Decision and Reasons for the Decision

Background

The Sweet Home Ranger District is assigned timber targets by the Forest. To determine where to implement timber harvest projects the district utilizes a variety of information including:

- Recommendations from the appropriate watershed analysis. In this case the Middle Santiam Watershed Analysis supported the selection of this area for timber harvest (Middle Santiam Watershed Analysis 1996, p. 76)
- Analysis of lands in various management allocations which are both suitable and available for timber harvest and also meet appropriate standards and guidelines (EA, p. 21-22).

It was determined that General Forest/Matrix lands in the South Pyramid analysis area met these criteria. Approximately half of the area that is suitable and available for timber management in this planning area is dominated by 75-150 year old trees which naturally regenerated after wildfires. Much of the remainder is old growth. Given the resource values associated with old growth habitat, it was decided to concentrate on the 75-150 year old stands in the planning area that were showing signs of declining vigor and growth (EA, p. 11, 32). Since Probable Sale Quantity calculations presume that fiber productivity on General Forest/Matrix lands is realized through healthy growth rates and leaving stands at high densities for extended periods not only affects potential stand growth and timber yield but also puts the stands at greater risk of fire, insect or disease infestations and volume losses, it was decided there was a need to treat these stands.

The South Pyramid Timber Sale proposal not only responds to the goals and objectives in the amended Willamette Forest Plan but also helps to move the project area toward desired conditions described in that plan for General Forest/Matrix management allocations. The purpose of the project is to: (a) contribute approximately 8,000 to 9,000 CCF (hundred cubic feet) of wood fiber toward the District’s timber target for fiscal year 2007, (b) enhance growth and vigor of timber stands and/or reduce future losses from fire, insects and diseases, and (c) utilize competition-induced mortality for use as commercial wood products and reduce long term fuel buildup (EA, p. 21).

The action is needed to: a) meet district timber targets assigned through the Forest budgeting process and b) address health and vigor of densely-stocked, mid-seral stands that are experiencing stagnation and mortality in a General Forest/Matrix management area where the primary management goal is to produce an optimum and sustainable yield of timber compatible with other resource objectives.
Significant issues for this project included: (a) harvest of natural stands, (b) harvest within an area without roads, (c) harvest within a Critical Habitat Unit (CHU) for threatened Northern spotted owls, (d) fuel buildup and the potential for fire or insect and disease infestations in densely-stock stands that are experiencing competition-induced mortality, (e) the proximity of harvest operations to a goshawk nest site and (f) economics and disturbance effects of various logging systems (EA, pp. 27-31).

The South Pyramid Environmental Assessment analyzed four alternatives to meet the purpose and need for this project as well as significant issues that have been identified (EA, pp. 35-64). These alternatives include: No Action, the Proposed Action of commercially thinning 189 acres, and two other action alternatives that use a combination of commercial thinning and regeneration prescriptions on 111 and 86 acres, respectively.

All action alternatives harvest naturally-regenerated stands in General Forest/Matrix management allocations.

**Decision**

Based upon my review of all alternatives, I have decided to implement Alternative 2 as described on pages 36-42 in the EA. Alternative 2 focuses on thinning about 189 acres of overstocked, mid-seral, natural stands to increase growing space for residual trees and reduce mortality from competition which is contributing to high fuel loadings and increased potential for fire, insects and diseases. About 31 acres of the proposed harvest units fall partially or wholly within a critical habitat unit (CHU) for Northern spotted owls. This alternative will retain dispersal, and in some cases suitable (nesting, roosting and foraging) habitat. It will also retain future management options in an area that currently is unroaded. Thinning, interspersed with no-harvest Riparian Reserves and buffers to protect sensitive habitats for plants and animal species, will add to habitat diversity in this block of densely-stocked, fire-regenerated timber stands.

This alternative yields about 8, 828 CCF (hundred cubic feet) toward the district’s harvest targets. Stands will be harvested using a combination of ground-based and helicopter yarding systems. Helicopter yarding is being used on several units, in lieu of building roads and using less expensive yarding methods, in order to preserve the unroaded nature of the area.

Full-leave, no-harvest Riparian Reserves will be left along stream courses, wetlands, and unstable areas. This will help maintain water quality, fish habitat and dispersal corridors for terrestrial species.

