is protected in perpetuity and can only be removed from this protection by a very complicated process. Protected land includes Town land owned by the Conservation and Park and Recreation Commissions, Town land managed by the Water Commission, State land under the control of the Department of Fisheries & Wildlife or Department of Conservation Services, Federal land under the control of U.S. Fish & Wildlife Service (Oxbow National Wildlife Refuge), and private land having a Conservation Restriction or an Agricultural Preservation Restriction in perpetuity. (See Map A.8 - Open Space).



Town Land

The following inventory includes both Conservation Land and Parks and Recreation Land. Conservation lands are managed by the Land Stewardship Subcommittee of the Conservation Commission, with ranges from undeveloped to agricultural. All conservation land is considered to be in good condition. Parks and Recreation lands are managed by the Parks and Recreation Commission for active outdoor recreation purposes. These parcels consist of soccer and lacrosse fields, playgrounds, walking trails and a track, as well as baseball and softball fields, and the town beach at Bare Hill Pond. The properties are considered to be in fair to good condition, as determined by a study done in 2023.

The Executive Office of Environmental Affairs Article 97 Land Disposition Policy requires land held by a public entity of state, regional or county government, or several other types of governmental authorities and districts, originally taken or acquired (or subsequently dedicated) for natural resources purposes, if it is to be transferred and/or converted to a different use is done so in a specific manner.

An Act Preserving Open Space in the Commonwealth, known as the Public Lands Preservation Act, was enacted in November 2022 established a formal process and criteria for submitting these “Article 97 bills” to the Legislature to authorize a new use and/or disposition. The obligations, in summary, include a written notification to the public and the Commonwealth, finding of necessity, alternatives analysis, replacement land, funding arrangements, any proposed funding-in-lieu of replacement, natural resource report, appraisal report, any waivers sought, approvals by public agencies, and submission of the authorizing legislation with some of that documentation to accompany it.

Table 5.2 - Conservation Land

| Area/Parcel Name | Location | Map/Parcel | Acreage | Date Purchased | Book/Page | How | Funding | Protect | Uses | Zoning |
|------------------------------|--------------------------------|--------------|---------|----------------|------------|-----|---------|---------|------|----------|
| Abbot Orchard | Bolton Road | 31.9.2 | 0.43 | 12/29/1983 | 8040/231 | G | 5 | | 3 | AR |
| Abbot Orchard | Bolton Road | 31.20 | 8.66 | 12/29/1983 | 8040/232 | G | 5 | | 3 | AR |
| Abbot Swampland | Woodside Road | 30.39 | 1.50 | 4/5/1963 | 4360/444 | G | 5 | 2 | 1 | AR, W |
| Abbot-Reed-Powell | East Bare Hill/Bolton Road | 31.21 | 1.49 | 8/21/1975 | 5781/338 | P | 1,2 | | 1 | AR |
| Abbot-Reed-Powell | East Bare Hill/Bolton Road | 31.22 | 2.00 | 9/18/1975 | 5792/214 | P | 1,2 | | 1 | AR |
| Abbot-Reed-Powell | East Bare Hill/Bolton Road | 31.35 | 29.40 | 8/14/1975 | 5777/164 | P | 1,2 | | 1 | AR |
| Ayer Road Meadows | Ayer Road | 8.36 | 23.90 | 7/1/1977 | 6223/264 | P | 2 | | 1 | AR, C, W |
| Bamford Land | Murray Lane | 28.36 | 1.60 | 12/5/2012 | 50070/323 | G | 5 | | 1 | AR |
| Barba's Point | Bare Hill Pond | 17C.3.2.1 | 16.10 | 2/26/1999 | 21088/3 | P | 2 | | 1 | AR |
| Barber Land | Shaker Road | 5.27 | 27.73 | 5/13/1969 | 4943/57 | G | 5 | | 1 | AR, W |
| Bare Hill Wildlife Sanctuary | Bolton Road | 30.109 | 44.00 | 4/5/1963 | 4360/444 | | | | | AR |
| Barlett Land | Pattee Road | 12.24 | 3.20 | 10/19/1993 | 15664/10 | G | 5 | | 1 | AR |
| Barrett Land | Massachusetts Avenue | 23.35 | 24.11 | 5/20/2016 | 55358/55 | B | 2,3 | 1 | 1,2 | AR, W |
| Barton 2 | Woodside Road | 30.13 | 1.97 | 9/30/1970 | 26604/7667 | G | 5 | | 1 | AR, W |
| Barton 3 | Bowers Brook/Still River Road | 17C.17 | 15.40 | 1/13/1972 | 5188/452 | G | 5 | | 1 | AR, W |
| Barton 4 | Abuts Bowers Brook | 17A.9 | 23.80 | 1/13/1972 | 5188/397 | G | 5 | | 1 | AR, W |
| Beth Hill Land | Bolton Road/Mass Ave | 22B.20 | 0.04 | 5/1/1963 | | | | | | AR |
| Black Pond Access | Littleton County Road | 14.55 | 3.34 | 12/17/1987 | 11018/358 | P | 2 | | 1 | AR |
| Black Pond | Littleton County Road | 10.60 | 56.49 | 12/17/1987 | 11018/360 | P | 2 | | 1 | AR |
| Blomflet | Ayer Road | 5.80 | 29.42 | 11/28/1978 | 6626/58 | P | 2 | | 1 | AR, C |
| BOCA Land | Old Shirley Road | 8.52 | 3.90 | 7/14/1993 | 15369/65 | G | 5 | | 1 | AR |
| Bowers Spring-Sprague | West of Bolton Road | 30.102 | 18.90 | 5/24/1973 | 5358/273 | P | 1,2 | | 1 | AR |
| Bowers Spring-Visockas | West of Bolton Road | 30.100 | 24.09 | 5/24/1973 | 5342/315 | P | 1,2 | | 1 | AR, W |
| Brewer Land | South of Herman Orchard | 12.74 | 3.25 | 9/19/1980 | 7064/9 | P | 2 | | 1 | AR, W |
| Brown Land | Glenview Drive/South Shaker Rd | 5.71 | 3.49 | 12/21/1984 | 8501/279 | G | 5 | | 1 | AR |
| Bull Land | Cruft Lane | 13.2 | 0.66 | 5/5/1983 | 7751/282 | G | 5 | | 1 | AR, W |
| Bush Land | I-495 | 32.46 | 6.10 | 1/31/1975 | 5661/39 | P | 2 | | 1 | AR, W |
| Carey Land | Still River Road | 21.20 | 2.92 | 11/13/1995 | 54150/386 | T | | | 1 | AR |
| Charles Atherton Case Land | Bolton Road | 30.102.1 | 2.02 | 5/17/2016 | 55339/19 | G | | | 1 | AR |
| Clapp Land 1 | Still River Road | 21.61 | 37.61 | 12/31/1979 | 6901/231 | G | 5 | 3 | 1 | AR |
| Clapp Land 2 & 3 | Willard Lane | 21.75 | 8.00 | 10/17/1980 | 7807/1 | P | 2 | 3 | 1 | AR, W |
| Cobb Land 1 | Oak Hill Road | 18.57 | 4.50 | 11/29/1984 | 8466/106 | G | 5 | | 1 | AR |
| Cobb Land 2 | Oak Hill Road | 18.60 | 2.52 | 12/18/1987 | 11000/256 | G | 5 | | 1 | AR |
| Coke Land | Littleton Road | 12.73 | 32.15 | 6/26/1972 | 5232/493 | P | 1,2 | | 1 | AR, W |
| Colwell Land | Bolton Road | 30.99 | 2.70 | 12/29/1988 | 11840/329 | G | 5 | | 1 | AR |
| Corzine Land | Littleton Road | 13.21 | 3.00 | 12/29/1988 | 11840/327 | G | 5 | | 1 | AR |
| Daman Land | Brown Road | 36.93.7 | 34.80 | 2/29/2016 | 55001/101 | G | 5 | | 1 | AR |
| Dean's Hill | Prospect Hill Road | 16.13 | 32.00 | 7/16/2004 | 34130/218 | P | 2 | 3 | 1 | AR |
| Dunlap | Old Littleton Road | 18.69&70 | 34.08 | 2/24/2009 | 43843/377 | G | 5 | | 1,2 | AR |
| Eastview (Elwell) Land | Ayer Road | 17B.35 - .37 | 7.13 | 5/1/1995 | 17014/34 | P | 2 | | 1 | AR |
| Eastview (Elwell) Land | Ayer Road | 17D.6 | 1.40 | 3/1/1981 | | | | | | AR |

| Area/Parcel Name | Location | Map/Parcel | Acreage | Date Purchased | Book/Page | How | Funding | Protect | Uses | Zoning |
|--------------------------|-------------------------------|-----------------|---------|----------------|-------------|-----|---------|---------|------|--------|
| Farnsworth Land | Willard Lane | 26.13 | 39.00 | 5/5/1983 | 175/1283 | T | | | 1 | AR, W |
| Fuller Dudley Woods | Old Littleton Road | 18.14 | 6.40 | 2/24/2009 | 43843/377 | G | 5 | | 1,2 | AR |
| Fuller Dudley Woods 2 | Old Littleton Road | 18.14 | 3.81 | 3/25/2015 | 53508/198 | P | 3 | 1 | 1,2 | AR |
| Gillette/Horse Meadows | Sherry Road | 24.2 | 20.04 | 6/27/1998 | 11427/98 | P | 2 | | 1 | AR, W |
| Great Elms | Murray Lane | 28.18 | 2.20 | 9/17/1990 | 51025/11849 | T | | | 3,2 | AR |
| Great Elms | Murray Lane | 28.19 | 6.10 | 5/23/1989 | 12112/158 | T | | | 3,2 | AR |
| Great Elms | Murray Lane | 28.25.1 | 60.88 | 8/15/1985 | 41714/10782 | T | | | 3,2 | AR |
| Griffin/Dutcher Land | Woodside Road | 30.38.2 | 2.25 | 6/21/1985 | 41463/10738 | G | 5 | | 1 | AR, W |
| Hammershaimb Land | Woodchuck Hill/Route 111 | 23.48 | 1.10 | 12/4/1995 | 17513/388 | G | 5 | | 1 | AR |
| Harvard Historical | Oak Hill/Old Boston Road | 17D.46 | 1.50 | 11/25/1975 | 8786/--- | G | 5 | | 1 | AR |
| Haskell Land | Still River Road/Willard Lane | 25.24 | 12.83 | 11/22/1977 | 6343/70 | P | 1,2 | 3 | 3 | AR |
| Haskell-Viles Swamp | Woodside Road | 30.40 | 4.30 | 11/3/1966 | 4714/203 | G | 5 | | 1 | AR, W |
| Herman Orchard | East of Ayer Road | 12.59 | 50.00 | 7/30/1976 | 5993/142 | P | 2 | | 1 | AR |
| Hoch Land | Still River Road | 29.2 | 11.41 | 3/12/2013 | 50567/294 | P | 2,3 | 1 | 1,2 | AR |
| Holy Hill (A1) | Simon Atherton Road | 2.38 | 8.70 | 12/29/1972 | 5297/435+ | P | 2 | | 1 | AR, W |
| Holy Hill (A2) | Shaker Road | 2.39 | 4.65 | 12/29/1972 | 5297/435+ | P | 2 | | 1 | AR |
| Holy Hill (B2) | Ann Lee Road | 5.45 | 9.38 | 1/11/1973 | 5300/556 | G | 5 | | 1 | AR |
| Holy Hill (A4) | Simon Atherton Road | 5.44 | 3.75 | 12/29/1972 | 5297/435+ | P | 2 | | 1 | AR, W |
| Holy Hill (A5) | Ann Lee Road | 5.56 | 5.63 | 12/29/1972 | 5297/433+ | P | 2 | | 1 | AR, W |
| Holy Hill (A6) | Ann Lee Road | 5.57 | 5.13 | 12/29/1972 | 5297/435 | P | 2 | | 1 | AR |
| Holy Hill (A7) | Ann Lee Road | 5.58 | 31.57 | 12/27/1983 | 8036/42 | P | 2 | | 1 | AR |
| | | | | 12/29/1972 | 5297/435 | P | 2 | | 1 | AR |
| Holy Hill (A8) | Ann Lee Road | 5.42.2 | 0.90 | 12/27/1983 | 8036/42 | G | 5 | | 1 | AR |
| Holy Hill (B1) | Shaker Road | 5.28 | 7.85 | 1/11/1973 | 5300/556 | G | 5 | | 1 | AR |
| Holy Hill (B3) | Shaker Road | 5.31 | 0.92 | 8/27/1975 | 5785/316 | P | 2 | | 1 | AR |
| Holy Hill (C) | South Shaker Road | 9.47 | 9.53 | 12/29/1972 | 5297/438 | P | 2 | | 1 | AR |
| Holy Hill (D) | Shaker Road | 5.42.1 | 9.89 | 12/12/1977 | 6360/49 | G | 5 | | 1 | AR |
| Holy Hill/Sullivan | Shaker Road | 9.51.3 | 9.53 | 7/13/1984 | 8275/347 | P | 2 | | 1 | AR, W |
| Holy Hill/Shaker Meadows | Ann Lee Road | 2.57/5.91,103 | 12.66 | 12/29/1972 | 5297/435 | P | 2 | | 1 | AR, W |
| Horne Land | North of Still River Road | 16.14/17C.21.02 | 9.40 | 1/18/1966 | 4636/414 | G | 5 | | | AR, W |
| Hosking Point | Still River Road | 21.49 | 1.70 | 11/5/2003 | 32161/191 | P | 2 | | 1 | AR |
| Kaufmann Land | South Shaker Road | 9.30 | 20.21 | 7/19/1979 | 6780/103 | T | | | 1 | AR |
| Klyce Land | Bowers Brook/Hermann Orchard | 12.74 | 2.25 | 9/19/1980 | 7064/9 | P | 2 | | | AR, W |
| Kronauer Land | Sheehan Road | 6.10 | 5.35 | 12/31/1970 | 5085/454 | G | | 3 | 1 | AR, W |
| Locke Land | Green Hill Road | 10.41 | 0.33 | 5/16/2003 | 14921/80958 | P | 3 | 3 | 1 | AR |
| Locroix Land | Green Hill Road | 10.33 | 16.00 | 5/5/1983 | 7751/282 | T | | | 1,2 | AR |
| Luongo Land | Still River Road | 25.32.1 | 26.48 | 11/20/2002 | 28153/206 | P | 4 | 3 | 1 | AR, W |
| MacKnight Land | Littleton Road | 9.64 | 4.18 | 5/23/1989 | 12112/156 | G | | | 1 | AR |
| Maxant Land | Ayer/Lancaster County Road | 4.48.3.4 | 19.04 | 12/28/1987 | 46776/11358 | G | | 3 | 1 | AR |
| Myrick Lane | Myrick Lane | 2.13,14 | 0.34 | 1/11/1911 | | | | | | AR |

| Area/Parcel Name | Location | Map/Parcel | Acreage | Date Purchased | Book/Page | How | Funding | Protect | Uses | Zoning |
|----------------------------|------------------------------|-------------|---------|----------------|------------|-----|---------|---------|-------|--------|
| Newman 2 | Prospect Hill Road | 11.13 | 6.69 | 11/21/2013 | 51768/317 | G | 5 | | 1 | AR |
| Newick Land | Under Pin Hill Road | 17C.21.1,47 | 5.68 | 12/7/1967 | 4816/491 | G | | 3 | 1 | AR, W |
| Old Littleton Meadow | Old Littleton Road | 10.26 | 8.10 | 8/16/1991 | 13585/320 | T | | | 1 | AR |
| Old Mill Road | Old Mill Road | 4.11.1 | 24.00 | 11/29/1991 | 13794/292 | G | 5 | | 1 | AR |
| Pena/Fairbank | Brown Road | 35.23.1 | 4.90 | 11/21/1995 | 17483/241 | G | 5 | | 1 | AR |
| Perini Land A & B | Stow Road/I-495 | 32.45,47 | 36.29 | 10/5/1973 | 5392/55 | P | | 3 | 1 | AR |
| Pin Hill/Cram Land | Harvard Depot Road | 12.48 | 10.20 | 7/17/1981 | 7277/186 | P | | | 1 | AR |
| Pin Hill/Wilfert Land | Harvard Depot Road | 17A.15 | 4.68 | 6/28/1977 | 6218/219 | P | | | 1 | AR |
| Poitrass | Willard Lane | 26.12 | 13.37 | 10/5/1973 | 5392/21 | P | | | 1 | AR |
| Prospect Hill (Newman) | Prospect Hill Road | 11.16 | 61.51 | 12/8/1971 | 178/394 | G | 5 | | 1 | AR |
| Rennie Land | Sheehan/Littleton Road | 10.13 | 5.10 | 8/11/1998 | 7030/141 | G | 5 | | 1,3 | AR, W |
| Robb Land | Fairbank/Old Boston Road | 22B.9.02 | 1.77 | 12/16/1987 | 11013/74 | G | 5 | | 1 | AR |
| Rodriguez Land | Hermann Orchard/Bowers Brook | 13.4 | 5.35 | 9/24/1982 | 7561/310 | G | 5 | | 1,2 | AR, W |
| Rodriguez Land 2 | Cruft Lane | 13.3.2 | 7.86 | 10/2/1985 | 8766/165 | G | 5 | | 1 | AR, W |
| Rowe Land | Sherry Road | 24.4-7 | 6.34 | 12/27/1982 | 76384/113 | G | 5 | | 1 | AR |
| Reuben Reed Land | Ayer Road | 17D.58 | 0.32 | 8/29/1968 | 4879/508 | G | 5 | 3 | 1 | AR |
| Russo Land | Granite View | 9.28.01.07 | 21.13 | 11/12/1993 | 15753/122 | G | 5 | | 1 | AR |
| Schmidt (Doebele) Land | Mill/Under Pin Hill Road | 12.40.2 | 4.96 | 12/29/1988 | 11840/328 | G | 5 | | 1 | AR |
| Scorgie Land | Still River Road | 21.60 | 34.00 | 10/23/1969 | 4987/20 | P | 1,2 | | 1,2 | AR |
| Shaker Reservoir | Shaker Road | 5.18 | 2.06 | 12/30/2015 | 54769/244 | G/P | | | 1 | AR |
| Shapley Land | Pinnacle Road | 18.18 | 9.10 | 12/29/1975 | 5866/7 | G | 5 | 3 | 1,2 | AR |
| Sisters of St. Scholastica | Still River Road | 25.35 | 7.81 | 12/1/1997 | 19394/59 | P | 1 | 3 | 1 | AR |
| Slattery Land#1 | Abuts Coke land | 12.72 | 5.00 | 10/8/1969 | 4986/123 | G | 5 | 3 | 1 | AR |
| Slattery Land#2 | Stow Road | 32.49 | 12.80 | 4/28/1977 | 6168/363 | P | 2 | 3 | 1 | AR, W |
| Smith Land | Oak Hill Road | 18.48 | 2.51 | 3/31/2006 | 3868/388 | G | 5 | 1 | 1 | AR |
| Smith Land | Still River Road | 16.22 | 3.50 | 7/2/1974 | 5531/84 | B | 1,2 | | 1 | AR |
| Smith Land | Littleton County Road | 14.56 | 12.79 | 11/20/2018 | 59712/286 | P | 3 | 1,2 | 1,2 | AR |
| Sprague Land #1 | West Bare Hill Road | 26.14 | 48.56 | 7/10/1981 | 7272/174 | B | 2 | | 1,2,3 | AR |
| Sprague Land #2 | West Bare Hill Road | 26.17.4.2 | 5.50 | 1/20/1999 | 20940/10 | P | 1,2 | | 1 | AR |
| Sprague Land #3 | West Bare Hill Road | 26.17.04 | 56.46 | 1/20/1999 | 20940/11 | P | 1,2 | | 1 | AR, W |
| Stephenson #1 | I-495 | 36.91.1 | 25.00 | 2/17/1978 | 6400/203 | T | | | 1 | AR |
| Stephenson #2 | I-495 | 36.97 | 6.00 | 2/17/1978 | 6400/203 | T | | | 1 | AR |
| Stephenson #3 | I-495 | 36.90 | 10.80 | 2/17/1978 | 6400/203 | T | | | 1 | AR, W |
| Stephenson#4 | Brown Road | 35.18 | 0.22 | 2/17/1978 | 6400/203 | T | | | 1 | AR |
| Stephenson #5 | Brown Road | 35.14 | 11.10 | 2/17/1978 | 6400/203 | T | | | 1 | AR, W |
| Stone Land | Old Mill Road | 4.55 | 6.00 | 11/20/2002 | 28153/214 | P | 4 | | 1 | AR |
| Sturdy Land | Slough Road | 23.7 | 10.23 | 3/25/1981 | 7194/223 | G | 5 | | 3 | AR |
| Terry Land | Bare Hill Pond | 22A.36 | 7.38 | 5/30/1990 | 12809/221 | G | 5 | | 1 | AR, W |
| Thurston's Cove | Warren Avenue | 27.12 | 2.70 | 7/30/1979 | 34726/9553 | G | 5 | | 1 | AR |

| Area/Parcel Name | Location | Map/Parcel | Acreage | Date Purchased | Book/Page | How | Funding | Protect | Uses | Zoning |
|------------------|-----------------------------|--------------|---------|----------------|------------|-----|---------|---------|------|--------|
| TOAD Land | Old Littleton Road | 10.45 & 53 | 1.16 | 10/31/1973 | 5339/118 | | | | 1 | AR |
| Town Forest | Poor Farm Road | 9.61 | 2.20 | 3/22/1969 | 0/0 | T | | | 1 | AR |
| Town Forest | Poor Farm Road | 9.20 | 9.00 | 3/22/1969 | 11111/1111 | T | | | 1 | AR |
| Town Forest | Poor Farm Road | 13.13 | 29.00 | 3/22/1969 | 0/0 | T | | | 1 | AR |
| Tripp Land | Brown Road | 35.10 | 44.00 | 8/31/2001 | 24752/354 | P | 2 | 1 | 1 | AR |
| Tufts Land #1 | Turner Lane | 21.58 | 23.80 | 5/24/1969 | 4946/235 | P | 2 | | 1 | AR |
| Tufts Land #2 | Still River Road | 16.21 | 15.00 | 7/2/1974 | 5531/85 | P | 2 | | 1 | AR |
| Tully Land | Behind Ryan Athletic Fields | 17A.11 | 11.50 | 4/25/1972 | 5215/330+ | P | 1,2 | 3 | 1 | AR |
| Vesenska Land | Littleton County Road | 14.53.3-4 | 24.53 | 10/18/1999 | 21955/15 | P | 2 | 3 | 1 | AR |
| White Lane | White Lane | 9.16.401.1.6 | 19.97 | 11/8/2003 | 32161/199 | G | 5 | | 1 | AR |
| Willard Land | Willard Lane | 26.4 | 48.50 | 2/27/2015 | 53415/369 | P | 3 | 1 | 1,2 | AR |
| Williams Land | Stow Road | 28.14 | 64.25 | 7/1/1982 | 7501/349 | P | 2 | 3 | 1 | AR, W |
| Williams Pond | Stow Road | 28.16 | 5.20 | 1/10/1966 | 4634/444 | G | 5 | | 1 | AR, W |
| Willow Road Land | Willow Road | 22A.31 | 2.85 | 3/13/2002 | 13962/129 | T | | | 1 | AR |

How

G = Grant
P = Purchase
T = Transfer

Funding

1 = State/Federal
2 = Harvard Conservation Fund
3 = Community Preservation Act
4 = Other Municipal
5 = Gift
6 = Tax Taking
7 = Unknown

Protection

1 = Article 97
2 = Conservation Restriction
3 = Permit Conditions
4 = Deed Restrictions

Uses

1 = Conservation & Passive Recreation
2 = Trails
3 = Agricultural & Community Gardens
4 = Playing Fields

Zoning

AR = Agricultural/Residential
B = Business
C = Commercial
W = Watershed Protection & Floodplain

Table 5.3 - Parks and Recreation Land

| LOCATION | Map | Parcel | Lot | Use Code | ACRES | Date Purchased | Book/Page | How | Funding | Protect | Uses | Zoning |
|-------------------|-----|--------|-----|----------|-------|----------------|--------------|-----|---------|---------|------|--------|
| LANCASTER CNTY RD | 8 | 62 | 4 | 9300 | 5.05 | 2/18/1999 | 21051 / 0025 | G | 5 | 1 | 4 | C |
| LANCASTER CNTY RD | 8 | 21 | 1 | 9300 | 1.75 | 7/22/1998 | 20209 / 0216 | P | 4 | 1 | 4 | AR |
| LANCASTER CNTY RD | 8 | 21 | 2 | 9300 | 30.34 | 7/22/1998 | 20209 / 0216 | P | 4 | 1 | 4 | AR |
| LANCASTER CNTY RD | 8 | 21 | 3 | 9300 | 1.76 | 7/22/1998 | 20209 / 0216 | P | 4 | 1 | 4 | AR |
| DEPOT RD-HARVARD | 12 | 1 | 2 | 9310 | 30.33 | 7/1/1983 | 7817 / 0228 | P | 4 | 1 | 4 | AR,W |
| POND RD | 22 | 11 | | 9300 | 1.16 | 6/29/1978 | 6496 / 0313 | G | 5 | 1 | 1 | AR,W |
| POND RD | 22 | 12 | | 9300 | 1.06 | 7/16/1974 | 0000 / 0000 | P | 4 | 1 | 1 | AR |
| POND RD | 22 | 13 | | 9300 | 1.28 | 12/4/1957 | 3910 / 557 | P | 6 | 1 | 1 | AR,W |
| POND RD | 22 | 14 | | 9310 | 8.27 | 6/9/1947 | 3060 / 0409 | P | 4 | 1 | 1 | AR,W |
| WHITMAN RD | 22 | 8 | | 9300 | 2.91 | 12/3/1957 | 0000 / 0000 | P | 6 | 1 | 1 | AR,W |
| WHITMAN RD | 22 | 9 | | 9300 | 1.51 | 7/16/1974 | 0000 / 0000 | P | 4 | 1 | 1 | AR,W |
| WHITMAN RD | 22 | 10 | | 9300 | 1.25 | 7/16/1974 | 0000 / 0000 | P | 4 | 1 | 1 | AR,W |

Protection

- 1 = Article 97
- 2 = Conservation Restriction
- 3 = Permit Conditions
- 4 = Deed Restrictions

How

- G = Grant
- P = Purchase
- T = Transfer

Funding

- 1 = State/Federal
- 2 = Harvard Conservation Fund
- 3 = Community Preservation Act
- 4 = Other Municipal
- 5 = Gift
- 6 = Tax Taking
- 7 = Unknown

Uses

- 1 = Conservation & Passive Recreation
- 2 = Trails
- 3 = Agricultural & Community Gardens
- 4 = Playing Fields

Zoning

- AR = Agricultural/Residential
- B = Business
- C = Commercial
- W = Watershed Protection & Floodplain

Conservation Restriction and Agricultural Preservation Restriction Land

Conservation Restrictions (CR) are deed restrictions that provide perpetual protection of privately owned open space. They are intended to keep the land in a natural, open, or scenic condition or in farming or forestry. Agricultural Preservation Restrictions (APR) occur when the development rights to a property are bought by a government agency or private, non-profit organization with the purpose of keeping the land in agriculture in perpetuity.

Table 5.4 - Conservation Restriction and Agricultural Preservation Land

| OWNER | LOCATION | Map | Parcel | Lot | Unit | Use Code | Restricted Acres | USE | Restriction Held By | PUBLIC ACCESS |
|---------------------------|-----------------------|-----|--------|-----|------|----------|------------------|-----|---------------------|---------------|
| Camel Needle Eye Corp. | Ayer Road | 12 | 58 | | | 3930 | 31.30 | APR | Town | Limited |
| Carlson Orchards | Oak Hill Road | 18 | 63 | 1 | | 7140 | 18.90 | APR | Town | Limited |
| Carlson Orchards | Old Littleton Road | 13 | 62 | | | 7140 | 12.77 | APR | Town | Limited |
| Carlson Orchards | Old Littleton Road | 13 | 69 | 1 | | 7140 | 17.56 | APR | Town | Limited |
| Community Harvest Project | Prospect Hill | 16 | 11 | | | 950V | 70.60 | APR | State/Town | Limited |
| Moran | Shaker Road | 5 | 34 | | | 3930 | 7.30 | APR | Town | None |
| Moran | Shaker Road | 5 | 36 | | | 3930 | 27.70 | APR | Town | None |
| Westward Orchard | Littleton County Road | 19 | 4 | | | 170 | 75.32 | APR | Town | Limited |
| Westward Orchard | Oak Hill Road | 23 | 8 | | | 170 | 34.00 | APR | Town | Limited |
| Bilodeau | Murray Lane | 28 | 24 | | | 7190 | 16.88 | CR | HCT | None |
| Carlson Orchards | Pinnacle Road | 18 | 63 | 2 | | 7140 | 7.00 | CR | HCT | None |
| Clapp | Still River Road | 21 | 64 | 2 | 1 | 1010 | 2.67 | CR | Town | None |
| Coleman | Poor Farm Road | 9 | 1 | 2 | | 1010 | 11.90 | CR | HCT | Limited |
| Deer Run Realty Trust | Lancaster County Road | 8 | 68 | 11 | | 995 | 20.91 | CR | Town | Limited |
| Dickason | Still River Road | 21 | 64 | 2 | | 1320 | 8.20 | CR | Town | None |
| Endicott | Littleton County Road | 23 | 21 | 1 | | 160 | 30.66 | CR | HCT | None |
| Ernst | Murray Lane | 28 | 22 | | | 170 | 13.50 | CR | HCT | None |
| Ernst | Murray Lane | 28 | 21 | | | 6010 | 50.00 | CR | HCT | None |
| Fairway Partners | Trail Ridge Way | 14 | 69 | 5 | | 995 | 28.00 | CR | Town | Limited |
| Fidele | Murray Lane | 28 | 25 | 6 | | 1320 | 6.60 | CR | Town | None |
| Finnegan | Oak Hill Road | 18 | 49 | 3 | | 1320 | 2.40 | CR | HCT | Limited |
| Foster | Sheenan Road | 5 | 2 | 2 | | 1320 | 4.50 | CR | NE Forestry | Limited |
| Franzen | Woodside Road | 30 | 32 | | | 1010 | 7.15 | CR | Town | Trails |

| OWNER | LOCATION | Map | Par cel | Lot | Unit | Use Code | Restricted Acres | USE | Restriction Held By | PUBLIC ACCESS |
|----------------------------|-----------------------|-----|------------|-----|------|-------------|---------------------|-----|------------------------|------------------|
| Guszwa | Old Meadow Lane | 13 | 70 | 2 | 8 | 1010 | 2.49 | CR | HCT | None |
| Harvard Conservation Trust | Sherry Road | 24 | 3 | | | 950V | 47.70 | CR | SVT | Trails |
| Harvard Conservation Trust | Harris Lane | 29 | 4 | 4 | | 950V | 13.74 | CR | HCT | Trails |
| Harvard Conservation Trust | Slough Road | 22B | 48 | ? | | 950V | 3.08 | CR | Town | Trails |
| Harvard Conservation Trust | Slough Road | 23 | 4 | 0 | | 950V | 4.19 | CR | Town | Trails |
| Kemeza | South Shaker Road | 9 | 49 | 1 | | 1040 | 4.52 | CR | HCT | None |
| KWW Harvard LLC | East Bare Hill Road | 31 | 34 | | | 7180 | 10.52 | CR | HCT | None |
| Magoun | Old Meadow Lane | 13 | 70 | 2 | 6 | 1010 | 1.50 | CR | HCT | None |
| Maxant | Willard Lane | 21 | 73 | | | 170 | 20.47 | CR | HCT | None |
| Maxant | Willard Lane | 21 | 65 | 2 | | 7130 | 2.67 | CR | Town | None |
| Maxant / Delker | Ayer Rd | 2 | 8 | | | 7130 | 6.50 | CR | Town | None |
| Mayerson/Shulman | Stow Road | 28 | 25 | 7 | | 1320 | 9.05 | CR | Town | None |
| Muller | Shaker Road | 5 | 26 | | | 1010 | 2.53 | CR | HCT | None |
| Muller | Shaker Road | 5 | 26 | 1 | | 1320 | 4.38 | CR | HCT | None |
| Murphy | West Bare Hill Road | 27 | 148 | | | 1320 | 1.50 | CR | HCT | None |
| Nestler | Cruft Lane | 13 | 3 | 1 | | 160 | 20.50 | CR | HCT | Limited |
| Nestler | Cruft Lane | 13 | 5 | | | 160 | 13.94 | CR | HCT | Limited |
| New England Forestry | Shaker Road | 6 | 2 | 1 | | 950V | 24.32 | CR | HCT | None |
| Pinnacle Hill Realty Trust | Old Meadow Lane | 13 | 70 | 2 | 7 | 1320 | 3.00 | CR | Town | None |
| Rathore | Mettacomett Path | 31 | 67 | | | 160 | 13.53 | CR | HCT | None |
| Smith | Littleton County Road | 14 | 56 | | | 9320 | 12.80 | CR | Littleton CT | None |
| South Shaker Barn | Shaker Road | 9 | 49 | 1 | | 1040 | 1.50 | PR | HCT | None |
| Thayer | South Shaker Road | 9 | 29 | | | 1010 | 5.50 | CR | HCT | None |
| ToH - Dean's Hill | Depot Road | 16 | 13 | | | 9320 | 34.50 | CR | HCT | Trails |
| ToH - Dunlap | Old Littleton Road | 18 | 69 | | | 9320 | 4.40 | CR | HCT | Trails |
| ToH - Dunlap | Old Littleton Road | 18 | 70 | | | 9320 | 29.68 | CR | HCT | Trails |
| ToH - Fuller Dudley Woods | Old Littleton Road | 18 | 14 | | | 9320 | 10.21 | CR | HCT | Trails |
| ToH - Hoch | Still River Road | 29 | 2 | | | 9320 | 11.41 | CR | HCT | Trails |
| ToH - Smith | Oak Hill Road | 18 | 48 | | | 9320 | 2.51 | CR | HCT | None |
| ToH - Tripp | Brown Road | 35 | 10 | | | 9320 | 44.00 | CR | HCT | Trails |
| ToH - White Lane | White Lane | 9 | 16 | 401 | 1 | 9320 | 17.70 | CR | Town | Trails |
| ToH - White Lane | White Lane | 9 | 16 | 401 | 6 | 9320 | 2.30 | CR | Town | Trails |

Commonwealth, Federal, and Town Land

The following inventory of lands are under the management and control of the Commonwealth, the Federal Government, or the Harvard Water & Sewer Commission.

The Delaney Wildlife Management Area comprises 580 acres within the towns of Harvard, Bolton, Stow, and Boxborough. It contains extensive wildlife and recreational resources and also serves as a flood control area for the Assabet Brook. The Oxbow National Wildlife Refuge is located along the Nashua River and consists primarily of woodland, marsh, and oxbows of the Nashua River. To the south of the Oxbow Refuge is the Bolton Flats Wildlife Management Area that extends into Bolton and Lancaster along the Nashua River and is administered by the Department of Fish and Wildlife. It consists of agricultural and undeveloped areas.

Since the closure of Ft. Devens, approximately 900 acres of wetlands and land along the Nashua River, north of Route 2, have been transferred to U.S. Fish & Wildlife Service for inclusion in the Oxbow National Wildlife Refuge. Should the Army declare the land south of Route 2 (South Post) excess, federal legislation requires its transfer to U.S. Fish & Wildlife Service.

Table 5.5 - Commonwealth, Federal and Town Land

| NAME | USE | LOCATION | Map | Par cel | Lot | Use Code | ACRES | Owned By | Managed By |
|-----------------------|----------------------------|------------------------|-----|------------|-----|-------------|--------|--------------------|------------|
| Bolton Flats | Trails/Wildlife Management | Still River Rd | 25 | 2 | | 9110 | 40.00 | Commonwealth of MA | DFW |
| Bolton Flats | Trails/Wildlife Management | Still River Rd | 25 | 3 | | 9110 | 24.80 | Commonwealth of MA | DFW |
| Bolton Flats | Trails/Wildlife Management | West Bare Hill Rd | 29 | 7 | | 9110 | 23.00 | Commonwealth of MA | DFW |
| Delaney Wildlife | Wildlife Management | Finn Rd | 32 | 26 | | 920V | 146.00 | Commonwealth of MA | DFW |
| Delaney Wildlife | Wildlife Management | Finn Rd | 36 | 26 | | 920V | 3.60 | Commonwealth of MA | DFW |
| Delaney Wildlife | Wildlife Management | Finn Rd | 38 | 15 | | 920V | 115.00 | Commonwealth of MA | DFW |
| Oxbow Wildlife Refuge | Trails/Wildlife Management | Depot Rd - Still River | 20 | 12 | 4 | 900V | 4.70 | Federal | US DFW |
| Oxbow Wildlife Refuge | Trails/Wildlife Management | Depot Rd - Still River | 20 | 12 | 5 | 900V | 8.70 | Federal | US DFW |
| Oxbow Wildlife Refuge | Trails/Wildlife Management | Depot Rd - Still River | 20 | 16 | | 900V | 4.10 | Federal | US DFW |
| Oxbow Wildlife Refuge | Trails/Wildlife Management | Depot Rd - Still River | 20 | 20 | 1 | 900V | 84.00 | Federal | US DFW |
| Oxbow Wildlife Refuge | Trails/Wildlife Management | Still River Rd | 11 | 32 | | 900V | 662.00 | Federal | US DFW |
| Oxbow Wildlife Refuge | Trails/Wildlife Management | Still River Rd | 20 | 12 | 1 | 900V | 24.00 | Federal | US DFW |
| Pinnacle Fire Tower | Fire Protection | Pinnacle Rd | 18 | 20 | | 9100 | 0.25 | Commonwealth of MA | DCR |
| Thurston's Beach | Pond Access | Tahanto Tr | 26 | 34 | | 9100 | 1.60 | Commonwealth of MA | DCR |
| Town Reservoirs | Public Water Supply | Bolton Rd | 22 | 25 | | 9300 | 16.00 | Town of Harvard | W&SC |
| Town Well | Public Water Supply | Pond Rd | 22 | 16 | | 9300 | 1.12 | Town of Harvard | W&SC |
| Town Well | Public Water Supply | Bolton Rd | 22 | 26 | | 9300 | 0.78 | Town of Harvard | W&SC |

DCR = MA Department of Conservation & Recreation
DFW = MA Department of Fisheries & Wildlife
US DFW = US Department of Fisheries & Wildlife
W&SC = Harvard Water & Sewer Commission

B. Unprotected Land

Unprotected land is land that could be developed without going through the complicated process of town meeting vote and Legislative approval. Unprotected land includes land owned by the Town, non-profit organizations, institutional properties and Chapter lands. The town-owned parcels below can be sold as surplus with a vote of town meeting.

Institutional and Non-Profit Land

Saint Benedict Center and the associated Sisters of the Slaves of the Immaculate Heart of Mary hold some of the most beautiful land in the Still River section of Town with sweeping views of the Nashua River valley. Fruitlands Museum also provides expansive views of the Nashua River valley. These institutional holdings are a critical part of the character of the Town of Harvard, and must be diligently protected from significant alteration and development.

