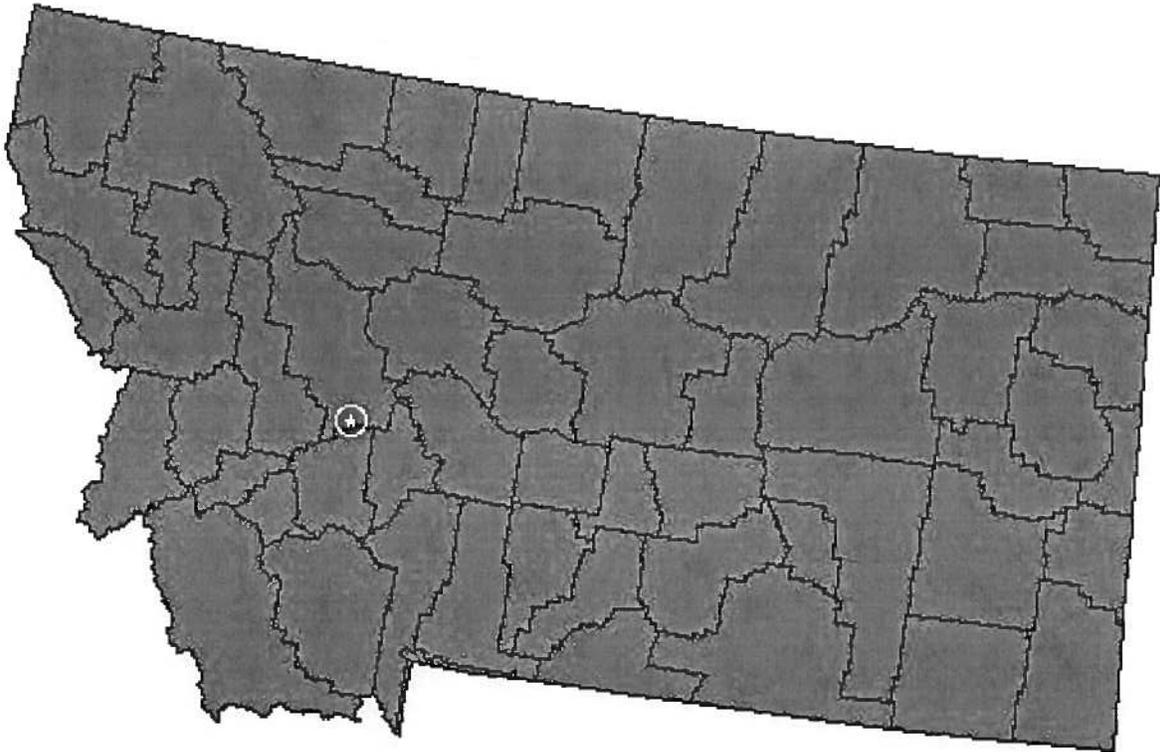


EXPANDED MONTANA FIRE MANAGEMENT PROGRAM



What do you think

Expanded Montana Fire Management Program

WHAT DO YOU THINK?

Expanded Montana Fire management program

Definitions

Fire in Montana is an ever-present and natural part of the landscape. Your views on this topic are very important to Montana fire managers as they decide how to protect houses and preserve Montana's forest and wildlife in the future. Your participation in this survey is greatly appreciated. Please read the booklet over prior to your scheduled phone interview. This will speed up your interview. Thanks.

Before you answer this survey we want to familiarize you with the following fire management terms:

Prescribed Fire or Prescribed burn: A fire purposely set in a designated area to accomplish one or more specific objectives such as removal of underbrush and dead wood to reduce available fire fuel and increase the ability to control future wildfires.

Wildfire: A fire started by human activities or a lightning strike. A wildfire, occurring under unfavorable weather conditions, can be difficult to control due to high intensity and/or rapid rate of spread.

Fire management: Consists of the following four activities: fire prevention, prescribed burning, fire detection and fire suppression.

Structural fire: A building or house that is on fire.

Health standard: The minimum level of air quality which the Environmental Protection Agency considers to be healthy.

Before beginning let me tell you that currently the federal and state agencies in Montana have in place a fire management program that both control wildfires and authorizes prescribed fire on federal, state and private rangelands.

Expanded Montana Fire Management Program

Description

What is the Current Problem?

An attempt to keep fire from burning forest and rangelands over the past several decades has helped lead to an unnatural buildup of wildfire fuel in the form of brush, dead branches, logs and pine needles on the forest floor. Generally, resulting wildfires burn very hot. As shown in Figure 1, the flames

from these wildfires burn all the way to the top of tall trees and houses and spread very fast making these wildfires difficult to put out. Under very dry conditions these high intensity wildfires burn nearly everything, frequently causing the high levels of air pollution shown in Figure 1.

WILDFIRE



Fire Spread $\frac{1}{2}$ - 2 miles/ hour, flame height 30-60 feet

Figure 1

What is a solution?

One long-term solution to the problems caused by unnatural buildup of wildfire fuel is to restore a fire cycle similar to that which existed historically in Montana.

This means having fire professional periodically set prescribed fires to clear the forest floor of the excess brush, dead branches and pine needles.

