
STATE OF VERMONT
AGENCY OF NATURAL RESOURCES

VERMONT DEPARTMENT OF FORESTS, PARKS & RECREATION

**Vermont Wildland Fire Program Annual Report
Calendar Year 2017**

Prepared by:
Tess Greaves
December, 2017

Data Collected by:
Vermont Department of Forests, Parks & Recreation
Forestry Division
Forest Resource Protection Section

NARRATIVE

The State of Vermont Department of Forests, Parks & Recreation received **51** fire reports totaling **49** acres for the 2017 fire season. These low numbers were well below normal and the lowest since 2011. The 5-year average from 2012 to 2016 is **109** fires, **317** acres. Debris burning was the most common cause.

From December 2016 through February 2017, temperatures were 3° to 7° above normal. A series of snow storms through mid-February blanketed the state in snow with amounts ranging from 12 to 50 inches in the mid and upper elevations and a trace to 8 inches in the Champlain valley. The snowpack took a hit, however, from February 23-26, when record breaking high temperatures were recorded. Temperatures reached the upper 50's, the low, mid and upper 60's and even 72° in Burlington. No snow remained in the Champlain valley east to the base of the Green Mountains and a trace to 16 inches remained across the rest of the state except for the highest elevations and Essex county.

The snow and cold arrived in March. By March 4, temps plunged into the single digits and low teens breaking lowest maximum high temperature records across the state. The cold continued through much of the month averaging 4 to 8 degrees below normal. Along with the cold, came snow. March averaged above normal snowfall statewide with the most snow falling in the northern part of the state. A single 2-day storm on March 14-15 brought snow, wind and headaches from Virginia to Maine. Between 1 and 3 feet of snow fell across the state. Schools, businesses and state offices closed, and flights were cancelled across the country. Blowing and drifting snow made road clearing difficult. The storm ranked number 2 for Burlington's all time snowiest storms with 30.4 inches.

Snow melted rapidly during a warm and dry period the week of April 9. By April 15, only small patches of snow remained on north facing, shaded and wooded areas of the northeast and in high elevations. This dry period was enough to elevate fire danger. From April 9 to 15, thirteen fires were reported with 8 reported on April 15. This was the most active period for fires all year. The largest fire of the year occurred on April 27 when 6 acres in Pittsford burned from improper disposal of ashes.

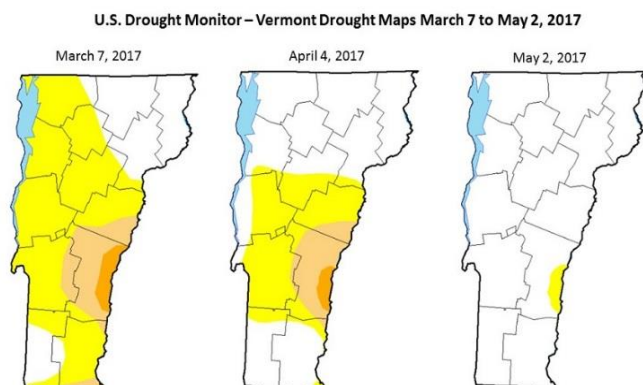


Figure 1. Source: [U.S. Drought Monitor](#)

May averaged cooler and wetter than normal. The 2016 drought hung on in parts of Vermont despite a snowy winter and damp April. The last abnormally dry area along the Connecticut River Valley in Windsor county finally received enough rain to take it out of drought on May 2 (Figure 1).

The rest of the month was chilly and gloomy with frequent light rain amounting to less than a tenth of an inch on most rainy days.

Meteorological summer... June, July and August, was cooler and wetter than normal as well.

Rainfall, however was below normal from mid-July through August but like May, frequent cloudy and rainy days with hit or miss storms were common. During these months, only 8 fires were reported.

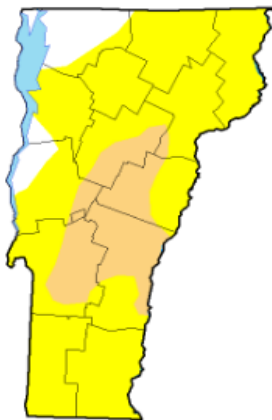
September started off with temps below normal early in the month with some localized frosts in the colder pockets of the northeast and sheltered valleys. Fall color brightened under sunny skies and shorter days and then the pattern reversed. A huge ridge of high pressure, a northward bulge in the jet stream, stalled in place due to lack of strong winds. Tropical warm air moved north. Temperatures soared and records were shattered. Summer had finally arrived.

