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Are Prescribed Burning Projects Feasible in Idaho Wilderness Areas?

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SUMMARY

Can prescribed burning projects be used in the Selway Bitterroot Wilderness and Frank Church-River of No Return Wilderness? A review of the Wilderness Act of 1964 and other wilderness legislation, federal regulations, U.S. Forest Service policies, and individual wilderness management plans provides a reply to this question.

Yes, with qualifications, is our reply. The project objective must be consistent with one of the purposes of wilderness fire management. The purpose that appears to be appropriate for prescribed burning is to "Reduce, to an acceptable level, the risks and consequences of wildfire within wilderness or escaping from wilderness." Prescribed burning projects in wilderness cannot be used for the purpose of improving wildlife habitat. Before a management-ignited fire would be allowed in a wilderness area, managers must demonstrate that the objective cannot be attained with lightning-caused fire.

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Introduction

In early 2003, U.S. Senator Mike Crapo (R-Idaho) convened the Clearwater Elk Collaborative, a group of citizens interested in the management of elk in northcentral Idaho's Clearwater River basin. At the December 2003 meeting of the Collaborative in Lewiston, the issue of elk habitat management in the Selway Bitterroot (SB) Wilderness and the Frank Church-River of No Return (FC-RONR) Wilderness arose. Specifically, members of the group wanted to know: Are prescribed burning projects permissible in the SB and FC-RONR wilderness areas? The purpose of this issue brief is to reply that question.

Wilderness area management is regulated by a complex web of federal statutes, system-wide management agency regulations, and management plans for individual wilderness areas. We attempt to untangle that web as it relates to prescribed burning in the SB and FC-RONR wilderness areas. We begin by looking at laws and regulations that cover wilderness areas nationwide and then focus specifically on the SB and FC-RONR Wildernesses.

In today's terminology, fires are classified as either "prescribed fires" or "wildland fires." Prescribed fires, or prescribed burns, are planned and intentionally set under controlled conditions to obtain specific management objectives. Wildland fires are all other nonstructural fires on wildlands, including forests (USDA-FS 2004). Wildlands are, by definition, undeveloped areas where structures, if any, are widely scattered; roads, other transportation facilities, and utility lines may be present (Firewise 2004).

In this issue brief, the term "prescribed burning" means fires that are intentionally ignited by forest resource managers to achieve specific resource management objectives. More broadly defined, prescribed burning includes "wildland fire use" (WFU) or fires started by lightning that are then managed to achieve specific objectives. Beginning in the 1970s, such lightning-caused fires that were managed for resource objectives were called "prescribed natural fires" by federal land managers. Some people might consider that these fires represent a "let burn" policy, but federal wildland fire management programs have never had a "let burn" policy (NPS et al. 1998). Following the 1995 Federal Wildland Fire Management Policy and Program Review, the use of naturally ignited fires to achieve resource objectives came to be called "wildland fire use" (NPS et al. 1998, Miller 2003).

In the SB Wilderness, the terminology is expanded to wildland fire use for resource benefit (WFURB) (USDA-FS 1999a).

Prescribed burning projects often involve more than simply lighting a fire in the forest. Other project activities associated with prescribed burning may include: building roads for access, constructing fire lines and fuel breaks, cutting trees and removing them from the site to reduce fuels prior to burning, and piling slash. The specific activities associated with a prescribed burning project have a large impact on its appropriateness in a wilderness area.

What do the Wilderness Act and related policies say about prescribed burning?

The Wilderness Act

The National Wilderness Preservation System was created by an act of Congress on September 3, 1964 (P.L. 88-577). The Wilderness Act (WA) defines wilderness as an area "untrammelled by man, where man himself is a visitor who does not remain" (WA § 2(c)). Wilderness areas are "protected and managed so as to preserve [their] natural conditions" (WA § 2(c)).

The Wilderness Act left management of wilderness areas in the hands of the agencies that managed the lands before their wilderness designation. In the case of the SB and FC-RONR wilderness areas, the Forest Service, an agency in the U.S. Department of Agriculture, is responsible for management.

