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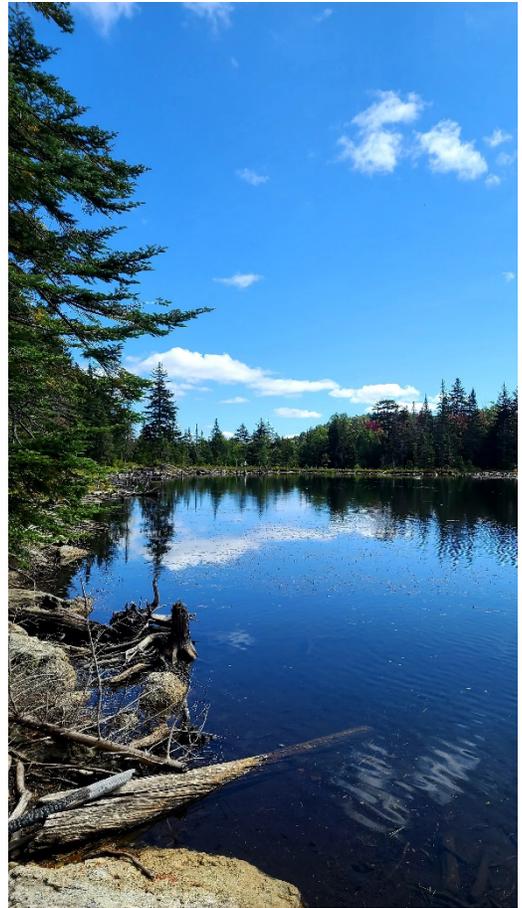
USDA Forest Service

Green Mountain National Forest

Town Meeting Report

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Green Mountain National Forest

Town Meeting Report

The employees of the Green Mountain National Forest (GMNF) depend heavily on support from many municipalities, volunteers, partners and contractors. The Forest would like to take this time to thank you and your community for the support and interest that you have shown in helping with the management of the approximately 400,000-acre GMNF. Receiving several million outdoor recreation enthusiast visits annually, these visitors seek enjoyment in a natural setting while providing critical benefit to the local economies. The GMNF is proud to be a part of Vermont and your town. It is truly one of Vermont's treasures and the largest contiguous public land area in the state. Forest staff work hard to achieve quality public land management under a sustainable multiple-use management concept to meet the diverse needs of the people -- people in your town as well as all of the visitors who come to Vermont every year. Following is a brief summary of what happened in your National Forest throughout the past year:

Land Acquisition

There were no additional acres acquired in the year of 2020, however, this program remains active. We are currently working on acquisitions located in the towns of Chittenden, Killington, Mendon, Dorset, Lincoln, Warren, Ripton and Wallingford. We have been supported by each of the town select boards for these parcels. The addition of these public lands would not be possible without the assistance of The Trust for Public Land, The Conservation Fund, and the support of our local communities.

Heritage Program

- Heritage Program staff and retired Forest Archaeologist assisted the Ripton Historical Society in creating an interpretive sign for the Pier’s Tavern historic site. The sign will be installed at the culmination of the Frost Wayside Connector Trail.
- Retired Forest Service personnel and volunteers visited a number of cemeteries within the Forest Proclamation Boundary to maintain and preserve them. In addition, volunteers assisted with the identification and testing of cultural resources for upcoming projects.
- An upcoming volunteer opportunity with the Vermont Archaeological Society (VAS) is underway to provide members the chance to monitor and record historic sites on the Forest.
- The Heritage Program seasonal archaeological technicians located four previously unknown historic sites this field season, adding to the ever-expanding inventory of sites on the Forest.



The Heritage Program would like to thank the numerous volunteers that have taken the time this year to help protect, preserve, and identify the cultural resources in the Green Mountains!

Road, Dam, & Facility Construction & Maintenance

In cooperation with federal, state and local governments, private contractors, and non-profit organizations, the GMNF Engineering staff repaired and maintained many roads, bridges and other facilities throughout the Forest. Some highlights are as follows:

Forest Facility Improvements & Maintenance: The GMNF initiated construction of a new administrative headquarters facility on US Route 4 in Mendon, Vermont. Work this year included acquiring all necessary state and federal permits and starting construction of the site including roads and parking. The Forest will continue in 2021 with the site construction and initiate the building with an anticipated move in 2023. We also completed annual condition and safety inspections of all administrative facilities as well as out-year planning, design, and preparation for facility improvements.



Forest Road Cooperative Aid to Towns: Completed important road improvement and maintenance projects in the Towns of Goshen, Ripton, Rochester and Brandon. Projects included continued cooperation with the Town of Brandon and Churchill Road and initiation of the design of the West Hill Road Bridge in Rochester.

Forest Road Improvement Projects: Improved 3.73 miles of National Forest System roads in the Towns of Chittenden, Goshen, Granville, Hancock, Manchester, Mount Tabor, Peru, Readsboro, Ripton, Rochester, Somerset, Stamford, Stratton and Woodford. This work included the replacement of culverts, stabilization of embankments, repairing storm damage, and the resurfacing of roads.

Forest Road Maintenance: Maintained 88.68 miles of National Forest System roads in the Towns of Ripton, Rochester, Chittenden, Goshen, Hancock, Mount Tabor, Peru, Readsboro, Somerset, Stamford, Sunderland, Wallingford, Winhall and Woodford. This work included grading, culvert cleaning, mowing and brushing.

