B&B Fire Recovery ProjectRecord of Decision

Sisters Ranger District, Deschutes National Forest Jefferson and Deschutes Counties, Oregon



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RECORD OF DECISION AND NON-SIGNIFICANT FOREST PLAN AMENDMENTS

B&B Fire Recovery Project

USDA Forest Service Sisters Ranger District, Deschutes National Forest Jefferson and Deschutes Counties, Oregon

I. INTRODUCTION

This Record of Decision (ROD) documents my decision and rationale for the selection of Alternative 2, with some minor modifications, to be implemented for the B&B Fire Recovery Project.

My rationale for this decision is based on an Environmental Impact Statement (EIS) for the proposed harvest of fire-killed trees, fuels reduction and reforestation within harvest units, removal of trees posing a danger to public safety and reduction of unneeded roads within a portion of the Link and B&B Complex fire perimeters. The EIS addresses: 1) the proposed action and four additional alternatives – including no action; 2) the major issues associated with the proposal; and 3) the direct, indirect, and cumulative environmental effects that would result from the implementation of the proposed action or any of the alternatives. The Final EIS is available upon request from the Sisters Ranger District at P.O. Box 249 in Sisters, Oregon or by calling 541-549-7700.

II. DECISIONS TO BE MADE

This Record of Decision documents my specific decisions and rationale for the B&B Fire Recovery Project. These decisions reflect actions proposed in the Preferred Alternative (Alternative 2) with the addition of three miles of road decommissioning as described in Alternative 5 and include (see FEIS Chapter 2 p. 2-23-35 and Appendix E):

- Commercial salvage harvest on up to 6,823 acres within Matrix, Late-Successional Reserve (LSR) and Administratively Withdrawn allocations;
- Fuels reduction within treatment units on up to 6,823 acres within Matrix, LSR and Administratively Withdrawn allocations; this includes biomass removal (fuels reduction via removal of merchantable wood products such as posts, poles, firewood) within treatment units on up to 5,848 acres within Matrix, LSR and Administratively Withdrawn allocations;
- ➤ Reforestation within treatment units on up to 6,823 acres within Matrix, LSR and Administratively Withdrawn allocations;
- > Danger tree felling along up to 146 miles of haul routes;
- ➤ Danger tree removal along up to 129 miles of haul routes (including 3 miles within Riparian Reserve)- these 129 miles are a subset of the 146 miles identified for danger tree felling;
- ➤ Decommissioning 54 miles of road; (3 miles of which were originally part of Alternative 5 and are now included as part of Alternative 2-Modified)
- Closure of 20 miles of road;

- ➤ Construction of up to 5.1 miles of temporary roads, and their subsequent restoration when activities are completed;
- ➤ Implementation of all Resource Protection and Mitigation Measures
- Adoption of two short-term, site specific Deschutes Forest Plan Amendments concerning visual quality and fuelwood collection standards and guidelines.

The scope of my decision is limited to actions described in the B&B Fire Recovery Project Final Environmental Impact Statement and this Record of Decision. The decision I have made is site-specific, non-programmatic, and does not reflect a general management plan for the B&B Fire Recovery Project area. The activities included with my decision, after the inclusion of two site-specific forest plan amendments are consistent with guidance and direction provided by the 1990 Deschutes Land and Resource Management Plan as amended. The Decision is described in more detail beginning on page 18 of this ROD.

III. BACKGROUND AND PROJECT AREA

The B&B Fire Recovery Project (Project) area is located within the combined area burned by the Link and B&B Complex fires of 2003. This area is located approximately 15 miles northwest of Sisters, Oregon, west, southwest and northwest of Camp Sherman, Oregon, within Jefferson and Deschutes Counties and on the east slope of the Cascade Mountains (see Map ROD-1). Of the 94,281 acres affected by the Link and B&B Complex fires, approximately 69,659 acres are located on the Sisters Ranger District of the Deschutes National Forest (DNF). Approximately 28,724 acres of Congressionally designated Wilderness, Research Natural Areas and Inventoried Roadless Areas have been excluded from the project boundary, while 40,935 acres are within the project boundary. These National Forest System lands are described within the Deschutes National Forest Land and Resource Management Plan (DLRMP) as amended.

The project area lies within the Metolius watershed which, I recognize, is highly valued for its unique character – the Metolius River is spring fed and one of the most stable rivers in the world for its size, and supports one of the healthiest bull trout populations in the state. The watershed is also known for its large ponderosa pine trees and scenic views, and contains the only global population of the Peck's penstemon wildflower. Elevations in the project area range from 2,600 feet near the Metolius River to 5,280 in the upper watershed. Several plant association groups including both wet and dry mixed conifer, ponderosa pine and lodgepole pine associations are found within the project area. The project area also lies within the ceded lands of the Confederated Tribes of the Warm Springs Reservation of Oregon. Table ROD-1 provides the legal description of the project area.

Table ROD-1. Legal Description of the Project Area

| Township | Range | Sections * | | | | |
|-----------------------------------------------------------------------------|--------|-----------------------|--|--|--|--|
| 10 South | 8 East | 35 & 36 | | | | |
| 10 South | 9 East | 31-35 | | | | |
| 11 South | 8 East | 1,2,11-16,21-28,33-36 | | | | |
| 11 South | 9 East | 2-11,14-22,28-32 | | | | |
| 12 South | 8 East | 1-4,9-16,21-29,32-36 | | | | |
| 12 South | 9 East | 5,6,7,18,19,30,31 | | | | |
| 13 South | 8 East | 2,3 | | | | |
| Note: * Sections wholly or partially contained within the project boundary. | | | | | | |

On July 5, 2003, the Link wildfire ignited in the southern portion of the Metolius watershed. This fire burned for 11 days and contained approximately 3,589 acres within the burn perimeter. Later in August two separate fires ignited on the afternoon of the 19th – the Bear Butte and the Booth fires. These fires eventually burned together and were managed as one incident – the B&B Complex - which affected approximately 90,692 total acres – the largest fire in the history of the Deschutes National Forest.

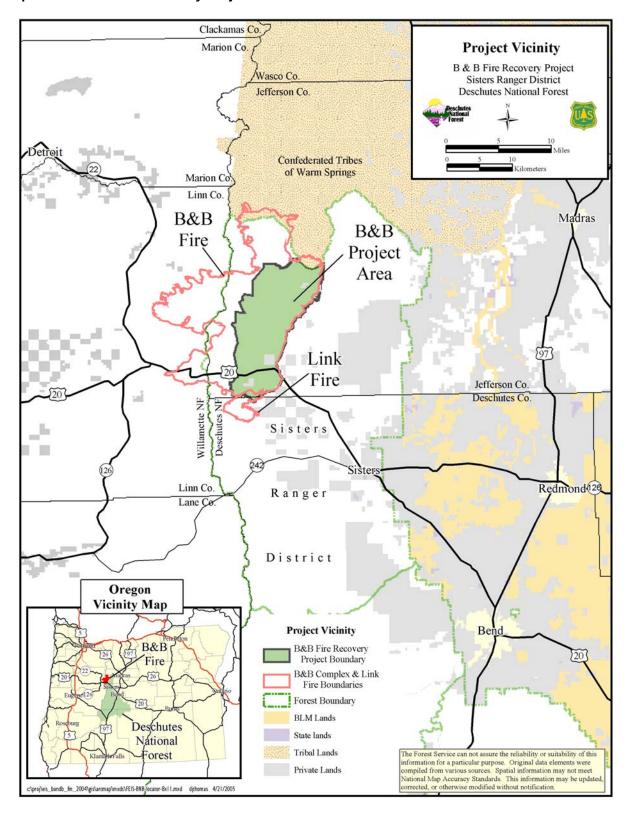
From its start, the B&B Complex fire exhibited extreme fire behavior (NWCG 2004) with large acreage gains, reaching over 90,000 acres in early September. Several days of precipitation, moister conditions and cooler temperatures in mid-September led to containment of this fire. However, burning within the interior of the perimeter continued for several more weeks (Great Basin Incident Management Team 2003).

During the century between 1900 and 2000, large fires occurred within the watershed affecting an average of 3.8 percent of the watershed within any given ten year period. Fire exclusion and suppression over this same period has altered the historic fire regimes of forests on the east side of the Cascade Mountains - fire return intervals have increased as have fuel loadings and ladder fuels (USDA FS 1996). As a result, the risk of fires that lead to significant vegetation mortality has increased. Fires larger than those considered typical of the previous century with regard to their spatial extent have occurred within the watershed in 2002 and 2003 (Eyerly, Cache Mountain, Link, and B&B Complex Fires). These recent fires covered approximately 54 percent of the watershed in two years, four times as many than burned in the previous 100 years (USDA FS 2004).

A substantial percentage of the Link and B&B Complex (referred to as the B&B Complex or "fire" in the remainder of the document) burned with enough intensity to kill either the majority of trees in a stand or the entire stand (high mortality). Based on satellite imagery it was estimated that over 30,000 acres (~32%) burned with high mortality resulting in stand replacement (FEIS p. 1-6).

Table ROD-2. Fire Effects by Vegetation Type

| Plant Association | Fire Effects Within Project Area | | | | | | |
|-------------------|-------------------------------------|------|-----------------|------|------------------------------|------|--|
| Group | High Mortality Stand Replacement | | Mixed Mortality | | Low Mortality Underburned | | |
| Dry Mixed Conifer | 12,182 ac | 28 % | 5,076 ac | 12 % | 8,122 ac | 19 % | |
| Wet Mixed Conifer | 4,568 ac | 10 % | 1,958 ac | 4 % | 4,351 ac | 10 % | |
| Ponderosa Pine | 709 ac | 1 % | 472 ac | 1 % | 2,756 ac | 6 % | |
| Lodgepole Pine | 290 ac | <1 % | 152 ac | <1 % | 282 ac | <1 % | |
| Riparian | 319 ac | <1 % | 44 ac | <1 % | 263 ac | <1 % | |
| High Elevation | 13 ac | <1 % | 0 ac | 0 % | 0 ac | 0 % | |



Map ROD-1. B&B Fire Recovery Project Location

In making this decision, I have fully considered the effects of efforts to rehabilitate the post-fire landscape that were initiated immediately following the fire and are within various stages of completion. These efforts include: 1) suppression rehabilitation; 2) burned area emergency rehabilitation (BAER); 3) other critical rehabilitation; and 4) danger tree removal along open roads and areas of concentrated use to reduce public safety hazards.

Fire suppression rehabilitation focused on repairing or rehabilitating impacts to resources caused by suppression activities during the fire. These actions included: water barring, ripping, leveling and recontouring, and restoring drainage to dozer line (76.8 miles), hand line (8.9 miles), safety zones and drop points (32 acres) (FEIS p. 3-6). This was followed by burned area emergency rehabilitation (BAER). The BAER process identified emergency actions needed to reduce the fires effects to water quality, to protect soil from erosion, to prevent the spread of noxious weeds and to improve public safety (FEIS p. 3-6).

Other critical rehabilitation actions were also implemented as follow-up to the BAER process and included riparian and upland tree planting, culvert maintenance and additional noxious weed spread reduction and prevention work. Public safety concerns were partially addressed during the B&B Road Hazard Project which removed danger trees along 122 miles of forest roads within the B&B Complex Fire area (FEIS p. 3-8).

This Project – the B&B Fire Recovery Project - was initiated to recover economic value from fire killed timber while promoting and accelerating the recovery of large tree structure through fuels reduction and reforestation to restore the desired ecological conditions on the treated units. The B&B Fire Recovery Project also addresses public safety concerns along roads and within concentrated use areas not previously addressed in the B&B Hazard Tree Project. The B&B Fire Recovery Project also proposes numerous road closures to improve watershed and wildlife habitat conditions.

In addition to these actions, other restoration work may still be proposed in the future, such as additional road maintenance, decommissioning or closure, noxious weed removal and eradication, fuels reduction work, habitat restoration or reforestation in areas outside those already reforested or proposed in the B&B Fire Recovery Project. This is not an exhaustive list of potential future actions, but rather is meant as an example of actions that could be pursued in the area in the future depending on funding and priorities.

IV. DESIRED CONDITIONS IN THE POST-FIRE ENVIRONMENT

In the past several years I have witnessed numerous large fires, including the largest fire in the history of the Deschutes National Forest, burn across various areas and change the landscape of the Forest. In response to the fires of 2002-2003 the Deschutes National Forest has completed several major post-fire recovery planning efforts, including the Eyerly Fire Salvage Project FEIS, 18 Fire FEIS, and Davis Fire Recovery Project FEIS. The B&B FEIS represents the last post fire recovery effort to be completed in response to the 2002-2003 fires. While wildfire is a natural component of healthy ecosystems, past management and policies such as fire suppression have created unnaturally high fuel loads and ladder fuels that aid in the spread and intensity of our modern fires. Some of the more urgent and immediate post-fire recovery actions as described in the previous section focused on protecting and stabilizing soil resources, protecting water quality, minimizing the introduction and expansion of non-native plant species and ensuring public safety in and around wildfire areas. The long-term focus is to ensure and hasten the healthy rehabilitation of ecological function and the restoration of more sustainable habitat and biological diversity. This FEIS is one component of post-fire management within the Metolius Watershed (FEIS p. 1-11).

Many of the emergency and urgent short-term concerns following the fire have been addressed. The B&B Fire Recovery Project addresses specific concerns centered on promoting and accelerating the development of longer term desired conditions we want to see in the Metolius watershed in the future – i.e. setting development of forest conditions on a trajectory that will lead to the development of the resources and values for which this area is renowned. The Project bridges the gap between immediate fire recovery activities and activities that may occur in the future to foster that recovery. The Project addresses the temporary economic value remaining in the area while preparing areas for recovery through responsible fuels reduction and reforestation.