The Wilderness Act provides general management direction for wilderness management agencies such as the Forest Service. Section 4 of the Act addresses uses of wilderness areas, as well as the prohibition of certain uses. Prescribed burning is not mentioned specifically in the Act, but some of the activities potentially associated with it are.

The Act says that the purposes of wilderness are to be "within and supplemental to the purposes" for which national forests are established and administered by the USDA Forest Service, and nothing in the Act "shall be deemed to be in interference with the purpose for which national forests are established as set forth in" the Organic Act of 1897 and the Multiple-Use Sustained-Yield Act of 1960 (WA § 4(a)). The Act further states that wilderness management agencies are "responsible for preserving the wilderness character of the area" (WA § 4(b)), and wilderness areas are to be managed for the "public purposes of recreational,

scenic, scientific, educational, conservation, and historical use” (WA § 4(b)).

The Act prohibits permanent roads in wilderness areas. Temporary roads and the use of motor vehicles, other forms of mechanical transport, and motorized equipment are prohibited in wilderness areas,

except as necessary to meet minimum requirements for administration of the area for the purpose of [the] Act (including measures required in emergencies involving the health and safety of persons within the area). (WA § 4(c))

In addition, the Act further states under a “special provisions” section that

such measures may be taken as may be necessary in the control of fire, insects, and diseases, subject to such conditions as the Secretary [of the Department of Agriculture in the case of national forests] deems desirable. (WA § 4(d)(1))

Taken together these statutory provisions of the Wilderness Act appear to allow for prescribed burning projects, provided that they serve some wilderness purpose (WA § 4(b)) or are necessary to control fire, insects, or diseases. However, some activities such as temporary road building, or motorized vehicle and tool use that might be associated with prescribed burning outside of wilderness areas may not be permissible inside wilderness areas depending on the purpose for using them and management agency regulations.

Code of Federal Regulations

Federal agencies implement statutes passed by Congress through administrative rules codified in the Code of Federal Regulations (CFR). In the case of the Wilderness Act, the Forest Service has codified administrative rules pertaining to its management of national forest wilderness areas. Although prescribed burning is not specifically mentioned, several of the regulations may pertain to the use of prescribed fire projects.

In order to carry out the purposes of wilderness established in the Wilderness Act, national forest wilderness areas are to be managed

to promote, perpetuate, and where necessary, restore the wilderness character of the land and its specific values of solitude, physical, and mental challenge, scientific study, inspiration, and primitive recreation. To that end:

- (a) Natural ecological succession will be allowed to operate freely to the extent feasible.

- (b) Wilderness will be made available for human use to the optimum extent consistent with the maintenance of primitive conditions.

- (c) In resolving conflicts in resource use, wilderness values will be dominant to the extent not limited by the Wilderness Act, subsequent establishing legislation, or the regulations in this part. (36 CFR § 293.2)

Federal regulations assign to the Chief of the Forest Service the responsibility for identifying appropriate actions to

control fire, insects, and disease and measures which may be used in emergencies involving the health and safety of persons or damage to property. (36 CFR § 293.39(a))

Prescribed burning projects do not appear to be prohibited by the parts of the Code of Federal Regulations that implement the Wilderness Act, but again, a project’s purpose must be to promote the public purposes of recreational, scenic, scientific, educational, conservation, and historical use and to perpetuate wilderness values, i.e., solitude, physical, and mental challenge, scientific study, inspiration, and primitive recreation.

Forest Service Manual

The Forest Service Manual (FSM) is the operational handbook for the USDA Forest Service, and these policies apply to the management of all national forests. The FSM specifically addresses the management of fire in wilderness areas, including ignited prescribed fire (FSM § 2324.2):

The objectives of fire management in wilderness are to:

1. Permit lightning caused fires to play, as nearly as possible, their natural ecological role within wilderness.
2. Reduce, to an acceptable level, the risks and consequences of wildfire within wilderness or escaping from wilderness. (FSM § 2324.21)

In relation to prescribed burning, the FSM states:

6. Forest Service managers may ignite a prescribed fire in wilderness to reduce unnatural buildups of fuels only if necessary to meet at least one of the wilderness fire management objectives set forth in FSM 2324.21 and if all of the following conditions are met:
 - a. The use of prescribed fire or other fuel treatment measures outside of

wilderness is not sufficient to achieve fire management objectives within wilderness.

