

Natural Resources Plan Implementation Strategy

Goals and Strategies:

(Aspiration A) Montpelier will have a documented, mapped, and up to date inventory of our natural resources and heritage that identifies critical features for protection and considerations for development.

Goal a: Maintain and improve our existing base inventories and map layers of our current resources and natural heritage including water resources, soils, flora, fauna, and natural communities.

Strategy: The City will develop a **Natural Resources Inventory Program** to collect and maintain accurate records of all natural resources in the City. *[Priority: High; Cost: Low; Who: Conservation Commission NR Subcommittee]*

- When completed, incorporate the results of the DEC Wetland Mapping Program, which is underway in 2021, into the City's natural resource inventory. *[Priority: Medium; Cost: Low; Who: Conservation Commission NR Subcommittee]*
- Maintain accurate records of vernal pools and coordinate with other organizations and/or a biologist to field verify those that have not been confirmed. *[Priority: High; Cost: Medium; Who: Conservation Commission NR Subcommittee]*
- Conduct a study to field verify existing priority natural community data. *[Priority: High; Cost: Medium; Who: Conservation Commission NR Subcommittee]*
- Acquire existing city and state inventories and map layers of natural resources and heritage. *[Priority: Medium; Cost: Low; Who: Conservation Commission NR Subcommittee]*
- Solicit a field naturalist to analyze the 2018 Bioblitz data to inform the natural communities data layers. *[Priority: Medium; Cost: Medium; Who: Conservation Commission NR Subcommittee]*
- Update the natural resources inventory to include blocks of harmful invasive species. *[Priority: Medium; Cost: High; Who: Conservation Commission NR Subcommittee]*

Goal b: Develop and maintain maps, derived from the base maps, to identify key natural resources for priority protection and to inform considerations for development.

Strategy: Develop a **conservation priority map** based upon the highest valued features identified in the Natural Resources Inventory. *[Priority: High; Cost: Low; Who: Conservation Commission NR Subcommittee]*

Strategy: Develop one or more **development constraints maps** based on information identified in the Natural Resources Inventory. *[Priority: High; Cost: Low; Who: Conservation Commission NR Subcommittee]*

(Aspiration B) Montpelier citizens are informed about our natural resources and heritage and are engaged in activities that connect them with the natural world.

Goal a. Enhance online presence of the Montpelier Conservation Commission including addition of a publically accessible portal for the Natural Resources Inventory.

Strategy: Develop a **conservation outreach program** to update and maintain the Conservation Commission page of the city website to include conservation commission records (annual reports and minutes), maps/inventories, and publications on relevant conservation issues. *[Priority: Medium; Cost: Low; Who: Conservation Commission Outreach Subcommittee]*

Strategy: Develop a **conservation outreach program** to regularly post relevant conservation information and advertise MCC sponsored events on Front Porch Forum, Facebook, and other social media sites. *[Priority: Medium; Cost: Low; Who: Conservation Commission Outreach Subcommittee]*

Strategy: Create an **information portal** that compiles existing studies and inventories in comprehensive maps, online databases, and shape files for the public to download. *[Priority: Medium; Cost: Low; Who: Conservation Commission Outreach Subcommittee]*

Strategy: Develop and adopt a **master conservation map** for advisory use and a user-friendly map for public use. *[Priority: Medium; Cost: Low; Who: Conservation Commission Outreach Subcommittee]*

Goal b. Improve citizen engagement in conservation and natural resource inventory projects within city limits on public and private land.

Strategy: Establish a **conservation outreach program** to coordinate, collaborate, and sponsor educational events including:

- Lead and sponsor regular informational sessions such as naturalist walks, stormwater infrastructure tours, etc.
- Develop an outreach campaign to educate and promote the use of iNaturalist by the public.
- Support the North Branch Nature Center to organize, advertise, and conduct a third BioBlitz by providing financial support, a liason at planning meetings, and volunteers at the event.