Table 5.6 - Institutional and Non-Profit Land

| NAME | LOCATION | Map | Parcel | Lot | Use Code | ACRES | Managed By |
|---------------------------------------------|------------------|-----|--------|-----|----------|--------|----------------------------------------|
| Chelmsford Housing Opportunities | STOW RD | 28 | 7 | 4 | 950V | 1.29 | CHELMSFORD HOUSING OPPORTUNITIES |
| Chelmsford Housing Opportunities | STOW RD | 28 | 25 | 4 | 9590 | 4.04 | CHELMSFORD HOUSING OPPORTUNITIES |
| Congregational Church of Harvard U.C.C. | STILL RIVER RD | 17 | 3 | | 9600 | 0.38 | CONGREGATIONAL CHURCH OF HARVARD |
| First Congregational Unitarian | AYER RD | 17 | 4 | | 9600 | 0.14 | FIRST CONGREGATIONAL UNITARIAN |
| First Congregational Unitarian - Fellowship | ELM ST | 17 | 33 | | 9610 | 3.20 | FIRST CONGREGATIONAL UNITARIAN |
| Fruitland's Museum | PROSPECT HILL RD | 16 | 35 | | 9560 | 207.64 | THE TRUSTEES OF RESERVATIONS |
| Fruitland's Museum | PROSPECT HILL RD | 16 | 35 | 1 | 9590 | 1.50 | THE TRUSTEES OF RESERVATIONS |
| Girl Scouts - Camp Green Eyrie | STILL RIVER RD | 16 | 18 | 2 | 958C | 12.24 | GIRL SCOUTS OF CENTRAL & WESTERN MASS |
| Girl Scouts - Camp Green Eyrie | STILL RIVER RD | 16 | 19 | | 9580 | 16.50 | GIRL SCOUTS OF CENTRAL & WESTERN MASS |
| Girl Scouts - Camp Green Eyrie | STILL RIVER RD | 17 | 18 | | 950V | 3.20 | GIRL SCOUTS OF CENTRAL & WESTERN MASS |
| Girl Scouts - Camp Green Eyrie | STILL RIVER RD | 21 | 30 | | 950V | 16.62 | GIRL SCOUTS OF CENTRAL & WESTERN MASS |
| Girl Scouts - Camp Green Eyrie | STILL RIVER RD | 21 | 31 | | 950V | 2.10 | GIRL SCOUTS OF CENTRAL & WESTERN MASS |
| Girl Scouts - Camp Green Eyrie | STILL RIVER RD | 22 | 33 | | 950V | 1.10 | GIRL SCOUTS OF CENTRAL & WESTERN MASS |
| Harvard Boy Scouts | WESTCOTT RD | 32 | 89 | | 950V | 9.48 | HARVARD BOY SCOUTS |
| Harvard Library | POND RD | 22 | 40 | | 9560 | 6.80 | BROMFIELD TRUST |
| Harvard Observatory | PINNACLE RD | 18 | 19 | | 9430 | 37.32 | PRESIDENT & FELLOWS OF HARVARD COLLEGE |

| NAME | LOCATION | Map | Par cel | Lot | Use Code | ACRES | Managed By |
|-------------------------------------|----------------|-----|------------|-----|-------------|-------|----------------------------------------|
| Sisters of St. Benedict Center | STILL RIVER RD | 25 | 20 | | 9600 | 8.20 | SISTERS OF ST BENEDICT CENTER |
| Slaves of IHM | STILL RIVER RD | 25 | 14 | 1 | 962R | 76.02 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 15 | | 9600 | 2.63 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 17 | 1 | 9600 | 3.36 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 17 | 2 | 962V | 1.87 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 27 | | 962R | 4.80 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 28 | | 962V | 0.92 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 29 | | 962R | 0.78 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 30 | | 962D | 7.40 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 31 | 1 | 962V | 2.14 | SLAVES OF THE IMMACULATE HEART OF MARY |
| Slaves of IHM | STILL RIVER RD | 25 | 31 | 2 | 962V | 4.00 | SLAVES OF THE IMMACULATE HEART OF MARY |
| St. Benedict Abbey | STILL RIVER RD | 20 | 1 | | 962V | 53.00 | ST BENEDICT PRIORY |
| St. Benedict Abbey | STILL RIVER RD | 20 | 2 | | 9620 | 3.34 | ST BENEDICT PRIORY |
| St. Benedict Abbey | STILL RIVER RD | 20 | 3 | | 962R | 1.30 | ST BENEDICT PRIORY |
| St. Benedict Abbey | STILL RIVER RD | 25 | 21 | | 962D | 8.20 | ST BENEDICT PRIORY |
| St. Benedict Abbey | STILL RIVER RD | 25 | 22 | | 962D | 3.83 | ST BENEDICT PRIORY |
| St. Theresa's Roman Catholic Church | STILL RIVER RD | 17 | 2 | 1 | 9600 | 1.02 | ROMAN CATHOLIC BISHOP OF WORCESTER |
| St. Theresa's Roman Catholic Church | STILL RIVER RD | 17 | 2 | | 9610 | 2.79 | ROMAN CATHOLIC BISHOP OF WORCESTER |
| Village Nursery School | POOR FARM RD | 9 | 62 | | 9430 | 3.54 | VILLAGE NURSERY SCHOOL |
| Virginia Thurston Healing Garden | BOLTON RD | 27 | 137 | 2 | 9570 | 2.16 | VIRGINIA THURSTON HEALING GARDEN |

Harvard Conservation Trust

The Harvard Conservation Trust (HCT) is a private, non-profit organization that has worked for 50 years to protect open space in Town. Because HCT can act faster than the Town to purchase land, the Town and the HCT work together to protect parcels of land that protect water and wetlands, wildlife habitat, farmland, and land that contributes to the connectivity of other open space parcels. For completeness, the following inventory shows all HCT owned land including some which is protected by Conservation Restrictions.

Table 5.7 - Harvard Conservation Trust Land

| NAME | LOCATION | Map | Parcel | Lot | Protect | Acres |
|-------------------|-------------------|-----|--------|-----|---------|-------|
| Barba | STILL RIVER RD | 17 | 4 | | | 2.50 |
| Barba | STILL RIVER RD | 17 | 5 | | | 1.14 |
| Barba/Terry/Oyler | WILLOW RD | 22 | 34 | 1 | | 15.73 |
| Brehm | STOW RD | 28 | 5 | 1 | | 13.61 |
| Brown | CODMAN HILL RD | 28 | 34 | | | 6.80 |
| Burgess Brown | MURRAY LN | 28 | 26 | | | 35.16 |
| Callahan | WEST BARE HILL RD | 27 | 149 | | | 7.63 |
| Case | WOODSIDE RD | 30 | 41 | | | 3.20 |
| Coke | WHITNEY RD | 17 | 32 | | | 13.54 |
| Coke | WHITNEY RD | 17 | 38 | | | 6.57 |
| Dolan/Mason | SLOUGH RD | 23 | 55 | 1 | | 9.90 |
| Dolan/Mason | WOODCHUCK HILL RD | 22B | 48 | | CR | 3.08 |
| East Bare Hill | EAST BARE HILL RD | 35 | 37 | | | 37.10 |
| Eastern Greenway | BROWN RD | 35 | 2 | | | 2.21 |
| Eastern Greenway | BROWN RD | 35 | 4 | | | 1.97 |
| Eastern Greenway | BROWN RD | 31 | 111 | | | 11.90 |
| Eastern Greenway | BROWN RD | 31 | 112 | | | 9.52 |
| Eastern Greenway | BROWN RD | 35 | 3 | | | 6.21 |
| Eastern Greenway | CODMAN HILL RD | 28 | 40 | | | 2.1 |
| Eastern Greenway | JACOB GATES RD | 32 | 74 | | | 2.21 |
| Eastern Greenway | LITTLETON CNTY RD | 19 | 8 | | | 24.68 |
| Eastern Greenway | LITTLETON CNTY RD | 19 | 9 | | | 4.58 |
| Eastern Greenway | LITTLETON CNTY RD | 19 | 11 | | | 9.05 |
| Eastern Greenway | MURRAY LN | 28 | 35 | | | 18.97 |
| Eastern Greenway | SHERRY RD | 23 | 23 | | | 6.93 |
| Eastern Greenway | STOW RD | 28 | 30 | | | 3.63 |
| Eastern Greenway | STOW RD | 32 | 6 | | | 8.90 |
| Eastern Greenway | STOW RD | 32 | 54 | | | 2.50 |
| Eastern Greenway | STOW RD | 32 | 55 | | | 8.57 |
| Eastern Greenway | STOW RD | 32 | 75 | | | 53.00 |
| Eastern Greenway | STOW RD | 36 | 98 | | | 5.80 |
| Eastern Greenway | STOW RD | 36 | 99 | | | 17.00 |
| Elkinson | STILL RIVER RD | 29 | 5 | | | 2.52 |

| NAME | LOCATION | Map | Parcel | Lot | Protect | Acres |
|----------------------|-------------------|-----|--------|-----|---------|-------|
| Galeota | LITTLETON RD | 6 | 8 | | | 9.90 |
| Goodwin/Woods | SLOUGH RD | 22 | 8 | | | 1.27 |
| Harris | STILL RIVER RD | 29 | 4 | 4 | CR | 13.74 |
| Hill | BOLTON RD | 22 | 25 | | | 2.66 |
| Horse Meadows Knoll | SHERRY RD | 24 | 3 | | CR | 47.68 |
| John's Field | SLOUGH RD | 23 | 4 | 5 | CR | 4.19 |
| May's Easement | WEST BARE HILL RD | 27 | 5 | | | 14.81 |
| Muller | LITTLETON CNTY RD | 18 | 37 | | | 2.15 |
| Muller | LITTLETON CNTY RD | 18 | 42 | | | 28.87 |
| Newsham | LITTLETON RD | 17 | 29 | | | 4.10 |
| Newsham | LITTLETON RD | 17 | 31 | | | 3.01 |
| Ohlin | LITTLETON RD | 13 | 12 | 11 | | 25.50 |
| Oyler | STILL RIVER RD | 17 | 3 | 2 | | 0.73 |
| Porter | WEST BARE HILL RD | 26 | 61 | | | 5.09 |
| Reed/Davis/McClellan | STOW RD | 36 | 89 | | | 8.90 |
| Ring | WARREN AV | 22 | 60 | 1 | | 1.71 |
| Stone | AYER RD | 5 | 70 | | | 17.84 |
| Ward | OLD LITTLETON RD | 17 | 27 | 2 | | 5.00 |
| West Oak | OAK HILL RD | 18 | 54 | 1 | | 11.00 |

Town-Owned Land The following table contains the inventory of Town-Owned unprotected land. Some of the unprotected land owned by the Town is used for educational and municipal purposes.

Table 5.8 - Town Owned Land

| Name | Location | Map | Parcel | Lot | Acres | Managed By |
|-------------------------|------------------------|-----|--------|-----|--------|------------------------------|
| Bare Hill Pond | Pond Road | 21 | 77 | | 300.00 | Select Board |
| Bare Hill Pond Dam | Pond Road | 22A | 28 | | 0.28 | Select Board |
| Bellevue Cemetery | Still River Road | 21 | 59 | | 10.60 | Cemetery Commission |
| Barton Land | Under Pin Hill Road | 17A | 12 | | 8.40 | Select Board |
| Bromfield House | Mass Avenue | 22B | 43 | | 1.90 | School Committee |
| Bromfield School | Mass Avenue | 22A | 17 | | 21.00 | School Committee |
| Center Cemetery | Mass Avenue | 17D | 1 | | 3.50 | Cemetery Commission |
| Elementary School | Mass Avenue | 22B | 42 | | 6.50 | School Committee |
| Elementary School | Fairbank Street | 22B | 10 | | 2.24 | School Committee |
| Fire Pond | Scott Road | 30 | 59 | | 1.85 | Fire Department |
| Fire Station | Still River Road | 20 | 23 | | 0.60 | Fire Department |
| Fire Station | Elm Street | 17C | 35 | | 1.61 | Fire Department |
| Gravel Pit | Stow Road | 32 | 56 | | 13.48 | Select Board |
| High School Parking Lot | Mass Avenue | 17C | 1 | | 2.55 | School Committee |
| Highway Garage | Depot Road - Harvard | 17A | 14 | | 10.18 | Department of Public Works |
| Hildreth House | Elm Street | 17C | 36 | | 5.66 | Select Board |
| Little Common | Fairbank Street | 17D | 48 | | 0.14 | Park & Recreation Commission |
| Mass Avenue Lot | Mass Avenue | 22 | 19 | | 1.31 | Select Board |
| Mill Road Land | Depot & Mill Road | 12 | 47 | | 0.23 | Select Board |
| Old Library | Fairbank Street | 17D | 22 | | 0.17 | Select Board |
| Public Safety Building | Ayer Road | 17B | 43 | 2 | 1.50 | Police Department |
| Shaker Cemetery | South Shaker Road | 9 | 52 | | 0.85 | Cemetery Commission |
| Shirley Bridge | Shirley Road - Devens | 40 | 6 | | 0.85 | Select Board |
| Small Land | Mass Avenue | 22B | 11 | | 24.00 | School Committee |
| Still River Lot | Still River Depot Road | 20 | 20 | 1.3 | 4.00 | Select Board |
| Town Hall & Common | Ayer Road | 17D | 5 | | 4.90 | Select Board |
| Traffic Island | Still River Road | 25 | 23 | | 0.42 | Select Board |
| Traffic Island | Littleton Road | 9 | 6021 | 59 | 0.88 | Select Board |
| Warlia Land | Stow Road | 36 | 82 | 1 | 31.68 | Select Board |

Chapter Land

Privately owned land classified as Chapter 61 land is so classified as an incentive against immediate development by providing a reduction in the tax rate. However, these classifications offer no permanent protection. A land owner can reclassify the land at any time. The Town has the first option to purchase this land when the land is made available for sale and is being removed from the special tax classification as part of the sale. These purchases can be costly and the Town has limited time to respond.

Some of the Chapter lands are also in an APR or CR, so their acreages are counted in the "Protected Open Space" category.

Forest Land (Chapter 61)

Lands in this inventory are those that are growing forest products, including wood, timber, Christmas trees and other products produced by forest vegetation.

Table 5.9 - Chapter 61 Land

| OWNER | LOCATION | Map | Par cel | Lot | Use Code | Acre s |
|-----------------------------------------|-------------------|-----|------------|-----|-------------|-----------|
| BEALE, NATHANIEL & SNIFFEN, JULIE, TTE | OLD SHIRLEY RD | 12 | 27 | 4 | 0160 | 35.76 |
| BOBE, FRANK W. | STILL RIVER RD | 21 | 24 | | 0160 | 16.20 |
| BOSTON, CATHERINE J. | LITTLETON CNTY RD | 14 | 54 | | 0160 | 12.61 |
| BRITTAIN, SCOTT & JENNIFER | LITTLETON CNTY RD | 14 | 57 | | 0160 | 12.00 |
| CAPOBIANCO, JEANNE- FAMILY TRUST | WILLARD LN | 26 | 3 | 1 | 6010 | 23.33 |
| CASE, RICHARD D. JR | BOLTON RD | 31 | 25 | 1 | 6010 | 17.90 |
| CASE, RICHARD JR. | BOLTON RD | 30 | 106 | | 6010 | 10.30 |
| ENDICOTT, PRISCILLA | LITTLETON CNTY RD | 23 | 21 | 1 | 0160 | 30.78 |
| FIDUCIARY TRUST COMPANY, TTE | MURRAY LN | 28 | 21 | | 6010 | 50.00 |
| GALESKI, JAMES S & LORELEI | SHAKER RD | 10 | 2 | | 0160 | 17.32 |
| GEORGE, PETER C & SUSAN M | WEST BARE HILL RD | 26 | 17 | 4 | 0160 | 14.50 |
| GIBSON, RITA A | JACOB GATES RD | 32 | 78 | | 6010 | 8.07 |
| GIBSON, RITA A | JACOB GATES RD | 32 | 79 | | 6010 | 4.41 |
| GIBSON, RITA A | METTACOMETT PATH | 31 | 65 | | 6010 | 5.72 |
| GIBSON, RITA A | METTACOMETT PATH | 31 | 66 | | 0160 | 2.71 |
| HARVARD SPORTSMEN CLUB INC | LITTLETON CNTY RD | 14 | 64 | | 6010 | 1.10 |
| HARVARD SPORTSMEN CLUB INC | LITTLETON CNTY RD | 14 | 65 | | 6010 | 0.18 |
| HARVARD SPORTSMENS CLUB INC | LITTLETON CNTY RD | 14 | 68 | | 6010 | 0.20 |
| HEUDORFER, JOHN, TTE | STOW RD | 38 | 7 | | 6010 | 19.30 |
| KATZ, ISADORE T & SCHAFFER, CHRISTINE A | AYER RD | 12 | 26 | 6 | 0160 | 15.80 |
| LARD, JOHN & SETZCO, HOWARD C, TTES | OLD SHIRLEY RD | 8 | 50 | | 6010 | 0.90 |
| LARD, JOHN & SETZCO, HOWARD C, TTES | OLD SHIRLEY RD | 8 | 70 | | 6010 | 7.50 |
| LARD, JOHN & SETZCO, HOWARD C, TTES | OLD SHIRLEY RD | 12 | 13 | | 6010 | 1.90 |
| LARD, JOHN & SETZCO, HOWARD C, TTES | OLD SHIRLEY RD | 12 | 15 | | 6010 | 3.70 |

| OWNER | LOCATION | Map | Par cel | Lot | Use Code | Acres |
|----------------------------------------|---------------------|-----|------------|-----|-------------|-------|
| MANGANELLA, LUCIANO | OLD SCHOOLHOUSE RD | 14 | 40 | | 6010 | 4.22 |
| MANGANELLA, LUCIANO | OLD SCHOOLHOUSE RD | 19 | 67 | 1 | 6010 | 16.36 |
| MARGARET COYLE NESTLER | CRUFT LN | 13 | 3 | 1 | 0160 | 23.94 |
| MCCARTHY, THOMAS F, TTE | AYER RD | 5 | 79 | | 0160 | 19.90 |
| MEAD, JONATHAN | LITTLETON RD | 13 | 10 | | 0160 | 12.45 |
| NESTLER, MARGARET, TTE | CRUFT LN | 13 | 5 | | 0160 | 18.49 |
| PANEK, JESSIE B, TTE | WEST BARE HILL RD | 27 | 49 | | 6010 | 2.10 |
| PANEK, JESSIE B, TTE | WEST BARE HILL RD | 27 | 51 | | 6010 | 2.29 |
| PANEK, JONATHAN F & JESSIE B, TTE | WEST BARE HILL RD | 27 | 52 | | 0160 | 14.01 |
| PANEK, JONATHAN F, TTE | TAHANTO TR | 27 | 44 | | 0160 | 7.18 |
| PANEK, JONATHAN F, TTE | WARREN AV | 27 | 48 | | 6010 | 1.89 |
| RATHORE, AMIN & NAHID | JACOB GATES RD | 32 | 77 | | 6010 | 19.52 |
| RATHORE, AMINUDDIN & NAHID, TTE | METTACOMETT PATH | 31 | 67 | | 0160 | 13.53 |
| REITMAN, JOHN M & MAUREEN T F | MASS AV | 22 | 21 | | 0160 | 30.91 |
| SANTINI, DAVID R & RUTH J, TTE | BROWN RD | 36 | 93 | 5 | 6010 | 0.31 |
| SANTINI, DAVID R & RUTH J, TTE | BROWN RD | 36 | 94 | | 6010 | 1.63 |
| SHAW, JOSEPH ANTHONY | LITTLETON RD | 13 | 1 | | 0601 | 17 |
| SHUTT FAMILY LIMITED PARTNERSHIP | LITTLETON RD | 17 | 20 | 2 | 6010 | 11.90 |
| SHUTT FAMILY LIMITED PARTNERSHIP | LITTLETON RD | 17 | 20 | 3 | 6010 | 4.35 |
| SHUTT FAMILY LIMITED PARTNERSHIP | WHITNEY RD | 17 | 20 | 4 | 6010 | 2.42 |
| TRACEY, DANIEL E & MELISSA | SHAKER RD | 2 | 40 | 2 | 6010 | 19.90 |
| TURNER, ARTHUR S & ROBERT TURNER | TURNER LN | 21 | 57 | | 6010 | 11.74 |
| TURNER, KEITH & VESENKA-TURNER, MARY H | LITTLETON CNTY RD | 14 | 53 | 1 | 0160 | 14.70 |
| WARREN FAMILY TRUST | LANCASTER CNTY RD | 8 | 19 | | 0160 | 30.49 |
| WARREN FAMILY TRUST | LANCASTER COUNTY RD | 8 | 19 | 1 | 6010 | 9.87 |
| WARREN, CARL & SARA | SHEEHAN RD | 6 | 1 | | 6010 | 26.00 |
| WARREN, CARL & SARA | SHEEHAN RD | 6 | 2 | 3 | 6010 | 4.17 |
| WARREN, CARL & SARA | SHEEHAN RD | 6 | 11 | | 6010 | 20.00 |
| WARREN, CARL & SARA | SHEEHAN RD | 6 | 5 | | 0160 | 3.80 |

Agricultural Land (Chapter 61A)

Lands in this inventory are those that are growing agricultural or horticultural products, including fruits, vegetables, ornamental shrubs, timber, animals, and maple syrup.

Table 5.10 - Chapter 61A Land

| OWNER | LOCATION | Map | Parcel | Lot | Use Code | Acres |
|-------------------------------------------|-------------------|-----|--------|-----|----------|-------|
| ARNOLD, TIMOTHY T & SARAH Y | OLD MILL RD | 4 | 57 | | 0170 | 27.14 |
| BANKS, JAMES V & PAULA J | STILL RIVER RD | 20 | 7 | 2 | 0170 | 23 |
| BERWIND BROTHERS LLC | AYER RD | 1 | 5 | | 0170 | 53.7 |
| BILODEAU, SEAN A | MURRAY LN | 28 | 24 | | 7190 | 16.88 |
| BLUE MOON FARM LLC | DEPOT RD-HARVARD | 11 | 7 | | 0170 | 7.72 |
| BOBZIN, JEFFERY J & RUTH E | OLD MILL RD | 4 | 13 | | 0170 | 31 |
| CARLON, JEFFREY S. | STILL RIVER RD | 26 | 15 | 6 | 7130 | 8.25 |
| CARLON, JEFFREY S. | STILL RIVER RD | 29 | 1 | | 0170 | 8.16 |
| CARLSON ORCHARDS INC | LITTLETON CNTY RD | 18 | 36 | | 7140 | 33.38 |
| CARLSON ORCHARDS INC | LITTLETON CNTY RD | 18 | 44 | | 7140 | 0.19 |
| CARLSON ORCHARDS INC | LITTLETON CNTY RD | 19 | 5 | | 7140 | 6.08 |
| CARLSON ORCHARDS INC | OAK HILL RD | 18 | 62 | 2 | 7140 | 2.11 |
| CARLSON ORCHARDS INC | OAK HILL RD | 18 | 63 | 1 | 7140 | 19.00 |
| CARLSON ORCHARDS INC | OAK HILL RD | 18 | 62 | 1 | 0370 | 33.30 |
| CARLSON ORCHARDS INC | OLD LITTLETON RD | 13 | 62 | | 7140 | 12.77 |
| CARLSON ORCHARDS INC | OLD LITTLETON RD | 13 | 69 | 1 | 7140 | 17.56 |
| CARLSON ORCHARDS INC | PINNACLE RD | 18 | 63 | 2 | 7140 | 7.00 |
| CARLSON ORCHARDS INC | PINNACLE RD | 18 | 65 | 1 | 7140 | 1.88 |
| CHARLES F DAVIS, JR FAMILY TRUST OF 1988 | STILL RIVER RD | 16 | 15 | | 7140 | 23.58 |
| CHIPMAR, LLC | MASS AV | 23 | 30 | | 7170 | 39.46 |
| CUTLER, MARY MORGAN, TRUSTEE | EAST BARE HILL RD | 27 | 103 | | 7170 | 34.37 |
| CUTLER, MARY MORGAN, TRUSTEE | EAST BARE HILL RD | 28 | 9 | | 7170 | 4.60 |
| CUTLER, PHILIP CHRISTOPHER, TRUSTEE | STOW RD | 28 | 10 | | 0170 | 15.41 |
| DAVID W. DURRANT & PAMELA B. DURRANT | EAST BARE HILL RD | 35 | 36 | | 0170 | 8.5 |
| FIDUCIARY TRUST COMPANY, TTE | MURRAY LN | 28 | 22 | | 0170 | 13.5 |
| HEUDORFER, JOHN, TTE | STOW RD | 38 | 5 | | 7180 | 4.58 |
| HOFFMAN, LINDA | ELDRIDGE RD | 33 | 1 | 2 | 7120 | 0.69 |
| IAFT LLC | OLD MILL RD | 4 | 14 | | 0170 | 26 |
| IRA SERVICES TRUST COMPANY | STILL RIVER RD | 25 | 32 | | 7130 | 9.04 |
| JOHN B WILSON | AYER RD | 2 | 8 | | 7130 | 6.50 |
| KWW HARVARD LLC | BROWN RD | 35 | 35 | | 0170 | 79.4 |
| KWW HARVARD LLC | EAST BARE HILL RD | 31 | 34 | | 7180 | 10.50 |
| LATHAM, VIRGINIA T, TTE VIRGINIA T LATHAM | OLD LITTLETON RD | 18 | 17 | | 7180 | 5.00 |
| LATHAM, VIRGINIA T, TTE VIRGINIA T LATHAM | OLD LITTLETON RD | 18 | 67 | | 0170 | 6.5 |
| LDPL LLC | AYER RD | 1 | 2 | | 7140 | 59.00 |

| OWNER | LOCATION | Map | Par cel | Lot | Use Code | Acres |
|----------------------------------------|--------------------|-----|------------|-----|-------------|-------|
| LEE, DOLORES M, TTE | PROSPECT HILL RD | 21 | 14 | 1 | 0170 | 7.4 |
| LEE, DOUGLAS K, TTE | PROSPECT HILL RD | 16 | 14 | 2 | 7130 | 7.67 |
| LEWIS, WILLIAM E & DORENE L | METTACOMETT PATH | 32 | 95 | | 7200 | 2.51 |
| LEWIS, WILLIAM E & DORENE L | WESTCOTT RD | 32 | 94 | | 0170 | 9.62 |
| LOCHIATTO, CARL A & VICTORIA | OLD MILL RD | 4 | 19 | | 0170 | 24 |
| MATHESON, FRANK JR, TRUSTEE | RTE 2A PINGRYVILLE | 3 | 2 | | 7170 | 3.80 |
| MAXANT, THEODORE W & CHRISTINE, TTE | WILLARD LN | 21 | 74 | | 0170 | 14.13 |
| MAXANT, WILLIAM T & THEODORE W, TTE | WILLARD LN | 21 | 73 | | 0170 | 20.47 |
| METCALF, THOMAS III | STILL RIVER RD | 21 | 65 | 1 | 0170 | 17.94 |
| MOLNAR, RICHARD J | OLD LITTLETON RD | 10 | 58 | 1 | 0170 | 18.12 |
| MORRISON, THOMAS J. | WEST BARE HILL RD | 26 | 17 | 3 | 0170 | 14.5 |
| MYLLYKANGAS, TIMOTHY D | WESTCOTT RD | 32 | 91 | | 0170 | 11.41 |
| NATHAN R ALDRICH | BOLTON RD | 31 | 13 | | 0170 | 14.62 |
| NIGZUS, STEVE & TRIANTARIS, GEORGE E | MADIGAN LN | 16 | 9 | | 0170 | 12.23 |
| OLD FROG POND FARM TRUST | ELDRIDGE RD | 33 | 5 | 1 | 0170 | 13.78 |
| RINES, STEPHEN T. | BOLTON RD | 31 | 16 | | 0170 | 11.50 |
| SHAPPY, RUSSELL F JR & LINDA B | WHITNEY LN | 23 | 31 | | 0170 | 13.58 |
| SISTERS OF ST BENEDICT CENTER | STILL RIVER RD | 25 | 19 | | 7120 | 43.00 |
| SKAUEN-HINCHLIFFE, DEBORAH | STILL RIVER RD | 20 | 22 | 1 | 0170 | 12.28 |
| THEODORE W MAXANT TRUSTEE OF THE | STILL RIVER RD | 21 | 65 | 2 | 7130 | 4.71 |
| THREE PENNY FARM LLC | OLD LITTLETON RD | 10 | 34 | | 7140 | 3.20 |
| THREE PENNY FARM LLC | OLD LITTLETON RD | 10 | 59 | 3 | 7160 | 0.33 |
| THREE PENNY FARM LLC | OLD LITTLETON RD | 10 | 35 | 2 | 7170 | 30.56 |
| THREE PENNY FARM LLC | OLD LITTLETON RD | 10 | 59 | 1 | 7200 | 2.05 |
| TRIAN TARIS, GEORGE & NIGZUS, STEVE | MADIGAN LN | 16 | 27 | | 7130 | 4.00 |
| TURNER, MARY HELAN V, VESENKA, JAMES P | LITTLETON CNTY RD | 14 | 53 | 2 | 7130 | 9.87 |
| TURNHEIM, RENE & CHRISTIANE | EAST BARE HILL RD | 31 | 37 | | 0170 | 8.32 |
| VARRELL, AMY L & MATTHEW | OLD MILL RD | 4 | 15 | | 0170 | 5.62 |
| WESTWARD ORCHARDS INC | LITTLETON CNTY RD | 19 | 4 | | 0170 | 75.32 |
| WESTWARD ORCHARDS INC | MASS AV | 23 | 34 | | 7140 | 56.00 |
| WESTWARD ORCHARDS INC | MASS AV | 23 | 32 | | 0170 | 5.50 |
| WESTWARD ORCHARDS INC | MASS AV | 23 | 33 | | 0370 | 3.00 |
| WESTWARD ORCHARDS INC | OAK HILL RD | 18 | 54 | | 7140 | 13.46 |
| WESTWARD ORCHARDS INC | OAK HILL RD | 23 | 8 | | 0170 | 34.00 |
| WESTWARD ORCHARDS INC | SLOUGH RD | 23 | 10 | | 7200 | 1.50 |
| WHITNEY LANE FARMS LLC | LITTLETON CNTY RD | 23 | 22 | | 0170 | 31.15 |
| WHITNEY LANE FARMS LLC | WHITNEY LN | 23 | 17 | | 7130 | 12.06 |
| WHITNEY LANE FARMS LLC | WHITNEY LN | 23 | 18 | | 7170 | 8.80 |
| WILLARD, W&P & LARSON, M, TTE | STILL RIVER RD | 20 | 10 | | 0170 | 17.00 |
| WILSON, JOHN B & ELAINE M, TTE | AYER RD | 2 | 8 | 1 | 7130 | 12.20 |
| WONG, CHUNG MOU | BOLTON RD | 27 | 43 | | 0170 | 27.84 |
| YANG, XINXING | WOODCHUCK HILL RD | 23 | 13 | 1 | 0170 | 8.90 |

Recreational Land (Chapter 61B)

Land in this inventory is open space and/or recreation.

Table 5.11 - Chapter 61B Land

| OWNER | LOCATION | Map | Par cel | Lot | Use Code | Acres |
|---------------------------------------|-------------------|-----|------------|-----|-------------|--------|
| ALOISE, NICK | LITTLETON RD | 13 | 20 | 1 | 0180 | 6.55 |
| ARNOLD, KEVIN | DEPOT RD-HARVARD | 17 | 5 | | 0180 | 12.55 |
| COMBS, JENNIFER MALLOY | OAK HILL RD | 17 | 44 | | 0180 | 9.95 |
| CORBETT, MATTHEW G W | LITTLETON RD | 13 | 22 | | 0180 | 24.72 |
| DELANEY, JOHN R & RAJUNAS, SUSAN A | OLD LITTLETON RD | 14 | 11 | 1 | 0180 | 8.71 |
| FITZGERALD, DIANE M & LEROY, RUSSEL D | SOUTH SHAKER RD | 9 | 38 | | 0180 | 6.73 |
| GAROFALO, HEIDI J & LOUIS A | PROSPECT HILL RD | 11 | 14 | | 0180 | 8.10 |
| GAROFALO, HEIDI J & LOUIS A | PROSPECT HILL RD | 11 | 26 | | 8030 | 1.90 |
| GORMLEY III, J THOMAS & JENNY MURRAY | WARREN AV | 22 | 57 | 1 | 0180 | 5.60 |
| GORMLEY, J THOMAS III & JENNY MURRAY | WARREN AV | 22 | 58 | 1 | 8030 | 4.65 |
| GORSS, CHARLES G., LIFE ESTATE | OLD LITTLETON RD | 18 | 12 | | 0180 | 7.24 |
| HOWARD, BRENT J & GEHRIG, AMY B | PROSPECT HILL RD | 11 | 20 | | 0180 | 3.36 |
| HOWARD, BRENT J & GEHRIG, AMY B | PROSPECT HILL RD | 11 | 1 | 2 | 8060 | 4.45 |
| JAMES DINARDO | OLD LITTLETON RD | 13 | 64 | | 8030 | 5.57 |
| KELVIN WIEBE | EAST BARE HILL RD | 35 | 46 | | 0180 | 11.88 |
| LEICHER, BRUCE A | WARREN AV | 22 | 57 | 2 | 8030 | 2.80 |
| LEICHER, BRUCE A. | WARREN AV | 22 | 56 | 1 | 0180 | 5.11 |
| LUDWIG, DONALD E & HOLMES, KATHLEEN | EAST BARE HILL RD | 27 | 98 | | 0180 | 7.32 |
| LUESCHER, CAROLYNN M & MARC F | OLD LITTLETON RD | 10 | 57 | | 0180 | 11.51 |
| MANGANELLA LUCIANO & STACEY | LITTLETON CNTY RD | 14 | 44 | 4 | 8060 | 37.07 |
| OAK MEADOWS WAY LLC | LITTLETON CNTY RD | 14 | 44 | 6 | 0180 | 10.67 |
| PARKINSON, PHYLLIS T | OLD LITTLETON RD | 13 | 66 | | 0180 | 10.38 |
| PARKINSON, PHYLLIS T | OLD LITTLETON RD | 14 | 8 | | 8030 | 1.50 |
| PARKINSON, PHYLLIS T | OLD LITTLETON RD | 14 | 9 | | 8030 | 1.50 |
| RUSHMORE III TTE, RICHARD J | WOODCHUCK HILL RD | 23 | 50 | | 8010 | 17.43 |
| SHAW MARK | CRUFT LN | 13 | 6 | | 0180 | 8.70 |
| SNYDER, JOHN K & JULIE S | WOODSIDE RD | 30 | 42 | | 0180 | 22.80 |
| SPENCER HOLLAND | LITTLETON CNTY RD | 14 | 43 | 2 | 0180 | 17.55 |
| TEFIELD GROUP LLC | SHAKER RD | 2 | 43 | 2 | 8050 | 8.91 |
| TEFIELD GROUP LLC | SHAKER RD | 3 | 1 | 1 | 8050 | 39.02 |
| TEFIELD GROUP LLC | SHEEHAN RD | 6 | 3 | 1 | 8050 | 115.48 |
| WRANGHAM, DAVID W. | EAST BARE HILL RD | 31 | 39 | | 0180 | 12.60 |

Section 6: COMMUNITY VISION

A. Description of Process

As part of the planning process for the update of the current Harvard Open Space & Recreation Plan, a public survey was conducted to gather public input to inform and guide the development of the plan. The Harvard OSRP public survey was hosted on the Survey Monkey web application, or available as a paper copy for manual completion. The survey was widely promoted on the Town of Harvard's website homepage under "News & Announcements", on other webpages, among various boards, committees, and organizations, and at various public events, and community gatherings and meetings, and by signage prominently placed in a highly visible public location.

The Harvard Open Space & Recreation Plan Public Survey aimed to garner public input relative to two major topics - open space protection and active recreation facilities.

For open space protection, the survey addressed three major questions:

1. What is most important to protect?
2. How much should be spent?
3. How should it be funded?

For active recreation facilities, the survey addressed similar questions:

1. Are more facilities needed? If so, which types of facilities are most needed?
2. Where should they be located?
3. How should recreational facilities be funded?

The following pages provide an overview summary of the results collected from the Harvard Open Space and Recreation Survey based on 472 responses collected between May 24, 2022, and June 30, 2022. The complete results of the public survey are contained in Appendix 2 including all respondent comments.



Harvard Open Space & Recreation Plan (OSRP) Public Survey

Please help the Town of Harvard update our Open Space & Recreation Plan (OSRP) by participating in this important survey.

A state approved OSRP plan is necessary to qualify for state funding supporting open space (conservation & recreation) acquisitions and improvements. This survey is being conducted to better understand the needs and vision of Harvard residents relative to the Town's open space and recreation facilities.

Open space in this plan is defined as both publicly- and privately-owned undeveloped lands which provide public benefits including wildlife habitat, connectivity to other open space, water resource protection, recreational opportunities, agriculture, forests, and unique or scenic properties. Recreation can refer to active or passive recreation. Active recreation includes team sports and recreation that require courts or fields.

The survey is divided into two parts. The first addresses the Town's open space at a broad level. The second part focuses on the Town's facilities created specifically for active recreation.

This survey should take no more than 10 minutes to complete. Thank you for your time and responses!

Responses to this survey will be anonymous. Your feedback will be used to update the Town's Open Space & Recreation Plan by identifying what is important to its residents, and to create 5-year action plan to address those needs. The survey responses and 5-year action plan will be presented in a public meeting this fall.



B. Survey Results

The 2022 Harvard OSRP public survey was taken by a broad and varied segment of the population. The number of years respondents indicated they have lived in Harvard ranged from 1-year to 81-years (Question 19) and the number of people currently living within their household ranged between 1 and 8 (Question 20). The results of the survey conclusively demonstrated a great appreciation for Open Space (Conservation and Recreation lands, facilities, amenities, and activities) among respondents and indicated that the community recognizes the value and importance of Open Space as a key element of what makes Harvard unique and special. In fact, over 99% of respondents valued open space to some degree with 95% of those indicating that they valued open space either “Very much” (23%) or “Extremely” (73%) (Question 1).

Ecologically sensitive areas, forests, the protection of wetland resource areas, including streams, ponds, and aquifers, preservation of plant and animal habitat, maintenance of the Town’s rural character, protection of rare species, increased resiliency to the impacts of climate change, provision of open vistas, and agriculture were all recognized as highly valued and important aspects of open space in Harvard (Questions 2 and 4). Most respondents indicated that the rate of open space protection should either increase (37%) or continue at the current rate (43%). Very few respondents indicated that the Town should decrease the rate of open space protection, and only a minor percentage (13%) indicated that the rate of open space protection should be stopped to focus on managing already protected lands (Question 3). In addition, most respondents (approximately 80% or more in most cases) were satisfied or extremely satisfied with Harvard’s past and present initiatives to protect various aspects of open space, such as forests, connectivity, water resources, agriculture, land for passive recreation, and ecologically sensitive areas.

Survey respondents were less satisfied with recreational facilities, with only 51% of the respondents being “extremely satisfied” or “satisfied” (Question 5). Survey respondents expressed a low level of satisfaction with athletic fields and courts in Harvard (Question 10), and indicated that their greatest levels of concern or issues were related to maintenance and amount of available field space. Respondents indicated some degree of additional need for open recreational fields for general use, softball fields, and soccer fields (Question 13).

