

2017 Handbook

**Woodrock
Property
Owners
Association**

WOODROCK HANDBOOK

(Life in a cooperative, private community located on a granite mountain)

CONTENTS:

Introduction

- (1) Woodrock Environment (some unique conditions)
- (2) Relationship to Wildlife (abundance and problems)
- (3) Animal Control and Protection (ordinances/dangers)
- (4) Security (gate/codes/vigilance)
- (5) Safety (cars, roads, wildfires)
- (6) Roads and Maintenance (a perennial problem)
- (7) Woodrock Property Owners Association and its Board of Directors (covenants and duties)
- (8) What the WPOA Board Does Not and Cannot Do (residents' responsibilities)
- (9) Conclusion - A Special Place

Woodrock Lots (Graphic)

APPENDIX:

A. Important Fire Information

- Emergency Call Procedures
- Woodrock Wildfire Plan 2007
- Woodrock Emergency Call Directory
- Emergency Wildfire Assignments
- Truck Drivers and Water Bladder Carriers/Fire Brigade
- Reserve Water Tank Attendants
- Main Gate Attendants

B. Alternate Escape Route via Mueller State Park (Instructions and Graphic)

C. Before Wildfire Threatens

D. When Wildfire Threatens

E. Avoiding Wildfire Damage - A Checklist for Homeowners

F. Creating Wildfire Defensible Zones

G. "Barricade" Fire Blocking Gel

H. Additional Reference

Life is a little different in Teller County

Welcome to the urban-wildlife interface.

For those who are new to an area like this, where the forest meets the pavement, get ready for a little reality. This ain't the city.

It seems some people just don't realize they live high up in the mountains — basically in the National Forest — and things are different. They want the beauty, majesty and romance of an L.L. Bean catalog, but aren't ready for life on the way to the mailbox. The three things that come to mind are wild animals, snow and fire.

There are wild animals living in my neighborhood — and I live in town. A fox had some cubs just across the street. Deer eat the flowers in our yard. And there was a bear up in my neighbors tree last fall (not to mention a few loose llamas from down the street). If you grow flowers, the deer will eat them. If you leave your garbage can out foxes and bears will turn your yard into a trash pit. It is not the animals' fault, it's ours.

You've seen the bumper stickers "Trash Kills Bears" (that is our trash). Mountain lions prefer mule deer, but small children and pets can be very tempting. If you don't like these neighbors it is time for you to move — I'm sure someone will appreciate the furry locals.

Reading the Water

By Joel Quevillon
News Editor



Every time it snows someone complains about the roads. The streets in my neighborhood get plowed but the workers don't get all the snow — I don't expect them to. If the workers scraped the roads clean it would damage them. And the cost of trucks, fuel, labor and road repair make it almost impossible to remove all the snow.

That is a lot of our tax money going towards something that will eventually melt.

Where I grew up in the south, a two-inch snowfall would basically shut down the town. That was part of life. Here, two feet of snow is part of life. The next time we get "normal" snowfall in this area I want to see all the people who built new homes in places where they won't be able to get out. A steep driveway on the shady side of the house just doesn't make sense here. I just don't want to hear them complain about a situation they put themselves in.

I don't think everyone

needs to go buy a four-wheel drive, but they need to realize it is going to snow, a lot. So, watch the weather reports, give yourself extra time and, please, drive carefully.

If someone told you the home you were buying was in a high crime area, you would probably change your mind. What about a high fire area? Our forests are overgrown and people are building homes in the middle of them.

If you don't take the time to protect your home with defensible space, you probably will lose it if a fire comes through your area. The fire department won't risk the lives of its staff to protect your home if you haven't done your job. I realize it takes time and

costs money to be firewise. Pay now or pay later, get ready for change — insurance companies are now starting to look at property for defensible space.

That does not mean insurance costs will go up. It means you won't be able to get insurance.

Mortgage companies might start seeing a greater risk for home loans in the Red Zone. Developers and realtors need to be up front about the condition of the properties they are selling. I don't want to see state and local authorities passing laws about defensible space, but it could happen. It already has in some areas.

No matter how much this area grows we will still be in this area — 8,000 to 10,000 feet above sea level and surrounded by national and state forests. And with this beautiful geography comes certain characteristics — wild animals, snow in the winter and forests that have potential to burn.

It was your choice to move here — welcome home.

REPRINTED FROM THE
UTE PASS COURIER
MARCH 3, 2004

INTRODUCTION

Woodcock was established in December 1972, with the filing of (1) protective covenants on 12/17/72, and (2) by-laws of the Woodrock Property Owners Association (WPOA) on 8/31/80. Additional covenants were filed on 3/25/74. Woodrock covenants are binding on all property owners in Woodrock who automatically become members of WPOA. All residents and potential residents should possess and thoroughly read a printed set of Woodrock covenants and WPOA by-laws available from any current WPOA board member.

Woodrock is a private, residential cooperative community in Teller County and, therefore, property owners have some responsibilities and duties usually discharged by Teller County. These include road maintenance and certain security and safety measures within Woodrock (entrance gate maintenance, speed limit designation and wildfire resource water tanks and portable water units). These duties are carried out by the WPOA through an elected, volunteer board and are paid for by a yearly property owners' assessment fee which may be adjusted annually to meet the existing and anticipated needs to maintain Woodrock. The cooperative nature of Wood rock involves compliance with existing governing covenants, speed limit designations, assistance with occasional subdivision clean up tasks and service on the WPOA Board to share among all of us the necessary duties to maintain a private community.

Finally, the nature and variability of a high altitude, semi-arid environment need to be understood by residents and prospective residents as these conditions are very different from conditions in states east of the Colorado Rocky Mountains, coastal areas and the plains. These conditions materially affect road and driving conditions, home building and maintenance requirements, health concerns, gardening/landscaping and relationship to prevalent wildlife. The above elements of life in a cooperative, private community located on a granite mountain will be discussed in more detail in the following paragraphs.

(1) **WOODROCK ENVIRONMENT** (Rock, wind, dust and snow but what views!)

Woodrock is located on a granite mountain ridge between 9,200' - 9,550' above sea level, adjacent to the western side of the Pike's Peak massif and notched into the middle of the Mueller State Park and the Dome Rock Wildlife Area - a joint mountain wilderness preserve of 12,000+ acres.

Woodrock roads have a decomposed granite base which varies from gravel to fine powder to boulder tops sticking through the road which means our roads are generally rough, dusty and steep. Winter conditions require 4-wheel drive. Heavy summer rain can lead to temporary washouts and ruts until road maintenance can deal with the damage.

The WPOA owns a road grader and snow plow for year round road maintenance. Soil moisture is required to smooth out washboards and ruts. During our

frequent dry spells, maintenance is not possible without potential damage to the grader and grading has no effect on a dry/hard packed road surface. Woodrock roads are in as good or better condition than Four Mile Road (Teller Co. #61) which accesses Woodrock from Highway #67 and is county maintained. Sealing or paving Woodrock roads has been explored and, currently, is deemed to be unfeasible because of springs under the road surface and extreme drainage problems due to our steep terrain which would result in repetitive very high expenses and continual maintenance costs beyond the initial prohibitive cost of such surfacing.

The joint effect of our "granite soil" (e.g. gravel), low rainfall, high altitude temperatures and frequent dry winds mean gardening in the usual sense is not possible within Woodrock. Only a few non-native plants are able to survive these conditions and are not edible by our native wildlife (who seem able to eat anything that doesn't eat them first). Hanging pots, if high enough, will work if you are always around to water them.

The frequent dust in the dry air and reduced oxygen due to the high altitude plus some unique allergens in the area can exacerbate or initiate respiratory and allergy problems.

Homes built require 2"x6" wall studs construction with additional structural sheathing to meet wind resistance standards. South facing glass windows will admit very high UV exposure to carpet and upholstery which will discolor and deteriorate these fabrics unless special UV glass or UV film are installed on south windows. Stained wood siding facing south, likewise, will require more frequent restaining - usually every three years. As a result of severe UV deterioration to wood surfaces, stucco is often a better exterior finish choice. Wood decks often require yearly restaining. The decomposed granite which comprises our driveways and much of our lot "soil" contains a stain which will soil light colored carpeting and scratch any tile or wood flooring if brought inside a house.

The Woodrock area soil (decomposed granite) contains sizeable concentrations of radon which will likely require a radon mitigation system preferably installed at the time of original construction for lowest cost. Existing homes without such systems should be tested to see if a mitigation system is needed.

All property owners should provide for water and sewage treatment at their property with private wells and septic tank systems before beginning construction of a home. The quality and cost of wells can vary greatly even on adjoining properties. Well depth to reach any water can vary from 200 to over 800 feet in recent years with water delivery rates varying from a half gallon to 6 gallons per minute. Woodrock wells average about 500 feet with an average cost of \$11, 000. There is no guarantee that water can even be reached although current techniques such as "fracturing" usually will allow you to have a reliable fresh water source. Low water flow from a well, under a half

gallon per minute, with a large family, may require a cistern attachment and a two pump system.

Your well head and septic clean-out is best located adjacent to your driveway or road access for convenient and inexpensive servicing when necessary. Since water is a limited resource in a mountainous area all residents are urged to conserve water usage at every opportunity. Underground water reservoirs and water tables will lower with an increasing number of homes built in Woodrock. Some wells in Teller County have gone dry so thoughtful conservation measures are in the interest of all of us.

Overall, our climate very often is sunny and clear, summer highs in the low 80's, breezy to very windy (usually in the Spring or Fall). Summer rains are brief but can be heavy and occur mostly in the p.m. A recent drought (2001-03) left us very dry with subsequent loss of some existing plants/trees and a constant threat of forest wildfire usually caused by lightning strikes but also from human carelessness. Because of these dangers, no open fires outdoors are permitted in Woodrock. We have had two fires within Woodrock in the past five years, one due to a lightning strike, the other due to a tree blown down across an electric power line during very high winds. (See "Safety" section #5 for measures taken by WPOA to deal with fire danger.)

