

# Vermont Climate Council 2025 Update to Vermont's Climate Action Plan

Agriculture and Ecosystems Subcommittee

Priority Recommendations

December 16, 2024



# Agriculture and Ecosystems

## Core Focus Areas

1. Reduce greenhouse gas (GHG) emissions and sequester carbon from agricultural and forestry practices.
2. Support adaptation, viability, recovery, economies, and workforce.
3. Incentivize climate-resilient land use practices that support the role of land in flood prevention, biodiversity, conservation, and related goals.

# Overview of Pathways and Strategies by Task Group

Task Group 1: Reduce GHG emissions and sequester carbon from agriculture and forestry practices

- **2 Pathways**
- **6 Strategies**
- **27 Actions**

Task Group 2: Support adaptation, viability, recovery, economies, and workforce

- **5 Pathways**
- **16 Strategies**
- **49 Actions**

Task Group 3: Incentivize climate-resilient land use practices

- **4 Pathways**
- **15 Strategies**
- **65 Actions**

# Reduce GHG Emissions and Sequester Carbon Priority Actions (1)



Increase funding, enhance, and adapt existing State of Vermont programs that support GHG emissions reductions, soil carbon sequestration, and/or climate adaptation and resiliency on working lands. Enhance and adapt programs to better incorporate climate mitigation, adaptation, resilience, nature-based solutions, and traditional ecological knowledge. Example State programs include but are not limited to: AAFM: Ag-CWIP, BMP, CEAP, CREP, FAP, GWFS, PSWF, VPFP, VFESP; land acquisition, river corridor easements, wetland conservation, County Forester Program, Maintaining and Creating Resilient Forests. Coordinate with USDA Natural Resources Conservation Service-VT programming to accelerate implementation of federally funded climate mitigation and resilience practices in Vermont.



Protect farmland and managed forestlands from development through land conservation and protection programs so these land uses can continue to provide climate mitigation, adaptation, and resilience benefits. Enhance existing State land use protection programs, such as the Vermont Farmland Conservation Program and Forest Conservation Easements, to improve farmland access and protection of agricultural soils and working forests.

# Reduce GHG Emissions and Sequester Carbon Priority Actions (2)



Update the Vermont GHG Emission Inventory to account for both carbon sequestration and emission reduction benefits from agriculture.



Invest in Vermont's landowners, managers, and caretakers to enhance farm and forest viability and to support their informed decisions to increase their operation's resilience and adaptation to climate change.



Fund and implement Payment for Ecosystem Services (PES) program(s) for lands to encourage landowners/managers to implement practices that improve soil health, crop and forest resilience, increase carbon storage, increase stormwater storage capacity, and reduce runoff. Fund existing agricultural PES programs (AAFV VFESP and VPFV) and expand to include or develop new programs for forestry. (PES is payment/compensation for increasing ecosystem services/environmental stewardship achieved through better land management by farmers and loggers and does not include carbon trading or markets, which is not recommended by this subcommittee).

# Support adaptation, viability, recovery, economies, and workforce

## Priority Actions (1)



Develop & fund climate adaptation planning and training for all farmers and foresters.



Dedicate funds to support Vermont Natural Resources Conservation Districts and farmer watershed organizations with the specific objective of allowing them to reach other farmers and do farmer-to-farmer education about improved soil and manure management.



Investigate innovative funding mechanisms for assisting with the implementation of climate-smart agriculture practices, crop insurance for diversified Vermont-scale farms, and emergency recovery following extreme weather events to better respond when climate change-related events occur.

# Support adaptation, viability, recovery, economies, and workforce

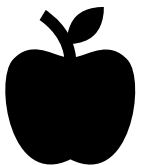
## Priority Actions (2)



Support robust funding for supply chain resilience and state food security, including significant investment in storage, processing, distribution infrastructure, and food assistance programs. Prioritize investments in farm and food businesses that have climate resilience and mitigation goals. Funding would include minimum base funding for the Working Lands Enterprise Initiative of \$1.5 million and \$6 million for the Agriculture Development Grant program for the next three years (i.e., \$18 million over three years).