The survey results demonstrated a persistent concern about raising taxes to fund Open Space protection and new recreational facilities (Questions 7, 11, 17, and 18). Recent large capital expenditures for a new elementary school, council on aging/senior center, new roof for the old library, and proposals for a new fire station, DPW building, and athletic complex may also have contributed to this sentiment. Respondents clearly indicated that they did not feel that tax increases were the preferred method of funding open space conservation and recreation initiatives. When asked about funding the acquisition of open space land (Question 7), respondents specified that the preferred method(s) is through state and Federal grants (95%), followed by voluntary contributions (81%), from Community Preservation Act funds (80%), and from Funds allocated to an Open Space line item in the annual town budget (57%). With respect to

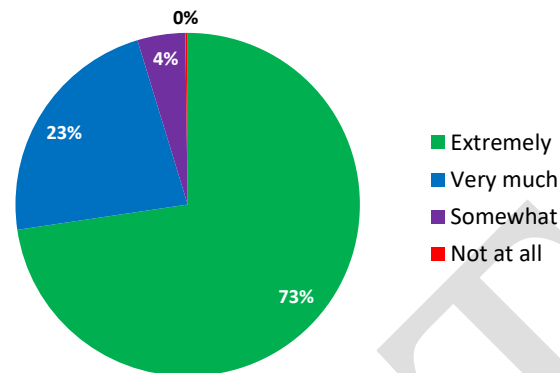
open space land acquisitions, 41% of respondents indicated that the Community Preservation Act surcharge rate should be increased from its current 1.1% to some amount up to the 3% allowable by the Act. When asked about raising funds specifically for a multi-sport playing field recreational facility (Question 18), respondents indicated that they should be raised by applying for state and Federal grants (84%), voluntary contributions (75%), user fees (57%), annual appropriation of funds from the Town budget (54%), and from Community Preservation Act funds (49%). Only 23% of respondents felt that the Community Preservation Act surcharge rate should be increased for this purpose.

Regarding questions that were specific to a new recreation facility, it appears that the community is divided on what type of facility they would prefer (Question 15) and whether the development of such a facility should be funded by a debt exclusion tax increase (Question 17).

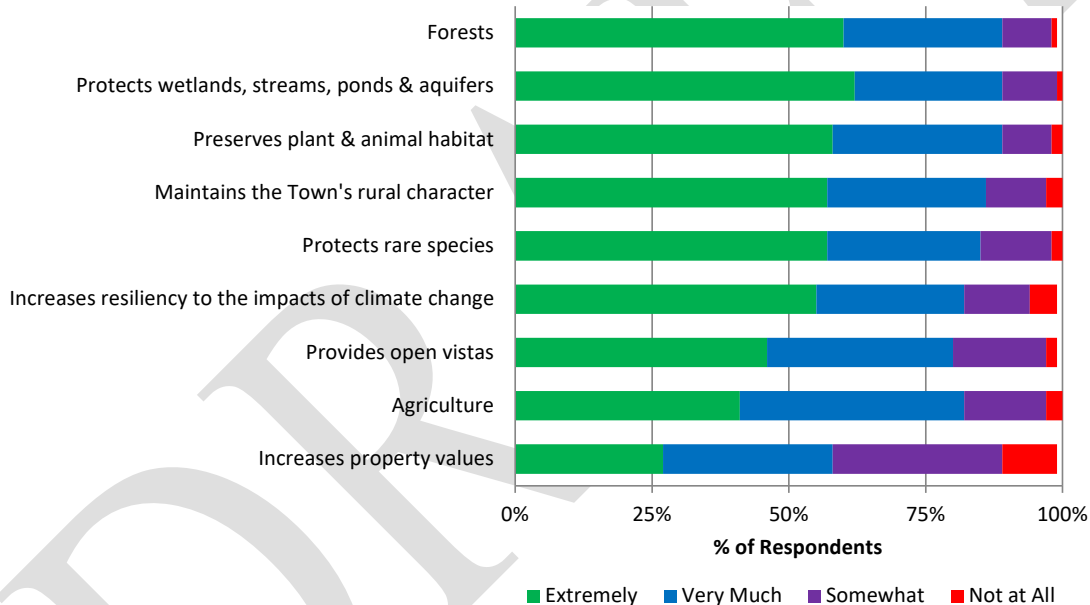
The public input from the 2022 OSRP survey provides a community vision of the most critical aspects of protecting open space and providing recreational facilities and opportunities. That vision establishes a foundation for the identification of Community Needs and the development of meaningful Goals & Objectives, which are the basis of the Community Action Plan for the OSRP.

The respondents' answers to each of the survey questions are tabulated below.

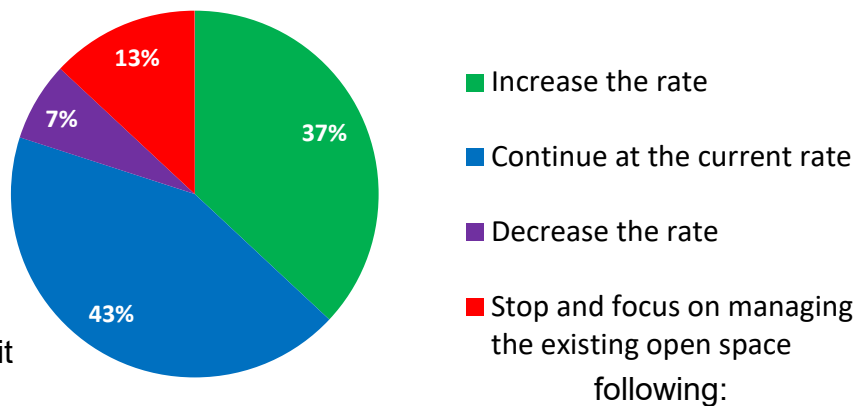
Q1. How much do you value open space in Harvard?



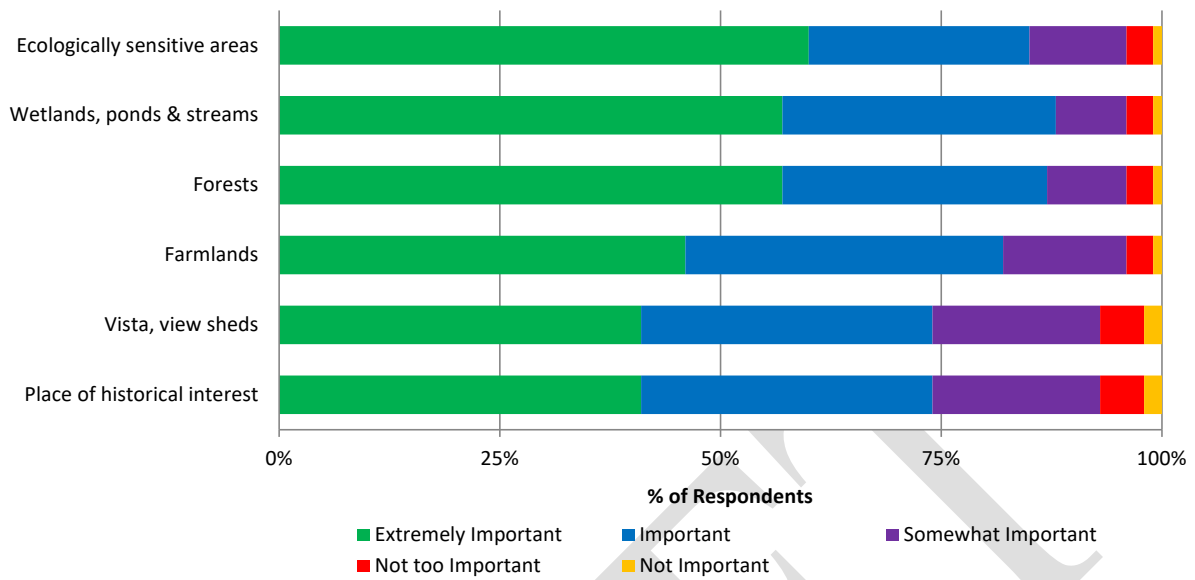
Q2. To what degree do you value each of the following aspects of open space in Harvard?



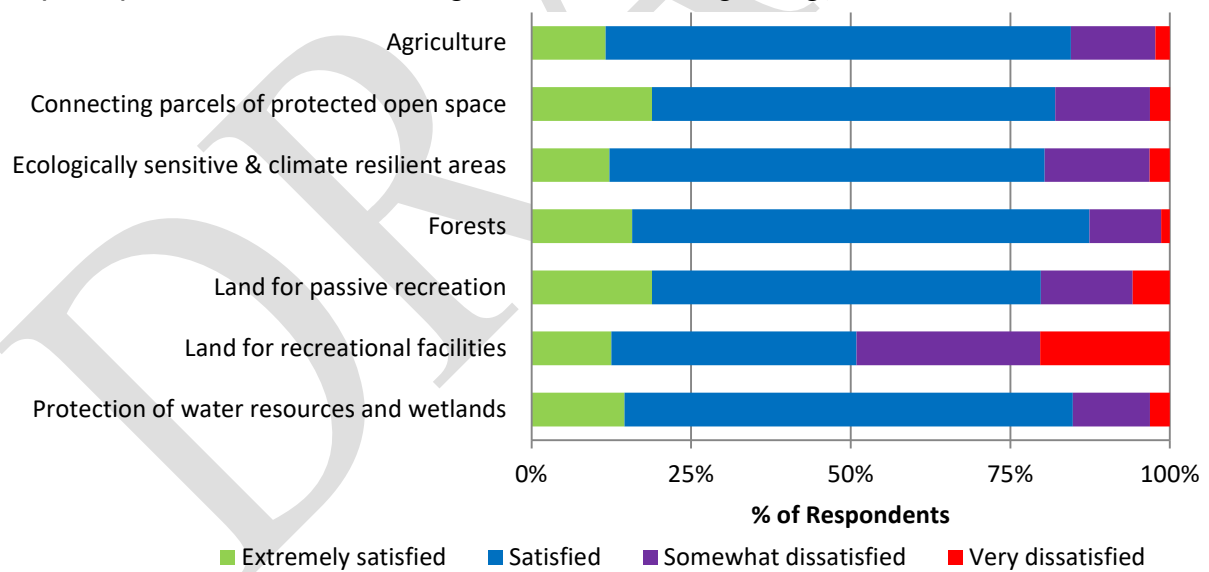
Q3. Should the Town continue to protect open space as it historically done?



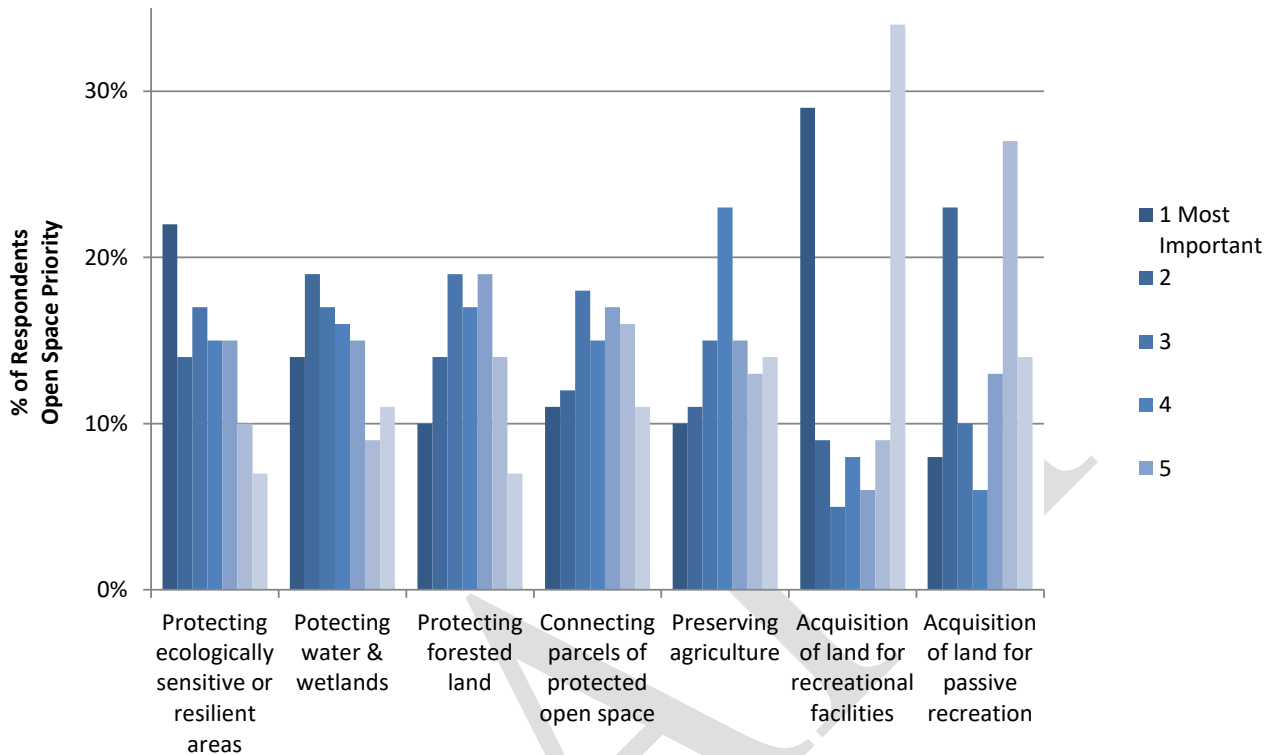
Q4. How important to you is it to preserve each of the



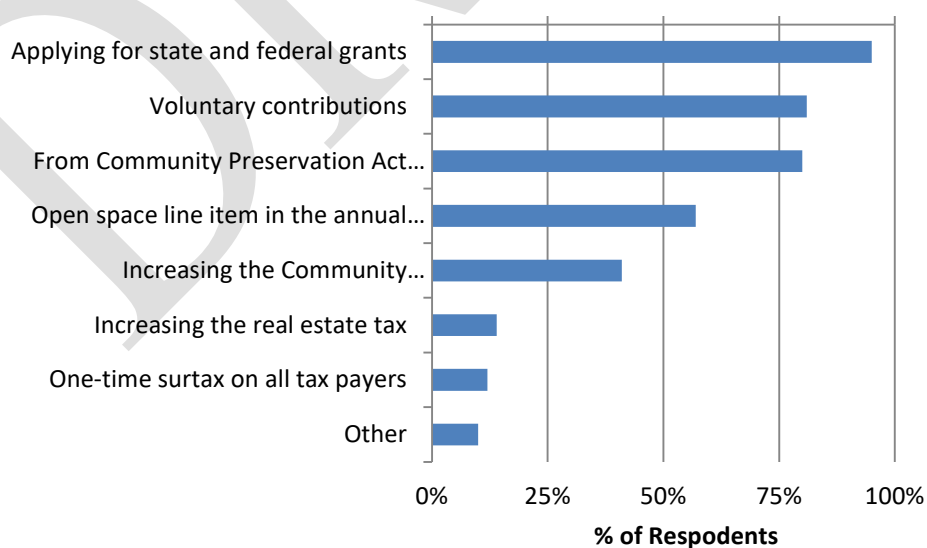
Q5. How satisfied are you with the Harvard's past and present initiatives for protecting open space in Harvard with regard to the following categories?



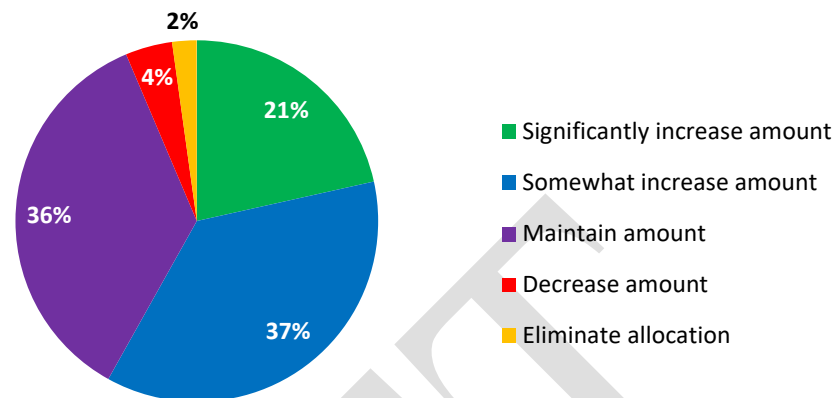
Q6. What do you consider to be the highest open space priorities for Harvard over the next 5 years? Please numerically rank each item from the following list:



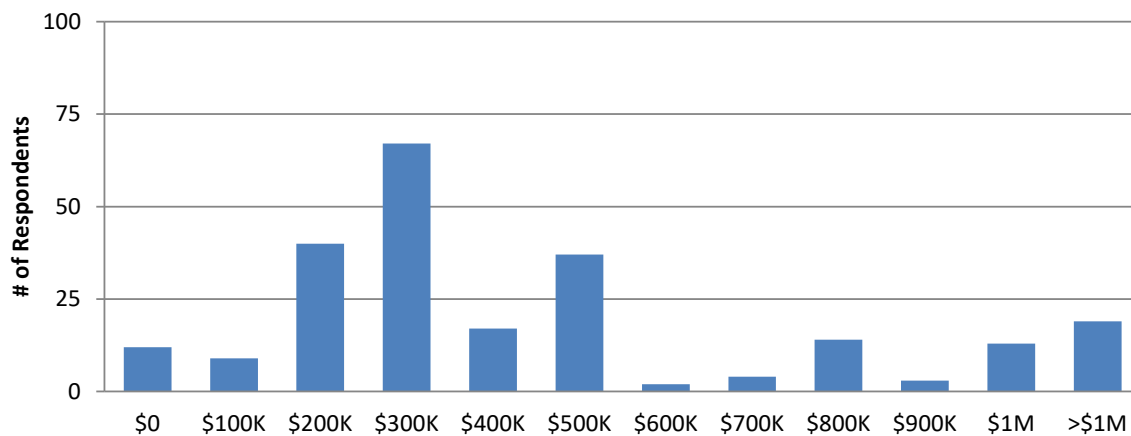
Q7. How should the Town finance the acquisition of open space?



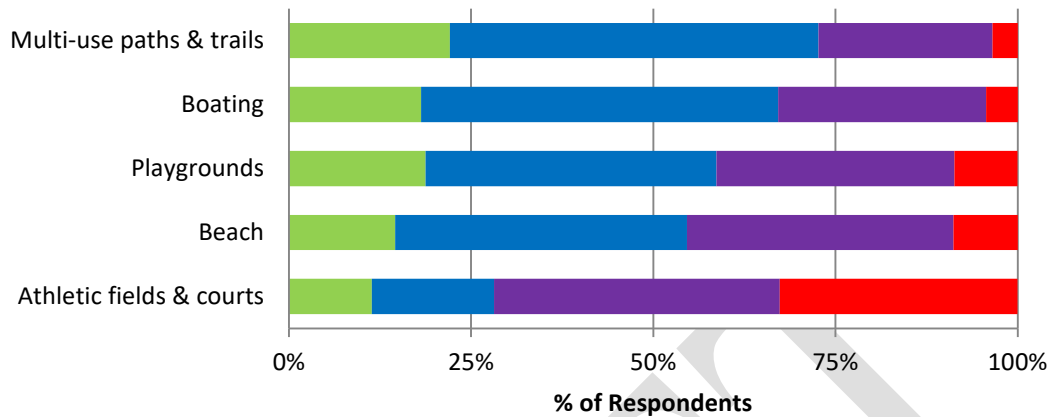
Q8. How much should the Town allocate to open space in the coming 5 years?



Q9. What amount do you think the Town should allocate annually to open space protection?



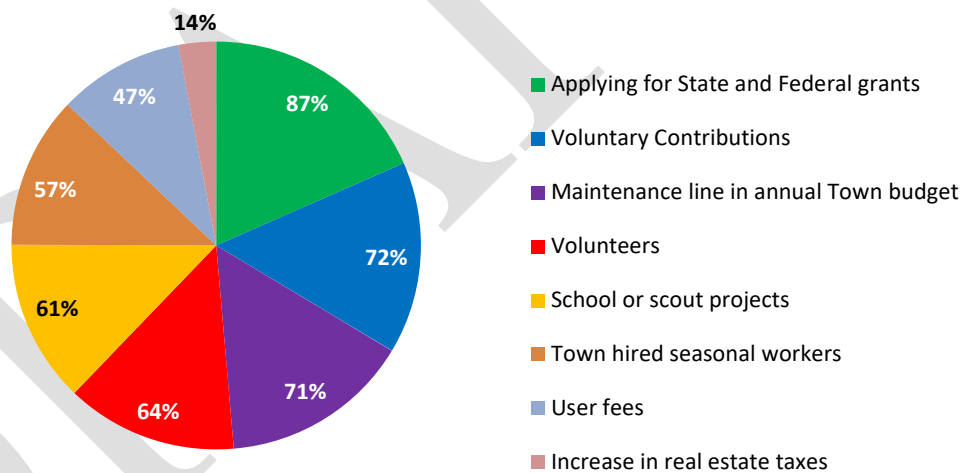
Q10. How satisfied are you with each of the following types of recreation facilities in Harvard?



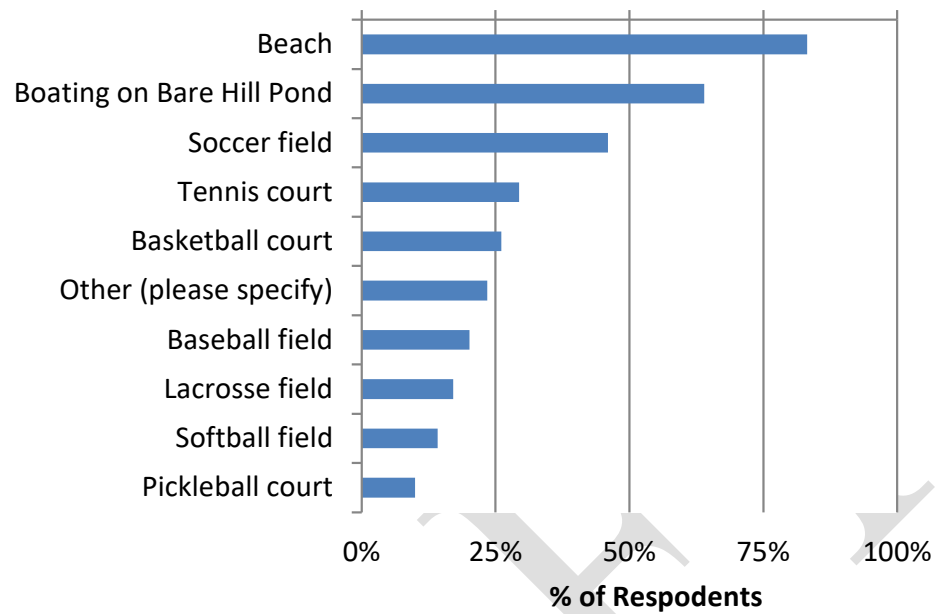
Q11. How

Extremely satisfied Very satisfied Somewhat satisfied Not at all satisfied

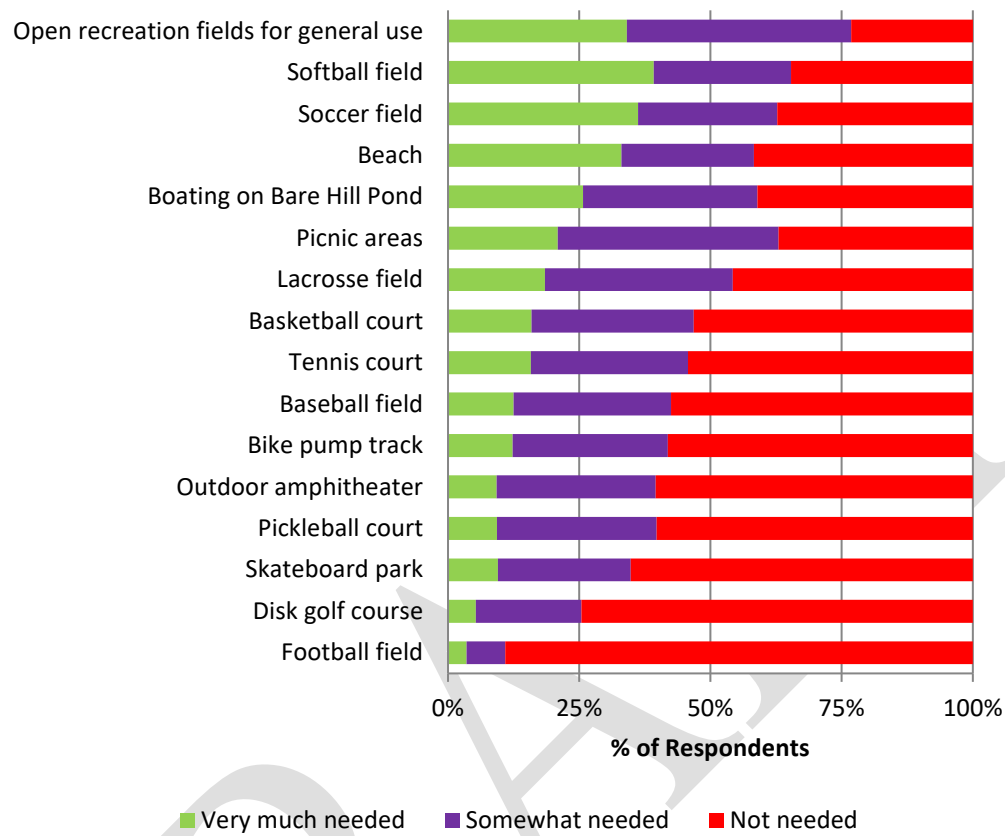
should maintenance of existing Harvard recreation facilities be accomplished / funded? Select all that apply.



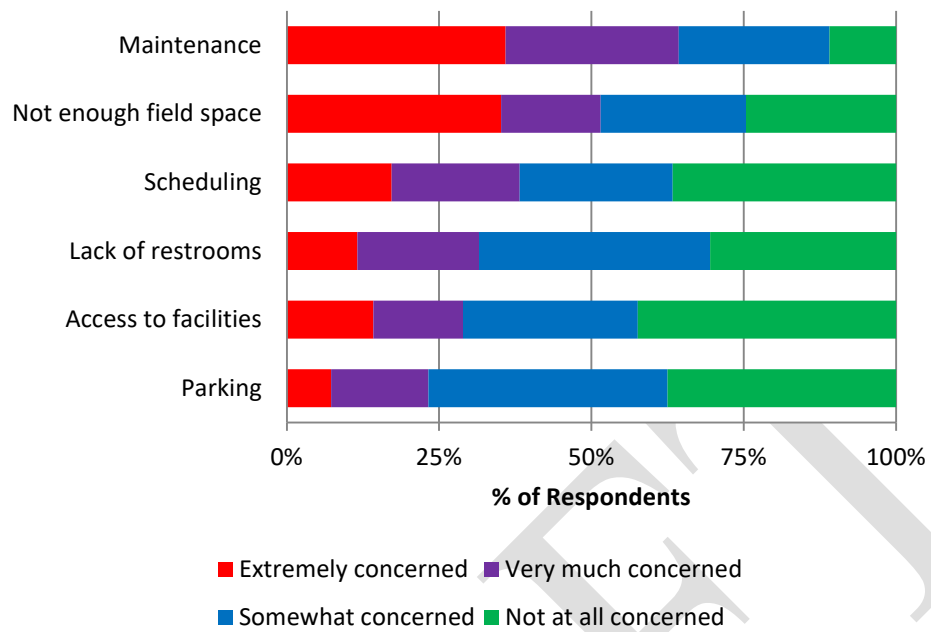
Q12. Which of the following recreational facilities do you or your family use in Harvard?
Select all that apply.



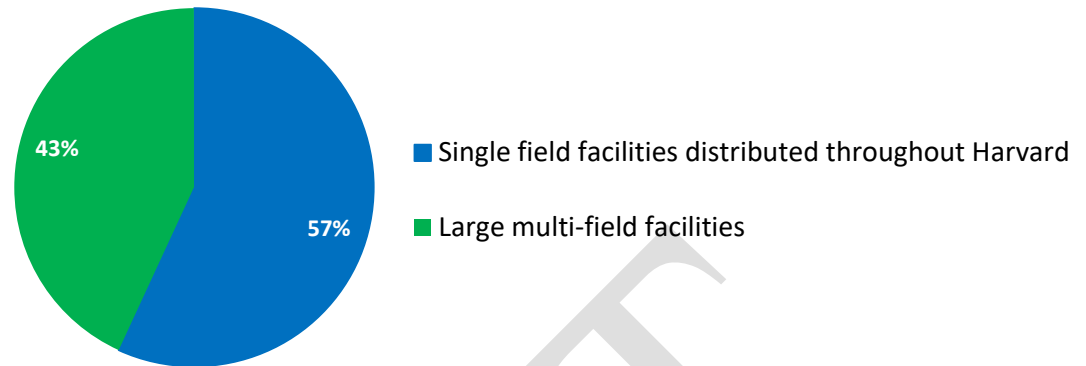
Q13. Which additional recreational facilities are needed in Harvard? Provide an opinion for each type.



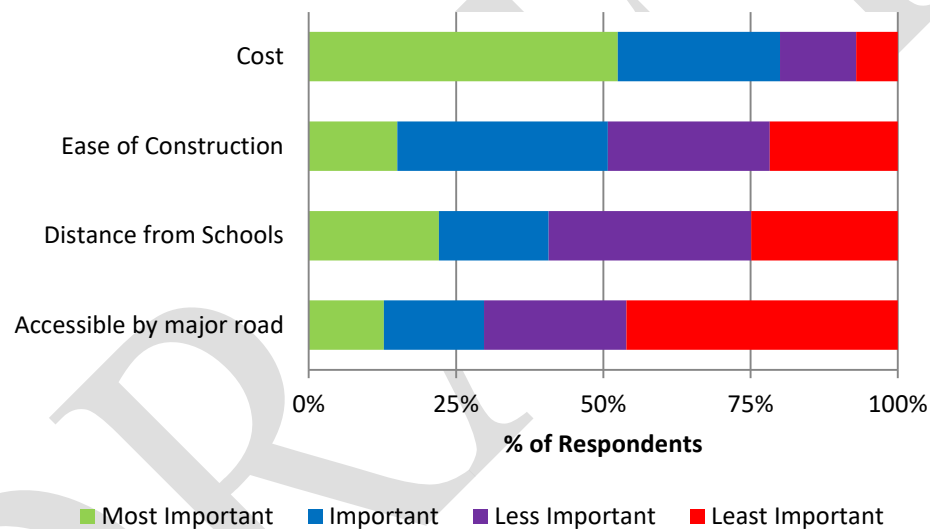
Q14. What issues/concerns do you have about the recreational facilities in Harvard that you or your family use? Provide an opinion for each.



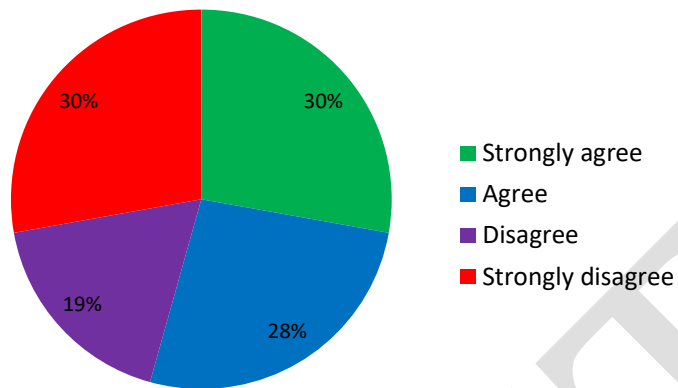
Q15. Which scenario do you prefer for additional recreation facilities in Harvard?



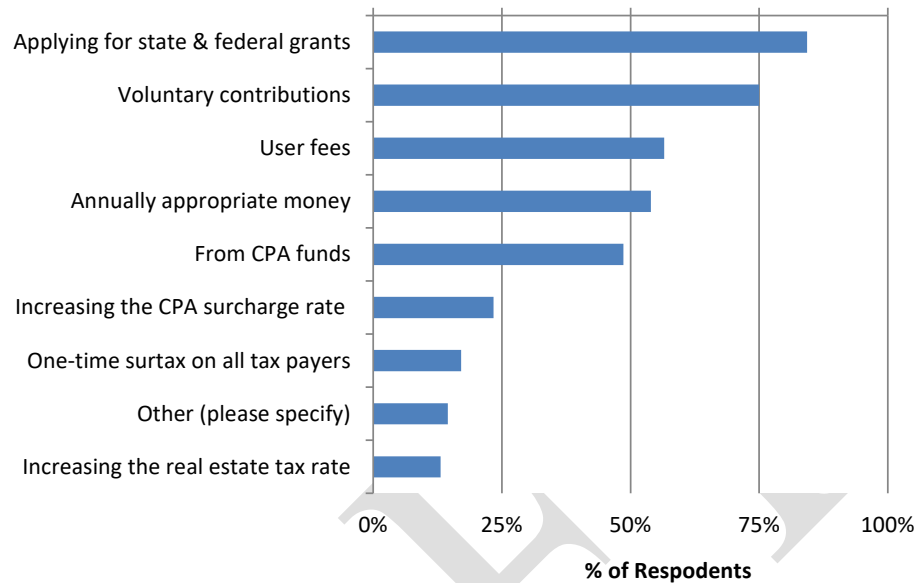
Q16. Which is the most important selection criteria for the location of new recreation facilities?



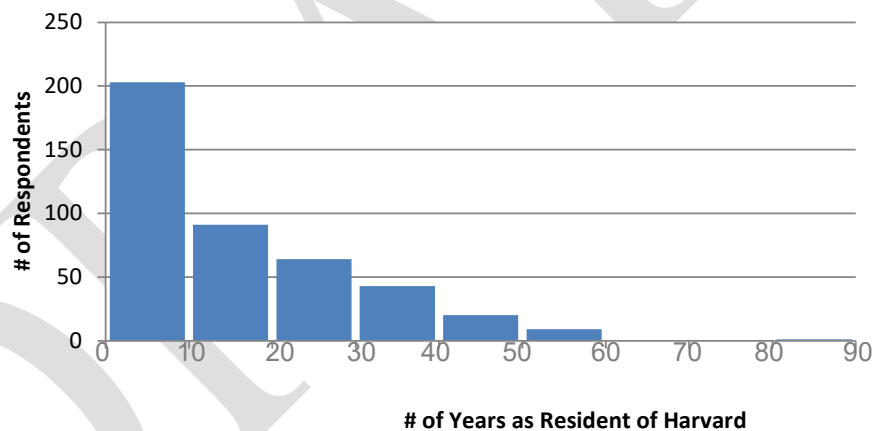
Q17. Should a recreational facility be funded by an annual real estate tax increase?



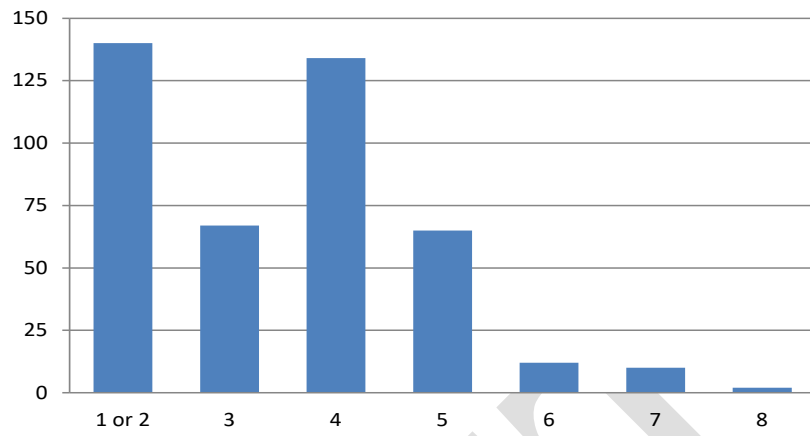
Q18. How should the funds be raised for a multi-sport playing field facility? Select all that apply.



Q19. How many years have you been a resident of Harvard?



Q20. How many people currently reside in your household?



C. Broad Statement of Open Space and Recreation Goals

The Townspeople of Harvard overwhelmingly value open space as important for agriculture, recreation, ecological communities and fish & wildlife habitat, surface water & groundwater protection, forest protection, trail networks, landscape connections and undeveloped, connective corridors, open vistas, and scenic, unique, or culturally or historically important areas or features to maintain the rural character of the Town. A public survey conducted in 2022 as part of the planning process for the most recent update of this Plan indicated that the Townspeople of Harvard overwhelmingly continue to value various aspects of open space and believe that the Town should continue to protect open space to maintain the valuable ecological and recreational benefits it provides.

To express this Community Vision, the Harvard Open Space Committee proposes the following vision statements, or broad-scale open space and recreation goals:

- I. As the Town population increases, so does the need to protect finite natural, historical, and cultural resources. It is necessary to acquire, or otherwise protect, undeveloped forest lands, agricultural lands, recreational lands, ecologically sensitive areas, critical fish & wildlife habitats, unique landscapes, or scenic vistas, and historically or culturally significant features of the landscape for the functions, values, and benefits they provide.
- II. As the Town population increases, so does the need for active recreational facilities. It is necessary to acquire, develop or gain access to, and maintain high-quality, active recreational lands to continue to meet the needs of the Townspeople.
- III. As changing climatic conditions continue to influence the increased frequency, duration, and magnitude of natural hazards, such as storms, precipitation, and drought, so does the need to reduce our ecological footprint and increase the resiliency of our Town's landscape through open space protection, and the promotion, adoption, and implementation of sustainable practices and principals.
- IV. Bare Hill Pond is a center of year-round recreation in the community and a primary example of the recreational and ecological benefits of open space valued by the Townspeople of Harvard. The Town Beach and its programs have continually improved over the years. Water quality has also improved due to efforts to reduce phosphorous levels and invasive aquatic plants using non-invasive, chemical-free methods. Continuing to improve services at the Town Beach and maintaining the health of Bare Hill Pond is important to the Town and its people.

- V. Increasing connectivity between open space parcels, resulting in a more connected natural landscape and providing a network of trails and pathways into the Town Center and across Town, facilitates and promotes the convenient and safe movement of wildlife and people between open space areas and throughout Town on foot, by bicycle, or by other modes of alternative transportation or micro-mobility, reducing the need for automobiles, providing increased recreational opportunities, functional natural habitat connections, and enhanced climate resiliency.
- VI. Agriculture has a long and storied history in Harvard and remains an integral component of Harvard's economy, character, and sense of community. In 2006, Harvard established an Agricultural Advisory Commission (AgCom) and adopted the Right-to-Farm Bylaw. Since the last Open Space and Recreation Plan (2016), the Harvard AgCom has created an Agricultural Climate Action Plan (2020) and conducted a study (MRPC, 2022) to explore the most effective means of accomplishing the primary charges of the Commission and implementing the goals of the Agricultural Climate Action Plan. Encouraging and promoting sustainable agricultural practices and the protection of areas of prime agricultural soils to maintain, enhance, and increase the presence, quality, productivity, and resiliency of Harvard's agricultural lands is important to the Town and its people.

Section 7: ANALYSIS OF NEEDS

Based on the public input to this Plan and the information presented in earlier sections, the most pressing Community Needs for open space and recreation in Harvard are summarized below.

A. Resource Protection Needs

1. Protection of Harvard's Agricultural Resources

The agriculture and agricultural lands of Harvard are primary components of the Town's rural character and an integral part of Harvard's heritage and economy. Agricultural parcels, which comprise nearly half of the unprotected land in Harvard, need particular attention because the same landscape characteristics that make them suitable for agriculture also make them ideal sites for potential development and conversion to other non-open space uses. Unprotected agricultural lands generally have excellent development potential and are frequently at risk of conversion to other uses.

The importance of locally produced and locally accessed food was recently realized and magnified by the sudden impacts to national food distribution networks experienced because of the effects of the Covid-19 pandemic in 2020. Locally raised and grown meat, dairy, and produce played an important role in meeting the needs of many residents and offsetting the limited availability of certain foods. This need is forecasted to continue and increase with predicted changes to the climate, the likelihood of future pandemics, and the potential risk of disruptions to global agricultural processes. Protecting local agricultural lands and promoting effective local food markets and distribution networks and equitable access to local agricultural products is an important need for the Town of Harvard. Of particular importance is the need for protection of areas of designated high value agricultural soils including Prime Farmland Soils, Farmland of Statewide Importance, and Farmland of Unique Importance.

The Town, through its Agricultural Advisory Commission and Open Space Committee, should have a plan for preserving and protecting these important agricultural lands, as well as other existing or potential orchards or farmlands, via purchase, Agricultural Preservation Restrictions (APR), or Conservation Restrictions (CR). The public needs to be educated about the threat to these lands, and the critical resources they provide, and a funding source should be established to preserve or protect them.

