



United States
Department of
Agriculture

Pacific Northwest
and Southwest
Regions

Record of Decision
**To REMOVE THE SURVEY AND MANAGE
MITIGATION MEASURE STANDARDS AND
GUIDELINES**
from Forest Service Land and Resource
Management Plans Within the Range
of the Northern Spotted Owl



*Forest Service National Forests in Region 5 and 6
Within the Range of the Northern Spotted Owl*

July 2007

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Record of Decision

To Remove the Survey and Manage Mitigation Measure Standards and Guidelines from Forest Service Land and Resource Management Plans within the Range of the Northern Spotted Owl

USDA-Forest Service

July 2007

Amending the Land and Resource Management Plans for the Gifford Pinchot, Mt. Baker-Snoqualmie, Olympic, and Okanogan-Wenatchee National Forests in Washington; the Deschutes, Mt. Hood, Rogue-Siskiyou, Siuslaw, Umpqua, Winema, and Willamette National Forests in Oregon, and the Klamath, Lassen, Mendocino, Modoc, Shasta-Trinity, and Six Rivers National Forests in California.

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1. Introduction

Summary

With this Record of Decision, I am removing the Survey and Manage Mitigation Measure Standards and Guidelines from the Land and Resource Management Plans of the 19 National Forests in western Washington, western Oregon, and northwestern California within the range of the northern spotted owl (the Northwest Forest Plan area). I am selecting, with mitigation for two vertebrates, Alternative 2 as described and analyzed in the 2007 *Final Supplement to the 2004 Final Supplemental Environmental Impact Statement To Remove or Modify the Survey and Manage Mitigation Measure Standards and Guidelines* (Final Supplement). My Decision amends the Forest Plans by removing the species-specific Survey and Manage direction applicable for up to 337 rare and little-known species and 4 arthropod groups. This direction is a part of previous amendments to those Plans commonly referred to as the Northwest Forest Plan. My Decision relies on other provisions of the Northwest Forest Plan and the Agency's Sensitive Species Program (or other relevant policies) to continue to provide for the conservation of these species. The species affected by this Decision are fungi, bryophytes, lichens, mollusks, vascular plants, seven vertebrates, and four arthropod groups.

The Bureau of Land Management (BLM) was a co-lead agency for preparation of the Final Supplement, and the effects described in the Final Supplement and this Record of Decision assume a concurrent Decision by the Secretary of the Interior.

I am making this Decision because the Survey and Manage portion of the Northwest Forest Plan has unexpectedly limited the Agency's ability to accomplish the goals and objectives of the Northwest Forest Plan. My Decision meets the *Need* and *Purposes* identified in the Final Supplement by continuing to meet the habitat needs of late-successional forest associated species while making it possible for the Forest Service to provide:

- for ecosystem restoration and protection;
- for timber harvest; and,
- for the conduct of other management activities

to the degree that these have been frustrated by the Survey and Manage requirements. Compared to the No-Action Alternatives, the Final Supplement indicates this Decision (and the concurrent Decision by the Secretary of the Interior) will better meet the *Need* and *Purposes* by:

- reducing costs by \$13 million annually;
- increasing fuels treatments by 5,000 acres annually and increasing the effectiveness of those treatments;
- increasing timber harvest by 70 million board feet annually; and,
- adding 400 jobs.

Adverse effects to 53 species are identified in the Final Supplement as a result of the selected alternative, but I believe the overall increase in the risk of species extirpation is small due, in part, to the following factors:

- 87 percent of the late-successional forest is in reserves;
- stated effects often cover only a portion of a species range;
- the Agency's Sensitive Species Program is available to help species truly at risk; and,
- the projected level of future habitat disturbance is small.

This small increase in risk is reasonable, and in fact, permitted by the 1982 diversity provision at 36CFR 219.27(g) under which the Final Supplement was prepared (Final Supplement:180).

Background

The Northwest Forest Plan

In 1994, the Secretaries of Agriculture and the Interior amended the planning documents of the 19 National Forests and 9 BLM units within the range of the northern spotted owl. Those amendments, commonly known (and referred to herein) as the Northwest Forest Plan, were intended to conserve late-successional forest related species and produce a sustainable level of timber harvest. The key elements of the Northwest Forest Plan are the land allocations and related standards and guidelines. The seven land use allocations are Congressionally Reserved Areas, Late-Successional Reserves, Adaptive Management Areas, Managed Late-Successional Areas, Administratively Withdrawn Areas, Riparian Reserves, and Matrix. Standards and guidelines describe how lands should be managed and specify conditions to be achieved or maintained; some apply to all lands while others apply to specific land allocations.

Species experts assisting in the preparation of the Northwest Forest Plan predicted the Plan would provide adequate habitat for nearly 800 late-successional forest-associated species including those listed under the Endangered Species Act, but could not predict the Plan would adequately protect about 400 other late-successional forest related species that were apparently rare or about which little was known. In response to this concern, eight mitigation measures, including Survey and Manage, were added to the final Plan to provide additional benefits for these apparently rare species of fungi, bryophytes, lichens, mollusks, vascular plants, several vertebrates, and four arthropod groups. And since there was little information available about the abundance and distribution of these species, other than they were generally thought to be rare, Survey and Manage was projected to have a 'relatively minor' effect on the environmental, economic, and social consequences described in the 1994 Final SEIS (USDA, USDI 1994a:3&4-39; Final Supplement:101).

Management of known species sites was required for activities beginning in 1995, and most other requirements were phased in by the late 1990s.

The 2000 Final SEIS

By November 1998, it was clear there were difficulties implementing the 1994 direction. Those difficulties included:

- Some species were more common than anticipated, resulting in more restrictions on timber harvest and other activities than needed to protect the species;
- Some species apparently needed more management than was prescribed;
- Some requirements created land allocations inconsistent with protections needed;
- Some requirements conflicted with each other;
- Some requirements were not practicable, incurring unreasonably high cost;
- Implementation dates were not specified, resulting in conflicting interpretations; and,
- No adaptive management process or criteria were specified to remove species no longer needing the additional protection, although such changes were specifically provided for in the Northwest Forest Plan (USDA, USDI 2000a:9-10).

However, because the Agencies had been implementing Survey and Manage only a short while and had little new information about habitat trends, species populations, or the actual benefits provided by Survey and Manage, the 2000 Final SEIS proposed

only to restructure the Standards and Guidelines to make them more workable (Final Supplement:100).

Because the proposed action was simply to correct implementation difficulties, the 2000 Final SEIS did not reexamine the need for Survey and Manage. However, the Final SEIS did display the costs and impacts of Survey and Manage to other programs more accurately than had been predicted in the Northwest Forest Plan Final SEIS. The 2000 Final SEIS estimated the restructured Standards and Guidelines would reduce Northwest Forest Plan annual timber harvest by 51 million board feet, in addition to adversely affecting other potentially habitat-disturbing management activities (USDA, USDI 2000a: xxxi).

The proposed action in the 2000 Final SEIS was adopted in January 2001. That Decision removed about 70 species, and adopted new Survey and Manage Standards and Guidelines applying to the 337 remaining species that included:

- direction to manage known sites for nearly all species;
- a pre-disturbance survey requirement if characteristics of the species made locating them with such surveys practical; and,
- a new criteria-driven process for annually evaluating new information about species and determining whether this new information was basis for adding or removing species from Survey and Manage or changing assigned management categories (the Annual Species Review (ASR) process).

Following the January 2001 Decision, the Agencies vigorously implemented all elements of the new Standards and Guidelines. The 2001, 2002, and 2003 ASR process changed the management category assignments for 32 species, removed 42 species from Survey and Manage in all of their range, and removed another 16 species in part of their range. By 2004, there were 295 species on Survey and Manage. (These species and their post-ASR category assignments are displayed as No-Action Alternative 1 in the Final Supplement.)

The 2004 FSEIS

Following the quantification of the adverse effects to timber harvest and other Survey and Manage effects in the 2000 Final SEIS, Douglas Timber Operators and others filed a lawsuit against the Secretaries of Agriculture and the Interior. The plaintiffs alleged that the Survey and Manage amendments effectively transferred more than 81,000 acres of timber-producing forest land into permanent reserves, resulting in a 7 percent reduction of the regional timber volume predicted from the Northwest Forest Plan (NWFP) area, or 51 million board feet annually, in perpetuity (Douglas Timber Operators, et al. v. Secretary of Agriculture, et al. Civil No. 01-6378-AA (D. Oregon, filing December 24, 2001)). Thus, plaintiffs alleged, the Survey and Manage provisions were in violation of the substantive and procedural requirements of the Oregon and California Railroad and Coos Bay Wagon Road Grant Lands Act (O&C Act), 43 U.S.C. §1181a; the National Forest Management Act (NFMA), 16 U.S.C. §1600, et seq.; the Multiple-Use Sustained-Yield Act of 1960, 16 U.S.C. §528-531; and the Federal Land Policy and Management Act (FLPMA), 43 U.S.C. §1701, et seq. (Final Supplement:5).

In settlement of the litigation, the Secretaries agreed to supplement the 2000 Final SEIS and to consider an alternative *“that replaces the Survey and Manage mitigation requirements with existing Forest Service and BLM Special Status Species Programs to achieve the goals of the Northwest Forest Plan through a more streamlined process”* (Final Supplement:5)

When work on this new supplement began in late 2002, the Agencies had gained more experience with implementation of the Survey and Manage provisions. They found that while the 2000 Final SEIS had improved upon the effects projections made in the 1994

Final SEIS, it nonetheless underestimated the impacts of Survey and Manage to timber harvest and fuels treatments. By this time, it was apparent that the provisions were significantly contributing to the Agencies' inability to accomplish other Northwest Forest Plan goals, including those for ecosystem restoration and protection. Specifically, the Survey and Manage Mitigation Measure Standards and Guidelines were substantially restricting the ability of the Agencies to conduct forest health treatments (i.e. fuels reduction and Late-Successional Reserve and riparian thinning) through exhaustive and time-consuming surveys and restrictive management prescriptions. They were also reducing the level of timber harvest from that predicted for the Northwest Forest Plan area. Thus, the *Need* and *Purposes* identified for the 2004 FSEIS were substantially different from those identified for the 2000 Final SEIS.

The Need

The underlying needs to which the 2004 FSEIS responded were healthy forest ecosystems and a sustainable supply of timber and other forest products, to the extent these were frustrated by the Survey and Manage Mitigation Measure Standards and Guidelines (Final Supplement:5).

The Purposes

The *Purposes* of the 2004 FSEIS were:

- to meet the terms of the settlement agreement;
- to conserve rare and little known species;
- to reduce cost and effort; and,
- healthy forests and timber outputs (Final Supplement:5-6).

The 2004 Record of Decision and Subsequent Special Status Species Program Assignments

On March 22, 2004, the Secretaries of Agriculture and the Interior issued a combined Record of Decision, removing Survey and Manage from the Land and Resource Management Plans in the Northwest Forest Plan area. By July 2004, 145 of the 295 species included in the 2004 FSEIS had been assigned to one or more of the Agencies' Special Status Species Programs¹. These nation-wide agency-specific programs are designed to provide additional species-specific management for rare species potentially negatively affected by management activities.

2004 Record of Decision Set Aside by District Court

In October 2004, a lawsuit by the Northwest Ecosystem Alliance and others alleged the 2004 FSEIS contained numerous deficiencies in violation of the National Environmental Policy Act (NEPA), the National Forest Management Act (NFMA), and the Federal Land Policy and Management Act (FLPMA) (*Northwest Ecosystem Alliance v. Rey*, 380 F. Supp. 2d 1175 (W.D. Wash. 2005), hereinafter *NEA v. Rey*). In October 2005, the Court found the 2004 FSEIS deficient under NEPA in three specific areas (see *Response to Three Issues Identified by District Court* later in this Section). In January 2006, the court set aside the 2004 Record of Decision and ordered the Agencies to apply the January 2001 Survey and Manage Standards and Guidelines, including any amendments or modifications (including the 2001, 2002, and 2003 Annual Species Review changes) that were in effect as of March 21, 2004.

¹The Forest Service's Sensitive Species Program and the BLM's Special Status Species Program are collectively referred to as the Agencies' Special Status Species Programs.

The Agencies published a Notice of Intent on December 12, 2005 to prepare a Supplement to the 2004 FSEIS to address these deficiencies. A Draft Supplement was issued for 90-day public review beginning in July 2006. The Draft Supplement addressed the three deficiencies, updated the species effects discussions in response to new information, and added additional discussion of legal requirements, risk to species, and late-successional forest ecosystems.

On October 11, 2006, the District Court modified its January 2006 order, permitting the 2004 Record of Decision removing Survey and Manage to apply to thinning in stands less than 80 years of age, and to apply to certain prescribed fire fuel treatments, culvert replacements and removals, and riparian and stream habitat improvement projects. Because this order is limited in scope and represents relatively minor changes from the alternatives presented, no change to No-Action Alternative 1 in the Supplement was made or assumed (Final Supplement Vol. 2:620).

Ninth Circuit Court Decision Regarding Annual Species Reviews

On November 6, 2006, in a different court case, the United States Court of Appeals for the Ninth Circuit ruled the BLM violated the Federal Land Policy and Management Act (FLPMA) and the National Environmental Policy Act (NEPA) when it authorized two timber sales that did not apply Survey and Manage provisions to a species removed from Survey and Manage by the Annual Species Review (ASR) process (Klamath Siskiyou Wildlands Center et al. v. Boody et al., 468 F.3d 549 (Ninth Circuit 2006) hereinafter KSWC v. Boody). The court found the ASR category change and subsequent removal of the red tree vole from the Mesic Biological Zone constituted a Resource Management Plan amendment, which should have had accompanying NEPA analysis. The Ninth Circuit decision re-established the red tree vole as a Survey and Manage species in the Mesic Biological Zone for the BLM, and had potential implications for both Agencies regarding the other category changes and species removals made by the 2001, 2002, and 2003 Annual Species Reviews.

Although the Ninth Circuit's KSWC v. Boody decision was specific to the red tree vole and the BLM, the Agencies chose to consider the potential implications of that decision on all species affected by the ASR process by adding another "No-Action" alternative (Alternative 4) to the Supplement. Alternative 4 includes all 337 species and categories (plus 4 arthropod functional groups) as they were on Survey and Manage upon issuance of the 2001 Record of Decision. It therefore includes (on Survey and Manage) 58 species previously removed from Survey and Manage in all or part of their range by the 2001, 2002, and 2003 ASRs, and restores the 2001 category assignments for another 32 species (USDA, USDI 2001a:41-51).

Alternative 4, and analysis of the 58 additional species under all four of the alternatives, was included in a *Supplement* to the July 2006 Draft Supplement. The *Supplement* was circulated for 90-day public review beginning in January 2007.

The 2007 Final Supplement

To correct the three deficiencies identified by the U.S. District Court in NEA v. Rey, and to reconsider the ASR changes in response to the potential implications of the Ninth Circuit Court decision in KSWC v. Boody, the Agencies prepared the 2007 *Final Supplement to the 2004 FSEIS To Remove or Modify the Survey and Manage Mitigation Measure Standards and Guidelines* (Final Supplement), the document upon which this Decision is based. The *Need, Purposes*, and proposed action remained the same as in the 2004 FSEIS. However, the Final Supplement addresses the court decisions, as described later in this Section (Section 1) and contains all of the analysis in the 2004 FSEIS, the July 2006

Draft Supplement, and the January 2007 *Supplement* to the July 2006 Draft Supplement, updated to respond to new information, inflation, and additional public review (see Section 5 (*Public Involvement*) of this Record of Decision). The Final Supplement includes an additional alternative, No-Action Alternative 4, and contains additional background material about habitat, management activity levels, species outcomes, and previous analyses, when compared with the 2004 FSEIS (Final Supplement:xxv). Discussions in the individual species effects sections are sometimes abbreviated because species background information in the 2000 Final SEIS and Appendix J2 of the 1994 Northwest Forest Plan Final SEIS were not repeated (Final Supplement Vol. 2:210)

The Proposed Action

The Proposed Action (Alternative 2 in the Final Supplement) is to remove the Survey and Manage Mitigation Measure Standards and Guidelines from the Land and Resource Management Plans in the Northwest Forest Plan area. Conservation of rare and little known species would rely on other elements of the Northwest Forest Plan and, if additional species-specific management is needed, the two Agencies' Special Status Species Programs. Three alternatives to the proposed action were considered; See *Other Alternatives Considered in Detail and Reasons They Were Not Selected* in Section 3 (*Reasons for this Decision*) of this Record of Decision.