Well above normal temperatures were recorded statewide from mid-September through the end of the month. Heat waves were recorded in multiple locations across the state including the Essex, Danby and Nulhegan fire weather stations. September was drier than normal after a widespread rainfall on September 3 and scattered storms on September 5. By September 28, the U.S. Drought Monitor listed most of Rutland county into Windsor county as abnormally dry.

Burlington recorded a streak of 20 dry days. This tied the 7th longest stretch of dry weather on record dating back to January 1884. The streak ended on September 30 with .01 inch of rain. The same weather system brought light rain to parts of the state. The highest amounts were just over .3 inches. A trace of snow was recorded on the top of Mt. Mansfield.

With the onset of the hot and dry weather pattern, fall color change stalled. Except for an occasional pop of bright color here and there, green persisted into October. A short return to cooler, damper weather sparked the color change just in time for Columbus Day weekend.

**U.S. Drought Monitor
October 24, 2017**



The warm, dry weather pattern returned and by October 24, moderate drought was in place for part of the state and most of the rest was abnormally dry. Along with the dry conditions, newly fallen leaves and an abundance of cured vegetation brought an elevated risk for wildfires. Fire danger climbed to high from October 20-23, but only 3 small fires were reported. A total of 10 fires were reported from September to November. The last fire of the year was on November 5 in Enosburgh.

Heavy rains at the end of October brought most of the state out of pre-drought (abnormally dry) conditions and ended fire season. The moderate drought in parts of Rutland, Windsor, Orange and Washington counties improved as well, but persisted as abnormally dry through November.

Figure 2. State of drought in Vermont as of October 24, 2017.

WILDLAND FIRE RESPONSE

Most requests for State Forestry assistance were dispatched through Vermont Emergency Management (VEM) to the FPR North/South Fire Response Coordinators (FRC). Fire Response Coordinators and other staff responded to these requests in 2017:

May 17 in Hartford: fire cause – power line came down starting fires in 2 separate locations; 4 acres. GPS the fire perimeter.

May 18, 19, 22, 24, 31 in Pawlet: fire cause – lightning; 1/2 acre. FPR recon. Lightning hit the base of a white pine buried in logging debris below ground level at an old log landing. Ground fuels on the landing were several feet deep from many years of buildup. Thirty-foot flames were observed on arrival. Several thousand gallons of water were sprayed with little effect. Command decided to monitor the fire over several days since no resources were at risk. The fire smoldered for over a month and consumed a tremendous amount of ground fuel.

August 4 in Bristol: *Hogback Mountain fire*; fire cause – lightning; 4 acres. Bristol firefighters were dispatched and reported to the fire station for assignment. A crew of experienced firefighters started the 2 ½ mile ascent up Hogback Mountain to investigate. Darkness began to set in before the crew could reach the fire and were ordered off the mountain for safety purposes.

Bristol firefighters and requested mutual aid departments assembled at the fire station at 0600 on August 5. Crews climbed Hogback Mountain to the fire to begin suppression operations. At approximately 1300 personnel from FPR arrived on scene to assist with suppression operations and provide technical expertise. At approximately 1500 hours on 8/5/17, the fire was declared under control. Crews reported back to staging at approximately 1630 hours. On Sunday, August 6, 2017 crews reassembled at the fire station at 1200 to ascend Hogback Mountain to extinguish remaining hot spots and firm up fire line. Fire was declared extinguished 8/6/17 at 1625. The Bristol Fire Department is to be commended for their use of ICS. This incident was efficient, organized and well documented.

September 23 in Wallingford: fire cause – campfire started by juveniles escaped control; 1/2 acre. FPR recon. The surface fire burned on top of very shallow soils with small pockets of smoldering ground fuels. Access to fire scene was by foot or ATV. After the fire was extinguished, Wallingford Fire Chief, Fire Warden and Lund talked with juvenile who started the fire with mother present. The other juvenile's parents were also present.

REPORTING

The 2017 wildland fire reports were uploaded into the National Association of State Foresters (NASF) fire occurrence database.