As a result of the landscape level changes caused by the recent fires in the Metolius Basin, the Sisters Ranger District also updated the 1996 Metolius Watershed Analysis (WA) to identify and assess the longer-term concerns presented by the burned landscape. The WA described numerous findings, trends and recommendations within the basin. These are fully described within the Watershed Analysis and are incorporated by reference in the EIS (USDA FS 2004). The WA recommends actions to move existing conditions towards the desired future conditions. Some general recommendations from the WA include:

- Protect Aquatic Systems and Fish Habitats
- Restore Forest Habitats and Continue to Reduce Risks
- Address Social Concerns

In addition to the WA, I also directed the District staff to develop several other efforts to focus on moving specific resources towards a desired condition. These include a Fire and Fuels Strategy - which describes a strategy for managing fuel loads across the entire landscape and moving conditions back towards the natural range of variability; a Snag Strategy - which describes a strategy for managing snag habitat across the entire landscape; a Northern Spotted Owl Strategy - which describes a strategy for managing remaining and potential nesting, roosting, and foraging (NRF) habitat across the landscape; and the B&B Area Roads Analysis - which discusses management of forest roads within the B&B Complex Fire area (FEIS appendix A).

I considered the analysis in all of these larger landscape analyses and strategies which provide goals and recommendations for the landscape affected by the recent fires. They provide a context for post-fire restoration projects including the B&B Fire Recovery Project. The B&B Fire Recovery Project is one component of post-fire management within the Metolius Watershed and B&B Complex Fire area and will help move the specific areas treated towards desired conditions. I have considered and reflected upon existing and updated plans and assessments to help determine the best course of action to take in the post-fire recovery of this area.

In addition, the Metolius Conservation Area direction in the 1990 Deschutes Forest Plan describes the Metolius Basin as (FEIS p. 1-12) -

"...truly unique in the quality and diversity of its natural resource and spiritual values. The River's headwaters well from the ground in scenic springs, ensuring pristine water quality and excellent fisheries. Abundant rainfall and rich soils have combined to produce luxuriant forests of fir, cedar, larch and ponderosa pine which have contributed greatly to the demand for forest products locally and regionally. Big, yellow-barked ponderosa pine trees are a highlight of the Basin. The Metolius ecosystem provides habitat for a wide variety of plant and animal species."

"...a unique ecosystem represented by large yellow-belly ponderosa pine and spring fed streams... [with] peaceful, park-like forests of ponderosa pine and western larch...[and] mature and over mature forests having large trees, snags, and dead downed material. Stands with two or more canopy levels will be seen, but will highlight the largest trees in the stands." (USDA FS 1990)

The Metolius Late Successional Reserve Assessment described in the Metolius LSR (USDA FS 1996) as an area which (FEIS p. 1-12 to 1-13):

"provide[s] sustainable vegetative conditions within the natural range of variability typical of the Eastern Oregon Cascade Province where succession of vegetation occurred under natural fire regimes."

The recent wildfires have altered the landscape and moved much of the Metolius watershed outside the range of desired conditions. The lower elevation, drier forest of the Metolius watershed is a fire adapted ecosystem which has been diverted from natural fire cycles for a long time, which, as evidenced by the B&B Complex fire, can have large scale, devastating effects (FEIS p. 3-136). The build up of excessive fuel loads and development of ladder fuels contributed to the size and extent of the B&B Complex and the fire has left excessive levels of dead and down fuels in its wake that are also far outside their natural range of variability for the Metolius watershed. The B&B Fire Recovery Project is a step in the direction of returning fuels and vegetation to a desirable natural range in order to reintroduce fire in the ecosystem and manage the area in a condition similar to its natural condition (FEIS p. 3-155).

In design of the project I considered all the areas of the fire and decided to focus on a small percentage of the landscape where salvage harvest, fuels reduction and reforestation are appropriate and feasible. Many areas are not economically feasible for the type of treatment proposed in the Project. Other areas, while not inappropriate for salvage harvest, have other concerns that prompted me to exclude them from the project. For instance, because of the high value of water quality and fisheries within the Metolius watershed I have decided not to salvage harvest in Riparian Reserve areas (with the exception of several acres for danger tree removals), because they function to trap sediment and protect the water quality within the stream. I have also decided not to salvage harvest low mortality or underburned ponderosa pine and Douglas-fir stands and higher elevation (lodgepole pine) stands that burned with a stand replacement fire since these areas burned with a pattern and intensity within their natural range of variability which is what we want to see occur; and all nesting stands or spotted owl nesting, roosting and foraging areas remaining in the area were also avoided since much of this type of habitat was lost as a result of the fires (FEIS p. 1-21 to 1-23).

The B&B Fire Recovery Project proposes treatment on at most 7 percent of the fire area, which would retain 93 percent of the area in an unsalvaged condition. Within the 7 percent of the area treated, economic recovery (through salvage and biomass removal) would occur, which also serves to reduce fuel loads. Additional fuels removal would occur as well as reforestation to accelerate the future development of large trees. The accelerated development would contribute to restoring lost habitat for spotted owls sooner when compared to other areas of the landscape. These areas would also be prepared for the reintroduction of natural or prescribed fire to restore fire as a component of the ecosystem.

V. PURPOSE AND NEED

Based on the considerations discussed below, the purposes of this project within the B&B Fire Recovery Project Area are to:

- Harvest fire killed timber that has economic value.
- Reduce fuels within salvage units to desired levels, which will:
 - o promote the restoration of fire as a component of healthier ecosystems, through the application of prescribed fire;
 - o reduce fuel hazard within defensible space to improve suppression effectiveness and reduce fire intensity for protection of communities at risk and existing and developing spotted owl habitat.
- Reforest desired tree species (where natural, on-site, seed sources are lacking) within salvage
 units to aid in the accelerated development of desired forest conditions consistent with
 management plan objectives.
- Improve public, administrative and operational safety by removing danger trees along commercial haul routes and areas of concentrated public use.
- Reduce open road densities, particularly within Late-Successional and Riparian Reserves, to help protect and improve late-successional and watershed conditions, and the associated fisheries and wildlife habitat.

The recent wildfires in the Metolius Basin have created large expanses of fire killed and damaged vegetation, and created many areas that have been returned to a stand initiation phase. The recent fires have created new landscape patterns that in some ways resemble historic patterns with complex edges, some gradual edges and live remnants and legacies. While fire is a natural part of the forest landscape and disturbance regime, some portions of lower elevation mixed conifer and ponderosa pine forest areas have experienced fires in the past eight years that were outside their natural fire regime, that are uncharacteristic in size and mortality and unprecedented in the previous 100 years more trees in lower elevation forests are dead and damaged than would have likely occurred historically and patch sizes of dead trees are larger than historic patch sizes (FEIS p. 1-4, 3-109). There are several large, early seral patches in the areas of Cache Mt., Round Lake and Abbot Butte (USDA FS 2004c).

The fires have created an abundance of standing dead and damaged trees in the watershed and created a fleeting window of opportunity to harvest and utilize fire killed trees for commercial wood products while maintaining the necessary ecosystem components to provide for other resources such as wildlife and soil productivity. In the interest of contributing to local and regional economies, and in order to generate funds to help accomplish important additional post-fire restoration activities, the first objective I considered was salvage harvest of the fire killed timber that has economic value.

I have made this decision primarily because there is a demand for lumber and various wood products throughout the region and removing fire-killed trees through salvage logging would provide sawtimber and other wood products to the local and regional economies (FEIS p. 3-185, 3-190). The economic benefits that could be realized through salvage of fire-killed trees includes jobs, both locally and regionally and would also provide funds to help offset the costs of other restoration work such as fuels removal, reforestation and road closures (FEIS p. 3-196). I also realize that fire-killed ponderosa pine and mixed conifer trees quickly lose commercial value after the fire and their suitability for sawtimber decreases as the quality of the wood rapidly deteriorates. Without prompt

action this value could be lost. I feel it is prudent to move forward as quickly as possible to recover some economic value while providing for the recovery of the post-fire area.

Most of the project area was historically a short interval fire adapted ecosystem (FEIS p. 3-134). The abundance of standing dead and damaged trees remaining as a result of the wildfire is short-lived and as the wood deteriorates the standing trees will fall and become surface fuels. These fuels will pose a risk to regenerated forest stands and will limit the use of prescribed fire as well as impede safe and effective wildfire suppression (FEIS p. 3-139). By removing a portion of the fuels and dead trees now we can facilitate reintroduction of fire into the ecosystem in the future, reduce the risk of fire to the new forest and facilitate the thinning of new stands, which in turn would accelerate growth and vigor of the trees. By promoting the long–term survival and growth of new conifers through fuel loads that are more characteristic for drier eastside forests we can reduce the likelihood of stand replacement fire in newly regenerated stands, particularly during early stages of stand development. Elevated fuels levels also create future fire risk and create a potential threat to public safety in wildland-urban interface areas, major road corridors and also to existing or developing northern spotted owl NRF areas (FEIS p. 3-138). By reducing fuel loads in these areas we can help reduce the potential for high intensity fire, thereby reducing risk to firefighters and equipment and improving the effectiveness of suppression actions (see FEIS p. 3-171 and Appendix A – Fire/Fuels Strategy).

While salvage harvest removes wood with economic value it also reduces overall fuel loads in the areas treated. However, potential fuels would remain on the site. For this reason I considered a second objective of reducing the fuels loads within salvage units to desired levels that would promote the restoration of fire and improve suppression activity effectiveness especially around communities and valuable resources. The salvage of dead and damaged trees, followed by fuels reduction treatments within salvage units, would reduce fuel loadings and arrangements to levels that are manageable for fire control and ecosystem functioning.

I am also concerned about the development and composition of the next forest in these areas. Another objective for this project, critical to reaching desired conditions, is the successful and accelerated development of the next forest – reforestation with desired tree species within the salvage units will aid in the accelerated development of the desired forest conditions (FEIS p. 3-1123 to 3-127). The recent wildfires have pushed the forest vegetation structure and tree size further outside the natural range with fewer older, large trees over 21 inches in diameter. We can accelerate the restoration rate of desired forest conditions, including late-successional forest habitat through planting and reducing competition. The natural regeneration of conifer species after fire is dependent on seed dispersal from remaining live trees. In many areas of mixed mortality fire white fir regeneration is apparent. However, reestablishment of this species would not meet the long term goals established in the 1990 Forest Plan as amended by the 1994 Northwest Forest Plan (FEIS Appendix H). In large areas of high mortality and stand replacement fire, adjacent seed sources of desired species would not likely be available. By replanting the desired species mix we can ensure the timely establishment of species desirable for long-term objectives.

The presence of unstable, dead trees along roadsides, trails and other high use areas presents a hazard to public safety for forest workers and public users. While a previous project – the B&B Road Hazard Project – did remove many of the public safety hazards along high use roads within the fire areas, there are still dangers to be addressed including approximately 96 miles that are currently unsafe for public transit. I want to provide for safe and efficient access for the movement of people and materials across National Forest lands in the area, so another objective I have is to improve the public and administrative safety by removing danger trees along the haul routes in the project area. By removing these danger trees, risks to human safety in the burned areas would be reduced.

The project area currently contains approximately 5.9 miles of road per square mile (FEIS p. 3-178). Forest roads provide accessibility to forest lands, however, they also fragment wildlife habitat, contribute to the spread of invasive weeds, affect surface water runoff, and increase erosion and sedimentation in streams. Through closure and decommissioning of roads we can reduce or reverse these effects (USDA FS 1990). My final objective for this project is to reduce open road densities to improve forest habitat conditions including, late successional habitat, and watershed conditions. I consider this an important objective for the area, to aid in its long-term recovery.

VI. PUBLIC PARTICIPATION

Management of the post-fire environment within the areas burned by the B&B Complex emerged as a concern even before the fires were extinguished. I have heard clearly the strongly held beliefs and opinions of the various individuals and groups surrounding post-fire management and realize that scientific literature exists to support these beliefs and opinions on all sides, depending upon the site specific circumstances. These concerns, coupled with the attention and interest focused on the project area, prompted me to seek a wide variety of interests, opinions and suggestions from various individuals and groups interested in the project (FEIS p. 4-8 to 4-13). We hosted several site visits and tours of the area for the general public and I also supported other public field trips presented by the Oregon Forest Resources Institute (OFRI). We also provided a tour for the conservation group leaders in conjunction with Oregon Natural Resources Council (ONRC). A total of 22 tours and field visits were conducted to the project area and over 1,500 people were contacted during the course of project development.

I also made extensive efforts to involve the scientific community throughout the process beginning with field tours and discussions in the fall of 2003, with Pacific Northwest Research Station and Oregon State University scientists. The Forest hosted a dead wood symposium the winter of 2004. This was followed by a one-day information sharing meeting regarding the specific proposal for the project in the Fall of 2004, and meetings with individual researchers following the release of the Draft EIS to further involve them and include their views in the process. We requested that each researcher that reviewed the DEIS pay particular attention to the science and published reports for postfire management and how that related to literature cited that findings in the DEIS were based on. As a result the researchers found that we had in fact displayed the most applicable and recent scientific information upon which to base our findings. Several of the researchers did provide us with additional literature to augment our analysis which was reviewed and incorporated into the FEIS.

I also sought feedback and suggestions from the B&B Working Group of the Deschutes Provincial Advisory Committee, which met several times throughout the development process to offer suggestions and insight. This group is composed of a wide range of individuals with various backgrounds – from government representatives, local citizens, environmental activist groups and industry representatives.

Early in the process a Steering Committee composed of District, Forest and Regional Forest Service staff as well as a representative from USFWS was convened to discuss development of the project at each step. This Steering Committee provided feedback and valuable insight as well as lessons learned from a broader perspective – the B&B Fire Recovery Project is the last post-fire salvage project in the Region after a series of projects in the wake of the 2002 and 2003 fire seasons.

Feedback and input were solicited from the public early and often in the project development process. The Notice of Intent (NOI) was published in the Federal Register on July 30, 2004, which began a 30-

day public scoping period requesting public comment on the proposal. As a result of these scoping efforts written comments were received from 55 interested parties. These comments addressed a wide range of concerns and interests and were used in the development of a reasonable range of alternatives, including the No Action alternative and the identification of key issues (FEIS p. 3-39). Four Key Issues were identified (FEIS p. 1-41 to 1-43) and are discussed in the next section of this ROD.