Special Status Species Programs

The objectives of the Agencies' Special Status Species Programs include avoiding actions that may contribute to the need to list a species under the Endangered Species Act and, for the Forest Service, ensuring vertebrate species viability. Qualifying species are assigned to these programs by the Regional Foresters and State Directors in accordance with national and regional policies. Nearly half of the Survey and Manage species qualify for one or more of these programs and have been so assigned². The Agencies have the authority to update, amend, modify, change, or eliminate their policies, and add or remove species for reasons stated in the policies.

For species included in Special Status Species Programs, pre-project clearances are completed prior to habitat-disturbing activities to evaluate the presence or potential presence of a species or its habitat, and the potential for it to be affected by the proposed management actions. For non-fungi botanical species whose characteristics make locating them with field surveys practical, clearances will generally be done by field surveys, field clearances, field reconnaissance, inventories, and/or habitat examinations (Final Supplement:122). For wildlife species and species whose characteristics make them impractical to locate during field surveys, pre-project clearances may be accomplished by surveys; habitat examinations; habitat evaluation; evaluation of species-habitat associations and presence of suitable or potential habitat; review of existing survey records, inventories, and spatial data; or utilization of professional research, literature, and other technology transfer sources. The potential for a management activity to affect the species or its habitat must be addressed in the project-specific NEPA analysis and associated Biological Evaluation.

Under the Special Status Species Programs, the Agencies would manage (protect) known sites needed to meet Program objectives. The Final Supplement includes an analysis assumption for species currently in the "rare" Survey and Manage Categories A, B, and E, that most known sites would be managed to prevent a listing. For species currently in the "uncommon" Survey and Manage Categories C and D, it was assumed that the loss of some sites would not contribute to a need to list (Final Supplement:122). Authority to

²With two Agencies (BLM and FS) and two regions (OR/WA and CA), there are four programs considered in the analysis. Of the 337 species included in the analysis, 157 are currently assigned to one or more of these programs (Final Supplement:127 and others).

disturb Special Status Species Program sites or habitat lies with the agency official who is responsible for authorizing the proposed habitat-disturbing activity.

Under Special Status Species Programs, conservation assessments or conservation strategies may be used to help meet program objectives. General inventories may be conducted to learn more about a species distribution and status. The Agencies update their Special Status Species Program lists in response to new state Heritage program rankings or other information that indicates a need to update the lists.

Response to Three Issues Identified by District Court

In NEA v. Rey at 1197-1198, the District Court found the 2004 FSEIS deficient under NEPA in three areas. The Final Supplement addresses these deficiencies as described below. Results of that analysis are discussed in Section 3 (*Reasons for the Decision*) of this Record of Decision.

1. The 2004 FSEIS effects analysis included an assumption that if species were removed from Survey and Manage, those qualifying would be assigned to one or more of the Agencies' Special Status Species Programs. Since those assignments are discretionary on the part of Agency managers, the Court pointed out, the 2004 FSEIS "...failed to analyze potential impacts to Survey and Manage species if they are not added to or are removed from the Forest Service's and BLM's respective programs for special status species."

Effects (outcomes) for the 157 species assumed³ to be assigned to one or more of the Agencies' Special Status Species Programs in alternatives where they are off Survey and Manage are displayed in the Final Supplement as if that assignment were not made or is undone. A summary of those outcomes and their acceptability to me is included in Section 3 (*Reasons for the Decision*) of this Record of Decision.

2. In the calculation of fuels treatment needs, the 2004 FSEIS relied on the historic fire rates described in the 1994 Final SEIS. Because the analysis did not include new information that may have altered the Agencies' understanding of historic fire rates, the Court found the 2004 FSEIS "...failed to disclose and analyze flaws in their methodology for calculating the acreage in need of hazardous fuel treatments. Part of the cost analysis was similarly flawed because it relied on the acreage in need of hazardous fuel treatments in calculating the cost of the Survey and Manage standard."

The *Wildland and Prescribed Fire* section in the Final Supplement has been revised, with the estimate of fuels treatment needs based on more recent and widely used methodologies measuring degrees of departure from natural (historic) conditions. This analysis shares the conclusions of the National Fire Plan and elsewhere that fuels issues, particularly around rural communities, are growing and not likely to be controlled at present treatment rates. However, treatment rates are currently limited by funding. Therefore, effects to the program displayed in the Final Supplement are based on the current (last three years) 80,000 acre annual fuels treatment program, with a caveat that if additional funding were available, the program and corresponding effects of the alternatives would increase proportionately.

3. The Court pointed out the Agencies believed they needed Survey and Manage in 1994 and again in 2001, and that in changing that position in 2004, they "...failed to provide a thorough analysis of their assumption that the late-successional reserves would adequately protect species that the Survey and Manage standard was introduced to protect, particularly in light of their previous positions in earlier environmental impact statements."

³Although Special Status Species Program assignments for all 157 species have been made, the Final Supplement continued to use the term "assumed" from the 2004 FSEIS because Agency managers could remove any or all of these species at any time if they no longer meet policy criteria for inclusion.

The Final Supplement explains the 2000 Final SEIS did not address the need for Survey and Manage at all, but limited its analysis to solving implementation difficulties. In view of new information about the constraints Survey and Manage places on the execution of other elements of the Northwest Forest Plan (and to apply this new information to the deference given to timber harvest on O&C lands by the FLPMA and to multiple use provided in the Forest Service diversity regulation), this Mitigation Measure is being reconsidered (Final Supplement:99-102). However, the Final Supplement also shows there is now as much or more late-successional forest in reserves as there was in the entire Northwest Forest Plan (NWFP) area when the Plan was adopted (Final Supplement:107, 136). Further, there is new information presented in the Final Supplement about species, including the results of the Random Multi-Species (RMS) Surveys, and additional information about the risk to ecosystems and the risk to individual rare species, that indicates the effects of the selected alternative are acceptable.

Response to Ninth Circuit Court Decision Regarding Annual Species Reviews

The individual effects discussions for each species include outcomes for both its pre and post-Annual Species Review (ASR) assignments. Species outcomes are displayed in the Final Supplement on Table 2-12, and the pre and post-ASR effects (No-Action Alternatives 4 and 1 respectively) are summarized and contrasted in the Final Supplement pp. 70-77.

Results of the 2007 Final Supplement Analysis

A tabular summary of the effects from the Final Supplement *Summary* (p. xix) is displayed in Table ROD-1, Summary of Environmental Consequences. The table is for reference; additional information about the data presented is in the Final Supplement and is discussed in Section 3 (*Reasons for the Decision*) of this Record of Decision. Effects displayed in the Final Supplement and this Record of Decision reflects the combined Agencies' effects and assumes a concurrent Decision by the Secretary of the Interior.

New information including increases in known site numbers, species research, and habitat increases has led to changed species outcomes for over 25 species when compared to the 2004 FSEIS. In most cases, outcomes have improved and now conclude that there will be *sufficient habitat* across all alternatives.

The Final Supplement presents information about habitat increases that has recently become available in ten-year Northwest Forest Plan monitoring reports prepared by the Agencies. It also includes an expanded discussion of potential effects to forest ecosystems and presents additional information about the 53 species determined to have an outcome of *insufficient habitat in all or part of their NWFP area range* because of Alternative 2 (see additional discussion in the Section 3 (*Reasons for the Decision*) of this Record of Decision).

Table ROD-1. Summary of Environmental Consequences

		Alternative 1 No-Action with ASRs, 295 species on Survey and Manage	Alternative 2 Northwest Forest Plan without Survey and Manage	Alternative 3 Northwest Forest Plan with modified Survey and Manage	Alternative 4 No-Action without ASRs, 337 species on Survey and Manage
Number of Species or Groups ⁴	Insufficient Habitat not due to Federal Actions ¹	132	132	132	132
	Insufficient Habitat due to Actions under the Alternatives	0	38	4	0
	Sufficient Habitat range-wide in the NWFP Area but Insufficient Habitat in a Portion of their NWFP Area Range	3 ⁷	15 ⁸	7 ⁸	1 ⁷
	Sufficient Habitat	182	132	174	184
	Insufficient Information to Determine Outcome	24	24	24	24
Effect on Annual Timber Harvest ⁵ (million board feet)		-105	-35	-45	-105 ²
Short-term Annual Cost (millions)		\$21.0	\$7.9	\$10.7	\$21.0 ³
Long-term (5-10 years) Annual Cost (millions)		\$14.4	\$7.4	\$9.0	\$14.4
Employment Decrease From Full Harvest Level (per Northwest Forest Plan) (number of jobs) ⁶		-953	-318	-409	-953
Survey Related Employment (number of jobs)		+360	+142	+172	+360
Net Loss in Annual Personal Earnings (millions)		-\$23.8	-\$7.4	-\$9.8	-\$23.8
Hazardous Fuel Treatment (Annual Acres)		73,040	78,400	77,440	73,040 ²
Hazardous Fuel Treatment (Cost to Protect Species/Acre)		\$98.95	\$39.30	\$29.95	\$98.95

¹ Factors resulting in insufficient habitat are things such as limited potential habitat and few populations on federal lands, potential for stochastic events, low number of individuals, limited distribution, or narrow ecological amplitude.

² Additional 80 to 100 million board feet per year harvest reduction and 8 to 15 percent fuels treatment reduction for first two years for Alternative 4.

³ Plus \$0.5 million for ASR NEPA in the first 2 years.

⁴ The total in each column is 341, which includes 337 species and 4 arthropod groups.

⁵ From 805 million board feet projected for the NWFP area for both Agencies.

⁶ From 7,309 jobs at full 805 million board feet timber harvest.

⁷ Includes the red tree vole in the North Coast range of the Northern Mesic Biological Zone, where the insufficient habitat is not due to federal action.

⁸ Includes the a) red tree vole in the Xeric and North Cascades range of the Northern Mesic Biological Zones, where the portion of the range with insufficient habitat is due to federal action, and; b) the North Coast range of the Northern Mesic Biological Zone, where the insufficient habitat is not due to federal action.

There are no significant differences in environmental consequences between alternatives for any of the following environmental components: Aquatic Ecosystems, Late-Successional Forest Ecosystems, Air Quality, Water Quality, Soil Productivity, Threatened and Endangered Species, and Species Associated with Early-Successional Forest (Final Supplement:69). Increasing Northwest Forest Plan timber harvest to meet demand could help reduce global climate change (by an unknown amount) when compared to meeting wood demand by harvesting in other countries (Final Supplement:145).

2. The Decision

Introduction – the Northwest Forest Plan

Although this Decision continues to use the popular and inclusive title of “Northwest Forest Plan” to denote what is being amended, there is no one such “Plan.” The phrase denotes the April 13, 1994 *Amendments to Forest Service and Bureau of Land Management Planning Documents Within the Range of the Northern Spotted Owl*, relating to management of habitat for late-successional and old-growth forest related species. The Northwest Forest Plan Decision amended, or was subsequently incorporated into, the Land and Resource Management Plans for the 28 Forest Service and BLM administrative units within the range of the northern spotted owl. That direction was subsequently amended by the January 2001 Record of Decision for Survey and Manage.

Details of the Decision

Standards and Guidelines Removed

My Decision selects, with mitigation for two vertebrates as described below, Alternative 2 as described and analyzed in the 2007 *Final Supplement to the 2004 Final Supplemental Environmental Impact Statement To Remove or Modify the Survey and Manage Mitigation Measure Standards and Guidelines* (Final Supplement). This Decision removes the Survey and Manage Mitigation Measure Standards and Guidelines portion of the Northwest Forest Plan. Specifically my Decision removes the Standards and Guidelines included in Attachment 1 to the January 2001 Record of Decision for Amendments to the Survey and Manage, Protection Buffer, and other Mitigation Measures Standards and Guidelines, Sections I through VIII, and XII⁴. However, the requirements for Management Recommendations, including how they are revised, (in Section V) would continue to apply to certain cavity nesting birds and some bat roosts as referenced in (retained) Sections IX and XI, respectively.

Plans Amended

The administrative units whose Land and Resource Management Plans are amended by this Decision are located in western Oregon and Washington and northwestern California (including some areas east of the Cascades). This Decision amends the National Forest Land and Resource Management Plans for the Deschutes, Gifford Pinchot, Mt. Baker-Snoqualmie, Mt. Hood, Okanogan-Wenatchee, Olympic, Rogue-Siskiyou, Siuslaw, Umpqua, Willamette, and Winema National Forests in Region 6 (Oregon and Washington), and the Klamath, Lassen, Mendocino, Modoc, Shasta-Trinity, and Six Rivers National Forests in Region 5 (California).

Mitigation

Potential mitigation for adverse effects resulting from the selection of any of the alternatives are described in the Final Supplement as required by Council on Environmental Quality (CEQ) regulations (Final Supplement:73-80). Mitigation so identified is separate from, and not a part of, the alternatives. Pertinent to my consideration of mitigation is that the Survey and Manage provision itself was a mitigation measure, one of eight adopted under the Northwest Forest Plan to mitigate

⁴Except that portion of Section I removing the 1994 Survey and Manage provisions.

adverse effects on late-successional species from that action. Therefore my Decision today is actually whether to eliminate or change a previously adopted measure for mitigating adverse effects from the Northwest Forest Plan, and it must be considered in that context. Survey and Manage is not a program independent of, or separate from, the Northwest Forest Plan. Thus, in deciding whether to accept or reject any Final Supplement-identified mitigation for this Decision, I am deciding whether to accept the level of risk or other adverse effects identified for the affected species from the continued implementation of the remaining elements of the Northwest Forest Plan.

The mitigation described in the Final Supplement generally consists of completing pre-project clearances and managing known sites. After careful consideration of the projected adverse outcomes⁵ for 38 species in all of their range and 15 species (including 6 vertebrates) in part of their range caused by Alternative 2, and the adverse outcomes predicted for 132 species in all of their Northwest Forest Plan range under all alternatives, I am selecting mitigation described in the Final Supplement as follows:

Red Tree Vole

For the *red tree vole*, the analysis in the Final Supplement determined there is *sufficient habitat range-wide in the NWFP area but insufficient habitat⁶ in the portion of its NWFP area range north of Highway 22 (and a line projected east along the Marion/Linn County line where the highway turns south at Whitewater Creek; see Figure 3&4-5 in the Final Supplement) in the North Cascades range of the Northern Mesic Biological Zone*. As part of my Decision, I am adding mitigation to require pre-project clearances and management of known sites to this area, as suggested in the red tree vole Summary (Final Supplement:292).

Great Gray Owl

For the *great gray owl*, the analysis in the Final Supplement determined there is *sufficient habitat range-wide in the NWFP area but insufficient habitat in a portion of their NWFP area range in western Oregon because of non-specific and therefore potentially inadequate Land and Resource Management Plan direction on some administrative units*. There is a concern that current non-species-specific direction such as “protect raptor nests” is not adequate. While perhaps this is simply an implementation issue, I agree that more specificity would be beneficial.

