

FIREWISE USA® RECOGNITION PROGRAM COMMUNITY WILDFIRE RISK ASSESSMENT

Firewise USA® and the US Wildfire Problem

Every year, devastating wildfires burn across the United States. At the same time, a growing number of people are living where wildfires are a real risk. While these fires will continue to happen, there are things you can do to help protect your home and neighborhood as well as your family's safety.

The NFPA Firewise USA® recognition program was designed to help people learn about wildfire and how they can make their homes and neighborhoods safer. It's based on research that shows how to prepare homes to withstand embers and prevent flames or surface fire from igniting the home and its immediate surroundings, by working in an area known as the home ignition zone (HIZ). This is the home and everything around it within 100 feet.



The community risk assessment should focus on the vulnerability of homes and surrounding home ignition zones to embers.

Red Boundary = Immediate Zone Orange Boundary = Intermediate Zone Green Boundary = Extended Zone

In many neighborhoods, home ignition zones often overlap onto adjacent properties—meaning that homes are closer than 100 feet to one another. This makes the conditions of neighboring homes and vegetation a part of the wildfire threat. It's extremely important that neighbors work collaboratively with each other—to reduce their shared risk.

Using Firewise USA® to create ignition-resistant communities

Firewise USA® is a voluntary recognition program that provides a framework to help neighbors get organized, find direction, and take action to increase the ignition resistance of their homes and communities from wildfire.

There are several steps to take to become recognized as a Firewise USA® site:

- Organize Create a **board or committee** of volunteers to represent your community, including residents and partners such as local forestry agencies or the fire department. Identify a **resident leader** who will be the program point of contact.
- Plan The board or committee defines the boundaries of the site and obtains a community wildfire risk assessment. From the risk assessment, the board/committee creates a multi-year action plan to identify and prioritize actions to reduce ignition risk to homes.
- Do Each year, neighbors complete educational and risk reduction **actions** identified in the plan.
- Tell When the above criteria have been met, the Resident Leader applies for recognition through the Firewise® Portal (portal.firewise.org), describing educational and mitigation work in the site. Each year, sites renew their status by reporting their activity.

The community wildfire risk assessment is one of the most important steps in the process. It's a tool to help residents understand their wildfire risk and engage in risk reduction efforts.

There are many ways to assess risk from wildfires, using many different scales. The assessment is focused on the risk of home ignition from wildfires and will help guide residents on the most effective actions to prevent home ignitions that could result in wildfire disasters.

The recommendations provided by the completed assessment will be the board/committee's primary tool in determining the action priorities within the site's boundaries. The Firewise USA® program requires risk assessments be **updated at a minimum of every five years.**

HOW TO CONDUCT THE RISK ASSESSMENT

Each state may designate its own template and special requirements for Firewise USA® participation. Before starting this assessment, please contact your state liaison to determine your state's process. The best assessments result from a collaboration between residents and their state forestry agency, local fire department, or another designated partner.

The community wildfire risk assessment speaks to the general conditions of the overall Firewise USA® site and does not provide details on each individual dwelling.

The assessment should focus on:

- Vulnerability of homes to ember, surface fire, and crown fire
- Condition of the structures themselves
- Immediate hazards within the home ignition zone on individual properties
- Concerns presented by common/open space areas or adjacent public lands

It should also consider factors that impact risk and influence fire behavior or structure ignitability, such as:

- Structural characteristics (roofing, siding, decks)
- Vegetation types
- Slope and aspect (the direction a community faces—north, south, east, or west)
- Housing density

ASSESSMENT OVERVIEW

Features of a community risk assessment include:

- It can be completed in a variety of ways, including a walkthrough or a drive by, and does not require each individual dwelling unit to have a home risk assessment completed prior to the community assessment.
- It should focus on condition of vegetation within the participating site's boundary; general landscaping characteristics; home construction (materials used for roofs, siding, decks, etc.); and relationship of ignition potential of combustible materials on adjacent properties.
- It needs a logical recognized site boundary (HOA, defined neighborhood, street, etc.).