Recreation Programs

The GMNF provides a great diversity of outdoor recreation opportunities, connecting people with nature in a variety of settings. Outdoor recreation is valued as both an important part of Vermont’s economy and a crucial component of many Vermonters’ and visitors’ physical and mental well-being. The value and importance of recreation became increasingly evident in 2020 as recreation use increased

exponentially during the COVID-19 pandemic. Recreation staff on the GMNF worked closely with partners and volunteers to balance the requirements of public health with the growing demand, and impacts, associated with increased visitation. The Forest Service encourages participation in outdoor recreational activities and asks users to recreate responsibly by: packing out all trash you bring in; adhering to site or trail closures; seeking alternative locations when encountering packed parking lots or sites; and following Center For Disease Control (CDC), local and state guidelines for public health and safety.

Forest-wide Activity

In partnership with the Velomont Trail Collective and Vermont Huts Association, the Forest Service continues to analyze opportunities to construct an end-to-end mountain biking trail and hut network in Vermont. Partner efforts to secure over \$500,000 will enable construction of approximately 10 miles of the Velomont Trail on National Forest System land in the towns of Chittenden, Rochester and Hancock, as well as contribute towards funding a proposed year-round ADA accessible backcountry hut in Chittenden, if approved. The long-term vision for the Velomont Trail and Vermont Hut network is to connect 23 communities from Canada to Massachusetts with huts strategically located along the trail for overnight use.

The following accomplishments highlight 2020 Recreation and Trail Program successes in acknowledgement of the outstanding collaborative effort exhibited between Forest Service employees, partner organizations, volunteers, State and local government representatives, and local businesses. The Forest Service relies on a community of collaboration and wishes to thank all of our partners, such as: Vermont Association of Snow Travelers (VAST), Vermont All-terrain Vehicle Sportsman’s Association (VASA), Vermont Forests, Parks and Recreation, Vermont Youth Conservation Corps (VYCC), Rochester / Randolph Area Sports Trail Alliance (RASTA), Vermont Mountain Bike Association (VMBA), Green Mountain Club (GMC), Appalachian Trail Conservancy, Town of Killington and the Killington Mountain Bike Club, Vermont Huts Association, Addison County Bike Club, Catamount Trail Association (CTA), Counseling Service of Addison County, Middlebury High School Diversified Occupations Program, Moosalamoo Association (MA), Blueberry Hill Outdoor Center (BHOC) Vermont Trail Trotters (VTT), Vermont Horse Council, and many more – including our dedicated campground hosts.

With the help of the many hard-working volunteers and organizations we are able to provide a quality recreation experience in alignment with a strong environmental stewardship ethic. The following highlights capture large program accomplishments but represent only a portion of the annual work that is completed to develop, improve and maintain recreational opportunities on the GMNF.

Local Efforts

Brandon: In cooperation with the Town, improved access, road surface and parking area on the Leicester Hollow Road.

Chittenden: Completed trail improvements near Chittenden Reservoir with the support of the Chittenden Dammers and Mountain Top Inn & Resort. Installed a three-sided lean-to at Chittenden Brook Campground. Trail widening and drainage improvements were completed on the Reservoir Run Snowmobile Trail.

Goshen: In partnership with RASTA, replaced a trail bridge on the Long Trail south of Brandon Gap. Installed improved interpretive signage at the Blueberry Management Area. Trail widening and drainage

improvements were completed on the Goshen Dam Snowmobile Trail with support from the Foote of the Mountain Snowmobile Club. Visitor encounter monitoring zone data was completed for weekday use in the Joseph Battell Wilderness on the Long Trail from Brandon Gap north of Route 73.

Goshen / Ripton: Campsite re-inventory (approximately a 5-year cycle) was completed for the Joseph Battell Wilderness.

Granville: Gates were installed on both ends of the Bowl Mill Trail, with support from the White River Valley Sno-Goers Snowmobile Club. Repairs were made to the bridge on the Perry Basin Snowmobile Trail. These repairs are planned on being finished in 2021.

Killington: Worked with the Town of Killington to provide for winter parking and use of the Sherburne Trails. Worked with the Vermont Agency of Transportation to discourage parking and dumping at the Killington Pit.

Leicester: Graveled and graded the Minnie Baker parking lot.

Lincoln: Installed a bear box at the Battell Shelter.

Lincoln / Ripton: Campsite re-inventory (approximately a 5-year cycle) was completed for the Breadloaf Wilderness. Social / User developed trails were recorded on surveys in the Breadloaf Wilderness.

Norwich: Continuing work with community organizations and partners to identify long-term trail connections within the Appalachian Trail corridor.

Ripton: Robert Frost Phase II renovations were completed adding nearly 1 mile of accessible trail to the site, improved accessible parking, new benches, expanding the boardwalk in the wetland area, rerouting sections of the trail away from the river where erosion was occurring. This work has made this trail the second longest accessible trail in the state.



Provided funding to the Town of Ripton to install a gate and replace a culvert on Old Town Road. Re-graded and graded Chatfield and Widow's Clearing parking lots. Installed new interpretive signs at Widow's Clearing.

In partnership with Moosalamoo Association, ACBC and the VMBA made significant improvements and relocations to the Mount Moosalamoo and Oak Ridge Trails including fords for stream crossings, bridge replacements and redesigning the trail to make it more mountain bike friendly while maintaining a high-quality hiking experience. This work was completed by L&D Trailworks with support from the Addison County Bike Club (ACBC).

The Mooslamoo Association and Addison County Bike Club replaced the bridge on the Oak Ridge Trail 0.1 mile north of FR92A.