As part of my Decision, I am adding the following minimum requirements for management around known great gray owl nest sites on National Forests in western Oregon: Protect 30 acres around nest; limit treatments to site protection or improvement. Prohibit disturbance from management activities (e.g. timber harvest, road building) for ¼ mile (1 mile for blasting) from March 1st to May 31st, or until fledging, whichever is later, in years where use is likely or expected. The new direction shall apply to management of known sites; no pre-disturbance survey requirement is included as part of this mitigation. Direction in existing land and resource management plans that is more protective than these requirements is retained.

No other mitigation is adopted with this Decision for the reasons discussed in Section 3 (*Reasons for this Decision*). All practicable means to avoid or minimize harm have been adopted.

⁵The analysis in the Final Supplement projected one of four outcomes for each species for each alternative. The outcomes were 1 - *sufficient habitat*; 2 - *sufficient habitat range-wide in the NWFP area but insufficient habitat in a portion of their NWFP area range*; 3 - *insufficient habitat in all of their NWFP area range*; 4 - *insufficient information to determine an outcome* (Final Supplement:118).

⁶The insufficient habitat determination is the standardized outcome statement used in the Final Supplement. In this or any other specific case, the issue may not be habitat at all, but other factors that included, but are not limited to, low numbers of known sites, stochastic events, and fire-caused isolation that limited population density and/or dispersal.

Concurrent Decision by the Secretary of the Interior Not Required

I am making this Decision today with the assumption the Secretary of the Interior will also be selecting Alternative 2, as described in the Final Supplement, without mitigation, and knowing the BLM may choose not to assign species to its Special Status Species Program or even retain the program in its present form (see Section 3, *Reasons for this Decision*). While the Courts have pointed out the risks of a Record of Decision including assumptions about the actions of others, including actions of other Agencies, such risk is attributable to an assumption that other's actions will reduce adverse effects. Here, my assumption is that a Secretary of the Interior Decision will *reduce* species protection. The selection of any of the other Final Supplement alternatives by the Secretary of the Interior, including either of the no-action alternatives, or the application of any mitigation, would *decrease* the potential for the adverse species effects I am assuming with this Decision. Therefore, although I expect a corresponding, similar, and nearly simultaneous Decision from the Secretary of the Interior, my Decision is not contingent upon it. The portion of the effects identified in the Final Supplement that will accrue to the National Forests will be essentially the same either way.

Monitoring

This Decision does not require formal reviews or reports regarding Sensitive Species nor does it change the existing monitoring requirements applicable to remaining elements of the Land and Resource Management Plans for each of the Forest Service administrative units within the NWFP area. Monitoring will continue in accordance with existing monitoring requirements. No new monitoring requirements are proposed under any of the alternatives (Final Supplement:xx, 38, and others).

Scope

This Decision provides plan level direction only, and does not authorize timber sales or any other specific activity on federally managed lands. Project-level compliance with NEPA, the Endangered Species Act, and other environmental laws is required before decisions are made to offer timber sales or conduct other land management activities. This Record of Decision complies with 40 CFR 1505.2.

3. Reasons for the Decision

Meeting the *Purposes* Identified in the Final Supplement

1. Comply with the terms of the Settlement Agreement by considering, in detail, an alternative that removes the Survey and Manage Mitigation Measure Standards and Guidelines.

The Douglas Timber Operators et al. v. Secretary of Agriculture et al. settlement agreement requires the Agencies to examine, in a SEIS, an alternative that replaces the Survey and Manage mitigation requirements with the existing Forest Service and BLM Special Status Species Programs to achieve the goals of the Northwest Forest Plan

through a more streamlined process. The agreement does not stipulate the alternative to be selected, so this purpose is not a factor in my Decision (Final Supplement:5).

2. Continue to provide for diversity of plant and animal communities in accordance with the National Forest Management Act and conserve rare and little known species that may be at risk of becoming listed under the Endangered Species Act.

It is policy in both the Forest Service and BLM to avoid taking actions that would lead to the listing of species under the Endangered Species Act. In addition, the Forest Service is required by the National Forest Management Act (NFMA) to “provide for diversity of plant and animal communities based on the suitability and capability of the specific land area in order to meet overall multiple-use objectives...” (16 U.S.C. 1604(g)(B))(Final Supplement:5-6).

Background – Species Effects

The Final Supplement analyzed the effects of the alternatives on the 337 species and 4 arthropod functional groups that were in Survey and Manage in 2001, including the 295 species (and 4 arthropod groups) included in No-Action Alternative 1, Survey and Manage as it was being applied by the Agencies on March 21, 2004, before the 2004 Record of Decision (Table ROD-1). The following discussion of effects includes all 337 species.

Insufficient Habitat Not Due to Federal Actions - Due to factors such as limited potential habitat, few populations on federally managed lands, potential for stochastic events, low number of individuals, limited distribution, and narrow ecological amplitude, the Final Supplement predicted that no alternative could provide *sufficient habitat* to support stable populations for 132 of these species (115 fungi, 17 lichens). This outcome is not due to federal actions. The 1994 Northwest Forest Plan Final SEIS and the 2000 Survey and Manage Final SEIS made similar predictions for these species. Since the insufficiency of the habitat and uncertainty of population status does not result from differences among the alternatives, no alternative or mitigation could be proposed that would change this outcome (USDA, USDI 1994a; USDA, USDI 2000a; Final Supplement:79 and 102-104). Therefore, these effects provide little reason to choose any alternative over another.

Insufficient Information to Determine an Outcome - For 20 species and the 4 arthropod functional groups, there is *insufficient information to determine an outcome* under any alternative. There is so little information available about the abundance, distribution, and ecology of these species, or so little information about the effects of management practices and environmental conditions (including global climate change) for some of these species, that ascribing effects of the alternatives on these species would be speculative. Therefore, with respect to these species, there is little reason to choose any alternative over another.

Sufficient Habitat - For 132 species in all of their range, all of the alternatives would provide *sufficient habitat* to support stable populations in the NWFP area (Final Supplement:Table 3&4-9). These effects provide little reason to choose any alternative over another. Some of these outcomes are based on the species assumed assignment to one or more of the Agencies’ Special Status Species Programs, which I discuss later in this Section (Section 3) under *Effects to Species if They Are Not Assigned to Special Status Species Programs*.

Thus, the predicted effects for 284 of the 337 species (and the 4 arthropod groups) are the same across all alternatives and thus are not germane to the Decision to choose from

among the alternatives. The alternatives under consideration here make a difference in predicted outcomes for 53 species, 38 species in all of their NWFP area range (25 fungi, 2 lichens, 1 bryophyte, and 10 mollusks) and 15 species in a portion of their NWFP area range (3 fungi, 3 lichens, 6 vertebrates, 2 mollusks, and 1 vascular plant). For these, the sufficiency of habitat to support stable populations in the NWFP area is predicted to be affected differently by management under each alternative.

Under Alternative 2, the selected alternative, it is projected that there would be *insufficient habitat* to support stable populations of these 53 species *in all or part of their NWFP area range*, caused by actions under this alternative. Under Alternative 3, it is projected that 11 species would have *insufficient habitat in all or a part of their NWFP area range*, and under No-Action Alternative 1 it is projected that 3 species would have *sufficient habitat range-wide in the NWFP area but insufficient habitat in a portion of their NWFP area range*, caused by actions under the alternatives.

Adverse Outcomes Defined

The above outcomes are the best estimates of the taxa specialists who contributed to the 2004 FSEIS and the (2007) Final Supplement. As with the 2000 Final SEIS, *“the Agencies’ taxa specialists that contributed to this SEIS are highly qualified, experienced personnel who have drawn from all currently available information about these species. The fact that the public comment period resulted in very little new information about species is testament to the thoroughness of the taxa specialists in gathering and incorporating relevant information”* (USDA, USDI 2000a:II-214). These specialists *“were asked to evaluate known information and determine an outcome that was reasonably certain based on their professional interpretation and evaluation”* (Final Supplement:119). And, as I stated in the Secretaries’ Record of Decision in 2001, I am today *“choosing, as with other species effects discussed in the Final SEIS, to place a high level of confidence on the conclusions of the agency experts on the SEIS Team and take the Final SEIS findings at face value”* (USDA, USDI 2001a:14). Thus, I take these 53 adverse outcomes seriously, and I am specifically addressing them as follows.

For reasons described in the Final Supplement and briefly summarized below, the *insufficient habitat* outcomes for most species serve more as indicators of possible risk in general, or in a specific geographic area, rather than as predictions of the imminent loss of species. The Final Supplement points out, for example:

“The [species effects] determinations are based on information sufficient to support predictions of reasonably foreseeable outcomes in order to provide the Responsible Officials with an indication of the risk to species across the alternatives” (Final Supplement:119); and,

“Where the outcome definitions appear to exceed [minimum] legal requirements, (for example, for bryophytes on O&C lands), the outcomes will serve more as risk indicators to be weighed with other factors in determining how to best meet the purpose and need” (Final Supplement:121).

The Final Supplement at pp. 119-121 (*Relationship of Outcome Determinations to ASR Species Removal Criteria and Legal Requirements*) describes why and how the *sufficient habitat* outcome definition exceeds legal requirements. The Final Supplement at pp. 164-165 describes, in part, that outcome-defining factors valuable to assessing differences in the effects of actions within Survey and Manage (e.g. the differences between Survey and Manage alternatives in the 2000 Final SEIS), or used for making changes during the Annual Species Reviews, are overly constraining in terms of making decisions about legal compliance. The outcome definitions (and Annual Species Review criteria) have their origins in the FEMAT species panel rating definitions and in the screens used by the 1994 Additional Species Analysis Team as documented in the Northwest Forest Plan Final SEIS in Appendix J2. Appendix J2 acknowledged, for example, that the criteria

used for identifying species to be included in the Survey and Manage Mitigation Measure did “not represent a judgment about what is required by the National Forest Management Act or the Endangered Species Act” (USDA, USDI 1994a:J2-2; Final Supplement:8). Examination of the outcome definitions used in the Final Supplement, and generally encompassing the Three Basic Criteria for Survey and Manage (Final Supplement:33), indicate the *sufficient habitat* outcome is a high standard affected by often unknown and assumed reference distributions, connectivity needs and sensitivity to disturbance, assumptions that all Matrix habitat will be removed, and a simple lack of information. Further, the Annual Species Review criteria (sharing components of the outcome definitions) were designed to provide the level of protection provided by the 1994 Decision, which itself exceeded legal requirements by providing a level of protection for mollusks, bryophytes, fungi, vascular plants and lichens (non-vertebrates) similar to that required for vertebrates, to the extent practicable (Final Supplement:119).

Although it might have been less confusing if the outcomes used in the Final Supplement had been redefined to coincide with legal requirements, such redefinition was not done because:

- a) Outcomes would have departed from those used in the 1994 and 2000 Final SEISs, thus making use of those previous ratings difficult at best;
- b) The legal requirements of the two Agencies differ; and,
- c) That would have added non-biological considerations, normally reserved for the Decision-maker, to the outcome definitions being applied by biologists.

The species outcomes presented in the Final Supplement provide the specialist’s best professional determinations based on the outcome definitions given to them, and the existing knowledge (including the latest research) about each species and its habitat needs. The combination of these outcomes, previous analyses, the additional analysis of species and risk presented in the *Survey and Manage Species* section, the additional analysis of habitat provided in the *Late-Successional Forest Ecosystem* section, and other information included in the Final Supplement as summarized and referenced below, together provide the expert opinion, data, and analysis needed for me to choose from among the alternatives.

The 53 Species with Adverse Outcomes

For the 38 species predicted to have *insufficient habitat in all of their NWFP area range* and 15 species (including 6 vertebrates) with *sufficient habitat range-wide in the NWFP area but insufficient habitat in a portion of their NWFP area range*, the risk to the species is elucidated in the individual species effects discussions in Chapter 3&4 of the Final Supplement and in the *Survey and Manage Species* section of the Final Supplement at pp. 165-176. In this latter section, and for other than the two species to which I have applied mitigation, I concur with the section’s conclusion that “*the risk to most if not all of these species appears limited to the potential to remove the species from some portion of its historic range, to remove individual populations, or to inhibit gene flow.*” That section notes “*With 87 percent of the late-successional forest and the entire aquatic habitat in reserves, and with the level of management activity predicted [under Alternative 2], there should be little risk of extirpating one of these species over much of its range, particularly considering that the entire range for many of these species goes well beyond the NWFP area boundary*” (Final Supplement:176). That conclusion is supported by the following relevant points made in the Final Supplement (or the EISs it supplements):

- For the 28 fungi with *insufficient habitat* under Alternative 2 in all or part of their NWFP area range, only 3 have fewer than 20 known sites (17, 19, and 19). Five of these fungi have 100 or more known sites within the NWFP area. These numbers are significant because they all are Category B or D species for which pre-disturbance surveys have not been conducted, and most are underground and do not visibly fruit annually or predictably. Sixteen of the 28 species were detected

on Random Multi-Species (RMS) Survey plots, with 9 of these having 3 detections or more and 2 having 10 detections or more (indicating hundreds of thousands of sites). All 28 are on one or more of the Agencies' Special Status Species Programs, where they all are predicted to have *sufficient habitat* in that portion of their range (Final Supplement:167).

- For the five lichens with *insufficient habitat in all or part of their NWFP area range*, each have over 200 known sites, have 2 or more RMS Survey detections (estimating, on average, tens of thousands of sites), and each is on one or more of the Agencies' Special Status Species Programs (Final Supplement:172-173).
- The one bryophyte with *insufficient habitat in all of its NWFP area range*, *Marsupella emarginata* var. *aquatica*, is known from only two NWFP area sites, and although it is aquatic, the concern is that management within the Riparian Reserve and activities in Waldo Lake, a reservoir upstream from one of the known sites, might place it at risk. It is a Category B species under Survey and Manage, meaning pre-disturbance surveys prior to management activities are not practical. Its global distribution includes Europe, northeastern United States, and it has been reported from British Columbia and Alaska (Final Supplement:173).
- For the twelve mollusks with *insufficient habitat in all or part of their NWFP area range*, only three (current records) or four (FEMAT records) have known sites on federal lands in the NWFP area, either on the Shasta National Forest and/or Redding BLM Field Office. Eleven are aquatic snails associated with cold springs and upper reaches of the Sacramento and/or Pitt River drainages in north-central California, and thus I expect them to be provided significant protection by the Aquatic Conservation Strategy if they occur within the NWFP area. Only three of these have more than four known sites, and only two (*Fluminicola potemicus* and *Fluminicola seminalis*) have new sites since 1994, in spite of all being Category A, pre-disturbance surveys required. Historical distribution is unknown. The remaining mollusk is terrestrial, with over 200 known federal sites in spite of pre-disturbance surveys not being practical (Final Supplement:174-175).
- For the one vascular plant, *Cypripedium montanum*, with *sufficient habitat range-wide in the NWFP area but insufficient habitat in a portion of its NWFP area range*, there are over a thousand known sites in the NWFP area. It is described in NatureServe as "Occasional in western North America, with thousands of occurrences, but many of those with few plants. Occurs in a wide variety of habitats, from full sun on eastern mountain slopes to full shade in moist wooded valleys (Luer 1975). Threatened by habitat loss or alteration. The main concern for this species is that present-day botanists are observing and hearing anecdotal accounts of population loss. Although populations are known to be declining significantly, there are still abundant enough numbers of plants and populations." It occurs in western North America from Alaska to California and as far east as Wyoming, Montana, and Saskatchewan, and was determined by the 2001 Annual Species Review process to not be closely associated with late-successional forest in the Washington Eastern Cascades (see *The 2001, 2002, and 2003 Annual Species Reviews* later in this Section) (Final Supplement:175-176).
- 6 vertebrates are projected to have *sufficient habitat range-wide in the NWFP area but insufficient habitat in a portion of their NWFP area range*. They are a special case because of the viability provision in the 1982 NFMA planning regulations at 36 CFR 219.19 under which the Northwest Forest Plan and the Final Supplement were prepared (Final Supplement:28; USDA, USDI 1994b:44). Effects for these six species (and relevant mitigation) are discussed under *National Forest Management Act* in Section 4 (*Findings Required by Other Laws and Regulations*) of this Record of Decision.