2. Watershed Protection

As headwaters for three major watersheds (Nashua River Watershed, Merrimack River Watershed, and Assabet River sub-watershed of the Concord River Watershed), Harvard needs to develop a plan to protect water resources and their surrounding lands. Additional open space protection in the Bare Hill Pond watershed and around perennial streams, associated wetlands, and their buffer zones is essential. Further protection can be achieved by educating the community on watershed protection, non-polluting lawn care, sustainable domestic water-use and conservation practices, enforcement of and adherence to water-use restrictions during periods of prolonged drought, and best management practices for horses, domesticated farm animals, and agricultural livestock and irrigation. Individual, targeted outreach to property owners within areas directly draining to streams or ponds, as well as educational and additional informational signage

or pavement markings identifying the affected stream, pond, or watershed area of drainage structures or roadside drainage areas would also enhance awareness and increase watershed protection.

3. Rural Character

Harvard's rural character is defined by its mixed landscape and topography. Wooded hillsides give way to open fields and vistas, stone walls line most of the Town's protected scenic roads, farmsteads and 18th and 19th century houses dot the older roads between the three historic villages (Still River, Town Center and Shaker Village). Critical landscapes and view sheds need to be identified and prioritized for protection, local and State regulations regarding shade trees and stone walls need to be carefully enforced, and a demolition delay bylaw should be considered to protect older historic structures. Redevelopment of farmsteads should be approached with the goal of maintaining the existing structures and preserving or maintaining the existing ratio of building to open field landscape layouts and patterns to the greatest extent possible. In general, the need to protect and maintain unique, scenic, and culturally or historically important landscapes and features is critically important to preserving the rural character of the Town.

4. Climate Resiliency

Enhancing resiliency to changing climatic conditions through protection of high-value soil resources, wetlands, critical habitats, ecologically sensitive areas, and areas of high ecological integrity and connectivity is essential to the future protection of Harvard's valued natural resources and Open Space & Recreation assets. Harvard's resource protection needs are both consistent with and dependent upon the community's climate resiliency needs. The proposed strategies, goals, and actions of recent climate resiliency studies and reports, such as the Town of Harvard's *Community Resilience Building Workshop Summary of Findings* (2019)²⁰, assessment of *The Impact of Climate Change on Agriculture* (2019)²¹, and the *Apple Country Natural Climate Solutions Project* (2022)²², are intended to increase the climate resiliency of the Town of Harvard, and specifically its Open Space and Recreation lands. The Goals, Objectives, and Actions of the OSRP should continue to consider climate resiliency needs relative to resource protection.

²⁰ Town of Harvard. (2019). Community Resilience Building Workshop Summary of Findings. Harriman. Harvard, Massachusetts. (<https://www.harvard-ma.gov/energy-advisory-committee/municipal-vulnerability-preparedness-sub-committee/pages/mvp-general-and>)

²¹ Town of Harvard, (2019). The Impact of Climate Change on Agriculture: Harvard, Massachusetts. (<https://www.harvard-ma.gov/energy-advisory-committee/municipal-vulnerability-preparedness-sub-committee/pages/mvp-general-and>)

²² The recent Apple Country Climate Solutions Project (2022) recommended several Nature-based Solutions (NbS) to enhance climate resiliency by protecting important natural resources including soils, habitats, forests, wetlands, and watersheds. The project focused on identifying high leverage nature-based climate solutions for the Towns of Harvard, Bolton, and Devens. It included an in-depth assessment of High Value Soil Resources and produced a corresponding map of areas and sites recommended for nature-based solutions. (<https://climateresilient.wixsite.com/applecountry/project-story>)

B. Community Needs

1. Trail Network and Walkways

Since the 2016 Plan several other Town studies and plans have identified the need for increased availability, accessibility, and connectivity of pedestrian and bicycle infrastructure and amenities to create safe, convenient, usable networks for alternative modes of transportation to get around Town – either to the Town Center and schools, or between recreation areas – without traversing Harvard’s narrow and increasingly busy roads. In 2005, the Town Center Action Plan identified was forward thinking in identifying the need for town-wide pedestrian and bicycle safety and network connectivity improvements radiating from the Town center and connecting important public gathering spaces and recreational areas. In 2016 75% of the Open Space survey respondents felt this was “Very Important” or “Important”. Since then (and leading up to this current revision of the Plan) the Town has reiterated the continued need for pedestrian and bicycle improvements within the Town Center Transportation Study (2016), Master Plan (2016), Complete Streets Policy and Prioritization Plan (2017), Town Center Action Plan Update (2018), and Harvard Transportation Plan Update (2022). As a result, considerable pedestrian improvements were made to the Town center with new sidewalks and improved parking added in the vicinity of the General Store. Currently (2022-2023), a major transportation and pedestrian improvement project funded by MassDOT through the Statewide Transportation Improvement Program (S-TIP) along a substantial portion of Route 110, Ayer Road, north of Route 2, is in the planning and design phase. This project includes a multiuse pedestrian pathway along an important commercial and residential roadway corridor with potential for future connections to nearby recreation areas (McCurdy Track, Harvard Park, and Charlie Waite Fields). Further, it is within proximity to planned pedestrian and multiuse trail improvements associated with Old Mill Road and Depot Road Trails which will provide important direct connections to existing trails and recreation areas located within Devens, Massachusetts.

These projects are examples of critical steps toward implementing some of the important transportation needs and goals that have been previously identified within other plans and are described in greater detail within Section 3 of this Plan. Using this as momentum to continue this recent progress and take additional steps toward achieving a broader, connected network of trails, paths and greenways is an important open space “need”.

Below is a summary of identified trail network and walkway needs:

- Increased pedestrian safety and trail linkages to open space and recreation areas
- Create a ‘walkable’ and ‘bikeable’ pedestrian-friendly village environment
- Provide increased pedestrian and bicycle linkages between gathering places and recreational resources

A connected trail network – also identified as a need in the 2008 and 2016 Open Space and Recreation Plans – would provide a way for children to safely walk or bike to school, and for residents to get to Town Center without the use of motorized vehicles. This trail network would provide increased recreation opportunities for people while at the same time providing greenways between open space areas that would serve as important wildlife habitat corridors. Addressing this need would equitably serve the community and

significantly benefit people of all ages, and abilities by providing a safe, convenient, and accessible alternative transportation network and recreational opportunity.

2. Bare Hill Pond

In addition to its importance as a natural resource and scenic beauty, Bare Hill Pond, a waterbody designated by the Commonwealth of Massachusetts as a “Great Pond”²³, provides a wide variety of recreational uses – swimming, boating and winter sports. However, increased usage combined with aging infrastructure is placing increased demands on both the natural and physical resources of the pond, landscape, and existing facilities which requires a comprehensive plan for future investment and long-term protection ensuring continued community benefit and enjoyment.

3. Active Recreation Facilities

While Harvard has continued to grow over the past decade, the development of recreational playing fields has not. As a result, existing fields have become overused and overcrowded. Harvard is in need of additional playing fields for organized sports leagues, as well as for more informal play and pick-up games. Additional recreation facilities should be ADA accessible and environmentally sustainable to the greatest extent practicable.

²³ Under Massachusetts General Law, Chapter 91 (MGL Ch. 91), *The Massachusetts Public Waterfront Act*, a “Great Pond” is defined as any pond or lake that is greater than 10-acres in size in its natural state or which once were that size. In Massachusetts, Great Ponds are held in trust by the Commonwealth (State) as a common, public resource and as such public access to great ponds is provided by right.

C. Management Needs

1. Open Space Protection Plan and Funding

The Townspeople value Harvard's open space for a variety of reasons, and despite the generous amount of open space that has already been protected, realize that more land needs to be preserved to maintain Harvard's rural character. This is especially critical as much of Harvard's most visible and iconic open space is unprotected. In the public survey, 80% of the respondents indicated they believed that the Town should either increase the current rate of Open Space protection in Harvard (37%) or continue to protect it at the current rate (43%). Only 7% felt that the rate of protection should be decreased, while the remaining 13% felt that the focus should be put on maintaining currently owned Open Space.

Relative to Open Space funding, 58% felt that the Town should increase the amount of funds allocated annually to open space protection. Of those, 37% felt the amount should be somewhat increased and 21% indicated that the amount should be significantly increased. Only 4% of respondents believed the amount should be decreased and only 2% believed that the allocation should be eliminated. The current annual rate of Open Space expenditure over the past 10-years was estimated at approximately \$200,000. Most responses for the appropriate amount of annual funding allocated annually to Open Space protection expenditures ranged between \$200,000 and \$600,000 with the median value being \$300,000.

Nearly all survey respondents (95%) felt that the Town should fund the acquisition of open space by applying for State and Federal grants. Similarly, many (approximately 80%) of respondents also felt that Open Space acquisitions should be funded by voluntary contributions and by Town funds generated from the Community Preservation Act (CPA) administered by the Community Preservation Committee. Relative to the CPA, 41% of respondents indicated that increasing the Act's surcharge rate²⁴ from its current rate of 1.1% would also be a preferable way of funding open space acquisitions. Many others (57%) also indicated that they felt the acquisition of open space should be funded by an Open Space line item in the annual Town budget. However, very few respondents agreed with increasing the real estate tax rate or levying a one-time surtax on all taxpayers as a way of funding Open Space acquisitions.

The most recent assessment of statewide development and urban sprawl conducted by Mass Audubon (Losing Ground, 2020²⁵) found that, between 2012 and 2017, the Town of Harvard experienced a rate of development of 3.7 acres per square-mile (ranked 118th out of 351 communities statewide), an increase of more than 1-acre per square-mile from the previously documented time-period (2005-2013; 2.4). While a rate of development of 3.7 acres per square mile between 2012 and 2017 may seem modest, it was higher than the average for Worcester County (3.4) and the Montachusett Region (2.8). Further, and perhaps most concerning, the abutting towns of Ayer (11.06), Littleton (8.85), and Shirley

²⁴ The maximum allowable CPA surcharge rate under the Act is 3%. Adoption of a full 3% surcharge rate results in qualification for additional matching funds contributed by the Commonwealth.

²⁵ Ricci, E.H., J. Collins, J. Clarke, P. Dolci, and L. de la Parra. 2020. Losing Ground: Nature's Value in a Changing Climate. Massachusetts Audubon Society, Inc., Lincoln, Massachusetts, 33 pp. (<https://www.massaudubon.org/our-conservation-work/policy-advocacy/local-climate-resilient-communities/publications-community-resources/losing-ground>)

(7.9) are among the highest rates in the State over that same period with Ayer being second only to Uxbridge (11.42), and Littleton and Shirley experiencing the 6th and 8th highest rates of development statewide (in acres per square mile). To prepare for the existing and potential development pressure that is increasingly placed on Harvard's unprotected open space, and to gain town-wide understanding of the potential threat that exists, and most importantly, build support for protection, the Town needs to publicize the risk to the land that the Open Space Committee has identified as most important to protect. It then needs to identify a funding mechanism to support the plan, for approval by Town Meeting.

2. Recreational & Open Space Facility Maintenance

As previously mentioned above in the "Community Needs" section, the Town's facilities for organized sports are heavily used, and their condition reflects it. Many comments from the public survey indicated that playing fields needed improved basic maintenance such as mowing, seeding, and watering. Also noted was the need for additional playing fields to meet current degree of demand and rates of usage and allow field rotation and rest periods to prevent overuse.

The Town's natural open spaces could benefit from increased trail upkeep and additional, ongoing invasive plant control. The Town's trails are maintained by volunteers. As invasive plant control often requires the use of chemicals and machinery, it has been contracted out. As presented in section 4G earlier, the Town has had success in combating invasives, especially over the past ten years since the previous iteration of this Plan. However, it is an ongoing effort, and requires continued funding to achieve continued success and improvements.

Management plans for all Town recreational facilities and open space lands should be developed to ensure these resources are properly maintained, and hence able to provide their intended benefits and functions.

3. Bare Hill Pond

Bare Hill Pond was regarded by respondents of the public survey as one of the most highly valued aspects of Open Space and Recreation in Harvard. The occurrence of such highly valued instances of both natural resources and recreational resources at this location make it a prime example of the need for sound, ongoing Open Space & Recreation Planning within a community. The high ecological and recreational value and complex public-use interactions related to a multi-use facility such as a pond with a swimming beach and boating and sailing programs place added pressures, unique (sometimes overlapping) responsibilities, and importance to meeting public needs related to maintenance and public services. This, coupled with the popularity and increasing usage of Bare Hill Pond for recreation, requires elevated and calculated management and maintenance strategies and commitments to account for competing uses and required coordination among the overlapping authorities regulating the pond area.

Such a need and responsibility should not be underestimated or undervalued, and a joint Natural Resources and Recreation Management Plan should be prepared for the area to provide the greatest possible level of ecological protection and high-quality recreational opportunities that the area currently promises.

Section 8: GOALS AND OBJECTIVES

The following provides a comprehensive set of Goals and Objectives to meet the general, broad-scale Community Vision goals identified in Section 6. The order of the Goals and Objectives is not prioritized.

Goals / Objectives:

1. Provide an adequate & reliable funding stream to obtain & protect Open Space

- a) work with CPIC and CPC to identify an annual funding mechanism
- b) develop a strategy for obtaining Town Meeting approval
- c) work with other non-profits and government agencies to protect open space
- d) identify appropriate State and Federal grant opportunities for implementation of Open Space Goals & Actions
- e) consider and seek alternate funding sources for situations where public grants are unattainable due to eligibility requirements, competitiveness, or community demographics
- f) consider the added costs (or savings) and benefits of potential climate resiliency opportunities and nature-based solutions for all open space and recreation related projects and acquisitions

2. Protect, enhance, and preserve the rural character and historic landscapes

- a) maintain Town's historic villages: Harvard center, Still River Village and Shaker Village
- b) preserve and maintain scenic view sheds, unique landscapes, designated scenic roads, protected stonewalls and shade trees, and other rural and culturally and historically important characteristics and features
- c) encourage the preservation of existing architectural and landscape features and characteristics of 18th and 19th century farmsteads whenever possible
- d) promote the use of nature-based solutions and associated green infrastructure over traditional stormwater infrastructure in areas where it is desired to preserve rural and scenic character or historic landscapes and/or to enhance climate resiliency or ecological sustainability

3. Protect Harvard's agricultural land

- a) maintain a current, up-to-date prioritized inventory of unprotected agricultural land, including areas of Prime Farmland Soils, and Farmland of Statewide Importance
- b) continue to publicize and pursue the protection of lands that are classified as a high priority
- c) obtain funding for the protection of agricultural land (APR and purchase)
- d) support active agriculture and aspects of the mission of the Agricultural Advisory Commission that are consistent with the community's open space goals

4. Protect Bare Hill Pond as an important shared resource

- a) maintain and improve the health of the pond
- b) balance and regulate recreational use of the Pond and the beach
- c) plan for future investment and long-term protection of Bare Hill Pond and the Town Beach to ensure continued community benefit and enjoyment relative to both resource protection and recreational opportunities

5. Provide an interconnected trail network and walkways

- a) develop a town-wide system of interconnected trails, multi-use pathways, and safe routes along roadways for non-vehicular travel between open spaces, recreation areas and public gathering places
- b) provide safe, accessible trails and walkways to and from Town Center
- c) consider climate resiliency, habitat connectivity and wildlife passage, and the use of nature-based solutions and low-impact design in the design and development of all trails and pathways

6. Provide high-quality recreational opportunities for all Harvard residents

- a) expand recreational opportunities for residents of all ages
- b) update any Town-owned recreational facilities that do not meet ADA standards
- c) improve field maintenance
- d) enhance existing recreational facilities to make them more equitable and accessible to people of all ages and abilities
- e) pursue the development of new, additional recreational fields or facilities

7. Protect water resources, including groundwater and wetlands

- a) identify and protect open space critical to protecting Harvard's water resources with a focus on land within the buffer zone of protected wetland resource areas, Title 5 buffer zones, groundwater aquifers, wellhead protection areas, or areas draining directly to waterbodies
- b) develop a management strategy for roadside invasive plants, such as Japanese knotweed, affecting stormwater infrastructure
- c) educate townspeople on the importance and function of wetlands
- d) educate townspeople on the importance of water conservation and sustainable use, especially during periods of prolonged or persistent drought
- e) encourage and promote opportunities for stormwater infiltration and the implementation of nature-based solutions and green infrastructure over traditional stormwater infrastructure wherever or whenever feasible

8. Protect native plant and animal species

- a) create wildlife corridors
- b) preserve habitat for native plants, animals and threatened species
- c) educate townspeople on invasive plants
- d) promote the selection of a diversity of native urban street and landscape trees with consideration given to climate resiliency, ecological function & services (including stormwater interception and uptake), and disease and insect resistance to promote a native, sustainable, functional urban forest.

9. Maintain and improve the Town's open space

- a) develop natural resource and forest management plans for Town-owned open space
- b) allocate resources to maintain existing open space and conduct necessary stewardship activities, especially the continued management and removal of invasives species

Harvard's Open Space and Recreation Goals & Objectives presented within Section 8 above are consistent with the Community Vision, or broad-scale community Open Space Goals presented within Section 6 of this Plan. The Goals and Objectives also directly, or indirectly, address specific or common needs identified within the Analysis of Needs documented within Section 7.

A Seven-year Action Plan, based on information presented within the previous sections of this Plan and presented within Section 9 below, provides actionable tasks aimed at implementing a *Community Vision*, addressing established *Community Needs*, or accomplishing a specified *Open Space Goal or Objective* relative to six important categories or themes of Open Space and Recreation determined to be important to the community within the town-wide public survey.

The six categories or themes important to Harvard's Open Space and Recreation vision, needs, and goals & objectives, are listed below:

- Active Recreation Lands (Athletic Fields, Parks & Playgrounds) and Activities
- Agricultural Lands and Activities
- Ecologically Sensitive Areas, Unique or Important Ecosystems & Wildlife Habitats
- Forest Lands & Passive Outdoor Recreation Areas
- Cultural or Historical Resources, Scenic Vistas, and Unique, Rural Landscapes and Landscape Features
- Groundwater and Surface Water Resources and their Contributing Watersheds

The specific representation of each category or theme within Sections 6, 7, and 8 of the Plan is shown below.

Table 8.1 - The Six Important Themes of the 2024 Open Space and Recreation Plan

| | | <i>Open Space Category</i> | | | | | |
|---------------------|------------|--------------------------------|---------------------------|-------------------------------------|---------------------|----------------------------------------------------|-----------------------------|
| OSRP Section | | Active Recreation Lands | Agricultural Lands | Ecologically Sensitive Areas | Forest Lands | Scenic Vistas, Historical or Cultural Sites | Water & Wetlands |
| Section 6 | Vision I | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| | Vision II | ✓ | | | | | |
| | Vision III | | ✓ | ✓ | ✓ | ✓ | ✓ |
| | Vision IV | ✓ | | ✓ | | ✓ | ✓ |
| | Vision V | ✓ | | ✓ | ✓ | | |
| | Vision VI | | ✓ | | | ✓ | |
| Section 7 | Need A1 | | ✓ | | | ✓ | |
| | Need A2 | | | ✓ | | | ✓ |
| | Need A3 | | ✓ | | | ✓ | |
| | Need A4 | | | ✓ | ✓ | | |
| | Need B1 | | | ✓ | ✓ | | |
| | Need B2 | | | ✓ | ✓ | ✓ | ✓ |
| | Need B3 | ✓ | | | | | |
| | Need C1 | | ✓ | ✓ | ✓ | ✓ | ✓ |
| | Need C2 | ✓ | | ✓ | ✓ | | |
| | Need C3 | ✓ | | ✓ | ✓ | ✓ | ✓ |
| | | | | | | | |
| Section 8 | Goal 1 | ✓ | ✓ | ✓ | ✓ | ✓ | ✓ |
| | Goal 2 | | ✓ | | | ✓ | |
| | Goal 3 | | ✓ | | | | |
| | Goal 4 | ✓ | | ✓ | ✓ | ✓ | ✓ |
| | Goal 5 | ✓ | | ✓ | ✓ | ✓ | |
| | Goal 6 | ✓ | | | ✓ | | |
| | Goal 7 | | | ✓ | | | ✓ |
| | Goal 8 | | | ✓ | ✓ | ✓ | ✓ |
| | Goal 9 | ✓ | | ✓ | ✓ | | |

Section 9: 7-YEAR ACTION PLAN

The following 7-year Action Plan provides a list of actionable items aimed at achieving the Community Vision, addressing Community Needs, and accomplishing Community Goals and Objectives; it acts as an implementation guide for the promotion, protection, and enhancement of Open Space and Recreation lands and opportunities within the Town of Harvard over the next seven years.

This section establishes a suggested timetable for the implementation of specific actions to accomplish each of the objectives identified for the goals listed within Section 8, Goals & Objectives. In addition to an implementation schedule, the Action Plan also identifies a “Responsible Party” and potential “Funding Source(s)” for each recommended action.

Goal 1: Provide an adequate and reliable funding stream to obtain and protect open space

| Actions | Responsible Party | Funding Source | Year(s) |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------------|--------------------------------|----------------|
| Objective 1a: Work with CPIC and CPC to identify an annual funding mechanism | | | |
| Meet with FinCom, CPIC, CPC & Select Board to identify preferred funding source(s) | OSC SB, FinCom, OSC, CPIC, CPC | n/a | 2024 |
| Create a funding plan for open space protection | OSC | n/a | 2024 |
| Objective 1b: Develop a strategy for obtaining Town Meeting approval of Funding Plan for Open Space Protection | | | |
| Obtain Finance Committee & Select Board approval for Plan | SB, OSC, FinCom | n/a | 2025 |
| Publicize the benefits of protecting open space and the proposed funding sources | OSC | Department Budget | 2025 |
| Objectives 1c: Identify and seek appropriate sources of funding for implementation of Open Space goals & actions | | | |
| Apply for State, Federal, and local funding and grant programs | OSC, P&R, ConCom | Town Budget, CPIC, CPC, | 2025 |
| Seek funding from private and non-profit foundations | OSC | Private and Non-Profit Funding | 2025 |
| Objective 1d: Consider the added costs (or savings) and benefits of potential climate resiliency opportunities and nature-based solutions for all open space and recreation related projects and acquisitions. | | | |
| Seek Input on Open Space Uses | OSC, HCIC | n/a | ongoing |

CPC = Community Preservation Committee
 CPIC = Capital Planning & Investment Committee
 FinCom = Finance Committee

HCIC = Harvard Climate Initiative Committee
 OSC = Open Space Committee
 SB = Select Board

Goal 2: Protect, enhance, and preserve Harvard's rural character and historic landscapes

| Actions | Responsible Party | Funding Source | Year(s) |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|--------------------------|----------------|
| Objective 2a: Maintain the Town's historic villages: Harvard Center, Still River Village and Shaker Village | | | |
| Adopt a demolition delay bylaw. | HHC | n/a | 2024 |
| Explore nomination of a portion or portions of Still River Village as an additional historic district | HHC | CPA, Grants | 2025 |
| Create plan to maintain, and renovate, when necessary, Town-owned historic buildings and structures, commons, stone walls, cemeteries, and sidewalks/trails/paths. | HHC, FM | CPA, Grants | 2026 |
| Create guidelines that allow for the modernization of green infrastructure on historic properties. | HCIC, HHC | Grants | 2026 |
| Improve streetscapes with plantings, remove overhead wires where feasible, and calm traffic to facilitate pedestrian movements. | DPW, TAC | MassDOT Complete Streets | 2027 |
| Objective 2b: Preserve and maintain scenic view sheds, unique landscapes, designated scenic roadways, protected stone walls and shade trees, and other rural and culturally or historically important characteristics or features of the landscape | | | |
| Modify the Open Space Conservation– Planned Residential Development (OSC-PRD) zoning bylaw to promote clustering of new housing units in order to maintain views of Harvard landscapes, protect scenic resources on the site and increase open space. | PB | n/a | 2024 |
| Discuss and consider the adoption of a Bare Hill Pond zoning overlay district to manage growth, protect environmental quality and preserve scenic views | PB, BHPWMC | Department Budget | 2026 |
| Develop a historical marker program to highlight important events and features of the Town. | FWHA, HHC | CPA | 2026 |

| | | | |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------|-------------------|---------|
| Determine the protection status of properties identified in the Freedom's Way 2007 Landscape Inventory Report. When development threatens unprotected sites, consider acquisition or work with developers to minimize alteration of the view shed. | OSC | CPA, Town Meeting | ongoing |
| Objective 2c: Encourage the preservation of existing architectural and landscape features and characteristics of 18th and 19th century farmsteads whenever possible | | | |
| Adopt a demolition delay bylaw. | HHC | n/a | 2024 |
| Objective 2d: Promote the use of nature-based solutions and associated green infrastructure over traditional stormwater infrastructure in areas where it is desired to preserve rural and scenic character or historic landscapes and/or to enhance climate resiliency or ecological sustainability | | | |
| Amend or create new bylaws/regulations | HHC, PB, ConCom, HCIC | n/a | 2026 |

BHPWMC = Bare Hill Pond Watershed Management Committee
 ConCom = Conservation Commission
 CPA = Community Preservation Act
 DPW = Department of Public Works
 FM = Facilities Manager
 FWHA = Freedom's Way Heritage Association

HCIC = Harvard Climate Initiative Committee
 HHC = Harvard Historical Commission
 HCT = Harvard Conservation Trust
 OSC = Open Space Committee
 PB = Planning Board

Goal 3: Protect Harvard's agricultural land

| Actions | Responsible Party | Funding Source | Year(s) |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|---------------------------------|---------|
| Objective 3a: Maintain a current, up-to-date prioritized inventory of unprotected agricultural land, including areas of Prime Farmland Soils, and Farmland of Statewide and Local Importance | | | |
| Continue to maintain and utilize the existing evaluation methodology developed by the OSC for prioritizing the protection of unprotected agricultural land | OSC | n/a | ongoing |
| Evaluate all Chapter 61A land and prioritize those most in need of addition protection | OSC | n/a | ongoing |
| Objective 3b: Continue to publicize and pursue the protection of lands that are classified as a high priority | | | |
| Publicize the importance of protecting agricultural land | OSC, HAAC, HCIC | Department Budget | ongoing |
| Objective 3c: Obtain funding for the protection of agricultural land (APR and purchase) | | | |
| Apply for State, Federal, and local funding and grant programs | OSC, HAAC | Town Budget, CPIC, CPC, | ongoing |
| Seek funding from private and non-profit foundations | OSC, HAAC | Private and Non-Profit Funding | ongoing |
| Work with USDA Natural Resource Conservation Service to obtain Designation Farm Land of Local Importance & Agricultural Land Easements | HAAC | USDA | ongoing |
| Objective 3d: Support active agriculture and aspects of the mission of the Harvard Agricultural Advisory Commission (HAAC) that are consistent with the community's open space goals | | | |
| Expand existing Harvard Grown Program to promote local commercial agriculture | HAAC, HCIC | Town Meeting | ongoing |
| Conduct public outreach and education related to the importance of local agriculture and sustainable agricultural practices, and the protection of farmlands and areas of Prime Agricultural Soils | HAAC, OSC | Department Budgets, Grants | 2026 |
| Develop a plan to conduct Agricultural Best Practices Forums | HAAC | Department Budgets, Grants, CPA | ongoing |

| | | | |
|--------------------------------------------------------|------|------------------------------------------|---------|
| Develop a plan to conduct Farmland Connection Programs | HAAC | Department Budgets, Grants, CPA | ongoing |
|--------------------------------------------------------|------|------------------------------------------|---------|

CPA = Community Preservation Act
HAAC = Harvard Agricultural Advisory Commission

HCIC= Harvard Climate Initiative Committee
OSC = Open Space Committee

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Goal 4: Protect Bare Hill Pond as an important shared resource

| Actions | Responsible Party | Funding Source | Year(s) |
|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------|------------------------------|-----------|
| Objective 4a: Maintain and improve the health of the pond | | | |
| Continue comprehensive monitoring of nutrient levels and invasive plants on an annual basis and continue controls of those levels and plants through the deep winter drawdowns on an annual basis. Collaborate with P&R and seek future funding and additional methodologies to supplement drawdowns to control invasive species at the Town Beach and for private funded use by other Pond abutters | BHPWMC | Department Budget and Grants | ongoing |
| Maintain stormwater runoff controls as needed. | BHPWMC, DPW | Department Budget | ongoing |
| Monitor for water health, algae blooms and biodiversity of pond and provide education and outreach to the public regarding these issues | BHPWMC, BOH, HCIC | Department Budget, Grants | ongoing |
| Objective 4b: Balance and regulate recreational use of the Pond and the beach | | | |
| Complete upgrades to Beach House | P&R | CPIC | 2025 |
| Work with ConCom to create a plan to add additional parking | P&R | n/a | 2025-2027 |
| Fund the acquisition of new safety equipment for water related programs | P&R | Department Budget, Grants | ongoing |
| Objective 4c: Plan for future investment and long-term protection of Bare Hill Pond and the Town Beach to ensure continued community benefit and enjoyment relative to both resource protection and recreational opportunities | | | |
| Continue to maintain and utilize the existing evaluation methodology developed by the OSC for prioritizing the protection of unprotected open space in the Bare Hill Pond Watershed | OSC, P&R, BHPWMC | n/a | ongoing |
| Prepare Natural Resources and Recreation Management Plan and Watershed Management Plan for DEP approval for the area to provide the greatest possible level of ecological protection and high-quality recreational opportunities and to enable additional future DEP Grand funding | P&R, BHPWMC, ConCom | Department Budgets, Grants | 2029 |

BHPWMC = Bare Hill Pond Watershed Management Committee
BOH = Board of Health
CPIC = Capital Planning & Investment Committee
DPW = Department of Public Works

OSC = Open Space Committee
P&R = Parks & Recreation Commission
HCIC = Harvard Climate Initiative Committee

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Goal 5: Provide an interconnected trail network and walkways

| Actions | Responsible Party | Funding Source | Year(s) |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------|---------------------|--------------------|
| Objective 5a: Develop a town-wide system of interconnected trails, multiuse pathways, and safe routes along roadways for non-vehicular travel between open spaces, recreation areas, and public gathering places. | | | |
| Update current trail mapping to include new trails and pathways and to identify potential linkages | OSC, ConCom, HCT, TAC | Department Budget | 2025-2026; ongoing |
| Work with private landowners to provide easement access between trails on protected land | OSC, HCT | Department Budget | ongoing |
| Publicize the planned Ayer Road transportation improvement project, including multiuse pathway | SB, PB, TAC | Departmental Budget | 2025 -2026 |
| Complete path for pedestrian and bicycles between Old Mill Road and Devens to allow for safer access and connectivity to Devens | TAC | Grants, CPA | 2025-2026 |
| Install signage ("Share the Road") and pavement markers along town roads alerting drivers to walkers, bikers and others using the roads | SB, TAC | Department Budget | 2024-2026 |
| Objective 5b: Provide safe, accessible trails and walkways between Town Center, recreational and open space lands | | | |
| Complete linkages from Town Beach to McCurdy Track, including access to open space lands | ConCom, P&R, TAC | Grants, CPA | 2026-2027 |
| Complete path for pedestrians and bicycles between Old Mill Road and Devens to allow for safer access and connectivity to Devens | TAC, ConCom | Grants | 2024 -2025 |
| Continue to develop and expand bicycle and pedestrian walkway, multipurpose pathways, and trail connections within and around Town Center, including connections to Depot Road and Oak Hill Road | TAC, ConCom | Grants, CPA | 2028 |
| Objective 5c: Consider climate resiliency, habitat connectivity and wildlife passage, and the use of nature-based solutions and low-impact design in the design and development of all trails and pathways | | | |
| Create a climate changes/environmental assessment form to identify areas to address in terms of climate resiliency and nature-based solutions | HCIC | N/A | 2024 |
| Apply for State, Federal, and local funding and grant programs | HCIC, HCT, ConCom, TAC | CPC, Grants | ongoing |

CPA = Community Preservation Act
ConCom = Conservation Commission
HCIC = Harvard Climate Initiative Committee
HCT = Harvard Conservation Trust
P&R = Parks & Recreation Commission

PB = Planning Board
OSC = Open Space Committee
SB = Select Board
TAC = Transportation Advisory Committee

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Goal 6: Provide high-quality recreational opportunities for all Harvard residents

| Actions | Responsible Party | Funding Source | Year(s) |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|------------------------------|----------------------------------------------|-----------|
| Objective 6a: Expand recreational opportunities for residents of all ages | | | |
| Create a plan and prioritize improvements to Harvard Park including: <ul style="list-style-type: none"> expand & improve the fitness course expand, update, and improve the playground add permanent water and restroom facilities | P&R | Department Budget, CPA, Capital Fund, Grants | 2025-2026 |
| Fund the acquisition of new recreation equipment for additional water related programs | P&R | Department Budget, Grants | ongoing |
| Plan a Town sports and recreation facility with space for various fitness and recreation activities | P&R | Capital Fund, CPA, Grants | 2027 |
| Work with the Open Space Committee for the purpose of acquiring multi-use parcels of land that incorporate common goals regarding conservation, recreation trails and playing fields. | OSC, P&R | Department Budget, Town Meeting, CPA, Grants | ongoing |
| Continue to provide annual or semi-annual scenic, guided hikes that will attract people to rewarding views of the Town's iconic natural and historic features | ConCom, HCT | CPA, Town Meeting, Grants | ongoing |
| Objective 6b: Update any town owned recreational facilities that do not meet ADA | | | |
| Incorporate federal ADA requirements and Section 504 recommendations for people with disabilities into town and recreational facilities | P&R, ADA Coordinator | CDGB Funds | ongoing |
| Identify trails that could be adapted for people with disabilities | ConCom, P&R, ADA Coordinator | n/a | 2028 |
| Objective 6c: Improve field maintenance | | | |
| Allocate funds for additional vendors to be used for field maintenance. | P&R | Department Budget | ongoing |

| Objective 6d: Enhance existing recreational facilities to make them more equitable and accessible to people of all ages and abilities | | | |
|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------|----------------------------------------------|-----------|
| Where needed, add equipment, gates, and parking accessible to all. | P&R | CPA, CPIC, Grants, Department Budget | ongoing |
| Objective 6e: Pursue the development of new, additional recreational fields or facilities to meet the needs of the community | | | |
| Identify parcels of land suitable for additional playing fields capable of meeting the recreational needs of the community based on activity type, availability, and corresponding demand and identify and secure funds for purchase | P&R, OSC | Department Budget, Town Meeting, CPA, Grants | 2024-2026 |
| Identify and secure funds for the design and development of a recreational facility capable of meeting community needs relative to activity (field) type, availability, and usage demands at the selected location(s) | P&R | Department Budget, Town Meeting, CPA, Grants | 2024-2026 |

Capital Fund = Town Meeting Appropriation
CDBG = Community Development Block Grant
ConCom = Conservation Commission
CPA = Community Preservation Act
HCT = Harvard Conservation Trust

OSC = Open Space Committee
P&R = Parks & Recreation Commission
SB = Select Board
TAC = Transportation Advisory Committee

Goal 7: Protect water resources including, groundwater and wetlands

| Actions | Responsible Party | Funding Source | Year(s) |
|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------------|---------------------------|----------------|
| Objective 7a: Identify and protect open space critical to protecting Harvard's water resources with a focus on land within the buffer zone of protected wetland resource areas, Title 5 buffer zones, groundwater aquifers, wellhead protection areas, or areas draining directly to waterbodies | | | |
| Review current undeveloped land bordering water resources, determine their legal status and prioritize those most vulnerable | OSC | n/a | 2026 |
| Develop a plan for financing protection of the most vulnerable land bordering water resources | SB, OSC, CPIC | Capital Fund, CPA, Grants | 2027 |
| Objective 7b: Develop a management strategy for roadside invasive plants, such as Japanese knotweed, affective stormwater infrastructure | | | |
| Identify and map Japanese knotweed along Harvard's roadsides that is affecting stormwater infrastructure | DPW, ConCom | Department Budget, Grants | 2024 |
| Create management plan for roadside invasives | DPW, ConCom | Department Budget, Grants | 2025 |
| Implement Roadside Invasive Management Plan | DPW | Capital Fund, Grants | 2026 |
| Objective 7c: Educate townspeople on the importance and function of wetlands | | | |
| Update the wetlands pamphlet | ConCom, HCIC | Department Budget | 2024 |
| Update the town website with current information | ConCom, HCIC | n/a | ongoing |
| Develop presentation for local residents and school-aged children | ConCom, HCIC | Department Budget | 2026 |

| | | | |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|---------------------------|------|
| Objective 7d: Educate townspeople on the importance of water conservation and sustainable use, especially during periods of prolonged or persistent drought | | | |
| Educate residents on sustainable practices for lawn care, landscaping, tree care, and invasive species management | HCIC, ConCom, BOH | Department Budget, Grants | 2025 |
| Objective 7e: Encourage and promote opportunities for stormwater infiltration and the implementation of nature-based solutions and green infrastructure over traditional stormwater infrastructure wherever or whenever feasible | | | |
| Implement flood control through ranking and prioritization of town-owned culverts replacement and upgrades in accordance with Massachusetts Stream Crossing Standards | DPW | Capital Fund, Grants | 2025 |

Capital Fund = Town Meeting Appropriation
 CPIC = Capital Investment and Planning
 ConCom = Conservation Commission
 CPA = Community Preservation Act

DPW = Department of Public Works
 HCIC = Harvard Climate Initiative Committee
 OSC = Open Space Committee
 SB = Select Board

Goal 8: Protect native plant and animal species

| Actions | Responsible Party | Funding Source | Year(s) |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|---------------------------|------------|
| Objective 8a: Create wildlife corridors | | | |
| Engage townspeople in identifying wildlife movement in their neighborhoods | ConCom | n/a | ongoing |
| Identify areas of known wildlife movement; identify wildlife species using those corridors | ConCom | n/a | ongoing |
| Mark primary wildlife corridors including seasonal migrations using animal crossing signs | ConCom, DPW | Department Budget Grants | ongoing |
| Enhance the protection of east/west drainage wildlife corridor through Prospect Hill conservation land and along Bower's Brook wetland by protecting the abutting Davis land off Still River Road and Van Wormer land on Ayer Road | ConCom, HCT | CPA, Capital Fund, Grants | 2025 -2026 |
| Objective 8b: Preserve habitat for native plants, animals and threatened species | | | |
| Review known Massachusetts NHESP priority and estimated habitat areas and identify and prioritize those most in need of protection | OSC | n/a | 2025 |
| Identify and report to Massachusetts NHESP previously known and new endangered, threatened, and special concern species habitat | ConCom, HCT | n/a | ongoing |
| Develop a guide for public use on creating and maintaining "backyard wildlife habitat", how to live with wildlife in a rural area, and manage private land to promote and protect wildlife and plant habitat for rare and endangered species | ConCom | Department Budget | 2027 |
| Improve habitat for pollinators and beneficial insects with protection and cultivation of native plants | HCIC | Grants | 2024 |
| Objective 8c: Educate townspeople on invasive plants | | | |
| Develop invasive plant brochures for distribution to public | ConCom, HCT | CPA, Grant | 2026 |
| Organize annual invasive plant removal days | ConCom | Department Budget | ongoing |

| | | | |
|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|----------------|-------------------------------|---------|
| Organize lectures and hands-on training on invasive plant management | ConCom, HCT | CPA, Grants | ongoing |
| Objective 8d: Promote the selection of a diversity of native urban street and landscape trees with consideration given to climate resiliency and adaptability, ecological function & services (including stormwater interception and uptake), and disease and insect resistance to promote a native, sustainable, functional urban forest. | | | |
| Create a plan that will replace existing species, when necessary, that are diversity for a “healthy” urban forest that are climate resilient, adaptable, and disease and insect resistant that would allow for an individual to donate funding for replacement. | EC, TW | Grants, Private Funding | 2026 |