Visitor encounter monitoring zone data was completed for weekday use in the Breadloaf Wilderness on the Skylight Pond Trail area and in the Cooley Glen / Emily Proctor Trail Loop.

Rochester: Installed new kiosks at the Bingo Brook Campground. Improved interpretive offerings on the kiosk outside the Rochester office through the installation of eight new interpretive panels. Improved interpretive signage and installed a new kiosk at the Riverbend recreation site.

Salisbury: Improved interpretive signage at the Falls of Lana Route 53 parking area.

Warren: Improved south access trail to Blueberry Lake. Improved accessible parking at the north shore parking area at Blueberry Lake. Managed visitation at Warren Falls. We are developing plans to pave the parking lot and work on site rehabilitation to improve visitor use patterns and reduce resource impacts.

Wallingford: In partnership with GMC, a caretaker hosted visitors and maintained the Little Rock Pond Shelter and tenting area and maintained surrounding trails. In partnership with VAST, travel management barriers were placed on the Homerstone Meadow snowmobile trail and at the end of the Class 4 town road near Wallingford Pond to deter unauthorized motorized use of the area and to protect the trail tread and other natural resources behind these barriers. The Feller Brook Trail was removed from snowmobile maps.

Mount Holly: In partnership with VAST, a travel management barrier was placed on the Meadow Brook Parking Access trail off Beaver Meadow Road to deter unauthorized motorized use of the area and protect the trail tread and wildlife openings behind this barrier.

Mount Tabor: New kiosk panels were installed on the Silver Bridge kiosk at the gateway into the White Rocks National Recreation Area. These panels provide visitor information about the recreation opportunities in the area as well as its natural resources. Significant tread repair work was accomplished on Corridor 7 snowmobile trail south of Forest Road 30 near Lake Brook. The Devils Den trail was removed from snowmobile maps and decrepit trail bridges were removed from service.

Weston: In partnership with a new volunteer group, the .25-mile Weston CCC trail was designated for use off from State Route 155. Future plans for this area include installing a kiosk and visitor information panel. The two-mile Moses Pond trail was designated for mountain bikes. The Devils Den trail was removed from snowmobile maps and decrepit trail bridges were removed from service.

Peru: In partnership with GMC, a caretaker hosted visitors and maintained the Griffith Lake Tenting Area and Peru Peak Shelter and maintained surrounding trails. In partnership with VAST, a two-mile section of Corridor 7 snowmobile trail from the end of Forest Road 58 received trail maintenance which included resetting several culverts and cleaning out drain dips and ditches. A travel management barrier was installed on the Mad Tom snowmobile trail off from Forest Road 21 to deter unauthorized motorized use of this trail and to protect the trail tread and areas managed as wildlife openings.

Dorset: A new kiosk panel was installed at the Dorset Hollow trailhead located at the end of Grouse Lane.

Winhall: Two new information panels were installed at the Appalachian Trail / Long Trail Parking Area on Route 11/30.

Stratton: In partnership with GMC, a caretaker provided onsite information and maintained back country facilities and trails at Stratton Pond. At Grout Pond Recreation Area, volunteers from CTA and Dutch Hill Alliance of Skiers and Hikers (DHASH) maintained trails for use by both hikers and skiers and two new shelters replaced the former shelters located at campsites 6 and 8.

Woodford: A new kiosk and information panel was installed at the end of Forest Road 273 at the newly designated Stamford Stream Trailhead. The panel provides information regarding ATV and UTV trail riding opportunities. In partnership with VAST, travel management barriers were replaced at the Pine Valley, Adams Trailhead, at the end of Forest Road 72 and at the end of Forest Road 74. These barriers help protect the trail tread from unauthorized motorized use.

Readsboro: In partnership with VAST, the Wiley Mountain and Hoosac Ridge snowmobile trails were maintained, and travel management barriers were installed to protect this recent work from unauthorized motorized use. Additionally, travel management barriers were installed on Corridor 9 off from Forest Road 73 and at the Corridor 9 crossing on Route 8. In partnership with VASA, a new kiosk and information panel were installed at the Heartwellville Trailhead located on Forest Road 73. This panel provides information regarding snowmobile, ATV and UTV trail riding opportunities in the area.

Pownal: An information panel was installed on the kiosk at the Dome Trailhead. This panel provides information on trail opportunities as well as forest management activities happening in the area.

Wilderness

Throughout 2020 the Green Mountain National Forest has experienced increased visitor use on the eight designated Wildernesses due to the pandemic. Americans have flocked to outdoor recreation amid COVID 19 restrictions, as the Wilderness encounter monitoring data indicates. This year the Wilderness Stewardship Performance (WSP) scores on the GMNF increased significantly across all eight designated Wildernesses. WSP places heightened emphasis on the interdisciplinary responsibilities of wilderness stewardship and the potential linkages with other program areas. It seeks to foster improved integration and communication between program areas, to accurately reflect the collaboration required to steward our wilderness resource. In 2019 the GMNF had a total WSP score of 290 including all eight Wildernesses, in 2020 our efforts increased the stewardship scores by 112 points to 402 out of a possible 800 points (100 points per Wilderness).

Bristol: An integrative Invasive Species Plan was completed by a Society of Wilderness Stewardship Fellow that applies to the Bristol Cliffs Wilderness.

Bristol / Brandon / Ripton: A Wilderness Watershed Report has been completed by a Society of Wilderness Stewardship Fellow including the Breadloaf, Bristol Cliffs and Joseph Battell Wilderness.

Bristol / Brandon / Ripton: Our Air Quality Specialist, completed the Critical Load Document to accompany the 2020 Wilderness Air Quality Value Monitoring Plan for the Breadloaf, Bristol Cliffs and Joseph Battell Wilderness.