Our winters vary greatly with temperatures from -20 degrees (rare) to +40 and above. November can be cloudy but December, January and February are usually bright and sunny with moderate snowfalls of 2" to 8". Most of the heavy snow falls 50 miles west of us along the western slopes of the Continental Divide formed by the Sangre De Cristo and Sawatch ranges - the Colorado high country of 13 -14,000' mountains where the ski resorts are located. Most of our snow fall s in March and April with a brief, small first snow usually in mid-September. It can and has snowed in every month of the year. Winter at 9,500' can last 6-7 months. In April 2002, we had approximately 32" of snow in one day - some weeks we get none at all. Woodrock roads are plowed when there is 6" or more and are best drivable with 4-wheel drive.

(2) RELATIONSHIP TO WILDLIFE

Because Woodrock is notched into a 12,000 acre wilderness preserve, we have an abundant variety of wildlife including black bears, coyotes, mule deer, elk, wild turkeys, porcupines, raccoons, rabbits, a wide variety of birds and many other small critters from squirrels and chipmunks to woodrats. Present in the surrounding park but rarely seen in Woodrock are mountain lions and bighorn sheep. Field mice often get inside homes in cold weather.

Putting any kind of food out for wildlife usually instigates problems with bears. Even birdseed and, especially, hummingbird feeders attract bears who destroy feeders and may attempt to get at your stash of anything edible. If you can't do

without feeding birds, always bring all feeders in at night and be prepared for recurrent bear problems day or night once they know you have food stored. Always keep all trash/garbage in covered containers in a garage, which is always locked. Keep all house windows and doors accessible to bears shut and locked at night (yes, bears can and have entered houses by opening unlocked doors/windows). Wildlife problems are human caused by tempting them, however unknowingly, with tasty treats and/or smells from cooking. If ground or deck level windows are opened on warm days, place a sturdy 1" x 2" board or 1" dowel in the window track so the window cannot be opened wide. Bears often will rip a screen off to enter through a window so never leave windows wide open. Bears are not known to break windows or doors to enter. For further information about wildlife problems and preventative measures, call the Colorado Division of Wildlife in Colorado Springs at 227-5200. Always remember, we invaded their habitat. Understand them and enjoy them but avoid instigating problems by well-meaning ignorance or carelessness.

(3) **ANIMAL CONTROL AND PROTECTION**

Teller County has a very strict ordinance regarding domestic animals enforceable by the Animal Control Division of the county sheriff's office. It involves, first, a warning followed by progressive fines for continued non-compliance. No dog is allowed to run loose anywhere in Teller County (it must be on a leash anywhere outside of the owner's property) and any barking dog who disturbs the peace or any dog who is deemed a public nuisance in any residential area - private or public- is not tolerated. Any resident of Teller County may make a complaint to Animal Control at 687-0660. The complete text of this ordinance is available online at <http://www.co.teller.co.us/> ("click" on county ordinances, "click" on animal control). Address any questions to Animal Control regarding filing a complaint. We kid you not, this ordinance is very strictly enforced. There is no involvement of the WPOA or its board in this matter. It is a county ordinance. Any Woodrock resident can file a telephone complaint directly to Animal Control and the complainant's identity is kept confidential from the offending animal's owner.

Because mountain lions in our area have been known to make off with domestic animals of any size, it is best always to keep them in a completely secure enclosure at night with walls and roof either solid or chain-link fenced. Mountain lions are normally nocturnal and are the perfect predator.

(4) **SECURITY** (gates, codes, locks and vigilance)

To enter Woodrock, the WPOA maintains an electrically operated gate with a code entry number. All Woodrock residents need to purchase a remote gate opener from the WPOA board treasurer. The code is changed periodically and all residents are notified well in advance of the date of the change. You must then change to the new code number by opening the back of your personal remote opener.

It is very important each resident consider carefully who you give the gate code to and to keep a list of names, addresses and phones of all such parties in the event an incident occurs which requires a police investigation. The security gate enhances but does not guarantee security for Woodrock residents. The most secure measure is to personally meet all non-Woodrock persons at the gate and let in/out with your opener. Never allow anyone to enter whom you do not know or have not contracted with for a personal service.

(5) **SAFETY** (speed limits, wildfire measures, snow removal, emergency alert and exit, firearms and hunting)

Because Woodrock is a private residential area we must take responsibility for certain reasonable safety measures to help protect Woodrock residents and property.

(a) A 20-mph speed limit is posted in Woodrock to reduce the potential for accidents due to our gravel roads subject to unexpected skidding, especially when going downhill. Higher speeds are largely responsible for creating washboards. Consider Four Mile Rd. which is heavily wash-boarded due to the excessive speeds of many drivers. This is a constant headache to the county and us and we want to avoid the same for Woodrock roads. Everyone's cooperation is necessary to keep washboards minimized, to reduce road maintenance (which we all pay for) and to reduce driving discomfort. Please observe this necessary limit that is the result of the problems inherent to gravel mountain roads.

(b) We live in an extension of Pike National Forest in a private forest. It has a considerable potential for wildfire because of a substantial undercover of fire fuel comprised of dead/dry limbs, stumps, pine needles, cones and fallen leaves. The presence of frequent summer lightning strikes on mountain ridges such as ours can ignite the ground fuel, fanned by high winds into a wildfire. Consult the information list at the end of this handbook to obtain critical property saving and life saving information on preparations to minimize and procedures to follow regarding wildfire danger.

Wildfire dangers can only be reduced, never eliminated. However, there are some recurring yearly tasks 'you can do to protect your property and the WPOA has initiated other measures to assist you as well. You can clear your lot of "slash" yearly (dead limbs, stumps, branches - any combustible material in your woods, especially within 100 ft. of your house). Teller County initiated a slash program in 2003, whereby you can deliver slash to a site in Divide (**Sept - Nov.**). Each spring and later in the fall, if conditions require, it is advisable to rake all pine needles, dead leaves and other slash away from your home for a 100 ft. radius. Remove pine needles and leaves from house gutters. Never keep firewood piled next to your home or near a grill. When using an outside grill, never place it under a tree or near any combustible material. Keep a fire extinguisher next to the grill. The smallest sparks or juice splatter can and have started disastrous fires which could have been extinguished quickly. These measures may be inconvenient but experience has proven they can save all of us from a devastating wildfire.

In the summer during and after a lightning storm (day or night) look around your property and for as far as you can see in surrounding property for signs of flames or smoke or evidence that a new strike has gone down a tree trunk into the ground. Fires sometimes begin in a tree's root system and only erupt above ground a day or two after the storm. If you spot either fire or smoke, call 911 immediately. Then call any WPOA board member to see if the Woodrock emergency phone sequence needs to be initiated to alert all Woodrock residents to the danger.

To assist firefighting by the Divide Fire Department, the WPOA maintains two emergency 1500-gallon tanks of water with an outlet on Woodrock Rd. near the curved intersection with Homestead Rd. The department's tanker can only carry an initial 1000 gallons on any response call. In addition, the WPOA has three backpack water bladder spray units, each with 5 gallons of water, to help extinguish a small, initial fire away from a domestic water source. These portable units are kept in the snowplow truck. Never attempt to fight a larger fire.

In case a wildfire blocks our only exit out of Woodrock onto Four Mile Road a second fire emergency route is available by special permission of the Superintendent of Mueller State Park. It is accessed by using the gate into the park located at the end of Paradiso Rd. into the park, along their wide trails suitable for vehicles and onto the main park road (see map at end of Handbook for route, gate lock combination and emergency use conditions). This access is to be used only in the event of emergency and never for recreational access into the park. Address any questions regarding this emergency procedure or to walk its route to Ernie Andrews, 55 Homestead Rd., telephone: 687-7533.

(c) At no time are hunting or the use of firearms permitted within Woodrock. The danger to residents, hikers and property in a residential area is obvious.

(6) ROADS AND MAINTENANCE

The nature and limitations of Woodrock roads in a granite mountain environment have been discussed in Section 1, previously. Road maintenance is performed whenever necessary and when moisture conditions permit the work to be effective and without damage to our road grader. Snow plowing of our roads occurs whenever snow 4" or more covers the roads or whenever safety conditions indicate. A sand barrel and shovel are provided on the steep initial slope up past the Woodrock sign 1/2 mile in from Four Mile Road. For the benefit of all, please use them whenever conditions indicate.

Our road grader is old and hard to find parts for and will need to be replaced at some unpredictable time in the future. This will result in an expensive special assessment to Woodrock owners.

(7) **WOODROCK PROPERTY OWNERS ASSOCIATION (WPOA) AND ITS BOARD OF DIRECTORS** (covenants and duties)

- (a) The WPOA is the vehicle through which the necessary tasks to maintain Woodrock are conducted (road maintenance, security and safety measures).
- (b) As provided for in the Woodrock covenants, this includes handling the yearly assessment to property owners to pay for these tasks as well as the unpleasant directive to place liens on property whose owners do not pay their assessment within 90 days of notice.
- (c) The Woodrock covenants are binding on all Woodrock property owners. Teller County and state courts will uphold their compliance in any case of non-compliance. All court costs will be assigned to the non-compliant property owner.
- (d) The WPOA membership elects a volunteer board of 3-5 property owners who discharge the duties to arrange and pay for the essential tasks in (a) above and any other expense to conduct WPOA business.
- (e) Any Woodrock property owner is eligible to serve on the Board if elected by ballots distributed prior to, then counted at the yearly annual meeting of WPOA in the fall of each year. As a private, cooperative community all property owners are urged to take a turn serving on the board to share duties necessary to maintain Woodrock. This is a duty, not an honor, which requires time and effort without payment or reward to serve our common welfare. Please lend a hand.
- (f) As directed in paragraph 18 of the additional covenants filed 3/25/74, the Board must review and approve all building plans, original and additional, to any lot in Woodrock. The owner will need to submit the final architectural working drawings with:
- four elevations
 - plot location on the lot
 - samples of colors and materials of roof & exterior side walls
- A member/members of the Board will make a site visit to view the structure(s)' location on the owner's lot. Review paragraph 18 of the covenants for the items to be considered in this review ...