- For the 53 species, an estimate of risk was calculated for having 20 percent of any species population intersected by management activities in a decade, using the detection estimates for those detected on the Random Multi-Species (RMS) Survey plots and 1/100th of a detection for all others⁷. The odds are less than 5 percent that 20 percent of the population of any one of the 53 would be intersected by harvest activities if none of the sites received protection under any program (Final Supplement:179). While “intersected” does not necessarily encompass all of the adverse effects management activities can have on species, it also does not mean a species so intersected is necessarily extirpated (Final Supplement:178).
- Twenty-nine of these species (of the 53) are in Survey and Manage Category B or E, which indicates that they are rare and pre-disturbance surveys are not practical or not required. Special Status Species Program assignment, with its requirement for pre-project clearances coupled with the likelihood that most known sites would continue to be managed, arguably provides for more analysis that could lead to more protection than Survey and Manage, in the area for which the Special Status Species Program assignment applies.
- The 53 species with *insufficient habitat in all or part of their NWFP area range* were analyzed for inclusion in the Agencies’ Special Status Species Programs and were either assigned to them or determined not to meet the criteria for inclusion, primarily because the independent rankings of the state Heritage programs do not rate them as imperiled (Final Supplement:166-171). The list of species included in the Agencies’ Special Status Species Programs is not static.
- All project-level activities remain subject to compliance with Federal environmental laws such as the Endangered Species Act, the National Environmental Policy Act, and the Clean Water Act.
- This Decision assumes that other elements of the Northwest Forest Plan remain in place, reducing the risks to these species and contributing to their conservation. These elements include:
 - Conservation principles of maintaining: (1) connectivity across the landscape; (2) landscape heterogeneity; (3) structural complexity; and, (4) the integrity of aquatic systems.
 - Less than 5 percent of late-successional forest in the NWFP area is projected to be disturbed by management in the next 10 years, including fuels treatments that do not remove the stand (Final Supplement:106).
 - Matrix Standards and Guidelines provide for retention of legacy elements of late-successional forest, such as snags, large green trees, and down logs. For most National Forests, for example, 15 percent of the area of each cutting unit must be maintained, in part to provide inoculums of non-mobile species to the new stand. There are also provisions for retaining old-growth fragments in watersheds where little remains (USDA, USDI 1994b:C-41 and 44). The 1994 Northwest Forest Plan Final SEIS identified these retention requirements as beneficial for many of the same late-successional and old-growth forest related species as included in Survey and Manage (USDA, USDI 1994a:J2-58 through 79 and others).
 - At 50 years (2044), late-successional forests are projected to have increased from 8 million acres to 10.7 million acres on federally managed lands in the NWFP area. Development of late-successional forest is 2.5 times the rate of loss (Final Supplement:107).
 - 81 percent of all federally managed lands and 87 percent of late-successional forest in the NWFP area are in reserves. Reserves remain the primary conservation element of the Northwest Forest Plan (Final Supplement:104).

⁷This assumes the remaining undetected species (about half of the 53) have populations large enough that repeating the RMS Survey 100 times, or 75,000 random plots, would result in a single detection.

- On average, about 50 percent of the federally managed area is in Riparian Reserves⁸ (Final Supplement:136).
- Although it is possible to reduce risk to species, risk remains an inherent factor of resource management.
 - There is no way to avoid all risk to the continued persistence of species.
 - The continued persistence of local rare endemic species, whose range is very limited, is intrinsically insecure. Many species have disjunct populations clearly dating to the last ice age or before, and no alternative would improve connectivity within the foreseeable future.
 - Even in the absence of any human-induced effects, the likelihood that habitat will continue to support species persistence can and does vary among species (Final Supplement:176-180).
- Since most of the Survey and Manage species known site information has come from required pre-disturbance surveys, any discussion of risk based on rarity and likelihood of disturbance for these 53 species must recognize that, for many species, only a small and biased percentage of potential habitat has been surveyed. Most surveys have been conducted in the Matrix and Adaptive Management Area land allocations, because most management activities are proposed there. Even though reserves have not been as intensively surveyed, it is reasonable to expect that the 87 percent of late-successional forest in reserves would provide its proportionate share of the habitat needed to support populations of most of these species (Final Supplement:176). The Northwest Forest Plan tended to include the best quality, most contiguous late-successional forest in reserves. Thus, acre for acre, reserves are likely to be more effective than the Matrix and Adaptive Management Areas at providing habitat for Survey and Manage species (USDA, USDI 1994a:3&4-41).
- Within the late-successional forest ecosystems in the NWFP area, in order for species to persist, they would likely have some tolerance for disturbance, at least at the population level. Tolerance for disturbance by species at the population level is likely, because forest ecosystems are dynamic and have historically experienced significant levels of disturbance. In addition, the Northwest Forest Plan provides the most reserves in those physiographic provinces that had the least natural disturbance, providing additional assurance that late-successional and old-growth forest related species not adapted to disturbance, are protected (Final Supplement:140-141).
- Forty-two of the 53 species are assigned to one or more of the Agencies' Special Status Species Programs. The two Agencies' Special Status Species Programs are the current fine-scale species-specific policies in use nation-wide for helping avoid management that would lead to a need to list species under the Endangered Species Act and, for the Forest Service, help meet the viability regulation. There is no reason to believe those policies would not adequately accomplish those objectives in the Pacific Northwest, where an unprecedented portion of the late-successional forest habitat is in reserves.
- The fact that forestlands within the Matrix are available for regularly scheduled timber harvest does not mean all habitat in the Matrix will be eliminated at any particular time and/or that the Matrix will serve as a barrier for dispersal. The planned "conversion" period lasts a half century or longer, standard and guidelines require retention of late-successional forest habitat components, and many stands in the Matrix are non-commercial or inoperable. Biomass in the Matrix continues to increase (as evidenced by the Fire Regime Condition Class III, late-successional forest increases, and others) and the Riparian Reserves network contributes

⁸Riparian Reserve acres displayed in the Final Supplement (pp. 29, 108) do not add up to 50 percent of land allocations overall because Riparian Reserves in land allocations other than Matrix are included in the acreages assigned to those higher order acreages.

interconnection of habitat throughout the Matrix. The Matrix and interspersed Riparian Reserves will continue to provide substantial habitat and connectivity benefits for many, if not most, of these species.

- The amount of late-successional forest in the NWFP area has increased significantly in the 14 years since the FEMAT analysis. The combination of larger reserves (since the 1993 FEMAT analysis) and in-growth (and corresponding aging of all current late-successional forests) has increased the amount of late-successional forest in reserves by 19 - 26 percent, to now total over 8 million acres. There are more late-successional forest acres now in reserves than were in the entire NWFP area when the Plan was adopted in 1994 (Final Supplement:135-139). Total late-successional forest continues to increase.

The 2001, 2002, and 2003 Annual Species Reviews

Because my Decision also removes Survey and Manage requirements for 58 species formerly removed from Survey and Manage by the Annual Species Reviews (ASRs), to the extent the November 2006 KSWC v. Boody Ninth Circuit decision would result in retaining any of these species on Survey and Manage, a brief discussion of the species effects related to the ASR changes is in order here. Specifically, the Ninth Circuit found the ASR category change and subsequent removal of the red tree vole from Survey and Manage in the Mesic Biological Zone constituted a BLM plan amendment that should have followed appropriate NEPA and planning processes. As a result, the Agencies decided to reconsider all 58 species removals and 32 category changes by addressing these species in the Final Supplement.

For the 43 species removed from Survey and Manage by the ASRs because other elements of the Northwest Forest Plan were determined to provide adequate protection, the predicted outcomes were *sufficient habitat* to provide stable populations under all alternatives. For the 15 species removed from Survey and Manage only because they were determined not to be associated with late-successional forests, two (one vascular plant and one lichen) are predicted to have *insufficient habitat* because of that removal (as under Alternative 2), and both of these adverse effects apply only to a part of the species range. Neither was assigned to the Agencies' Special Status Species Programs because they were deemed secure in other portions of their range. Both are included in the 53 species with adverse outcomes discussed earlier in this Section (Section 3).

The vascular plant, *Cypripedium montanum* is specifically discussed earlier in this Section (Section 3). For the lichen, *Bryoria tortuosa*, there are over 700 known sites spread from the Olympic Peninsula to the California Coast Range, but it is rare in the dryer portions of the NWFP area (from the Washington Eastern Cascades to the California Cascades) where it is not associated with late-successional forests (Final Supplement:173).

The adverse effects to these two non late-successional forest associated species are limited in geographic scope, and no different than if they had been correctly excluded from the Northwest Forest Plan to begin with⁹. They are not at risk over a significant portion of their range, and certainly not threatened with extinction. Both are globally and even regionally secure. They may not be at significant risk within the indicated portions of their range either, but they did not meet the Final Supplement's outcome definition for *sufficient habitat* in these areas.

Mitigation Not Adopted

I am not selecting mitigation for the red tree vole in the North Coast range of the Northern Mesic Biological Zone or in the Xeric Biological Zone, nor for four salamanders,

⁹Species not related to late-successional forests were never intended to be included in the Northwest Forest Plan because early and mid-successional forest habitats are above historic levels.

for the reasons set out under *National Forest Management Act* in Section 4 (*Findings Required Other Laws and Regulations*) of this Record of Decision.

I have not added mitigation for the 47 non-vertebrate species with adverse effects resulting from the selected alternative because:

- The outcome discussions for each of these species in the Final Supplement as well as the additional information provided for them in the *Survey and Manage Species* section and elsewhere in the Final Supplement, as highlighted earlier in this Section (Section 3), indicates that additional mitigation is not warranted. Existing habitat and policies will adequately provide for them; and,
- To add mitigation would simply replace the management direction removed by the selected alternative, removing some of the beneficial effects predicted for that selection.

I am also not selecting mitigation for the 132 species with adverse outcomes under all alternatives. As noted in the Final Supplement at pp. 79-81, removal of Survey and Manage could increase risks for these species. However, there is no way to quantify that increase, and therefore no way to quantify the benefits of mitigation. Mitigation would not change the outcome; the analysis indicates factors other than the presence or absence of species-specific protection are affecting these species and leading to the *insufficient habitat* outcome. There is no clear evidence the species would benefit from mitigation, and to add mitigation would add costs and otherwise nullify some of the multiple-use and ecosystem protection benefits of the selected alternative. Further, some of the factors cited earlier in this Section (Section 3), including increases in habitat acreage, apply equally to these species.

Effects to Species if They Are Not Assigned to Special Status Species Programs

Under my Decision, all 337 species included in the Supplement are “off” Survey and Manage. An analysis assumption in the Final Supplement is that if the Survey and Manage provision is eliminated from the Northwest Forest Plan, qualifying species will be assigned to the two Agencies’ Special Status Species Programs according to each Agency’s existing policies. In *NEA v. Rey*, the District Court pointed out that such assignments are outside of the SEIS process and discretionary on the part of Agency managers, and therefore the analysis and Decision should have considered the implications if such assignments are not made or are subsequently removed. The Final Supplement therefore includes outcomes for each species for each alternative, without the Special Status Species Programs assignments. Those outcomes have been considered in my Decision.

Of the 337 species included in the Final Supplement, 157 are assumed in the analysis to be assigned to one or more of the BLM or Forest Service Special Status Species Programs, and in fact, those assignments were all made by 2004. Of these 157:

- 27 have *insufficient habitat in all of their NWFP area range* and 15 have *insufficient habitat in part of their NWFP area range* due to actions under the alternative.

Also:

- 38 have *insufficient habitat in all of their NWFP area range* and 1 has *insufficient habitat in part of their NWFP area range*, not due to federal actions;
- 81 have *sufficient habitat in all or part of their range* under all alternatives; and,
- 11 have *insufficient information to determine an outcome* (Final Supplement:71).

If the Special Status Species Programs assignments are removed:

- 64 have *insufficient habitat in all of their NWFP area range* and 18 have *insufficient habitat in part of their NWFP area range*, an increase of 37 and 3 respectively (Final Supplement:71).

These outcomes would be worst case, i.e., if there were a wholesale departure from the existing Special Status Species Programs. More likely, one or more individual assignments to Special Status Species Programs would not be made, or would be removed. However, since none of the increase in adverse effects applies to vertebrates, I find the potential for additional adverse effects without Special Status Species Program assignments to be acceptable for the reasons I find most of the 53 adverse outcomes acceptable (see *The 53 Species with Adverse Outcomes* earlier in this Section). Also, I expect the Agency to continue to manage lands in the planning area as necessary to meet the legal responsibilities of the Endangered Species Act, the National Forest Management Act, and other applicable laws and regulations. I am removing Survey and Manage in part, because adequate management controls are in place such as the Sensitive Species Program to ensure the Agency does not take any action that would result in the need to list species under the Endangered Species Act and to meet applicable viability and diversity requirements. I find no reason to believe legal responsibilities can be met only with Survey and Manage, or that they might not be met without Survey and Manage. I agree with the Final Supplement assertion that if species trend toward listing, they can be expected to be assigned to one or more of these programs or other mitigating action taken.

For these reasons, I make no assumption or reliance on current Special Status Species Program assignments. I recognize species can and will be removed from the Special Status Species Programs in the future, usually when they no longer qualify for, or need, management under the programs. Reasons might include, but are not limited to, changes in state Heritage rankings, increases in known populations or habitat, absence of an apparent management threat, or the presence of other protection measures.

I also make no assumption the Agencies will continue to implement the Special Status Species Programs as currently described. In the event the Agencies should propose a change in the manner in which rare and little known species are managed, I expect the Agencies to continue to take reasonable and appropriate action to ensure their actions are not likely to result in the need to list a species under the Endangered Species Act, and to apply species-specific measures as necessary to comply with applicable regulations and statutes.

Changed Conditions Since Previous Analyses

To respond to a portion of the deficiency identified by the District Court in *NEA v. Rey* of “the failure to provide a thorough analysis of their assumption that the late-successional reserves would adequately protect species...” the Final Supplement thoroughly examined new information applicable to the need for the species protection conveyed by the Survey and Manage Mitigation Measure. The following information about changed habitat, species information, and progress towards completing original Survey and Manage objectives is pertinent to this portion of my Decision.

- As noted in *The 53 Species with Adverse Outcomes* section, but bearing on this point as well, the amount of late-successional forest in the NWFP area has increased significantly in the 14 years since the FEMAT analysis. The combination of larger reserves (since FEMAT) and in-growth (and corresponding aging of all current late-successional forests) has increased the amount of late-successional forest in reserves 19 - 26 percent to now total over 8 million acres. There are more late-successional forest acres now in reserves than were in the entire NWFP area when

the Plan was adopted in 1994 (Final Supplement:135-139). Late-successional forest within reserves has increased from approximately 34 percent of reserves in 1994 to approximately 40 percent today (Final Supplement:104).