Assessment Participants

List the principal participants who assisted in data gathering and development of this assessment (include name, role/organization, phone and email). Participants can include your district forester, or Firewise® Board members for instance.

Participant 1	Lynn Sestak	FireSafe Council	Fire Professional	lynn.sestak@yahoo.com
Participant 2	Alyssa Plicka	Steering Committee		aplicka001@gmail.com
Participant 3	Marilyn Thelen	Steering Committee		marilynthe@aol.com
Participant 4	Amy Winkler	Steering Committee		winkleramy@gmail.com
Participant 5	Merry Fay	Steering Committee		100wishes@comcast.net

DEFINING YOUR FIREWISE USA® SITE

If there is already a Community Wildfire Protection Plan that includes your site, it can be helpful to use in filling out this information. Ask your State Forestry representative if one exists.

General Site Description

At the end of this document, please use the section provided to insert a map of your community's defined boundary.

General Site Information

Number of dwelling units – Firewise USA® participation requires a minimum of 8 individual dwe	elling units
not to exceed 2,500 units within the site's identified boundary.	

Contact Firewise USA® if you have questions about your area's eligibility, visit our contact us page.

Number of dwelling units: . Number of residents: <u>171</u>						
Description of Properties within the Boundary						
Residential types in your site (check all that apply):						
Single family	Duplex	Townhomes				
Apartment	D Mobile	Other:				
Types of ownership (check all that apply):						
Private	Common	Public (county, state, or federal)				
Lot sizes (check all that apply):						
Less than 0.10 acres or 4,356 square feet						
0.10–0.50 acres or 4,356–21,780 square feet						
☑ 0.51–1 acres or 22,215–43,560 square feet						
Greater than 1 acre or 43560 square feet						
Other site information that	you would like to provic	e (OPTIONAL):				

Description of local wildland fire characteristics:

Fire intensity and rate of spread depend on the vegetation type and condition (live/dead), topography, and typical weather patterns. This information can be obtained from your state forestry agency or local fire department.

Describe the common vegetation type(s) in your site (i.e., grasses, shrubs, and trees): Spanish and French broom, Douglas fir trees, Bay laurel trees, Oak trees, poison oak, vetch, grasses, madrones

Describe the topography within your site (include geographical features such as canyons, chimneys, steep slopes, indicate which direction slopes face, or note whether the area is flat): <u>Most properties have significant</u>

areas with >50% south-facing slopes. The high point at Rancho Prieta and Loma Prieta Way have <30% slope.

Severe wind exposure:

- □ Not in an area with regular exposure to winds
- Regularly exposed to winds
- □ Frequent severe winds

History of wildfire:

- Area with history of fire occurrence
- Area with no history of fire occurrence
- 🛛 Unknown

FIREWISE USA® SITE OBSERVATIONS AND RECOMMENDATIONS

Use this section to record observations from within your site and recommendations for action that can be included in the site's action plan. Consider taking photos to keep in your site's files that illustrate successful risk reduction efforts and areas that need improvement.

Remember, this is a community-wide view and should report on the overall conditions of the entire site. Although individual home risk assessments are not required in this section, they may end up being a recommendation for the Action Plan.

Observations

The observation section is broken down by the characteristics of homes and the vegetation management within the home ignition zones and common areas. Mark the appropriate box for each category that best represents the conditions within your site.

HOME IGNITION ZONES

Home: General building construction. Are the homes made of ignition resistant building materials?

Roofing materials: composite shingles, metal, cement tile and clay

- Greater than 75% of homes have metal, tile, or Class A asphalt or fiberglass shingles
- □ 50–75% of homes have metal, tile, or Class A asphalt or fiberglass shingles
- □ 25–50% of homes have metal, tile, or Class A asphalt or fiberglass shingles
- Less than 25% of homes have metal, tile, or Class A asphalt or fiberglass shingles

Soffit vents: a screened vent on the underside component of the eaves that allows air to flow to the attic or the space below roof sheathing

Greater than 75% of homes have non-combustible soffit vents with mesh or screening