We then sent the B&B Fire Recovery Project Draft EIS to the public and appropriate local, state, federal and tribal authorities beginning the week of February 28, 2005, and the Notice of Availability was published in the Federal Register on March 4th. A required 45-day comment period (40 CFR Sec. 1506.10) was provided between March 4, 2005 and April 18, 2005. Individuals and agencies who received the document were invited to comment. Within the comment period we received 201 responses containing 591 original comments in the form of postal letters, e-mail messages, documented phone calls and office visits. We received letters from 4 states with the majority by far coming from Oregon. Most responses came from individuals; however, one state agency, two federal agencies, 3 wood product groups and 11 environmental groups also submitted comments on the DEIS. The Environmental Protection Agency commented on the Draft EIS and noted several concerns. Based on clarifications made in the FEIS and discussions with the agency, the EPA is now satisfied that their concerns have been addressed. As a part of the release of the DEIS, the public was notified that I intended to request an Emergency Situation Determination for this project.

The FEIS Response to Comments (Appendix C) describes the substantive comments that we received on the DEIS and provides our response. Every substantive comment and suggestion has value, whether expressed by one respondent or many. We read and evaluated all input and the comment analysis team attempted to capture all relevant public concerns in the analysis process. The public comments we received are located in the B&B Fire Recovery Project record, on file at the Sisters Ranger District, and are available for public review.

VII. ISSUES

During public scoping and comment on the Draft EIS we received and evaluated individual comments to determine whether they constituted issues relevant to this planning process. We then determined where in the planning process they most appropriately applied – project design; alternative development, or environmental effects. The concerns that applied to all parts of the planning process were further evaluated to determine the 'Key Issues.' Key Issues can drive the development of an alternative, involve resources that may be adversely affected by the proposed action, or involve unresolved conflicts regarding alternative uses of available resources. Key issues provide focus for our analysis and are used to compare and contrast the environmental effects of the alternatives.

The planning team described and I concurred with the following 'Key Issues' for this planning process:

- ➤ Effects to Water Quality from Sedimentation
- > Effects to Soils Productivity
- ➤ Effects to Wildlife Habitat Snags and Downed Wood
- ➤ Effects to Wildlife Habitat Northern Spotted Owl Habitat

It is important to display the appropriate risks and benefits associated with management activities for these concerns.

Effects to Water Quality from Sedimentation

Actions described in the B&B Fire Recovery Project could pose an increased risk of sedimentation to streams in the area in addition to the effects caused by the B&B Complex. The fires have removed or reduced ground vegetation and debris which helps stabilize soils and reduce the risk of overland flow that leads to increased sedimentation. The Metolius watershed is highly valued for its fisheries habitat and presence of bull trout, redband trout and potential Chinook salmon habitat. I want the actions we take to consider the effects and trade-offs to these valuable resources. I recognize that activities which cause ground disturbance such as salvage of trees and road closure can cause short-term increases in sedimentation while road closures can cause long-term reduction in sedimentation. This issue is addressed in project and alternative design and is discussed at length in the FEIS (pp. 1-41, 3-56 to 3-3-103).

Effects to Soils Productivity

The maintenance of soil productivity is an important objective for forest management as described in the Forest Plan. Changes to soil productivity can affect our ability to guide development of the desired conditions we want to see in the area. Activities we engage in may alter properties and/or components of the soil resource inherent to soil productivity such as compaction, displacement and nutrient availability. Several areas within the watershed have elevated erosion risks associated with the burned area. This issue is addressed in project and alternative designs and is described thoroughly in the FEIS (pp. 1-41, 3-14 to 3-55).

Effects to Wildlife Habitat – Snags and Downed Wood

Since the early 1990s, snags and down woody material have been increasing in the Metolius Watershed, primarily from insect and disease outbreaks (USDA FS 2004). And the recent fires have created an additional influx of dead standing and downed wood habitat in the area which will benefit species associated with this type of habitat in the short-term. It is important to evaluate this 'new' habitat in light of what was destroyed or damaged by the fires. The removal of fire damaged material would reduce the abundance of this habitat component sooner than would occur naturally on one hand – on the other hand accelerating the development of the next forest through reforestation can hasten the development of habitat that has been lost or destroyed (FEIS p. 1-42). As scientists have noted – there is a lack of large tree structure in forests in the Interior Columbia River Basin. The benefits of any activities which could affect this habitat type should be weighed against the associated changes in habitat (B&B Project Record – Scientist Notes). Snag habitat has been analyzed extensively. The project design and alternative development considered short and long term snag availability. The FEIS discloses this analysis at length (FEIS pp. 3-200 to 3-371).

Effects to Wildlife Habitat - Northern Spotted Owl Habitat

Habitat for the northern spotted owl has been drastically affected by insects, disease and now extensive wildfire. Much of the project area occurs within Northwest Forest Plan Late Successional Reserve areas that have been delineated to provide habitat for spotted owls and other late-successional species. The recent wildfires within the Metolius watershed have resulted in the loss or degradation of over 10,000 acres of northern spotted owl suitable habitat across the project area. We expect reduced population levels within the watershed for several reasons: 1) the loss of suitable habitat; 2) the limited area in which to produce sustainable long-term habitat; 3) the potential isolation of remaining pairs; 4) and the loss of connectivity and dispersal habitat (USDA FS 2004). Reducing fuels in areas adjacent to existing NRF habitat could reduce the risk of losing these areas through

future fire events, while reforestation could accelerate the development of spotted owl habitat in the future (FEIS pp. 1-43, 3-274).

I see a distinct potential to reduce additional fire risk to existing or degraded habitat through the use of commercial salvage and fuels reductions in areas adjacent to these habitats. Project activities can also promote the development of future suitable spotted owl habitat by accelerating the development of large trees of desired species. Planting desired tree species initially can reduce competition and accelerate the development of future desired stand structure. However, some concerned suggest that passive management will result in suitable habitat conditions for spotted owl sooner or with fewer short-term adverse impacts and therefore better support the recovery of species. We addressed this issue through project design and alternative development. I reviewed the analysis of the existing conditions and effects of the alternatives on this issue (FEIS pp. 3-273 to 3-325).

VIII. ALTERNATIVES CONSIDERED IN DETAIL

The FEIS analyzed in detail a total of five alternatives that respond to one or more of the Key Issues, and describe options that meet, to varying degrees, the purpose and need of the project. One of the goals in developing the action alternatives was to ensure that each option available to me as the decision maker was "technically and physically feasible", as well as reasonable as specified by 40 CFR 1502.14. I feel the alternatives developed provide the public and I with a range of reasonable options to consider for the B&B Fire Recovery Project. It is important to note that other post-fire rehabilitation actions that are not part of the B&B Fire Recovery Project will continue to occur as funding and priorities allow. All of the alternatives, with minor Forest Plan amendments and resource protection measures are consistent with the 1990 Deschutes Forest Plan.

Alternative 1 - No Action

In this document the No Action alternative means the proposed project (which includes all activities identified in the proposed action) would not take place in the B&B Fire Recovery Project area at this time. The No Action alternative is required by NEPA and is described to represent the existing condition. It serves as a baseline to compare and describe the differences in effects between taking no action and implementing action alternatives. There would be no salvage of fire-killed trees to reduce fuels; there would be no fuels reduction; there would be no reforestation in the identified project units; and no road closures/decommissioning would take place.

The No Action alternative takes no additional management actions over what has already been accomplished through fire suppression rehabilitation, burned area emergency rehabilitation (BAER), and other critical rehabilitation, to address the purpose and need for this project. Projects already authorized under BAER or to improve public safety will continue in the project area, including road work (such as culvert replacements), noxious weed treatments, riparian rehabilitation, reducing recreation hazards, trail work, and reforestation.

Alternative 2 - Proposed Action and Preferred Alternative

This alternative includes design and resource protection measures to reduce impacts to soils and sedimentation. It also includes fuels reduction and reforestation to reduce risk to remaining NRF habitat and accelerate the development of spotted owl habitat and future snags into the future. This alternative was developed to salvage harvest, reduce fuels and reforest up to 6,823 acres (~16 % of the project area; ~7 % of the entire burn area) in 142 units within Matrix, Late-Successional Reserve (LSR) and Administratively Withdrawn land allocations. This alternative includes 20 acres of danger tree and defensible space fuels treatments in the Round Lake Christian Camp area within LSR and

Riparian Reserve. Ground based yarding would occur on 5,867 acres while helicopter yarding would occur on 955 acres. This alternative would yield approximately 29.7 MMBF (based on pre-cruise estimates); reduce fuels and reforest up to 6,823 acres; remove danger trees along sections of 146 miles of haul routes, remove danger trees and reduce fuels to defensible space fuels targets within 20 acres of high public use areas around Round Lake. Reconstruction of existing roads used for haul would also occur. Approximately 51 miles of road would be decommissioned and approximately 20 miles of road would be closed. (FEIS p. 2-23).

Alternative 3

This alternative would treat fewer units (i.e. acres) and would avoid harvest activities within the potential sediment contribution areas (PSCAs) in order to further reduce potential impacts to soils and sedimentation and respond to the soils productivity and water quality key issues. This alternative was developed to salvage harvest, reduce fuels and reforest up to 3,782 acres (~9% of the project area) in 83 units within Matrix, LSR and Administratively Withdrawn land allocations. This alternative includes 20 acres of danger tree and defensible space fuels treatments in the Round Lake Christian Camp area within LSR and Riparian Reserve. Ground based yarding would occur on 3,782 acres. This alternative would yield approximately 14.0 MMBF (based on pre-cruise estimates); reduce fuels and reforest up to 3,782 acres; remove danger trees along portions of 122 miles of haul routes, remove danger trees and reduce fuels to defensible space fuels targets within 20 acres of high public use areas around Round Lake. Reconstruction of existing roads used for haul would also occur. Approximately 51 miles of roads would be decommissioned and approximately 20 miles of roads would be closed.

Alternative 4

This alternative would treat fewer units (i.e. acres) and would avoid harvest activities within the late successional reserve areas. This would reduce potential impacts to soils and sedimentation and would not treat areas within the Metolius LSR and respond to the soil productivity, water quality, snag and northern spotted owl key issues. This alternative was developed to salvage harvest, reduce fuels and reforest up to 1,862 acres (~4% of the project area) in 53 units within the Matrix and Administratively Withdrawn land allocations. This alternative also includes 20 acres of danger tree and defensible space fuels treatments in the Round Lake Christian Camp, located within portions of LSR and Riparian Reserve. Ground based yarding would occur on all acres. This alternative would yield approximately 7.9 MMBF (based on pre-cruise estimates); reduce fuels and reforest up to 1,862 acres; remove danger trees along 54 miles of haul routes, remove danger trees and reduce fuels to defensible space fuels targets within 20 acres of high public use areas around Round Lake. Reconstruction of existing haul roads would also occur. Approximately 51 miles of roads would be decommissioned and approximately 20 miles of roads would be closed.

Alternative 5

This alternative was developed to salvage harvest, reduce fuels and reforest up to 4,653 acres (~11% of the project area) in 106 units within Matrix, Late-Successional Reserve and Administratively Withdrawn land allocations. This alternative includes 20 acres of danger tree and defensible space fuels treatments in the Round Lake Christian Camp, located within portions of LSR and Riparian Reserve. Ground based yarding would occur on all acres. This alternative would yield approximately 13.4 MMBF (based on pre-cruise estimates); reduce fuels and reforest up to 4,653 acres; remove danger trees along 122 miles of haul routes, remove danger trees and reduce fuels to defensible space fuels targets within 20 acres of high public use areas around Round Lake. Reconstruction of existing roads used for haul would also occur. Approximately 54 miles of road would be decommissioned and

approximately 20 miles of road would be closed. This alternative would treat fewer units (i.e. acres) than the proposed action and would leave all large (>20" DBH) Douglas-fir and ponderosa pine snags within the Late Successional Reserve areas. This would reduce potential impacts to soils and sedimentation and would retain all existing large Douglas-fir and ponderosa pine snags within the Metolius LSR and respond to soil productivity, water quality and snag key issues.

IX. DECISION AND RATIONALE FOR THE DECISION

I have decided to enter the B&B Fire Recovery Project area in order to implement a variety of management activities that have been carefully analyzed and planned to accomplish the purpose and need for the project while also balancing the responsiveness to the key issues and public concerns identified throughout the planning and public involvement process. I have decided to select Alternative 2 – the proposed action – as described and analyzed in the FEIS but have modified it slightly by including all of the road decommissioning and closure as described in Alternative 5 (FEIS p. 2-58). I will refer to my selected alternative as "Alternative 2-Modified".

Alternative 2-Modified addresses ways to better meet the purpose and need for the project while incorporating some important adjustments to respond to interests, issues and opportunities identified and addressed between the Draft Environmental Impact Statement (DEIS) and the Final Environmental Impact Statement (FEIS). These modifications were fully analyzed and disclosed in Alternative 5 as presented in the DEIS and FEIS, and are also addressed in the Interdisciplinary Team's response to public comments – Appendix C of the FEIS.

Summary of Alternative 2-Modified

Of the 94,281 acres within the Link and B&B Complex Fire areas (69,659 acres of those fires on the Deschutes National Forest), Alternative 2-Modified proposes harvest of fire killed trees, fuels reduction and reforestation on up to 6,823 acres (7% of the entire fire area or 10% of the fire area on the Deschutes National Forest). Alternative 2-Modified also includes danger tree felling along sections of 146 miles of haul routes and danger tree removal and commercial utilization along sections of 129 miles of those haul routes; 54 miles of road decommissioning (compared to 51 miles in Alternative 2) and 20 miles of road closures (the same as Alternative 2). Refer to Appendix E of the FEIS, Table E-1 for unit specific action.

The vegetation treatments described for this project include: salvage harvest of fire killed trees, biomass removal, danger tree removal, fuels reductions, wildland urban interface (WUI) and defensible space. These are defined in Section 3.6.2 of the FEIS.