Dorset / Mount Tabor / Peru: Visitor encounter monitoring was conducted along the Appalachian Trail / Long Trail and side trails in the Big Branch Wilderness. User developed campsites were monitored and recorded for the Big Branch Wilderness. Wilderness Rangers conduct campsite monitoring every 5 years to track trends with recreation use. An integrative Invasive Species Plan was completed by a Society of Wilderness Stewardship Fellow that applies to the Big Branch Wilderness. Air Quality Value monitoring was conducted on 5 Wildernesses including Big Branch, George D. Aiken, Glastenbury, Lye Brook, and Peru Peak through water sampling and analysis. Our Forest Service Air Quality Specialist completed the 2020 Wilderness Air Quality Value Monitoring Plan and Critical Load Document for these 5 Wildernesses.

Mount Tabor / Peru: Visitor encounter monitoring was conducted along the Appalachian Trail / Long Trail and side trails in the Peru Peak Wilderness. User developed campsites were monitored and recorded for the Peru Peak Wilderness. Wilderness Rangers conduct campsite monitoring every 5 years to track trends with recreation use. Social / User developed trails were recorded on surveys in the Peru Peak Wilderness. A Wilderness Watershed Report was completed by a Society of Wilderness Stewardship Fellow for the Peru Peak Wilderness. Air Quality Value monitoring was conducted on 5 Wildernesses including Big Branch, George D. Aiken, Glastenbury, Lye Brook, and Peru Peak through water sampling and analysis. Our Forest Service Air Quality Specialist completed the 2020 Wilderness Air Quality Value Monitoring Plan and Critical Load Document for these 5 Wildernesses. A monitoring baseline has been established for a priority sensitive receptor in the Glastenbury, Lye Brook, and Peru Peak Wilderness.



Manchester / Stratton / Sunderland / Winhall: Visitor encounter monitoring was conducted along the Appalachian Trail / Long Trail and side trails in the Lye Brook Wilderness. An integrative Invasive Species Plan was completed by a Society of Wilderness Stewardship Fellow that applies to the Lye Brook Wilderness. Air Quality Value monitoring was conducted on 5 Wildernesses including Big Branch, George D. Aiken, Glastenbury, Lye Brook, and Peru Peak through water sampling and analysis. Our Forest Service Air Quality Specialist completed the 2020 Wilderness Air Quality Value Monitoring Plan and Critical Load Document for these 5 Wildernesses. A monitoring baseline has been established for a priority sensitive receptor in the Glastenbury, Lye Brook, and Peru Peak Wilderness.

Bennington / Glastenbury / Shaftsbury / Woodford: Visitor encounter monitoring was conducted along the Appalachian Trail / Long Trail and side trails in the Glastenbury Wilderness. Social / User developed trails were recorded on surveys in the Glastenbury Wilderness. While conducting the Social / User developed trail surveys a significant amount of unauthorized ATV use was noted in the Glastenbury Wilderness. Air Quality Value monitoring was conducted on 5 Wildernesses including Big Branch, George D. Aiken, Glastenbury, Lye Brook, and Peru Peak through water sampling and analysis. Our Forest Service Air Quality Specialist completed the 2020 Wilderness Air Quality Value Monitoring Plan and Critical Load Document for these 5 Wildernesses. A monitoring baseline has been established for a priority sensitive receptor in the Glastenbury, Lye Brook, and Peru Peak Wilderness.

Woodford: A Wilderness Watershed Report was completed by a Society of Wilderness Stewardship Fellow for the George D. Aiken Wilderness. Air Quality Value monitoring was conducted on 5 Wildernesses including Big Branch, George D. Aiken, Glastenbury, Lye Brook, and Peru Peak through water sampling and analysis. Our Forest Service Air Quality Specialist completed the 2020 Wilderness Air Quality Value Monitoring Plan and Critical Load Document for these 5 Wildernesses.

Special Uses

The GMNF administered 108 Land Special Use Permits to standard along with 8 proposals and applications processed to a decision. 28 Recreation Special Use Permits were administered to standard, with 8 proposals and applications being processed to a decision. 11 Recreation Special Use Permits were placed in a Non-Use status due to COVID-19.

Botany Program

Botanical inventory for rare plants and non-native invasive plants was completed as part of the following projects:

- Telephone Gap Integrated Resource Project: 6,456 acres in the towns of Chittenden, Goshen, Killington, Mendon, and Pittsfield. Additionally, the public was invited to join a virtual BioBlitz, hosted via iNaturalist. As of December 8, 2020, 356 plant species had been reported, not including all the rare species mentioned below.
- Early Successional Habitat Creation project: 363 acres as part of South Fork proposed timber sale in Sunderland and Glastenbury, and 820 acres as part of West River proposed timber sale in Mount Holly and Weston.
- Sites for the new Supervisor's Office in Mendon, and two small projects in Weston and Woodford.
- Maintained wildlife openings: 76 acres in towns of Granville, Rochester, and Warren on the North Half of the Forest, and 70 acres in the town of Mount Tabor on the South Half of the Forest.