- ☑ 50–74% of homes have non-combustible soffit vents with mesh or screening
- \square 25–50% of homes have non-combustible soffit vents with mesh or screening
- Less than 25% of homes have non-combustible soffit vents with mesh or screening
- Unknown

Siding: stucco, masonry products, plaster, and cement

- Greater than 75% of homes have non-combustible siding
- □ 50–74% of homes have non-combustible siding
- ☑ 25–50% of homes have non-combustible siding
- Less than 25% of homes have non-combustible siding

Skirting: material used around the bottom of homes and sometimes decks to protect the underside from exposure

- Greater than 75% of homes have skirting underneath raised floors/decks
- □ 50–74% of homes have skirting underneath
- \square 25–50% of homes have skirting underneath
- Less than 25% of homes have skirting underneath

Attachments: wood vs. non-combustible materials. (Examples of non-combustible materials include decks made with wood-plastic composites, higher density tropical hardwood, or fire retardant treated decking materials, and fences that use metal or masonry where attached directly to the siding of a home.)

- Greater than 75% of homes have NO wooden attachments
- □ 50–74% of homes have NO wooden attachments
- ☑ 25–50% of homes have NO wooden attachments
- Less than 25% of homes have NO wooden attachments

Windows

- Greater than 75% of homes have multi-paned windows
- □ 50–74% of homes have multi-paned windows
- □ 25–50% of homes have multi-paned windows
- Less than 25% of homes have multi-paned windows
- Unknown what type of window exist (single pane vs. multi-pane)

Roof/gutter debris (leaf litter, pine needles, etc.)

- ☑ Greater than 75% of homes have cleaned and maintained their roof and gutters
- □ 50–74% of homes have cleaned and maintained their roof and gutters
- \square 25–50% of homes have cleaned and maintained their roof and gutters
- Less than 25% of homes have cleaned and maintained their roof and gutters

Gutter type

- Greater than 75% of homes have metal gutters
- □ 50–74% of homes have non-combustible gutters
- □ 25–50% of homes have non-combustible gutters
- Less than 25% of homes have non-combustible gutters

Immediate Zone: O–5 feet from the furthest attached point of homes. This area addresses the immediate vegetation and materials, creating a combustible-free area. Items to consider:

- Is there dead vegetation, dried leaves, pine needles, and ground debris near foundations?
- Has hardscaping been used around perimeters to keep them free of litter/debris? Are there concrete, stone, or gravel walkways?
- Have wood mulch products been replaced with non-combustible alternatives, such as crushed stone/gravel options?
- Are there trees/shrubs next to the home? Are there branches overhanging the roof or within 10 feet of chimneys?
- Greater than 75% of homes have treated vegetation and created a combustible-free area
- □ 50–74% of homes have treated vegetation and created a combustible-free area
- \square 25–50% of homes have treated vegetation and created a combustible-free area
- Less than 25% of homes have treated vegetation and created a combustible-free area

Intermediate Zone: 5–30 feet from the furthest exterior point of the home. This area uses landscaping and breaks (areas of non-combustible materials such as dirt, cement, or rock) to help influence and decrease fire behavior. Items to consider:

- Are there fuel breaks such as driveways, walkways/paths, patios, and decks?
- Are lawns and native grasses maintained? General recommendation is a height of 4 inches.
- Is vegetation in this area spread out? It is recommended that trees and shrubs should be limited to small clusters of a few each to break up continuity; trees should be spaced to a minimum of 18 feet between crowns.
- Have ladder fuels (vegetation under trees) been removed so a surface fire cannot reach the crowns? Have trees been pruned? General recommendations are up to 6 to 10 feet from the ground; for shorter trees, do not exceed 1/3 of the overall tree height.
- Are plants, trees, and lawns watered to keep them from becoming dry?
- Greater than 75% of homes have treated vegetation
- □ 50–74% of homes have treated vegetation
- □ 25–50% of homes have treated vegetation
- Less than 25% of homes have treated vegetation