In 2016, an addition to [§2642 Salary and compensation of town forest fire wardens](#) was added to the revised fire laws. In 2017, town forest fire wardens were paid \$10 for each fire report submitted to FPR within 2 weeks of the fire's extinguishment. The online fire reporting system helped to track and date when these reports were received. All card reports received in the district offices were entered into the online system as well. Each year more wardens use the online system and most reports are submitted shortly after the fire. This helps to keep abreast of the current status of fire season.

FPR also utilized Northeast Fire Alerts via Twitter as a source for daily fire activity. All reports received via Northeast Fire Alerts were verified by FPR staff and fire wardens.

WILDFIRE EQUIPMENT

FPR has offered the “Wildland Fire Protective Gear & Equipment” grants since 2005. The FPR district office in Essex mails the grant announcement, instructions and list of products to volunteer fire chiefs and town forest fire wardens statewide in December. The order is placed early in the year and received in time for spring fire season.

In 2017, the Essex district office fire staff processed **\$51,393.61** of wildland fire protective gear and equipment orders for **40** Vermont towns. These orders were part of the FY2017 50/50 grant program funded by federal Volunteer Fire Assistance (VFA) funds. The Essex district office also ordered and processed an additional **\$3,017.19** of wildland fire protective gear and equipment for **4** town VFD’s and **\$8,907.47** for the Department of FPR.

The Forestry Response Vehicles (FRVs) were used extensively through fire season in response to wildland fires and training. The 4 wildland fire trailers housed in Essex, St. Johnsbury, Rutland and Springfield were used as well. In 2017, in addition to the wildland fire response above, these resources were used 26 times during the spring and fall as follows (*note: border towns often included neighboring state/provincial firefighters in the training*):

2017 Vermont Department of Forests, Parks & Recreation Forestry Response Vehicles & Wildland Fire Trailers Use			
Wildland Fire Control (9-hour Course)	Wildland Fire Refresher	Wildland Fire for Grade School Kids	Other Events
Newport Milton Hyde Park Hartford Lyndonville Glover Randolph Waterbury Manchester Middlebury Pittsford	Fairfax Richmond Enosburgh Rutland Thetford Grafton Peru	Killington Pawlet Middlebury Manchester Westminster	Vermont Emergency Preparedness Conference – Fairlee Compact Engine Call- Up – Groton Fire Warden Memorial – Richford

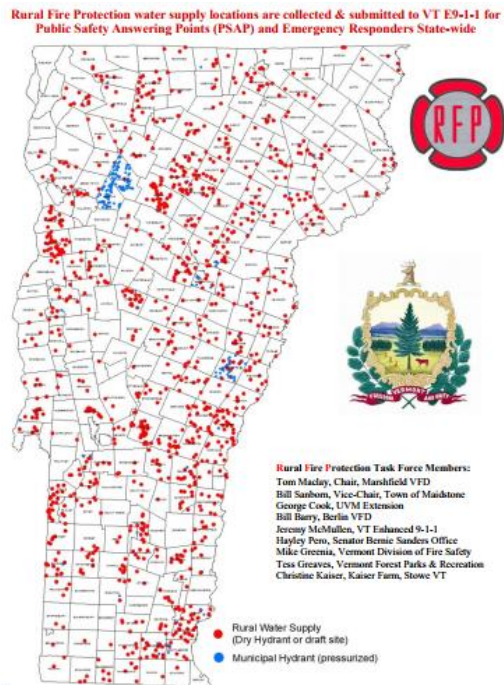
Each spring one of the 5 forestry districts hosts the annual fire pumps and hose testing day for State fire staff. In 2017, District 5 hosted the pump and hose day at Boulder Beach State Park on May 10, 2017. All the fire pumps and hose from the host district were pressure tested. This year company representatives from Mercedes Textiles (manufacturer of the Wick pumps) were able to attend to give demonstrations and recommendations on their pumps.

Dan Dillner at the Essex District shop maintained the Forestry Division inventory of fire pumps. The fire trailers and equipment were maintained by each district.