Table ROD-3. Proposed Treatments for Alternative 2-Modified

| Table NOD-3. Proposed Treatments for Alternative 2-Modified | | | | | |
|-------------------------------------------------------------|----------------------------|-------|--|--|--|
| Treatment | Allocation | Acres | | | |
| Salvage Harvest | LSR | 4,547 | | | |
| Salvage Harvest | Matrix | 1,685 | | | |
| Biomass Removal | LSR | 413 | | | |
| Biomass Removal | Matrix | 41 | | | |
| Salvage Harvest, Danger Tree Felling & Removal, | LSR | 10 | | | |
| WUI and Defensible Space | | | | | |
| Salvage Harvest, Danger Tree Felling & Removal, | LSR and Riparian Reserve | 10 | | | |
| WUI and Defensible Space | | | | | |
| Salvage Harvest, Danger Tree Felling & Removal, | Administratively Withdrawn | 117 | | | |
| WUI and Defensible Space | | | | | |

Salvage harvest and biomass removal will occur in Matrix, Late-Successional Reserve, Riparian Reserve and Administratively Withdrawn land allocations as described in the Northwest Forest Plan. These areas also overlap with land use designations described in the Deschutes Forest Plan (see Table ROD-4).

Table ROD-4. Alternative 2-Modified Treatment Acres By Land Allocation

| | Allocation | Acres | Percentage by Treatment | Volume (mbf) | Percentage by Volume |
|--------|-----------------------------|-------|-------------------------|-----------------|----------------------|
| N | Administratively Withdrawn | 117 | 2 | 390 | 1 |
| W | Late Successional Reserve | 4980 | 73 | 21812 | 73 |
| F | Matrix | 1726 | 25 | 7495 | 25 |
| Р | Riparian Reserve | 10 | <1 | 15 | <1 |
| | Intensive Recreation | 127 | 2 | 438 | 1 |
| D | Bald Eagle | 52 | 1 | 83 | <1 |
| L | General Forest | 100 | 1 | 242 | 1 |
| R M | Metolius Heritage | 711 | 10 | 2161 | 7 |
| P | Metolius Scenic Views | 2108 | 31 | 10143 | 34 |
| | Metolius Special Forest | 3529 | 52 | 15657 | 53 |
| | Scenic Views | 181 | 3 | 958 | 3 |
| | Metolius Black Butte Scenic | 15 | <1 | 15 | <1 |

^{*} Land allocations overlap within the NWFP and between the NWFP and DLRMP.

Salvage harvest would involve the commercial utilization of merchantable fire killed and low probability of survival trees as described in Scott et al. 2002 and Ryan 1998. Within Matrix, Riparian Reserve and Administratively Withdrawn allocations fire killed and low probability of survival trees would be utilized after all snag retention targets have been met including 420 acres in LSR where low probability of survival (Scott et al 2002 and Ryan 1998) white fir up to 28 inches DBH would be removed. In these 420 acres all Douglas-fir and ponderosa pine would be retained. Only fire-killed trees would be removed from the remaining LSR areas.

Alternative 2-Modified includes biomass removal either as an initial treatment or as a follow-up fuels reduction treatment in ground-based salvage units (FEIS 2-17). All salvage units would include reduction of fuels created by harvest activities (i.e. slash) and could also include additional fuels reductions of non-merchantable material less than 12 inches DBH if fuel loads will exceed desired levels. Fuels reduction activities would involve:

- Piling harvest slash and small logs with machines from existing skid trails (Machine Piling)
- Yarding entire trees or leaving the tops attached to the last log (Whole Tree Yarding)
- Pile Burning of Log Landings
- Felling of smaller non-merchantable trees (Whip Felling)
- Burning high fuels concentrations (Jack Pot Burning)
- Hand Piling and Hand Pile Burning

Table ROD-5 describes fuels treatments for Alternative 2-Modified.

Table ROD-5. Alternative 2-Modified Fuels Treatments

| Fuels Treatments Within Salvage Units | Acres |
|-------------------------------------------------|-------|
| Whole-Tree Yard/Machine Pile/Burn Landing Piles | 2,702 |
| Whole-Tree Yard/Burn Landing Piles | 3,585 |
| Burn Landing Piles/Whip Felling/Jack Pot Burn | 536 |

Reforestation will occur in all treatment units that are not expected to meet desired stand regeneration characteristics following salvage harvest, biomass removal and fuels reductions.

Danger trees would be felled along sections of 146 miles of haul routes and removed along 129 miles of these sections including 3 miles of Riparian Reserve areas within the project area.

Alternative 2-Modified includes two short-term, site specific, non-significant Deschutes Forest Plan Amendments:

- A short-term, non-significant, site specific amendment of several visual quality standards and guidelines in the DLRMP (M9-4, M9-8, 9-27, M9-29, M9-34, M9-44, M19-26, M21-9, M21-20, M22-8 & M22-13), is included in this decision to allow impacts from tree removal and fuels treatments to be visible to the "casual observer" for slightly longer periods than under the existing Standards and Guidelines. Though the current Visual Quality Standards and Guidelines will not be met in the short-term, the implemented actions are expected to better meet visual quality objectives for the long-term (over five to ten years).
- A short-term, site-specific, non-significant amendment of fuelwood standard and guideline in the DLRMP (M19-27), will allow the Forest Service to permit commercial and personal use fuelwood collection in the Metolius Heritage area to help reduce post-salvage fuels.

Alternative 2-Modified also includes up to 5.1 miles of temporary road construction to access harvest units, haul road maintenance and reconstruction. The temporary roads would require minimal excavation, would be native surface, and would be restored after logging operations were completed. Haul roads include up to 146 miles of forest roads in the project area. Maintenance and reconstruction activities on these roads would include:

- Armour approximately 155 outlets (this consists of placing large rock placed in a
 manner to deflect or dissipate the hydraulic energy of running water such as in a
 ditchline, at the outlet of culverts or on road surfaces at drain dips where water
 crosses over the road during periods of high runoff)
- Installation of approximately 18 relief culverts
- Installation of approximately 32 relief waterbars

My decision authorizes 54 miles of road decommissioning and 20 miles of road closures. Road decommissioning will include culvert removal, water-barring and, in some cases, subsoiling to remove or alter elements of the existing road. The road segment will also be removed from the Forest road inventory system and its function changed so that it will no longer be used as a road (B&B area Roads Analysis).

Roads that are closured will be categorized as operational maintenance level 1 on the transportation system, and managed for intermittent-administrative or non-vehicular service. Even though the landscape is not completely restored to a natural state the intention is to leave these roads in a self-maintaining state which will include repairing any drainage problems, potentially removing culverts from stream crossings and installing a closure device (i.e. barricade, earth berm, logs, gates, etc.).

The road decommissioning and closures proposed would move the open road density within the project area from 4.36 miles per square mile to 3.86 miles per square mile.

Rationale for the Decision to Select Alternative 2-Modified

I have thoroughly reviewed all of the alternatives analyzed for this project and have carefully considered the extensive public and researcher feedback we have received. I have decided that Alternative 2, with some modifications, does the best job of meeting the Purpose and Need for Action as described in the FEIS while balancing the responsiveness to the Key Issues associated with this project, and protecting and enhancing the resource conditions in the LSR. I am referring to my selected alternative as Alternative 2-Modified. I find that Alternative 2-Modified is consistent with the 1990 Deschutes Forest Plan (DFP) as amended by the 1994 Northwest Forest Plan and the 1997 Metolius Wild and Scenic River Plan and other Forest Plan Amendments, as well as other plans or strategies for the area such as the Peck's Penstemon Species Conservation Strategy, and Watershed Analysis Update.

I believe that Alternative 2-Modified does the best job of striking a responsible balance between meeting the project goals and responding to the issues, concerns and opportunities that were brought to my attention during the extensive involvement efforts with the public, other agencies, and the scientific community.

A significant portion of the project area lies within the Metolius Conservation Area (MCA) as described in the 1990 LRMP and after reviewing its guidance and direction carefully I have found that implementation of Alternative 2-Modified meets the intent of the MCA (FEIS Appendix H). I have also reviewed the Standards and Guidelines for management of the LSR as described in the NWFP and have found that implementation of Alternative 2-Modified is consistent with that direction as well.

Alternative 2, as described in the FEIS was designed to meet the project purpose and need in as many areas as feasible based on resource concerns and conditions while maintaining and promoting the values associated with the Metolius Conservation Area and Late Successional Reserve. It was designed to recover economic value while promoting fuels reduction and the accelerated development of desired stand conditions. Alternative 2-Modified also responds to road management concerns and maximizes the amount of road closures proposed in the FEIS.

I have based my decision on a thorough review of the information disclosed in the FEIS for this project, any additional Interdisciplinary Team specialist reports, the Metolius Late Successional Reserve Assessment, the Metolius Watershed Analysis and Update of 2004, the B&B Area Roads Analysis, the Forest Plan direction for the Metolius Conservation Area as amended, the Peck's Penstemon Species Conservation Strategy, and the extensive involvement of the public, other agencies, and the research community that we received on this project.

We have made an extraordinary effort to involve and inform the public during the development of this project and have sought the advice and input for numerous researchers and scientists with insight into management of the post-fire environment. I have had the benefit of extensive discussion, debate, comment and feedback with many members of the general public, Camp Sherman community, tribal neighbors, special interest groups and interested local, state and federal agencies.

I carefully considered the balance of the short- versus long-term effects to Peck's Penstemon as it is only found in Central Oregon and its range includes an area of about 325 square miles centered about

Black Butte on the Sisters Ranger District. I am confident that the long-term benefits associated with reduction of fuels outweigh the short-term risks of mortality as a result of disturbance. I relied on the strategy and the conclusions of the Biological Evaluation to guide my decision.

As described earlier under Public Involvement section, throughout the project, there has been a great amount of opportunity to hear concerns and engage in discussions with the public, other agencies, and researchers. This dialogue helped me to reach what I believe is a balance between meeting the project objectives and being responsive to the issues.

Active vs. Passive Management

Management of the areas burned by B&B Complex emerged as a concern even before the fires were extinguished. In making this decision, I carefully weighed the effects of active management v. passive management. Scientific literature exists that supports the conclusion that either passive or active management may be the best course of action, depending upon site specific circumstances. Beschta et al. (1995 & 2004), suggested that "there is no ecological need for intervention on the post-fire landscape," and that post-fire logging, reseeding, and replanting should be conducted only under limited conditions. These papers also state that there is a lack of knowledge pointing to detrimental ecological effects of salvage harvest measured in association with any particular wildfire. Everett (1999) also recognizes a lack of definitive information and goes on to state that the 'custodial' approach advocated in the Beschta et al. papers may be, in many cases, less desirable than more active management because of the possible soil degradation that can occur in the absence of seeding, or because of the possible fuels buildup that can occur in the absence of timber harvest. I have reviewed and incorporated ideas presented by these papers as well as specific review of the B&B Project by many other researchers who reviewed and commented during development of the B&B Fire Recovery Project. We engaged the scientific community through the PNW Research Station and OSU on numerous occasions during the development of this project (FEIS pp. 1-38 to 1-40 and Appendix D).

The effects of the wildfires and potential effects of the management actions have weighed heavily in my decision (FEIS Chapter 3). The B&B Complex killed thousands of acres of trees that provided shade to streams; cover and forage for wildlife; timber for future harvest, as well as seed sources for new forests; and changed the scenery and recreation qualities many people enjoyed prior to the fire. The additive adverse effects to the live tree resource, when added to the condition of the forest prior to the fires as a result of insects and disease are considerable, and many of these detrimental conditions will not self-correct for several generations. Based on my judgment and review of the potential effects, active management is necessary at least on a portion of the B&B Project Area. I have considered the conflicting viewpoints on active and passive management and I consider active management, including salvage harvest, to be an appropriate course of action on up to 7 percent of the total Link and B&B Complex Fire areas. This would leave approximately 93 percent of the fire areas untreated at this time (FEIS p. 1-21-23). Each of the alternatives proposes to leave various amounts of the fire area untreated (see Table ROD-6).

Table ROD-6. Percentage of the Burn Area Not Treated in the B&B Fire Recovery Project

| | Alt. 1 | Alt. 2 | Alt. 3 | Alt. 4 | Alt. 5 |
|-----------------|--------|--------|--------|--------|--------|
| Percent of Area | | | | | |
| Untreated | 100% | 93% | 96% | 98% | 95% |

Not all of the effects of the fires were adverse, such as where fire intensity was generally lower and burned as surface fire in the appropriate fire regimes, and reduced fuel loading with minimal

detrimental effects to the overstory green trees. In these areas there is a beneficial reduction in the potential for high intensity fire.

Portions of the B&B Complex resulted in high mortality of trees because of high fuel loads, dry fuel conditions, and a dense understory of ladder fuels across the landscape. These fuel loadings are largely due to our past fire suppression efforts, timber harvest, and other management activities (FEIS p. 3-1135). If some of the burned trees are not removed we project that:

- 1. Future fuel loads will be just as high or higher than they were before the fires, it is important to reduce fuel loads in some portions of these environments in order to restore a more natural role of low intensity fires and promoting the development of desired future fuels conditions sooner:
- 2. Another fire with similar or greater devastating results could occur. If such a fire occurs then investments in recovery efforts and favorable gains in streamside shade, cover and habitat for wildlife, live root structures to hold soil in place, and scenery characteristics for recreationists will be lost.

In order to pursue active management, it is prudent that I make this decision now. Commercial salvage is the most practical option for removing trees 12 inches DBH and larger. This can be accomplished most effectively while the wood material has commercial value. Recovering value while accomplishing this work can reduce overall government costs as well as provide funding to implement other components of the decision such as fuels reduction, reforestation and road maintenance and closures (FEIS p. 3-196).

In weighing the factors needed to make this decision, I considered both fuel characteristics (amount, size, arrangement, continuity, and moisture content), likelihood of ignition plus impacts on soils during salvage harvest activities. Although the majority of this material is in the form of standing snags today, in 10 to 30 years most of this material is expected to be on the ground and in a condition that could support a high mortality wildfire (FEIS pp. 3-139, 3-151). A high mortality fire in the area in the future would likely kill or and set back any riparian or coniferous vegetation recovery, again raising the potential for increased stream temperatures and sediment levels.

Based on these factors and considerations I have concluded that active restoration on a portion of this area to help reduce some of the risk is an appropriate course of action. Eventually I would like to reduce fuel loadings in the B&B Project area to the point where fire can be returned to its natural role, within the short-interval fire adapted environments. This would require that fuel loads be low enough to allow fire to burn through stands without severely damaging them. Implementation of active management can help return portions of the project area to these conditions sooner.