Extended Zone: 30–100 feet, out to 200 feet (where applicable). Generally, this area focuses on landscaping—managing the vegetation to influence fire behavior and spread. The goal here is not to eliminate fire but to interrupt fire's path and keep flames smaller and on the ground. At these distances, property lines may overlap, presenting the opportunity and need to work collaboratively with neighbors. Items to consider:

- Are there heavy accumulations of ground litter/debris?
- Is there dead plant and tree material that should be removed?
- Are storage sheds and/or other outbuildings in this zone clear of vegetation?
- Do mature trees have small conifers and brush growing between them or is the space maintained?
- Do trees 30–60 feet from the home have at least 12 feet between canopy tops? Is there at least 6 feet between canopy tops of trees located 60–100 feet from the home?
- Greater than 75% of homes have treated vegetation
- ☑ 50-74% of homes have treated vegetation
- \square 25–50% of homes have treated vegetation
- Less than 25% of homes have treated vegetation

Common areas or adjacent public lands: (community owned/managed)

- D Not adjacent to wildlands with accumulated fuels
- Adjacent to wildlands with accumulated fuels

Is there a management plan for these fuels? If so, please describe: ______ The Sierra Azul Open Space in Santa Clara

County adjacent to Loma Prieta Way has some accumulated vegetation. One of our participants is seeking county support to address.

Additional comments or observations regarding site conditions: <u>Neighbors adjacent to the Sierra Azul Open Space</u> are collaborating to make a fire break along our community border.

Summary

Use this section to summarize findings in observations. The percentages captured will help you briefly explain a snapshot of your community's current status and areas for successful focus. List areas where there is significant success and areas where improvements could be made, especially at low cost with sweat equity/volunteer labor. Of the three home ignition zones, emphasis should be on the immediate zone.

Example: Greater than 75% of homes observed have non-combustible roofs; however, there were several noted with wood shake shingles.

Our community includes 79 properties, including multiple vineyards and empty parcels

1. The Mt Bache - Loma Prieta Plus Firewise Community is in unincorporated Los Gatos, in the Mt Bache/ Highland/Loma Prieta area of the Santa Cruz Mountains. This Firewise community consists of homes and properties (including vineyards) that range from roughly 2000 to 3000 feet in elevation.

2. Near the top portion of this community are several large open meadows which could serve as both fire breaks and potential temporary refuge areas in an emergency.

3. Mt Bache Road and Highland Way are county-maintained roads, in fair to poor condition due to years of hard winters and uneven pavement. The offshoot private roads are in better condition with respect to paving.

4. The community boundaries are within 3 miles of the CALFIRE Burrell Fire Station.

5. Some of the private roads have 5-10 feet vegetation cut back on either side of the road. Other roads could use better roadside vegetation management for wildfire safety and visibility.

6. All homes are on private water systems, typically with 5 - 10K (or more) gallons of water storage. Several homes have private fire hydrants accessible from the street. Several homes have pools as auxiliary water sources for emergencies.

7. At least two alternate evacuation routes are available in this community for emergency use.

8. Several fire breaks have been created and maintained on private properties to help slow wildfire.

9. Many residents are highly aware of wildfire risk and have done significant home hardening and defensible space around their own property.

Recommendations

Using the findings from the observation phase, identify actions and steps that can be taken to reduce the site's risk from wildfire. Prioritize recommendations based on the potential fire threat to homes. It's recommended that residents address hazards at the home first and work their way out into the three home ignition zones. Remember, small things can have a huge impact on home survivability. Use these recommendations to create your site's action plan.

Examples:

- Less than 75% of homes observed had a roof free of leaf litter, pine needles, and other debris. Encourage residents to remove the debris and keep those areas clean to work towards greater than 75% compliance.
- Bark mulch is widely used within the immediate area. Recommend removing bark mulch and replacing with an ignition-resistant material, such as crushed stone or gravel.
- Work with residents to improve the number of homes that have removed flammable materials 0–5 feet from the home.

1. Roadside vegetation management: where possible, consider cutting down low laying shrubs and limbing up trees 6-8ft within 10 feet of either side of roads, to increase safety during wildfire. Emergency vehicles typically require 15 feet up and 15 feet wide for safe access along roads and driveways.