About 800 feet of a currently closed, temporary operator’s spur road will be re-opened to facilitate harvest operations. This road is located outside of the unroaded area and will be ripped and closed following harvest operations. No new system-road construction is required for this alternative, but about 27 miles of road maintenance will be needed along haul routes and local roads accessing harvest units.

Mitigation measures (EA, pp.36-38 and 54-62) include: snag and down wood creation, fuel reduction treatments in high risk areas, buffers on special habitats, various measures to minimize soil disturbance and compaction, haul restrictions to ease conflicts between logging and recreation traffic, road closures, erosion control, protection of heritage resources, and seasonal restrictions on operations to protect fish and wildlife (**note**: the terms and conditions of the Biological Opinion include a seasonal restriction from
March 1 to June 30 on activities within a 0.25 mile radius of any known spotted owl activity centers. These terms and conditions were incorporated in to the project design see mitigation measures EA, p. 59).

This alternative meets requirements under the amended Willamette Forest Plan and was prepared in accordance with Forest Plan standards and guidelines. The environmental assessment also follows guidance in the Middle Santiam Watershed Analysis, the NW Forest Plan Temperature TMDL Implementation Strategies (September 2005), the Willamette Forest Road Analysis (as amended in 2003), the Wild and Scenic Rivers Act, 1968, the National Environmental Policy Act (1969), the National Forest Management Act (1976), the Endangered Species Act, and other applicable laws, regulations and policies cited throughout the document and appendices (EA, p. 15-20, 24-25, 70, 77, 81, 87, 102, 108-109, 121, 124, 130, 135, 136, 141, 143, 154, 159, 164, 178, 182, 183, and Appendix L).

Decision Rationale

I have selected Alternative 2 based on the results and findings in the environmental analysis, a review of the supporting appendices, public comments and responses to those comments and a review of the Forest Plan.

When compared to the other alternatives (EA p. 35-63) this alternative best meets the purpose and need of the project because it:

- Contributes the most volume toward meeting the District’s timber target,
- Accomplishes the objective of enhancing growth and vigor and/or reducing future losses from fire, insects and diseases on the most acres of the densely-stocked stands proposed for treatment in the analysis area,
- Utilizes potential competition-induced mortality for use as commercial wood products while also maintaining adequate supply of snags and down wood to meet habitat objectives, and
- Reduces long-term fuel buildup in high risk areas along roads, property boundaries and the Late-Successional Reserve.

In addition, Alternative 2 best addresses the significant issues associated with this project because it:

- Utilizes a conservative treatment, commercial thinning, to improve health and vigor in these older stands in order to also meet CHU habitat objectives for the Northern spotted owl and maintain future options in the unroaded area (EA, pp. 36, 63, 112-116, and 169)
- Uses helicopter logging, rather than less-costly road construction, to access units not accessible from the current road system so that no system roads are constructed in the unroaded area, (EA, pp. 36-38, 63-64, 168-169)
- Positions harvest units in close proximity to existing harvest units and roads in order to avoid impacts to interior unroaded lands to maintain options in the unroaded block, (EA, pp. 36, 63-64, 165-166, 168-170).
- Utilizes seasonal harvest restrictions and buffers to mitigate potential affects of harvest operations on a nearby goshawk nest, (EA, pp. 38)
• Is economically viable while also meeting resource objectives (EA, pp. 63, 173-174, Appendices B and C).

• Meets required standards and guidelines, laws, and other resource objectives and requirements (EA, p. 15-20, 24-25, 70, 77, 81, 87, 102, 108, 121, 124, 130, 135, 136, 141, 143, 154, 159, 164, 178, 182, 183, and Appendix L).

• Maintains or improves diversity in treated stands (EA, pp. 1, 23, 24, 69-70, 147-154). The inclusion of full-leave, no harvest riparian buffers and other protection buffers interspersed throughout the thinned areas will add to diversity within the stands and across the landscape.

• Makes some short-term tradeoffs to spotted owl habitat for long-term gains. Degrading or downgrading habitat through thinning will be compensated in the long-term by gains in diameter, height and crown growth on the remaining trees and increased stand resiliency to fires, insects and diseases. As the tree crowns begin to close together again the habitat will be enhanced over current condition (EA, pp. 63, 110-121).

Other Alternatives Considered
In addition to the selected alternative, I considered three other alternatives. A summary of these alternatives is outlined below. A more complete description of these alternatives can be found in the EA on pages 34 to 57. In addition, a comparison of these alternatives can be found in the EA on page 58.