As a result of inventory in the Telephone Gap IRP area, 30+ new populations of rare plants that are Regional Forester Sensitive Species (RFSS) were found in Chittenden, Goshen, and Mendon of the following species: eastern dwarf mistletoe (*Arceuthobium pusillum*), hairy woodmint (*Blephilia hirsuta*), large toothwort (*Cardamine maxima*), northeastern sedge (*Carex cryptolepis*), Michaux sedge (*Carex michauxiana*), Schweinitz’s sedge (*Carex schweinitzii*), purple clematis (*Clematis occidentalis*), Steller’s cliffbrake (*Cryptogramma stelleri*), showy lady’s-slipper (*Cypripedium reginae*), matted spikerush (*Eleocharis intermedia*), ovate spikerush (*Eleocharis ovata*), marsh willow-herb (*Epilobium palustre*), rough cotton-grass (*Eriophorum tenellum*), boreal bedstraw (*Galium kamtschaticum*), ginseng (*Panax quinquefolius*), Huron orchid (*Platanthera huronensis*), Pennsylvania buttercup (*Ranunculus pennsylvanicus*), hoary willow (*Salix candida*), bog chickweed (*Stellaria alsine*), crooked-stem aster (*Symphyotrichum prenanthoides*). An additional ten plant species that are tracked by the state, but not RFSS, were found.



As a result of inventories in the West River sale areas within the Early Successional Habitat project area, new populations of ginseng (*Panax quinquefolius*) and leathery grapefern (*Botrychium multifidum*) were found in Mount Holly.

Large roundleaf orchid was fenced to protect it from deer browse in nearby habitat that will be harvested to create early successional habitat in Mount Tabor and Wallingford. A group of 8 volunteers also found 3 new subpopulations and monitored 11 known populations of Appalachian Jacob’s ladder (*Polemonium vanbruntiae*) in Ripton and Lincoln, including some populations just off National Forest lands. As a result of this monitoring, staff and state partners have a better understanding of habitat and distribution of this state-listed species.

In support of the Upper White River Cooperative Weed Management Association (UWR CWMA), of which the GMNF is a founding member, staff and the CWMA coordinator controlled the following non-native invasive plant infestations:

- Granville: 40.9 acres of wild chervil on FR 55, 101, and 207.
- Rochester: 2.3 acres of garlic mustard on Bethel Mountain Road and Pine Lane, 0.7 acres of purple loosestrife near Mount Horrid; 25.7 acres wild chervil at the Rochester Ranger Station and on or near Chittenden Brook Road, some of which extends into Chittenden.
- Pittsfield: 1.7 acres of wild chervil on the Spikehorn Trail and 0.3 acres within five small infestations of wild chervil in Mayo Meadow, a short distance outside of the CWMA boundary.

- In June, provided wild chervil management direction to residents and businesses in Rochester, Hancock, and Granville via Front Porch Forum.

In addition to infestations controlled within the Upper White River Cooperative Weed Management Association boundary, many other small infestations were controlled by staff, contractors, volunteers, and partner organizations, including Green Mountain Club and Appalachian Trail Conservancy. While these infestations represent only a fraction of known infestations and many more are unmapped, they were chosen because they are in strategic locations or because they are relatively more feasible to control than others. A total of over 114 acres of the following species were controlled in these towns:

- Bridgewater: 3.9 acres of woody invasive species at Woodward maintained opening.
- Goshen: 0.6 acres of wild chervil and garlic mustard at the Brandon Gap parking lot along State Route 73.
- Manchester: 2.4 acres multiflora rose, Morrow honeysuckle, and common buckthorn of Richville Road riparian area, and 0.1 acres of wild chervil and garlic mustard at the District Office.
- Mendon: 0.7 acres of common reed, Japanese knotweed, and Morrow honeysuckle at the new Supervisor's Office site.
- Mount Tabor: 1.7 acres of common buckthorn, Morrow honeysuckle, multiflora rose, and wild parsnip were controlled in the Old Job sale area.
- Pomfret: In maintained openings along the Appalachian Trail, 2.9 acres of woody invasive plants at Dupuis Hill, 0.3 acres of goutweed at Dana Hill, 4.5 acres of Morrow honeysuckle, and 3.1 acres of spotted knapweed at Arms Hill.
- Readsboro: Less than 0.1 acres of five tiny infestations of common reed at the Deerfield Wind site, and an additional 0.8 acres of purple loosestrife at Dutch Hill.
- Ripton: 2.4 acres of wild chervil along FR54, 1.2 acres along FR59, 0.03 acres on the Robert Frost Trail, and 6.1 acres on FR67, stretching across Ripton, Goshen, and Hancock.
- Salisbury and Leicester: 2.5 acres of wild chervil along the FR27, road to Silver Lake.
- Shrewsbury: 1.8 of multiflora rose in a maintained opening along the Appalachian Trail.
- Wallingford: 1.6 acres consisting of 13 small infestations of Japanese knotweed, oriental bittersweet, Morrow honeysuckle, wild parsnip, multiflora rose, and bishop's goutweed in the Bully Brook sale area.

As a result of a grant received by the Batten Kill Cooperative Invasive Species Management Association (CISMA), of which GMNF is a founding member, a coordinator was again hired through the AmeriCorps to plan and implement a variety of inventory, control and outreach / education events in 2020, but ended work at mid-year because of the COVID-19 pandemic. The steering committee

provided one virtual education and outreach event. The CISMA incorporates parts of Rupert, Sandgate, Arlington, Shaftsbury, Dorset, Manchester, Sunderland, Glastenbury, Peru, Stratton, and Winhall.

Forest Vegetation Management

Below is a list of accomplishments for calendar year 2020.