(8) WHAT THE WPOA BOARD DOES NOT AND CANNOT DO

(a) The WPOA Board does not and cannot arbitrate personal disputes between Woodrock property owners which include property rights (legal rights) - easements, lot line locations and whatever may be on your property. This is the individual responsibility of the property owners involved and must be resolved by their joint negotiation and accommodation or professional mediation or, if necessary, through attorneys and existing courts. The WPOA board has no judicial authority by covenant or WPOA by-laws to participate in these matters.

(b) The WPOA Board does not and cannot provide legal records in regard to property lot lines and easements or road right-of-ways. These records are kept in their legal form by Teller County at the courthouse in Cripple Creek.

(c) The WPOA Board cannot protect Woodrock residents from one another or outsiders in any instance of physical threat or any other form of annoyance. This is the duty of the county sheriffs office (telephone 687-9652, located at 11400 Highway 24 in Divide). All existing county and state ordinances or laws are enforceable in Woodrock by the county sheriff and deputies.

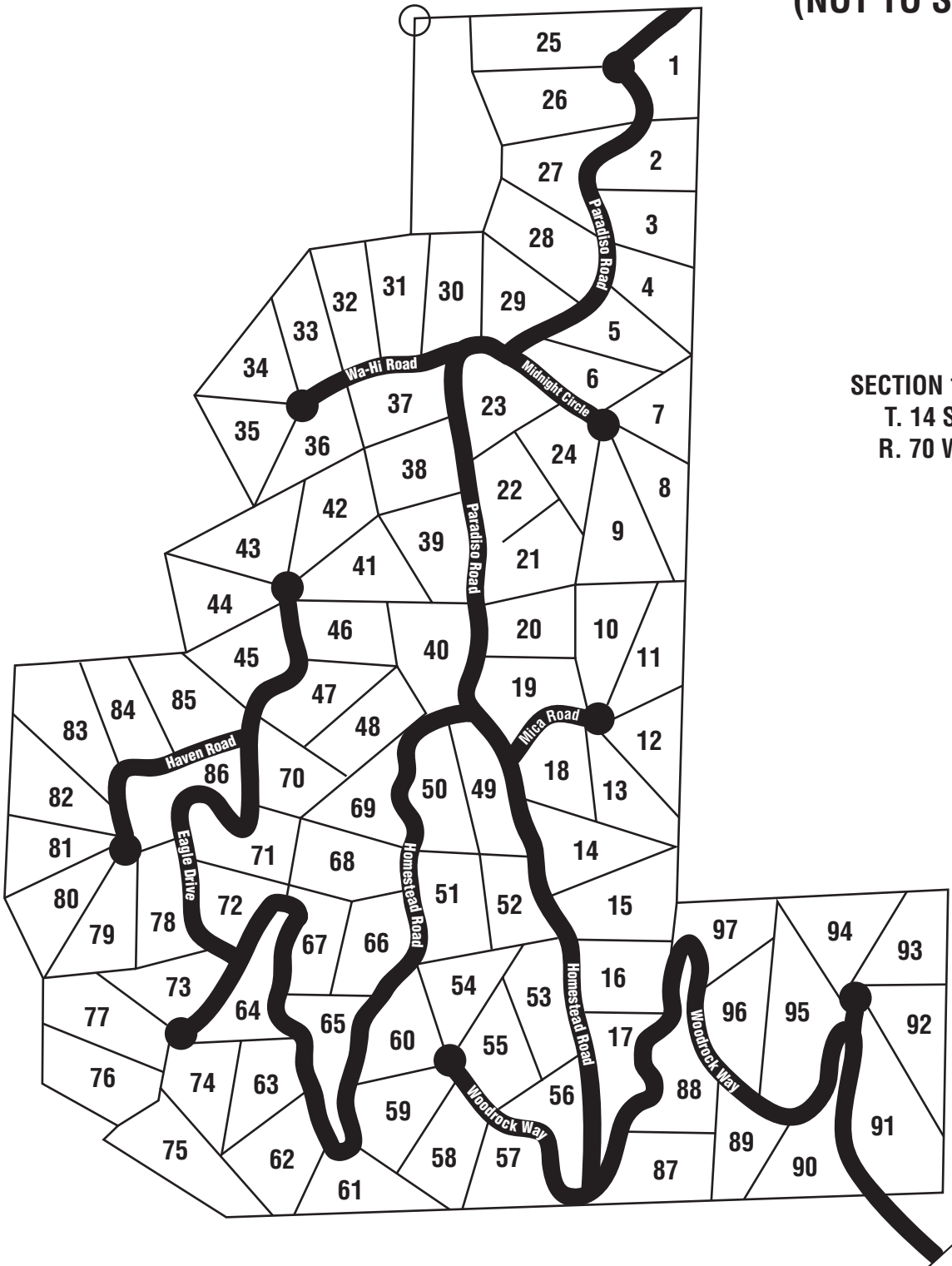
(9) CONCLUSION - A SPECIAL PLACE

We need to remember that Woodrock is not downtown Kansas City where "everything is up to date." Woodrock is a rustic mountain community with seclusion, quiet, solitude, heavily forested home sites with panoramic views. We all need to cooperate with one another to nurture and perpetuate this special ambience as Woodrock grows and more homes and families become a part of Wood rock. In spite of high winds, unpredictable weather, rough and dusty roads and wildlife concerns, it is a serene and scenic place in which to live which requires patience and mutual respect on the part of all of us.

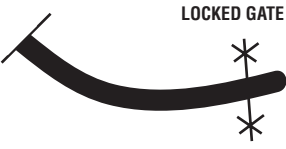
Welcome and enjoy!

WOODROCK FILING NO 1 (NOT TO SCALE)

NW CORNER OF NE
QUARTER OF SEC. 1



SECTION 1, 2
T. 14 S
R. 70 W



Fire Information

Fire Info
Update
Pending

**Woodrock
Property
Owners
Association**

Important Fire Information

The following information comes from the **Fire Department** ...

Should you be given a **mandatory** evacuation order, please, if possible, make sure:

1. Your house is locked up. The Sheriff's office does not have the manpower for regular patrols.
2. Your electricity is left **on** so your water pump will work.
3. Your gas is turned **off** at the tank. After turning off the gas, please lift the cover and leave it open so the firemen will know the gas is turned off.
4. You leave a ladder (as large as possible) alongside the front of your house so the firemen may use it. Most of the pumper trucks that come to your home will not carry a ladder.
5. You leave all garden hoses connected to faucets so they are ready to use.
6. You place large water-filled receptacles (garbage cans, barrels, tubs, buckets, etc.) alongside your home.
7. You leave a note on the front door giving a phone number where you might be reached. Also, note any unusual inflammables in the house and their location (oxygen, large amounts of paint, gas, etc.).

Because of the extreme fire danger this summer, please observe the no open fires regulation and be especially watchful for activity of this kind. Please be especially watchful for smoke and notify 911 and an Emergency Caller should you spot smoke in Woodrock. This information is located in your Woodrock Handbook.

ADDED INFORMATION —

1. Rake all pine needles, leaves and branches 50-75 feet away from your house. Forest floor fuel is where most wildfire begins and feed the fire to anything else flammable.
2. Keep firewood stacked 100' away from your house, along with anything else combustible.
3. Keep a pail of water or a hose within four feet of your outdoor grill. Keep the area under and around your grill raked clean.
4. Develop a fire emergency plan for your family. Remember our alternate escape route through Mueller State Park should a fire block our exit onto Four Mile Road.

EMERGENCY CALL PROCEDURES FOR ALL WOODROCK RESIDENTS

1. **IN CASE OF EMERGENCY, ANYTIME, DAY OR NIGHT, first call 911.**
2. Follow 911 personnel instructions.
3. If emergency involves a threat or potential threat (i.e. smoke, fire or other) to others in Woodrock, immediately call any name on the following list and tell them if 911 has been contacted and the nature of emergency and location (identifying lot number if possible from attached map). The Emergency Caller immediately will initiate the emergency call procedure to notify every home in Woodrock.

EMERGENCY CALLERS AND PHONE NUMBERS

Ernie & Suzanne Andrews	687-7533
Bob & Susie Beger	686-9611
Bud & Carol Thomas	687-8942
Jim & Tina Myers	686-1315
Mike & Deb Murphy	687-5044
Carol Holcomb	686-1253
John Anderson	686-7405
Don & Erin Hoelle	687-1354
Dave & Char DeVries	686-1822

4. If the emergency is a fire, every home in Woodrock (plus Myrick and Kelley) will be called by an Emergency Caller. Home phones will be dialed first, cell phones second.
5. If emergency is a fire, residents will be dispatched to the fire scene (if deemed safe), the reserve water tanks on lot 17, the main resident gate and the emergency escape gate entrance to Mueller State Park.
6. When the emergency has been resolved, the Emergency Callers will call everyone again to inform them.