Alternative 1
No Action
Under the No Action alternative (EA, p. 35) current management plans will continue to guide management of the project area.
This alternative will delay contribution to district harvest targets to some time in the future. Densely-stocked, naturally-regenerated stands will self-thin over time through competition-induced mortality. This mortality will not be used for commercial wood products and fuel build up that leads to potential for fire and insect infestations will not be addressed through management actions. Habitat within the CHU will remain on its present course of succession and future options for the unroaded block will be retained. No harvest will occur near the goshawk nest site.

This alternative was not selected because it does not meet the purpose and need of the project.

Alternative 3
Alternative 3 (EA, p. 43-47) offers another option to achieve project objectives. This alternative harvests fewer acres in the unroaded area and within the CHU than Alternative 2. It achieves proposed harvest volumes on fewer acres than Alternative 2 because it uses both thinning and regeneration prescriptions. Instead of thinning older stands that range in age from 110-150 years old as was done in Alternative 2, about 43 acres of these stands will be regenerated (clearcut leaving snags, 15% of the area in green tree retention areas and other protection buffers). In addition, about 68 acres of younger stands (75 years old) will still be thinned.
The regeneration prescription on the older units will addresses potential losses from fire, insects and diseases by utilizing competition-induced mortality for use as commercial wood products rather than as abundant, wide-spread down material in these densely-stocked stands. Older stands were selected for regeneration because they have reached culmination of mean annual increment (CMAI) and are less likely to respond to thinning the same way younger stands do. Following harvest these units will be broadcast burned and planted with native species. Growth and vigor of the new stands will be enhanced through management activities such as pre-commercial thinning, fertilization and commercial thinning on these matrix lands. Growth and yield tables show that managed stands will attain similar size trees to the existing stands in about half the time it took these dense, natural stands to grow to their current size.

The regeneration prescription will contribute more volume per acre than thinning so achieving similar volumes to Alternative 2 will affect fewer acres than thinning alone. Regenerating these units meets silvicultural and other resource objectives differently than Alternative 2.

One of the seven proposed harvest units is partially within the unroaded landscape block and will be regenerated. Road 2047 864 goes through the upper half of this unit, so the portion of the unit below the road is the part that will potentially affect unroaded area values. In addition, one thinning unit is within the Critical Habitat Unit for Northern spotted owls. Similarly to Alternative 2, thinning this unit will still retain dispersal habitat here and in time (10+ years), the trees will grow in both diameter and height and tree canopies will close again returning the stand to higher quality suitable habitat than currently exists. This stand will also be less susceptible to losses from fire, insects and diseases with treatment than without. No units are in close proximity to the goshawk nest site in this Alternative.

All but two units are logged with conventional ground-based logging systems. Two, of the more-isolated units are logged with helicopters.

Full-leave, no harvest Riparian Reserves and road access is similar to Alternative 2.

This alternative was not selected because: (a) it treats about 40 percent fewer acres of dense, overstocked stands that are experiencing a decline in vigor and growth than Alternative 2, (b) proposed regeneration harvest (which allowed this alternative to meet harvest targets on fewer acres) will occur partially within the unroaded block thus reducing future options within the unroaded block, (c) regeneration will occur in the oldest stand proposed for treatment removing suitable habitat for the Northern spotted owl, and (d) the visual effects of regeneration are longer duration than commercial thinning.

**Alternative 4**

Alternative 4 (EA, p. 48-53) addresses project objectives in yet another way. This alternative does not harvest any units in the CHU or unroaded block but in order to achieve somewhat similar volumes, more units are regenerated (*clearcutting and leaving snags, 15% of the area in green tree retention areas and other protection buffers*) than the other action alternatives.

This alternative is similar to Alternative 3, except the units in the CHU and unroaded area is dropped and the prescription for another unit is changed from thinning to regeneration harvest.

No harvest units occur in the unroaded landscape block or near the goshawk nest. Riparian Reserves, road access and logging methods are similar to both Alternatives 2 and 3.
This alternative was not selected because: (a) it treats the least acres of dense, overstocked stands that are experiencing a decline in vigor and growth of all the action alternatives leaving more acres susceptible to fire, insects and diseases in the long-term, (b) visual effects of regeneration are longer duration than commercial thinning, and (c) habitat effects of regeneration, although beneficial to forage for big game, will be detrimental to Northern spotted owl habitat.