- Support other community and school naturalist or bioblitz events.
- Hold annual public forums to gain public input regarding community values. *[Priority: High; Cost: Medium; Who: Conservation Commission Outreach Subcommittee]*

Strategy: Enhance the City’s **volunteer conservation program** through recruitment of a volunteer base and/or sponsoring a youth conservation corps to complete conservation projects around the city (rain garden construction, invasive species removal, riparian buffers installation, etc.). *[Priority: Medium; Cost: Medium; Who: Parks Director]*

Strategy: Create an **invasive species program** to engage public to identify, report, and remove invasive species from private land. *[Priority: Medium; Cost: Medium; Who: Conservation Commission Outreach Subcommittee]*

Strategy: In coordination with the Department of Public Works, create a **stormwater assistance program** to engage the public to properly manage stormwater on private property. *[Priority: Medium; Cost: Medium; Who: PW Director]*

Goal c. Maintain strong partnerships with related local groups and organizations

Strategy: Attend relevant meetings and events sponsored by local groups and related commissions. *[Priority: Low; Cost: Low; Who: Conservation Commission]*

Strategy: Collaborate and participate in regional projects and grant proposals that fall within city limits. *[Priority: Low; Cost: Low; Who: Conservation Commission]*

Strategy: Continue to represent Montpelier Conservation Commission at Association of Vermont Conservation Commission’s annual Conservation Summit

Strategy: Continue to sponsor at least one local youth MCC member and encourage them to pursue conservation projects of their choosing

(Aspiration C) Montpelier ensures a resilient and healthy environment through strategies that protect our climate and nurture our air, water, soil, flora, fauna, and natural communities.

Goal a. Maintain healthy and high-quality surface waters that support a variety of ecological and recreational uses.

Strategy: In coordination with the Department of Public Works, create a **stormwater assistance program** to engage the public to properly manage stormwater on private property including:

- Procure funding to install green stormwater infrastructure at sites cited in the Stormwater Master Plan or other areas of interest, including accompanying interpretive signage. *[Priority: High; Cost: Medium; Who: DPW Director]*

- Evaluate snow storage areas adjacent to the Winooski River and work with Department of Public Works to educate landowners on best management practices. [Priority: High; Cost: Medium; Who: DPW Director]

Strategy: Develop a **streambank restoration program** to support the efforts of community organizations and property owners to complete riparian area and urban stream bank plantings to establish/revegetate native riparian plant communities and stabilize stream bank soil, preventing erosion and sedimentation. [Priority: Low; Cost: Medium; Who: Conservation Commission]

Strategy: Conduct a **survey of Montpelier's existing dams** and study the feasibility of removing dams which no longer serve any useful purpose. [Priority: Low; Cost: Medium; Who: Conservation Commission with River Conservancy]

Strategy: This plan supports the Utility Plan goal to eliminate CSOs in the city wastewater system.

Strategy: This plan supports the Utility Plan to disconnect roof drains from the wastewater system.

Strategy: This Plan supports the Utility Plan and the project to upgrade Water Resource Recovery Facility to better protect water quality.

Strategy: Continue the **street sweeping program** as a critical piece to reduce sedimentation in the City's waterways.

Strategy: Continue to administer and enforce provisions of the **River Hazard Area Regulations** to protect the natural function of floodplains and river corridors, and make revisions as necessary.

Strategy: Continue to participate in the **Community Rating System (CRS)** to reduce risk to life and property that result from flooding and erosion.

Strategy: Continue to administer and enforce provisions of the **Unified Development Regulations** that protect natural resources and heritage, and make revisions as necessary including:

- Establishment of water setbacks and riparian buffers.
- Protection of wetlands and vernal pools.
- Regulation of maximum impervious cover requirements for each district in order to minimize stormwater runoff and maximize absorption
- Providing density bonuses in PUDs for avoiding flood hazard areas.
- Regulating development on steep slopes
- Need to adopt new stormwater rules that apply to protect water quality for projects below state thresholds
- Requiring erosion control for all developments

Goal b. Maintain a thriving community of native flora and fauna and eradicate or control the spread of invasive species populations.

Strategy: Enhance the **City's volunteer conservation program** through recruitment of a volunteer base and/or sponsoring a youth conservation corps to complete conservation projects around the city (rain garden construction, invasive species removal, riparian buffers installation, etc.). [Priority: High; Cost: Medium; Who: Parks Director]

Strategy: Create an **invasive species program** to engage the public to identify, report, and remove invasive species from private land. [Priority: Medium; Cost: Medium; Who: Conservation Commission Outreach Subcommittee]

Strategy: This Plan supports the Land Use Plan and strategies that create compact settlements. When the pressure to develop is absorbed into our growth centers then less pressure is felt on our rural lands to be subdivided and developed.