VERMONT RURAL FIRE PROTECTION TASK FORCE (VRFPTF)

The Rural Fire Protection program helps Vermont communities protect lives, property and natural resources by enhancing fire suppression resources. Program Manager and Engineering Technician Troy Dare helps local fire departments identify appropriate sites for dry hydrants and other rural water supply systems, design installations, and find financial support to support the costs of construction.

The dry hydrant program is primarily funded by a state legislative appropriation with a supplemental grant from the Forestry Division through the federal Volunteer Fire Assistance grant. During the **19 years** of the program, **1,054 grants** have been provided to **214 Vermont towns** for installation of new rural fire protection systems, as well as for replacements and repairs. In 2017, RFP increased the maximum grant award amount from \$4,000 to \$5,000 per project. New Rural Fire Protection systems along with repair, replacement, relocation, and upgrades of existing RFP systems are eligible for grant funding on an ongoing basis.



Rural Fire Protection water supply locations are collected & submitted to VT E9-1-1 for Public Safety Answering Points (PSAP) and Emergency Responders Statewide. Both dry hydrants and pressurized municipal hydrants are mapped (Figure 3). This web map is available as an [E9-1-1 Viewer](#) application that can be accessed using a desktop, laptop, tablet or smartphone. Data in this map includes black and white and colored imagery, roads, buildings, landmarks, hydrants, etc. as well as live data links to road conditions and weather. The map is searchable by 911 addresses.

Troy attended the five-annual town forest fire warden trainings in 2017 to increase awareness of the dry hydrant program and progress to date. Every year, Troy says, “this could be the last year of the program,” but in reality, the need for new dry hydrants or replacement and/or maintenance of older installations will continue well into the future.

Figure 3. Rural Fire Protection water supply locations in Vermont.

VERMONT TOWN FOREST FIRE WARDEN SYSTEM & TRAINING

The annual town forest fire warden training sessions were held in 2017:

DATE	LOCATION
March 28, 2017	Chester
March 29, 2017	Manchester
April 4, 2017	Barre
April 5, 2017	Colchester
April 11, 2017	Lyndonville

Jim Esden presented “Wildland Fire Risk Mitigation,” as the main topic of the 2017 training. Also included in the program: an update on the current status of legislative updates to the Vermont fire laws and a review of the 2016 fire season and outlook for Spring 2017 weather and fire season. 53% of the 290 Vermont forest fire wardens and deputies attended the 2017 trainings compared to 64% in 2016.

Vermont Protection staff continued to work effectively with town fire wardens to protect the forest resource. Over 80% of the wardens are members of their town fire department and all are dedicated fire people willing to put in long hours and sometimes deal with difficult situations. Fire wardens are the backbone of the Vermont fire program. The Vermont Forestry Division recognizes and appreciates their service. Each year, one-fifth of the wardens are reappointed. In 2017, 71 wardens and deputies were scheduled for reappointment.

District Forestry Specialists provided assistance to wardens as requested.

Assistance Provided to Wardens in 2017

- Resolved fire warden issues re: unpermitted burns and burning illegal materials, smoke management, circumstances when permits can be denied, site visits, etc.
- Fire warden interviews
- Met with Selectboards/Town Managers to select new wardens, discuss issues with current warden/deputies
- Provided orientation to newly appointed wardens/deputies
- Helped with paperwork – fire reports, fire cost reimbursements, equipment ordering
- Delivered fire equipment
- Provided prevention materials, permit books, information on town fire ordinances, etc.

Town Forest Fire Warden Statute Revision

In 2016, forest fire and Town Forest Fire Warden statutes were updated by Legislature. Some of the changes included:

- Increased pay for fire wardens ([Title 10 VSA §2642](#)) - \$30 annually for fulfilling requirements of section [§2645](#); \$30 per diem for attendance at each required training; \$10 for each fire report submitted under section [§2644](#).
- Town’s liability for suppression of forest fires ([Title 10 VSA §2643](#)) – municipalities will pay the cost to suppress a forest fire that occurs on non-ANR owned land; the State will reimburse a town for suppressing fires on ANR owned land at a rate determined by the Commissioner; eligibility for reimbursement includes receipt of fire report within 14 days of extinguishment as required under section [§2644](#).