I am aware that implementation of the B&B Fire Recovery Project alone will not bring about full recovery to the entire fire area. This decision does not take away my ability to propose future restoration projects that will further the objectives of the landscape strategies described earlier, nor does it preclude future projects to implement recommendations of the Watershed Analysis.

Response to Purpose and Need

After I concluded that active management was appropriate on at least portions of the post-fire landscape, I weighed the pros and cons of each alternative based on the purpose and need of the project and the key issues described.

Based on my review of the alternatives analyzed in the FEIS, the extensive public comments received on the Draft EIS, and the substantive input from scientists and researchers, I find that all of the action alternatives meet the project objectives to different extents and with different effects and trade-offs. I find that Alternative 1 – the No Action Alternative, falls well short of meeting the Purpose and Need for Action, and for the reasons detailed above, I believe it would be an irresponsible course of action to choose.

What follows is an explanation of my rationale for the decision based on how the Alternatives compared in regards to the Purpose and Need for Action and how I reached the conclusion that Alternative 2-Modified provides the most balanced approach to meeting the Purpose and Need for Action (purpose and need are listed on page 11 and discussed in further detail here).

Harvest fire killed timber that has economic value.

An important issue and one of the purposes of this action is economic recovery which primarily relates to the volume and value of merchantable dead trees that are salvage harvested. I considered three facets of economic recovery in evaluating the alternatives:

- 1) The importance of recovering utilizable wood resources in a responsible manner;
- 2) The economic benefits for local and regional economies; and
- 3) The revenues generated for post-harvest restoration work.

The action Alternatives describe operational and design differences that affect the economic recovery and environmental impact of each alternative. These include the type of harvest yarding system utilized and the material removed or retained. Many acres of potential economic recovery were removed from consideration for salvage harvest due to other resource concerns such as high elevation, long fire interval areas, Riparian Reserves, nesting stands, etc. (FEIS p. 1- 21). Alternative 3 removes additional areas from salvage harvest to eliminate ground disturbing impacts in areas with the higher potential to contribute sediment to streams (PSCAs), Alternatives 2, 4 & 5 all propose treatment in these areas (33 acres, 5 acres and 12 acres respectively) with additional Resource Protection Measures to reduce potential impacts from ground based activities. Based on these measures I believe Alternative 2-Modified adequately protects these areas from unnecessary impacts while allowing for the recovery of dead wood resources.

I instructed the ID Team to consider the potential economic recovery for each harvest unit in light of deterioration, production rates and logging costs. The salvage harvest units in all action alternatives (2-5) have measurable economic recovery potential in terms of the volume of raw materials that could be salvaged. There is also some potential for economic recovery of biomass products, but the economic recovery would be more limited with this type of removal. Alternative 2-Modified maximizes the economic recovery described in the FEIS and would result in an estimated 29.7 MMBF (based on pre-cruise information) and 3.2 million dollars of merchantable timber for wood products (FEIS p. 3-190). This amount of timber could provide the raw materials to build over 2000 three bedroom homes. Based on alternative design the remaining action alternatives (3-5) all result in less than 1 million dollars of merchantable timber for wood products.

Considering revenue generated from the sale of wood products after planning, sale preparation and administration costs only Alternative 2 (and hence Alternative 2-Modified) would result in a net return to the government – all other action alternatives would result in a net deficit to the government. The net return generated by Alternative 2-Modified is important to funding other restoration work such as fuels reduction, reforestation and road maintenance, decommissioning and closure. Alternative 2-Modified would best contribute funds towards achieving other aspects of the project while the other alternatives would not. Overall I consider Alternative 2-Modified to be the best

choice for economic recovery since it provides the highest level of revenue and return to the government. The revenue generated will contribute to the economy, most likely in Central Oregon and the return to the government will contribute to funding other project activities such as fuels reduction, reforestation and road maintenance, decommissioning and closure.

Reduce fuels within salvage units to desired levels, which will;

- promote the restoration of fire as a component of healthier ecosystems, through the application of prescribed fire;
- reduce fuel hazard within defensible space to improve suppression effectiveness and reduce fire intensity for protection of communities at risk and existing and developing spotted owl habitat.

One of the purposes of this action is to reduce fuels in salvage units so that they more closely approximate historical dead and down woody fuel loads and that they are in a sustainable level suitable for dependent species. With more natural fuel loads it is more likely that fire can be reintroduced as a natural component of disturbance in these systems without the risk of total stand replacement. Uncharacteristically high fuel levels create the potential for fires that are uncharacteristically intense (Franklin and Agee 2003). If lower and mid-elevation ecosystems, such as those in the B&B Project area, are to experience a disturbance regime similar to that which they are adapted to, the fuels must first be reduced to keep fire effects within an historical range.

The Metolius Watershed Analysis Update of 2004 (WA) describes the historic fire frequency in the project area. The FEIS bases its conclusions on the available and relevant information regarding fire history in the Metolius Basin by building on information presented in the Metolius WA. I have reviewed the WA and the description of historic fire that was used in the FEIS analysis and the B&B Fire/Fuels Strategy. This information explains the importance of weather patterns in the role of fire intensity in the Metolius Watershed and the basis for the fire history presented in the FEIS.

The Alternatives describe various levels of fuels reduction for both harvest created fuels (i.e. slash) and excessive non-harvest activity related fuel loads. Alternative 2-Modified will maximize the amount of areas where fuels reduction treatments will occur since Alternative 2-Modified will include the most amount of acreage within salvage units. These treatment units will also help to break up the continuity of fuels across the landscape. During the planning process, several researchers noted the importance of large scale fuels reduction across the landscape to break up continuity of fuels and create geographical and spatial isolation of stands with regard to fuel loads, which would help decrease the risk of large, landscape scale fire in the future (FEIS Appendix D). Fuels reduction treatments were described in terms of concern areas, these included:

- Wildland Urban Interface (WUI)
- Defensible Space along major roads
- Existing Northern Spotted Owl Nesting, Roosting and Foraging Habitat (NRF)
- Potential Future NRF
- All other areas by fire regime classification

Alternative 2-Modified includes the greatest amount of fuel reduction treatment within WUI, defensible space and adjacent to existing and potential NRF. Fuels reductions contribute to maintaining an area's natural fire regime as well as reducing fire risk to other concern areas such as WUI and NRF.

Fuels reductions in conjunction with salvage harvest will lay the foundation in these areas for appropriate site preparation for reforestation. Planting trees in areas with known excessive fuel loads, I believe, provides an unacceptable risk to the developing young forest due to the risk of future wildfire. I do not want to approve thousands of acres of reforestation without the appropriate fuels reduction only to watch these areas burn in the future as a result of excessive fuel loads that could have been reduced. The units themselves, once treated will enable the reintroduction of more normal or natural low intensity fire in the future, which will help maintain the forest stands in their desired conditions (FEIS p. 3-171).

Based on analysis in the FEIS Alternative 2-Modified would also create the largest amount of area within the project where vegetative conditions are favorable to the application of prescribed fire into the future. It is also clear, based on the analysis, that fuels reduction treatments described in this project are not a landscape level fuels treatment for the B&B Project area. However, I directed the ID Team to develop a landscape fuels strategy for the B&B Project Area and the fuels treatments described in Alternative 2-Modified are consistent with that strategy and move the project area closer to the objectives of this strategy than any of the other action Alternatives.

I consider Alternative 2-Modified to be the best option for reducing fuels within salvage units to:

- 1. Promote vegetative conditions now and into the future that are favorable to the application of prescribed fire and help restore these ecosystems to their natural fuel loading and fire regime condition;
- 2. Reduce excessive fuel loads in WUI and defensible space area that could threaten the safety and security of fire suppression forces; and
- 3. Reduce the risk to the developing young forest, especially in LSR and adjacent NRF habitat, from future wildfire events and their impacts in areas of excessive fuel loads.

Reforest desired tree species (where natural, on-site, seed sources are lacking) within salvage units to aid in the accelerated development of desired forest conditions consistent with management plan objectives.

Most of the areas proposed for salvage harvest were burned with a very high intensity fire that resulted in a stand replacement where the over-story tree mortality is 75-100 percent, and available seed sources are often not present – the trees are dead and the cone crop had been destroyed during the fire. These areas will take the longest time for natural forest regeneration with the desired conditions occur (FEIS p. 3-121). Reforestation within the B&B project area is planned to meet the needs of wildlife and the ecosystem as well as NFMA requirements for reforestation (FEIS p. 3-123). Within ponderosa pine plant associations, reforestation will consist primarily of ponderosa pine. Mixed conifer sites will receive varying amounts of species diversity depending on the actual plant association and aspect. This variation will emulate the historical condition and accelerate the development of the next forest stand. Accelerated stand development can help re-establish the conditions in both LSR and Matrix that existed prior to the fires and more quickly return these areas to the desired conditions (FEIS p. 126).

In some stands species diversity is expected to occur as fire exclusion allows white fir, lodgepole pine and other minor species to become established over the next century. In stands where prescribed fire is carried out, these stands will retain the species planted with variable levels of mortality and this more natural pattern of fire disturbance will limit the natural regeneration of fire intolerant species such as white fir and lodgepole pine.

Alternative 2-Modified proposes reforestation on the most acreage (6,823 acres) compared to the other action alternatives (Alt 3 - 3,782 acres, Alt 4 - 1,862 acres, Alt 5 - 4,653 acres). Most of this

reforestation occurs in the stand replacement areas where natural forest regeneration may take decades or even a century to re-establish the next forest. By reforesting the most acreage in stand replacement areas, Alternative 2-Modified accelerates the development of the next forest in the most areas of any of the action alternatives. By accelerating the development of the next forest to desired future conditions in these areas, Alternative 2-Modified does the most of all the alternatives to develop, as quickly as possible, the desirable stand conditions at each stage of development from early seral to late seral, which also does the most to protect and enhance conditions of late successional forest ecosystems. Reforestation in these areas can shorten the development time for these characteristics from 50 to 100 years or longer. This can shorten the time to develop important conditions such as large structure and snags thereby shortening the 'snag gap' the area will experience as a result of the fire.

I consider Alternative 2-Modified the best option to more quickly restore the characteristics of the B&B Project area that were lost as a result of the fire within the treatment units, and set these stands on a trajectory to produce large tree structure.

Improve public, administrative and operational safety by removing danger trees along commercial haul routes and areas of concentrated public use.

The implementation of Alternative 2-Modified will improve public, administrative and operational safety by:

- 1. removing danger trees along sections of commercial haul routes
- 2. removing danger trees within concentrated public use areas
- 3. reducing fuel loads within wildland urban interface areas
- 4. reducing fuel loads within defensible space areas along major roads.

Alternative 2-Modified would remove public hazards (i.e. danger trees) along the greatest portion of the road network of any of the action alternatives (146 miles as compared to Alt 3 – 122 miles, Alt4 – 54 miles and Alt 5 – 122 miles). Alternative 2-Modified in conjunction with the previously completed B&B Hazard Tree project will remove danger trees along over 200 miles of the major roads within the B&B Complex and Link fire areas. All of the action alternatives remove danger trees from concentrated public use areas within the project boundary. Alternative 2-Modified reduces fuel loads within WUI and defensible space along major roads in more areas than any of the other alternatives.

Alternative 2-Modified reduces the most threats to public safety of any of the alternatives described in the FEIS and I consider it the best and most responsible option, of those described in the FEIS, to reduce risk and improve safety.

Reduce open road densities, particularly within Late-Successional and Riparian Reserves, to help protect and improve late-successional and watershed conditions, and the associated fisheries and wildlife habitat.

There are approximately 388 miles of roads within the project area that provide for both public and administrative accessibility to forest lands; however, they also fragment wildlife habitat, contribute to invasive weed establishment, affect surface water runoff and increase erosion and sedimentation in streams. The update to the Metolius Watershed Analysis (2004) described many roads that are affecting hydrologic and wildlife resources in an undesirable fashion by causing surface erosion and contributing to sedimentation or by fragmenting wildlife habitat. The B&B Area Roads Analysis also

evaluated the existing road network and assessed various roads for their importance to accessibility and their long term necessity on the forest. Alternative 2-Modified includes 74 miles of roads described in both the Metolius Watershed Update and B&B Area Roads Analysis that are candidates for closure based on resource concerns. Alternative 2 – as Modified and Alternative 5 include the most amount of road decommissioning and closure when compared to the other action alternatives. Alternative 2-Modified will decommission and close approximately 47.6 miles of roads within late-successional reserve areas and 17.4 miles of roads within riparian reserve areas.

I took a hard look at public access concerns that have been raised during the planning process as well as the WA and Roads Analysis to come to the conclusion to close specific roads. These roads do not contribute unique forest access to any areas – they are all relatively unnecessary for public and administrative access and in many areas are inadvertently closing due to brush growth and trees that have fallen across the road bed. There is a need to close these roads properly so that erosion and sedimentation concerns are addressed – i.e. so that roads that may be un-drivable due to conditions do not erode or cause unnecessary sedimentation or other hydrologic concerns. I think that the closure and decommissioning of these specific roads strike a reasoned balance between public and administrative access, resource protection and our economic ability to manage the remaining road network. Closing and decommissioning these roads will also bring us into closer compliance with the road density standards described in the Forest Plan.

I consider Alternative 2-Modified to be the most responsive to resource concerns due to roads. Closing and decommissioning these unneeded roads will reduce habitat fragmentation for wildlife and reduce the risks of erosion and stream sedimentation that could be caused by these roads. My decision to close and decommission these roads is intended to address the Purpose and Need described earlier; they are not intended to serve as 'mitigation' for the project actions.