- Timber sales were sold in Mount Tabor, Readsboro and, Rochester, and Wallingford totaling approximately 10.4 million board feet of sawtimber and pulpwood.
 - Timber sales were prepared in Chittenden, Hancock, Mount Holly, Pittsfield, Peru, Pownal, Stamford, Sunderland, Rochester, Weston and Winhall. These sales are associated with the Early Successional Habitat Project, the South of Route 9 Integrated Resource Project, and the Robinson Integrated Resource Project.
 - The Forest awarded contracts to remove damaged or diseased trees to prepare sites for reforestation on 251 acres in the Towns of Chittenden, Dorset, Hancock, Peru, and Rochester.
 - The Forest awarded contracts for timber stand improvement and crop tree release work on 15 acres of young forest in the Town of Peru.
 - The Forest planted over 9,000 oak, spruce and pine seedlings on 63 acres in Pownal and Granville.
 - Our staff cooperated with the Vermont Department of Forests, Parks, and Recreation and Middlebury College in the maintenance of Butternut Seed Orchards in Brandon and Middlebury. Seedlings were cultured from disease resistant trees found on state, private, and National Forest locations and were cross pollinated to further research and efforts to develop disease resistance.
 - In cooperation with the state of Vermont, Emerald Ash Borer monitoring has discovered a new infestation in the township of Stamford. Additional trap trees have now been established across The Forest to detect new infestations adjacent to existing areas.
 - The Forest provided maple tapping opportunities to six permit and contract holders for almost 9,000 taps in the towns of Lincoln, Stockbridge, Pomfret, Wilmington and Mount Tabor.
 - Staff sold one timber sale and prepared two additional sales as part of the Robinson Integrated Resource Project. This project includes restoration activities and timber harvest on nearly 10,000 acres in Rochester, Hancock, Goshen, Pittsfield and Chittenden.
 - Staff sold one timber sale and worked on preparation of three additional sales for the Early Successional Habitat Creation Project. This project includes habitat creation and timber harvest on approximately 1,000 acres per year over the course of 15 years for an estimated 15,000 acres in total across Arlington, Dover, Glastenbury, Jamaica, Landgrove, Manchester, Mount Holly, Mount Tabor, Peru, Pownal, Readsboro, Searsburg, Shaftsbury, Stamford, Stratton, Sunderland, Wallingford, Wardsboro, Weston, Wilmington, and Woodford.
 - Staff developed proposed vegetation management activities for the Somerset Integrated Resource Project in Dover, Glastenbury, Stratton, Somerset, Searsburg, Wilmington, and Woodford.
- Town Report from the Green Mountain National Forest**

- Staff collected forest inventory data and conducted landscape assessment in support of vegetation management for the Telephone Gap project in Chittenden and Pittsfield.
- Permits were sold for approximately 67 cords of firewood, 750 (estimated) Christmas trees, and 840 pounds of wild apples. Additionally, over 200 cords of firewood were made available through free use permits as part of COVID-19 pandemic relief.
- Staff continued work in restoring native trees (including butternut, American chestnut and beech) with research partners. GMNF employees located “challenged” beech trees that appeared to be resistant to beech scale insect in order to test their resistance.

Environmental Planning

In calendar year 2020, Forest staff completed 28 site-specific National Environmental Policy Act (NEPA) decision and analysis documents for multiple resource projects designed to implement the Green Mountain National Forest Land and Resource Management Plan (Forest Plan). A major highlight to note includes the final decision for the Somerset Integrated Resource Project located on the Manchester Ranger District primarily in the towns of Dover, Glastenbury, Stratton, Somerset, Searsburg, Wilmington, and Woodford. This project was formally initiated in early 2018 and the decision reflects collaborative efforts with towns, agencies, organizations and individuals. The approved alternative to implement includes management activities to improve wildlife and fish habitat, restore soil and water conditions, increase recreation and scenery viewing opportunities, and improve the trail and road network. The project also includes the harvesting of timber to provide wood products to the local and regional economy, enhance forest health and diversity, and create more diverse plant and wildlife habitat.

Other highlights include:

- Goshen Blueberry Opening Management project located in the town of Goshen designed to restore overgrown areas that were once productive low-bush blueberry forage that will improve wildlife habitat and increase recreation opportunities.
- Mount Snow Sunbrook Area Trail Widening project located in the town of West Dover designed to provide an alternative top to bottom beginner level alpine ski opportunities at Mount Snow Ski Resort by widening sections of existing trails.
- Weston CCC Trail project located in the town of Weston designed to provide a short easily accessible multi-use non-motorized trail opportunity to enhance the recreation opportunities in the area.
- Frost Wayside Connector and Accessibility Trail Upgrade project located in the town of Ripton designed to address user safety and universal accessibility, streambank erosion and sedimentation, and respond to public feedback to provide recreation opportunities with the improvement of existing trails, and establishment of a connector trail between the existing Robert Frost wayside and interpretive trail/trailhead sites.

- Forest Road 30 -- Opening Reclamation project located in the town of Mount Tabor designed to restore an existing permanent upland opening where large trees have encroached and diminished the early successional habitat provided by this area.
- Forest-wide Trail Decommissions and Trail Additions project located in multiple towns across the Forest designed primarily to decommission and remove various multi-use trails from the National Forest Trails system that are not environmentally, socially, and / or financially sustainable.
- White Pine, Oak and Hickory Timber Stand Improvement project located in the towns of Leicester, Ripton, Peru and Winhall designed to improve the growth and health of selected white pine, oak, and hickory trees by non-commercially cutting competing vegetation.
- Multiple special use permits issued for use of National Forest System lands such as utility right of way, private land access, and various recreation events and outfitter guide operations across the Forest.