ALERT OBSERVERS

The most important ongoing contribution you can make is to spot smoke by looking out windows and getting outside to look in all directions for smoke. This is especially important on windy days (trees downed on power lines can spark a fire), and during and after lightning storms. Strikes will g down a tree and ignite roots, which will smolder and smoke for days before flames appear. If you spot smoke, first call **911**. Give directions and distance as best you can. Then, immediately call any person on the Emergency Caller List. If the first person does not answer after four rings, go to the next name on the list.

WOODROCK WILDFIRE PLAN 2007

Woodrock is rated as high potential for a catastrophic wildfire by a Teller County study. As a result, a **Woodrock Fire Team** has been established. It consists of the following groups:

- (1) Emergency Callers
- (2) Fire brigade — to respond to the actual fire site
- (3) Truck Drivers — the truck contains water bladders
- (4) Water Tank Attendants
- (5) Gate Attendants
- (6) Alert Observers — all Woodrock residents

We have three teams of volunteers for emergencies and/or wildfire in Woodrock. **You may belong to more than one group.** You need to notify any Emergency Caller when you will be away for more than one day and not available for call up.

(A) EMERGENCY CALLERS: These people are responsible for notifying all other residents of any emergency situation. We have three teams of callers.

Team One

Mike & Debbie Murphy	687-5044
Jim & Tina Myers	686-1315
Lee & Nancy Hill	687-3115
Bud & Carol Thomas	687-8942

Team Two

Dave & Char DeVries	686-1822
Ernie & Suzanne Andrews	687-7533
John Anderson	686-7405

Team Three

Don & Erin Hoelle	687-1354
Bob & Susie Beger	686-9611
Carol Holcomb	686-1253

(B) CALL UP PROCEDURE:

1. If smoke or fire appear to be in Woodrock and are so stated by fire observer/caller, the subsequent Emergency Callers will direct all available volunteers to smoke site and alert all other residents of the danger. Gate attendants go to entry gate on Four Mile Road and water tank attendants go to the tank on Lot 17 (WPOA lot).

2. If smoke is some distance from Woodrock, Emergency Callers will place fire brigade volunteers on stand by and alert other Woodrock residents. If our fire team is necessary, a second call to fire brigade volunteers will direct them to the fire site.

KEEP YOUR WOODROCK LOT MAP NEAR YOUR PHONE AND MARK YOUR LOT WITH AN X. YOU WILL BE GIVEN THE SMOKE/FIRE LOCATION LOT # ON A SPECIFIC WOODROCK ROAD. WEAR CANVAS GLOVES.

(C) ALERT OBSERVERS: The most important ongoing contribution you can make is to spot smoke by looking out windows and getting outside to look in all directions for smoke. This is especially important on windy days (trees downed on power lines can spark a fire), and during and after lightning storms. Strikes will go down a tree and ignite roots which will smolder and smoke days before flames appear. If you spot smoke, first call 911. Give directions and distance as best you can. Then, immediately call any person on the Emergency Caller list. If the first person does not answer after four rings, go to the next name on the list.

WOODROCK EMERGENCY CALL DIRECTORY			2008		
FIRE AND SHERIFF--EMERGENCY 911			NON-EMERGENCY--687-9652		
EMERGENCY CALLER	PHONE	CELL	CELL	ASSIGNMENT	
Mike & Debra Murphy	687-5044	649-4749		Mueller Gate	
Jim & Tina Myers	686-1315	649-1176		Gate/Tank	
Bud & Carol Thomas	687-8942	650-0788	650-0833	Brigade/Gate/Tank	
Lee & Nancy Hill	687-3115	649-0781		Gate/Tank	
CALL LIST	PHONE	CELL	CELL/WORK	ASSIGNMENT	
Bodie, Nate and Kara	687-0691	499-6088	290-5183	Brigade/Gate/Tank	TRUCK DRIVER
Boeck, Dave and Elaine	686-1012			Gate/Tank	
Buettner, Mike	687-0412	237-9857			
Corns, Jerry and Janet	687-7708	661-8041			
Dunham, Steve	686-0158	338-2268	wk-533-7641		
Dunham, Theresa	686-0158	338-0547	wk-575-7132		
Eshelman, Byron/Vicky	687-8303			Main Gate	
Fritz, Ken and Wendy	687-6002	640-2490	640-2492	Brigade	
Nichols, Greg and Pam	687-2923	719-534-3100	719-534-3181		
Olmstead, Bob and Lora	531-7060	494-9917		Brigade/Gate/Tank	
Schweitzer, Dennis/Suzi	660-1088				
Yates, Chris and Maddie	687-8529	642-3296			TRUCK DRIVER
Buehl, Bob & Betty	919-696-6139	919-696-6039			
EMERGENCY CALLER					
Dave & Char DeVries	686-1822			Brigade/Gate/Tank	
Ernie-Suzanne Andrews	687-7533			Brigade/Gate/Tank	
John Anderson	686-7405	964-3570	wk-536-4040 EX-1301	Brigade	
CALL LIST					
Falton, John and Chris	687-3542			Brigade/Gate/Tank	
Field, Jim and Wendy	686-0331			Brigade/MuellerGate	
Fortin, Jim and Cindy	687-2511			Gate/Tank	
Hart, Russ and Debbie	687-6878			Brigade/Gate/Tank	
Hornsey, Joseph/Melissa	687-0225			Gate/Tank	
Kelsay, Ed and Cathy	687-8054	940-507-1587		Brigade/Gate/Tank	TRUCK DRIVER
Knox, Bill	687-2963	785-342-3686			
Koscove, Carol	216-4668	331-9772			
McAllister, Rick		492-5789		Mueller Gate	
Michels, John and Sonia	708-784-4096	708-784-4096	630-561-2505		
Smith, Paul & Debbie	687-9312	612-803-2014	719-233-6882		
Sheldon, Keith/Mary Anne	686-7511				

EMERGENCY WILDFIRE ASSIGNMENTS — 2007

MUELLER GATE

Code 0911

Kara Bodie
Carol Thomas
Erin & Don Hoelle
Wendy Fritz
Mike & Debbie Murphy
Rick McAllister
Nancy Hill
Jim & Wendy Field

FIRE BRIGADE

Nate & Kara Bodie
John Anderson
Elaine Boeck
Joseph & Melissa Hornsey
Ken Fritz
Ed Kelsay
Bud Thomas
Ernie Andrews
Russ Hart
Dave DeVries
Chip Riddle

MAIN GATE

Code 9762

Char DeVries
Debbie Hart
Ernie Andrews
Elaine Boeck
Byron Eshelman
Carol Holcomb
Cindy Fortin
Chip & Kathryn Riddle
Jim & Tina Myers
Bud & Carol Thomas
Lee & Nancy Hill
Bob & Lora Olmstead
John & Chris Falton
Bob & Susie Beger
Erin & Don Hoelle
Ed & Cathy Kelsay
Joseph & Melissa Hornsey

DRIVERS — TRUCK WITH WATER BLADDERS

Nate Bodie
Ed Kelsay
Chris Yates

WATER TANKS

Code 0000

Suzanne Andrews
Cathy Kelsay

Bud & Carol Thomas
Debbie Hart
Don & Erin Hoelle
Bob & Susie Beger
Chip & Kathy Riddle
Jim & Tina Myers
Lee & Nancy Hill
Kara Bodie
Bob & Lora Olmstead
John & Chris Falton
Jim & Cindy Fortin
Joseph & Melissa Hornsey
Dave & Elaine Boeck
Char DeVries

(A) Persons listed twice will join fire brigade if others are already at their gate/tank assignment.

(B) Emergency callers are to go to their assigned area only after all residents have been called.

TRUCK DRIVERS AND WATER BLADDER CARRIERS

1. Take truck to fire site as directed by your Emergency Caller. Water bladder carriers will meet truck at the fire site.
2. Park as close as you safely can, with truck pointed outward to escape from fire if necessary.
3. Open back hatch and tailgate to access the rack with the water bladders.
4. If you are a water bladder carrier, put one on with help, as they weigh about 50#. Spray judiciously — with continuous spray the water supply will last only two minutes at most.
5. If a reserve water supply is available in the truck, refill the bladders and continue to spray.
6. After fire is contained and Divide Fire Department leaves, return the three bladders to the rack in the rear of the truck.
7. Fire/Safety Committee members will see that they are refilled for later use.
8. Return truck to the original parking place.

FIRE BRIGADE

1. Take shovels, canvas gloves, rakes, picks, spades, etc. to fire site.
2. Drive to fire scene but park so as to escape, if necessary. Leave room for the fire trucks.
3. Beat down small flames with caution — only for ground fire containment.
4. **If at any time, small initial flames manage to climb a conifer and set it ablaze, vacate fire scene immediately.**
5. Back off when the Divide Fire Department arrives and continue to contain fire **only at their direction.**

RESERVE WATER TANK ATTENDANTS/ WOODROCK WILDFIRE PLAN 2007

In the event of a ground fire in Woodrock, your emergency caller will direct you to our reserve water tanks on lot 17. If at night, take a flashlight and take reading glasses if necessary, as the numbers on the dials are small.

To refresh your memory on the procedure to open the water valve:

(1) If two persons arrive, have one open the valve and the other go down to the brown shack on Woodrock Way and open the unlocked doors to the shack to allow quick access to the connecting nozzles for the Divide Fire Department water trucks if needed.

(2) At lot 17, water valve is in the white plastic standpipe. Unlock the cap — **combination is 0000** — to access the water valve inside the standpipe. Remember to push in on lock then pull out to open lock.

(3) Do not open until directed by the Divide Fire Department.

(4) Remove cap and reach into pipe and pull up on T-shaped valve. Pull valve up until it clicks into an up position. **DO NOT** let valve slide down again into a closed position.

(5) You may need to direct firefighters to the connection shack on Woodrock Way if they should need to refill their water tankers.