Response to Key Issues

During different stages of the planning process issues were raised that have been addressed in either the FEIS or our response to public comments. Some of these issues were identified as 'Key' Issues by the planning team and were instrumental in developing the range of project alternatives. In this section I will describe how I considered these key issues in making my decision to implement Alternative 2-Modified, which I have concluded does the best job of responding to the Key Issues and Purpose and Need of the project. The Key Issues, as described in the FEIS are:

- 1. Effects to Water Quality from Sedimentation
- 2. Effects to Soils Productivity
- 3. Effects to Wildlife Habitat Snags and Downed Wood
- 4. Effects to Wildlife Habitat Northern Spotted Owl Habitat

Effects to Water Quality from Sedimentation

The Link and B&B Complex Fires burned in portions of 9 subwatersheds in the Metolius watershed. Consideration of water quality, particularly sedimentation and fish habitat is very important for this project based on the size of the fire areas and the specific resource values that were affected. The Metolius watershed provides habitat for several threatened and endangered or sensitive species including bull trout and redband trout. It is also a watershed targeted for the reintroduction of salmon in the future. The cold and clear water of the Metolius watershed are essential for all of these species and is described as one of the outstanding characteristics of the area in the Metolius Wild and Scenic River Plan.

A detailed discussion of watershed conditions and potential effects of the alternatives on watershed and aquatic resources is included in the FEIS in the Hydrology and Water Quality and Fisheries sections of Chapter 3. The Metolius Watershed Analysis Update of 2004 recognized several new trends in the basin mainly as a result of the recent wildfires and include:

- Potential for increased peak flows that threaten stream bank stability and loss of soil cover which increases erosion
- Increased risk of higher stream temperatures due to loss of stream shade

The FEIS recognizes that ground disturbing activities associated with the proposed actions could affect stream flows via increased overland flow and erosion, which could deliver sediment to stream areas (FEIS p. 3-56 to 3-104). For this reason activities are largely not proposed within Riparian Reserve areas except for several areas of tree removal for public safety concerns along haul routes (3 miles) and adjacent to the Round Lake Christian Camp (10 acres). In addition the ID Team described areas within treatment units that would be more likely to contribute sediment to stream areas based on their proximity and connectedness to streams or roads, their slope and their vegetative cover. PSCAs in these areas additional resource protection measures will be implemented to reduce effects from ground disturbing activities – such as wider spacing for skid trails and fewer machinery passes over those skids trails; therefore the risk of sedimentation to streams in the project area is greatly reduced. The design of the project and associated resource protection measures incorporated in the project in all action alternatives would limit the amount of erosion that would occur in areas with a high potential to contribute sediment to stream areas. These areas are excluded from any treatment in Alternative 3.

Alternative 2-Modified includes the greatest number of acres and miles of haul routes within these potential sediment contribution areas (PSCA) (33 acres) when compared to the other action alternatives (Alt 4-5 acres and Alt 5-22 acres). Alternative 3 provides the most protection from sedimentation by excluding treatments within the PSCA, thereby eliminating any ground disturbance within areas that have a higher potential to contribute sediment to streams, and has similar effects as the No Action Alternative in regard to these areas.

Based on the effects described in the FEIS, actions described in Alternative 2-Modified will not have any measurable effect on stream temperatures since vegetation will not be removed from areas that provide shade to the streams (FEIS p. 3-91).

Ultimately, my decision was based on acceptable risks associated with the various alternatives regarding potential sediment increases (FEIS p. 3-76). Based on the effects analysis displayed in Chapter 3 of the FEIS the sediment created as a result of activities described in Alternative 2-Modified in the project area, while greater in extent than the other action alternatives, are still negligible. The potential risk of erosion and sedimentation that may occur from activities in the PSCA is greatly reduced due to the Resource Protection Measures implemented in these areas. I find that the additional economic recovery, fuels reduction, and reforestation benefits realized through activities in these areas, outweigh the minimal potential risks of additional erosion and sedimentation that would occur under Alternative 2-Modified.

The 74 miles of road decommissioning and closure described in Alternative 2-Modified will help reduce the impacts from roads in sensitive areas such as Riparian Reserves. The modifications applied to Alternative 2 increase the miles of roads decommissioned and closed to better respond to this Key Issue. Roads can have an adverse effect to water quality and fisheries habitat. Alternative 2-Modified applies the greatest amount of road decommissioning and closure described in the FEIS and therefore affords the greatest reduction in adverse affects caused by roads in the project area.

Effects to Soils Productivity

I considered the maintenance of long-term soil productivity an important concern. The ID Team assessed the number of acres that would experience detrimental disturbance (i.e. compaction, displacement, burn damage, surface erosion and puddling) as a result of all treatment activities and cumulative effects of past, present and reasonably foreseeable activities. Puddling was not found to be a concern based on the soil types within the project area (FEIS p. 3-22). Actions described in Alternative 2-Modified would create the largest amount of acres detrimentally disturbed by the project activities (1,349 acres); however, this disturbance would affect roughly 3 percent of the project area. Alternative 4, which proposes activities on the fewest acres would create the fewest acres of detrimental soil disturbance (345 acres). The No Action Alternative would not detrimentally affect any acres but would also not respond to any of the Purposes and Needs of this project. Alternative 3 excludes activities within the PSCA and has the next fewest acres of detrimental soil disturbance created (752 acres). Alternative 5 creates the second largest number of detrimentally disturbed acres (926 acres), however, since large trees (greater than 20" DBH) would not be removed in LSR allocations the level of disturbance would be less in these areas since there would be fewer machinery passes over the skid trails. All the action alternatives, with the associated Resource Protection Measures, are consistent with the Deschutes LRMP soil standards and guidelines and would not result in more than 20 percent detriment soil disturbance in treatment units.

Design criteria and resource protection measures will limit ground disturbing activities on sensitive soils in all action alternatives (FEIS p. 2-63-70). This design reduces the potential effects of compaction, displacement, surface erosion and burn damage to sensitive soils. All applicable soil productivity standards described in the Deschutes Forest Plan would be met in all alternatives.

The risks to soil productivity, as described in the FEIS, are within acceptable limits and do not exceed Forest Plan standards.

I find that the design and resource protection measures which address soil disturbance reduce the potential impacts project activities would have on creating detrimental soil conditions and therefore I accept the trade off of treating more acres to better meet the purpose and need, knowing that adequate soil protection and restoration measures are in place to meet the Forest Plan standards and address this key issue.

Effects to Wildlife Habitat - Snags and Downed Wood

The recent fires in the Metolius watershed have created a large influx of dead standing and down wood habitat, in addition to the insect and disease mortality that was occurring prior to the fire and continues to occur in areas outside the fire areas (FEIS p. 3-267). This influx of dead standing and down wood material will benefit wildlife species that are associated with this type of habitat until the abundance of this habitat decreases over time and until the next wildfire, or insect and disease outbreak occurs again. The removal of fire damaged material through salvage harvest or fuels reduction will reduce the abundance of this habitat sooner than would occur naturally, on the units treated (7% of the burned area). Currently the abundance of this type of habitat is high across the landscape, however, this abundance will decline in the future eventually leaving a shortage of snags until the future forest can provide a new supply of standing and down dead material.

The No Action Alternative retains the greatest amount of this type of habitat, however, all of the action alternative (2-5) provide for levels of standing snags and down wood to meet the Deschutes Forest Plan standards and guidelines for site productivity and wildlife needs and the Northwest Forest

Plan standards and guidelines for late successional reserve habitat. The alternatives in the FEIS contain a range snag retention strategies. In general alternatives that treat fewer acres would leave higher numbers of snags on the ground. Although Alternative 2-Modified which treats the largest amount of acres would still leave 100 percent of the existing snags on 93 percent of the fire area. Alternative 5 would leave the largest number of large snags in late-successional reserve areas by retaining all dead trees larger than 20 inches DBH. In the Matrix allocation of Alternatives 2-Modified, 4 and 5 and LSR allocation of Alternative 2-Modified all snags and down wood existing prior to the fires would be retained and in addition 15 percent retention patches in units over 40 acres and the two most likely to persist trees per acre would also be retained for snag habitat. Alternative 3 would retain snag targets on a per acre basis within specific size classes based on plant association group – see Table 2.7 in the FEIS. In the LSR allocation Alternative 4 would retain all snags across the landscape since activities would not typically occur within LSR in this Alternative. In the LSR allocation in Alternative 5 all Douglas-fir and ponderosa pine over 20 inches DBH would be retained as snags.

We received numerous comments regarding snag retention levels – these are displayed with our responses in the FEIS – Appendix C.

The analysis in the FEIS describes the effects to snag and down wood levels over time (FEIS pp. 3-244 to 3-253). This analysis reflects that the difference between any of the action alternatives and the no action alternative are insignificant at the landscape scale (FEIS Appendix G). Alternative 2-Modified does show the lowest levels of snags and down wood into the future, but again is not appreciably different from the no action alternative.

I believe that Alternative 2-Modified strikes a reasonable balance between snag retention and salvage harvest of wood products; 93 percent of the landscape will retain 100 percent of the existing dead wood levels and treatment units would retain dead wood consistent with Deschutes Forest Plan and NWFP LSR standards and only 7 percent of the area would have reduced snag habitat. Snag levels retained across the landscape would be far in excess of Deschutes Forest Plan standards. The limited acres treated under Alternative 2-Modified would not substantially reduce the landscape concentration and abundance of the existing snag and down wood habitat. Alternative 5 would reduce snags on 5 percent of the fire areas and would leave all large Douglas-fir and ponderosa pine over 20 inches DBH in the late successional reserve. In our collaboration with researchers, several indicated that the intent was that LSRs would be treated in the vegetation types comprising a majority of the B&B Project area. Several also noted that they would have chosen Alternative 5 from an ecological perspective but that we are paying a modest ecological cost for Alternative 2 (FEIS Appendix D). While Alternative 5 does leave more large snags in the late successional reserve than Alternative 2-Modified, Alternative 2-Modified still retains this habitat on over 93 percent of the fire areas and only reduces this habitat on approximately 7 percent of the area. This reduction will not affect the abundance of this habitat across the landscape and will not prematurely initiate a 'snag gap' in available snags - in fact reforestation on more acres in Alternative 2-Modified will accelerate the development of the next forest and likely shorten the time period before the next forest supplies snags in these areas (FEIS Appendix G).

Effects to Wildlife Habitat – Northern Spotted Owl Habitat

Approximately 30 percent of the Link and B&B Complex fires occurred within the Metolius Late Successional Reserve (LSR), located along the northern and western portions of the fire. Approximately 23 percent of the LSR experienced stand replacement fire mortality. The recent wildfires of 2002 and 2003 have impacted 17 of the 26 northern spotted owl pairs on the district – 11 have been lost, 5 altered, and 2 have dead nest groves.

There are two northern spotted owl critical habitat units (CHU) within the B&B Project boundary. These CHUs are contained within the Metolius LSR. These CHUs have 1-2 percent suitable habitat remaining within the project area which affects the CHU's ability to provide essential breeding, roosting, and foraging habitat. The FEIS discloses that it is unlikely that these CHUs currently function as intended due to the extent of habitat loss (FEIS p. 3-278).

The primary affect to spotted owls in the project boundary has been habitat loss from insect, disease and wildfire and a critical concern is the recovery of this lost habitat in the future. Reforestation in areas of lost habitat can promote and accelerate the development of habitat into the future.

Alternative 4 would not include any activities within the Metolius LSR, and therefore no further short term impacts would occur in these areas; however, reforestation proposed in this project would likewise not occur in these areas and the potential to initiate stand regeneration in these areas to promote the accelerated recovery of habitat would not occur. Alternative 2-Modified would include activities on the largest amount of acres within the LSR and would reduce spotted owl habitat to the extent that spotted owls utilize stand replacement areas and standing dead trees. Based on analysis in the FEIS and surveys conducted within the project area there is little evidence that spotted owls have returned to the area and that they are utilizing the stand replacement areas (FEIS p. 3-280; B&B Project Record – Use of the B&B Area by Northern Spotted Owl).

Alternative 2-Modified proposes the largest amount of fuels reduction and reforestation and would promote the development of desired stand condition on the most acres described in the FEIS. This alternative also proposes fuel reduction on more acres adjacent to existing and developing NRF which will reduce the risk of loss of these areas in the event of future fires.

Overall Alternative 2-Modified does the best job of protecting existing and future habitat for northern spotted owls, and of accelerating the development of spotted owl habitat into the future and promoting the maintenance and recovery of characteristics associated with the LSR that contribute to spotted owl habitat.

In reaching my decision I considered the effects of salvage harvesting in conjunction with the effects of the fires. In comparing the effects of the action alternatives, I took a hard look at the effects discussions in Chapter 3 of the FEIS. The use of project design, resource protection measures and applicable standards and guidelines, reduces the adverse effects to levels that provide an adequate level of environmental safeguards for resource protection. I believe my selection of Alternative 2-Modified shows the appropriate balance between resource protections and recovery activities.

X. PROJECT DESIGN, MITIGATION AND RESOURCE PROTECTION MEASURES

The resource protection and mitigation measures described in the FEIS (FEIS Section 2.7) are site-specific management activities designed to reduce the adverse impacts of the associated project activities. These resource protection measures will be applied to project design and layout, in timber sale contracts, and permit requirements. The resource protection measures will be implemented through project design, contract specifications, contract administration, and monitoring by Forest Service personnel.

As part of my decision I am choosing to implement the 58 resource protection and mitigation measures identified in the FEIS – Section 2.7. These include seasonal restrictions for various wildlife species, avoiding working near threatened or endangered or sensitive plants and animals and limiting activities to seasons when adverse soil and water effects can be avoided or minimized. I am confident that the resource protection measures will adequately prevent or minimize adverse effects for the following reasons: these are practices we have successfully used in the past; many are recognized best management practices for protecting water quality; or they are based on current research. I believe these resource protection measures represent all practicable means to avoid or minimize environmental harm from the selected alternative. I have decided to monitor the implementation of these measures as described in the following section.

XI. MONITORING

There are several areas of monitoring described in the FEIS (Section 2.8). These include implementation monitoring and monitoring of project activities. This section describes the monitoring I have decided to implement with the B&B Fire Recovery Project and which will be conducted by the Forest Service. This section describes these monitoring efforts in detail.

Implementation Monitoring of Project

The Forest Service will conduct post-sale monitoring and control of noxious weeds within and adjacent to the sale area and along haul routes for at least three growing seasons following completion of the project.

All areas within treatment areas including those to be avoided will be monitored by an archaeologist once during implementation and after implementation has been concluded to confirm that avoidance measures were implemented and effective.