Fisheries Improvement

Forest staff monitored fish populations throughout the GMNF in 2020. This monitoring is part of a long-term data collection effort to understand fish populations on the forest. Additional sites were sampled to support the Vermont Department of Environmental Conservation. Streams in the following towns were sampled during 2020 field season: Rochester, Lincoln, Chittenden, Pittsfield, Pittsford, Hancock, Ripton, Granville, Warren, Landgrove, Weston, and Peru.



The Forest Service and partners completed one Aquatic Organism Passage (AOP) project in 2020. The project was completed in Brandon on Churchill Road. This project restored connectivity to important trout habitat and provides infrastructure resilience to flooding. Project partners included the town of Brandon, and the state of Vermont.

The GMNF, in cooperation with Vermont Department of Fish and Wildlife, continued the aerial stocking of native brook trout to high elevation ponds at Griffith Lake and Big Mud Pond in Danby, Stratton Pond in Stratton, Little Rock Pond in Wallingford, and Branch, Bourn and Beebe Ponds in Sunderland. Stocking these high elevation ponds supports a native brook trout fishery.

Riparian planting occurred at multiple sites within the White River watershed to help restore aquatic habitat. The GMNF assisted the White River Partnership, and the Vermont Youth Conservation Corp, at sites in Granville and Hancock.

Stream restoration by reintroducing large wood material occurred as part of a partnership with Trout Unlimited, enhancing aquatic habitat along 4.0 miles of forested streams. Adding large wood material

improves habitat conditions for aquatic organisms and restores stream processes. These activities took place on Corporation and Tunnel Brooks in Rochester and Hancock.

Wildlife Habitat Improvement and Monitoring

Wildlife habitat was improved and maintained through the creation and maintenance of early successional habitat. Approximately 200 acres of permanent upland openings were maintained by mowing, or mastication in the towns of East Dorset, Goshen, Granville, Hancock, Hartford, Lincoln, Manchester, Mount Holly, Mount Tabor, Pittsfield, Pomfret, Ripton, Rochester, Warren, Stockbridge, Salisbury, Readsboro, Weston, Stratton, Woodford, and Winhall. Approximately 70 acres of permanent upland openings were reestablished or created for blueberry management in Goshen, and permanent upland openings in Manchester and East Dorset. In addition, apple trees, which provide high-value wildlife food, were “released” by cutting competing vegetation in old orchards in Rochester, Dorset, Pittsfield, Mount Holly, Mount Tabor, Peru, Somerset, Stratton, Weston, Wallingford and Stamford.

Wildlife biologists and technicians continued work with the Vermont Department of Fish and Wildlife to monitor the populations and habitat requirements of bats since the advent of white-nose syndrome. Potential timber sale units within the boundaries of the Somerset and Telephone Gap Integrated Resource Projects (towns of Somerset, Stratton, Mendon, and Chittenden) and the Early Successional Habitat Creation Project (towns of Sunderland, Glastenbury, Mount Holly, and Weston) were monitored to determine the species composition of the bats on the landscape. Additional bat monitoring was conducted at Prospect Mountain Nordic Ski Center in Woodford to accommodate a trail re-route to protect vernal pools.

Peregrine falcon nest sites on the GMNF in Rochester, Salisbury, Stockbridge, and Wallingford continue to be monitored, and closures to protect sensitive nesting habitat continue seasonally from March 15th to August 1st each year at all sites except Wallingford. The peregrine falcon was removed from the federal list of endangered and threatened species in 1999 and the Vermont State list of endangered species in the spring of 2005; however, the species remains on the Regional Forester Sensitive Species list.

In a partnership with Forest Service State & Private Forestry, pollinator habitat was assessed on forest roads in Danby and Mount Tabor. Our objective was to understand the distribution of milkweed along Forest roads and to develop management strategies allowing milkweed populations to persist while maintaining roadside brushing.

GMNF staff continued to work closely with the Vermont Department of Fish and Wildlife on a black bear study in the vicinity of the Deerfield Wind Turbine Project site. The goal of this long-term effort is to determine how the project may impact black bears and their use of the habitat surrounding the project site. Bears were captured, radio-collared, and tracked in the towns of Readsboro, Stamford, and Woodford.

Along with the Vermont Department of Fish and Wildlife and Central Connecticut State University, the GMNF staff assisted in deploying camera traps at several sites within the Manchester Ranger District to determine the presence and habitat utilization of the American marten, which was reintroduced to the Forest in the early 1990s after it was believed extirpated. Camera traps were used within the towns of Arlington, Bennington, Dorset, Glastenbury, Manchester, Mount Tabor, Readsboro, Somerset, Stratton, Sunderland, Weston, Winhall, and Woodford. This is an ongoing study on the Forest.

Soil / Water Monitoring

Best Management Practice (BMP's) monitoring took place throughout the Forest in 2020. The National BMP Program integrates water resources protection into management activities across the landscape. The program is intended to demonstrate compliance with the Clean Water Act, which is required by the Environmental Protection Agency (EPA) and administered by the states, through rules and regulations, including Vermont's Acceptable Management Practices (AMPs) for logging jobs, and Vermont water quality standards. Forest Soil Disturbance Monitoring was conducted on 40 timber sale units throughout the Forest to estimate forest management effects on soil and water resources.