To determine the reimbursement rate to towns for fires on ANR owned land, the Legislature through [Act 171](#), required FPR to develop a reimbursement policy. Working with Vermont League of Cities and Town and interested parties (Town Forest Fire Wardens were surveyed for input to the policy), FPR created an acceptable policy to submit to Legislative Committees. The updated statutes went into effect on July 1, 2016 and the reimbursement policy went into effect on January 17, 2017. All updates and the reimbursement policy were included in the 2017 revision of the [Town Forest Fire Wardens Handbook](#).

VERMONT WILDLAND FIRE TRAINING

Vermont Fire Service Training Council:

FPR continued to work with the Council to provide wildland fire training to volunteer fire departments as part of the Vermont Fire Fighter I Certification program. At this time, by agreement with the Training Council, the Forestry Division teaches all wildland fire training given to fire departments in Vermont. This training package, called Wildland Fire Control (the 9-hour course), was given **9** times in 2017 to **191** volunteer firefighters. The Wildland Fire Control course is now offered in the spring and fall.

The Wildland Fire Control course was also given **2** times to an additional **55** students: 1) in a combined class with high school students from Central Vermont Career Center at Spaulding High School in Barre and the fire science class at VTC in Randolph, and 2) the Fire Cadet Academy at the Vermont Fire Academy in Pittsford.

Other Wildfire Related Training:

Forestry staff held **7** refreshers for **138** volunteer firefighters covering wildland firefighting, fundamentals of fire behavior, safety and tactics in wildfire suppression, and fireline construction. Lars Lund and Jim Esden taught S-130/190 to federal firefighters and a segment of the Annual Fireline Safety Refresher (RT-130). Neil Monteith and Lars Lund taught wildland fire prevention and campfire safety classes to **562** elementary students. Dan Dillner gave the Essex High School Physical Science class a tour of the Essex fire weather station and discussed wildland fire. Lars Lund presented on November 7 at the “Science Slam” at National Life in Montpelier. He spoke about two ground fires that occurred in October 2016 and May 2017.

Vermont Emergency Preparedness Conference: On September 15, Lars Lund and Dan Dillner represented FPR at the Vermont Emergency Preparedness Conference at the Lake Morey Inn in Fairlee. Both of Fire Response Vehicles were displayed along with the wildland fire equipment they carry. It was an excellent opportunity to meet with other emergency managers in Vermont and advertise the capabilities of FPR. The keynote speaker was an official from FEMA that gave an informative talk about the challenges they are currently facing in Texas and Florida. The Governor also attended, and gave a speech praising first responders and the state resources that were attending.

Wildfire Related Training Received by Forestry Staff:

Several staff participated in the annual fire refresher (RT-130) and work capacity tests conducted by the Green and White Mountain National Forests and Work Capacity Tests (WCT) conducted by FPR. Staff also received training as follows: Wildfire Suppression Mitigation from NFPA; Fire Instructor Development from Vermont Fire Academy; SEOC (State Emergency Operations Center) Operations from VEM; and RT-GIARR – Geographic Area Interagency Resource Representative Refresher.

COOPERATOR ACTIVITIES

- Federal grant administration – grant narratives, progress and final reports

- March 22, 2017, Rutland: Annual Operating Plan meeting with USFS/GMFL
- March 22, 2017, Rutland: Technical assistance meeting with USFS/GMFL
- Vermont Fire Service Training Council Meetings
- Rural Fire Protection Task Force Meetings
- Fire Season startup meetings with the NWS in Burlington, VT March 21, 2017 and Albany, NY March 8, 2017 (via conference call) and conference calls during spring fire season
- Northeast Forest Fire Supervisors (NFFS) Meeting, June 20 - 22, 2017, Baltimore, MD
- November 1, 2017. Staffed SEOC as SSF 11 for a half-shift for Wind Event response.

NORTHEASTERN FOREST FIRE PROTECTION COMMISSION (NFFPC)

(also called the Northeast Compact)

Committees and Working Teams:

The Vermont Forestry Division participated on committees and working teams during 2017 by attending meetings, conference calls, and projects. Representation was as follows:

Committees:	Commissioners - Steve Sinclair, State Forester Warren Miller, Governor's Representative Charles Shaw, Legislative Representative
Working Teams:	Operations – Lars Lund Training – Lars Lund, Chair until August 2017, replaced by Neil Monteith Fire Science – Tess Greaves Equipment & Technology – Dan Dillner Prevention – Jim Esden Forest Health – Barbara Schultz, Past Chair

Vermont representatives on all Working Teams and the Operations Committee attended meetings on January 24, 2017 and the general session of the NFFPC Winter Awareness Meeting on January 25-26, 2017 in South Portland, Maine. This meeting featured presentations from a wide array of fire professionals on current and relevant topics. All the Working Teams and the Operations Committee held meetings during 2017 either face to face or via conference call.