Specific Monitoring for Project Activities

- Monitoring of all units located on sensitive soils is required under the Forest Plan (DLRMP SL-3) and will be done in conjunction with implementation of this project. Units with seasonally high water tables (SRI Map Unit 30) and steep slopes with a moderate to high surface erosion hazard (SRI 21& 22) are identified as sensitive in this analysis and included in Appendix E of the FEIS. Units proposed under Alternative 2 located on steep slopes sensitive to displacement or with an inherent risk of debris flows have hand-felling and helicopter yarding prescriptions intended to minimize detrimental disturbance. A subset of these units will be visually monitored following proposed activities to determine whether statistical monitoring for compliance with DLRMP standards will be necessary. A representative sample of ground-based units among those located on non-sensitive soils that are predicted to exceed DLRMP standards will also be monitored to determine whether detrimental disturbances incurred by this entry would require subsoiling mitigations to maintain compliance with the DLRMP.
- Roads that self close, (brush in) as described previously, under Existing Conditions, will be
 assessed before they "close" so that they are in a "self maintaining" mode, (i.e., have drainage
 features assessed, and structures such as culverts removed if appropriate and be deemed
 hydrologically stable).

 For all units, pre-planting stocking surveys will be completed to determine the density and species composition of natural regeneration. If the desired stand characteristics are not expected to be met, based on these surveys, then artificial regeneration by hand planting will occur.

XII. CUMULATIVE EFFECTS FROM ONGOING AND PROPOSED ACTIVITIES

In deciding to move forward with the B&B Fire Recovery Project – Alternative 2-Modified – I reviewed the other past, ongoing, and reasonably foreseeable activities within the watersheds affected by the fire (Section 3.3 of the FEIS) including other timber sales. I was particularly concerned with how these actions may cumulatively affect water quality, soil productivity, snag and downed wood and northern spotted owl habitat. During the development of the project, I directed the ID Team to consider the likely effects of these other activities in combination with the proposed actions for the B&B Fire Recovery Project. I have considered the effects of other ongoing and proposed actions in addition to the effects of Alternative 2-Modified for the project. The actual analysis of effects (B&B FEIS Chapter 3) did not indicate any cumulative effects that would be significant for any action alternative, and therefore Alternative 2-Modified.

XIII. THE ENVIRONMENTALLY PREFERRABLE ALTERNATIVE

In this Record of Decision I have described the Selected Alternative as modified and given rationale for its selection. It is also required by law that one or more environmentally preferable alternatives be disclosed. The environmentally preferable alternative is not necessarily the alternative that will be implemented and it does not have to meet the underlying need for the project. It does, however, have to cause the least damage to the biological and physical environment and best protect, preserve, and enhance historical, cultural and natural resources [Section 101 NEPA; 40 CFR 1505.2(b)]. NEPA section 6 establishes the following six goals:

- 1. Fulfill the responsibility of this generation as trustee of the environment for succeeding generations
- 2. Assure for all Americans productive and aesthetically and culturally pleasing surroundings
- 3. Attain the widest range of beneficial uses of the environment without degradation or other undesirable and unintended consequences.
- 4. Preserve important natural aspects of our natural heritage
- 5. Achieve a balance between population and resource use
- 6. Enhance the quality of renewable and approach the maximum attainable recycling of depletable resources

On National Forest System lands within the project area, I find that while all the action alternatives hold various strengths for environmental merit, Alternative 2 is the environmentally preferable alternative.

Alternative 2, while it includes the most salvage logging and temporary road construction which can cause short term detrimental effects, it also includes the most fuels reduction and reforestation, especially within LSR allocation, to accelerate the development of the next forest as soon as possible. The resource protection measures included with Alternative 2 significantly reduce the short term impacts to resources. In many areas prior to the fires stand conditions were deteriorating, insects and

disease were causing significant mortality and habitat was disappearing. The recent wildfires have significantly added to that trend. Alternative 2 proposed the most beneficial treatments to recover these lost values, especially within the LSR. Fuels reduction will move the treatment units into the desired fuels loadings that will aid in the reintroduction of fire into these fire adapted ecosystems while reforestation will accelerate the development of the next forest stand and decrease the time it takes to develop large trees in these areas in the future. In addition – Alternative 2-Modified closes and decommissions the most miles of roads and thereby decreases resource impacts from roads to the greatest degree. Balancing all things considered, Alternative 2-Modified is the environmentally preferred alternative – it brings the most acres into more sustainable fuel loadings, it reduces the risk of fire on the most acres, it accelerates the development of forest habitat on the most acres and it decommissions and closes the most roads while incorporating adequate resource protection measures to reduce short-term impacts.

Alternative 3, would impact fewer acres through salvage harvest and temporary road construction and it would also avoid any management activities within the potential sediment contribution areas which would reduce or eliminate the potential for sedimentation to occur in the streams as a result of management activities proposed.

Alternative 4 would affect the fewest acres in the short term but would also have the fewest acres with desired fuel levels and accelerated reforestation of all the alternatives.

Alternative 5, would impact fewer acres than Alternative 2, but more than Alternative 3. It would include fuels reduction and reforestation on treated acres; however, Alternative 5 would retain all large dead snags within LSR allocations that are larger than 20 inches DBH. Researchers and analysis described in the Metolius Watershed Analysis Update of 2004, noted the decrease in large wood structure that has occurred within the Metolius Basin. Alternative 5 would retain this structure in the short term over a few thousand acres.

XIV. EMERGENCY SITUATION DETERMINATION

In recognition of the economic loss associated with on-going wood decay and the loss of opportunities to utilize timber sale revenues to complete important restoration work, the Deschutes National Forest requested an Emergency Situation Determination from Regional Forester – Linda Goodman, on July 11, 2005. On July 22, 2005, the request was granted for three proposed salvage timber sales. As a result, the process of advertising, auctioning and implementing those three salvage timber sales (Little, Bear and Booth Timber Sales) may occur immediately following publication of the availability of this Record of Decision in the Bend Bulletin, the official newspaper of record. Immediate implementation of these sales will prevent the economic loss of approximately 15.0 million board feet of saw timber and the loss of approximately 1.1 million dollars to the Federal Government.

XV. LEGAL REQUIREMENTS AND POLICY

After reviewing the FEIS and actions described in Alternative 2-Modified, I find that my decision is consistent with the relevant laws, regulations and agency policies. The following section summarizes findings required by major environmental laws and consistency with applicable forest plans.

Law, Regulation and Agency Policy

The Preservation of American Antiquities Act, June 1906

All surveyed and inventoried cultural resource sites in the B&B Fire Recovery Project area will be protected from entry and excluded from any resource management activities. New sites discovered during operations will be protected by avoidance or mitigation provisions in the timber sale contract.

The National Historic Preservation Act: The Oregon State Historic Preservation Officer (SHPO)

SHPO has been consulted concerning proposed activities in the B&B Fire Recovery Project area. The Advisory Council on Historic Preservation (ACHP) will be consulted about measures to protect significant archaeological sites from adverse affects, should any be identified.

The section 106 compliance report for the B&B Fire Recovery Project was sent to the Oregon SHPO on. The report described a no effect determination to any significant cultural resource sites for all of the alternatives. No response has been received from SHPO. According to the 1995 programmatic agreement between the Forest Service and Oregon SHPO, SHPO concurrence will be implied if no written response is received within 30 days of receipt by SHPO of the section 106 compliance report.

The Endangered Species Act of 1973, as amended

Biological Evaluations and Assessments have been prepared to document the possible effects of proposed activities on endangered and threatened species in the B&B Fire Recovery Project area. The appropriate coordination, conferencing, and consultation with USFWS have been completed. USFWS has issued documentation describing their concurrence with management activities described in Alternative 2. (Biological Opinion 2003, Concurrence Letter July 7, 2005).

Clean Air Act Amendments, 1977

The Selected Alternative – Alternative 2-Modified – was designed to meet the National Ambient Air Quality standards through avoidance of practices that degrade air quality below health and visibility standards. The Oregon State Implementation Plan and the Oregon State Smoke Management Plan will be followed to maintain air quality (FEIS Section 2.7).

The Clean Water Act, 1982

The Selected Alternative – Alternative 2-Modified - will meet and conform to the Clean Water Act as amended in 1982 (FEIS Section 3.5 and Appendix B). This act establishes a non-degradation policy for all federally proposed projects. The Selected Alternative meets anti-degradation standards agreed to by the State of Oregon and the Forest Service, Region 6, in a Memorandum of Understanding (Forest Service Manual 1561.5). This will be accomplished through planning, application, and monitoring of Best Management Practices (BMPs). Site-specific BMPs have been designed to protect beneficial uses (FEIS, Appendix F).

Satisfaction of State Forest Worker Safety Codes

The Oregon Occupational Safety and Health Code for Forest Activities (OAR 437, Division 6) regulations will be met when Alternative 2-Modified is implemented. Salvage strategies are designed to provide for worker safety by providing for appropriately sized openings to facilitate safe operation of yarding equipment or by clumping dead trees that are retained.

Environmental Justice

Executive Order 12898 on environmental justice requires federal agencies to identify and address any disproportionately high and adverse human health or environmental effects on minority and low income populations (FEIS, Section 3.26.8). The analysis focuses on potential effects from the project to minority populations, disabled persons, and low-income groups.

Implementing Alternative 2-Modified will provide a variety of opportunities for potential contracts. The alternatives would have no impact on the contracting process or the USDA Small Business Administration program for reserving contracts for minority groups for tree planting. Employment and income would be available to all groups of people, subject to existing laws and regulations for set-asides, contract size, competition factors, skills and equipment, etc.

Opportunities for all groups of people to collect species from disturbed and non-disturbed sites would be maintained by Alternative 2-Modified, and no disproportionate effect is anticipated to subsets of the general population.

I find that Alternative 2-Modified would not have disproportionately high and adverse environmental effects on minority populations, low-income populations, or Indian tribes.

Other Policy or Guiding Documentation

Biological Evaluations were prepared to assess potential effects to sensitive species as identified by the Regional Forester. The evaluations for aquatic species and terrestrial wildlife determined that for most species there is no impact; for others, while there may be impacts to individual sensitive species, those effects are not likely to contribute to a trend towards federal listing or loss of viability of the population or species. Evaluations for sensitive plant species determined that, for both Peck's penstemon and tall agoseris, while there may be impacts to individuals or habitat, the effects of disturbance that would result in mortality are not likely to contribute to a trend towards federal listing or loss of viability to the population or species. Since implementing the Conservation Strategy in 1992, all projects have been designed consistent with this strategy, ensuring both short and long term species and habitat conservation. Although implementation of the B&B project will have short term effects on individual plants and habitat due to direct mortality and introduction of noxious weeds, each of these species is likely to have a long term benefit from harvest related activities due to fuels reduction and facilitation of future fuels management efforts.

The FEIS for Managing Competing and Unwanted Vegetation, November 1988, Record of Decision signed December 1988, and the requirements of the Mediated Agreement, signed May 1989, and the USDA Forest Service Guide to Noxious Weed prevention Practices (2001), guide the policies for managing competing and unwanted vegetation used in this decision. This project will use prevention as the main strategy to manage unwanted and competing vegetation, and will incorporate all measures contained in the above documents.

The Deschutes National Forest Land and Resource Management Plan, as amended, provided the framework for the development of all the alternatives. I have reviewed the Metolius Late Successional Reserve Assessment and have incorporated principles from it and the Metolius Watershed Analysis and Watershed Analysis Update. My decision is based on using active management to restore a portion of a burned area that is not capable of self correcting in a time period I find acceptable. The actions proposed for the Metolius LSR in Alternative 2-Modified have been reviewed, and found consistent with Northwest Forest Plan standards and guidelines by the Regional Ecosystem Office (FEIS Appendix H).

The selected alternative is consistent with direction in the Northwest Forest Plan and recommended management actions in the Metolius Watershed Assessment (including the Aquatic Conservation Strategy Objectives), Metolius Late-Successional Reserve Assessment and the Metolius Wild and Scenic River Plan (FEIS Appendix B).

The Record of Decision to Remove Survey and Manage (S&M) Mitigation Measure Standards and Guidelines was signed on March 22, 2004 and became effective on April 21, 2004. While surveys are not required for all S&M species, protection measures will be implemented as appropriate to maintain viable populations for all S&M species located during surveys.

XVI. FOREST PLAN CONSISTENCY

Deschutes Land and Resource Management Plan

I find Alternative 2-Modified, after the inclusion of two site specific Forest Plan amendments, to be consistent with the standards and guidelines and management objectives discussed in the Deschutes National Forest Plan, as amended.

Visual Quality

A short-term, non-significant, site specific amendment of several visual quality standards and guidelines in the Deschutes National Forest Land and Resource Management Plan, is included in my decision to allow impacts from salvage and prescribed burning to be visible to the "casual observer" for slightly longer periods than under the existing Standards and Guidelines. Though the current Visual Quality Standards and Guidelines will not be met in the short-term, the project actions are expected to better meet visual quality objectives for the long-term (over five to ten years). Following is a description of proposed changes to the existing standards and guidelines for Scenic Views (MA9), Metolius Heritage (M19), Metolius Black Butte (M21), and Metolius Special Forest (M22).

A goal for scenic views in the project area is to provide forest visitors with high quality scenery that represents the natural character of Central Oregon. The objectives call for enhancing landscapes by opening views to distant peaks, and highlighting large ponderosa pine. The scenic views allocation of "retention-foreground" and "retention-middleground" are found within the project area. Although proposed activities are intended to meet the goals and the Standards and Guidelines over the long-term (longer than 5 years), short-term visual impacts are expected from removing vegetation (slash, stumps, stacked logs, skid roads) and reducing fuels (blackened, scorched vegetation and tree trunks, piles). As such the following Standards and Guidelines will be amended:

M9-4, M19-26 and M21-9: Ponderosa Pine Foreground, Metolius Heritage and Metolius Black Butte – Desired Visual Condition

The proposed actions of salvage, fuels treatments and burning are expected to result in visible changes noticeable by the casual observer in these management areas. These Standards and Guidelines will be amended to accept that the casual forest visitor may notice short-term changes in these allocations. These objectives will be met over the long term through re-establishment of open, park-like stands of ponderosa pine and enhancement of existing large pine trees.