(6) Remain at tank's valve until tanks are emptied, or not used at all, or until the fire department leaves and fire is out.

(7) When fire emergency is over, close valve by pushing down on valve to close. Replace cap and lock. Remember to spin lock tumblers out of the **0000** position, then push lock shut hard and test to make sure it is locked.

(8) Check to make sure the fill outlet in the shack is completely closed.

If you would like a hands-on run-thru of this procedure call Suzanne @ 687-7533 to arrange.

If you are unable to be a water tank attendant in a fire emergency call Carol Thomas **ASAP** at 687-8942.

MAIN GATE ATTENDANTS/WOODROCK WILDFIRE PLAN 2007

Woodrock is rated as high potential for a catastrophic wildfire by a Teller County study. You signed up as a main gate attendant and we continue to need your help again this year. If a small ground fire is reported in Woodrock, your emergency caller will direct you to the Woodrock main gate at 4 Mile Road. **Before going to the gate, write down the directions to the fire site to give to the Fire Department as they come through the gate.**

To refresh your memory on the procedure to open the gate and leave it open for the Divide firefighters arrival:

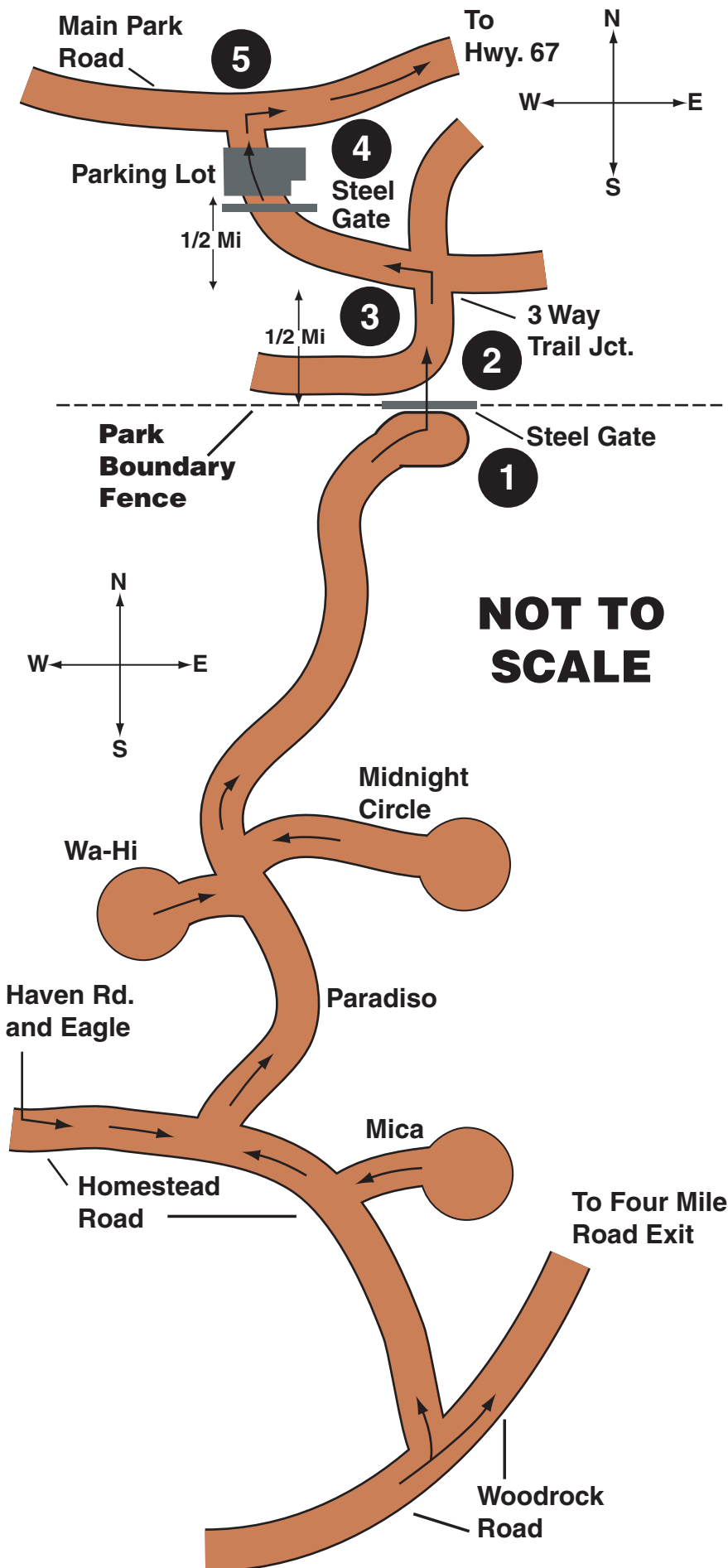
- (1) Take reading glasses if necessary and if it is nighttime, take a flashlight.
- (2) Unlock the circuit breaker box on the power pole next to the gate opening control box. The combination is **2468** — push lock in — then pull out to open lock.
- (3) Open breaker box and trip the far right breaker switch (red dot) to the **OFF** position. The gate will automatically open by battery backup and remain open.
- (4) Remain at the gate to direct firemen to the fire scene, which your emergency caller will have given you as it is known at the time.
- (5) When the fire emergency is over and the firefighters have come back through the gate, return the gate to normal operation by switching the breaker back to the **ON** position. The gate will close **AFTER** a 30-second delay and then be opened as usual by the keypad or our personal remotes.
- (6) Relock the breaker box. First spin the lock tumblers out of the **2468** open setting, and then push the lock shut hard. Test to make sure it is locked.

If you would like a hands-on run-thru at the gate, call Ernie @ 687-7533 to arrange a time.

If you are unable to be a main gate attendant, call Carol Thomas (687-8942), ASAP.

MUELLER ALTERNATE ESCAPE ROUTE GATE

1. Open the gate lock connecting Woodrock to Mueller State Park.
This is located at the end of Paradiso Road, across from Lot #1.
2. Gate lock combination is **0911**.
3. Gate only to be opened if our normal main gate exit onto Four Mile Road is blocked by active fire, preventing escape onto Four Mile Road.
4. **UNLOCK THE COMBINATION LOCK BUT LEAVE GATE CLOSED UNTIL NEEDED.**



ALTERNATE ESCAPE ROUTE VIA MUELLER STATE PARK

(IF MAIN WOODROCK EXIT TO FOUR MILE ROAD IS ENDANGERED BY FIRE)

1. TURN NORTH ONTO PARADISO ROAD, GO TO THE END AT STEEL GATE ENTRANCE TO MUELLER.
2. THE RIGHT END OF GATE WILL HAVE A COMBINATION LOCK OPENED WITH 0911. SWING GATE OPEN ALL THE WAY, DRIVE STRAIGHT AHEAD, (**NOT TO IMMEDIATE LEFT.**) PARK ROADS ARE OLD ROADS, 12' WIDE, EASILY DRIVABLE.
3. DRIVE NORTH APPROX. 1/2 MILE TO 3 WAY TRAIL JUNCTION. TURN LEFT ONTO LEFT TRAIL **ONLY**, FOR 1/4 MILE TO SECOND STEEL GATE.
4. THIS GATE CAN BE OPENED WITH A COMBINATION LOCK, USING 0911
5. DRIVE STRAIGHT AHEAD TO MAIN PARK ROAD THROUGH PAVED PARKING LOT, TURN RIGHT ONTO MAIN PARK ROAD, 2 MILES TO HWY. 67.

WPOA WISHES TO THANK ERNIE ANDREWS FOR HIS EFFORTS IN MAKING THIS MAP POSSIBLE. GRAPHIC ILLUSTRATION BY LORA OLMSTEAD.

THE UNLOCKING OF THESE GATES TO ACCESS THE PARK TRAILS IS PERMISSIBLE ONLY IN A FIRE EMERGENCY. ANY OTHER USE IS SUBJECT TO A \$5,000 FINE AND ONE YEAR PRISON TERM.



PROTECT YOUR HOME

- Regularly clean roof and gutters.
- Inspect chimneys at least twice a year. Clean them at least once a year. Keep the dampers in good working order. Equip chimneys and stovepipes with a spark arrester that meets the requirements of National Fire Protection Association Code 211. (Contact your local fire department for exact specifications.)
- Use 1/2-inch mesh screen beneath porches, decks, floor areas and the home itself. Also, screen openings to floors, roof and attic.
- Install a smoke detector on each level of your home, especially near bedrooms; test monthly and change the batteries two times each year.
- Teach each family member how to use the fire extinguisher (ABC type) and show them where it's kept.
- Keep a ladder that will reach the roof.
- Consider installing protective shutters or heavy fire-resistant drapes.
- Keep handy household items that can be used as fire tools: a rake, axe, handsaw or chainsaw, bucket and shove.

Before Wildfire Threatens

Design and landscape your home with wildfire safety in mind. Select materials and plants that can help contain fire rather than fuel it. Use fire resistant or non-combustible materials on the roof and exterior structure of the dwelling. Or treat wood or combustible material used in tools, siding, decking or trim with UL-approved fire-retardant chemicals. Plant fire-resistant shrubs and trees. For example, hardwood trees are less flammable than pine, evergreen, eucalyptus or fir trees.

Create a 30 to 50 foot safety zone around your home

Within this area, you can take steps to reduce potential exposure to flames and radiant heat. Homes built in pine forests should have a minimum safety zone of 100 feet. If your home sits on a steep slope, standard protective measures may not suffice. Contact your local fire department or forestry office for additional information.