- b. An interdisciplinary team of resource specialists has evaluated and recommended the proposed use of prescribed fire.
 - c. The interested public has been involved appropriately in the decision.
 - d. Lightning-caused fires cannot be allowed to burn because they will pose serious threats to life and/or property within wilderness or to life, property, or natural resources outside of wilderness.
7. Do not use prescribed fire in wilderness to benefit wildlife, maintain vegetative types, improve forage production, or enhance other resource values. Although these additional effects may result from a decision to use prescribed fire, use fire in wilderness only to meet wilderness fire management objectives.
 8. Do not use management ignited fire to achieve wilderness fire management objectives where lightning-caused fires can achieve them. (FSM § 2324.22)

Regarding point 8 immediately above, recall that allowing lightning-caused fires to achieve management objectives is termed wildland fire use (WFU). With regard to WFU, Miller (2003) discusses three aspects of fire plan analysis managers should consider: [1] benefits and risks, [2] long-term consequences, and [3] landscape scales. All three are essential for supporting a WFU decision (Miller 2003).

These policies in the FSM indicate that prescribed burning projects may occur in wilderness areas, but they must be for one of the specific, documented wilderness fire management purposes. In relation to Clearwater River basin elk habitat management, the FSM policies clearly prevent the use of prescribed fire solely for the benefit of improving elk habitat (see above, FSM § 2324.22(7)).

The FSM also contains policies that relate to other activities that may take place as purposes of or activities within prescribed burning projects, including: manipulation of wildlife habitat (FSM § 2323.35a), management of forest cover (FSM § 2323.5), management of insects and diseases (FSM

§ 2324.1), and use of motorized equipment and mechanical transport (FSM § 2326).

What do the enabling acts for the two wildernesses say about prescribed burning?

The Wilderness Act of 1964 provides that only Congress can add new areas of wilderness to the National Wilderness Preservation System. Each wilderness area therefore has its own enabling act. Many enabling acts identify special provisions about permitted or restricted uses and activities in a specific wilderness area. Do the enabling acts for the SB Wilderness or the FC-RONR Wilderness have special provisions that might affect their abilities to implement prescribed burning projects? The answer appears to be “no.”

The Selway Bitterroot Wilderness was one of the original wilderness areas, added to the National Wilderness Preservation System when it was created by the Wilderness Act in 1964 (MacCracken et al. 1993), thus the Wilderness Act is the enabling act for the SB Wilderness. There were no special provisions in the Act that apply only to the SB Wilderness; rather, the provisions of the Act outlined above apply to all wilderness areas, including the SB Wilderness.

The River of No Return Wilderness was added to the National Wilderness Preservation System in 1980 when Congress passed the Central Idaho Wilderness Act (P.L. 96-312). This area was renamed the Frank Church-River of No Return Wilderness in 1984 (P.L. 98-231). Neither the Central Idaho Wilderness Act nor the renaming act contain any special provisions related to prescribed burning projects on the FC-RONR Wilderness.

What do management plans for the two wildernesses say about prescribed burning?

Two management plans for each wilderness area provide direction about the use of fire in these two wilderness areas. General management direction for the SB Wilderness is provided in the *Selway-Bitterroot Wilderness General Management Direction, 1992 Update* (USDA-FS 1992) and for the FC-RONR Wilderness in *The Frank Church-River of No Return Management Plan* (USDA-FS 2003). More specific guidance about the use of prescribed burning is provided in the *Selway-*

Bitterroot Wildland Fire Use Guidebook (USDA-FS 1999a) and the *Frank Church River of No Return Wildland Fire Use Management Guidebook* (USDA-FS 2002) for each of the two areas. General and specific guidance is as follows.