M9-8, M9-27, M9-44, M21-20, and M22-13: Timing of Cleanup Activities in Ponderosa Pine Foregrounds, Mixed Conifer Foregrounds, Middlegrounds and Backgrounds, and forested areas in the Metolius Black Butte and Metolius Special Forest areas

These Standards and Guidelines establish that slash, logging residue, or other results of management activities will not be obvious to the casual forest visitor one year following the activity in Retention areas, and two years following the activities in Partial Retention areas. Although the Sisters Ranger District intends to clean up the slash as soon as possible, especially along travel corridors, this project would employ prescribed burning to reduce natural fuels, and fuels created by timber harvest activities. These Standards and Guidelines will be amended to allow visible effects of harvest cleanup and fuels reduction for approximately 5 years.

M-29, M9-34 and M22-8: Openings in Mixed-Conifer Foreground, and in Metolius Special Forest

The intent of management actions in these areas is to salvage harvest, reduce fuels, and restore the next generation forest to many areas. Openings will be reforested, as needed, if insufficient natural reproduction exists. This Standard and Guideline will be amended to allow openings to be visible for approximately 7 to 10 years, the estimated time it would take for seedlings in these openings to reach 4 ½ feet, depending on the site conditions. This is the tree height at which "openings" are considered returned to a forested condition, (Regional Guide, Pacific Northwest Region, 1984).

Fuelwood Collection

A site-specific, non-significant amendment of fuelwood standard and guideline in the Deschutes National Forest Land and Resource Management Plan is included in my decision to allow the Forest Service to permit commercial and personal use fuelwood collection in the Metolius Heritage area.

M19-27: Fuelwood, Metolius Heritage Area

Fuelwood is a product that can be utilized as an outcome of implementing forest health and fuel reduction objectives under this project. Both commercial and personal fuelwood collectors could help accomplish these objectives by removing excess vegetation. The activity will only be permitted in specified areas and under specified terms and conditions that would mitigate potential impacts.

Determination that the Forest Plan Amendments are Not Significant under NFMA

The proposed revised Visual Quality and Fuelwood standards and guidelines will not significantly change the forest-wide impacts disclosed in the Deschutes National Forest Land and Resource Management Plan (LRMP) Environmental Impact Statement (EIS), based on the following factors:

Timing: The effects of the revised Visual Quality standards and guidelines for implementing the B&B Fire Recovery Project are predicted to occur in the short-term (approximately 5 years) for prescribed burning and post harvest activities. Created openings from removing dead and dying trees would be visible for longer periods (7 to 10 years) but are expected to appear forested more quickly than if they were not treated (where needed, openings will be reforested). The effects of the proposed revised Fuelwood Collection standard and guideline for implementing the B&B Fire Recovery Project are predicted to occur in the short-term (approximately 5 years) during implementation of the project (FEIS Section 3.25).

Location and Size: The revised Visual Quality standards and guidelines are site specific and would only affect the area within the B&B Fire Recovery Project area boundary. The proposed amendment of the Fuelwood Collection standard and guideline will only affect the Metolius Heritage area (MA 19) (FEIS Section 3.25).

Goals, Objectives and Outputs: The revised Visual Quality and Fuelwood Collection standards and guidelines will not alter the long-term relationship between levels of goods and services projected by the Land and Resource Management Plan. There will not be any significant change in timber outputs over what might be available if the project was designed without the amendment. Wood material that can not be removed through the use of fuelwood permits, will be removed by other means.

Management Prescriptions: The revised Visual Quality and Fuelwood Collection standards and guidelines will not change the desired future condition for land and resources from that contemplated by the existing management direction in the Land and Resource Management Plan in the short-term. It will not affect the whole Land and Resource Management Plan planning area, but only approximately 6,800 acres of National Forest System lands within the Metolius Basin project area. The amendments will not change the Land and Resource Management Plan allocations or management areas.

Consistency with NFMA Requirements

In all other respects, I find this decision to be consistent with the Deschutes Forest Plan, as amended and with the requirements of the National Forest Management Act implementing regulations.

I find Alternative 2-Modified to be consistent with the standards and guidelines in the Northwest Forest Plan of 1994. The B&B Fire Recovery Project is consistent with Standards and Guidelines for management of habitat of late-successional and old-growth forest related species within the range of the spotted owl. Appendix H of the FEIS describes in detail how the B&B Fire Recovery Project is consistent with each standard and guideline that apply. The Regional Ecosystem Office has also reviewed the B&B Fire Recovery Project and has concurred with our assessment that the project is consistent with the standards and guidelines and the management intent for LSR land allocations (FEIS Appendix H).

XVII. CONSULTATION AND COORDINATION WITH TRIBES AND GOVERNMENT AGENCIES

Tribes

Consultation with the Confederated Tribes of the Warms Springs Reservation of Oregon (CTWSRO) occurred and the Burn Pauite and Umatilla Tribes were contacted prior to my decision. The B&B Fire Recovery Project is included in lands that were ceded by the CTWSRO, according to the 1855 treaty with the tribes of Middle Oregon and treaty boundaries as depicted in the Royce Land Cessions circa 1778-1883.

Government to government consultation with the tribes has been occurring since early in the project development process through scoping letters and dialogue on the proposed activities within the B&B Fire Recovery Project analysis area. No special concerns about Tribal resources were identified. It is acknowledged that the Tribes may have lost the verbal history and they may not know where desired plant species and cultural resources may be found. This may affect their ability to tell Federal agencies where Tribal trust resources can be located on Federal lands.

Government Agencies

Coordination has occurred with federal, state, and local government officials (see Chapter 4 of the FEIS), including the U.S. Fish and Wildlife Service (USFWS), NOAA Fisheries and the Environmental Protection Agency (EPA). The EPA has not identified any environmental impacts

requiring substantive changes in the proposal. Information has been provided to and exchanged with state agencies and Deschutes and Jefferson Counties.

USFWS

Northern spotted owl and bull trout within the B&B Fire Recovery Project area are listed as threatened species under the Endangered Species Act (ESA). Actions proposed are considered May Affect, Not Likely to Adversely Affect northern spotted owls and are within the scope of actions previously consulted on under the 2003 Joint Programmatic Biological Opinion. Since actions proposed in the B&B Fire Recovery Project were already covered under consultation the Forest did not re-initiate consultation in response to the project.

A Biological Assessment was prepared for bull trout. Actions proposed in the B&B project were considered May Affect, Not Likely to Adversely Affect bull trout and their habitat. The USFWS concurred with this assessment and issued a concurrence letter regarding these actions dated July 7, 2005.

NOAA Fisheries

The upper Deschutes and Crooked River basins have been identified as Essential Fish Habitat under the Magnuson-Stevens Act. This act protects habitat important to commercial ocean fisheries including chinook salmon and with the likelihood of future passage of anadromous fish in the upper Deschutes Basin the Sisters Ranger District submitted the biological assessment for the B&B Fire Recovery Project to NOAA Fisheries. NOAA Fisheries does not issue a finding with regard to these proposed actions.

XVIII. CHANGES BETWEEN THE DRAFT AND FINAL EIS

The following changes were made between the B&B Fire Recovery Project Draft and Final EIS. This list does not include minor grammatical corrections, editorial formatting, and clarification of data previously presented. The changes were driven by public comment and a comprehensive internal review.

- ✓ All sections of Chapter 3 have been edited and updated.
- ✓ The effects analysis for most resources has been improved and/or clarified.
- ✓ New sections have been added for Wild & Scenic Rivers, Wilderness and Inventoried Roadless Areas.
- ✓ The Spotted Owl/LSR discussion has been separated into its own section.
- ✓ Cumulative effects analyses have been clarified for fisheries, water quality, and soils.

XIX. IMPLEMENTATION

I have reviewed the B&B Fire Recovery Project FEIS and associated appendices. I feel there is adequate information within these documents to provide a reasoned choice of action. I am fully aware of the possible adverse environmental effects that cannot be avoided, and the irreversible/irretrievable commitment of resources associated with the Alternative 2-Modified which I have selected (FEIS p. 3-535). I have determined that these risks will be outweighed by the likely benefits. Implementing Alternative 2-Modified will cause no unacceptable cumulative impact to any resource. There will be no significant impact to cultural resources, consumers, civil rights, minority

groups, or women. The FEIS adequately documents how compliance with these requirements is achieved (FEIS, Chapter 3).

An emergency situation status was granted on July 27, 2005. Harvest activities on a portion of Alternative 2-Modified will be implemented immediately.

Procedure for Change during Implementation

Minor changes may be needed during implementation to better meet on-site resource management and protection objectives.

In determining whether and what kind of further NEPA action is required, the Responsible Official will consider the criteria for whether to supplement an existing Environmental Impact Statement in 40 CFR 1502.9(c) and FSH 1909.15, sec. 18, and in particular, whether the proposed change is a substantial change to the intent of Alternative 2-Modified as selected, as planned and already approved, and whether the change is relevant to environmental concerns. Connected or interrelated proposed changes regarding particular areas or specific activities will be considered together in making this determination. The cumulative impacts of these changes will also be considered.

The intent of field verification prior to my decision was to confirm inventory data and to determine the feasibility and general design and location of a road or unit, not to locate the final boundaries or road locations. For example, salvage unit prescriptions may be modified if site conditions dictate and if other resource objectives can be met. Minor adjustments to unit boundaries may be needed during final layout for resource protection, to improve logging system efficiency, and to better meet the intent of my decision. Many of these minor changes will not present sufficient potential impacts to require any specific documentation or action to comply with applicable laws.

XX. APPEAL PROCESS AND RIGHTS

My decision is subject to administrative appeal. Organizations or members of the general public may appeal my decision according to Title 36 CFR Part 215. The 45-day appeal period begins the day following the date the legal notice of this decision is published in the Bend Bulletin, Bend, Oregon, the official newspaper of record. The written Notice of Appeal must be filed with the Appeal Deciding Officer at:

Appeal Deciding Officer Pacific Northwest Region USDA Forest Service Attn. 1570 Appeals 333 S.W. First Avenue PO Box 3623 Portland, OR 97208-3623

Appeals can also be filed electronically at: appeals-pacificnorthwest-regional office@fs.fed.us, or hand delivered to the above address between 7:45 AM and 4:30 PM, Monday through Friday except legal holidays. The appeal must be postmarked or delivered within 45 days of the date the legal notice for this decision appears in the Bend Bulletin newspaper. The publication date of the legal notice in

the Bend Bulletin newspaper is the exclusive means for calculating the time to file an appeal and those wishing to appeal should not rely on dates or timeframes provided by any other source.

Electronic appeals must be submitted as part of the actual e-mail message, or as an attachment in Microsoft Word (.doc), rich text format (.rtf) or portable document format (pdf) only. E-mails submitted to e-mail addresses other than the one listed above or in other formats than those listed or containing viruses will be rejected. Only individuals or organizations who submitted substantive comments during the comment period may appeal.

It is the responsibility of those who appeal a decision to provide the Regional Forester sufficient written evidence and rationale to show why my decision should be changed or reversed. The appeal must be filed with the Appeal Deciding Officer § 215.8 in writing. At a minimum, an appeal must include the following:

- ✓ Appellant's name and address (§ 215.2), with a telephone number, if available, of the appellant;
- ✓ Signature or other verification of authorship upon request (a scanned signature for electronic mail may be filed with the appeal);
- ✓ When multiple names are listed on an appeal, identification of the lead appellant (§ 215.2) and verification of the identity of the lead appellant upon request;
- ✓ The name of the project or activity for which the decision was made including document title and subject, the name and title of the Responsible Official, and the date of the decision;
- ✓ The regulation under which the appeal is being filed, when there is an option to appeal under either this part or part 251, subpart C (§ 215.11(d));
- ✓ Any specific change(s) in the decision that the appellant seeks or portion(s) of the decision to which the appellant objects, and rationale for those changes or objections;
- ✓ Any portion(s) of the decision with which the appellant disagrees, and explanation for the disagreement;
- ✓ Why the appellant believes the Responsible Official's decision failed to consider the substantive comments previously provided, either before or during the comment period specified in Title 36 CFR 215.6; and,
- ✓ How the appellant believes the decision specifically violates law, regulation, or policy.

On July 27, 2004, Forest Service Regional Forester, Linda Goodman determined the B&B Fire Recovery Project to be an emergency situation and exempted it from stay pursuant to 36 CFR 215.10. This means that my decision may be implemented immediately following publication of the availability of this Record of Decision in the Bend Bulletin, the official newspaper of record. This emergency exemption is based on the economic value the government would lose if the project was delayed during the appeal period. The value loss is estimated at over \$1,112,000. The exemption from stay during the appeal period applies only to the portion of the project implemented with the Little, Booth and Butte Timber Sales.

XXI. CONTACT PERSONS

For additional information concerning the specific activities authorized with my decision, you may contact:

Maret Pajutee Public Affairs Contact Sisters Ranger District P.O. Box 249 Sisters, OR 97759 (541)549-7727 Bill Anthony District Ranger Sisters Ranger District P.O. Box 249 Sisters, OR 97759 (541)549-7701

Responsible Official:

LESLIÉ A.C. WELDON

Forest Supervisor

U.S. Department of Agriculture Deschutes National Forest

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XXII. BIBLIOGRAPHY

- Everett, R. 1995. Memorandum to John Lowe, Regional Forester, Region 6. Review of Beschta Document. On file with: Deschutes National Forest, 1001 Emkay Dr., Bend, OR 97702. 16 August.
- Great Basin Incident Management Team (GBIMT). 2003. B&B Complex Incident Narrative. September 7-19, 2003.
- NWCG (National Wildfire Coordinating Group). 2004. Glossary of Wildland Fire Terminology. Boise. National Interagency Fire Center. http://www.nwcg.gov/pms/pubs/glossary/E.htm#Exempt%20/%20Nonexempt
- USDA FS. 1990. Deschutes National Forest Land and Resource Management Plan. Bend, OR.
- USDA FS. 1996. Metolius Late-Successional Reserve Assessment. Deschutes National Forest; Sisters Ranger District; Sisters, OR.
- USDA FS. 2004. Metolius Watershed Analysis Update. Deschutes National Forest; Sisters, Ranger District; Sisters, OR.