Strategy: The City will adopt a **policy to ban the use of neonicotinoids** for any city operations. [Priority: High; Cost: Medium; Who: Conservation Commission Outreach Subcommittee]

Strategy: Pursuant to Act 171, develop a **plan to map and protect forest blocks and wildlife corridors**. [Priority: High; Cost: Medium; Who: Conservation Commission]

Strategy: Continue to administer and enforce provisions of the **Unified Development Regulations** that protect natural resources and heritage, and make revisions as necessary including:

- Prohibit use of invasive species, as defined by the Vermont Department of Forests, Parks, and Recreation, in landscaping plans
- Establishing planting standards to ensure trees and landscaping have sufficient planting space to thrive.
- Establishing densities that support compact settlements

Goal c. Reduce Montpelier's impact on, and resilience to, climate change and use city lands to mitigate its effect to ensure resiliency for natural communities.

Strategy: This plan supports the **Energy Plan** goals to eliminate fossil fuel use in City operations by 2030 and across the public at large by 2050.

Strategy: Create a **natural resource climate adaptation plan** to identify natural communities in Montpelier that will be threatened by climate change over the next Century. One idea would be to engage a biologist/naturalist to define natural communities threatened by climate change. [Priority: High; Cost: Medium; Who: Conservation Commission]

Strategy: Create a ***natural resource climate adaptation plan*** to identify travel corridors in Montpelier that will be necessary for species movement due to climate change over the next Century. [Priority: High; Cost: Medium; Who: Conservation Commission]

Strategy: Create an ***invasive species program*** to educate the public about new invasive species that we may be anticipating as a result of climate change. [Priority: Medium; Cost: Medium; Who: Conservation Commission Outreach Subcommittee]

Strategy: Develop and follow a ***carbon sequestration management plan*** for city park and forest lands. [Priority: Medium; Cost: Medium; Who: Parks Director]

Goal d. Maintain protection of the City's soil resources from contamination or erosion.

Strategy: Continue to administer and enforce provisions of the ***Unified Development Regulations*** that protect natural resources and heritage, and make revisions as necessary including:

- Regulation of development on steep slopes
- Requiring erosion control for all developments

Goal e. Acquire and maintain Park land and easements where ownership of these parcels and rights best achieves the long term protection of the natural resources and heritage of Montpelier.

Strategy: Develop a ***Conservation Lands Program*** to facilitate the acquisition of land and easements through purchase or acceptance of gifts of land. [Priority: Medium; Cost: Medium; Who: Parks Director]

Strategy: Build capacity within the ***Conservation Fund*** to be able to conserve easements and/or land identified as a conservation priority within Montpelier. [Priority: Medium; Cost: Medium; Who: Parks Director]

Strategy: Develop policies within the ***Conservation Lands Program*** that identify the features and resources that the City will pursue as priorities in any acquisition. [Priority: Medium; Cost: Medium; Who: Parks Director]

Strategy – Maintain an active Conservation Fund Advisory Board, which consists of three MCC members and two Montpelier residents

Strategy – Prepare an application to be completed by stakeholders to apply for monies from the Conservation Fund

Strategy - Review applications when submitted using natural resources inventories and maps to identify key areas for conservation and/or recreation

Goal f. Enhance protection of the City's urban ecology.

Strategy: Continue to administer and enforce provisions of the ***Unified Development Regulations*** that protect natural resources and heritage, and make revisions as necessary including:

- Prohibit use of invasive species, as defined by the Vermont Department of Forests, Parks, and Recreation, in landscaping plans
- Establishing planting standards to ensure trees and landscaping have sufficient planting space to thrive.
- Maintaining the City's street tree requirements.

Strategy: Continue to operate the ***Emerald Ash Borer program*** to remove damaged ash trees and treat some targeted ash trees for preservation.

Strategy: Continue the City's ***street tree program*** to plant, care for, and where necessary remove street trees.