Being a small state with limited staff, we depend upon the Northeast Compact for training, developing technical expertise, an introduction to new science and technology in a constantly changing environment, and to keep abreast of the current wildfire situation in our region. Our involvement on the various working teams is very beneficial to the state and to volunteer fire departments in Vermont.

Wildland Fire Equipment Call Up:

On June 14 and 15, Vermont hosted the Equipment and Technology Working Team wildland fire equipment call up. Dan Dillner organized the 2-day event held in Groton State Forest. The call up featured 10 Type-6 wildland fire engines from New York, New Hampshire, Maine, Quebec, Connecticut, Rhode Island, Massachusetts, White Mountain National Forest, Acadia National Park, and US Fish and Wildlife. Engines were dispatched using the Northeast Coordination Center. Day one included the team meeting and a welcome to Groton State Forest and Seyon Lodge history by Regional Parks Operations Manager, Nick Caputo and Seyon Manager, Dawn Holtz. In the afternoon the group

had a field trip to the Owl's Head stone fire tower. Day two was the field event, an exercise that tested compatibility of engines and equipment to Compact standards. The event tested border crossing agreements and will provide research and development for engines throughout the Compact area.

The Great Acadia, Fire 70 Years Later Workshop:

Excerpt from the Northeast Compact Prevention Working Team: "1947 has been called the Year Maine Burned. By October, dry weather patterns set the stage for disastrous wildfires across the northeastern U.S. and Canadian Maritimes. On October 17, 1947, a fire started in Bar Harbor, Maine that spread through the town and Acadia National Park. Raging fires burned through forests and towns across Maine and neighboring states and provinces, leaving hundreds of thousands of acres of devastation in their wake."

The Northeast Compact, the first mutual aid of states and provinces in the U.S. and Canada, was initiated in 1947 following the fires. By 1949, it was established to promote effective prevention and control of forest fires in the Northeastern Region of the United States and adjacent areas in Canada.

During the week of October 16 to 20, 2017 several events to commemorate the 1947 fires in Maine were held in Bar Harbor. A panel discussion and field trip sponsored by the North Atlantic Fire Science Exchange and the Northeast Compact were part with these events. Tess Greaves attended these events and shared to following:

The Great Acadia Fire, 70 Years Later: Presentations and a panel discussion

- **What Happened?** Presentation by Dr. Lloyd Irland, Principal, The Irland Group
- **Could it Happen Again?** Presentation by Dr. Bill Patterson III, Professor Emeritus, University of MA-Amherst
- **What if It Happened Again?** Presentation by Tom Parent, Executive Director, Northeast Forest Fire Protection Commission

The presentations were followed by a panel discussion that included the fire chiefs from Bar Harbor, Mt. Desert, Tremont, and Southwest Harbor fire departments, Tony Davis, Fire Management Officer, Acadia National Park and Jeff Currier, Maine Forest Service.

The presentations and discussion examined the climate and forest conditions that were ignited in 1947, the vegetation structure and fire danger in Acadia National Park today, and the agencies and organizations prepared to protect the island from wildfire into the future.

Field Trip: The Great Acadia Fire, 70 Years Later: Lessons and Future Challenges:

The field trip followed the path of the Bar Harbor/Acadia National Park fire that burned 17,183 acres. Information about fire ecology, fuels reduction, and preparedness were discussed.

Sites visited:

- **Lakewood, Acadia National Park, Mt. Desert Island, Maine** – discussion on vegetation that burned and how the composition of the forest surrounding the lake changed after the fire burned through.
- **Dolliver's Dump** – origin of the fire. Viewed from across a vantage point a half a mile away.