2. Consider thinning/removing trees around densely wooded road sections to increase line-of-sight around corners.

3. Non-reflective residential address number signage should be upgraded to be highly visible, reflective, mounted at headlight height, and visible from both directions of traffic. This will assist first responders in finding homes quickly in an emergency.

4. Non-reflective private road signs should be replaced with reflective high-visibility versions to assist first responders.

5. Private fire hydrants should be made more visible for emergency use (painted red, use of blue reflective pavement markers).

6. Other water sources such as pools could be advertised in a GIS map provided to CALFIRE, along with community hydrant locations.

7. For emergency evacuation: consider mapping and sharing the existing alternate evacuation routes to inform all residents of their availability for emergencies.

8. Residential propane tanks should be kept clear of flammable materials 10' feet on all sides and above.

9. Residents with poly 5K water tanks should clear flammable materials within 5-10' on all sides and above where practical, to reduce risk of water tank failure in intense heat during wildfire.

NEXT STEPS

The information you have collected during the assessment process will help you develop recommendations that can be applied to your site's action plan. Action plans are a prioritized list of risk reduction projects and the related investments needed to achieve them for the site. Action plans also highlight suggested homeowner actions and education activities that participants will strive to complete annually, or over a period of multiple years. Action plans should be **updated at a minimum of at least every three years.**

Visit, **How to Become a Firewise USA site**, to view the full list of required criteria needed to complete the Firewise USA® recognition program's application process. Or **visit the Program Management portal** to start your application.

Although not required, you may also consider adding addenda that cover the following community/fire safety issues:

- Hydrant locations
- Ingress/egress routes for the community
- Location of fire district and its capabilities
- Street signs and address numbers
- Water supply for fire response

We recommend reaching out to your local fire department for assistance in determining what other safety issues to address.

See next page to insert a map of your community's defined boundary.

MAP OF YOUR COMMUNITY'S DEFINED BOUNDARY

Click in the box to insert your image.



Appendix/Definitions

These resources will additionally provide aid in understanding the interaction between wildfire behavior and the home ignition zone:

- E-learning: Understanding the Wildfire Threat to Homes, visit our online courses.
- Preparing Homes for Wildfire: Actions that reduce risk tips and resources, visit our page Preparing Homes for Wildfire.

Dwelling Unit: Household/residence built for occupancy by one person, a family, or roommates, including mobile homes and cabins, and for multi-family residential occupancies (i.e. duplexes, and other types of attached housing). An apartment building with 10 units would be considered 10 dwelling units.

Home Ignition Zone: The home and everything around it out to 100 feet. The condition of the home and surrounding landscape within 100 feet will influence the ignitability of the structure.

Firewise USA® Action Plan: A prioritized list of risk reduction projects/investments for the participating site, along with suggested homeowner actions and education activities that participants will strive to complete annually, or over a period of multiple years. The submitted action plan should be broken down by year and reflect those goals (with examples attached). This document is required to be updated at least every three years. As circumstances change (e.g., completing activities, experiencing a fire or a natural disaster, new construction in community, etc.), the action plan may need to be updated more frequently.

Firewise USA® Community Wildfire Risk Assessment: An assessment that focuses on the risk of home ignition from wildfires by looking at the conditions of the homes and surrounding home ignition zones. It is used to help guide residents on the most effective actions to prevent home ignitions and wildfire disasters. This document is required to be updated at least **every five years.**

Firewise® Board or Committee: A group comprised of residents and other applicable stakeholders. Consider inviting the local fire department, state forestry agency, elected officials, emergency manager, and, if applicable, the property management company to participate. The board/committee will guide the efforts of the Firewise USA® site, using the risk assessment to identify and prioritize activities in the action plan.

Firewise® Resident Leader: A member of the community that is designated as the lead for a Firewise USA® site and is a part of the Firewise® board or committee. They are the primary contact between the community and the program, responsible for completing the initial recognition application and annual renewal application via the online management portal (Firewise® Portal). A site may have more than one designated resident leader assigned in the Firewise® Portal.