Selway Bitterroot Wilderness

The fire management section of the general management plan for the SB Wilderness (USDA-FS 1992) does not mention prescribed burning. However, the use of prescribed fire is addressed in the SB wildland fire use guidebook (USDA-FS 1999a). The guidebook says that:

Management ignited fuel treatment measures may be necessary either inside or outside the Selway Bitterroot Fire Management Unit (SB-FMU) to effect reductions in both naturally occurring fuels and hazardous fuel accumulations resulting from resource management, fire exclusion, and land use activities. (USDA-FS 1999a)

The objectives of fuel treatment measures in the SB-FMU include:

1. Mitigation of risks to firefighter and public safety.
2. Reduce the risk to private property, administrative sites, bridges, etc.
3. Reduce, to an acceptable level, the risks and consequences of wildland fire within the SB-FMU.
4. Reduce the risk of wildland fire escaping from the SB Wilderness complex.
5. Increase the opportunity for natural fire to play its role on the landscape within the SB Wilderness and other designated areas. (USDA-FS 1999a)

The SB-FMU includes the SB Wilderness as well as some adjacent national forest lands outside the wilderness. This distinction is important for determining the types of prescribed burning activities that can take place within the SB Wilderness boundary. Clearly, mechanical manipulations of fuels are not allowed within the SB Wilderness boundary, but management-ignited prescribed fires may be permissible:

Fuel treatment measures that may be used to accomplish these objectives [listed above] include prescribed fire and/or mechanical fuel manipulations within or adjoining the SB-FMU boundary. However, mechanical manipulations will not be utilized within the Selway Bitterroot

Wilderness boundary. It is intended that fuel treatment methods be planned and scheduled in conjunction with the [wildland fire use for resource benefit (WFURB)] program. The objective is to increase the probability of success of the WFURB program and reduce the threat of escape or significant damage to capital investments or other protected values. (USDA-FS 1999a)

Furthermore, the wildland fire use guidebook also states that prescribed fire is a necessary tool to restore the natural role of fire in the SB Wilderness:

Now that policy allows the use of prescribed fire in wilderness, it is possible to conduct project level NEPA analysis to implement prescribed fire use. Extending wildland fire use to area[s] outside wilderness will assist in creating conditions which limit the need to use prescribed fire inside wilderness. Both prescribed fire inside wilderness and wildland fire use outside wilderness are necessary to achieve the goal of returning fire to its natural role in the Selway Bitterroot ecosystem. (USDA-FS 1999a)

The guidebook also states that

[a]ppropriate public scoping and involvement, consideration and evaluation by interdisciplinary team, environmental analysis, and decision document are all necessary before implementation of any fuel treatment project. (USDA-FS 1999a)

The guidebook goes on to describe the following fuel treatment that might be used to mitigate fuel hazards:

- Non-treatment - let it rot.
- Disposal - Reduce or eliminate unwanted fuels onsite. Methods include manual, mechanical, and prescribed fire treatments or combinations.
- Utilization - Reduce unwanted fuels through harvest techniques with high utilization standards, free use, or fee use biomass collection.
- Rearrangement - Redistribute fuels onsite to a condition that is less hazardous or that enables more rapid deterioration or more effective disposal.
- Conversion - To less flammable vegetation or vegetation that offers less resistance to suppression.
- Removal - Remove unwanted fuels offsite for further utilization or disposal.

- Increase fire protection level - enhance fire suppression capability to deal with elevated fuel hazard. (USDA-FS 1999a)

Management direction for the SB Wilderness appears to support the use of prescribed burning, provided that it serves a wilderness fire management objective and does not include mechanical fuels manipulation within the wilderness boundary. Prescribed burning for the purpose of improving wildlife habitat is not allowed in the SB Wilderness because it is not one of the management plan objectives.