- Conditions of late-successional old-growth habitat are substantially better than (believed) when Survey and Manage was developed. Northwest Forest Plan ten-year monitoring determined “*older forest abundance, diversity, and connectivity at the start of the Plan to have been generally ... within the typical range of conditions that occurred during previous centuries ..., except perhaps for the provinces of the eastern Cascades. Connectivity was strong, characterized by short distances between large older forest patches. The condition of older forest in the eastern Cascades provinces was ... below long-term averages, with relative scarcity in some areas or occurring as scattered remnant patches.*” The FEMAT predicted such conditions would not be achieved for many decades (Final Supplement:138).
- The recently completed Random Multi-Species (RMS) Surveys field work and analytical analysis of results indicates there are a significantly higher number of Survey and Manage species sites than are currently known. However, since the 95% confidence bound includes zero for many species-specific results, many of the RMS Survey results did not affect species outcomes. Nevertheless, taken as a group, the confidence bound does not include zero and there are estimated to be millions of Survey and Manage species sites¹⁰. For some of these species, the RMS Survey detections themselves exceeded previously known site numbers (Final Supplement:163, 327-342).
- A known site database [GeoBOB/ISMS database] populated with over 68,000 known species sites, distribution maps, science documents, management guidelines, survey protocols, and conservation strategies, which were developed for the Survey and Manage program are now available for use, as applicable, with the Agencies’ Special Status Species Programs.
- Many of the Survey and Manage species were originally only Categories 3 (Extensive Surveys) or 4 (General Regional Surveys). The intent of these categories was to find high-priority sites for management or acquire additional information to determine necessary levels of protection. To a large degree, these original objectives for many of these species have already been accomplished by the RMS Surveys and other Survey and Manage activities. (The resultant information has been used to help place species in the Agencies’ Special Status Species Programs, and help prepare Management Recommendations and other documents used for management of those species (Final Supplement:102).)

Conclusion

I conclude that under Alternative 2 with mitigation for two vertebrates, the level of protection afforded the 337 late-successional and old-growth forest related species by the provisions of the Northwest Forest Plan, combined with existing Agency management policies (with or without the placement of any or all species in the two Agencies’ Special Status Species Programs), will continue to provide for diversity of late-successional plant and animal communities and conserve rare and little known late-successional forest associated species that may be at risk of becoming listed under the Endangered Species Act. I am not concluding that no species are at risk. Rather, I am concluding that the Northwest Forest Plan without Survey and Manage provides an adequate and reasonable approach to species conservation, consistent with the Agency’s legal obligations.

¹⁰It is acknowledged there has been no Annual Species Review since the extrapolation of the RMS Survey results, and many of these species might be removed if that process were conducted again with this new information. On the other hand, the November 2006 Ninth Circuit decision tends to complicate the ASR process adopted in 2001. Time and costs for future ASRs may be increased. Thus, the effects of these species sites on future management could be higher than projected.

3. Reduce the Agencies' cost, time, and effort associated with rare and little known species conservation.

Agency funding is important to accomplishing overall management objectives. The annual cost difference between species-specific protection under my Decision and the Survey and Manage Program is projected at \$13 million. This cost limits the Agencies' ability to meet a more balanced range of management objectives, diverting money from other work including watershed restoration projects, fuel reduction projects, timber management projects, and projects designed to improve habitat for Threatened, Endangered, and other species.

Under the Decision I make today, costs will be reduced compared to Alternatives 1 and 4, the No-Action Alternatives, because:

- Pre-disturbance surveys will be eliminated for some species. Many species included in the Agencies' Special Status Species Programs will have pre-project clearances (determining the presence or absence of species or its habitat) completed in a portion of their range. However, since the Special Status Species Programs allow the flexibility of using various methods (other than field surveys) for completing pre-project clearances, these will be less costly than surveys under Survey and Manage;
- While some general surveys will be completed, the costs will be far less than Strategic Surveys under Survey and Manage; and,
- The current Survey and Manage program is highly centralized, with mandatory processes and procedures. The Agencies' Special Status Species Programs are less centralized and allow more flexibility in processes and procedures.

These differences will allow Alternative 2's program management costs to be far lower than under the other alternatives. Under Alternative 2, the Agencies' short-term (1-5 years) annual costs are projected at \$7.9 million, resulting in a short-term cost savings of \$13.1 million per year compared to Alternatives 1 and 4. Alternative 2's long-term (6-10 years) annual costs are projected at \$7.4 million, resulting in a long-term cost savings of \$7.0 million per year compared to Alternatives 1 and 4. Under Alternative 3, the Agencies' short-term annual costs are projected at \$10.7 million and the long-term annual costs are projected at \$9.0 million (Final Supplement:304-308). Both short-term and long-term cost savings under this Decision (adoption of Alternative 2) will be greater than savings under any of the other alternatives. The selected alternative best reduces the Agency's cost, time, and effort associated with rare and little known species conservation.

Additionally, annual personal income related to forestry employment would be greater under Alternative 2 compared to Alternatives 1, 3, or 4. Under Alternative 2, there would be a projected increase in annual personal earnings of \$16.4 million per year compared to Alternatives 1 and 4, and a projected increase of \$2.4 million per year compared to Alternative 3.

Costs described in this Section are direct costs based on surveys and timber volume; they do not include additional costs that stem from the longer planning time required to complete Survey and Manage requirements, or the costs of reconfiguring management activities to avoid known or presumed sites.

4. Restore the Agencies' ability to achieve Northwest Forest Plan resource management goals and predicted timber outputs.

By projecting each species site detection rate (with the more common species projections capped to simulate Annual Species Review removals), the Final Supplement estimates that 15 percent of late-successional forest in the Matrix and Adaptive Management Area (AMA) land allocations is or will be encumbered by species site management under No-Action Alternatives 1 and 4. The Final Supplement shows these encumbrances would reduce the Probable Sale Quantity (PSQ) by approximately 105 million board feet per year, or 13 percent, from the Northwest Forest Plan PSQ level of 805 million board feet. Under Alternative 2, it is projected that the PSQ would be reduced by 35 million board feet from the current PSQ level of 805 million board feet. Under Alternative 3, it is projected that the PSQ would be reduced by 45 million board feet (Final Supplement:316). My Decision, which adopts Alternative 2, best achieves the level of timber outputs predicted under the Northwest Forest Plan.

The same 15 percent projection for managed sites (above) is expected to apply to all land allocations, so resource management activities (e.g. fuels reduction and to some degree, habitat-improvement thinning) in all late-successional forests would be similarly encumbered (up to 15 percent) by the No-Action Alternatives. My Decision to adopt Alternative 2 reduces this encumbrance to about 5 percent of late-successional forests, and permits forest health, protection, and restoration activities to move forward more efficiently. The 1994 Record of Decision identifies the ability to do restoration silviculture in reserves as one of the significant benefits of Alternative 9 (the Northwest Forest Plan) when compared to the other alternatives examined in the 1994 Final SEIS (USDA, USDI 1994b:28).

The current direction (no-action) would result in 7,000 acres (of the 80,000 acres per year annual program) being managed for species site protection, while the selected alternative would reduce this species site management to 1,600 acres, an increase in fuel treatment of 5,400 acres per year when compared to the No-Action alternatives. Since the total fuels treatment need exceeds the Agencies' current budget, it could be argued that some of these 5,400 acres could be simply treated elsewhere, and to some degree, this is true. My concerns are not with the size of this difference, but with the following:

- Not all of these treatments would be transferable to other areas; a certain percentage of the treatment dollars go into planning (other than Survey and Manage), and moving planned treatments elsewhere after species surveys are conducted would result in additional planning costs.
- Strategically placed treatments, particularly those protecting nearby towns, watersheds, or reserves cannot always simply be moved elsewhere.
- The cost savings resulting from ceasing to conduct pre-disturbance surveys and managing resultant sites, when compared with those required under Alternative 2, would make available funds that could pay for nearly another 8,000 acres of needed treatments annually.
- I am concerned about the effectiveness of treatments and resultant safety from future wildfire. On average, known Survey and Manage species sites would preclude most fuel treatment on about 8.7 percent of the area in all planned fuel treatment units. Treatment acres must be effectively and strategically placed on the landscape, and this percentage can significantly compromise treatment effectiveness. Treatment effectiveness is particularly critical in the National Fire Plan-emphasis Wildland-Urban Interface (WUI) areas where the juxtaposition of structures and hazard typically limits treatment location options (Final Supplement:157, 160).

Treatment effectiveness is also an important consideration around Late-Successional Reserves. The Northwest Forest Plan Final SEIS predicts fuels treatments and fire suppression will extend the average “rotation” within Late-Successional Reserves from the historic 250 years to 400 years (USDA, USDI 1994a:3&4-42). The Standards and Guidelines for Late-Successional Reserves require treatments protecting such reserves to be located outside or around the reserves where possible. The two percent impact projected under the selected alternative is far more workable for meeting these protection objectives, particularly since the Special Status Species Programs (Alternative 2) allow managers more flexibility in determining which sites will make up that two percent when additional species sites or habitat is nearby (Final Supplement:149-161).

The selected alternative significantly improves the Forest Service’s ability to implement projects designed to improve forest health, including more efficient implementation of the National Fire Plan.

Summary of the Reasons for the Decision

The underlying needs to which this Decision responds are healthy forest ecosystems and a sustainable supply of timber and other forest products, to the extent these are frustrated by the Survey and Manage Mitigation Measure Standards and Guidelines.

The Northwest Forest Plan goals have their origin in the Forest Service and BLM multiple-use missions. In the Multiple-Use Sustained-Yield Act of 1960, Congress directed the Forest Service to manage National Forests for “*outdoor recreation, range, timber, watershed, and wildlife and fish purposes.*” Briefly, multiple-use means managing resources under the best combination of uses to benefit the American people while ensuring the productivity of the land and protecting the quality of the environment (Final Supplement:28-29). For the Northwest Forest Plan, the BLM exercised its authority under the FLPMA to adopt Northwest Forest Plan provisions intended to meet the Forest Service diversity and viability provisions.

However, Survey and Manage has proven to be an expensive way to conserve rare or poorly known species. I cannot justify continuing to spend millions of dollars on Survey and Manage while other existing policies already provide for species conservation.

I also cannot justify continuing Survey and Manage given the Final Supplement’s determination of the extent to which it frustrates the Agencies’ abilities to achieve the environmental and economic balance of the Northwest Forest Plan. The Northwest Forest Plan is an attempt to strike a balance between conserving ecosystems upon which species depend, and providing raw materials that are needed to sustain the health and economic well-being of communities. The Northwest Forest Plan seeks to balance these sometimes conflicting purposes by maintaining the late-successional, old-growth forest ecosystem while also providing a predictable and sustainable supply of timber, recreational opportunities, and other resources at the highest possible level. When Survey and Manage was adopted, it was believed that the occurrences of species would be rare and effects on lands available for harvest would be minimal (USDA, USDI 2000a:8). Since that time, it has become clear that the constraints on harvest and forest health treatments were greatly underestimated. The effects of this Mitigation Measure on the Agency’s ability to maintain and restore healthy ecosystems as well as provide a sustainable and predictable timber supply have been considerable. The current program, with 15 percent of the existing late-successional forest expected to be managed for known Survey and Manage species sites, significantly alters the Agencies’ ability to achieve the balance intended by the Northwest Forest Plan.

My Decision to adopt Alternative 2 with mitigation for two vertebrates, will best restore the Forest Service's ability to accomplish the dual goals of the Northwest Forest Plan. Specifically, it best achieves the *Purposes* set forth in the Final Supplement, which include providing for species diversity and conservation, reducing costs and effort, and restoring the ability to implement Northwest Forest Plan resource management goals and predicted timber outputs. Alternative 2 provides for species diversity and conservation through the other elements of the Northwest Forest Plan and management controls such as the Special Status Species Programs, particularly in light of increases of late-successional forest documented by the ten-year monitoring reporting. Alternative 2 also provides the largest short and long-term cost reduction, the best opportunity for accomplishing resource management projects to improve and protect forest health, and best improves the Agency's ability to achieve the level of timber outputs predicted under the Northwest Forest Plan, when compared to the other alternatives.

Finally, and to the degree my Decision increases risks to species, the NFMA diversity provision provides deference to multiple-use when the two objectives conflict (36 CFR 219.27(g))(Final Supplement:28). The Final Supplement is the Agencies first opportunity to examine and quantify the impacts of Survey and Manage on their respective missions in an EIS format with a range of alternatives wide enough to apply the deference required by the statutes, and remove Survey and Manage.

Other Alternatives Considered in Detail and Reasons They Were Not Selected

In addition to the proposed action (Alternative 2) and the alternatives considered in the 2000 Final SEIS to which the 2007 Final Supplement is a supplement, three alternatives were considered in detail.

Alternative 1, No-Action with ASRs

Alternative 1, the No-Action Alternative with the ASRs, would have continued implementation of the Survey and Manage Mitigation Measure Standards and Guidelines as implemented by the Agencies following the species removals and category changes of the 2001, 2002, and 2003 Annual Species Reviews. Under this alternative, 295 species would have continued to be managed under Survey and Manage (at least until another Annual Species Review was conducted).

I have not selected No-Action Alternative 1 because, while it would meet the purpose of providing for diversity of plant and animal communities and conserving rare and little known species that may be at risk of becoming listed under the Endangered Species Act, it would not meet the other *Purposes*. Specifically, it would not reduce the costs, time, and effort associated with rare and little known species conservation. It also would continue to frustrate the Agency's ability to achieve Northwest Forest Plan resource management goals and predicted timber outputs. It therefore did not meet the *Need*.

Alternative 3, Modified Survey and Manage

Alternative 3 would have modified the Survey and Manage Mitigation Measure Standards and Guidelines by: (1) removing the uncommon species category and all requirements pertaining to that category; (2) eliminating the requirement to conduct pre-disturbance surveys in non-late-successional and non-old-growth forest stands; and, (3) changing the review requirements for excepting known sites from management.

Alternative 3 would go a long way toward meeting the *Purposes and Need* because it would remove the species currently representing the majority of known species sites, and eliminate pre-disturbance surveys for red tree vole. Alternative 3 would achieve about 79 percent of the cost reduction and 86 percent of the Probable Sale Quantity increase of the selected alternative. It would also achieve 81 percent of the fuels treatment increases achieved by the selected alternative, and 85 percent of the job gains. However, the remaining 15 to 21 percent of benefits is significant to achievement of Northwest Forest Plan objectives, and I do not believe the differences in species outcomes between Alternative 3 and the selected alternative justify the selection of Alternative 3. Alternative 3 would not sufficiently reduce short or long-term costs, increase the Agencies' ability to implement resource management projects to improve forest health, nor improve the Agency's ability to achieve the predicted timber output under the Northwest Forest Plan when compared to the magnitude of its incremental gain in species conservation when compared with Alternative 2.

Alternative 4, No-Action without ASRs

Alternative 4, the No-Action Alternative without the changes made by the 2001, 2002, and 2003 Annual Species Reviews, would have continued implementation of the Survey and Manage Mitigation Measure Standards and Guidelines as it was after the 2001 Record of Decision was signed. Under this alternative, 337 species would be managed under Survey and Manage until an Annual Species Review with any required NEPA analysis was conducted.

I have not selected this version of the No-Action Alternative because the adverse effects to Probable Sale Quantity, costs, fuels treatments, jobs, and other management activities would be about 2 ½ times those under Alternative 1 until an ASR was conducted, and about the same as Alternative 1 thereafter.

4. Findings Required by Other Laws and Regulations

Except as otherwise discussed below, this Decision builds on the findings of compliance with applicable laws found in the April 13, 1994 Record of Decision for the Amendments to Forest Service and Bureau of Land Management Planning Documents Within the Range of the Northern Spotted Owl.

National Environmental Policy Act (NEPA)

The NEPA requires that Federal agencies prepare detailed statements on proposed actions that significantly affect the quality of the human environment. The Forest Service has integrated NEPA analysis with its land management planning process. Under the 1982 planning regulation provisions used in this process, an environmental impact statement (EIS), when appropriate, accompanies its Land and Resource Management Plans or in this case, amendments to them. Site-specific NEPA analyses for future management activities will then tier to the EIS accompanying the land and resource management plan.