How does it work?

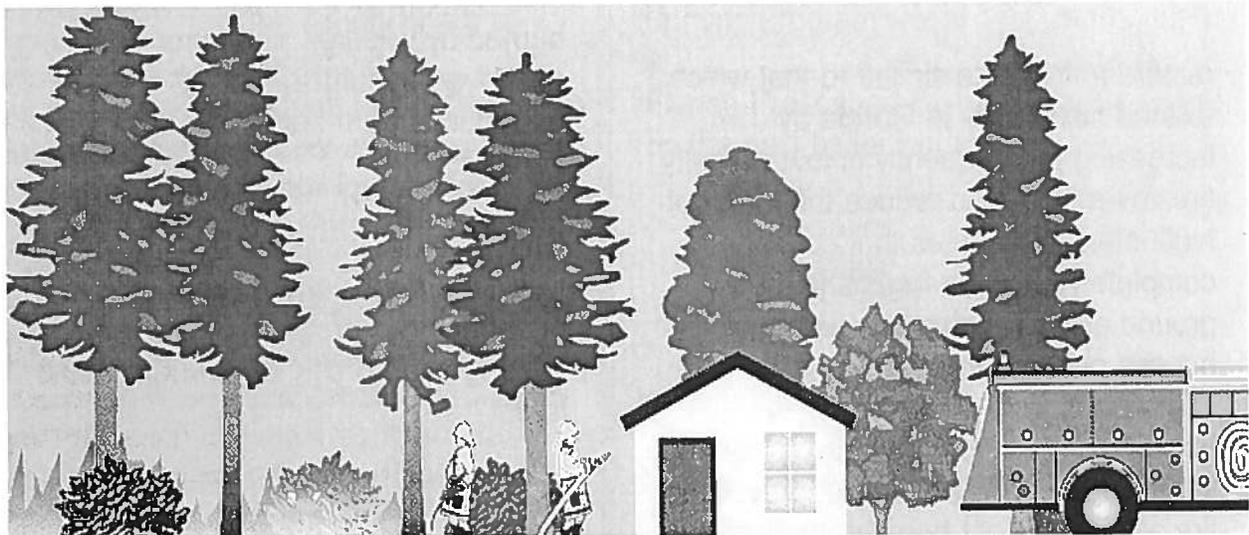
These prescribed fires are easier to manage than wildfires since, as shown in Figure 2, prescribed fires do not burn as intensely and they can be directed away from structures. While prescribed fires do result in an increase in air pollution, they generally produce far less air pollution than would a wildfire on the same acreage.

Most importantly, fire professionals reviewing the 1998 Montana wildfires suggested that areas that had been

previously prescribed burned, tended to have lower flame lengths and slower rates of spread. This slower rate of spread and lower flame length often made it possible to contain wildfires and protect structures which would have otherwise been lost.

Scientific studies indicate that under normal weather conditions prescribed burning reduces the number of acres that would burn each year from wildfires.

PRESCRIBED BURNING



Fire spread 60 – 120 feet/hour; flame height 4-8 feet.

Figure 2

What about air quality?

By timing prescribed fires with favorable weather and wind conditions, smoke can be directed away from the majority of the population. As seen in Figure 1,

wildfires generally produce more smoke than prescribed fires, and wildfire smoke can exceed health standards.

What is the Proposed Program?

Foresters, fire professional and scientists are suggesting an expanded program of prescribed burning for Montana's **XX** million acres of federal, state and private forest and rangelands to reduce the extent and damages of wildfires. Under the current program, about **XX** million acres is prescribed burned each year.

To reduce the size and damage from wildfires, and to improve the safety of both the public and firefighters, it is recommended that **XX** acres be prescribed burned each year.

Features of the Program

The new initiative for prescribed burning is believed by foresters and fire professional to be the minimum sufficient to:

- Restore a fire cycle similar to that which existed historically in Florida by increasing the frequency of low intensity fires over time, and reduce the threat of high intensity wildfires that could completely burn the forest to the ground and spread to any nearby houses or structures.
- Benefit many of Montana's native plant and wildlife species. For example, prescribed fire allows sunlight to reach the forest floor which stimulates the growth of many types of flowers and shrubs thereby providing food sources for wildlife.
- Reduce the chances of wildfire smoke exceeding air quality health standards.
- Control forest disease.

- Protect wildlife due to the slow moving nature of prescribed burns which allows wild animals to find refuge in damp areas or migrate out of the area.

Results of the Program

If the number of acres to be prescribed burned is expanded in Montana, it is expected to reduce the number of acres of high intensity wildfire and houses lost to wildfires. Currently, in a typical year approximately **XX** wildfires burn approximately **XX** acres and destroy about **XX** houses in Montana. If the number of acres prescribed burned increases, it is expected to reduce the number of acres burned by wildfires from approximately **XX** to about **XX** acres for a total reduction of **XX** acres. This represents a **XX** % reduction in acres burned by wildfire. The number of houses destroyed by future wildfires is expected to be reduced from an average of **XX** a year to about **XX**.

Given the discussion above, do you think forest managers should or should not undertake this program of prescribed burning underbrush and debris in pin forest?