- **Mount Desert Island High School** – site where the fire crowned and jumped the main road. Here, notes from an interview with a man who had been a student at the school at the time and who helped fight the fire were read.
- **Eagle Lake** (McFarland Hill plot site – see note below) – site that didn't burn and remains a spruce/fir stand.
- **Cadillac Mountain** – vista from top of mountain. Change in forest composition from spruce/fir to aspen/birch/oak where fire went through are visible today.
- **The Tarn** (plot site) – located on the west side of Route 3 below Dorr Mountain. This site did burn and is now composed of aspen/birch.

Note: Bill Patterson and his students set up sampling plots all over Mt. Desert Island to monitor the effects of the 1947 fire and its aftermath. McFarland Hill and The Tarn are 2 of these sites. They were set up in 1980 and resampled in 1992 and in 2016.

This was an excellent workshop, well thought out, organized and very educational. Congratulations to organizers: Amanda Mahaffey, NAFSE; Tom Parent, Maine Forest Service; Tony Davis and others for putting this together! (For more information: [The Great Acadia Fire 70 Years Later](#))

Eastern Area Training Working Team:

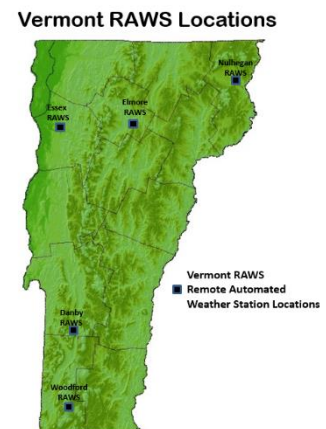
Lars Lund is the Compact representative on the team. This team is responsible for the priority trainee program, updating the training schedule on the website, coordinating higher level trainings between Eastern Area members and reviewing and approving briefing papers. Meetings were held in February in Bloomington, MN and at Baltimore, MD during the Northeast Forest Fire Supervisor meeting in June as well as monthly conference calls. Lars was the Eastern Area priority trainee program coordinator and training needs assessment coordinator for states in the Northeast Compact.

WILDFIRE PREVENTION IN VERMONT

Smokey Bear appeared at **20** events in Vermont in 2017 including parades, fire department events, state park programs, fire prevention programs for grade school kids and fire prevention week celebrations. Many of these gatherings included space where fire department personnel gave out Smokey's prevention literature, Firewise/defensible space literature, etc. Prevention material, especially Smokey related items, was also distributed by the Forestry staff to schools and State Park naturalists who continued to spread Smokey's fire safety messages.

FIRE WEATHER/FIRE DANGER PROGRAM

The State of Vermont has an interagency cooperative fire weather/fire danger monitoring program utilizing 5 remote automated weather stations (RAWS). These weather stations acquire and upload hourly weather observations into the national database, Weather Information Management System (WIMS).



STATION NAME	LOCATION	OWNERSHIP	OPERATIONAL/ MAINTENANCE RESPONSIBILITY
Nulhegan	Silvio Conte Headquarters Brunswick, VT	USFWS	USFWS
Essex	Essex District Forestry Office, Essex Junction, VT	State/GMNF	State
Elmore	Elmore State Park Elmore, VT	State/GMNF	State
Swezey/Danby	GMNF Mt. Tabor Work Camp, Danby, VT	GMNF	GMNF
Woodford	Woodford State Park Woodford, VT	State/GMNF	State

The Forestry Division is responsible for data collection, calculation and dissemination of fire weather and fire danger indices. Through an extensive email distribution list, state and federal fire managers, fire wardens, volunteer firefighters, dispatch centers, and Vermont Emergency Management received the daily fire weather forecast from the National Weather Service and the predicted daily fire danger rating from FPR. This information was also available on the Forests, Parks & Recreation website on the [Monitoring Fire Danger](#) page, updated daily through fire season; via Twitter, @VTFireDanger; and included in the VEM [daily situation report](#).

Each RAWS was maintained in 2017 according to National Wildfire Coordinating Group (NWCG) standards.

Daily distribution of the National Weather Service fire weather forecasts and predicted fire danger started on April 7, 2017. The Vermont Fire Danger Report and the Vermont Situation Report were issued on April 10. The fire danger report is produced by FPR and shared via email, Twitter and on the FPR website. The Vermont situation report is sent to the Northeast Coordination Center located at the White Mountain National Forest Headquarters in Campton, New Hampshire. The fire weather forecasts from the NWS and predicted fire danger continued until November 6, 2017.