The Final Supplement and referenced documents incorporate all new relevant information (including that from the 2004 FSEIS). These data build upon information already compiled in the 1994 Northwest Forest Plan Final SEIS and the 2000 Survey and Manage Final SEIS. All the available information about these species was considered and

a thorough analysis of the potential environmental effects associated with each of the alternatives, and the differences between them, was completed. This Decision reflects my consideration of the best available science.

There has also been extensive opportunity for public involvement in the NEPA process. Scoping letters were sent to 3,300 individuals in October 2002, and 7,000 postcards were sent in March 2006 asking potentially interested people, groups, agencies, libraries, schools, and others (including the 3,300 above) if they wished to remain on the mailing list for the Supplement. Ninety-day public comment periods began in May 2003 for the Draft, July 2006 for the Draft Supplement, and January 2007 for the *Supplement* to the Draft Supplement. In all, the Agencies received over 5,000 comments. The Agencies used these comments to improve the analysis in the Final Supplement. The Agencies also responded to the substantive comments raised in these letters (See Section 5 (*Public Involvement*) of this Record of Decision). These responses are included in Appendices 6, 11, and 13 of the Final Supplement. Letters received by other government agencies or governing bodies are displayed in their entirety in Appendices 7, 12, and 14. Although the Final Supplement was improved because of comments on the July 2006 Draft and the January 2007 supplement to it, I do not find the changes to be so significant as to warrant re-issuance of the Final Supplement as a draft.

I find that the process also complied with the requirements set forth in the regulations that the Council on Environmental Quality has promulgated to implement NEPA:

1. An environmental impact statement must rigorously explore and objectively evaluate all reasonable alternatives. The range of alternatives is limited by the requirement to fulfill the *Purpose* and *Need* to which the Agencies are responding in proposing the action. Among potential alternatives considered were various strategies proposed by the public during the scoping process, as well as some strategies proposed by Agency staff. Many of these alternatives were eliminated from detailed study in attempts to find reasonable alternatives that would fulfill the *Need* and *Purposes* for the Proposed Action. The *Need*, as described in Chapter 1 of the Final Supplement (p. 5), is for “*healthy forest ecosystems and a sustainable supply of timber and other forest products, to the extent these are frustrated by the Survey and Manage Standards and Guidelines.*” The *Need* is expressed in *Purposes* to conserve rare and little known species, reduce costs, and improve the Agencies’ ability to achieve the Northwest Forest Plan resource management goals and predicted timber outputs. The *Purpose* and *Need* substantially limited the range of reasonable alternatives available for analysis and provided a relatively narrow scope for this action (Final Supplement:58). It is important to note the proposed action is limited to removing a mitigation measure applied to the multifaceted Northwest Forest Plan, itself the subject of NEPA analysis with multiple alternatives. Further, the Final Supplement is a supplement to the 2000 Survey and Manage Final SEIS, which contained additional alternatives for Survey and Manage.

2. The Final Supplement considered the cumulative impacts of the proposed action and all other past, present, and reasonably foreseeable future actions within the planning area. The BLM’s ongoing Western Oregon Plan Revision (WOPR) effort is discussed in the Final Supplement (pp. 112-113). The WOPR planning effort is examining a range of alternatives that include ones that would revise the elements of the Northwest Forest Plan for BLM-administered lands.

Since a decision selecting one of the WOPR alternatives is not expected for over a year, specific changes resulting from that decision are not considered foreseeable at the present time. More importantly, however, the Survey and Manage provision was a mitigation measure adopted to reduce the effects of the selected alternative of the Northwest Forest Plan, and is not an independent action that can be considered apart from other elements of the Northwest Forest Plan. The current BLM plans being amended by the concurrent Decision by the Secretary of the Interior will serve as the “no action” alternative for

the WOPR effort. Effects to species, resulting from changes to the plans under the management alternatives in the BLM WOPR, will be analyzed and displayed in the BLM's environmental documentation for those proposed changes, and new mitigation measures will be considered for reducing any adverse effects of those alternatives.

Until a revised plan is adopted, the BLM will continue to manage lands under its administration in accordance with existing resource management plans. Although the analysis for the BLM WOPR might borrow information about species from the Final Supplement, the WOPR EIS could not tier to, or otherwise expect to use, effects described in the Final Supplement without thoroughly explaining why they might still apply.

As noted in the Final Supplement at pp. 112-113, while there is a potential for the future BLM Western Oregon Plan Revision to affect individuals of species that spend part of their lives on National Forest System lands, the potential for such negative effects is limited. The BLM's revised land use plans will continue to provide sufficient older forests and other habitats to avoid jeopardy and contribute to recovery of listed species, and incidentally provide habitat for other species dependent on late-successional habitat. Given this limited potential for negative effects from the management of BLM lands to species on National Forest System lands, no significant cumulative impacts to Survey and Manage species on National Forests are expected from the proposed BLM WOPR. The WOPR EIS will consider the potential for such effects (Final Supplement:112-113).

Although the management of non-federal lands is outside the scope of the Final Supplement, their management have been considered in the species outcomes and other effects. Non-federal actions are primarily described in the 2000 Final SEIS to which the Final Supplement is a supplement (USDA, USDI 2000a:182-187).

3. There is a lack of information regarding many of the species analyzed in the Final Supplement. For 20 species and 4 arthropod functional groups, there was not sufficient information to predict environmental consequences. The *Incomplete and Unavailable Information* section of the Final Supplement (pp. 102-104) includes a discussion of this lack of information. The rationale and basis for my Decision, including the species for which there was not sufficient information, are discussed under *Reasons for the Decision*. None of the incomplete or unavailable information was deemed essential for a reasoned choice among the alternatives. The Final Supplement describes the levels of risk and the relative benefits of each of the alternatives, thus sharply defining the issues and providing a clear basis for my Decision.

National Forest Management Act (NFMA)

The NFMA is an amendment to the Forest and Rangeland Renewable Resources Planning Act. In NFMA, Congress established a comprehensive notice and comment process for adopting, amending, and revising Land and Resource Management Plans (forest plans) for units of the National Forest System. This Decision amends 19 forest plans in accordance with the National Forest System Land and Resource Planning regulations promulgated in 1982 (36 CFR part 219 (2000)).

This Final Supplement has been developed using the procedures of the 1982 planning rule (36 CFR Part 219 (2000)). The 1982 planning rule has been superseded by subsequent rulemaking (the "2000 planning rule," see 65 Fed. Reg. 67568 (Nov. 9, 2000)), and the 2000 rule was itself superseded by a 2005 rule, but a recent court ruling enjoined the Forest Service from implementing the later rule (*Citizens for Better Forestry v. USDA*). The litigation remains pending. In any event, both the 2000 Rule and the 2005 Rule contain transition provisions that authorize plan amendments under the 1982 Rule. Use of the 1982 rule for this amendment was therefore proper. References herein to 36 CFR part 219 are references to provision from the 1982 regulation.

My Decision involves two key elements of the NFMA and related regulations. The NFMA requires the Secretary of Agriculture to promulgate regulations to guide Forest Service planning. One of the statutory requirements of this law is to “provide for diversity of plant and animal communities based on the suitability and capability of the specific land area in order to meet overall multiple-use objectives....” (16 U.S.C. 1604(g)(3)(B).) To meet the requirements of the Act, the Secretary of Agriculture subsequently promulgated NFMA implementing regulations in 1982 at 36 CFR 219 that require managing habitat to maintain species viability of native and desired non-native vertebrates, and provide for diversity of plant and animal communities where appropriate and to the extent practicable (36 CFR 219.19 and 219.26).

Viability Provision

Sec. 219.19 Fish and wildlife resource. Fish and wildlife habitat shall be managed to maintain viable populations of existing native and desired non-native vertebrate species in the planning area. For planning purposes, a viable population shall be regarded as one which has the estimated numbers and distribution of reproductive individuals to insure its continued existence is well distributed in the planning area. In order to insure that viable populations will be maintained, habitat must be provided to support, at least, a minimum number of reproductive individuals and that habitat must be well distributed so that those individuals can interact with others in the planning area.

Citing Seattle Audubon Society v. Moseley, 798 F. Supp 1490 (W.D. Wash. 1992), the 1994 Record of Decision for the Northwest Forest Plan noted that the viability provision does not require species-specific assessments. Rather, in accord with the theme of ecosystem management, a Decision-maker may place reasonable reliance upon assessments of: (1) species with habitat needs that are roughly the same; (2) a group of species generally thought to perform the same or similar ecosystem functions; and/or (3) the continued integrity and function of ecosystem(s) in which a species is found. Flexibility in selecting methodology is especially appropriate in this context, given the expertise and knowledge of local forest officials concerning the lands they manage, the variety of complex issues involved, and the often limited resources available (USDA, USDI 1994b:44-45).

Nevertheless, the Final Supplement provides projected outcomes for the seven vertebrates included, and suggests at p. 121, that “legal requirements [for vertebrates on National Forests] may be similar to the species outcome definitions” (Final Supplement:121). The Del Norte salamander received an outcome of *sufficient habitat*. The other six vertebrates each received an outcome of *sufficient habitat range-wide in the NWFP area but insufficient habitat in a portion of their NWFP area range*. For these six species, these “portions” of their ranges are addressed below.

For the four salamanders (Siskiyou Mountains/Scott Bar, Larch Mountain, Van Dyke’s, and Shasta), the adverse effects described in the Final Supplement are essentially limited to concerns about the maintenance of apparently distinct genetic populations; they are not about species viability. The discussion for Shasta salamander notes “The management discretion in the Special Status Species Programs [to which all of the salamanders are assigned for essentially all of their ranges] is constrained by policy objectives that include maintaining viable populations in habitats throughout their geographic range on National Forest System lands and ensuring that actions do not contribute to the need to list under the Endangered Species Act” (Final Supplement:275-276). The discussion goes on to note “Under Alternative 2, the Shasta salamander would have habitat (including known sites) sufficient to support stable populations range-wide in the NWFP area, although there is likely to be insufficient habitat to support stable populations in a portion of the NWFP area. In particular, there is potential loss of discrete genetic populations in the NWFP area under Alternative 2” (Final Supplement:276). These four salamander conclusions are similar. The summary

of the amphibian effects section notes these four “*would achieve stable, well-distributed populations; however, there is some uncertainty regarding inadvertent site losses or localized population losses created by discretionary procedures and lack of a specified mechanism to improve knowledge*” (Final Supplement:283). I conclude none require mitigation to continue to meet the viability provision or avoid listing. At least one of the salamanders (Van Dyke’s) is entirely riparian, and is thus well protected by elements of the Aquatic Conservation Strategy portion of the Northwest Forest Plan.

The Final Supplement analysis includes the recently identified Scott Bar salamander. The analysis lumps the discussion with the Siskiyou Mountains salamander, under which it was until recently considered a population. The two species have been considered as one species on Survey and Manage, and without a recent Annual Species Review, no decision has been made about separating it from the Siskiyou Mountains salamander for Survey and Manage. The Klamath National Forest has appropriately required its staff to continue to manage the Scott Bar salamander as it does the Siskiyou Mountains salamander. The analysis notes concern for the Scott Bar portion of the Siskiyou Mountains salamander, stating “*With two genetic subunits in the south group, in addition to the population now known as the Scott Bar salamander, there is a particular concern in the south for site-specific losses that may affect genetic population stability. While it has been estimated that there are about 800 occupied grid cells in the south, it is unknown how those are apportioned between the genetic populations. In addition to anthropogenic disturbances, natural disturbances, effects of global climate change or stochastic processes may affect their persistence*” (Final Supplement:281). However, this outcome applies to all alternatives (i.e. with or without Survey and Manage), and the analysis also notes “*The effects on [Scott Bar salamander] are similar to the effects on the southern population of [Siskiyou Mountains salamander], and different outcomes relative to the various Alternatives would not be identified if these species were separated*” (Final Supplement Vol. 2:660). The analysis goes on, as with the other salamanders, to note the Forest Service Sensitive Species program “*is constrained by policy objectives that include maintaining viable populations in habitats throughout their geographic range on National Forest System lands and ensuring that actions do not contribute to the need to list under the Endangered Species Act*” (Final Supplement:281). By Forest Supervisor direction, Scott Bar salamander continues to be managed under this direction. As with other species, I expect the Agency’s Special Status Species Program or equivalent to continue to be used to meet those legal requirements. Based on the condition that the Scott Bar salamander will continue to be managed with the same provisions as the Siskiyou Mountains salamander, I conclude, as with the other salamanders, that management under Alternative 2 will continue to meet the viability and other applicable regulations (See additional discussion under *Endangered Species Act* later in this Section).

For the great gray owl, the Final Supplement attributes the *insufficient habitat* outcome in a portion of the range to the lack of specificity (of management direction) in one or more of the existing plans. In my Decision (see Section 2, *The Decision*), I have applied minimum management requirements for known great gray owl nest sites to each Forest Plan. This mitigation applies only to western Oregon, because the Final Supplement indicates no nest sites are known within the NWFP area in Washington or California.

For the red tree vole, the *insufficient habitat*¹¹ in a portion of the species range includes the North Cascades range of the Northern Mesic Biological Zone - north of highway 22 (including a line projected east along the Marion/Linn County line where the highway turns south at Whitewater Creek; see Figure 3&4-5 in the Final Supplement). As noted in Section 2 (*The Decision*) of this Record of Decision, I am applying mitigation requiring pre-project clearances and management of known sites for this area. Pre-project clearances are the mitigation suggested in the analysis (Final Supplement:292). I intend the flexibility of “pre-project clearances” (see Final Supplement at pp. 121-122, 205-

¹¹As noted in Section 2 (*The Decision*) of this Record of Decision, the *insufficient habitat* determination is a standardized outcome statement used in the Final Supplement. In this or any other specific case, the issue may not be habitat at all, but other factors that include but are not limited to low numbers of known sites, stochastic events, and fire-caused isolation that limited population density and/or dispersal of the species.

306, and Appendix 2) rather than “pre-project surveys” because: a) the red tree vole is Category C (Uncommon) which is intended to require management of only high-priority sites; and, b) the 2000 Final SEIS discussion of the *Northern Oregon Cascades Subzone* at pp. 381-382 indicates considerable previous survey effort to locate red tree voles resulted in only a few sites located.

I have not selected mitigation for the other *insufficient habitat* portions of the red tree vole range. For the North Coast range of the Northern Mesic Biological Zone, most of the area is north of National Forest System lands with only the Hebo District of the Siuslaw National Forest included. The rest of this Forest is in the Mesic Biological Zone where the outcome under all alternatives is *sufficient habitat*. As noted in the Final Supplement, the issue here is the lack of federal lands; 93 percent of the federal land in the North Coast range is already in reserves or reserve-like management (AMA requiring restoration and maintenance of late-successional forest habitat). The *insufficient habitat* outcome here applies across all alternatives, and mitigation would not change the outcome. The red tree vole is currently on both Agencies’ Special Status Species Programs. However, a recent Oregon Heritage Information Center ranking change based on a determination that the vole in this area does not represent a separate genetic population may lead to its removal from the Special Status Species Programs (see Final Supplement Appendix 3 for more information about Heritage rankings). For the reasons stated, however, this does not change the outcomes or my Decision.

For the Xeric Biological Zone, the red tree vole’s Douglas-fir habitat becomes naturally patchy near this southeast corner of its range (Mellen-McLean et al. 2006). The 2000 Final SEIS notes, for example, “Populations are believed to be more widespread in the more mesic portions of their range, such as the central Coast Range and Cascades, but are progressively more limited and with less connectivity in portions of the range where mesic forests intergrade with xeric forests such as adjacent to the Rogue River Valley, the Klamath Mountains, and the drier Siskiyou Mountains” (USDA, USDI 2000a:377), and “There is concern with red tree vole habitat in [the Xeric] zone due to natural fragmentation and limited amounts of mesic forest conditions combined with the small number of confirmed sites. In the Rogue River basin, this xeric habitat is in a belt between the mesic forests conditions found in the Mesic Forest Distribution Zone and the very dry oak woodlands of the Rogue River Valley. ... there is a poor understanding of red tree vole distribution or habitat relationships in these forests. Red tree vole habitat naturally becomes more isolated with progressively less connectivity toward the edges of this zone where it intergrades with the oak woodlands” (USDA, USDI 2000a:384). The Final Supplement found “Recent surveys indicate that, in Oregon, tree voles do not occur in part of the Xeric Biological Zone, and are unevenly distributed and relatively uncommon in the rest of the zone, where they occur only in Josephine County and in a narrow area along the western and northern edges of Jackson County (Figure 3&4-6)” (Final Supplement:289).