Research Activities

The following research was approved and conducted on the GMNF during 2020:

- Lauren Ash, Graduate Student at the University of Vermont continued a survey for the presence of Ranaviruses and other amphibian disease in green frogs (*Lithobates clamitans*), wood frogs (*Lithobates sylvaticus*), spring peepers (*Pseudacris crucifer*), spotted salamanders (*Ambystoma maculatum*), and Eastern newts (*Notophthalmus viridescens*), in the vicinity of Abbey Pond in the towns of Bristol and Ripton.
- Dr. Paul Hapeman, Assistant Professor of Biology at Central Connecticut State University continued a research project studying the extent of occurrence of American marten (*Martes americana*) in southern Vermont and northwestern Massachusetts and key habitat features associated with their presence. Work on GMNF included the towns of Sunderland, Stratton, Glastonbury, and Somerset.
- Matthew Hecking from SUNY College of Environmental Science and Forestry and Jordon Tourville from the University of Michigan completed understory vegetation surveys along pre-established sites within the GMNF in the towns of Lincoln, Mendon, and Shrewsbury. Their data collection also involved establishing temperature monitoring sensors, seedling collection, soil core collection, and canopy foliage sampling.
- Spencer Hardy, Vermont Center for Ecostudies, conducted sampling of bees for habitat use and diversity monitoring in Pownal as part of the state-wide Vermont Wild Bee Survey effort.
- The ongoing year-long virtual Telephone Gap BioBlitz was initiated to document biodiversity in an area including portions of the towns of Chittenden, Goshen, Pittsfield, Killington, Mendon, Pittsford, and Brandon using the iNaturalist platform (iNaturalist.org). To date, citizen scientists have collectively complied documentation of more than 700 species in this interesting and diverse area. The virtual BioBlitz will continue through May 2021.

Public Outreach / Conservation Education

Employees of the GMNF typically spend a significant amount of time each year at the Forestry building at both the Addison County Fair in Addison and the Rutland State Fair in Rutland. These events were not held in 2020 so we were unable to answer questions about the 400,000-acre National Forest by the thousands of people that we typically interact with. We hope that these events and the several parades that we participate in will be held in 2021 as they are a wonderful venue to discuss GMNF related issues with our partners and gather information from the public.

When the COVID-19 pandemic disrupted plans for an in-person event, the Forest Service worked with partners to find a new way to bring forest-themed fun to kids at Boston Children’s Hospital in 2020. On June 10, the GMNF and our Urban Connections program teamed up with Seacrest Studios at Boston Children’s to host “nature” bingo. Kids played along remotely from their hospital rooms in Boston while our staff led the virtual event from an employee’s home in Vermont. Forest Service employees provided clues for things you might find in the forest, and players marked them on their bingo cards. Winners were treated to their choice of Smokey Bear items. The special event was made possible by Seacrest Studios, which broadcasts a weekly bingo game at Boston Children’s. The virtual bingo event was one more example of a growing partnership with Boston Children’s. Last year, the Forest Service delivered a successful Skins and Skulls session at the hospital, where children could participate in learning about animals. The event was televised internally by Seacrest Studios for those who couldn’t attend in person.



Again in 2020 the GMNF partnered with Shelburne Farms to support the Forest for Every Classroom (FFEC) program which works to educate New England-based teachers about forest stewardship issues, provide tools to develop place-based service-learning curricula that meet current educational standards, and use local landscapes, resources and community to connect classroom learning to real world application. Over the course of the year a cohort of 17 FFEC educators from across New England convened to take took a deep look at the fundamentals of place-based learning and climate change as they relate to our forests. Explorations focused on sustainability principles, especially “the ability to make a difference” using our northern forest communities to learn about citizen science opportunities for students. A comprehensive overview of this work was created. A culminating session planned for April 2nd and April 4th at Shelburne Farms was modified to an online platform where teams shared activities and lessons learned throughout the year. In addition, 40 Climate Resiliency fellows from throughout the Northern Forest region of New England gathered virtually in early April to conclude the year-long programmatic journey toward resiliency in their climate change education curriculum and action plans. Fellows shared reflections on the program and their experience, and celebrated accomplishments in and outside of the classroom.

Another critical program that we are proud to support is the Vermont Envirothon. The Vermont Envirothon helps students focus on Vermont’s environmental issues related to forestry, wildlife, soils and water resources through real-world learning in a teamwork environment. We would like to thank the Vermont Association of Conservation Districts for coordinating this important program and the many agencies and natural resource and conservation partner organizations that work hard to make the Vermont Envirothon possible each year. The program provides an opportunity for hands-on field experiences and activities with professionals in the field and serves as a way for high school-aged



students to actively learn more about the natural world around them while they work together. Students learn to incorporate science-based investigations in helping to explore environmental issues. The Vermont Envirothon originally planned for May 19, 2020 was cancelled after Vermont schools were permanently closed for the 2019-2020 school year due to the COVID-19 pandemic. The NCF-Envirothon International event, planned for July 2020, was also cancelled. While this outcome was of course disappointing, we are optimistic that the program will continue to move forward when in-person events are again able to be held. The Vermont Envirothon Steering Committee has begun looking into ways to adapt both trainings and tests to an online format. While an in-person event is preferable, we want to ensure that this valuable program continues to be available for our students in future years.

Again, thank you for your support of your National Forest. Together, we will continue to maintain and improve this valuable treasure for generations to come. Our offices are open Monday through Friday from 8:00 AM until 4:30 PM. Throughout the COVID-19 pandemic, we ask that people call ahead of time (see office phone numbers below) to make an appointment for in-person services. You can also visit us and learn more about the GMNF at our website online: <https://www.fs.usda.gov/gmfl>. Like us on Facebook: <https://www.facebook.com/GreenMountainFingerLakesNF/> and follow us on Twitter: https://twitter.com/gmfl_nfs

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