Capital Fund = Town Meeting Appropriation
ConCom = Conservation Commission
CPA = Community Preservation Act
DPW = Department of Public Works

EC = Elm Commission
HCIC = Harvard Climate Initiative Committee
HCT = Harvard Conservation Trust
OSC = Open Space Committee
TW = Tree Warden

Goal 9: Maintain and improve the Town's open space

| Actions | Responsible Party | Funding Source | Year(s) |
|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------------------|-----------------------------------------|-------------|
| Objective 9a: Develop natural resource, recreation, and forest management plans for Town owned open space | | | |
| Create a Conservation Land Vision Plan for all Town-owned conservation land | ConCom | Department Budget, Town Meeting, Grants | 2025-2026 |
| Develop a community-wide Trails Vision Plan | OSC, ConCom, P&R, TAC | Department Budget, Town Meeting, Grants | 2024-2026 |
| Objective 9b: Allocate resources to maintain existing open space | | | |
| Create a multi-year budget for open space maintenance and improvement, especially the continued management and removal of invasives species to be included the amount in the annual ConCom budget. | ConCom | Department Budget | 2026 |
| Create a management plan for the monitoring of conservation restrictions on Town-owned land | ConCom | Department Budget, Town Meeting, Grants | 2024 - 2025 |

ConCom = Conservation Commission
OSC = Open Space Committee

P&R = Parks & Recreation Commission
TAC = Transportation Advisory Committee

Section 10: PUBLIC COMMENTS

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Appendix 1: Maps

Map A.1 - Zoning & Zoning Overlay Districts

Map A.2 - Water Resources 1

Map A.3 - Water Resources 2

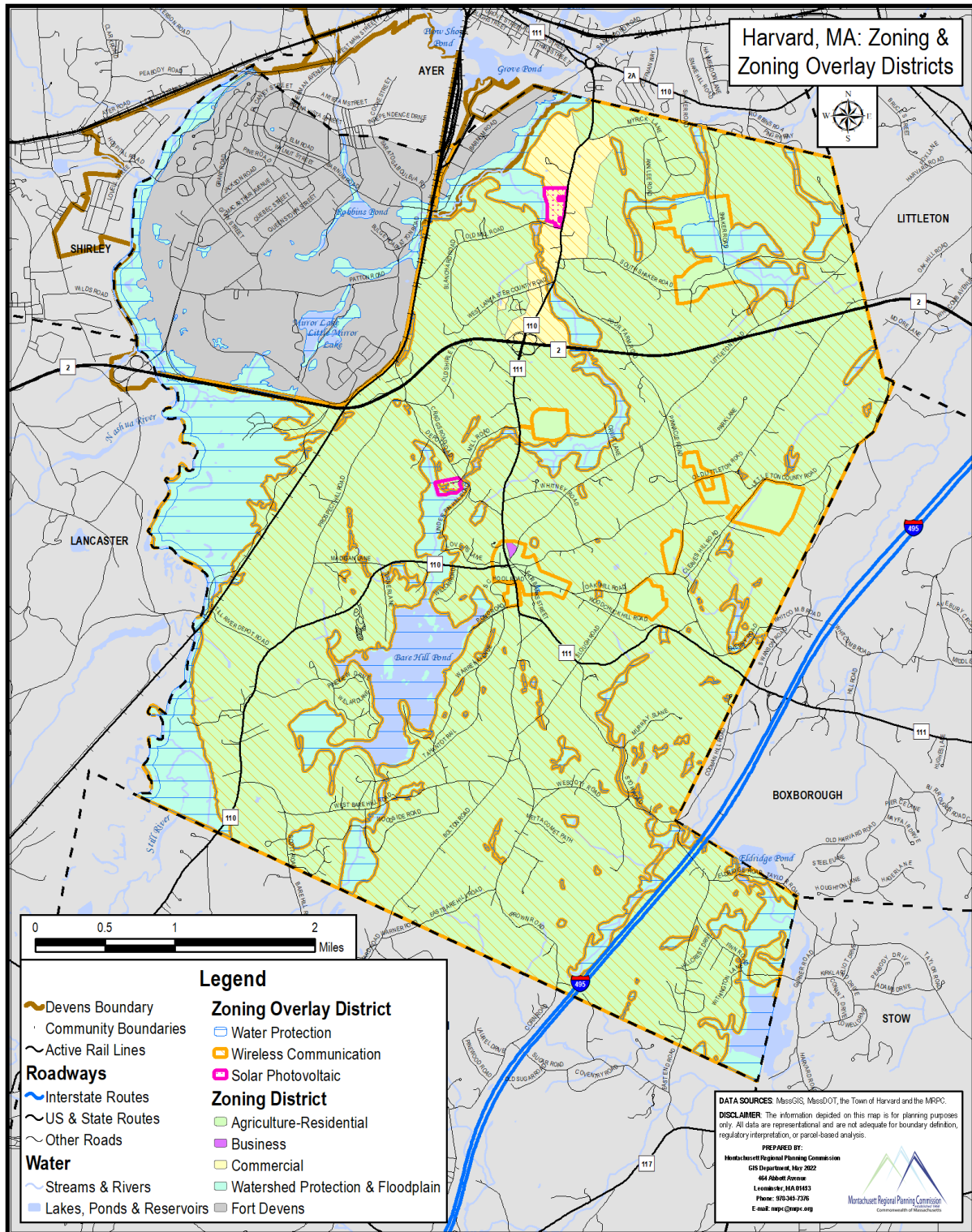
Map A.4 - Water Resources 3

Map A.5 - Unique Features & Scenic Resources

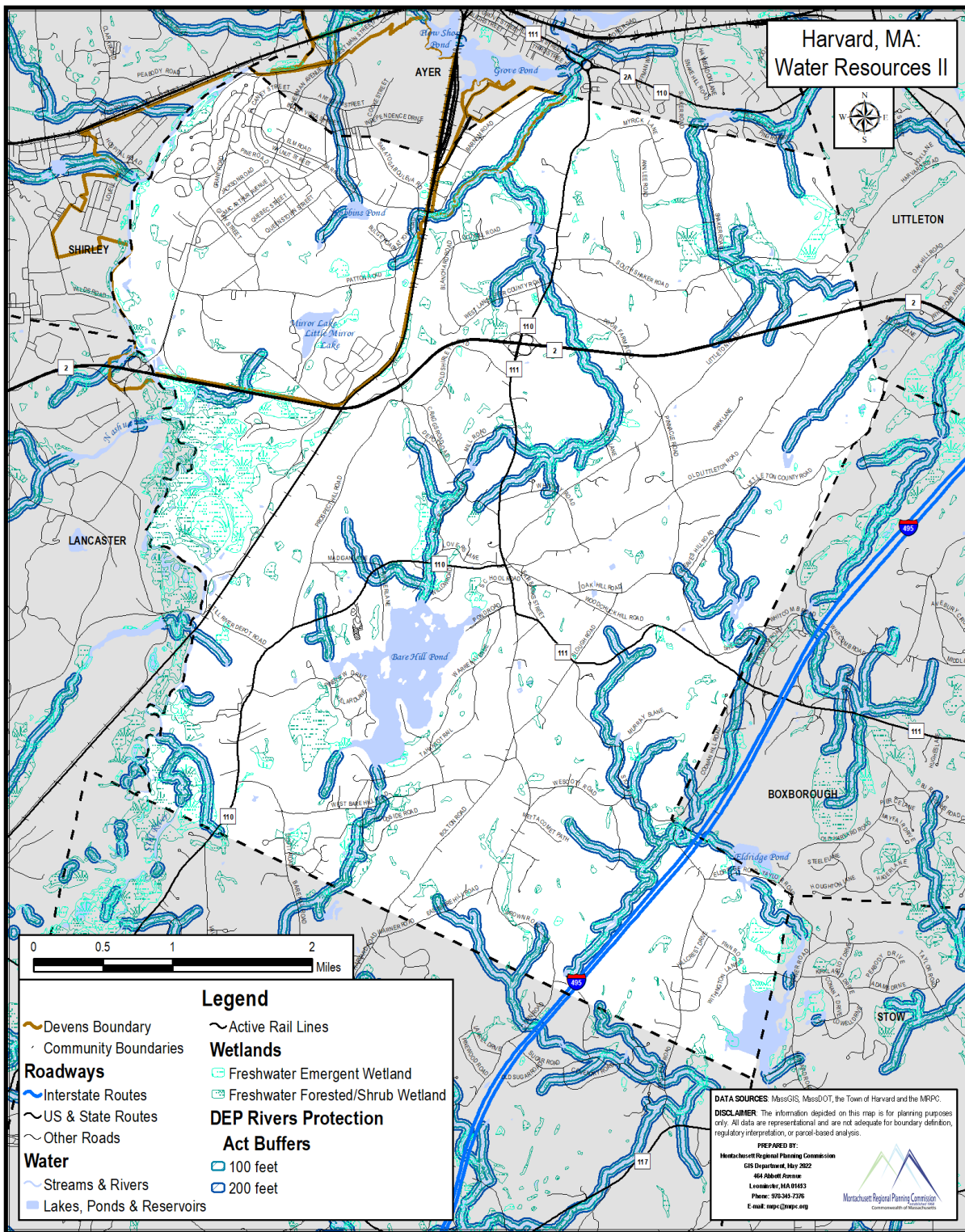
Map A.6 - Regional Context

Map A.7 - Open Space

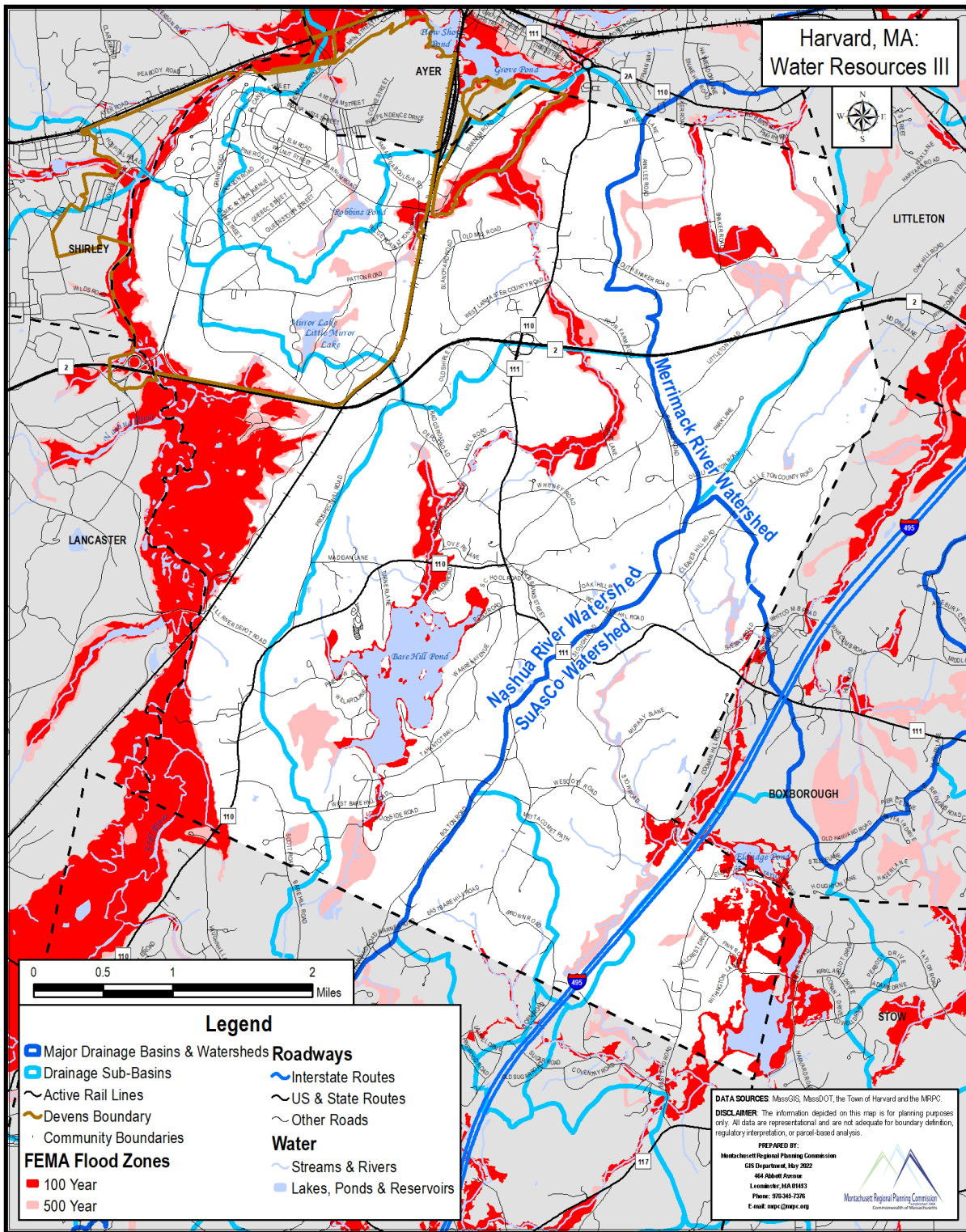
Map A.8 - Soils & Geologic Features



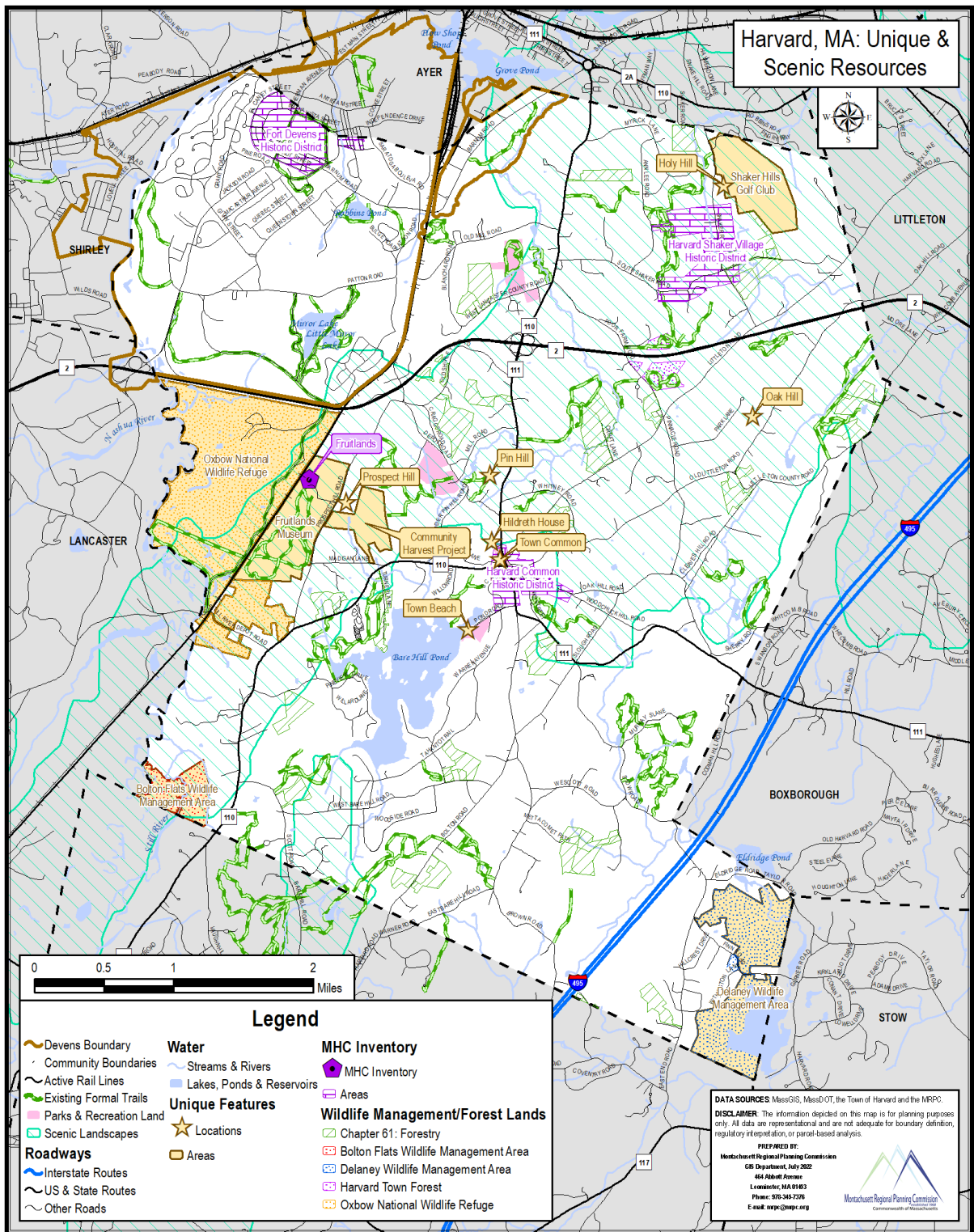
Map A.1 - Zoning & Zoning Overlay Districts



Map A.2 - Water Resources 1

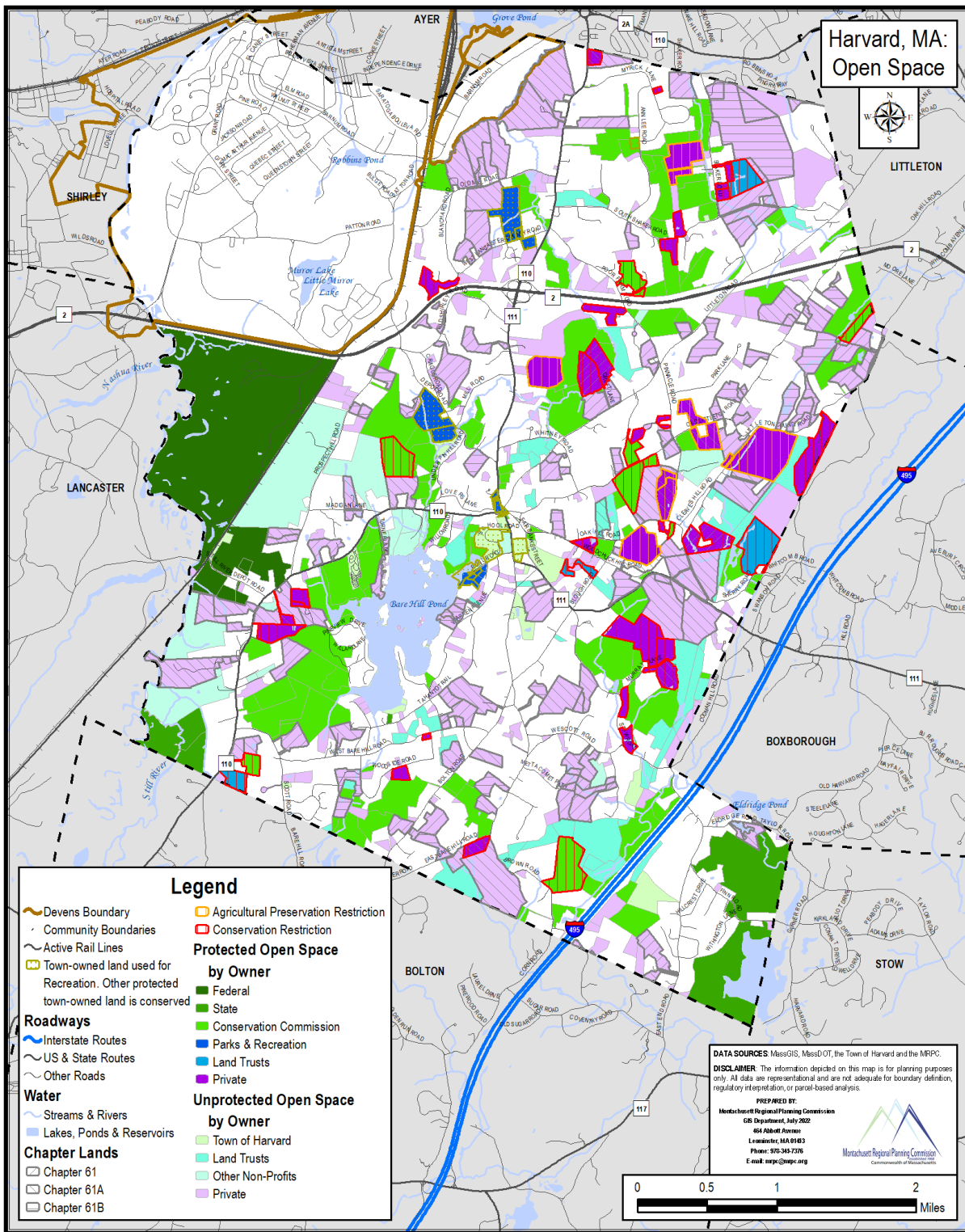


Map A.3 - Water Resources 2

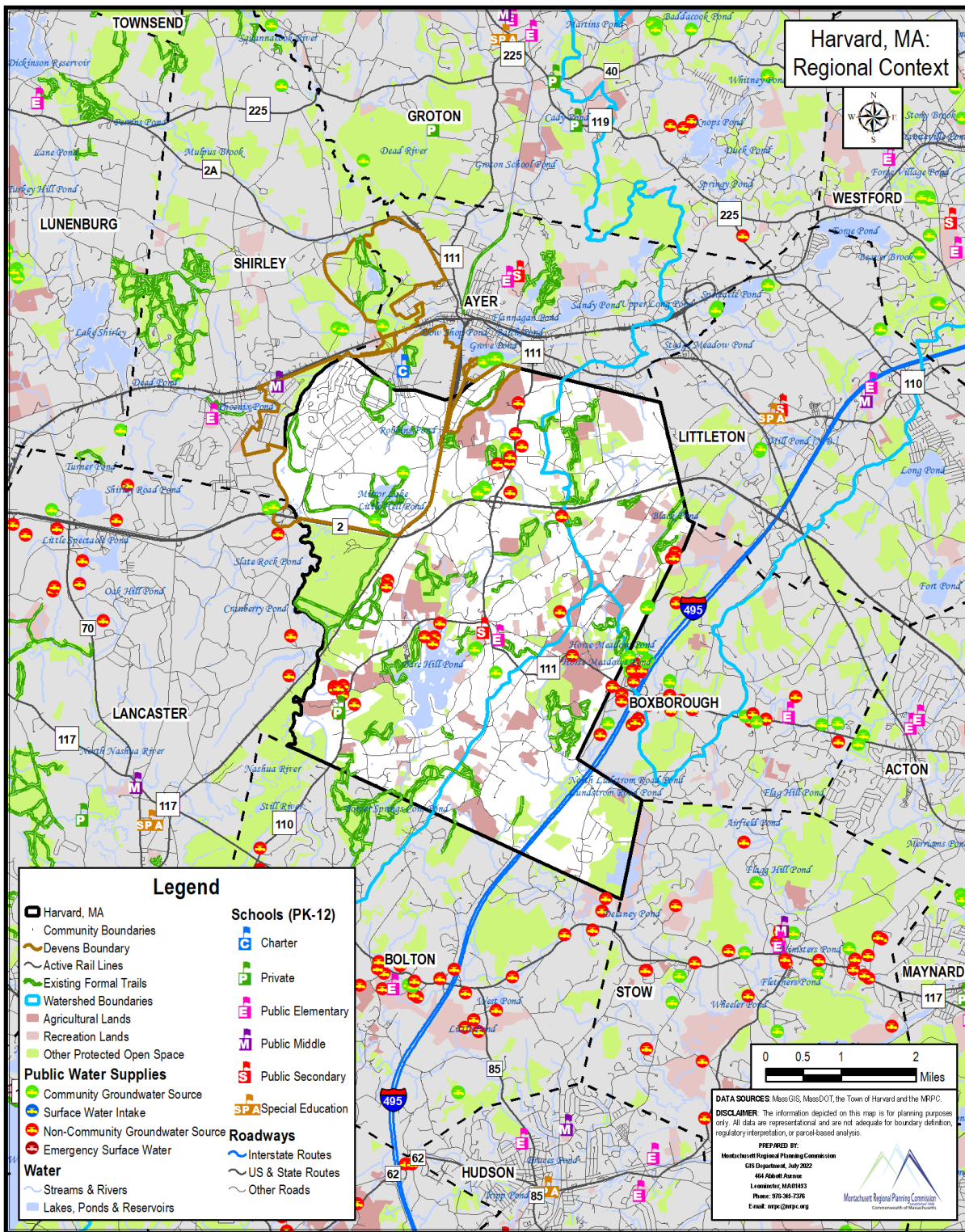


Map A.4 - Water Resources 3

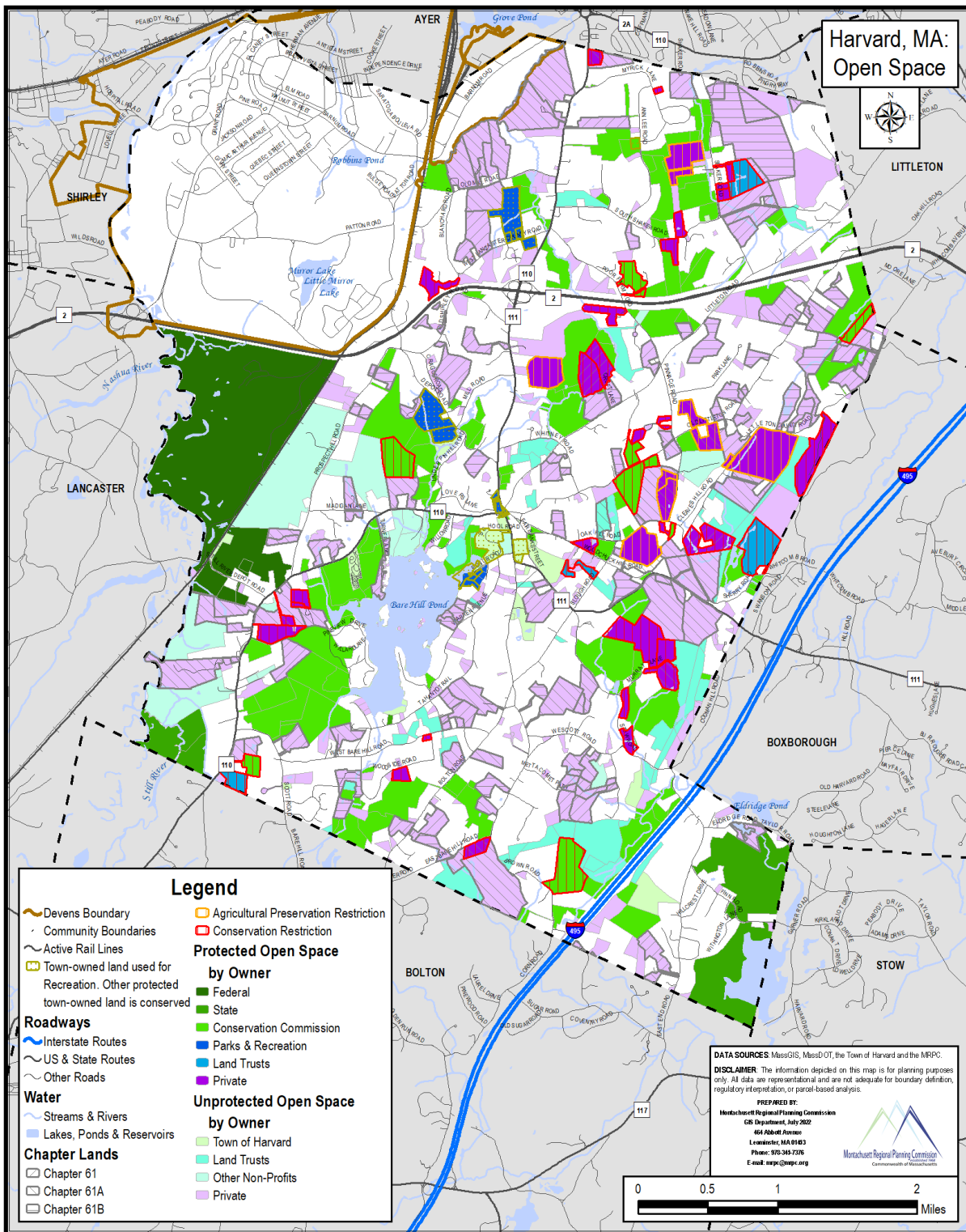
DRAFT



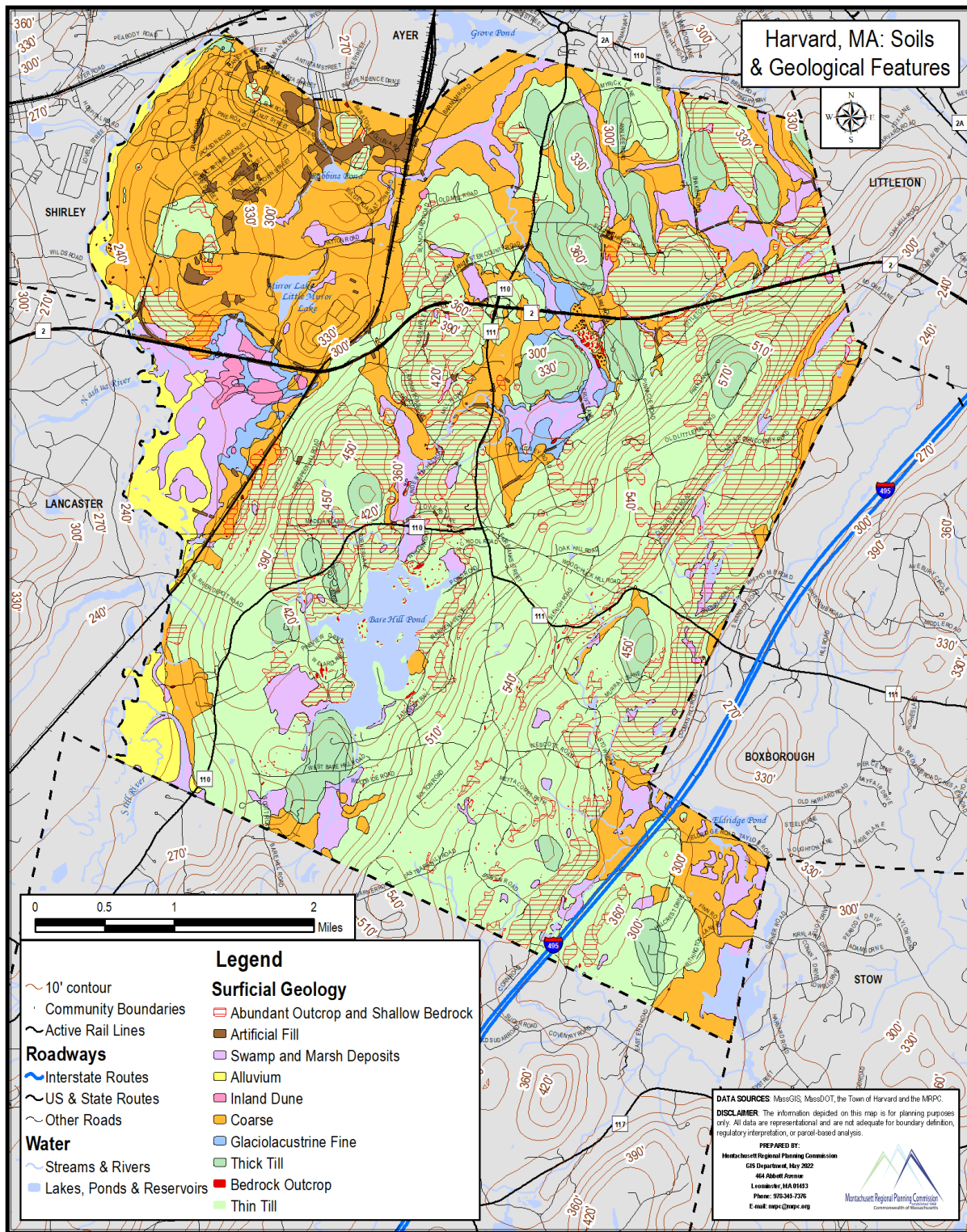
Map A.5 - Unique Features & Scenic Resources



Map A.6 - Regional Context



Map A.7 - Open Space



Map A.8 - Soils & Geologic Features

Appendix 2: Open Space and Recreation Plan Survey



Harvard Open Space & Recreation Plan (OSRP) Public Survey

Please help the Town of Harvard update our Open Space & Recreation Plan (OSRP) by participating in this important survey. A state-approved OSRP plan is necessary to qualify for state funding supporting open space (conservation & recreation) acquisitions and improvements. This survey is being conducted to better understand the needs and vision of Harvard residents relative to the Town's open space and recreation facilities.

Open space in this plan is defined as both publicly- and privately-owned undeveloped lands which provide public benefits including wildlife habitat, connectivity to other open space, water resource protection, recreational opportunities, agriculture, forests, and unique or scenic properties. Recreation can refer to active or passive recreation. Active recreation includes team sports and recreation that require courts or fields.

The survey is divided into two parts. The first addresses the Town's open space at a broad level. The second part focuses on the Town's facilities created specifically for active recreation.

This survey should take no more than 10 minutes to complete. Thank you for your time and responses!

Responses to this survey will be anonymous. Your feedback will be used to update the Town's Open Space & Recreation Plan by identifying what is important to its residents, and to create 5 year action plan to address those needs. The survey responses and 5 year action plan will be presented in a public meeting this fall.



Harvard Open Space & Recreation Plan (OSRP) Public Survey

Open Space Protection

One half of the Town of Harvard is currently open space, or undeveloped land, and over half of the open space is unprotected, meaning it could be developed. This would have an immense impact of the character of the Town. This part of the survey

is designed to ascertain how and why you value open space, if more open space should be protected, and how protecting it should be funded.

1. How much do you value open space in Harvard?

- ☐ Extremely
- ☐ Very much
- ☐ Somewhat
- ☐ Not at all

2. Why do you value open space in Harvard?

- ☐ Agriculture
- ☐ Forests
- ☐ Maintains the Town's rural character
- ☐ Protects wetland resource areas, including streams, ponds, and aquifers
- ☐ Provides open vistas
- ☐ Preserves plant and animal habitat
- ☐ Protects rare species
- ☐ Increases resiliency to the impacts of climate change
- ☐ Increases property values
- ☐ Other (please specify)

3. One half of the Town of Harvard is currently either publicly or privately owned open space, and over half of the open space is unprotected. Should more open space be protected, or should the Town focus on managing the open space that is already protected?

- ☐ More open space
- ☐ Manage existing already protected open space
- ☐ Other (please specify)

4. How important to you is it to preserve each of the following:

| | Very important | Somewhat important | Neutral/no opinion | Not too important | Not important at all |
|-------------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| Ecologically sensitive areas | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Farmlands | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Forests | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Places of historical or architectural interest. | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Vistas, view sheds | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Wetlands, ponds & streams | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

5. How satisfied are you with the Harvard's past and present initiatives for protecting open space in Harvard?

| | Very satisfied | Somewhat satisfied | Neutral/no opinion | Somewhat dissatisfied | Very dissatisfied |
|------------------------------------------------------------------|-----------------------|-----------------------|-----------------------|-----------------------|-----------------------|
| Agriculture | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Ecologically sensitive areas including climate change mitigation | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Forests | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Connecting parcels of protected open space | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Protection of water resources and wetlands | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Land for recreational facilities | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |
| Land for passive recreation | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> | <input type="radio"/> |

6. What do you consider to be the highest open space priorities for Harvard over the next 5 years? Please rank the top 5 from the following list:

- ☐ Preserving agriculture
- ☐ Protecting ecologically sensitive areas, including climate change mitigation
- ☐ Connecting parcels of protected open space
- ☐ Protecting forested land
- ☐ Protecting water and wetlands
- ☐ Acquisition of land for recreational facilities
- ☐ Acquisition of land for passive recreation

7. How should the Town finance the acquisition of open space?

- ☐ Open space line item in the annual Town budget
- ☐ Increasing the real estate tax rate
- ☐ One-time surtax on all tax payers
- ☐ Increasing the Community Preservation Act surcharge rate
- ☐ Applying for state and federal grants
- ☐ Voluntary contributions
- ☐ Other (please specify)

8. The Town has spent an average of \$200,000 annually over the past 10 years to protect open space. This has been augmented by an average of \$500,000 annually from state grants and funds from private conservation trusts. How much should the Town allocate to open space protection in the coming five years?

- ☐ Significantly increase amount
- ☐ Somewhat increase amount
- ☐ Maintain amount
- ☐ Decrease amount
- ☐ Eliminate allocation

9. What amount should the Town annually allocate to open space protection? (Please put dollar amount)



Harvard Open Space & Recreation Plan (OSRP) Public Survey

Recreation Facilities

The Town's recreational facilities are currently being over used, resulting in generally poor field conditions. This part of the survey is designed to find out what recreational facilities you use, and what additional recreational facilities you think are needed.

10. How satisfied are you with the following types of recreation facilities in Harvard?

- ☐ Athletic fields & courts
- ☐ Beach
- ☐ Boating
- ☐ Multi-use paths & trails
- ☐ Playgrounds

11. How should maintenance of existing Harvard recreation facilities be accomplished/funded?

- ☐ Maintenance line item in annual Town budget
- ☐ Applying for state and federal grants
- ☐ Increase in real estate taxes
- ☐ User fees
- ☐ Voluntary contributions
- ☐ Volunteers
- ☐ School or scout projects
- ☐ Town hired seasonal workers

12. Which of the following recreational facilities do you or your family use in Harvard?

- ☐ Beach
- ☐ Boating on Bare Hill Pond
- ☐ Baseball field
- ☐ Basketball court
- ☐ Lacrosse field
- ☐ Pickleball court
- ☐ Soccer field
- ☐ Softball field
- ☐ Tennis court
- ☐ Other (please specify)

13. What additional recreational facilities are needed in Harvard?

- ☐ Beach
- ☐ Bike pump track
- ☐ Bike trails
- ☐ Boating on Bare Hill Pond
- ☐ Baseball field
- ☐ Basketball court
- ☐ Disk golf course
- ☐ Football field
- ☐ Lacrosse field
- ☐ Open recreation fields for general use
- ☐ Outdoor amphitheater
- ☐ Pickleball court
- ☐ Picnic areas
- ☐ Skateboard park
- ☐ Soccer field
- ☐ Softball field
- ☐ Tennis court
- ☐ Other (please specify)

14. What issues/concerns do you have about the recreational facilities in Harvard that you or your family use?

- ☐ Access to facilities
- ☐ Lack of restrooms
- ☐ Maintenance
- ☐ Not enough field space
- ☐ Parking
- ☐ Scheduling
- ☐ Other (please specify)

15. Should Active Recreation sites be chosen to fit multiple fields or would smaller one field sites be better?

- ☐ Large multi-field facilities
- ☐ Single field facilities distributed throughout Harvard

16. What are the most important selection criteria for the location of new recreation facilities:

- ☐ Cost
- ☐ Ease of construction
- ☐ Accessible by a major road
- ☐ Distance from schools

17. A new multi-field recreation facility has been proposed for Harvard with an estimated development cost of \$4.5M including land acquisition and building the facility. This would add an estimated \$xxx to the annual taxes for an average residence if funded through debt exclusion. Would you support raising funds for such a multi-field recreation facility?

18. How should the funds be raised for a multi-sport playing field facility?

- ☐ Annually appropriate money in the Town budget
- ☐ Increasing the real estate tax rate
- ☐ One-time surtax on all tax payers
- ☐ Increasing the Community Preservation Act surcharge rate
- ☐ Applying for state and federal grants
- ☐ User fees
- ☐ Voluntary contributions
- ☐ Other (please specify)



Harvard Open Space & Recreation Plan (OSRP) Public Survey

Closing Questions

19. How many years have you been a resident of Harvard?

20. How many people currently live in your household?

21. Do you have any additional comments about opens space or recreational facilities that were not addressed by the survey? If so, please include them in the space below.

22. Do you or someone you know have land or parcels that you would like protected from development and used for open space or recreation?