While acknowledging that patchy habitat conditions and “relatively uncommon” sites are the stated basis for concern in this area, my examination of the survey map at Figure 3&4-6 (Final Supplement:295) shows most known sites to fall in a relatively intensively populated strip immediately adjacent and parallel to the Mesic Biological Zone (where the red tree vole is secure), on both the Rogue-Siskiyou and the Klamath National Forests. This observation is consistent with the above-cited descriptions. Further, the Random Double Sample (RDS) Survey estimates there are 46,000 recently occupied¹² 2-hectare size plots in the Xeric Biological Zone, apparently all concentrated in this portion of the Zone (Final Supplement:Table 3&4-11). Other portions of the Xeric Biological Zone, east of the identified “range line” and other areas clearly east of the populated areas, appear in the survey data to have no red tree voles whatsoever. It is not a case of dense versus sparse; it is a case of dense versus non-existent. It is acknowledged that in the California portion of this area, survey effort may not be sufficient to conclusively

¹²Evidence of recent occupancy includes a nest with green or tan-colored resin Douglas-fir ducts or cuttings. Such evidence can remain green or tan-colored for over a year inside the nest out of the sunlight (Final Supplement:290).

define the range line¹³. However, this appears to be an example of where the outcome is being judged against a larger “reference distribution”¹⁴ based on relatively limited historic evidence, and that the unpopulated areas of this zone have contributed to the overall adverse outcome.

The Final Supplement indicates, “*The lack of clarity regarding both the distribution and taxonomy of the tree vole in the southern end of the Xeric Biological Zone in California is not likely to be resolved without a survey that systematically examines areas at the eastern edge of the range, including the areas where Zentner (1977) found evidence of tree voles.*” I do not disagree, and continued examination of this area by researchers and others may be appropriate to further clarify the range or for other monitoring or research purposes. Pre-disturbance surveys, however, are not a cost-efficient way of gathering such information. The existing evidence does not indicate a need for mitigation to preclude listing under the Endangered Species Act or to maintain a reasonable distribution on either of the affected National Forests. For the Klamath National Forest in particular, the map of known sites indicates the range is very small and immediately adjacent to the Mesic Biological Zone.

Finally, I am concerned about the effect mitigation in the Xeric Zone would have on the Forests’ ability to conduct forest health thinning and other fuel reduction-related treatments. The Xeric Biological Zone is within the Final Supplement-identified dry forest type particularly prone to moisture stress and wildfire, is part of the area where recent wildfires (Biscuit, Timbered Rock, etc.) have had the biggest impact on late-successional forests, and is where Wildland Urban Interface issues are most acute. Red tree voles typically require connecting crowns for dispersal, and known sites encompass 10 acres. Mitigation for red tree voles in the populated portions of this area would directly and in large part simply continue to “*limit the Agencies’ ability to restore forest health including fuel treatments to reduce the threat of catastrophic wildfire to watersheds, late-successional habitats, and communities at risk*”, one of the *Purposes* the selected alternative seeks to resolve.

In Summary, I am not adding mitigation for the Xeric Biological Zone because:

- The occupied portion of the zone appears well populated and is adjacent and parallel to (linked to) the Mesic Biological Zone;
- The likelihood that red tree voles will maintain viable populations within their current actual range on the affected National Forests appears high;
- There is relatively little area that would significantly benefit from mitigation;
- The Zone is at the edge of the red tree vole range where habitat is naturally fragmented; and,
- The application of mitigation would hamper the Agency’s ability to deal with forest health and fire protection issues in this area.

With mitigation for the red tree vole in the North Cascades range of the Northern Mesic Biological Zone, and the great gray owl in western Oregon, I find that my Decision satisfies the 1982 viability provision of the NFMA implementing regulations for the reasons stated.

Diversity Provision

Sec. 219.26 Diversity. Forest planning shall provide for diversity of plant and animal communities and tree species consistent with the overall multiple-use objectives of the planning area. Such diversity shall be considered throughout the planning process. Inventories shall include quantitative data making possible the evaluation of diversity in terms of its prior and present condition. For each planning alternative, the interdisciplinary team shall consider how

¹³However, the lesser-surveyed areas tend to be in reserves.

¹⁴See *Adverse Outcomes Defined* in Section 3 (*Reasons for the Decision*) of this Record of Decision.

diversity will be affected by various mixes of resource outputs and uses, including proposed management practices. (Refer to Sec. 219.27(g)).

Sec. 219.27(g) Diversity. Management prescriptions, where appropriate and to the extent practicable, shall preserve and enhance the diversity of plant and animal communities, including endemic and desirable naturalized plant and animal species, so that it is at least as great as that which would be expected in a natural forest and the diversity of tree species similar to that existing in the planning area. Reductions in diversity of plant and animal communities and tree species from that which would be expected in a natural forest, or from that similar to the existing diversity in the planning area, may be prescribed only where needed to meet overall multiple-use objectives.

Because of the enormous complexity and dynamic nature of the ecosystems managed under the NFMA, there is no specific or precise standard or technique for satisfying these requirements, as recognized by the scientific community and many courts. The Committee of Scientists (May 4, 1979) that provided scientific advice to the Forest Service on the crafting of the initial NFMA regulations stated that “it is impossible to write specific regulations to ‘provide for diversity’” and “[t]here remains a great deal of room for honest debate on the translation of policy into management planning requirements and into management programs” (44 Fed. Reg. 26,600 and 26,608).

Courts have recognized that NFMA does not create any concrete standard for diversity. The U.S. District Court in Seattle Audubon Society v. Moseley, 798 F. Supp 1484 (W.D. Wash. 1992), stated that the Forest Service must use common sense and apply its fish and wildlife expertise in implementing these requirements. In its affirmation of the Decision to adopt the Northwest Forest Plan, the same court again made it clear that providing for species diversity on the forests was to be done in the context of the overall multiple-use objectives of NFMA. See Seattle Audubon Society v. Lyons, 871 F. Supp 291, at 1315-1316 (W.D. Wash. 1994). On appeal, the Ninth Circuit Court described NFMA as inherently flexible on this point, and because the defendants had not overlooked any relevant factors or made any clear errors held that the application by the Agencies of the viability regulation in the Northwest Forest Plan was reasonable. See Seattle Audubon Society v. Lyons, 80 F.3d 1401, at 1404-1405 (Ninth Cir. 1996).

Relevant factors analyzed in the Final Supplement include the life history of species, the current amount and distribution of habitat, the amount and distribution of species ranges within the planning area, and other reasonably foreseeable protective measures. The effects discussions in the Final Supplement address each of the 337 species and 4 arthropod functional groups covered by the Survey and Manage Mitigation Measure Standards and Guidelines after the 2001 Record of Decision. The analysis of environmental consequences predicts, to the extent available information will allow, likely outcomes regarding the sufficiency of habitat for these species. Although absolute certainty is not possible, the Final Supplement uses a standard of reasonable certainty to predict outcomes.

These provisions apply to plant and animal “communities” and not to individual species. It is apparent the maintenance of these “communities” at least partly stimulated the preparation of the original Survey and Manage standards. The FEMAT had found the species panel results “troubling” because “it is widely accepted that the vascular plants, fungi, and lichens, along with the invertebrates, are critically important for the maintenance of ecosystem function and productivity” (Final Supplement:101; USDA et al. 1993:II-34). However, the *Late-Successional Forest Ecosystem* section of the Final Supplement makes a compelling case that if any of the Survey and Manage species are actually so rare as to be at significant risk of extirpation, they likely have no unique role in ecosystem function (the maintenance of plant and animal communities) (Final Supplement:141-145). My Decision today is unlikely to significantly or even noticeably affect the appearance or function of plant and animal communities. Nevertheless, if my Decision increases the risk to plant and animal communities, the provisions allow “reductions in diversity of plant

and animal communities and tree species from that which would be expected in a natural forest, or from that similar to the existing diversity in the planning area, ... only where needed to meet overall multiple-use objectives." In this case, the *Need and Purposes* of the proposed action are specifically to restore the Agency's ability to conduct multiple-use activities including ecosystem restoration and protection, to the degree these are frustrated by the Survey and Manage provisions. The Final Supplement at p. 180 explains that while no species extirpation is anticipated, the identified potential for increased species risk suggested by the outcome statements and other analysis factors does not itself violate the diversity provision because the trade-off for multiple-use is recognized, analyzed, and consciously made.

I have also considered the potential effects of my Decision on *species* diversity within the NWFP area. The best information results in projecting an outcome of *insufficient habitat in all of their NWFP area ranges* for 133 species in all or part of their NWFP area range under all alternatives, not as a result of federal action. No alternative within the scope of the Final Supplement could change this projected outcome. For another 20 species and 4 arthropod functional groups, there is *insufficient information to determine an outcome*.

For the 52 species with *insufficient habitat in all or part of their range* after mitigating the great gray owl, my Decision to adopt Alternative 2 probably increases the risk to these species. Within the overall context of the Northwest Forest Plan and for the reasons elucidated in the Final Supplement including those listed in the Section 3 (*Reasons for the Decision*) in this Record of Decision, I believe the increased risk is small. I find that the provisions of the Northwest Forest Plan and the Forest Service Sensitive Species Program will provide for diversity of plant and animal communities and conserve rare and little known species that may be at risk of becoming listed under the Endangered Species Act. I have determined that, to the extent practicable and within the flexibility permitted in the regulation, my Decision provides for diversity of plant and animal communities while remaining consistent with multiple-use management objectives of the Northwest Forest Plan. Although there is some risk that reduction in diversity of plant and animal communities from the existing diversity in the planning area could occur, that risk is warranted and permitted in order to meet overall multiple-use objectives.

The Forest Service intends to issue amended National Forest Management Act implementing regulations in the near future. It is not anticipated that the new regulations will affect this Decision.

Forest Service Land and Resource Management Plan Amendments

The 2004 FSEIS applied the amendment process set out in the Forest Service NFMA planning rule issued in 1982, and the 2007 Final Supplement did likewise (Final Supplement:28). Forest plan amendments are used to keep the management direction for National Forests up-to-date. If an amendment to a Forest Plan results in "a significant change in the plan," the 1982 NFMA implementing regulations require that the amendment process follow the procedures used in the initial development of the plan. If the proposed change in the plan is not significant, public notification and completion of the NEPA procedures are still required (36 CFR 219.10(f)), as was completed for this Decision (Final Supplement:23).

"Significant" change in a forest plan is determined by different criteria than those used in evaluating significance in the NEPA process. For the NFMA requirement, the Forest Service Manual (FSM 1926.51 and .52) provides specific direction. As discussed in more detail in the Final Supplement (pp. 23-24), changes to the forest plan that are not significant can result from:

- (1) actions that do not significantly alter the multiple-use goals and objectives for the long-term land and resource management;
- (2) adjustments of management area boundaries or management prescriptions resulting from further on-site analysis when the adjustments do not cause significant changes in the multiple-use goals and objectives for long-term land and resource management;
- (3) minor changes in standards and guidelines; and,
- (4) opportunities for additional management practices that will contribute to achievement of the management prescription.

On the other hand, examples of changes that are indicative of circumstances that may cause a significant change to a forest plan include:

- (1) changes that would significantly alter the long-term relationship between levels of multiple-use goods and services originally projected (36 CFR 219.10(e)); and,
- (2) changes that may have an important effect on the entire forest plan or affect land and resources throughout a large portion of the planning area during the planning period.

The changes resulting from this Decision are not significant for the reasons described in the Final Supplement at pp. 23-24. My Decision eliminates a mitigation measure; it will not significantly change any key elements of the underlying Northwest Forest Plan strategy or standards and guidelines, and would help achieve (and not significantly alter) the relationship between the levels of multiple-use goods and services originally projected.

I conclude that the changes effected by this Decision are not significant amendments in the context of the 1982 Forest Service Planning Regulations, and that the requirements for amending National Forest Land and Resource Management Plans have been met.

Endangered Species Act

No species included in Survey and Manage are listed or proposed for listing under the Endangered Species Act. A petition to list the Siskiyou Mountains/Scott Bar salamanders is being examined now. For those species (two closely associated species, currently managed on Survey and Manage together), a previous U.S. Fish and Wildlife Service finding (since vacated by court action) included assignment to Survey and Manage as one of five reasons for concluding listing *may* not be justified. I do not expect my Decision today to be a significant factor in the decision whether or not to list either or both of these species because:

- The decision now before the U.S. Fish and Wildlife Service is whether or not listing *is* justified (not *may be*),
- There were four other factors indicating listing may not be justified; and,
- The Agency's Sensitive Species Program exists precisely to respond to the potential for species to become listed.

Section 7(a)(2) of the Endangered Species Act requires that Federal agencies consult with the U.S. Fish and Wildlife Service and NOAA Fisheries, as appropriate, to ensure that their actions do not jeopardize the continued existence of species listed as Threatened or Endangered under the Endangered Species Act, or destroy or adversely modify their critical habitat. Although no Survey and Manage species is listed or proposed for listing under the Endangered Species Act, the proposed action was examined because of the potential for the Decision to affect a listed species.

The Agencies completed a Biological Evaluation (BE) (included as Appendix 5 of the Final Supplement) that determined that the preferred alternative, Alternative 2, would not affect any species listed or proposed for listing as Threatened or Endangered except for the northern spotted owl. The evaluation determined Alternatives 2 and 3 would have minimal effects on spotted owl habitat across the NWFP area, which is the meaningful scale for consideration of spotted owl populations. Large reserves and other components of the Northwest Forest Plan would continue to provide habitat blocks for population clusters and dispersal conditions for individual spotted owls under all of the alternatives. The patches of late-successional forest managed as Survey and Manage species sites in the Matrix that would be released and potentially available for timber harvest would not significantly lower the amount of habitat or change the distribution of habitat originally expected to be available to spotted owls. However, at the project level there is a potential for adverse effects on individual owls due to removal of one or more acres of suitable habitat. Therefore, the determination for Alternatives 2 and 3 is *may affect, likely to adversely affect* the northern spotted owl, and *may affect, likely to adversely affect* its critical habitat (Final Supplement Vol. 2:125).

In response to the Biological Evaluation and the Agencies' determination of *may affect, likely to adversely affect*, the U.S. Fish and Wildlife Service prepared a Biological Opinion on May 31, 2007, on the effects of Alternative 2 on the Threatened northern spotted owl and its critical habitat. In the Biological Opinion, the U.S. Fish and Wildlife Service concurred with the Agencies' *likely to adversely affect* determination, but concluded nevertheless that the selected alternative "*is not likely to jeopardize the continued existence of the northern spotted owl or destroy or adversely modify its critical habitat, and would have minimal adverse effects*" (Biological Opinion:35). The Biological Opinion superseded the March 15, 2004 Biological Opinion regarding the same proposed action.