- Rake leaves, dead limbs and twigs. Clear all flammable vegetation.
- Remove leaves and rubbish from under structures.
- Thin a 15-foot space between tree crowns, and remove limbs within 15 feet of the ground.
- Remove dead branches that extend over the roof.
- Prune tree branches and shrubs within 15 feet of a stovepipe or chimney outlet.
- Ask the power company to clear branches from powerlines.
- Remove vines from the walls of the home.
- Mow grass regularly.
- Clear a 10-foot area around propane tanks and the barbecue. Place a screen over the grill — use non-flammable material with mesh no coarser than one-quarter inch.
- Regularly dispose of newspapers and rubbish at an approved site. Follow local burning regulations.
- Place stove, fireplace and grill ashes in a metal bucket, soak in water for two days, then bury the cold ashes in mineral soil.
- Store gasoline, oily rags and other flammable materials in approved safety cans. Place cans in a safe location away from the base of buildings.
- Stack firewood at least 100 feet away and uphill from your home. Clear combustible material within 20 feet. Use only UL-approved woodburning devices.

PLAN YOUR WATER NEEDS

- Identify and maintain an adequate outside water source such as a small pond, cistern, well, swimming pool or hydrant.
- Have a garden hose that is long enough to reach any area of the home and other structures on the property.
- Install freeze-proof exterior water outlets on at least two sides of the home and near other structures on the property. Install additional outlets at least 50 feet from the home.
- Consider obtaining a portable gasoline powered pump in case electrical power is cut off.

When Wildfire Threatens

If you are warned that a wildfire is threatening your area, listen to your battery-operated radio for reports and evacuation information.

Follow the instructions of local officials.

- Back your car into the garage or park it in an open space facing the direction of escape. Shut doors and roll up windows. Leave the key in the ignition. Close garage windows and doors, but leave them unlocked. Disconnect automatic garage door openers.
- Confine pets to one room. Make plans to care for your pets in case you must evacuate.
- Arrange temporary housing at a friend or relative's home outside the threatened area.

If advised to evacuate, do so immediately

- Wear protective clothing — sturdy shoes, cotton or woolen clothing, long pants, a long-sleeved shirt, gloves and a handkerchief to protect your face.
- Take your Disaster Supplies Kit.
- Lock your home.
- Tell someone when you left and where you are going.
- Choose a route away from fire hazards. Watch for changes in the speed and direction of fire and smoke.

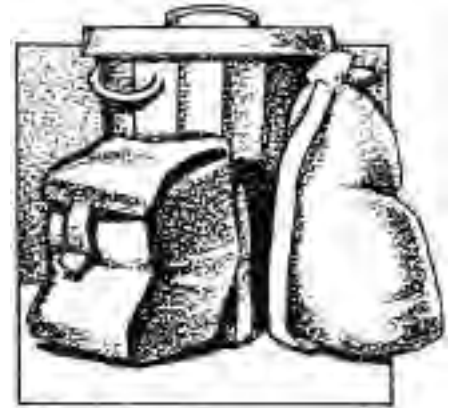
If you're sure you have time take steps to protect your home:

Inside:

- Close windows, vents, doors, venetian blinds or non-combustible window coverings and heavy drapes. Remove lightweight curtains.
- Shut off gas at the meter. Turn off pilot lights.
- Open fireplace damper. Close fireplace screens.
- Move flammable furniture into the center of the home away from windows and sliding-glass doors
- Turn on a light in each room to increase the visibility of your home in heavy smoke.

Outside:

- Seal attic and ground vents with pre-cut plywood or commercial seals.
- Turn off propane tanks.
- Place combustible patio furniture inside.
- Connect the garden hose to outside taps.
- Set up the portable gasoline-powered pump.
- Place lawn sprinklers on the roof and near above-ground fuel tanks. Wet the roof.
- Wet or remove shrubs within 15 feet of the home
- Gather fire tools.



EMERGENCY SUPPLIES

When wildfire threatens, you won't have time to shop or search for supplies. Assemble a Disaster Supplies Kit with items you may need if advised to evacuate. Store these supplies in sturdy, easy-to-carry containers such as backpacks, duffelbags or trash containers.

Include:

- A three-day supply of water (one gallon per person per day) and food that won't spoil.
- One change of clothing and footwear per person and one blanket or sleeping bag per person.
- A first aid kit that includes your family's prescription medications.
- Emergency tools including a battery-powered radio, flashlight and plenty of extra batteries.
- An extra set of car keys and a credit card, cash or traveler's checks.
- Sanitation supplies.
- Special items for infant, elderly or disabled family members.
- An extra pair of eyeglasses.

Keep important family documents in a waterproof container. Assemble a smaller version of your kit to keep in the trunk of your car.



Avoiding Wildfire Damage: A Checklist for Homeowners

F E D E R A L E M E R G E N C Y M A N A G E M E N T A G E N C Y

If you live in a forest or wildland area, you face the real danger of wildfire. Wildfires destroy thousands of homes and devastate hundreds of thousands of acres of woodland every year.

Protecting your home from wildfire is your responsibility. To reduce the risk, you'll need to consider the fire resistance of your home, the topography of your property and the nature of the vegetation close by.

This homeowner's checklist will help learn what you can do. You should also contact your local fire department, forestry office, emergency management office or building department for information about local fire laws, building codes and protection measures.

Always be ready for an emergency evacuation. Evacuation may be the only way to protect your family in a wildfire. Know where to go and what to bring with you. You should plan several escape routes in case roads are blocked by a wildfire.

▶ Do you know your wildfire risk?

Learn about the history of wildfire in your area. Be aware of recent weather. A long period without rain increases the risk of wildfire. Consider having a professional inspect your property and offer recommendations for reducing the wildfire risk.

Determine your community's ability to respond to wildfire. Are roads leading to your property clearly marked? Are the roads wide enough to allow firefighting equipment to get through? Is your house number visible from the roadside?

▶ Have you thinned out and maintained the vegetation around the house?

All vegetation is fuel for a wildfire, though some trees and shrubs are more flammable than others. To reduce the risk, you will need to modify or eliminate brush, trees

and other vegetation near your home. The greater the distance between your home and the vegetation, the greater the protection.

Create a 30-foot safety zone around the house.

Keep the volume of vegetation in this zone to a minimum. If you live on a hill, extend the zone on the downhill side. Fire spreads rapidly uphill. The steeper the slope, the more open space you will need to protect your home.

In this zone, do the following:

- Remove vines from the walls of the house.
- Move shrubs and other landscaping away from the sides of the house.
- Prune branches and shrubs within 15 feet of chimneys and stove pipes.
- Remove tree limbs within 15 feet of the ground.

- Thin a 15-foot space between tree crowns.
- Replace highly flammable vegetation such as pine, evergreen, eucalyptus, junipers and fir trees with lower growing, less flammable species. Check with your local fire department or garden store for suggestions.
- Replace vegetation that has living or dead branches from the ground-level up (these act as ladder fuels for the approaching fire).
- Cut the lawn often.
- Clear the area of leaves, brush, dead limbs and fallen trees.

Create a second zone at least 100 feet around the house.

This zone should begin about 30 feet from the house and extend to at least 100 feet. In this zone, reduce or replace as much of the most flammable vegetation as possible. If you live on a hill, you may need to extend the zone for

several hundred feet to provide the desired level of safety.

▶ **Are combustibile materials away from the house?**

Identify all combustibile materials outside the house. Stack firewood 100 feet away and uphill from the house. Keep the gas grill and propane tank at least 15 feet from house. Clear an area 15 feet around the grill. Place a 1/4 inch mesh screen over the grill.

▶ **Are sun decks and porches enclosed underneath?**

Any porch, balcony or overhang with exposed space underneath is fuel for an approaching fire. Overhangs ignite easily by flying embers and by the heat and fire that gets trapped underneath. If vegetation is allowed to grow underneath or if the space is used for storage, the hazard is increased significantly.

Clear leaves, trash and other combustibile materials away from underneath sun decks and porches. Extend 1/2-inch mesh screen from all overhangs down to the ground. Enclose wooden stilts with non-combustibile material such as concrete, brick, rock, stucco or metal. Use non-combustibile patio furniture and covers.

If you're planning a porch or sun deck, use non-combustibile or fire-resistant materials. If possible, build the structure to the ground so that there is no space underneath.

▶ **Are eaves and overhangs enclosed?**

Like porches and balconies, eaves trap the heat rising along the exterior siding. Enclose all eaves to reduce the hazard.

▶ **Are house vents covered with wire mesh?**

Any attic vent, soffit vent, louver or other opening can allow embers and flaming debris to enter a home and ignite it. Cover all openings with 1/4 inch or smaller corrosion-resistant wire mesh. If you're designing louvers, place them in the vertical wall rather than the soffit of the overhang.

▶ **Is the roof made of non-combustibile materials?**

The roof is especially vulnerable in a wildfire. Embers and flaming debris can travel great distances, land on your roof and start a new fire.

Avoid flammable roofing materials such as wood, shake and shingle. Materials that are more fire resistant include single ply membranes, fiberglass shingles, slate, metal, clay and concrete tile. Clear gutters of leaves and debris.

▶ **Are chimneys and stovepipes covered with spark arrestors?**

Chimneys create a hazard when embers escape through the top. To prevent this, install spark arrestors on all chimneys, stovepipes and vents for fuel-

burning heaters. Use spark arrestors made of 12-gauge welded or woven wire mesh screen with openings 1/2 inch across. Ask your fire department for exact specifications.

If you're building a chimney, use non-combustibile materials and make sure the top of the chimney is at least two feet higher than any obstruction within 10 feet of the chimney.

▶ **Is the house siding fire resistant?**

Use fire resistant materials in the siding of your home, such as stucco, metal, brick, cement shingles, concrete and rock. You can treat wood siding with UL-approved fire retardant chemicals, but the treatment and protection are not permanent.