1. Should
2. Should not
3. Don't know

Costs of increased prescribed burning in Montana

While prescribed burning programs such as described above have proven effective at reducing the extent and severity of wildfire, there is not sufficient funding currently available to carry out such programs on all of the **XX** million acres of federal, state and private forest and rangelands in Montana.

Who would fund this program?

If Montana is considering using some of the state revenue as matching funds to help counties finance fire prevention programs. If a majority of residents vote to pay the county share of this program, the Expanded Montana Prescribed Burning Program would be implemented in your county and other counties in Montana on State forest and rangelands

Results of the Program

If the prescribed burning program was undertaken it is expected to reduce the number of acres of wildfires shown in Figure 1 from the current average of approximately **XX** acres, for a **xx%** reduction. The number of houses destroyed by wildfires is expected to be reduced from an average of **xx** a year to about **xx**.

Your chance to vote

Your share of the prescribed burning program would cost your household \$_____ a year. If the expanded prescribed burning program were on the next ballot would you vote

1. In favor
2. Against

Alternative Method in the Montana Fire Management Program

Mechanical fire fuel reduction program

Another approach to reducing the buildup of fuels in the forest is to “mow” or mechanically chip the low and medium height trees and bushes into mulch. This is especially effective at lowering the height of the vegetation, which reduces the ability of fire to climb from the ground to the top or crown of the trees. In addition, mechanical “mowing” slows the new vegetation growth with the layer of mulch acting as a barrier.

Mowing or mulching **XX** million acres of forest and rangelands is more expensive than prescribed burning, due to increased labor and equipment needs. It would also decrease the number of ground cover plant species reducing food for wildlife. However, unlike prescribed burning, mulching does not produce any fire smoke.

Results of the Program

If the Mechanical Fire Fuel Reduction Program was undertaken instead of the Prescribed Burning Program, it is expected to reduce the number of acres of wildfires shown in Figure 1 from the current average of approximately **XX** acres each year to about **XX** acres, for a **XX** % reduction. The number of houses destroyed by wildfires is expected to be reduced from **XX** a year to about **XX**.

Your Chance to Vote

Your share of this Mechanical Fire Fuel Reduction Program would cost your household \$_____ a year. If the Mechanical Fire Fuel Reduction program was the **only** program on the next ballot would you vote

1. In favor
2. Against

A Second Alternative Method in the Expanded Montana Fire Management Program

Herbicide fire fuel reduction program

Instead of prescribed burning or mowing, a third approach to reduce the buildup of fuels in forest and rangelands is to treat vegetation with Government approved herbicides which are nontoxic to wildlife and humans. The application of herbicides, such as weed killer, with a tractor mounted sprayer would eliminate the growth of unwanted vegetation reducing the available fire fuel. This is a common practice in commercial forests in Montana.

While spraying **XX** million acres with herbicides would be less expensive than mechanically mowing, it would be more expensive than prescribed fire.

Similar to the mechanical treatment, applying herbicides would decrease the number of ground cover plant species reducing food for wildlife. However, it would not produce any fire smoke either.

Results of the Herbicide fire fuel reduction program

If the Herbicide fire fuel reduction program was undertaken it is expected to reduce the number of acres of wildfires shown in Figure 1 from the current average of approximately **XX** acres each year to about **XX** acres, for a **XX** % reduction. The number of houses destroyed by wildfires is expected to be reduced from **XX** a year to about **XX**.

Your chance to Vote

Your share of the Herbicides fire fuel reduction program would cost your household \$_____ a year. If the Herbicide fire fuel reduction program was the **only** program on the next ballot would you vote

1. In favor
2. Against

Demographics

These last few questions will help us understand how well our sample represents the State of Montana. Your answers are strictly confidential and will be used only for statistical purposes. You will not be identified in any way and your name or address will not be distributed or sold to any mailing list.

1) Have you ever been in or personally witnessed what you would consider a wildfire?

a) Yes b) No

2) Have you ever experienced smoke from a wildfire or prescribed burn?

a) Yes b) No

If Yes did it bother you?

a) Yes b) No

If Yes did it bother you...

1. Visually
2. Physically or
3. Both

3) Do you suffer from respiratory or breathing problems?

a) Yes b) No

If Yes, is it a ...

1. Serious
2. Moderate, or
3. Minor problem

4) Has your home ever burned or sustained structural damage from a wildfire?

a) Yes b) No

Yes (# of times) _____

5) Has one or more of your neighbors' homes ever burned due to wildfires?

a) Yes b) No

Yes (# of times) _____

6) Have you had to evacuate your home one or more times due to wildfire?

a) Yes b) No

Yes (# of times) _____

7) What county do you live in?

(Name of County) _____

8) How long have you lived in this county?

_____ # of years

9) What is your zip code here in Montana?

10) Was your zip the same in June 1999?

a) Yes b) No

If No, what was your zip in June 1999

11) Have you lived in other counties in Montana?

a) Yes b) No

Yes, (list counties) _____

12) How long have you lived in Montana?

_____ # years

Thank you for completing this survey. If you have any comments for us concerning this topic please feel free to express them with your interviewer