- ☐ Yes- If so, please contact the Land Use office at (978) 456-4100
- ☐ No

Public Comments

Below is a compilation of the public comments corresponding to specific survey questions of the 2022 Harvard Open Space & Recreation Plan Public Survey. A full summary of the survey data results was presented in the graphs, charts, and data tables provided above.

Q2 To what degree do you value each of the following : open space in Harvard?

Answered: 471
Skipped: 1

| # | OTHER (PLEASE SPECIFY) |
|----|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1 | Is considered for residential development, only if support development of affordable housing |
| 2 | Use for youth sports |
| 3 | Please add sidewalks that extend to police station opposite Depot Road. Thx! |
| 4 | Provides recreational use - hiking |
| 5 | Encourage native plants and reduce algae in the lake, even if by tactical chemical use or stocking fish. |
| 6 | Town sports field usage |
| 7 | We value our open space very much, however it would be nice to have maintained fields in this town. We have lived here close to twenty years and they get worse each year. We need to allocate budget and resources to have usable playing fields. We spend so much on taxes and have to rent field space and drive a distance for kids to play a sport. All this open space that is usable! |
| 8 | We do need development to decrease tax bills |
| 9 | I value the ability for our children's ability to play sports inside and outside |
| 10 | Recreation |
| 11 | More open space, less housing, i.e., less people |
| 12 | Protect Native plants, and animals, fish, and reptiles |
| 13 | We moved here for the rural character. If we wanted to live in a suburb we would have moved closer to Boston. The town's rural character has eroded in the sixteen years we've been here. |
| 14 | Recreation for the outdoor health of our residents |
| 15 | All-season sports field is needed. |
| 16 | I think the rural character of Harvard is its greatest asset |
| 17 | Mitigate the affects of highway noise, traffic, air, water, and light pollution that are heavily influenced by the amount and type of protected land within and surrounding a community |
| 18 | Recreation use is very important as well. Reclaiming land important. |
| 19 | Protecting our children and everyone by creating safe paths/sidewalks on the main roads (especially along the 111/Ayer Rd) to downtown are more important to us than any of the other things listed. There are many blind corners and no safe places for people to continuously walk until you get down by the town hall. This makes us feel like we have to drive everywhere and can't let our children walk to school, the lake or downtown by themselves. |
| 20 | Recreation |
| 21 | personal privacy |
| 22 | Provides a shared community identity and provides health benefits |
| 23 | Provides opportunities to hike, bike, swim etc. |
| 24 | Recreation |

| | |
|----|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 25 | Extremely important to Provide residents with recreational fields for sports teams and community play |
| 26 | The next question is poorly written. It is not an either or question. It's finding a balance. |
| 27 | recreation |
| 28 | All of the above must be secondary to our imperative to build housing and affordable housing in particular. |
| 29 | Not a factor. |
| 30 | Extremely important that the town provides ample space for town/school athletics while allowing for ample rest time of natural fields. Let's please avoid turf! |
| 31 | we need more meadows and open fields |
| 32 | Our town contribution to climate change and how our open space could best be utilized from that POV. |
| 33 | Able to be used for active recreation |
| 34 | Recreational access/ opportunities for residents |
| 35 | Provides recreational areas |
| 36 | Open space is appealing, but there is little demonstrated correlation to property value. |
| 37 | Connected walking trails |
| 38 | I'm not really concerned with property value. That feels like a petty concern in this conversation. |
| 39 | I'd like to see less passive use of some of our open space. Nature, as we all ought to know by now, is dynamic and is healthier being used with a plan rather than simply left in what is apparently a static state. I'd like to at least explore the creation of a town-wide forestry plan for public lands that are tree-covered, the use of grazing animals on open pasture, etc. |
| 40 | What else does Harvard offer? |
| 41 | Open space is Harvard's most valuable asset. |
| 42 | Overgrowth of invasive species in our forests are taking over... |
| 43 | Ability to enjoy nature up close on local trails and roads. |

Q7 How should the Town finance the acquisition of open space? Select all that apply.

Answered: 464
Skipped: 8

| # | OTHER (PLEASE SPECIFY) |
|---|------------------------------------------------------------------------------------------------------------------------------------------|
| 1 | Sell land to generate revenue and pay for all of the spending that is occurring |
| 2 | Building a commercial tax base with Funds from requisition of Harvard's historic land in Devens and business district along 110 |
| 3 | Tax benefits for owned property land owners donate land to the town for 'any open space purpose' |
| 4 | Do not increase taxes - The town has too much agriculture and rural space |
| 5 | Leaner administration and build a commercial tax revenue base - dont choose the easy way and drop everything on non commercial taxpayers |
| 6 | No more taxes, please-we have already chased out dozens with the tax from the new school. Make it a line item on the budget. |
| 7 | One-time surtax on new property owners/tax payers |

| | | |
|----|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-----------|
| 8 | Stop acquiring open space and focus on athletic facilities | |
| 9 | Youth preservation programs would help teach the value of preserving our agricultural and wildlife ecology | |
| 10 | I don't want the to acquire open space | |
| 11 | Tax that is proportional to wealth. The tax burden has pushed out longtime residents and that's not right. | |
| 12 | No funding | |
| 13 | will/trust/estate planning | |
| 14 | Create more tax revenue generating business opportunities, eg. liquor store, grocery store (trader joes), weed dispensary, brewery. | |
| 15 | I don't know | |
| 16 | This really should be a priority, our open spaces and conservation lands, orchards are what makes Harvard what it is. | |
| 17 | This is what makes Harvard. Any means possible. | |
| 18 | We need more conservation land | |
| 19 | specific fundraisers | |
| 20 | Please stop spending money to acquire open space, that money would better used for recreational facilities and fields | |
| 21 | Create a requirement for all real estate transactions to allocate a percentage of sale to preservation of open space- (ex. Nantucket does this.) | |
| 22 | No fees or taxes please | |
| 23 | We spend money on some not really that important things. I'd rather see more money go to preserving the town. | |
| 24 | % tax on all property sales | |
| 25 | create a go-fund me for a specific thing like a mountain bike trail | |
| 26 | Additional tax credits for "micro" preservation (e.g., small pieces of existing plots put into conversation) | |
| 27 | State and federal grants ONLY IF they don't come with strings attached | |
| 28 | meals tax | |
| 29 | Make the argument for taxes before asking. How many grants have we applied for? What research and outreach have you done for grants and contributions? Taxing isn't always the answer. | |
| 30 | Bonds as used in other large capital projects. | |
| 31 | Fundraising | |
| 32 | Take money from the school budgets. | |
| 33 | targeted and specific fundraising campaign. | |
| 34 | Organizational (eg SVT) | |
| 35 | A set percentage of Free Cash each year | |
| 36 | shift budget, less for schools | |
| 37 | less money for schools and sport fields, more for natural resources | |
| 38 | Consider some sort of income-linked real estate tax; examine entities that don't pay a lot of taxes | 5/26/2022 |
| 39 | Tax development increase permit fees astronomically | 5/25/2022 |

| | | |
|----|-----------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 40 | No more taxes | |
| 41 | We use and value this as much as the schools. | |
| 42 | Anything before the land is developed. | |
| 43 | Seek donations of land and development rights to private lands. | |
| 44 | Can't answer following questions - CPC dollars would be the way to significantly increase funding without saying it has to be some average town expenditure. | |
| 45 | Convert active recreation fields to passive recreation space | |
| 46 | "land bank" fee on real estate transfer purchases | |
| 47 | Freeze educational budget increases. Reallocate/descope funds from conflicting initiatives: OSRD, Ayer Corridor, Town Manager's budget for Economic Dev, and PB | 5/24/2022 1:26 PM |

Q9What amount do you feel the Town should allocate
Open space protection? (Please enter a dollar amount)

Answered: 275
Skipped: 197

| # | RESPONSES | |
|----|--------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------|
| 1 | \$250,000 | |
| 2 | \$250,000 | |
| 3 | 200,000 | |
| 4 | \$900,000.00 | |
| 5 | \$200,000 | |
| 6 | \$200,000 | |
| 7 | Less than \$0 | |
| 8 | 200k | |
| 9 | 250,000 | |
| 10 | Maintenance or acquisition | |
| 11 | I'm not sure | |
| 12 | 500000 | |
| 13 | 350000 | |
| 14 | 250,000 | |
| 15 | \$900,000 to \$1,000,000 | |
| 16 | 250000 | |
| 17 | 700000 | |
| 18 | 200000 | |
| 19 | Double current budget from \$200,000 to \$400,000 and continue to use funds from grants and private trusts. The town needs better playing fields for the kids on sports teams. | |
| 20 | \$400,000 | |
| 21 | 200,000 | |
| 22 | 250,000 | 6/28/2022 10:30 PM |
| 23 | 50 | 6/28/2022 10:25 PM |

| | | |
|----|-----------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 24 | ? | |
| 25 | 250,000 | |
| 26 | 300,000 | |
| 27 | Stupid ? | |
| 28 | \$200,000 | |
| 29 | \$250000 | |
| 30 | \$140,000 | |
| 31 | 200,000 | |
| 61 | 2,000,000.00 | |
| 62 | \$200,000 | |
| 63 | 250000 | |
| 64 | 700,000 | |
| 65 | ??? | |
| 32 | 400,000 | |
| 33 | 500000 | |
| 34 | 1 million | |
| 35 | No more. We should create donation incentives. | |
| 36 | \$1,000,000 | |
| 37 | 800000 | |
| 38 | 300,000 | |
| 39 | 200000 | |
| 40 | 900000 | |
| 41 | \$250,000 | |
| 42 | 300,000 | |
| 43 | N/A | |
| 44 | \$250,000 | |
| 45 | Our kids do not have suitable fields to play on the last thing in the world we need is to have more agriculture at the expense of town fields | |
| 46 | answered above | |
| 47 | 500,000 - 1,000,000 | |
| 48 | 300,000 | |
| 49 | \$500,000 | |
| 50 | I am not knowledgeable enough on this topic to provide a dollar figure. | |
| 51 | \$500,000 and prioritize better - cant please everyone in town | |
| 52 | Unknown | |
| 53 | 300000 | |
| 54 | \$1,000,000 | |
| 55 | 500,000 | |
| 56 | 750000 | |
| 57 | 450k | |
| 58 | \$250,000 | 6/27/2022 10:09 F |
| 59 | 200000 | 6/27/2022 9:49 PI |
| 60 | \$500,000 | 6/27/2022 9:28 PI |

| | | |
|-----|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 61 | 2,000,000.00 | |
| 62 | \$200,000 | |
| 63 | 250000 | |
| 64 | 700,000 | |
| 65 | ??? | |
| 66 | 0 | |
| 67 | 200,000 | |
| 68 | 800,000+ | |
| 69 | 200,000 | |
| 70 | Not sure | |
| 71 | 300000 | |
| 72 | 200,000 | |
| 73 | Less than it is now | |
| 74 | 200000 | |
| 75 | I'm not qualified to say, it should be more and equitably shared | |
| 76 | \$1000000 | |
| 77 | 500000 | |
| 78 | Should spend \$400K of its own money. | |
| 79 | 800000 | |
| 80 | 200000 | |
| 81 | 0 | |
| 82 | \$500,000 | |
| 83 | 400,000 | |
| 84 | 250000 | |
| 85 | 300000 | |
| 86 | 300000 | |
| 87 | 10000000 | |
| 88 | 150000 | |
| 89 | 300k | |
| 90 | \$500,000 | |
| 91 | It should be a larger amount in coming years to increase active recreation land. | |
| 92 | 300,000 | |
| 93 | \$5,000,000 per year | |
| 94 | 300,000 | |
| 95 | \$200,000 | |
| 96 | \$200,000 | |
| 97 | \$10,000,000 every year | |
| 98 | Protecting open space should be a top policy and spending priority for the town, with an aggressive plan to mitigate the worst affects of climate change by building resiliency within our community through the protection of open space in tandem with attracting federal, state, and private donations to augment a robust dollar commitment from the town | |
| 99 | Several millions | |
| 100 | 500,000 | 6/11/2022 3:10 PM |
| 101 | 5,000,000 | 6/11/2022 7:01 AM |

| | |
|-----|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 102 | 300,000 |
| 103 | 500000 |
| 104 | \$200000 |
| 105 | \$200,000 |
| 106 | \$0 |
| 107 | 200000 |
| 108 | 300000 |
| 109 | 400,000 |
| 110 | 200000 |
| 111 | 250000 |
| 112 | I don't have a number |
| 113 | \$250,000 |
| 114 | 300,000 |
| 115 | 700,000 |
| 116 | I am not sure where 700,000 is going. Our trails and pond are maintained by volunteers and our fields for sports play aren't maintained well at all. They are by far in the worst shape in comparison to all our neighbors, and to be honest, to any state I have visited or lived. I was surprised at the shape of our fields when we moved here considering we pay double the property taxes here of any place we have lived before. |
| 117 | \$200,000 |
| 118 | \$600,000 |
| 119 | 100000 |
| 120 | 100,000 |
| 121 | Several millions |
| 122 | Unsure |
| 123 | 500000 |
| 124 | 1,000,000 |
| 125 | 350,000.00 |
| 126 | \$200,000 |
| 127 | Not sure how much is required. At least \$1M |
| 128 | 250000 |
| 129 | 300000 |
| 130 | \$500k |
| 131 | 500,000 |
| 132 | \$5,000,000 |
| 133 | 5,000,000 |
| 134 | Commensurate increase with property values |
| 135 | 300000 |
| 136 | \$1M |
| 137 | 300,000 |
| 138 | 250000 |
| 139 | The To |
| 140 | \$2,000,000 |
| 141 | \$500000 |

| | |
|-----|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 142 | 350,000.00 |
| 143 | 1.5% increase each year |
| 144 | This is not my job to answer, this requires an expert and it is not appropriate to make people guess. |
| 145 | 300,000-375,000 |
| 146 | 800,000 |
| 147 | \$250k |
| 148 | rate increases every year (x%) |
| 149 | 750000 |
| 150 | 300,000 |
| 151 | A lot, say 1-5 million |
| 152 | 350,000.00 |
| 153 | \$800,000 |
| 154 | 200,000.00 |
| 155 | 250000 |
| 156 | 250,000 |
| 157 | What is needed per year |
| 158 | 300000 |
| 159 | \$400,000 |
| 160 | 200,000 |
| 161 | 250,000 |
| 162 | 300,000. |
| 163 | 50,000 |
| 164 | 1.5 million |
| 165 | We need to stop raising taxes! |
| 166 | 200,000 |
| 167 | As much as possible - \$1,000,000? |
| 168 | \$500,000 |
| 169 | \$220,000.00 |
| 170 | \$400,000 |
| 171 | \$500k plus \$1m of grants. Ultimately we need \$6.5M for recreational facility |
| 172 | Spend 300,000 |
| 173 | 500000 |
| 174 | 600000 |
| 175 | Please always offer comment space even after select a choice questions. You are missing a valuable opportunity to actually hear what people think. Explain partnerships with HCT and others - can dollars be pooled ever? I can make up a number but as an average citizen, I'd just be pulling it out of thin air. That's ridiculous and in this day an age, data and policy change can and should be used to guide decision making. I'm a big believer in town govt but don't believe this survey is going to yield meaningful insights to guide action. What is the average cost per acre of open land these days? What is the town's goal re: # of purchase(s) per year? What priorities currently guide decisions and what are the ideas for change? |
| 176 | 300,000 |
| 177 | \$1,000,000 |
| 178 | \$700000 |
| 179 | \$400,000 |

| | |
|-----|------------------------------------------------------------------------------------------------------------------------|
| 180 | 350000 |
| 181 | 750000 |
| 182 | 500000 |
| 183 | 500000 |
| 184 | \$200,000 |
| 185 | 200000 |
| 186 | 300000 |
| 187 | 400000 |
| 188 | \$500,000.00 |
| 189 | maintain current levels |
| 190 | 250000 |
| 191 | 300000 |
| 192 | 250000 |
| 193 | 1000000 |
| 194 | 750,000 |
| 195 | 500,000 |
| 196 | As much as possible |
| 197 | 500,000 |
| 198 | \$250,000 |
| 199 | Nothing until we have met our requirement to provide affordable housing and significantly increased our housing stock. |
| 200 | \$750,000 to \$1,000,000 |
| 201 | 300,000 |
| 202 | \$500,000. |
| 203 | \$0.0 |
| 204 | 300,000-500,000 |
| 205 | 300000 |
| 206 | 800,000.00 |
| 207 | 100000 |
| 208 | 300000 |
| 209 | 100 |
| 210 | I need to know what exactly "protection" means for this price. is this land aqizition? |
| 211 | 250000 |
| 212 | \$250,000 |
| 213 | 200,000 |
| 214 | \$200,000 |
| 215 | \$300,000 |
| 216 | 0 |
| 217 | 300,000 |
| 218 | 100000 |
| 219 | 100,000 |
| 220 | This depends on what it would be used for. |
| 221 | 500000 |
| 222 | 200,000 |
| 223 | \$200,000 |

5/27/2022 7:02 F

5/27/2022 6:41 F

5/27/2022 5:07 F

5/26/2022 10:38

| | |
|-----|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 224 | 200,000. |
| 225 | 300000 |
| 226 | 300,000 |
| 227 | 300000 |
| 228 | 300,000 |
| 229 | 750,000 |
| 230 | 5,000,000 |
| 231 | \$5,000,000 |
| 232 | \$1 million |
| 233 | 500,00 |
| 234 | \$200,000. |
| 235 | The only intelligent answer to this question is an informed one, and I'm willing to bet that most respondents have no experience/expertise comparing our town's allocation of open space protection funds to others that have the same economic indicators. What's a reasonable percentage vis a vis other towns with comparable average home prices and incomes and corporate tax revenues ? What's an extraordinarily high amount? What percentage of the annual town budget would it be reasonable to assign to this cost? Are annual and multi-year maintenance costs past the open space budget? |
| 236 | 10,000,000 |
| 237 | 2000000 |
| 238 | 2000000 |
| 239 | 10000000 |
| 240 | \$300,000 |
| 241 | 500,000 |
| 242 | \$300,000 |
| 243 | Increase to 500k annually, offset by the increase in CPA, with the difference funded through the budget. |
| 244 | 500000 |
| 245 | 1,000,000 |
| 246 | \$200,000 |
| 247 | \$300,000 |
| 248 | \$2 million |
| 249 | 500,000 |
| 250 | 500000 |
| 251 | 250000 |
| 252 | do not know enough to respond |
| 253 | 200,000 |
| 254 | 100000.00 |
| 255 | The Town should not succumb to voices that are advocating for more active recreation fields and lose critical habitat and resilience opportunities. These needs can be met by using Devens fields |
| 256 | \$500000 |
| 257 | 5 million |
| 258 | 750,000 |
| 259 | 500k |
| 260 | \$250,000 - \$300,000 |
| 261 | 200,000. |
| 262 | 500,000 |

5/24/2022 4:17 PM

5/24/2022 4:12 PM

| | | |
|-----|-------------------------------------------------|-------------------|
| 263 | \$200,000 | |
| 264 | \$0.5 - 1 M | |
| 265 | ??? | |
| 266 | 250000 | |
| 267 | 30000. | |
| 268 | 50,000 | |
| 269 | \$500000 | |
| 270 | 500,000 | |
| 271 | 400000 | |
| 272 | \$0 until we build a turf field or rec facility | |
| 273 | \$500,000 | |
| 274 | \$300K | 5/24/2022 1:23 PM |
| 275 | \$400000 | 5/24/2022 1:22 PM |

Q12Which of the following recreational facilities do you use in Harvard? Select all that apply.

Answered: 422
Skipped: 50

| # | OTHER (PLEASE SPECIFY) | |
|----|-------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 1 | Track | |
| 2 | Track | |
| 3 | Trails | |
| 4 | Trails | |
| 5 | Softball fields, our girls are not allowed to use the baseball facilities for unknown reasons, aside from bias. Make fields for both baseball and softball. | |
| 6 | Hiking trails and playgrounds | |
| 7 | trails | |
| 8 | Playground | |
| 9 | Track | |
| 10 | conservation land trails | |
| 11 | all trails | |
| 12 | Paths for biking and mountain biking | |
| 13 | Playgrounds | |
| 14 | Harvard playground and McCurdy track | |
| 15 | Beach best but NO lifeguard now | |
| 16 | McCurdy Track | |
| 17 | Walking | |
| 18 | Track at Harvard Park | |
| 19 | Trails and fields for running, biking, horses | |
| 20 | Track, playground | |
| 21 | Trails for running and walking | |
| 22 | Walking trails. Too old arthritic for anything else. | 6/26/2022 1:04 PM |

| | | |
|----|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 23 | volleyball net at beach | |
| 24 | We use none of these | |
| 25 | Trail overrun with poison ivy. Something needs to be done as they are over wrought with poison ivy. Tennis courts had poison ivy growing within the Fenceline. I've personally sprayed the poison ivy twice. What department is responsible for maintaining safety around the courts? | |
| 26 | None of the above | |
| 27 | I walk on conservation areas and when ticks are high in town center with my dog. | |
| 28 | Rowing docks | |
| 29 | Walking Trails | |
| 30 | Conservation land and biking | |
| 31 | Track/ Trails | |
| 32 | track | |
| 33 | Playground at McGurdy and HES | |
| 34 | Playgrounds | |
| 35 | Trails | |
| 36 | Walking and biking | |
| 37 | Track | |
| 38 | Conservation land, biking the trails and backroads | |
| 39 | outdoor track, bike paths, and conservation land trails | |
| 40 | The new Hes playground is very popular | |
| 41 | Passive recreation and individual (non-team) activities | |
| 42 | Playground | |
| 43 | Hildreth playground | |
| 44 | Sidewalks. We need more of them on busy roads like the 111 | |
| 45 | Conservation walking | |
| 46 | Track | |
| 47 | Trails | |
| 48 | hiking trails | |
| 49 | pickleball court in Concord-- why? | |
| 50 | Conservation land | |
| 51 | walking trails | |
| 52 | School playground | |
| 53 | Trails on conservation land for walking | |
| 54 | track | |
| 55 | None | |
| 56 | Playgrounds | |
| 57 | Trails/hiking | |
| 58 | Trails | |
| 59 | none currently | |
| 60 | Playgrounds | |
| 61 | Playgrounds | |
| 62 | Conservation land trails | |
| 63 | Trails on private land | |
| 64 | Track | 5/30/2022 1:30 AM |

| | | |
|----|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------|
| 65 | Field at Devens (ultimate) | |
| 66 | Trails for biking and skiing. | |
| 67 | We are 73 so none. | |
| 68 | library field events like the flea market | |
| 69 | Trails | |
| 70 | hiking trails on conservation land | |
| 71 | Track | |
| 72 | Rear view mirror now. Previously those checked. | |
| 73 | Conservation trails | |
| 74 | Trails | |
| 75 | Playgrounds | |
| 76 | without kids we rarely use the recreational facilities | |
| 77 | Trails | |
| 78 | Kids and grandkids no longer here but I think the town erred in not planning a baseball field at new HES. Field hockey field is an embarrassment--as are other fields for school sports. | |
| 79 | Track | |
| 80 | Trails | |
| 81 | none - aside from beach and boating not much offered for age group 60+ | |
| 82 | Conservation land | |
| 83 | Field hockey field | |
| 84 | trails on conservation land | |
| 85 | Conservation lands | |
| 86 | Woods trails | |
| 87 | Conservation land and orchards | |
| 88 | We should ban motorboats. | |
| 89 | Trails for walking. We need more trails. | |
| 90 | Trails | |
| 91 | Field hockey field | |
| 92 | Track | |
| 93 | Harvard track - let's not forget! | |
| 94 | walking trails | |
| 95 | enjoy watching children using the fieds | |
| 96 | Trails | |
| 97 | Track | |
| 98 | walking paths, rec trail | 5/24/2022 : |
| 99 | Trails | 5/24/2022 : |

Q13 Which additional recreational facilities are needed? Provide an opinion for each type.

Answered: 427

Skipped: 45

| # | OTHER (PLEASE SPECIFY) | |
|----|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------|
| 1 | Swimming pool | |
| 2 | Our girls will lose the one (substandard) softball field they had this year, which will lead to no softball offered at all. Softball playing fields are a top priority. | |
| 3 | Additional rectangular playing fields | |
| 4 | Swimming pool | |
| 5 | Multi-purpose turf field (soccer, lacrosse, football) - maybe center of McCurdy track? | |
| 6 | We need another multi use playing field with a softball field and another field then we need to maintain others and Asked for donations from members of the town who want their name put on these fields | |
| 7 | Four time state champions play on a joke field with no stands nowhere near the center of town. The field in front of the old Bromfield School should be a turf field with seating. | |
| 8 | A multi-use turf field would be great! | |
| 9 | The soccer fields are disgraceful - it's actually embarrassing to have visitors from out of town play in our fields they all comment on how horrible they are and unsafe | |
| 10 | don't know much about what/how the fields are used | |
| 11 | We need a multi-use turf field. Now that water can be used from Devens there is no excuse for why a turf field can't be built by the school. One issue was that the Town Well was too close--that's not an issue anymore. Your survey states 700,000 is used to manage open space. How is that money spent???? | |
| 12 | Missed an opportunity with the indoor HES basketball courts - if one can call them that. Very much of a failure in getting the dimensions wrong | |
| 13 | Additional parking at the town beach would be nice | |
| 14 | We desperately need 2 more tennis courts--the Bromfield team can't play all their matches at once--they have to wait for matches to finish which makes tennis tournaments go on for hours while townspeople aren't allowed on the courts. We have the space for 2 more courts--we should build them. | |
| 15 | The fields should also be equally allocated for boys and girls sports (softball field!!) | |
| 16 | Boathouse and town pond area need major renovations. What a wasted resource. | |
| 17 | I don't know what demand is for each, so I have no opinion. I would use none of the above, only hiking trails. | |
| 18 | Walking trails need to be maintained and cleared of poison ivy, overgrowth, or invasive's... | |
| 19 | Focus on solving the softball field shortfall | |
| 20 | walking paths near the road like in Lincoln, but not sidewalks | |
| 21 | An indoor town pool/rec center would be incredibly beneficial for swim teams, recreation, swim lessons when pond is compromised by cyanobacteria | |
| 22 | field hockey field is needed | |
| 23 | An all-season artificial turf field is needed. | |
| 24 | Mountain bike trails. | |
| 25 | An accessible walking path should be on the list | 6/16/2022 12:00 PM |
| 26 | An outdoor space for performances/speakers/meetings is needed. | 6/16/2022 1:03 PM |
| 27 | Bike pump track and skatepark would be great additions to town, bike track would have minimal impact on open land and can be built a low cost with volunteers | 6/16/2022 1:02 PM |

| | |
|----|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 28 | As an older adult, I'm not familiar with the condition of tennis courts and some other fields. |
| 29 | field complex with a field house (one or two turf fields) |
| 30 | Co |
| 31 | We could use an accessible walking trail |
| 32 | The School Building Committee should follow through on their promise to replace the softball fields. |
| 33 | We need more walking trails |
| 34 | Biking trails? Family biking and walking. |
| 35 | Softball fields to replace the ones removed during HES construction. Right now, we have a big disparity between baseball and softball facilities, which tells our girls that the Town values them less than the boys. This is a Title IX issue. |
| 36 | safer roads for biking, walking and running |
| 37 | Maintenance of the track and field area |
| 38 | Public access camping area on conservation land would be amazing (similar to Bearsden in Ahol, or the Groton camping areas on Groton conservation land). |
| 39 | Our sports facilities also need restrooms. |
| 40 | public, non-school playground |
| 41 | The facilities we already have are seldom used. |
| 42 | use Devens as our resource |
| 43 | We could use bike trails. |
| 44 | We could use an accessible walking trail |
| 45 | Not to compromise woodlands for recreational fields |
| 46 | bike paths, bike lanes |
| 47 | Harvard's sports playing fields are more than adequate. Extra capacity can be acquired from leasing fields at Devens. |
| 48 | Field hockey field |
| 49 | MTB flow or jump trail |
| 50 | Indoor Pool |
| 51 | camping area |
| 52 | XC trail (McCurdy gets a lot of use. Would be nice to have another that can double as dog/horse path |
| 53 | The HES softball field is a joke. It needs to be fixed. Come up with a creative solution. |
| 54 | Since I don't use any of these except the beach and my kids are grown, I am not aware of the current state of most of these things. |
| 55 | Too many rectangular fields are used actively (dominated) by too few sports, not enough diamond fields available. Build a softball field now. Limit sports enrollments to 1 primary season (e.g. Fall soccer) and have a limit for fewer participants for "add on" seasons (e.g. Spring soccer). That will make fields available to non-dominant sports with smaller booster clubs |
| 56 | seasonal outdoor skating rink |
| 57 | Take care of existing facilities |
| 58 | We already have a lot of these |
| 59 | Why not shared facilities and use of Devens facilities? |

5/28/2022 6:14 PM

| | |
|----|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 60 | ultimate frisbee field |
| 61 | Indoor Swim Facility / Rec Center |
| 62 | We live in an affluent town with many families with kids yet do not have adequate recreational facilities which is so disappointing |
| 63 | fenced in dog park |
| 64 | The HS playing fields are dangerous. There are HS teams that refuse to play on on our fields |
| 65 | The current field conditions create injury risk to the students (ours and visitors). |
| 66 | Dog park. // This is unclear - are you talking about adding a new beach? If so, no! But obviously maintaining the current beach is important. |
| 67 | We need more conservation land. |
| 68 | Not having children in the schools these days I do not have enough information to make an informed decision on this question. I do not, however, want the needs list that the responses to these questions might generate to be driven solely by people with children in the schools. It seems inconceivable to me, for instance, that a town of our size needs a disc golf pitch. |
| 69 | We need more woodland trails and bike lanes. |
| 70 | We need more conservation land not development. |
| 71 | Well-maintained track - let's not forget! |
| 72 | dog socializing park. Here an example https://www.beaconsfield.ca/en/what-s-new/16203-beaconsfield-inaugurates-its-first-dog-run) |
| 73 | I want to see more fields as needed, but with an accompanying budget to maintain them. Harvard has some of the poorest maintained fields, across all sports, compared to towns we play |
| 74 | land set aside for active rec in the future |
| 75 | Need to replace softball/baseball fields lost due to new HES - there is no full size softball field in town and the Pond rd baseball field is embarrassing |
| 76 | Observatory and astronomy-friendly (after dusk) locations |

Q14What issues/concerns do you have about the recreational facilities in Harvard that you or your family use? Provide an opinion for each

Answered: 420

Skipped: 52

| # | OTHER (PLEASE SPECIFY) |
|---|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 1 | See above comments - boys teams have access to fields and donor support for baseball, girls have had one field lacking basic facilities that they are losing. This is a shocking disparity and gender bias in the town. |
| 2 | The poor leadership of the head of field maintenance and how he treats his employees and this how they react poorly. |
| 3 | Our fields are barely maintained and half the time unusable. We have to rent space out of town. |
| 4 | There are not enough fields in Harvard and what we do have are very embarrassing and kept in extremely poor shape |
| 5 | don't know |
| 6 | The maintenance of the fields is embarrassing. The lack of a real lacrosse field for such a successful program is also embarrassing. |

| | | |
|----|----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 7 | Not enough basketball court or lacrosse field access | |
| 8 | Better quality fields for girls sports teams | |
| 9 | We just need more trails and we need to connect them. | |
| 10 | Boathouse needs improvement | |
| 11 | maintenance field space and scheduling are major concerns for Softball | |
| 12 | Motor boats on pond cut milfoil into shreds and propagates weeds | |
| 13 | What facilities? Let's maintain what we have before we take on new single field facilities distributed through | |
| 14 | Girls need a softball field but I'm not understanding why devens won't work | |
| 15 | There is a need for an all-season sports complex to address field shortages in inclement weather. | |
| 16 | Conservation land has plenty of volunteers that's where our towns interest lies | |
| 17 | Maintenance is ABYSMAL! DPW needs to be held accountable for maintaining the recreational facilities | |
| 18 | No real restrooms at the track prevents Harvard/Bromfield from hosting multi team meets (meets bigger than duel meets). Two portapotties for a track meet is grossssssssss. | |
| 19 | the fields are in poor condition and not drained properly | |
| 20 | Dog Park like at Emerson Field in Concord | |
| 21 | The town doesn't take care of what it has. The conservation kand seems good though. Farm lands too. | |
| 22 | A thorough and implementable maintenance plan must accompany any planned expansion for recreational space | |
| 23 | We really don't take care of what we have. Oddly conservation land is maintained | |
| 24 | One field (Ann Lee) is woefully insufficient for our popular softball program. | |
| 25 | We need additional fields in order to properly maintain what we have. We need equitable allocation between facilities for girls/boys. | |
| 26 | We need more rectangular fields to rest overused fields | |
| 27 | Maintenance take it away from Highway cause they can not maintain the roads let alone do more work. | |
| 28 | No safe sidewalks or none paths to get to the fields. | |
| 29 | Inability to provide staff | |
| 30 | I seldom see these facilities in use at all let alone full. | |
| 31 | I do not use the existing facilities so I don't have an opinion | |
| 32 | The pond - off season you should be able to park with trailer in or around beach lot. | |
| 33 | It's obvious that field maintenance and enhancement isn't a priority. | |
| 34 | 3 summers of pond either being not life guarded or underguarded and almost no swimming lessons. Children have a much higher incidence of death from drowning than they do from COVID and all the effort was spent there. Please have lifeguards and swimming lessons at the beach. Further the lack of a Parks and Rec program is unfathomable. Look to Littleton (or any surrounding town) to see what activities are offered. The continued requirement for children to mask in the Children's room at the library and at FiveSparks combined with no rec programming makes it impossible for my child to participate in activities here. We drive to surrounding towns but then the child is unable to meet other Harvard kids. Please, please provide activities (not just teams) for the children after school and in the summer. | |
| 35 | The stress of these items leads to burn out of our Park & Rec volunteers. Without good, long serving volunteers, it's hard to long range plan. | |
| 36 | Maintenance and access/scheduling are the key issues, of course. | |
| 37 | It's frustrating that the DPW doesn't know how to maintain the field we have and always has a excuse. They ask for equipment, are funded and then find another excuse why they can't maintain the fields. The fields may be adequate if approximately maintained including regular mowing, fertilizer, and aeration. | 5/29/2022 10:31 I |
| 38 | Need someone to be in charge of said facilities | 5/29/2022 7:20 P |

| | | |
|----|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 39 | like the porta potty at the tennis courts | |
| 40 | Not enough softball fields | |
| 41 | Is the softball field at Ann Lees Road really inadequate? | |
| 42 | Not using anything | |
| 43 | Kids driving kids after school to fields that are located away from school is a risk | |
| 44 | See prior note about risk to users because of poor field conditions. My family no longer really uses them, but I am willing to invest on behalf of the town overall, and people should be willing to think broadly this way fbo the town. | |
| 45 | Never use it, don't want to pay for it. | |
| 46 | Again, I do not have enough info to respond to this question. | |
| 47 | The fields are used for a few hours in spring and fall. | |
| 48 | More people use Carlson's on a day than everything else put together all year long. | |
| 49 | Only a few people use the fields for a few hours. Tons of people use the conservation land and orchards. | |
| 50 | We don't use the fields we have. I walk past them every day and seldom see them in use. | |
| 51 | Under-managed scheduling so substantial idle times | |
| 52 | Concerned about taxpayer funding of DPW and their lack of maintenance of fields. | |
| 53 | The town doesn't seem to want to commit to maintaining any of it's buildings or recreational spaces. | |
| 54 | Better facilities at track area would be nice | 5/24/2022 1:44 PM |
| 55 | Recreational impact on light pollution, gentrification, and shift of focus from environmental and agriculture-centric stewardship | 5/24/2022 1:32 PM |
| 56 | Hunting should be prohibited on conservation lands | 5/24/2022 1:25 PM |

Q18How should the funds be raised for a multi-sport pl
Select all that apply.

Answered: 428
Skipped: 44

| # | OTHER (PLEASE SPECIFY) | |
|----|--------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------|
| 1 | Allow more commercial activity | |
| 2 | sponsorships | |
| 3 | Increase sports fees | |
| 4 | I'm sure somebody in town would want to put their name on a multi field facility so we wouldn't have to increase taxes | |
| 5 | Allow for a portion of open space (maybe 10%) to be allocated toward commercial buildings for real estate revenue | |
| 6 | aka by any means necessary | |
| 7 | don't add to the tax rate | |
| 8 | charging for entrance to some activities | |
| 9 | Do not take the easy way out and dump it on the non-commercial tax payers - establish a commercial tax revenue base and many of these things can be financed | |
| 10 | Info needed on proposed location and what type of sports would be played at this multi-sport facility | 6/28/2022 12:03 AM |
| 11 | Fund Raising | 6/27/2022 10:43 PM |

lity?

| | | |
|----|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 12 | Stop raising taxes in this town | |
| 13 | Not at all. | |
| 14 | One-time surtax on NEW tax payers. | |
| 15 | Put money into the pond which is our best recreational facility. Stop the drawdowns that are obviously killing it. Pay staff at the pond to monitor boat access for weed introduction. | |
| 16 | Don't want it | |
| 17 | We don't need this | |
| 18 | fundraising, snack shack, admission fees, tournament hosting, event hosting | |
| 19 | partner with corporate fundraising | |
| 20 | Private fundraising | |
| 21 | I think it would turn into a weed patch | |
| 22 | I really don't think we need another headache that's not taken care of. | |
| 23 | Fundraising events, increased effort to get companies to sponsor teams | |
| 24 | I don't want more fields in Harvard; it is built up enough. Kids can play on fields in Devens. | |
| 25 | Use some of the school budget for school sports | |
| 26 | I like how the fields are spread throughout Harvard | |
| 27 | This & previous question assume I support such a facility. Not sure I do. | |
| 28 | use devens | |
| 29 | Real estate transfer tax (when properties are bought) | |
| 30 | I don't believe we need multi sport facilities. If you moved here, you knew what you were moving to. You could have moved into any of the towns around. We do t need this at all. Not do I want I | |
| 31 | business/corporate sponsorship | |
| 32 | I do not support this type of facility. I support facilities throughout Harvard or Devens | |
| 33 | Have HAA raise a significant fund (\$1mm+) before going to the town for a debt exclusion. Show commitment and it might pass. I don't think 2/3 of citizens want to see major debt exclusions this recently after the building of the new elementary school. | |
| 34 | Rent the facilities out to 3rd parties for special events. | |
| 35 | do not need this facility | |
| 36 | meals tax | |
| 37 | Sell open space parcels that are of little benift to the town. Pieces that are not connected to others and have minimal ecological value. | |
| 38 | These questions presume people want a large multi field site. Please add an n/a for those of us who disagree with the concept | |
| 39 | Fees on races/events held in town | |
| 40 | None, no multi-field facility. Current ones aren't even maintained and field use is not scheduled correctly due to lack of sharing facilities (certain fields are "off limits" to other sports or age groups). | |
| 41 | Not in favor of a new multi-sport playing field facility. | |
| 42 | Not funded at all! | |
| 43 | Not needed | |
| 44 | do not think it is neessary | |
| 45 | Partnerships for shared facilities | |
| 46 | I don't support the development of such a facility | 5/28/2022 1:51 P |
| 47 | I think our goal should be more modest. My property tax has increased dramatically over recent years and most noticeably with the new elementary school. As a senior citizen I can not afford to pay for a facility that would benefit only a school-age population once again. | 5/28/2022 12:50 F |

| | |
|----|-------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 48 | Commercial Tax income, including from Devens |
| 49 | people who want to play sports should pay for it |
| 50 | This question assumes the respondent agrees with the need for a multi-sport field, which I do not! |
| 51 | fee for athletic activities for students as other towns have it. |
| 52 | we should not be spending 4.5 million on recreation fields |
| 53 | Such facilities in other towns have been funded by private/public partnership fundraising. Emphasis on partnership. Like any capital campaign, get to 75% of committed funding up front, privately and publicly, THEN publicize the effort to close the deal and gain support. This means having folks comfortable with asking. That is all there is. |
| 54 | NO New Taxes! |
| 55 | All of these questions ought to have the option to respond:"not sufficiently educated about this issue to make an informed decision" |
| 56 | Don't want it |
| 57 | I don't support this effort at all |
| 58 | Since I am not in support of a large multi-sport facility not sure I should be answering how it should be funded. |
| 59 | These proposed fields are in direct conflict with all of the other open space goals to preserve forests, wetlands, and open space and wildlife. |

| | | |
|----|---|--------------------|
| 16 | 8 | |
| 17 | 7 | 6/29/2022 10:22 PM |

Q21 Do you have any additional comments about open recreational facilities that were not addressed by the survey? include them in the space below.