The Biological Opinion noted "*with implementation of the proposed action, these potential effects are likely to involve about 24,900 acres out of about 8 million acres (0.03 percent) of federally managed Late Successional Old Growth habitat in the NWFP area, based on figures presented in the BE. Given the relatively small magnitude of federally managed Late Successional Old Growth habitat likely to be affected by the proposed action, the scattered distribution of Survey and Manage sites throughout the NWFP area, and the reserve system established under the Northwest Forest Plan, the biological significance of these effects to the owl is considered minimal*" (Biological Opinion:33). "*The effects of the proposed action on the spotted owl are consistent with those anticipated in the Service's 1994 BiOp ...*" (Biological Opinion:34). This Opinion assumes the total acreage in Survey and Manage known sites could be altered or lost and, short of examining each specific location of the known sites themselves, thus considers the full effect of this action.

The Agencies and the U.S. Fish and Wildlife Service recognize that the Decision to remove the Survey and Manage Standards and Guidelines does not alter the requirement for project-level consultations and that the proposed action would not "*authorize timber sales or other habitat-disturbing activities*" (Final Supplement:308, Biological Opinion:33, 35). Thus, before any of the formerly protected areas under the Survey and Manage Mitigation Measure would be disturbed by management actions, further project-level analysis and decision-making would take place, during which the Agencies would consult on any proposed actions that are likely to adversely affect any listed species. That consideration would be based on the listed species themselves, and would be unrelated to whether or not a particular acre were occupied by a current or past Survey and Manage species. Those site-specific considerations would be necessary in any event, are therefore unrelated to today's Decision and are thus not a deferral of consideration of the effects of this Decision. The Opinion does not rely on or expect future consultation's retention of any of these acres.

The Agencies did not consult on any listed species other than the northern spotted owl, or with NOAA Fisheries (for listed anadromous fish), because the Biological Evaluation

determined the preferred alternative would not affect any other listed or proposed species.

On June 12, approximately two weeks after completion of the Biological Opinion by the U.S. Fish and Wildlife Service and approximately six weeks prior to this Decision, a proposed rule to revise the northern spotted owl critical habitat was published in the *Federal Register* by the U.S. Fish and Wildlife Service. The proposal would reduce critical habitat from 6,887,000 acres to 5,337,839 acres, based on “*new delineation of areas determined to be essential for the conservation of the northern spotted owl...based, in part, on an improved understanding of the limits of habitat usage by northern spotted owls combined with refinements in mapping technology*” *Federal Register* Vol. 72, No. 112:32462). All of the proposed critical habitat is within Late-Successional Reserves. Most of the known species sites being “released” by my Decision are not in the proposed critical habitat. The Agencies have considered the determinations in the May 31, 2007 Biological Opinion for this action and the adjustments to critical habitat that are proposed, and determined there is no reason to conclude this action will affect the proposed critical habitat any more than it affects critical habitat currently designated. Therefore the Agencies have concluded re-initiation of consultation on the proposed action to conference on the proposed, revised rule, is not needed (Madsen 2007).

Protection of Tribal Treaty Rights and Trust Resources

American Indian treaty rights and trust resources will be protected under this Decision. This Decision does not change the effects on tribal treaty rights and trust resources described in the Northwest Forest Plan Final SEIS, pp. 3&4-314 through 319, and in the Northwest Forest Plan Record of Decision, pp. 54-55. Compliance, coordination, and consultation requirements in the Northwest Forest Plan Standards and Guidelines, p. E-21, are unchanged by this Decision.

Review by the Regional Interagency Executive Committee (RIEC)

The 1994 Northwest Forest Plan Record of Decision, pp. 58 and E-18, requires that proposed amendments to that Decision be coordinated with, and reviewed by, the RIEC. The purpose of the review is to “. . . assure consistency with the objectives of these [Northwest Forest Plan] standards and guidelines” (Final Supplement:21). In February 2007, the RIEC delegated review of proposed plan amendments involving Survey and Manage Standards and Guidelines to the Survey and Manage RIEC Subcommittee, which includes executives from the Pacific Northwest Research Station, Fish and Wildlife Service, Forest Service, and Bureau of Land Management. The required review and coordination of this proposed amendment was completed in June 2007.

As part of the review process, the Agencies determined that the proposed amendment is consistent with the relevant objectives of the Northwest Forest Plan Standards and Guidelines. None of the Subcommittee members recommended changes in that consistency determination, and no other comments were received.

Future amendments to forest Land and Resource Management Plans that would modify the direction established by this Record of Decision may be done under the current authorities of the Regions, and subject to review by the Regional Interagency Executive Committee (RIEC) as described in the original Northwest Forest Plan Record of Decision.

Valid Existing Rights

This Decision does not affect valid existing rights on federal lands. Valid existing rights are those rights or claims to rights that take precedence over any actions required by this plan. Valid existing rights may be held by other Federal, State, or local government agencies or by private individuals or companies. Valid existing rights may pertain to mining claims, mineral or energy easements, rights-of-way, reciprocal rights-of-way, leases, agreements, permits, and water rights.

5. Public Involvement

In developing the Final Supplement, the Agencies published two Notices of Intent with related scoping periods, and three 90-day public comment periods.

The 2004 FSEIS

The process that culminates in my Decision today began with a Notice of Intent to prepare the SEIS published in the Federal Register (63 FR 65167) on October 21, 2002. The Notice of Intent provided preliminary information about the proposed action and invited public comment about the “scope” of the document. Concurrently, a scoping letter was mailed to more than 3,300 individuals and groups identified as potentially interested in the proposed action and analysis. Scoping is the process used to identify issues, concerns, and opportunities associated with the proposed action in an environmental impact statement. According to the Council on Environmental Quality regulations, scoping is specifically not required for supplements to environmental impact statements (40 CFR 1502.9(c)(4)). However, the Agencies did conduct scoping for the SEIS. The Agencies received approximately 700 letters in response to this Notice of Intent and letter. This scoping helped define the issues and, subsequently, the range of alternatives presented in Chapter 2 of the 2004 FSEIS.

A Draft SEIS was issued for 90-day public review on May 23, 2003. Over 5,100 transmittals were received in the form of letters, postcards, facsimiles, and e-mails (collectively referred to as letters). Letters were received from a variety of interests including: individuals, organizations, businesses, Advisory Committees, and Federal and State Agencies. Letters were received from 49 of the 50 states and from three foreign countries (Canada, England, and Germany). More than 3,000 letters originated from Washington, Oregon, and California. All letters were analyzed and considered in the preparation of the 2004 FSEIS. Explanations of how comments were used were included in the 2004 FSEIS in Appendix 6. During preparation of the Final Supplement, those comments were re-examined and responses were generally updated to be consistent with the supplemented analysis. Those edited responses are presented in Appendix 6 of the Final Supplement. Comment letters received from other agencies, elected officials, tribes, and the California Coast Provincial Advisory Committee (PAC) during the 2003 comment period are included in their entirety in Appendix 7 of the Final Supplement.

The BLM and Forest Service issued a Final SEIS in January 2004 (2004 FSEIS), and a Record of Decision in March 2004.

The July 2006 Draft Supplement

In August 2005, the U.S. District Court, Western District of Washington found the 2004 FSEIS deficient on three specific grounds under NEPA and subsequently set aside the Record of Decision (*NEA v. Rey*).

On December 12, 2005, the Agencies published a Notice of Intent in the *Federal Register* (70 FR 73483) to prepare a Supplement to the 2004 FSEIS. The Notice of Intent provided preliminary information about objectives of the Supplement and invited public comment. The Agencies received two letters: one from the U.S. Environmental Protection Agency and one from the Oregon Natural Resources Council and others. Suggestions from both of these letters were incorporated into the Supplement.

During March 2006, 7,000 post cards were mailed to persons known or believed by the Agencies to be potentially interested in any revisions to the Northwest Forest Plan. The card explained both the objective of the Supplement and when it would be available. A response card was also supplied; approximately 300 responses were received requesting the document or notification of when it would be available on the internet.

The Draft Supplement was issued for 90-day public review beginning July 7, 2006. Individuals; interest groups; organizations; businesses; elected officials; state, local, and other Federal agencies; and Tribes were invited to comment on the Draft Supplement. In addition, the document was mailed to libraries, elected officials, and BLM and Forest Service offices. Fifty-five transmittals were received in the form of letters, facsimiles, and e-mails (collectively referred to as letters). Letters were received from a variety of interests including individuals, organizations, businesses, Advisory Committees, and Federal and State Agencies. Letters were received from 10 of the 50 states, with the majority originating from Washington, Oregon, and California. Responses to substantive comments in these letters are included in Appendix 11 of the Final Supplement. Letters received from government agencies are displayed in their entirety in Appendix 12.

The January 2007 Supplement

Following the 2006 public comment period described above, the Agencies were nearing completion of a Final Supplement when, the Ninth Circuit issued its November 6, 2006 decision in KSWC v. Boody. In response, the BLM and Forest Service issued a January 2007 Supplement to the July 2006 Draft Supplement for 90-day public review beginning January 5, 2007. The Supplement added another alternative and 42 additional species, examining Survey and Manage as it existed prior to the 90 Annual Species Review changes made in 2001, 2002, and 2003. The same individuals; interest groups; organizations; businesses; elected officials; state, local, and other Federal agencies; and Tribes described above were invited to comment on the Supplement. In addition, the document was mailed to libraries, elected officials, and BLM and Forest Service offices. Forty-five transmittals were received in the form of letters, and e-mails (collectively referred to as letters). Letters were received from a variety of interests and one Federal Agency. Letters were received from Washington, Oregon, and California.

Received suggestions were used to improve the Supplement, and responses to all substantive comments are included in Appendix 13 of the Final Supplement. The federal agency letter is displayed in Appendix 14.

The 2007 Final Supplement

The Environmental Protection Agency Notice of Availability for the Final Supplement appeared in the *Federal Register* on June 8, 2007, and copies or email notices were simultaneously sent to the same individuals; interest groups; organizations; businesses; elected officials; state, local, and other Federal agencies; and Tribes described above and included on the SEIS Team's mailing list. In addition, the document was mailed to libraries, elected officials, and BLM and Forest Service offices.

According to Council on Environmental Quality (CEQ) regulations, “No decision on the proposed action shall be made until Thirty (30) days after publication [in the Federal Register] of the notice [of availability] for a final environmental impact statement” (CEQ Regulations Implementing NEPA, 40 Code of Federal Regulations (CFR) 1506.10(b)). The regulations go on to permit an exception to the 30 days if the Agency has a formal appeal process, which the Forest Service normally has. However, as noted in the Final Supplement and in this Record of Decision (Section 7, *No Administrative Appeal*), the Secretary of Agriculture is the deciding official and the Forest Service Appeal process does not apply.

By July 12 (34 days following publication of the Notice of Availability for the Final Supplement), 15 transmittals had been received in the form of letters and e-mails (collectively referred to as letters). Letters were received from 14 individuals and the U.S. Environmental Protection Agency (EPA). The individuals’ letters were from Oregon, Washington, and Oklahoma. These all requested retention of the Survey and Manage program, but that if it were removed, mitigation for the red tree vole should be applied to the Xeric and the North Cascades range of the Northern Mesic Biological Zones. Some of the letters requested application of mitigation for all species with adverse outcomes, or explained that their reason for supporting mitigation was to retain as much old-growth forest as possible.

The EPA did not object to the analysis, referencing their earlier findings that the analysis supports both the utilization of the Special Status Species Programs and previous determinations made as a part of the Annual Species Reviews. They noted the importance of the other elements of the Northwest Forest Plan in providing for species persistence.

These letters were considered in my Decision. My Decision adopts mitigation for the red tree vole in the North Cascades range of the Northern Mesic Biological Zone (see Section 2 (*The Decision*) of this Record of Decision). I have not adopted mitigation for red tree vole in the Xeric Biological Zone for the reasons described in *National Forest Management Act (NFMA)* in Section 4 (*Findings Required by Other Laws and Regulations*).

6. Environmentally Preferable Alternative

CEQ regulations require that the Record of Decision specify “the alternative or alternatives which were considered to be environmentally preferable” (40 CFR 1505.2(b)). CEQ’s “Forty Most Asked Questions” document (46 Federal Register 18026, March 23, 1981) clarifies that “The environmentally preferable alternative is the alternative that will promote the national environmental policy as expressed in NEPA’s Section 101. Ordinarily, this means the alternative that causes the least damage to the biological and physical environment; it also means the alternative that best protects, preserves, and enhances historic, cultural, and natural resources.” NEPA’s Section 101 calls for Federal agencies to make decisions to achieve “conditions under which man and nature can exist in productive harmony and fulfill the social, economic, and other requirements of present and future generations of Americans.” It also calls for Federal agencies to “(3) attain the widest range of beneficial uses of the environment without degradation, risk to health or safety, or other undesirable and unintended consequences; . . . (5) achieve a balance between population and resource use which will permit high standards of living and a wide sharing of life’s amenities; and (6) enhance the quality of renewable resources and approach the maximum attainable recycling of depletable resources.” See National Environmental Policy Act of 1969, Sec. 101.

I cannot choose Alternative 1 as meeting the criteria of “environmentally preferred” using the approach suggested by CEQ. The Survey and Manage Mitigation Measure Standards and Guidelines interfere with the Agencies’ ability to implement hazardous fuel treatment projects as well as the other resource management projects needed to reach

the forest health goals identified in the Northwest Forest Plan. The existing situation is the one created by Alternative 1; therefore, this alternative is not environmentally preferred, nor is Alternative 4 for the same reasons.

Alternatives 2 and 3 are both environmentally preferred over Alternative 1 for the following reasons:

1. Alternatives 2 and 3 would both increase the Agencies' ability to accomplish resource management projects to improve forest health while continuing to provide for diversity of plant and animal communities and conserving rare and little known species that may be at risk of becoming listed under the Endangered Species Act. Occupied known sites of Survey and Manage species under Alternative 1 affect, and thus encumber, resource management projects including those designed to improve forest health - 15 percent of the area in late-successional forests in all land allocations. Alternative 2 reduces that effect to about 5 percent and Alternative 3 reduces this effect to about 7 percent. In addition to these direct effects, the *Global Climate* section of the Final Supplement reminds us that the U.S. demand for wood products continues to increase. Each decrease in harvest levels locally likely translates to a corresponding increase in harvesting elsewhere in the world where environmental controls might not lead to efficient replacement, the type of forest harvested may be more efficient at slowing global change than Pacific Northwest temperate forests, and fossil fuels will be burned to deliver the products to U.S. markets.

2. Alternatives 2 and 3 would also increase the Agencies' ability to plan and implement hazardous fuels treatment projects by increasing the acres available for treatment and reducing the costs of treatment. Under Alternative 2, the annual acres available for hazardous fuel treatments are projected at nearly 78,400, an increase of nearly 5,400 acres compared to Alternative 1. Fuel treatment costs to manage for species would be \$39 per acre, a decrease of \$60 compared to Alternative 1. Under Alternative 3, the annual acres available for hazardous fuel treatments would be 77,440, an increase of 4,400 acres compared to Alternative 1. Fuel treatment costs to manage for species would be \$30 per acre, a decrease of \$69 compared to Alternative 1.

3. Species effects are acceptable under both Alternatives 2 and 3. Adverse outcomes are predicted for 53 and 11 species in all or part of their range, respectively, but other factors in the analysis lead me to conclude these adverse effects are likely limited in scope.

Therefore, with the additional forest health and protection treatments permitted by Alternative 2, I conclude that Alternative 2 is slightly more environmentally preferable than Alternative 3.

7. No Administrative Appeal

A Decision by the Secretary of Agriculture is not subject to administrative appeal under the Forest Service regulations. Therefore, this Decision is the final agency action for the amendment of the 19 National Forest Land and Resource Management Plans to remove the Survey and Manage Standards and Guidelines as described in Section 2 (*The Decision*) of this Record of Decision.

8. Effective Date

My Decision to select Alternative 2 with mitigation for two vertebrates is effective immediately.

9. Contact Person

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10. Signature and Date



Mark E. Rey
Under Secretary, Natural Resources and Environment
U.S. Department of Agriculture

Dated: 7/29/07

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