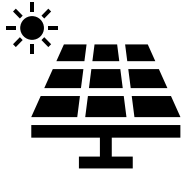


Uplift and resource the work of the Vermont Abenaki and other Indigenous Peoples in the State, Vermont Environmental Justice Network, Vermont Releaf Collective, and other BIPOC peoples and organizations in Vermont



Work to adopt state and regional level policies, procedures, and plans to ensure that the Vermont food supply is sufficient to withstand global or national food supply chain disruptions caused by climate change and other disasters (as written in the 2021-2030 Farm to Plate Strategic Plan pg. 3)

# Incentivize Climate-Resilient Land Use Practices Priority Actions (1)



State agencies shall utilize financial incentives, siting policies, rules, and regulations to motivate solar and wind energy capacity on new buildings, parking lots (by installing solar roofs), in compact settlement areas (including renewable energy and charging facilities at rental housing) as well as in previously-disturbed/developed areas and using disincentives to avoid or minimize forest clearing and use of agricultural land (particularly prime agricultural land) for renewable development.

**Most members** of the Agriculture and Ecosystem Subcommittee felt represented by the following recommendation on biomass:

- Fund and undertake, as soon as possible, the study requested by the Climate Council in its biomass addendum. And in the meantime, enact a moratorium on approvals of new biomass utility-scale electric energy facilities.

**Other subcommittee members** felt more represented by one of these other recommendations, reflecting a diversity of views on the subcommittee:

- State agencies shall eliminate biomass as a utility-scale energy source and stop referring to it as renewable energy.
- Fund and undertake the study as soon as possible, the study recommended by the Council, along with the guidance to the Public Utilities Commission contained in the Council biomass addendum.



# Incentivize Climate-Resilient Land Use Practices Priority Actions (2)



State agencies shall work with partners to promote strategic and equitable statewide landscape connectivity and forest block conservation planning and implementation toward 30 x 30 goals in state program prioritization frameworks using the best available data and mapping, including Vermont Conservation Design braiding in Traditional Ecological Knowledge/Indigenous Knowledge (TEK/IK), . This conservation planning and implementation will allow at least 9% of Vermont's forest to become (or be maintained as) old forest, specifically targeting 15% of the matrix forest within the highest priority forest blocks, including National Forests, to achieve this condition and ensure protection of sacred sites.



State agencies shall prioritize and incentivize (through various financial mechanisms) nature-based solutions (NBS) and traditional ecological knowledge(TEK)/Indigenous knowledge (IK) for addressing climate change impacts through state regulatory processes, assessments, planning, prioritization frameworks, and funding programs.



State land management agencies shall adapt their management of lands using nature-based solutions to address climate impacts, increase ecosystem resilience, enhance biological diversity, and improve water quality. State land management agencies shall enhance resilience funds to support the financial capacity of other land and water caretakers to achieve these goals.

# Incentivize Climate-Resilient Land Use Practices Priority Actions (3)



State agencies and the legislature shall promote healthy, connected river corridors, floodplains, and wetlands, prioritize restoration and conservation, and incentivize water storage in headwaters and natural areas to promote flood resilience and biodiversity through expansion of wetland, floodplain, riparian forest and/or river corridor easements that better compensate land and water caretakers for restoring, managing and conserving these natural water storage areas (including opportunities presented by Act 121).

## Shared Priority Action



Enhance education, outreach, research, and technical assistance programming to encourage the adoption of strategies that increase climate mitigation, adaptation, and resilience by farmers, foresters and other land and water caretakers. State agencies shall work with and fund partners and higher education, such as UVM Extension. These efforts should be incorporated into current programs, developed using braided Western science and Traditional Ecological Knowledge/Indigenous Knowledge (TEK/IK), and designed to represent diverse perspectives while addressing a diversity of audiences and age groups.