On March 17, 2017, Tess Greaves participated in a “Train-the-Trainer” webinar on the new 2016 National Fire Danger Rating System. The national system was last updated in 1988. Tweaks have been made over the years to improve reliability and accuracy but also made the system more difficult to use. The major changes to the 2016 system include the use of phenology to determine live and dead fuel moisture values and a reduction in the number of fuel models from 40 to 5. These changes will streamline the system and make it easier to use. Outputs from the new system have been running simultaneously with the current system for the last 2 years to test accuracy.

The changes will adapt better to gridded weather data used by the National Weather Service, will be fully automated and will provide more consistent outputs. Next steps to get the system implemented include: train cadres of instructors regionally and schedule workshops, develop training materials for users, and develop products to disseminate and map outputs. As of the end of 2017, these steps are in the works.

FEDERAL EXCESS PROPERTY PROGRAM (FEPP)

The Forestry Division maintains a small inventory of FEPP in Vermont. FEPP includes vehicles, boats, and trailers on loan to Vermont volunteer fire departments through this federal program. In 2017, prior to federal review, FPR inspected and reconciled inventory items and prepared Cooperative Agreements with VFD's. On May 4-5, FPR participated in a USFS review of the state program. Eight items, mostly rolling stock, were inventoried during the review. Most property items reviewed were found to be in service, painted and in good condition. FPR is not actively screening for new property.

PRESCRIBED FIRE

The prescribed fire program is an opportunity for collaboration with the Vermont Department of Fish and Wildlife, the National Weather Service, and other partners and provides training and experience with live fire for staff in addition to vegetation and other management objectives on the WMA's. Burns were planned in 2017 but due to a wet spring fire season, none were completed.

INTERAGENCY FIRE DETAIL

The State of Vermont has a small cadre of qualified Interagency Wildland Firefighters, who participate in required trainings and refreshers and make themselves available to respond to fire and all-hazard incidents national, regionally and locally.

The Vermont Forestry Division sent out health screening questionnaires, informed consent sheets and information on the work capacity test (WCT) to ANR personnel for interagency fire assignments. WCTs were conducted in Springfield on May 11 and in St. Johnsbury on May 17. Firefighter training, qualifications and experience are tracked and recorded in the Incident Qualification System (IQSweb) database. Incident Qualification Cards (Red Cards) are issued after passing the WCT and attending the Annual Fireline Safety Refresher (RT-130).

9 ANR firefighters were issued Red Cards for the following positions:

NWCG Fully Qualified		
FAL1	Advanced Faller, (FALC, Sawyer C)	3
FAL2	Intermediate Faller, (FALB, Sawyer B)	2
FFT1	Advanced Firefighter/Squad Boss	2
FFT2	Firefighter	7
SCKN	Status/Check-In Recorder	1
IARR	Interagency Resource Representative	2
ICT5	Incident Commander Type 5	1
NWCG Trainee		
ICT5	Incident Commander Type 5	1
RESL	Resource Unit Leader	1
LOFR	Liaison Officer	1
DOCL	Documentation Unit Leader	1
ORDM	Ordering Manager	2
BCMG	Base/Camp Manager	1
RCDM	Receiving/Distribution Manager	1

2017 MOBILIZATIONS FOR STATE OF VERMONT INTERAGENCY WILDLAND FIREFIGHTERS			
Dates	Name	Location	Position
4/23/17 to 4/28/17	Chris Stone	Brown Spruce Long Horned Beetle Survey – New Brunswick	THSP – Technical Specialist
4/23/17 to 4/28/17	Josh Halman	Brown Spruce Long Horned Beetle Survey – New Brunswick	THSP – Technical Specialist
8/13/17 to 8/29/17	Jeff Briggs	Sapphire Complex, Montana	ORDM – Ordering Manager Trainee
9/16/17 to 10/2/17	Chris Stone	Chetco Bar, Oregon	FAL1 – Advanced Faller
12/21/17 to	Scott Machinist	Thomas, Southern California	FFT2 Firefighter Type 2

Neil Monteith and Jeff Briggs served on the Eastern Area Incident Management Team in 2017 in these positions:

Neil Monteith – DOCL (t); RESL (t); SCKN

Jeff Briggs – LOFR (t); ORDM