Answered: 188 Skipped: 284

| # | RESPONSES | |
|----|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| 1 | Harvard's open space and recreational facilities should be made inclusive and support all residents who wish to avail themselves of these offerings. | |
| 2 | For any open space and recreational facilities that are being developed, it is important to ensure that accessibility and ease of use for residents of all ages and abilities is fostered. | |
| 3 | I would love to see the town invest in an indoor swimming facility. It would be a year-round asset for all ages in our community and other communities near us: swimming lessons, swim team, aqua gym for adults, lap swim :) | |
| 4 | It would be wonderful to see more open space lands linked to provide cross town access completely on trails. | |
| 5 | this survey is biased towards conservation of open spaces and walking trails...if it was intended to measure interest in playing fields and a multi-sport complex, you could have eliminated the entire first page of questions, which were totally irrelevant. I liked that you specified a \$4.5M complex would add \$180 / yr / person to taxes...not a big deal in the grand scheme of things | |
| 6 | Harvard lacks the building department and planning resources to grow. Why not take advantage of the land on route 2 and 495 and become more friendly to commercial uses. | 6/30/2022 7:10 PM |
| 7 | As noted in prior comments, the town needs to address the gross bias in support for boys baseball and yet lack of support for girls softball. | 6/30/2022 3:59 PM |
| 8 | It seems to me that the leader of field maintenance treats his employees poorly and that results in poor energy and bad vibes. He may need help learning how to evolve. | 6/30/2022 2:18 PM |
| 9 | No | 6/30/2022 2:18 PM |
| 10 | It would be great to have an all year indoor pool for the town that is paid for by user fees and grants. | 6/30/2022 6:57 AM |

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| 11 | We have plenty of fields for major sports (soccer, baseball), but suffer from poor management: Upper Depot has been unavailable for two seasons because of payroll issues with re-seeding. I have a solution: Since Bromfield students need 40 hours of community service to graduate high school please allow them to maintain the fields. Also, the multi-use facility I would like to see is one of a swimming pool/turf soccer field that would operate with a user fee (there is land for sale on Ayer road across Dunkin). This could be available for out of town users too and could generate income for the town. | |
| 12 | We are a basketball family and are very disappointed with the indoor court situation. The new HES gym is undersized and not a regulation-sized court (a HUGE oversight in my opinion). This past season, given the undersized HES court, the middle school basketball teams and adult rec team did not want to play their games there, thereby causing an already tight gym situation to feel all that much tighter. Rec teams (these are kids in 5-8 grade) had to have a practice time as late as 8:30-9:30 pm!! We somehow need to figure out how to access another indoor basketball gym. With growing class sizes at HES, this problem is only going to become worse and we will have to start limiting sign ups for our town basketball programs. That would be a terrible shame. I understand we are a small town. Many towns like the one where I'm from have 3 schools and 3 basketball courts so scheduling is much easier. We somehow need to figure out a way to have another indoor basketball court in town. Our program is truly suffering. | |
| 13 | ongoing annual maintenance projections need to be considered. While new initiatives are nice, they should be cost neutral with respect to tax increases | |
| 14 | No | |
| 15 | I am opposed to any installation of artificial turf fields given the documented hazards to health that they cause due to toxic chemicals present in the materials with which they are constructed. | |
| 16 | I left some questions unanswered because I felt like I needed more information to make a thoughtful decision. | 6/28/2022 9:43 PM |
| 17 | Love to hear that we want to improve field space. Ideally one location in case families have kids of multiple age groups playing at once. | 6/28/2022 8:34 PM |
| 18 | No | 6/28/2022 8:09 PM |
| 19 | Give softball one of the baseball fields at Ryan land | 6/28/2022 7:57 PM |
| 20 | Mountain biking should be available on all hiking trails. We need a bike path that connects all of Harvard and goes all around the border of the town. | 6/28/2022 6:25 PM |
| 21 | Soccer field is very badly managed | 6/28/2022 5:21 PM |
| 22 | We need more indoor basketball space to run a competitive youth program in town. | 6/28/2022 5:21 PM |
| 23 | We need to take better care of the fields we have. We need to replace the fields lost with Hildreth construction. | 6/28/2022 5:18 PM |
| 24 | A new large multi field facility with turf sounds great. Like AB has (lower ABRHS fields by the skate park). We should not cannibalize existing fields (e.g. turn a soccer field into a softball field). | 6/28/2022 5:17 PM |
| 25 | Our playing fields are a laughing stock | 6/28/2022 5:08 PM |
| 26 | None | 6/28/2022 4:38 PM |
| 27 | Fields need better maintenance and ability to rotate use | 6/28/2022 4:36 PM |
| 28 | Harvard needs to be strategic about the fields/courts. There is no reason that the elementary school built a gym that is smaller than regulation, or put in a field that serves no purpose. There should be a master plan to maintain current fields- which isn't happening now- nevermind build more fields that won't be maintained. | 6/28/2022 4:30 PM |
| 29 | I am a parent and coach of three young athletes that all play lacrosse and hockey. I would like to see the town support all athletes in Harvard with the open spaces available to teams. Sports and athletics are so important to our youth's development. The state of the fields in Harvard is embarrassing. As a coach, I have been in a position where I had to mow one of the fields myself prior to a youth lacrosse game. I would like to see the town support all athletic teams equally and not serve only those with the loudest voices. The Bromfield Girls Lacrosse team has successfully made it to the state semifinals for the past two years, yet the town does not even maintain a regulation field for the team or youth members of the sport. The team has to travel to surrounding towns and pay fees for field usage. I do not think we need another softball or baseball field. As a home and landowner, I do think the town does a nice job of supporting and maintaining the open spaces in town. However, if we do not support our recreational teams, I think we are doing a disservice to our youth. | 6/28/2022 12:02 PM |

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| 30 | I am not as up to par RE financing each item as necessary, therefore some sections were not answered. | |
| 31 | Some version of central scheduling or reservations (or simply viewing availability) for rec facilities would be a great addition | |
| 32 | Difficult to answer some questions about trade-offs without knowing the cost implications of those trade-offs; this applies to questions of open space, land use rather than to recreation. | |
| 33 | Turf fields would be great! | |
| 34 | Harvard needs to understand that the fields we have are grossly inadequate, too few, and poorly maintained. It's so bad it's embarrassing. | |
| 35 | I am very much against any type of artificial turf being used on any new athletic fields. I am concerned about the environmental effects and the health and safety of those who use turf fields. | |
| 36 | This space can be rented out to pay for its use | |
| 37 | The fiduciary responsibility of the town - it seems commercial funding is intentionally ignored in this survey vs the much preferred, and easier, option of "lets just increase taxes" | |
| 38 | Yes, the details of the proposal for the \$4.5M multi-use recreational facility are not easy to find online. Therefore, it's hard to confirm we support it if we don't know the details of what is proposed for it. | |
| 39 | We do not have a functional and accessible girls' lacrosse field in this town. It is historically the most successful girls team sport at the HS level | |
| 40 | Improved markings/signage on trails | |
| 41 | Need a maintenance plan for fields & DPW needs new director who can actually do his job. | |
| 42 | Softball field is desperate | |
| 43 | I think it should be a urgent issue to build a regulation size and quality softball field and a softball practice field for all | |
| 44 | I would like the town to preserve the historical properties and down town locations. If there is a plan for future recreational land use, the site should be closer to route 2 for accessibility and protection of the town character | |
| 45 | Algae blooms in the pond are concerning; This has caused pond usage to be compromised in two months, mid-August through mid-October. Then the pond draw down makes it unusale November through March. | |
| 46 | While I am cognizant that childrens' sports have increased, we have the same number or fewer of children in town as we did 35 years ago. Apart from meeting Title IX requirements, I am strongly opposed to the level of spending being proposed. \$4.5M is an outrageous amount for sports. | |
| 47 | We have vastly underfunded active recreation (i.e. fields) for the 21 years I've lived in town despite numerous reports telling us to do otherwise. Fix it!!!! | |
| 48 | The open space in Harvard is SO important to the character of the town. Even though I have school-age kids, I would prefer that town budget go towards land conservation and protection versus spending on athletic fields. | |
| 49 | Use Devens fields | |
| 50 | The town desperately needs turf playing fields with lights for night use | |
| 51 | Please include planning for indoor recreation facilities accessible to the community | |
| 52 | I have no idea who authorized the conservation commission to spray poison on Willard Lane Fields during breeding season. Why was this not publicized in the newspaper, and why is it being done when there are alternative means for clearing fields—Within a mile of the pond no less. | |
| 53 | I was not sure how things have been handled so not certain of some answers | |
| 54 | If recreational space is going to raise taxes, there needs to be a balance of facilities provided to aging population, not just for youth sports. Be creative about that to avoid greater resistance. | |
| 55 | I'm grateful to the people in town who have worked to preserve open spaces including Harvard conservation trust | 6/25/2022 1:44 F |

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| 56 | not much inhere about hiking trail development and maintenance | |
| 57 | It was a huge mistake to turn the maintenance of the playing fields over to the DPW. Those funds should be returned to the schools or Park & Rec committee, as appropriate. | |
| 58 | Connect the trails so you can do a big loop of trails (like the Bolton loop) | |
| 59 | We would love a safe place to bike with the kids. I heard there is an effort to expand the Nashua rail trail from Devens to Harvard and we would love that. | |
| 60 | The existing indoor basketball courts are insufficient. For example, the court at HES is not regulation size, which limits it to elementary school use only. The court at TBS does not have adjustable height baskets and is aging. An additional indoor court is desperately needed. | |
| 61 | We need turf playing fields | |
| 62 | Harvard/Bromfield is a soccer championship town, yet our fields and infrastructure (parking/lights/concessions/bathrooms) are an embarrassment. Let's do better as a town. Let's have pride in our town and our students' accomplishments. Let's show them that we care about providing quality fields and access to those fields by providing sidewalks/trails/paths/buses to fields since most teams do not have practice areas next to the school. Let's make sure they have bathroomS at the practice fields since they are not near the school to go to the bathroom. | |
| 63 | The proposed new sports complex should not be natural turf. One of our biggest problems is having the entire town shut down for days at a time at the start of the spring season. Our playing season is short enough as it is. It is a common solution for towns in northern climates all over the world to have at least one large non-natural playing surface. | |
| 64 | I'd rather see more conservation land and agricultural preservation funds. Far more people use and enjoy these than our seldom used sporting venues. | |
| 65 | Harvard has enough conservation land used for passive purposes - I would suggest concentrate on connecting these parcels as a priority. There is a dire need for additional playing fields in town - most notably for softball and secondarily for rectangular field use - soccer/lacrosse, etc. I would suggest swapping an already flat open space (i.e Stone Field on Old Mill Rd or the Corn field on Ayer Rd for unused town land near the beach) to avoid a land purchase thereby lowering the potential cost of building a multifield complex. | |
| 66 | We seem to be underutilizing existing fields, especially since Upper Depot fields have not been used for the last year or two. I don't see why we should pay for and build a huge complex when there are fields that sit empty when they could be utilized for various sports. I'm also very much in favor of building a pump track in town, as I mentioned above. This would be a low-cost, high reward, fun facility for kids and adults alike. It would apply to a broad audience. | |
| 67 | Thank you for the work you are doing! | |
| 68 | I would have liked to know, at the beginning of this survey, what percentage of land in town is already protected and under what type of restrictions. (If that was included in the intro, I missed it.) Also more about efforts to control invasive bittersweet, which is damaging our forested land. | |
| 69 | When other teams visit Harvard for games they are shocked by the poor quality. Let's bring our fields up to a quality that more closely matches the quality of passive rec and the school system. | |
| 70 | Please add a softball field | |
| 71 | A dog park would be an inexpensive addition to the Harvard community. Emerson Field in Concord could be the model. It consists of 2 soccer fields, a softball field and a baseball field surrounded by a fencing. The enclosed playground and track area are excluded to pet owners. The schools and day camp have first priority for the space; Concord pet owners use the space during the off times as available. The only additional expenses are 2 trash cans dedicated to dog waste and a kiosk that supplies poop bags. (Most residents bring their own, though, because the kiosk is often empty.) | |
| 72 | We could use more family biking and walking. | |
| 73 | The town should support a revision to the Open Space Residential Bylaw that requires setting aside open space when new single family homes are built. This is a current initiative at the Planning Board. | |
| 74 | The conservation lands and open spaces are harvards core value. We really don't need more development. | |
| 75 | Recreational facilities and playing fields that require construction, maintenance, and parking can be major contributors to the town's ongoing challenges to meet the demands and costs of maintaining its assets, and as they are in fact development projects, not preservation projects, they should not be considered as positive contributors to the town's open space policy as it | 6/13/2022 10:33 AM |

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| | relates to mitigating the effects of climate change or meeting future requirements for open space. | |
| 76 | I am particularly concerned about the lack of adequate Softball fields as compared with baseball. What does Title IX say about that? I would prefer not to have a sports megaplex, and rather keep our town's character by distributing facilities and not making them too fancy. We just need some good fields. | 6/10/2022 11:19 AM |
| 77 | Insufficient softball fields for town and HBS softball programs. This is an equity issue (Title IX) that tells our girls that the Town values their athletics less than the boys. | 6/10/2022 9:51 AM |
| 78 | NA | 6/9/2022 3:06 PM |
| 79 | Paper Survey Submission - entered by MRPC 6-9-2022 | 6/9/2022 2:56 PM |
| 80 | Strongly suggest that new athletic fields be constructed using an all-weather turf surface and field lighting for evening use. | 6/9/2022 10:21 AM |
| 81 | Non-competitive, non-team athletic activities were not mentioned in the survey. | 6/9/2022 9:50 AM |
| 82 | Formalize a maintenance plan and schedule for future stakeholders to preserve current/new facilities. Invest in proper equipment from start. Equitable distribution of resources between the genders. | 6/9/2022 9:28 AM |
| 83 | We bought four years ago; we left Acton because of sprawl and high pressure schools leading to a high suicide rate. We value the historical and rural character/small town feel as it currently exists. I do not want a bunch more fields. Maybe, at most, one more— to serve softball which has been underserved, sending a negative message to girls. | 6/9/2022 9:27 AM |
| 84 | We have protected some spaces in town to the detriment of providing recreational facilities, e.g. the 6 acre lot on Old Mill behind McCurdy would be a perfect spot for athletic fields. The Bromfield House lot would also be perfect for the much needed softball field displaced by the new school. All of these options will take time and money, but we've kicked the can down the road for too many years and we have more than enough open space in town. | 6/9/2022 9:20 AM |
| 85 | Yes the trails in Harvard are not cleared. Dead trees hanging over and area the trails. So much dead trees in the woods. Same thing when highway cuts trees down around town and just leaves them there. We can't take on new land if we can't take care of what we have. | 6/9/2022 8:56 AM |
| 86 | DO NOT USE CONSERVATION LAND FOR SPORTS FIELDS. | 6/8/2022 7:54 PM |
| 87 | lack of softball fields seems to be an equity issue as compared with the # available baseball fields. Seems like poor planning to put a U8 sized field at the new HES when that size field is not usable for town sports (I'm told no U8 team exists currently)... wouldn't a U10 or U12 field make more sense to enable town use? We're hugely concerned that our 9 year old won't be able to play softball after this year since the single field in Harvard is >100% booked by 1 middle school and 1 high school team. | 6/8/2022 12:06 AM |
| 88 | No current plan for a field for elementary age softball players to participate in town softball | 6/7/2022 2:58 PM |
| 89 | As of right now, the schools/town are in violation of Title IX with the sport fields. We need to avoid potential law suits by correcting these issues. Have you considered the Title IX impacts the town is facing? | 6/7/2022 1:10 PM |
| 90 | A sidewalk is very much needed along the 111. Our children want to safely walk to the downtown area, to the schools, to the fields, to the ponds. We want to safely walk to those places with our stroller, but there isn't enough room on the road shoulders or on the properties abutting the road. We really need safe spaces to walk along near the downtown area and to the schools. | 6/7/2022 10:36 AM |
| 91 | We need more conservation land, that's used by far more people than baseball fields | 6/7/2022 10:10 AM |
| 92 | Equality for Girls, and close to schools. Old School, where new Library is, was donated for girls. Was supposed to ensure and require girl usage. Yet The Town of Harvard and School system continue to treat females as second class citizens. | 6/6/2022 9:03 PM |
| 93 | We need to come through with the needed Softball field. | 6/6/2022 9:02 PM |
| 94 | Additional sports facilities are needed to support our youth in Harvard | 6/6/2022 7:47 PM |
| 95 | I hope the OSRP will address the state of MA wetland regs and local wetland regs and that | 6/6/2022 5:38 PM |

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| | these could be used/amended to address issues related to water, wetland protection and climate change resiliency. Bylaw changes can go a long way. | |
| 96 | We need to be careful about how much money is spent on recreational facilities considering many of the new residents of Harvard will not stay past the time their children are in school. | 6/4/2022 12:40 PM |
| 97 | Any wooded areas should be preserved as much as possible-- a pump track if it were created should be out of sight-- how about next to the Charlie Waite field or in the lower field of McCurdy track? Not close to pond. | 6/3/2022 7:11 PM |
| 98 | I think the committees need to push back on the minority groups that want town money for their special interests. | 6/3/2022 2:30 PM |
| 99 | I love the walking trails on conservation land and frequently see others enjoying them as well. I'd like to see more conservation land. | 6/3/2022 1:27 PM |
| 100 | I really think sports is dominating need to preserve what remains of precious lands | 6/3/2022 9:40 AM |
| 101 | Will not support increased taxes for active recreation with the exception of increasing CPA surcharge which I would support. | 6/2/2022 6:42 AM |
| 102 | do not raise taxes for this. Budget it, Raise the funds. Do not burden the entire community | 6/1/2022 5:49 PM |
| 103 | As a sailboat owner, I was very disappointed with the amount of weeds last year in Bare Hill Pond. Would like to see the (terminated?) weed harvesting program resume. | 6/1/2022 5:27 PM |
| 104 | Needs to be maintained!!! | 6/1/2022 11:32 AM |
| 105 | Thanks for tackling this issue | 6/1/2022 9:29 AM |
| 106 | Invasive plant control & eradication on and in our open spaces and public use lands needs to be addressed, studied, and managed. | 6/1/2022 6:50 AM |
| 107 | I don't like being asked to pick how we should do these new fields. Why was there not an option to say we do t need them? We do t need them. I don't want them. Not at all | 5/31/2022 10:32 PM |
| 108 | I think we should set aside some conservation land and create a volunteer mountain bike trail. This would consist of a group of volunteers that builds and provides maintenance to the trail. I think a MTB trail would be a great addition to the town because there are a lot of MTB in town and only a couple slow tech trail, Nothing fast flowy or jumpy. | 5/31/2022 9:13 PM |
| 109 | connecting parcels like the greenway, protecting swamps work with Fruitlands if that land is not conserved and apple orchards. | 5/31/2022 8:50 PM |
| 110 | having mapping in the survey to help understand what we have now would have been useful | 5/31/2022 4:49 PM |
| 111 | Would be great if new multi-field development was handicap accessible. Can we please have leash law on recreational sites? I keep my dogs on leash. | 5/31/2022 2:05 PM |
| 112 | Utilize studies done by Harvard Conservation Trust to help target appropriate land for needed playing fields and ideas on financing. | 5/31/2022 1:40 PM |
| 113 | Recreational facilities are needed, but I don't think that the town will vote for a debt exclusion without a very significant contribution from an outside funding source. There are hundreds of families in town that would donate to such a project if they knew that the money would achieve a specific goal of multi-use fields and restrooms that perhaps connected to other areas of town and that would be maintained properly. I would suggest that we start a fundraising campaign with a goal of \$1mm+. Donors would commit funds for the project but only spend the money if the Town voted to fund the balance of the project at both Town Meeting and at the ballot. | 5/31/2022 12:33 PM |
| 114 | No other towns offer pump tracks and things, why does anyone think the town should fund these? | 5/31/2022 12:17 PM |
| 115 | Equity in softball fields is important. We should consider building a destination facility for 3rd party use - multi-field venues, amphitheater / concert venue - think of this as both a crown-jewel and revenue opportunity for Harvard. | 5/31/2022 11:39 AM |
| 116 | Be more inclusive than just 2 rectangular fields to get the most support of the Recreational complex | 5/31/2022 11:02 AM |
| 117 | For any field, etc. that is developed there must be an annual maintenance cost included in the | 5/30/2022 4:31 PM |

Appendix 2: Open Space & Recreation Plan Survey

proposal (using today's (high) realistic rates for the contractors/landscapers). It is unsustainable and frankly anti feminist to continue to rely on volunteers (assumption that women have time to volunteer to the degree they did in the 70s- newflash- they work now). Sorry that I seem angry in my responses, but I have been dumbfounded by these issues after having lived in multiple types of towns and major cities across different states never having encountered a lack of rec activities and maintenance like this before. All of this being said, if we can't afford weed whacking and rec activities in addition to preserving open space: preserving open space is still more important to me. It will also assure property values in the future as open land becomes more and more limited.

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| 118 | Survey biases Sense that survey written to justify certain outcomes |
| 119 | We tried to locate a trail head recently (maxant trail) and none of us could find it. Totally overgrown and unmarked. Walked Millie's path instead. What a bummer. |
| 120 | We must stop raising taxes. We are a small rural town. We can't have all these expensive things. |
| 121 | don't just build facilities, make provisions for maintaining them. The softball field fiasco should never have happened. Even though we don't use many sports facilities as participants, we still attend as spectators. They were very important to our children. |
| 122 | As a life long resident (and my wife a relative newbie at 18 years in town), we are ardent supporters of preserving open space and less enthusiastic about recreational facilities. |
| 123 | Keep agriculture. |
| 124 | Develop land adjacent to schools for school facility needs, like school sports teams. Eliminating playing fields and sending a team to play out of town kills a sport |
| 125 | Wetlands protection/maintenance is most ecologically important consideration in our view |
| 126 | The stress levels on Park & Rec volunteers due to the lack of support for the facilities they oversee should be a primary issue. The Town HAS to support these volunteers more. A paid part or full time Rec director should be considered to take some of the burden off these volunteers. |
| 127 | Don't botch the rural feel of the town. If this multi-site isn't part of the current Depot setup, I'm against it. Move the transfer station before scaring somewhere else. Nobody wants something like that added to their neighborhoods. It will decrease adjacent property values, add enormous amounts of traffic, and detract from the rural nature of this town. |
| 128 | To continue to preserve open space, the town will definitely need to increase the level of funds to a protect it. The town needs to do a better job of maintaining its existing recreational playing fields. |
| 129 | We desperately need a cultural land use easement (or another agreement) to give the Nipmuc, who originally inhabited Harvard land, access to Harvard's conservation lands for their ceremonies, foraging, and hunting practices. |
| 130 | It's frustrating that the DPW doesn't know how to maintain the field we have and always has a excuse. They ask for equipment, are funded and then find another excuse why they can't maintain the fields. The fields may be adequate if approximately maintained including regular mowing, fertilizer, and aeration. |
| 131 | Existing sports field need to be maintained as well as expanded. |
| 132 | It would be nice to utilize some of our conservation land for recreation |
| 133 | Handicapped accessibility |
| 134 | I would love a bike path to connect to Devens |
| 135 | Specific mention of Devens |
| 136 | Subcontract maintenance on fields rather than rely on DPW. |
| 137 | We need more open space and connect the current open space we have to both create more corridors for wildlife and passive/low-impact recreation like walking trails. I only approve of additional open fields for neglected girls' youth softball because boys youth baseball refuses to share their facilities. Soccer has a similar non-sharing problem with Mc Curdy track field. A |

low-impact youth/adult frisbee golf course could be added to allow more adult recreation adjoining walking trails in the right locations. Complaints about need of another multi-field facilities currently ignores the fact that current fields' maintenance is being ignored by town and there's a hidden agenda to create an artificial turf field which is both a known children's health hazard due to toxins and an ecological disaster -- not acceptable. We already have access to artificial fields in the large MYSA fields complex in Lancaster and actually save money going there rather than building our own.

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| 138 | Maintenance of current facilities has not been optimal |
| 139 | It would be great to have an online reservation system to book open space - including for reunions, weddings, etc. |
| 140 | Open space is the reason we moved to Harvard. Once it's gone, you can't get it back. |
| 141 | Housing is a priority. Once that is achieved we should focus efforts and funds on these worthy initiatives. |
| 142 | Harvard is a small community and does not need the multi-plex recreational facilities and paved bike parks of large suburban towns. Take better care of the facilities we do have, such as the pond/beach, tennis courts and Harvard Park. Do not keep relying on the Harvard Conservation Trust, SVT and other private organizations to do the land protection for us. Focus on the pond, farms, and conservation trails |
| 143 | People came to this town for its rural countryside. |
| 144 | Increased rate of CPA surcharge does not guarantee add'l funds to town |
| 145 | Harvard needs to protect open space as conservation land, this is a unique town and we need to preserve it. We don't need to have multiple recreational sport fields, in particular pickle ball, disc golf, bike pump track. We have baseball, soccer, basketball, tennis, boating which is plenty. |
| 146 | Let parents pay for sports fields. They have offered in the past. Boondoggle. Park and Rec has done a poor job of management, |
| 147 | Please do not add turf fields to our town, there is ample research that proves how problematic they are to the environment. |
| 148 | Should be accessible |
| 149 | Public garden or Arboretum with native plants |
| 150 | I would like to know if there is existing conservation land that could be used for athletic field. There is a piece of open space on Old Littleton, almost to intersection with Pinnacle that looks as though it could be made level enough for a field. What about fields at Devens? I hate to see the town turning into younger residents who seem to think they and their kids are entitled to top of the line everything. (And I hate to have me become a grouchy old lady!!!!) |
| 151 | Taxes have increased exponentially over the past few years, with those of us who are empty nesters planning on moving out because of it. Adding a greater tax burden will just exacerbate this problem |
| 152 | The maintenance of the existing recreational areas has been very poor, and it is sad to see the valuable areas decline. |
| 153 | There should be much more available to families and kids and it's imperative that the location be accessible to the schools. |
| 154 | survey is biased in favor of new recreational facilities. not objective at all. |
| 155 | Please take care to craft surveys that don't presume respondents' positions (e.g., how to pay for multi-field facility). Review these questionnaires to ensure there is no bias in any question. |
| 156 | there is too much money spent on sport fields and schools, too little for residents without kids in schools |
| 157 | look at currently preserved lands for recreational field development. |
| 158 | The playing fields in this town are an embarrassment and a hazard. The lacrosse/field hockey field is the worst. Most, if not all, schools that we visit have great facilities. |

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| 159 | Like the HES discussion, we have to move away from here" or "I don't need it so all set" mindset. The benefits values is evident, and although that raises the proper few ways to bring others to the town to spend money grocery store debates, etc. | When I lived on real estate is one of the things I'm enjoying up old | 5/26/2022 8:3 |
| 160 | It seems that the plan for a very expensive field can't be moved here without any qualms about recreational facilities. Some small amendments would be enough. Trends in the town, so there's always going to be some small interest in my real estate taxes to go up. Also, for the record, I don't want my son to be exposed to (or there!). | onable. We have as is and je frequently, I do not want all field - it is inequalities | 5/26/2022 8:2 |
| 161 | We need more conservation land. It's the only thing | | 5/25/2022 9:4 |
| 162 | We talk a lot about preserving the character of town. I freak out about the idea of a grocery store. I'm not in recreational facility is the opposite of the direction we're going here. More should be done to take care of our resources. | tower, they're a part of a big picture everything | 5/25/2022 5:4 |
| 163 | The citizens need a lot more information about when would be, what it would cost to acquire, and which is the best construction. I emphatically do not approve of a swap only do I not want parking and multi-field sports play land leased to the Carlsons), which might happen in the future. I believe that future voters and current citizens who are protected as open space in perpetuity will become a reality. We are about town government. | ti-field area) ted by its land. Not conserved but I firmly believe we have it if us already | 5/25/2022 4:0 |
| 164 | We could use some paved bike trails. | | 5/25/2022 3:2 |
| 165 | I do not support additional recreational fields. Not all student "wants" need to be accommodated. Fields are a want not a need. Parents are blind to the difference. | | 5/25/2022 3:2 |
| 166 | We need more conservation land. | | 5/25/2022 2:5 |
| 167 | We need more open conservation and agricultural land. | | 5/25/2022 2:4 |
| 168 | We need more open space in the form of conservation land. Imho we have too many recreational fields already. | | 5/25/2022 2:1 |
| 169 | Don't overbuild the athletic fields as we have done with the elementary school. | | 5/25/2022 10: |
| 170 | No one complains that they have to drive their children to ice hockey rinks at all hours of the night to practice....going to Devens is not that big a stretch, and using their fields should be considered. | | 5/25/2022 7:57 AM |
| 171 | It was difficult to answer the questions without knowing where there is land that could be purchased | | 5/25/2022 7:29 AM |
| 172 | Maintenance plan is needed for existing fields. Caring for the fields we have | | 5/25/2022 7:17 AM |
| 173 | The town can barely take care of the facilities it has, why build something if you cannot take care of it. The amount of trash and debris around Bromfield and down to the pond is disgusting. We would be better off offering competitor salaries to DPW employees, and running anti-litter campaigns at the schools. | | 5/24/2022 11:04 PM |
| 174 | Huge NO to pickleball. | | 5/24/2022 10:51 PM |
| 175 | We are a soccer and track and field family. The town track is very much valued. Please keep it well-maintained! We also valued our playgrounds when the kids (3) were little. Keep up with high quality playgrounds please! | | 5/24/2022 9:17 PM |
| 176 | I do not want Bromfield house torn down. I moved to Harvard for the small town charm and to escape the sprawl of Acton. I do not wish to see us become just another Westford, Acton, or Littleton. | | 5/24/2022 8:19 PM |
| 177 | I enjoy Harvard Conservation Commission and Harvard Conservation Trust trails and appreciate the effort put in by those groups to maintain the trails. I hope these natural lands | | 5/24/2022 7:28 PM |

| | | |
|-----|------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|-------------------|
| | will continue to be acquired and expanded. | |
| 178 | Funding for the large multi-recreational facility was singled out in this survey but not smaller fields/locations around town even though that alternative was given. It felt biased toward the bigger facility. If the town supports the rural, forested nature of the town, which we have seen in every survey over the last 20 years, it is not clear why a large recreational facility is the choice that this survey left us with addressing. | 5/24/2022 6:27 PM |
| 179 | The survey was confusing. The question about whether additional fields should be spread throughout town or in one facility did not have a choice which would be none of the above. The clamor for fields is based on a minority of loud voices that have historically displayed a lack of respect for protection of habitat and forests. The Open Space Committee should pay close attention to the desires of our community to protect natural open space and not develop critical habitat with fields that are not consistent with climate change. | 5/24/2022 6:21 PM |
| 180 | As mentioned, a dog socializing park is worth a consideration (and cost effective) as more and more families own dogs and trails are ill suited for off-leashing. Here a Canadian example https://www.beaconsfield.ca/en/what-s-new/16203-beaconsfield-inaugurates-its-first-dog-run | 5/24/2022 6:08 PM |
| 181 | Keep Harvard rural and stop increasing our taxes. Enough is enough. | 5/24/2022 2:50 PM |
| 182 | I realize generally Harvard is a wealthy town, but user fees and increased taxes are going to make it so that many young families will not be able to let their kids play sports because they are cost prohibitive, many sports that our kids participate in in town are already too expensive. Additionally, increasing the cost on residents will likely result in a decrease in the diversity of children able to participate. | 5/24/2022 2:43 PM |
| 183 | Preserving open space is much more than just keeping lands in its natural state. It also keeps taxes lower than increasing developed lands, either for houses or business. | 5/24/2022 1:59 PM |
| 184 | Changing ownership of field maintenance. DPW has shown it cannot / will not do it properly. Bob O'Shea has shown he can. | 5/24/2022 1:47 PM |
| 185 | Need to maintain our playing fields properly- been an issue forever! Seems crazy to build new fields if we can't maintain current fields!! | 5/24/2022 1:45 PM |
| 186 | questions about protecting wetlands and streams and so on are a bit confusing, as I assume they already cannot be developed, so aren't they already protected? I realize having protected land around wetlands and streams gives them added protection but for land acquisition priorities, it's confusing what you mean on this | 5/24/2022 1:43 PM |
| 187 | Protect Harvard — do not cave to growth concerns and mirror efforts resulting in suburbanization as witnessed in neighbor towns | 5/24/2022 1:34 PM |
| 188 | Rent other fields in Devens, rather than building new fields in Harvard. Passive recreation way more important than ball fields for kids. | 5/24/2022 1:26 PM |

Appendix 3: Town of Harvard Open Space Committee

The OSC is comprised of six voting members representing the conservation and recreational organizations in Harvard.

| <u>Organization</u> | <u>Representative</u> |
|-------------------------------------------|-----------------------|
| Agricultural Advisory Commission | Kerri Green |
| Conservation Commission | Peter Dorward |
| Harvard Conservation Trust | Jim Lee, chair |
| Park & Recreation Commission | Anne McWaters |
| School Department | Abigail Besse |
| Select Board | Rich Maiore |
| Non-voting members: Conservation Agent | Liz Allard |

Town of Harvard Open Space²⁶ Committee Charge

The Committee

The Open Space Committee will consist of six members who are appointed to 3-year terms by the Select Board comprised of a member or designee: of the Select Board, Agricultural Commission, Conservation Commission, Harvard Conservation Trust, Parks and Recreation Commission and School Department. To ensure OSC regularly has a quorum for its meetings, there will be two members from the School Department as Committee members but only one will attend and vote at OSC meetings.

²⁶ “The term ‘open space’ is often used to refer to conservation land, forested land, recreation land, agricultural land, corridor parks and amenities such as small parks, green buffers along roadways or any open area that is owned by an agency or organization dedicated to conservation. However, the term can also refer to undeveloped land with particular conservation or recreation interest. This includes vacant lots and brownfields that can be redeveloped into recreation areas. Some open space can be used for passive activities such as walking, hiking, and nature study while others are used for more active recreational uses including soccer, tennis, or baseball.” (OPEN SPACE AND RECREATION PLANNER’S WORKBOOK, March 2008, March 2008 Revision, The Executive Office of Energy and Environmental Affairs, Division of Conservation Services, Robert O’Connor, Director Principal authors: Melissa Cryan, Division of Conservation Services and Janet Curtis, EOEEA)

The Goals

- Using the 2016 Open Space and Recreation Plan (“OSRP”) as a starting point, develop a process for prioritizing lands for open space preservation and recreational needs based on current and anticipated future demand.
- Evaluate and recommend land for possible acquisition for open space and recreational use.
- Advise the Town on land acquisition and open space protection by assessing the Town’s right-of-first refusal on land coming out of Chapter 61, and evaluate any surplus land or tax-default properties that may come up.
- Provide guidance for future development or redevelopment of the Town’s land for passive or active recreation, which also includes open space, trails, natural features, landscape and viewshed.
- Develop a capital improvement plan for the protection and development of open space and recreation.
- Act as Town liaison with individuals and land protection advocacy groups working to protect open space or develop recreational facilities with the authority to apply for, negotiate, and with appropriate approvals direct Town funding for OS acquisition.
- Work with Town boards to identify private/non-profit, State and Federal funding sources.
- Assist in updating the Open Space & Recreation Plan when required by the State, and provide interim updates as needed.
- Work with other Town Boards & Committees to implement the Goals and Objectives of the Town’s Open Space and Recreation Plan.
- Identify which group is responsible for maintenance of land acquired for open space and recreational use.
- Present a semi- annual report at a duly convened Select Board meeting.

Appendix 4: Open Space Analysis for Protection and Active Recreation

Prioritizing Open Space for Protection

Methodology

All unprotected Open Space (OS) in the Town of Harvard will be evaluated using four criteria:

- Agricultural Preservation
- Ecological Significance
- Proximity to Protected Open Space
- Water / Wetland Protection

These criteria were derived from the goals of the Town of Harvard 2016 Open Space and Recreation Plan. The analysis is performed using ArcGIS on tax parcel information from the ToH Assessor's database along with publicly available data sets from MassGIS and UMass CAPS.

The ranking is performed by examining each parcel of OS for the four criteria and assigning a score (as detailed below). The scores for each of the criteria are then summed for each parcel of OS, and the OS parcel is assigned a high / medium / low rank based on the total score. Map 2.1 shows the ranking of open space to be protected.

Devens is not included in the analysis.

Parcels are:

- Harvard Assessor's tax parcels

Developed Land is:

- ToH Assessor Use Codes
 - Residential (Single Family, Multi Family, Other) except Mixed/Chapter 61x and residential parcels ≥ 20 Ac
 - Commercial - except Mixed/Chapter 61x and Developable, Potentially Developable and Undevelopable lands
 - Industrial - except for Electric Transmission RoW
 - Municipal - schools, municipal buildings, DPW
 - Mass Highway
 - Religious (with buildings)

Open Space is:

- All non-Developed Land in Harvard.

Notes:

1. Residential parcels ≥ 20 Ac are included as *potential* open space with the realization the lots can be subdivided.

Protected Open Space is:

- A subset of OS including
 - Federal land
 - State (DCR, Fish & Wildlife) land
 - ToH Conservation Land
 - ToH Park & Rec land
 - ToH vacant land
 - Land owned by land trusts (e.g., HCT)
 - Agriculture Preservation Restrictions (APRs)
 - Conservations Restrictions (CRs)
 - Preservation Restrictions (PRs)

Notes:

1. Some municipal land is not protected as Article 97 land but will be considered Protected OS for this analysis.
2. Some land owned by Lands trusts (e.g., HCT) is not permanently protected by Conservation Restrictions. For the purposes of this evaluation, all land owned by Land Trusts will be considered to be Protected OS.

Unprotected Open Space is:

- All ToH OS \neq Protected OS

Notes:

1. All Chapter 61x land is included in Unprotected Open Space.

The following analysis will be performed on all Unprotected Open Space in Harvard.

Agricultural Preservation is:

- MassGIS “Land Cover / Land Use (2020)” = “Cultivated” or “Pasture or Hay”
- MassGIS “Soils” = “Prime Farmland Soils” (Prime or Statewide Importance)
- Scoring: (Cultivated Area and Pasture/Hay Area are summed and capped at 3)
 - Cultivated Area
 - 0 = < .2 Ac
 - 1 = .2 Ac to < 2.5 Ac
 - 2 = 2.5 Ac to < 10 Ac
 - 3 = ≥ 10 Ac
 - Pasture/Hay Area
 - 0 = < .2 Ac
 - 1 = .2 Ac to < 5 Ac
 - 2 = 5 Ac to < 20 Ac
 - 3 = ≥ 20 Ac
 - Prime Farmland Soils
 - +1 = 1 Ac to < 10 Ac
 - +2 = ≥ 10 Ac

Ecological Significance is:

Habitat

- MassGIS “NHESP Priority habitats of Rare Species”
- MassGIS “NHESP BioMap 3 Core Habitat”
- MassGIS “NHESP BioMap 3 Critical Natural Landscape”
- MassGIS “NHESP Priority Natural Vegetation Communities”
- MassGIS “EEA Areas of Critical Environmental Concern”

Climate Resiliency

- UMass CAPS “Index of Ecological Integrity > 50%”

Vernal Pools

- MassGIS “Certified Vernal Pools”
- MassGIS “Potential Vernal Pools”

- Scoring:

- 0 = < .2 Ac of Ecological Significant land
- 1 = .2 Ac to < 5 Ac of Ecological Significant land
- 2 = 5 Ac to < 20 Ac of Ecological Significant land
- 3 = ≥ 20 Ac of Ecological Significant land
- +1 if “IEI > 50%” area ≥ 5 Ac
- +1 if contains one or more certified or potential vernal pools

Notes:

1. There is a large overlap in the first five data sets which comprise habitat, so they are merged rather than considering them individually.