State Liaison: Typically, the employee of the organization that hosts the official state forester. This person is designated by the state forester, is responsible for setting the direction of Firewise USA[®] implementation in the state, and is the state's main contact to the national program. They are also responsible for reviewing and approving new site applications and may choose to review annual renewal applications. A list of state liaisons can be found on NFPA's website so, you can **contact your state liason**.

Voluntary Recognition Program: Firewise USA® is a volunteer program that provides a set of criteria that residents choose to work towards. It is not required for individuals in wildfire prone areas to participate in or be a part of in order to take risk reduction actions.

Firewise USA® was loosely modeled after the Arbor Day Foundation's Tree City USA program, enabling residents to come together voluntarily to meet a set of criteria that qualify them for national recognition. This means that residents choose to be involved and determine their site's boundaries. When they meet the Firewise USA® criteria, they earn national recognition for doing so. Each year, when verifying they are continuing to reduce wildfire risks in the community, they continue to enjoy national recognition and remain in good standing by continuing to meet the criteria. Recognition comes in the form of signage and publicity on the Firewise.org website, at a minimum.

Firewise® Portal: Online community/Firewise USA® site management system. All new and renewal applications for recognition are completed via the portal.

Application for Recognition: In order to be a recognized participant in the Firewise USA[®] program, a site must meet program criteria and the online application found in the Firewise[®] portal must be filled out. There are eight steps to the application:

- Step 1: Overview This includes the basic community information (contacts, size, location).
- Step 2: Risk Assessment The wildfire community risk assessment must be uploaded into the application. It carries over each year until the five-year update cycle is reached.
- Step 3: Board/Committee A site must acknowledge that they have a board/committee and may choose to share committee member names and email addresses. This provides NFPA with backup contacts in case the resident leader is unreachable.
- Step 4: Action Plan The developed action plan must be uploaded to the application; it carries over each year until the three-year update cycle is reached.
- Step 5: Educational Outreach Each participating site is required to hold a minimum of one wildfire risk reduction educational outreach event or activity annually. Examples of acceptable events can be found in that section of the application.
- Step 6: Vegetation Removal A major component of wildfire risk reduction is the removal of vegetation (shrubs, brush, limbs, trees, etc.) from individual properties and common-area property. Tracking vegetation removal provides forestry and fire agencies with information on the quantity of potential wildfire fuel that's been eliminated from the area(s). This section provides tools to help a community estimate its vegetation removal in cubic yards.
- Step 7: Investment Investing the equivalent of one volunteer hour (valued at \$25.43) per residential dwelling unit within the site's boundary in annual wildfire risk reduction actions is a requirement of the national recognition program's criteria for maintaining an "In Good Standing" status. Annual investment information can be reported in hours worked or money spent.
- Step 8: Review Verify that each component of the application has been filled out correctly before submitting the application.

Annual Renewal: In order to remain "In Good Standing" in the program participating sites will need to complete an annual renewal application. This application is typically due mid-November. Requirements are similar to the initial application for recognition. More information can be found online, by visiting our **Annual Renewal Information** page.

Certificate of Recognition: Sites that successfully meet the participation requirements are provided a "Certificate of Recognition." This is provided upon approval of the initial application for recognition and on an annual basis upon approval of the renewal application. The certificate can be accessed from the community's dashboard on the Firewise® Portal.

Certified vs. Recognized: As described in the definition of Voluntary Recognition Program, Firewise USA® sites meet a set of criteria to earn national recognition, and continue to meet specific criteria annually to remain in good standing with the program. The words "certified" and "certification" are not affiliated with the Firewise USA® program. To be "certified" implies that an individual has demonstrated specific competency in a job role or skill set. An example would be a certified electrical safety technician. Organizations can also be certified, generally meaning they meet qualifications that give them access to specific benefits or resources. An example would be the Women's Business Enterprise National Council (WBENC) certification that validates that a business is 51 percent owned, controlled, operated, and managed by a woman or women. Firewise USA® sites are not certified, and neither do individuals nor their properties within site boundaries receive certification.