▶ **Have windows been treated to reduce the risk?**

Windows allow radiated heat to pass through and ignite combustibile materials inside. The larger the pane of glass, the more vulnerable it is to fire.

Dual- or triple-pane thermal glass, and fire resistant shutters or drapes, help reduce the wildfire risk. You can also install non-combustibile awnings to shield windows and use shatter-resistant glazing such as tempered or wire glass.



FORESTRY

Creating Wildfire-Defensible Zones no. 6.302

by F.C. Dennis ¹

Quick Facts...

Wildfire will find the weakest links in the defense measures you have taken on your property.

The primary determinants of a home's ability to survive wildfire are its roofing material and the quality of the "defensible space" surrounding it.

Even small steps to protect your home and property will make them more able to withstand fire.

Consider these measures for all areas of your property, not just the immediate vicinity of the house.

Fire is capricious. It can find the weak link in your home's fire protection scheme and gain the upper hand because of a small, overlooked or seemingly inconsequential factor. While you may not be able to accomplish all measures below, each will increase your home's, and possibly your family's, safety.

Start with the easiest and least expensive actions. Begin your work closest to your house and move outward. Keep working on the more difficult items until you have completed your entire project.

Defensible Space

Two factors have emerged as the primary determinants of a home's ability to survive wildfire. These are the home's roofing material and the quality of the "defensible space" surrounding it.

Use fire-resistive materials (Class C or better rating), not wood or shake shingles, to roof homes in or near forests and grasslands. When your roof needs significant repairs or replacement, do so with a fire-resistant roofing material. Check with your county building department. Some counties now restrict wood roofs or require specific classifications of roofing material.

Defensible space is an area around a structure where fuels and vegetation are treated, cleared or reduced to slow the spread of wildfire towards the structure. It also reduces the chance of a structure fire moving from the building to the surrounding forest. Defensible space provides *room for firefighters to do their jobs*. Your house is more likely to withstand a wildfire if grasses, brush, trees and other common forest fuels are managed to reduce a fire's intensity.

Creating an effective defensible space involves developing a series of management zones in which different treatment techniques are used. See Figure 1 for a general view of the relationships among these management zones. Develop defensible space around each building on your property. Include detached garages, storage buildings, barns and other structures in your plan.

The actual design and development of your defensible space depends on several factors: size and shape of buildings, materials used in their construction, the slope of the ground on which the structures are built, surrounding topography, and sizes and types of vegetation on your property. These factors all affect your design. You may want to request additional guidance from your local Colorado State Forest Service (CSFS) forester or fire department.

Defensible Space Management Zones

Zone 1 is the area of maximum modification and treatment. It consists of an area of 15 feet around the structure in which all flammable vegetation is removed. This 15 feet is measured from the outside edge of the home's eaves and any attached structures, such as decks.

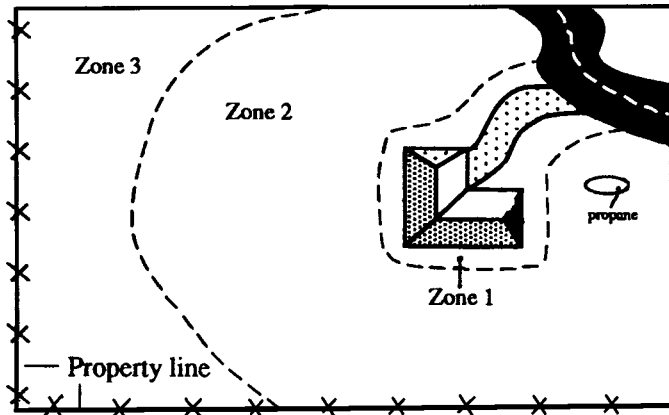


Figure 1: Forested property showing the three fire-defensible zones around a home or other structure.

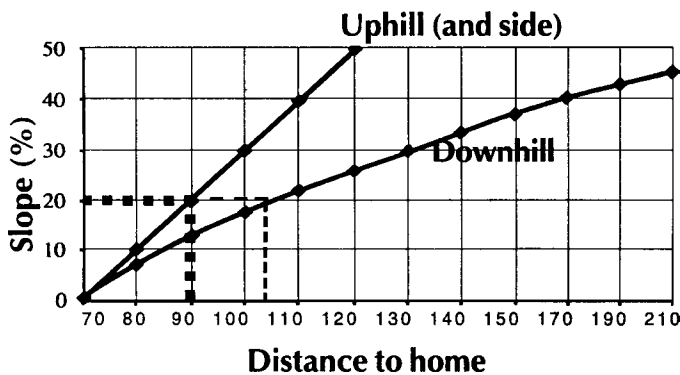


Figure 2: This chart indicates the minimum dimensions for defensible space from the home to the outer edge of Zone 2. For example, if your home is situated on a 20 percent slope, the minimum defensible space dimensions would be 90 feet uphill and to the sides of the home and 104 feet downhill from the home.

Zone 2 is an area of fuel reduction. It is a transitional area between Zones 1 and 3. The size of Zone 2 depends on the slope of the ground where the structure is built. Typically, the defensible space should extend at least 75 to 125 feet from the structure. See Figure 2 for the appropriate distance for your home's defensible space. Within this zone, the continuity and arrangement of vegetation is modified. Remove stressed, diseased, dead or dying trees and shrubs. Thin and prune the remaining larger trees and shrubs. Be sure to extend thinning along either side of your driveway all the way to your main access road. These actions help eliminate the continuous fuel surrounding a structure while enhancing homesite safety and the aesthetics of the property.

Zone 3 is an area of traditional forest management and is of no particular size. It extends from the edge of your defensible space to your property boundaries.

Prescriptions

Zone 1

The size of Zone 1 is 15 feet, measured from the edges of the structure. Within this zone, several specific treatments are recommended.

Plant nothing within 3 to 5 feet of the structure, particularly if the building is sided with wood, logs or other flammable materials. Decorative rock creates an attractive, easily maintained, nonflammable ground cover.

If the house has noncombustible siding, widely spaced foundation plantings of low growing shrubs or other "fire wise" plants are acceptable. Do not plant directly beneath windows or next to foundation vents. Be sure there are no areas of continuous grass adjacent to plantings in this area.

Frequently prune and maintain plants in this zone to ensure vigorous growth and a low growth habit. Remove dead branches, stems and leaves.

Do not store firewood or other combustible materials in this area. Enclose or screen decks with metal screening. Extend the gravel coverage under the decks. Do not use areas under decks for storage.

Ideally, remove all trees from Zone 1 to reduce fire hazards. If you do keep a tree, consider it part of the structure and extend the distance of the entire defensible space accordingly. Isolate the tree from any other surrounding trees. Prune it to at least 10 feet above the ground. Remove any branches that interfere with the roof or are within 10 feet of the chimney. Remove all "ladder fuels" from beneath the tree. (Ladder fuels are small shrubs, trees, tree limbs and other materials that allow fire to climb into the tree crown — the branches and foliage.)

Zone 2

Zone 2 is an area of fuel reduction designed to reduce the intensity of any fire approaching your home. Follow these recommended management steps.

Thin trees and large shrubs so there is at least 10 feet between crowns. Crown separation is measured from the furthest branch of one tree to the nearest branch on the next tree (Figure 3). On steep slopes, allow more space between tree crowns. Remove all ladder fuels from under these remaining trees. Carefully prune trees to a height of 10 feet.

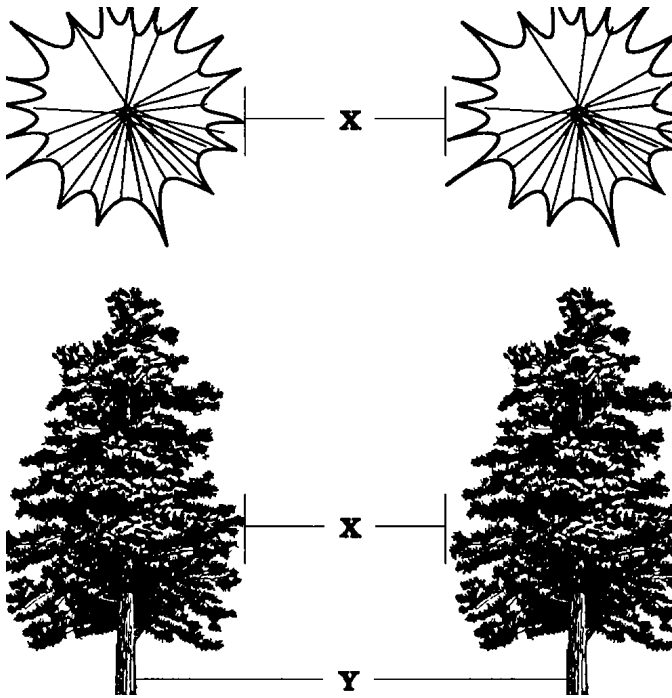


Figure 3: X = crown spacing; Y = stem spacing. Do not measure between stems for crown — measure between the edges of tree crowns.

Because Zone 2 forms an aesthetic buffer and provides a transition between zones, it is necessary to blend the requirements for Zones 1 and 3. Thin the inner portions of Zone 2 more heavily than the outer portions. Gradually increase tree density as you approach Zone 3.

Isolated shrubs may remain, provided they are not under tree crowns. Prune and maintain these plants periodically to maintain vigorous growth. Remove dead stems from trees and shrubs annually.

Limit the number of dead trees (snags) retained in this area. Wildlife need only one or two snags per acre. Be sure any snags left for wildlife cannot fall onto the house or block access roads or driveways.

Mow grasses (or remove them with a weed trimmer) as needed through the growing season to keep them low, a maximum of 6 to 8 inches. This is extremely critical in the fall when grasses dry out and cure or in the spring after the snow is gone but before the plants green up.