Frank Church-River of No Return Wilderness

The latest version of the FC-RONR general management plan (USDA-FS 2003) was completed in November 2003. One of its fire management objectives is:

Use wildland and prescribed fire in a safe, carefully planned and cost effective manner to benefit, protect, maintain and enhance wilderness resources; to reduce future suppression costs; and the extent possible, restore natural ecological processes. (USDA-FS 2003)

Among the fire management standards and guidelines is:

Prescribed fire will be used to reduce unnatural buildups of fuels only if necessary to reduce the risks and consequence of wildfire to an acceptable level and only where the use of prescribed fire or other fuel treatment outside of wilderness is not sufficient to achieve fire management objectives within wilderness. (USDA-FS 2003)

Also noteworthy is one of the standards and guidelines for fish and wildlife resources:

Habitat improvements will not be conducted except as an indirect effect of reverting human-altered ecosystems back to conditions that are more natural. (USDA-FS 2003)

These objectives, standards, and guidelines for fire management on the FC-RONR Wilderness are all consistent with the Forest Service Manual policies on the use of fire in wilderness. As stated previously, if the purpose of a prescribed burning

project is to improve habitat for elk, then it appears to be prohibited within the FC-RONR Wilderness.

The wildland fire use guidebook for the FC-RONR Wilderness (USDA-FS 2002) is very similar in form and content to that of the SB Wilderness. In fact, Appendix C, where the quoted material in the previous section of this issue brief is located, is quoted verbatim, substituting “FC-RONR” for “SB” references, with two notable exceptions.

First, in the statement prohibiting “mechanical manipulations” in the SB Wilderness, the reference to the SB Wilderness is left in; nothing is mentioned about such a prohibition in the FC-RONR Wilderness. Second, the statement that “Both prescribed fire inside wilderness and wildland fire use outside wilderness are necessary to achieve the goal of returning fire to its natural role in the Selway Bitterroot ecosystem” appears as such in the FC-RONR plan, without adding any reference to whether or not the statement also pertains to the FC-RONR Wilderness. Whether these two references to the SB Wilderness are intentional or are artifacts of copying the text verbatim from the SB plan to the FC-RONR plan is unknown and perhaps unknowable.

Elkhorn/Jersey Ignition Project

The Nez Perce National Forest is implementing the Elkhorn/Jersey Ignition Project. The Elkhorn/Jersey project is applying management ignited fire on approximately 12,500 acres, including 8,800 acres in the FC-RONR Wilderness. The purpose of the project is “to improve the probability of allowing natural fire to play its role” within the Salmon River Breaks area, which includes a portion of the FC-RONR Wilderness (USDA-FS 1999b).

The Elkhorn/Jersey project was proposed in 1997. After two Environmental Assessments to satisfy National Environmental Policy Act (NEPA 1969) requirements and several administrative appeals, the project was approved in 1999. Four phases of the project occurred in the springs of 2000, 2001, 2002, and 2004. Site and weather conditions prevented burning in 2003. The last phase of the project is planned for spring 2005 (T. Button, personal communication, 12 January 2004).

Conclusion

Can prescribed burning projects be used on the Selway Bitterroot Wilderness and the Frank Church-River of No Return Wilderness? The answer appears to be “yes” provided that a project serves one of the purposes of wilderness fire management. The purpose that appears to be appropriate for prescribed burning is to “Reduce, to an acceptable level, the risks and consequences of wildfire within wilderness or escaping from wilderness.”

Justification for a project also must show that lightning-caused fires cannot attain the wilderness fire management objective before management ignition would be allowed. All prescribed burning projects within wilderness must complete a NEPA analysis including “Appropriate public scoping and involvement, consideration and evaluation by interdisciplinary team, environmental analysis, and decision document.” The Elkhorn/Jersey prescribed burning project, which includes part of the FC-RONR Wilderness, appears to have satisfied all the necessary conditions for prescribed fire in wilderness and has been implemented successfully.

Prescribed burning projects in wilderness cannot be used for the purpose of improving wildlife habitat. In addition, some activities that are often part of prescribed burning projects, such as the use of motorized equipment or mechanical transport, likely are not permissible when prescribed burning projects take place within wilderness areas.

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