Proximity to Protected land is:

- Number of parcels of Protected OS that an Unprotected OS parcel bounds, and if it is part of a Protected OS corridor.
- Scoring:
 - 1 = Abuts one parcel of Protected OS
 - 2 = Abuts two parcels of Protected OS
 - 3 = Abuts three or more parcels of Protected OS
 - +1 if abuts one 50+ acre Protected OS Corridor
 - +2 if abuts two or more distinct 50+ acre Protected OS Corridors

Notes:

1. A parcel is considered adjacent if it is within 75' of another parcel to allow for roads and streams.
2. OS Corridors are defined as contiguous blocks of Protected OS ≥ 50 Ac. Again a 75' buffer is used to allow for roads and streams.

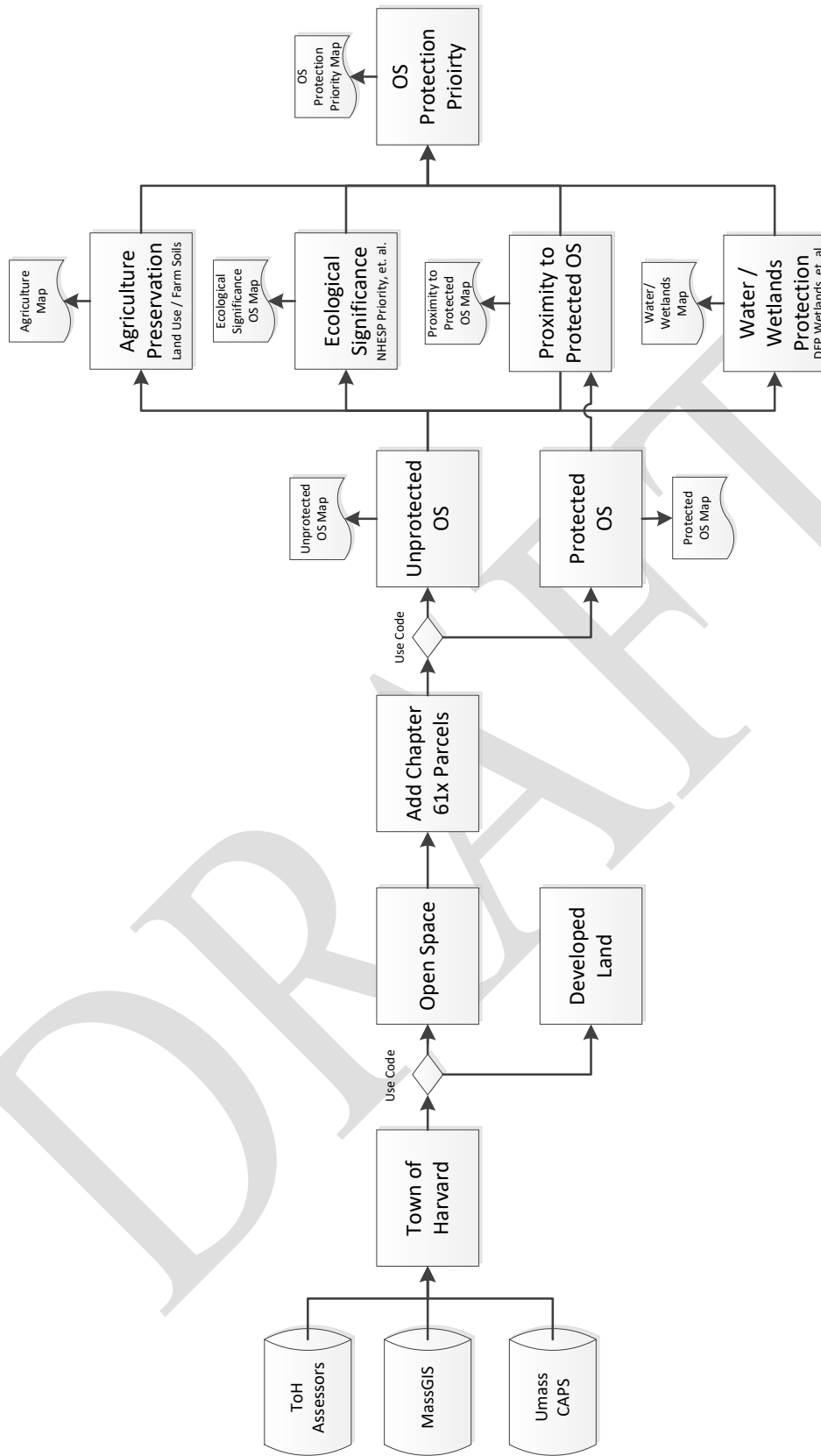
Water / Wetland Protection is:

- MassGIS "DEP Wetlands Polygons" (for wetland areas)
- MassGIS "DEP Wetlands Linear Features" (for stream and shore lengths)
- MassGIS "Aquifers"
- Scoring:
 - 0 = $< .2$ Ac of wetlands
 - 1 = $.2$ Ac to < 1.5 Ac of wetlands
 - 2 = 1.5 Ac to < 5 Ac of wetlands
 - 3 = ≥ 5 Ac of wetlands
 - +1 if frontage on waterbody ($>100'$) or contains perennial stream ($>100'$)
 - +1 if contains aquifer area > 1.5 Ac

Open Space Prioritization is:

- Sum of scores from
 - Agricultural Preservation
 - Ecological Significance
 - Proximity to Protected Land
 - Water / Wetlands Protection
- Scoring: (breakpoints were set by the distribution of answers)
 - High Priority = ≥ 10 (9% of total)
 - Priority = 7 to 9 (13% of total)
 - Low Priority = 5 to 6 (14% of total)
 - Not a priority = 0 to 4 (64% of total)

Harvard Open Space Protection Prioritization



Identifying Potential Sites for Active Recreation

Methodology

All unprotected Open Space (OS) in the Town of Harvard plus all municipally owned vacant land will be evaluated using the criteria:

- ≥ 3 acres of land which is
 - Level (≤ 4 degrees of slope)
 - Outside of wetland buffers
 - Outside of open water buffers
 - Outside of Zone 1 wellhead buffers
- $\geq 50'$ of frontage on a public road

Map 2.2 shows the potential sites for active recreation.

Data Sources

- Harvard Assessor's Database (obtained from CAI using Staff Tools / export)
- MassGIS geodatabase & layers <https://docs.digital.mass.gov/dataset/massgis-data-layers>
- MassGIS Land Cover / Land Use (2016) layer <https://docs.digital.mass.gov/dataset/massgis-data-2016-land-coverland-use>
- Mass GIS Town of Harvard tax parcel layer <https://docs.digital.mass.gov/dataset/massgis-data-standardized-assessors-parcels>
- UMass CAPS IEI layer http://umasscaps.org/data_maps/data.html

Appendix 5: ADA Self-Assessment

The Harvard Park & Recreation Department and the Conservation Commission make every effort to accommodate people with disabilities, physically and programmatically. The Section 504 Self-Evaluation of Harvard's recreation and conservation land indicates that relatively few accommodations exist to provide full access to these areas for people with disabilities. The evaluation results are shown along with a transition plan for corrective action, if any.

504 Administrative Requirements

- The Town 504 Coordinator is Timothy Bragan, Town Administrator
- The section of the Personnel Policies & Procedures in regards to Recruitment and Selection is included at the end of this appendix
- Harvard employment opportunities are always advertised without discrimination as to age, sex, marital status, race, color, creed, national origin, handicap, veteran status or political affiliation.

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Abbot Orchard | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bolton Road | | |
| Acreage | 0.43 | | |
| Activity | Orchard | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Abbot Orchard | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bolton Road | | |
| Acreage | 8.66 | | |
| Activity | Orchard | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Abbot Swampland | | |
| Owner/Manager | Conservation Commission | | |
| Location | Woodside Road | | |
| Acreage | 1.50 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |

| | | | |
|-----------|------|------|--|
| Swampland | None | None | |
|-----------|------|------|--|

| | | | |
|---------------------------|-------------------------------|------------------------|--|
| Facility Name | Abbot-Reed-Powell | | |
| Owner/Manager | Conservation Commission | | |
| Location | East Bare Hill/Bolton Road | | |
| Acreage | 32.89 | | |
| Activity | Hiking & Cross-Country Skiing | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trail | None | None | |

| | | | |
|--------------------------------------------------------|--------------------------|------------------------|--|
| Facility Name | Ann Lees Ball Field | | |
| Owner/Manager | Park & Recreation | | |
| Location | Ann Lees Road | | |
| Acreage | 3.08 | | |
| Activity | Baseball & Soccer | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Gravel Driveway/ No handicapped access to fields | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Ayer Road Meadows | | |
| Owner/Manager | Conservation Commission | | |
| Location | Ayer Road | | |
| Acreage | 23.90 | | |
| Activity | Agricultural | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Bamford Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Murray Lane | | |
| Acreage | 1.60 | | |
| Activity | Conservation | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Barba's Point | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bare Hill Pond | | |
| Acreage | 16.10 | | |
| Activity | Hiking & Pond Frontage | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trail | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Barber Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Shaker Road | | |
| Acreage | 27.73 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|-------------------------------|------------------------|--|
| Facility Name | Bare Hill Wildlife Sanctuary | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bolton Road | | |
| Acreage | 44.00 | | |
| Activity | Hiking & Cross-country Skiing | | |
| Site Amenities | Trails and Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Barlett Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Pattee Road | | |
| Acreage | 3.20 | | |
| Activity | Conservation | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Over Grown Site | None | None | |

| | | | |
|----------------------|-------------------------|--|--|
| Facility Name | Barrett Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Massachusetts Avenue | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Acreage | 24.11 | | |
| Activity | Conservation | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | 2016 | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Barton 2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Woodside Road | | |
| Acreage | 1.97 | | |
| Activity | Watershed Protection | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|---------------------------|-------------------------------|------------------------|------------------|
| Facility Name | Barton 3 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bowers Brook/Still River Road | | |
| Acreage | 15.40 | | |
| Activity | Wetland Protection | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | Authority |
| Wetlands | None | None | None |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Barton 4 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Abuts Bowers Brook | | |
| Acreage | 23.80 | | |
| Activity | Wetland Protection | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|----------------------|----------------------------|--|--|
| Facility Name | Black Pond Access | | |
| Owner/Manager | Conservation Commission | | |
| Location | Littleton County Road | | |
| Acreage | 3.34 | | |
| Activity | Trail Access to Black Pond | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Site Amenities | Trail | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Black Pond | | |
| Owner/Manager | Conservation Commission | | |
| Location | Littleton County Road | | |
| Acreage | 56.49 | | |
| Activity | Hiking & Nature Study | | |
| Site Amenities | Trail | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trail | None | None | |

| | | | |
|---------------------------|---------------------------------------------------|------------------------|--|
| Facility Name | Blomflet | | |
| Owner/Manager | Conservation Commission | | |
| Location | Ayer Road | | |
| Acreage | 29.42 | | |
| Activity | Hiking | | |
| Site Amenities | Trail & Parking at Playing Field on Ann Lees Road | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trail | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | BOCA Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Shirley Road | | |
| Acreage | 3.90 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|-------------------------------|------------------------|--|
| Facility Name | Bowers Spring-Sprague | | |
| Owner/Manager | West of Bolton Road | | |
| Location | Conservation Commission | | |
| Acreage | 18.90 | | |
| Activity | Hiking & Cross-Country Skiing | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |

| | | | |
|-------------------|------|------|--|
| Unimproved Trails | None | None | |
|-------------------|------|------|--|

| | | | |
|---------------------------|-------------------------------|------------------------|--|
| Facility Name | Bowers Spring– Visockas | | |
| Owner/Manager | Conservation Commission | | |
| Location | West of Bolton Road | | |
| Acreage | 24.09 | | |
| Activity | Hiking & Cross-Country Skiing | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|-----------------------------------------|------------------------|--|
| Facility Name | Brewer Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | South of Herman Orchard | | |
| Acreage | 5.50 | | |
| Activity | Preservation of land along Bowers Brook | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wet Swamp | None | None | |

| | | | |
|---------------------------|-----------------------------------|------------------------|--|
| Facility Name | Brown Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Glenview Drive/ South Shaker Road | | |
| Acreage | 3.49 | | |
| Activity | Preservation and Rehabilitation | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Sloping | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Bull Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Cruft Lane | | |
| Acreage | 0.66 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetland | None | None | |

| | | | |
|----------------------|-------------------------|--|--|
| Facility Name | Bush Land | | |
| Owner/Manager | Conservation Commission | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Location | I-495 | | |
| Acreage | 6.10 | | |
| Activity | None | | |
| Site Amenities | Wetlands | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Carey Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road | | |
| Acreage | 2.92 | | |
| Activity | Agricultural & Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Paved Parking | None | None | |

| | | | |
|---------------------------|----------------------------|------------------------|--|
| Facility Name | Charles Atherton Case Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bolton Road | | |
| Acreage | 2.02 | | |
| Activity | Conservation | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Clapp Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road | | |
| Acreage | 37.61 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|-----------------------|-------------------------|--|--|
| Facility Name | Clapp Land 2 & 3 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Willard Lane | | |
| Acreage | 8.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Steep Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Cobb Land 1 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Oak Hill Road | | |
| Acreage | 4.50 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Trails/Wetlands | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Cobb Land 2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Oak Hill Road | | |
| Acreage | 2.52 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|---------------------------------|------------------------|--|
| Facility Name | Coke Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Littleton Road | | |
| Acreage | 32.15 | | |
| Activity | Agriculture & Community Gardens | | |
| Site Amenities | Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Colwell Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bolton Road | | |
| Acreage | 2.70 | | |
| Activity | Protection of Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Corzine Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Littleton Road | | |
| Acreage | 3.00 | | |
| Activity | Trail | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|---------------------------|---------------------------------|------------------------|--|
| Facility Name | Damon Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Brown Road | | |
| Acreage | 34.80 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | Expand and Improve Trail System | 2017 | |

| | | | |
|---------------------------|-------------------------------|------------------------|--|
| Facility Name | Dean's Hill | | |
| Owner/Manager | Conservation Commission | | |
| Location | Prospect Hill Road | | |
| Acreage | 32.00 | | |
| Activity | Hiking & Cross Country Skiing | | |
| Site Amenities | Trail & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Steep Trails | None | None | |

| | | | |
|---------------------------|---------------------------------------------|------------------------|--|
| Facility Name | Dunlap Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Littleton Road | | |
| Acreage | 34.08 | | |
| Activity | Hiking, Cross Country Skiing & Snowmobiling | | |
| Site Amenities | Trail | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|----------------------|------------------------|--|--|
| Facility Name | Eastview (Elwell) Land | | |
|----------------------|------------------------|--|--|

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Owner/Manager | Conservation Commission | | |
| Location | Ayer Road | | |
| Acreage | 8.53 | | |
| Activity | Trails/view | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Farnsworth Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Willard Lane | | |
| Acreage | 39.00 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|---------------------------|---------------------------------------------|------------------------|--|
| Facility Name | Fuller Dudley Woods | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Littleton Road | | |
| Acreage | 10.21 | | |
| Activity | Hiking, Cross Country Skiing & Snowmobiling | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Gillette/Horse Meadows | | |
| Owner/Manager | Conservation Commission | | |
| Location | Sherry Road | | |
| Acreage | 20.04 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access | None | None | |

| | | | |
|----------------------|-------------------------|--|--|
| Facility Name | Great Elms | | |
| Owner/Manager | Conservation Commission | | |
| Location | Murray Lane | | |
| Acreage | 69.18 | | |
| Activity | Agricultural & Hiking | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Griffin/Dutcher Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Woodside Road | | |
| Acreage | 2.25 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|---------------------------|-------------------------------------------|------------------------|--|
| Facility Name | Hammershaimb Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Woodchuck Hill Road/ Massachusetts Avenue | | |
| Acreage | 1.10 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access | None | None | |

| | | | |
|--------------------------------|--------------------------|------------------------|--|
| Facility Name | Harvard Historical | | |
| Owner/Manager | Conservation Commission | | |
| Location | Oak Hill/Old Boston Road | | |
| Acreage | 1.50 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking or Designated Trail | None | None | |

| | | | |
|------------------------|-------------------------------------------|--|--|
| Facility Name | Harvard Park | | |
| Owner/Manager | Park & Recreation | | |
| Location | Lancaster County Road | | |
| Acreage | 33.85 | | |
| Activity | Track, Soccer & Playground | | |
| Site Amenities | Handicapped Parking & Paved Path to Field | | |
| Transition Plan | None | | |

| Barriers to Access | Corrective Action | Schedule Change | Authority |
|---------------------------|--------------------------|------------------------|-------------------|
| None | None | None | Park & Recreation |

| | | | |
|---------------------------|--------------------------------|------------------------|--|
| Facility Name | Haskell Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road/ Willard Lane | | |
| Acreage | 12.83 | | |
| Activity | Agricultural | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Haskell-Viles Swampland | | |
| Owner/Manager | Conservation Commission | | |
| Location | Woodside Road | | |
| Acreage | 4.30 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Herman Orchard | | |
| Owner/Manager | Conservation Commission | | |
| Location | East Ayer Road | | |
| Acreage | 50.00 | | |
| Activity | Orchard & Trails | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Narrow Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Hoch Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road | | |
| Acreage | 11.41 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|--------------------------------------------|---------------------------------|------------------------|--|
| Facility Name | Holy Hill | | |
| Owner/Manager | Conservation Commission | | |
| Location | South Shaker Road | | |
| Acreage | 119.56 | | |
| Activity | Hiking & Snowmobiling | | |
| Site Amenities | Trails, Parking & Trash Barrels | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Gravel Driveway/Parking, Unimproved Trails | None | None | |

| | | | |
|---------------------------|---------------------------|------------------------|--|
| Facility Name | Horne land | | |
| Owner/Manager | Conservation Commission | | |
| Location | North of Still River road | | |
| Acreage | 9.40 | | |
| Activity | Wetland | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Access not used | None | None | |

| | | | |
|---------------------------------------|--------------------------------------------------------------|------------------------|--|
| Facility Name | Hosking Point | | |
| Owner/Manager | Conservation Commission | | |
| Location | Off Still River Road on Bare Hill Pond, behind Scorgie Tufts | | |
| Acreage | 1.70 | | |
| Activity | View shed | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Access from parking for Scorgie Tufts | None | None | |

| | | | |
|---------------------------|------------------------------------------------|------------------------|--|
| Facility Name | Kaufmann land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Off Shaker Road opposite Holy hill parking lot | | |
| Acreage | 20.21 | | |
| Activity | Hiking | | |
| Site Amenities | Trail & Parking Across Road | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not easily accessible | None | None | |

| | | | |
|---------------------------|---------------------------------|------------------------|--|
| Facility Name | Klyce Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Between Coke and Herman Orchard | | |
| Acreage | 2.25 | | |
| Activity | Wetland | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not used | None | None | |

| | | | |
|---------------------------|----------------------------|------------------------|--|
| Facility Name | Kronauer land | | |
| Owner/Manager | Conservation Commission | | |
| Location | South side of Sheehan Road | | |
| Acreage | 5.35 | | |
| Activity | Wetland | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not used | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Locke Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Green Hill Road | | |
| Acreage | 0.33 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|----------------------------|------------------------|--|
| Facility Name | Lacroix land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Green Hill road | | |
| Acreage | 16.00 | | |
| Activity | Hiking & Shaker well House | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|----------------------|-------------------------|--|--|
| Facility Name | Luongo Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Off Still River Road | | |
| Acreage | 26.48 | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not Used | None | None | |

| | | | |
|-----------------------------------------|-------------------------------------------|------------------------|--|
| Facility Name | MacKnight Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Off Littleton road , adjoins Corzine Land | | |
| Acreage | 4.18 | | |
| Activity | Hiking | | |
| Site Amenities | Trials | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Narrow trails accessible from Poor Farm | None | None | |

| | | | |
|---------------------------|--------------------------------------------------------------------------------------------------|------------------------|--|
| Facility Name | Maxant Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Ayer/ Lancaster County Roads | | |
| Acreage | 19.04 | | |
| Activity | Hiking/Walking | | |
| Site Amenities | Trails with some Handicap Access to Millie's Path, Parking & Access from Elderly Housing Complex | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Some Unimproved Trails | None | None | |

| | | | |
|---------------------------|----------------------------------|------------------------|--|
| Facility Name | Myrick Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Corner Ayer Road and Myrick Lane | | |
| Acreage | 0.34 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not used | None | None | |

| | | | |
|----------------------|-------------------------|--|--|
| Facility Name | Newman 2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Prospect Hill Road | | |
| Acreage | 6.69 | | |
| Activity | Hiking | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Paved Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|------------------|
| Facility Name | Newick Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Under Pin Hill Road | | |
| Acreage | 5.68 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | Authority |
| Not used | | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Old Littleton Meadow | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Littleton Road | | |
| Acreage | 8.10 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Old Mill Road | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Mill Road | | |
| Acreage | 24.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trail & Roadside Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Stone walls | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Pena/ Fairbank | | |
| Owner/Manager | Conservation Commission | | |
| Location | Brown Road | | |
| Acreage | 4.90 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |

| | | | |
|----------|------|--|--|
| Not used | None | | |
|----------|------|--|--|

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Pin Hill/ Cram Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Depot Road | | |
| Acreage | 10.20 | | |
| Activity | Hiking & Historic Sites | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Steep Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Pin Hill/Wilfert Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Harvard Depot Road | | |
| Acreage | 4.68 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Handicapped Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Poitras Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Willard Lane | | |
| Acreage | 13.37 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Prospect Hill (Newman) | | |
| Owner/Manager | Conservation Commission | | |
| Location | Prospect Hill Road | | |
| Acreage | 61.51 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Handicapped Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Rennie Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Sheehan/ Littleton Road | | |
| Acreage | 5.10 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|---------------------------|----------------------------------|------------------------|--|
| Facility Name | Robb Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Fairbanks Street/Old Boston Road | | |
| Acreage | 1.77 | | |
| Activity | Open Space & Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access | None | None | |

| | | | |
|---------------------------|-----------------------------|------------------------|--|
| Facility Name | Rodriguez Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Herman Orchard/Bowers Brook | | |
| Acreage | 5.35 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Handicapped Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Rodriguez Land 2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Cruft Lane | | |
| Acreage | 7.86 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Handicapped Access | None | None | |

| | | | |
|----------------------|-------------------------|--|--|
| Facility Name | Rowe Land | | |
| Owner/Manager | Conservation Commission | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Location | Sherry Road | | |
| Acreage | 6.33 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Rueben Reed Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Ayer Road | | |
| Acreage | 0.32 | | |
| Activity | Town Common | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Russo Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Shaker Road | | |
| Acreage | 21.13 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Ryan Playing Fields | | |
| Owner/Manager | Park & Recreation | | |
| Location | Harvard Depot Road | | |
| Acreage | 30.33 | | |
| Activity | Soccer | | |
| Site Amenities | Restroom & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Gravel Parking Area | None | None | |

| | | | |
|-----------------------|--------------------------|--|--|
| Facility Name | Schmidt (Doebele) Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Mill/Under Pin Hill Road | | |
| Acreage | 4.96 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Universal Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Schwabb Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Shaker Road | | |
| Acreage | 5.18 | | |
| Activity | Conservation | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| None | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Scorgie Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road | | |
| Acreage | 34.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trail & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Limited Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Shapley Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Pinnacle Road | | |
| Acreage | 9.10 | | |
| Activity | Orchard | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access | None | None | |

| | | | |
|---------------------------|---------------------------|------------------------|--|
| Facility Name | Sister of St. Scholastica | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road | | |
| Acreage | 7.81 | | |
| Activity | Agricultural | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Slattery Land#1 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Abuts Coke Land | | |
| Acreage | 5.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Handicapped Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Slattery Land#2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Stow Road | | |
| Acreage | 12.80 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Smith Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Oak Hill Road | | |
| Acreage | 2.51 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Smith Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road | | |
| Acreage | 3.50 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Limited parking | None | None | |

| | | | |
|----------------------|----------------|--|--|
| Facility Name | Sprague Land#1 | | |
|----------------------|----------------|--|--|

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Owner/Manager | Conservation Commission | | |
| Location | West Bare Hill Road | | |
| Acreage | 48.56 | | |
| Activity | Hiking | | |
| Site Amenities | Trail & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unpaved Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Sprague Land#2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | West Bare Hill Road | | |
| Acreage | 17.42 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unpaved Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Sprague Land#3 | | |
| Owner/Manager | Conservation Commission | | |
| Location | West Bare Hill Road | | |
| Acreage | 56.46 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unpaved Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Stephenson#1 | | |
| Owner/Manager | Conservation Commission | | |
| Location | I-495 | | |
| Acreage | 25.00 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|----------------------|-------------------------|--|--|
| Facility Name | Stephenson#2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | I-495 | | |
| Acreage | 6.00 | | |
| Activity | Open Space | | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access or Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Stephenson#3 | | |
| Owner/Manager | Conservation Commission | | |
| Location | I-495 | | |
| Acreage | 10.80 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Access or Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Stephenson#4 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Brown Road | | |
| Acreage | 0.22 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Limited Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Stephenson#5 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Brown Road | | |
| Acreage | 11.10 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Limited Parking | None | None | |

| | | | |
|------------------------|-------------------------|--|--|
| Facility Name | Stone Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Mill Road | | |
| Acreage | 6.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |

| Barriers to Access | Corrective Action | Schedule Change | |
|---------------------------|--------------------------|------------------------|--|
| No Universal Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Sturdy Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Slough Road | | |
| Acreage | 10.23 | | |
| Activity | Hiking | | |
| Site Amenities | Trail & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Universal Access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Sullivan Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | South Shaker Road | | |
| Acreage | 9.53 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Unimproved Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Terry Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Bare Hill Pond | | |
| Acreage | 7.38 | | |
| Activity | Wetlands | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Wetlands | None | None | |

| | | | |
|------------------------------------------|------------------------------|------------------------|------------------|
| Facility Name | Thurston's Cove | | |
| Owner/Manager | Conservation Commission | | |
| Location | Warren Avenue | | |
| Acreage | 2.70 | | |
| Activity | Conservation | | |
| Site Amenities | Signage | | |
| Transition Plan | | | |
| Barriers to Access | Corrective Action | Schedule Change | Authority |
| No parking, unpaved entrance, no vehicle | Add parking or allow vehicle | | |

| | | | |
|----------------------------------------------------------------|---------------------------------------|--|--|
| access allowed in flat area where handicap could be accessible | access for “drop off” in flatter area | | |
|----------------------------------------------------------------|---------------------------------------|--|--|

| | | | |
|---------------------------------------|--------------------------|------------------------|--|
| Facility Name | T.O.A.D. Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Littleton Road | | |
| Acreage | 1.16 | | |
| Activity | Conservation | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No easy access, signage and no trails | Add signage and parking | None | |

| | | | |
|--------------------------------------|--------------------------|------------------------|--|
| Facility Name | Town Beach | | |
| Owner/Manager | Park & Recreation | | |
| Location | Pond Road | | |
| Acreage | 18.34 | | |
| Activity | Swimming & Boating | | |
| Site Amenities | Restrooms & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Bathrooms not handicapped accessible | None | None | |

| | | | |
|----------------------------------|--------------------------|------------------------|--|
| Facility Name | Town Forest | | |
| Owner/Manager | Conservation Commission | | |
| Location | Poor Farm Road | | |
| Acreage | 2.20 | | |
| Activity | Hiking | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking/ Unimproved Trails | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Town Forest | | |
| Owner/Manager | Conservation Commission | | |
| Location | Poor Farm Road | | |
| Acreage | 9.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |

| | | | |
|----------------------------------|------|------|--|
| No Parking/ Unimproved Trails | None | None | |
|----------------------------------|------|------|--|

| | | | |
|----------------------------------|--------------------------|------------------------|--|
| Facility Name | Town Forest | | |
| Owner/Manager | Conservation Commission | | |
| Location | Poor Farm Road | | |
| Acreage | 29.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking/ Unimproved Trails | None | None | |

| | | | |
|-------------------------------------------------------------------------------------------------------|-----------------------------------------------------------------------------------|------------------------|--|
| Facility Name | Tripp Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Brown Road | | |
| Acreage | 44.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No parking at trail head, no signage. Chain across trailhead making access impossible for wheelchairs | Add area for parking, add signage and remove chain for possible wheelchair access | None | |

| | | | |
|----------------------------|--------------------------|------------------------|--|
| Facility Name | Tufts Land#1 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Turner Lane | | |
| Acreage | 23.80 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not Handicapped Accessible | None | None | |

| | | | |
|-----------------------|-------------------------|--|--|
| Facility Name | Tufts Land#2 | | |
| Owner/Manager | Conservation Commission | | |
| Location | Still River Road | | |
| Acreage | 15.00 | | |
| Activity | Hiking | | |
| Site Amenities | Trails | | |

| | | | |
|---------------------------------------|--------------------------------------|------------------------|--|
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No signage, parking or visible trails | Add signage, parking and mark trails | None | |

| | | | |
|---------------------------------------------------------------------------------------|-----------------------------|------------------------|--|
| Facility Name | Tully Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Behind Ryan Athletic Fields | | |
| Acreage | 11.50 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Have to go through field to access land, not paved. Trails not wheelchair accessible. | Pave walkway to access | None | |

| | | | |
|------------------------------------------------|--------------------------|------------------------|--|
| Facility Name | Vesenska Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Old Littleton Road | | |
| Acreage | 24.53 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not wheeler chair accessible, trails not paved | None | None | |

| | | | |
|------------------------------------------------|--------------------------|------------------------|--|
| Facility Name | Waite Field | | |
| Owner/Manager | Park & Recreation | | |
| Location | Lancaster County Road | | |
| Acreage | 5.05 | | |
| Activity | Soccer | | |
| Site Amenities | Trash Barrels | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Gravel Parking/No handicapped access to fields | None | None | |

| | | | |
|----------------------|--------------|--|--|
| Facility Name | Warilla Land | | |
|----------------------|--------------|--|--|

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Owner/Manager | Conservation Commission | | |
| Location | Stow Road | | |
| Acreage | 31.68 | | |
| Activity | Cross Country Skiing | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Parking | None | None | |

| | | | |
|----------------------------------------------------------------------------------------|-----------------------------|------------------------|--|
| Facility Name | White Lane | | |
| Owner/Manager | Conservation Commission | | |
| Location | White Lane | | |
| Acreage | 19.97 | | |
| Activity | Open Space | | |
| Site Amenities | Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| Not Wheel chair accessible, no signage marking where there is public access, not paved | Add signage and pave trails | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Willard Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Willard Lane | | |
| Acreage | 48.50 | | |
| Activity | Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Paved Parking | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Williams Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Stow Road | | |
| Acreage | 64.25 | | |
| Activity | Agricultural & Hiking | | |
| Site Amenities | Trails & Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No Paved Parking | None | None | |

| | | | |
|----------------------|---------------|--|--|
| Facility Name | Williams Pond | | |
|----------------------|---------------|--|--|

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Owner/Manager | Conservation Commission | | |
| Location | Stow Road | | |
| Acreage | 5.20 | | |
| Activity | Pond | | |
| Site Amenities | Parking | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No wheelchair access | None | None | |

| | | | |
|---------------------------|--------------------------|------------------------|--|
| Facility Name | Willow Road Land | | |
| Owner/Manager | Conservation Commission | | |
| Location | Willow Road | | |
| Acreage | 2.85 | | |
| Activity | Open Space | | |
| Site Amenities | None | | |
| Transition Plan | None | | |
| Barriers to Access | Corrective Action | Schedule Change | |
| No signs or parking | Add signage and parking | None | |

Town of Harvard Personnel Policies & Procedures

CHAPTER 6 - RECRUITMENT AND SELECTION

The Town shall make every effort to attract and employ qualified persons. Every person, regardless of race, color, creed, age, sex, religion, physical handicap or national origin, applying for employment in the Town will receive equal treatment. Persons shall be recruited from a geographic area as wide as necessary to assure that qualified candidates apply for various positions. The recruitment, selection and promotion of candidates and employees shall be based solely on job related criteria as established in the position descriptions and in accordance with proper personnel practices.

6.1 Recruitment

The department supervisors in conjunction with the Town Administrator shall have a major role in the recruitment and selection of personnel. The qualifications, classification and salary range for positions shall be established in accordance with the classification and compensation plans.

6.1.1 Notice of Vacancies

Department supervisors with the assistance of the Town Administrator, upon the identification of a vacancy or on the authorization of a new position, shall prepare a job vacancy notice. The job vacancy notice shall include: the job title, major duties of the position, qualifications, salary ranges, a closing date for applications, and application instructions. The Town Administrator shall review and approve all job notices prior to advertisement and posting. Recruitment for a position shall not begin until the job vacancy notice is approved by the Town Administrator.

6.1.2 Posting and Advertisement of Job Vacancy Notices

Notices of vacant positions shall be posted for employees to review. Advertising for entry level positions should be adequate to ensure that a sufficient number of qualified applicants apply for available vacancies. The position must be advertised at least ten (10) days prior to the closing date for application.

6.1.3 Applications

All candidates applying for employment in the Town shall complete an official employment application form and return the form to the Appointing Authority prior to the end of the working day of the closing date specified in the position announcement. Each applicant shall sign the form, and the truth of all statements shall be certified by the applicant's signature.

6.1.4 Methods of Selection

The department supervisor shall establish any one or a combination of selection procedures in order to determine the candidates' fitness and ability to perform in the position:

* Written examination

- * Interview
- * Oral Interview Panel
- * Practical (or performance) Test
- * Evaluation of Experience and Training

6.1.5 The department supervisor shall also determine in each instance:

- * Whether each procedure shall be used to screen applicants on a "qualified" - "not qualified" basis or to form part of an overall composite of the applicant's fitness and ability to perform in the position; and

- *When a combination of procedures is used, the relative weight to be assigned each procedure.

6.1.6 References

A candidate's former employers, supervisors, and other references may be contacted as part of the selection process. References and other background investigations shall be documented and made part of the applicant's file. All reference checks and investigations shall be complete prior to the offer of employment.

6.1.7 Application Records

The application, reference checks, and related documents submitted shall be maintained by the Town Administrator for the period required by law. The Town shall to the extent possible maintain the confidentiality of the application.

6.1.8 Appointment

All appointments shall be made in writing by the appointing authority. The written notice of appointment shall include the salary, the starting date, and any conditions of employment not covered in these personnel policies. Copies of the notice of appointment shall be provided to the Town Administrator.

6.1.9 Medical Examinations

Persons selected for employment with the Town, after receipt of notice of such appointment and prior to the starting date of employment, shall be required to undergo a medical examination. The examination shall be at the expense of the Town by a physician designated by the board of selectmen. The examining physician shall advise as to the applicant's physical fitness for the job being sought. A psychological exam may be given for selected employees. The physical exam may be waived by the Personnel Board or Board of Selectmen.

6.1.10 Failure to Report

An applicant, who accepts an appointment and fails to report to work on the day set by the appointing authority, shall be deemed to have declined the appointment and the offer of employment shall be withdrawn.

Appendix 6: Town of Harvard Equal Opportunity Employment Policy

I. Non-Discrimination in Employment

The Town of Harvard prohibits discrimination in employment on the basis of:

- Age (40 and above),
- Criminal record (applications only),
- Physical, mental, or psychiatric disability,
- Genetics (results of genetic testing),
- Gender Identity
- Parental leave,
- National origin or ancestry,
- Race or color,
- Religion,
- Sex,
- Sexual orientation, or
- Active military status.

Unlawful discrimination of employees occurring in the workplace or in other settings in which employees may find themselves in connection with their employment will not be tolerated by the Town. Further, any retaliation against an individual who has formally or informally complained about discrimination or has cooperated with an investigation of a discrimination complaint is prohibited. To achieve our goal of providing a workplace free from discrimination, the conduct that is described in this policy will not be tolerated, and we will implement the procedure described below to address any potential inappropriate conduct.

The Town of Harvard commits itself and its employees, within the context of Massachusetts and federal civil rights laws, to ensure equitable participation of employees of all backgrounds in all of its daily operations.

This policy applies to all employment practices and employment programs sponsored by the Town. This policy shall apply, but not be limited to, the areas of:

- Recruitment,
- Selection,
- Compensation and benefits,
- Professional development and training,
- Reasonable accommodation for disabilities or religious practices,
- Promotion,
- Transfer,
- Termination,
- Layoff, and
- Other terms and conditions of employment.

Because the Town takes allegations of discrimination seriously, we will respond promptly to complaints and where it is determined that inappropriate conduct has occurred, we will act promptly to eliminate the conduct and impose any necessary corrective action, including disciplinary action.

II. Discriminatory Harassment

The Town's separate Harassment Policy details our commitment to a workplace free to any verbal or physical conduct which is unwelcome, severe or pervasive, and related to membership or perceived membership in a protected class.

III. Reasonable Accommodation

Employees seeking reasonable accommodations may submit their request in writing to Marie Sobalvarro, 13 Ayer Road, Harvard MA 01451 (msobalvarro@harvard.ma.us, or 978-456-4100 x330).

IV. Discrimination Complaints

If any of our employees believes that he or she has been subjected to unlawful discrimination, the employee has the right to file a complaint with our organization. This may be done in writing or orally.

If you would like to file a complaint you may do so by contacting Marie Sobalvarro, 13 Ayer Road, Harvard MA 01451 (msobalvarro@harvard.ma.us, or 978-456-4100 x330).

She is also available to discuss any concerns you may have, and to provide information to you about our Equal Employment Opportunity policy and our complaint process. Alternatively, employees may contact their Department Head.

V. Discrimination Investigation

The Town will promptly investigate the allegation in a fair and thorough manner. The investigation will be conducted in such a way as to maintain confidentiality to the extent practicable under the circumstances. The investigation will include private interviews with the person filing the complaint, the person alleged to have committed the discrimination, and relevant witnesses. When we have completed our investigation, we will, to the extent appropriate, inform the person filing the complaint and the person alleged to have committed the conduct of the results of that investigation.

If it is determined that inappropriate conduct has occurred, we will act promptly to eliminate the offending conduct, and where it is appropriate we will also impose disciplinary action.

VI. Disciplinary Action

If it is determined that inappropriate conduct has been committed by one of our employees, we will take such action as is appropriate under the circumstances. Such action may include counseling, verbal or written warning, suspension, or termination.

VII. State and Federal Remedies

In addition to the above, if you believe you have been subjected to unlawful discrimination, you may file a formal complaint with either or both of the government agencies set forth below. Using our complaint process does not prohibit you from filing a complaint with these agencies. Each of the agencies has a time period of 300 days for filing a claim.

- The United States Equal Employment Opportunity Commission (EEOC): John F. Kennedy Federal Building, 475 Government Center, Boston, MA 02203, (800)-669-4000
- The Massachusetts Commission Against Discrimination (MCAD):
 - Boston Office: One Ashburton Place, Rm. 601, Boston, MA 02108, (617) 994-6000
 - New Bedford Office: 800 Purchase Street, Room 501, New Bedford, MA 02740, (508) 990-2390
 - Springfield Office: 424 Dwight Street, Rm. 220, Springfield, MA 01103, (413) 739-2145
 - Worcester Office: 484 Main Street, Room 320, Worcester, MA 01608, (508) 453-9360