Stack firewood and woodpiles uphill or on the same elevation as the structure but at least 30 feet away. Clear and

keep away flammable vegetation within 10 feet of these woodpiles. Do not stack wood against your house or on or under your deck, even in winter. Many homes have burned from a woodpile that ignited as the fire passed. Wildfires can burn at almost any time in Colorado.

Locate propane tanks at least 30 feet from any structures, preferably on the same elevation as the house. You don't want the LP container below your house — if it ignites, the fire would tend to burn uphill. On the other hand, if the tank is above your house and it develops a leak, LP gas will flow downhill into your home. Clear and keep away flammable vegetation within 10 feet of these tanks. Do not screen propane tanks with shrubs or vegetation.

Dispose of slash (limbs, branches and other woody debris) removed from your trees and shrubs through chipping or by piling and burning. Contact your local CSFS office or county sheriff's office for information about burning slash piles. Only if neither of these alternatives is possible, lop and scatter slash by cutting it into very small pieces and distributing it over the ground. Avoid heavy accumulations of slash. Make it lay close to the ground to speed decomposition. If desired, no more than two or three small, widely spaced brush piles may be left for wildlife purposes. Locate these towards the outer portions of your defensible space.

Zone 3

This zone is of no specified size. It extends from the edge of your defensible space to your property lines. In this area, you are encouraged to manage your forests in a more traditional manner. Typical management objectives for areas surrounding homesites or subdivisions are: provide optimum recreational opportunities; enhance aesthetics; maintain tree health and vigor; provide barriers for wind, noise, dust and visual intrusions; support limited production of firewood, fence posts and other forest commodities; or grow Christmas trees or trees for transplanting.

Specific thinning requirements will be dictated by your objectives for your land. However, most thinning will be done from below (leaving the biggest and best trees) and on an individual tree basis.

Thinnings sanitize and improve the forest stand by removing trees that are damaged, attacked by insects, infected by disease, or are of poor form or low vigor.

References

Colorado State Forest Service, Colorado State University, Fort Collins, CO 80523-5060; (970) 491-6303:

- FireWise Construction — Design and Materials
- Home Fire Protection in the Wildland Urban Interface
- Wildfire Protection in the Wildland Urban Interface
- Landowner Guide to Thinning

From Colorado State University Cooperative Extension, 115 General Services Bldg., Fort Collins, CO 80523-4061; (970) 491-6198; Fax (970) 491-2961; E-mail cerc@vines.colostate.edu.

- 6.303, Fire-Resistant Landscaping
- 6.304, Forest Home Fire Safety
- 6.305, FireWise Plant Materials
- 6.306, Grass Seed Mixes to Reduce Wildfire Hazard
- 7.205, Pruning Evergreens
- 7.206, Pruning Shrubs
- 7.207, Pruning Deciduous Trees



FIREWISE is a multi-agency program that encourages the development of defensible space and the prevention of catastrophic wildfire.



This fact sheet was produced in cooperation with the Colorado State Forest Service.

¹Wildfire Hazard Mitigation Coordinator, Colorado State Forest Service.

Tree spacing usually depends on the species being managed and factors such as susceptibility to windthrow or damage from heavy snow loading. For ponderosa pine and Douglas-fir, a good rule of thumb for stem spacing is diameter + 7. For lodgepole pine and Engelmann spruce, the stem spacing guide is diameter + 5. Measure diameter in inches at about 4 1/2 feet above the ground. Substitute feet for inches and add it to the spacing guide number for the proper species. For example, if the average tree to be left following your thinning was an 8-inch ponderosa pine, then use the formula $8 + 7 = 15$, for a spacing of 15 feet between trees as measured between tree stems. See Figure 3.

A greater number of wildlife trees can remain in Zone 3. Make sure that dead trees pose no threat to power lines or fire access roads.

While pruning generally is not necessary in Zone 3, it may be a good idea from the standpoint of personal safety to prune trees along trails and fire access roads. Or, if you prefer the aesthetics of a well-manicured forest, you might prune the entire area. In any case, pruning helps reduce ladder fuels within the tree stand, thus enhancing wildfire safety.

Mowing is not necessary in Zone 3.

Any approved method of slash treatment is acceptable for this zone, including piling and burning, chipping or lop-and-scatter.

Maintaining Your Defensible Space

Your home is located in a forest that is dynamic, always changing. Trees and shrubs continue to grow, plants die or are damaged, new plants begin to grow, and plants drop their leaves and needles. Like other parts of your home, defensible space requires maintenance. Use the following checklist each year to determine if additional work or maintenance is necessary.

Defensible Space and FireWise Annual Checklist

- Trees and shrubs are properly thinned and pruned within the defensible space. Slash from the thinning is disposed of.
- Roof and gutters are clear of debris.
- Branches overhanging the roof and chimney are removed.
- Chimney screens are in place and in good condition.
- Grass and weeds are mowed to a low height.
- An outdoor water supply is available, complete with a hose and nozzle that can reach all parts of the house.
- Fire extinguishers are checked and in working condition.
- The driveway is wide enough. The clearance of trees and branches is adequate for fire and emergency equipment. (Check with your local fire department.)
- Road signs and your name and house number are posted and easily visible.
- There is an easily accessible tool storage area with rakes, hoes, axes and shovels for use in case of fire.
- You have practiced family fire drills and your fire evacuation plan.
- Your escape routes, meeting points and other details are known and understood by all family members.
- Attic, roof, eaves and foundation vents are screened and in good condition. Stilt foundations and decks are enclosed, screened or walled up.
- Trash and debris accumulations are removed from the defensible space.
- A checklist for fire safety needs inside the home also has been completed. This is available from your local fire department.

Issued in furtherance of Cooperative Extension work, Acts of May 8 and June 30, 1914, in cooperation with the U.S. Department of Agriculture, Milan A. Rewerts, Director of Cooperative Extension, Colorado State University, Fort Collins, Colorado. Cooperative Extension programs are available to all without discrimination. No endorsement of products mentioned is intended nor is criticism implied of products not mentioned.



BARRICADE®

fire blocking gel

Thank you for your request for information about **BARRICADE®** Fire Blocking Gel, a revolutionary new product that is changing the science of firefighting and exposure protection.

Recently, the increasing numbers of out-of-control wildland/urban interface fires have made headlines around the world. These challenging incidents, such as the devastating fires in California and New Mexico, have threatened lives and destroyed many homes, businesses, and other structures. Even more unfortunate is the fact that firefighters have been injured and killed in their valiant efforts to fight these monsters. **BARRICADE** will finally allow your department to control these fires safely and effectively.

BARRICADE has been tested and proved in the most severe firestorm conditions in Florida's history and is being lauded by firefighters, homeowners and government officials for saving millions of dollars worth of property. **BARRICADE** was applied to some of the most severely threatened homes as the fires raced towards the community of Palm Coast on July 2, 1998. Every one of these **BARRICADE**-treated homes stood completely undamaged after the firestorm passed. Due to these historic results, the **BARRICADE** firefighters were invited to tour the area with then-Governor Lawton Chiles and Florida State Fire Marshall Bill Nelson who witnessed first-hand the incredible scenes of these houses standing tall in the middle of the fire-ravaged landscape as well as the untreated homes that were destroyed. The **BARRICADE** firefighters received a well-deserved hero's welcome by residents whose homes were saved. In the aftermath, **BARRICADE** has received worldwide media attention; being featured on *Peter Jennings World News Tonight*, *CBS This Morning*, *The Learning Channel*, *CNN*, *Discovery Channel*, *BBC's Tomorrow's World*, *RealTV* and many location stations throughout the country and the world. We've been featured in Associated Press wire service stories, on the Internet at *CNN*, *MSNBC* and *Firehouse and National Fire and Rescue* Web sites and in local news stories, too.

BARRICADE forms a unique thermal protective gel-coating that provides an amazing level of protection to structures, vehicles, fuel tanks or any object from burning when they are exposed to the effects of a fire. **BARRICADE** protects against radiant heat, direct flame impingement, flying brands and burning embers. **BARRICADE** has been specially formulated to adhere well to all exposed surfaces including walls, overhangs, wood shake roofs, metal or fiberglass surfaces, and even glass windows. **BARRICADE** can be easily applied using standard foam eductors or our specially engineered **ATAK PAK™** delivery systems.

BARRICADE can also be applied by homeowners using our *Home Fire Defense System* and a standard garden hose. This user-friendly unit allows the homeowner to apply a long lasting coating, well in advance of an approaching wildland fire, to protect their own home prior to evacuation from an endangered neighborhood. This incredible new ability will greatly reduce losses at a time when fire department resources may be stretched to the limit.

Barricade International Inc. is proud to introduce this exciting new technology. **BARRICADE** is environmentally safe and non-toxic and cleans up easily by rinsing with plain water. The advantages of its unique thermal protective properties, adhesion characteristics and coating ability now allows us to save hundreds of homes each year that would otherwise be destroyed in wildfires. **BARRICADE** truly will revolutionize the fire fighting service.

Call: **1.800.201.3927**
 or visit: **www.barricadegel.com**
 on how/where to purchase and further information

ADDITIONAL REFERENCES

- (1) **PROTECTING YOUR HOME FROM WILDFIRE** — A guide for homeowners, buyers and owners. Available from Colorado Springs Fire Department/Fire Prevention Division, call: 578-7040.

- (2) **LIVING WITH FIRE - A GUIDE TO THE HOMEOWNER** — Joint publication of the U.S. and Colorado Forest Service, Bureau of Land Management (BLM) and National Park Service. Available from Colorado State Forest Service, 113 S. Boundary, Woodland Park, CO., telephone 687-2921.