Public Involvement

The need for this action arose in 1998. A proposal to treat natural stands within the South Pyramid analysis was listed in the Schedule of Proposed Actions from 1998 through the fall of 2006. To spread the word about upcoming projects, the Willamette National Forest sends its quarterly mailer “Forest Focus” containing the SOPA to over 100 individuals, agencies, groups and/or industry representatives. The SOPA is also available on the Forest website.

When scoping began for this project in the fall 1998 it was larger in scale and included the harvest of late-successional habitat and new road construction. A public meeting with interested persons was held in Corvallis, Oregon in 1998 to explain the proposed action and to solicit public comments. Two field trips to the planning area were also conducted with members of the public, who expressed interest in understanding this project, to examine stand conditions, treatment options and resource issues.

In the fall of 2003 the District received 83 letters sharing thoughts and concerns about this project. The public discourse on this project and within written comments received from interested publics raised no additional substantive issues that had not already been identified during internal IDT scoping meetings but it did change the focus of the project toward treatment of younger stands, different harvest prescriptions and logging methods that avoided road construction in an unroaded area.

In the spring of 2006, the District received 10 letters regarding this project during the 30-day public comment period prior to a spring 2006 decision on the project. That decision was withdrawn and the document was released for public comment again in the fall of 2006. At that time 13 comments were received.

Using the comments from the public and other agencies, the interdisciplinary team identified several issues regarding the effects of the proposed action. Main issues of concern included (a) harvest within an unroaded block (b) harvest in natural stands, (c) harvest within a Critical Habitat Unit (CHU) for threatened Northern spotted owls, (d) fuel buildup and the potential for fire or insect infestations in densely-stocked stands that are experiencing competition-induced mortality, (e) the proximity of operations to a goshawk nest site and (f) economics and disturbance effects of different logging systems (see EA pages 26-33). To address these concerns, the Forest Service created the alternatives described above.

A legal notice appeared in the Eugene Register-Guard (the newspaper of record) and the Albany Democrat Herald on October 30, 2006 advertising the 30-day public review of the draft environmental assessment. In addition, letters were sent to interested publics. Twelve individuals and one organization commented on the project. A draft environmental assessment was posted on the Forest Website and was available to download from the Forest website or could be viewed directly from the forest website. It was also made available at the District Office or was mailed in hardcopy to those who requested it. This
decision is based on the results and findings of the environmental analysis, a review of the supporting appendices, public comments and responses to those comments, and a review of the Forest Plan. The majority of public comments received during both the initial scoping and the 30-day review focused on the following interests:

- Protecting unroaded landscape characteristics
- Eliminating harvest (especially clearcutting) of natural stands on public lands
- Protecting old growth habitat and not logging in either old growth or mature stands
- Restoring diversity to even-aged, managed stands elsewhere on the district
- Developing an “environmentally sound” alternative with lesser impacts to wildlife
- Logging within the South Pyramid trail corridor.

All correspondence and full text of the letters are available in the analysis file for South Pyramid Timber Sale at the Sweet Home Ranger District office.

I reviewed all the public comments received during the 30-day review period for the EA and considered them in making this decision. A written response to the all comments has been prepared and added to the project file for the South Pyramid project. A summary of the most common comments and responses follows:

Comment #1: Don’t harvest in the Roadless/unroaded area because it provides a variety of ecological functions such as providing clean drinking water, wildlife habitat, recreational values, tourism, and old growth values to name a few.

Response to Comment #1: Background: To clarify the issue, the proposed harvest will not occur in an Inventoried Roadless Area. Instead harvest is proposed in an unroaded area with no official designation. It is about 1,000 acres in size in the analysis area (EA, page 14). The management allocation for this area in the amended Forest Plan is General Forest/Matrix (EA, pages 15 and 17). During public scoping harvest within this area was brought up as an issue (EA, pages 27-28). Sale Design: The design of the proposed action was intended to maintain future management options in the unroaded block (EA, page 36 and 64) as outlined below:

- Units were located near the outer edges of the unroaded block to minimize impacts on the interior of this area (EA, page 36).
- No new road construction was planned in the unroaded area (EA, page 36 and 64). In lieu of road construction, the more-expensive helicopter yarding was selected to minimize impacts to the unroaded area (EA, page 36-37).
- A thinning prescription was used in these older stands, which might otherwise have been regenerated, in order to retain future management options in the unroaded area.
- A 100-foot no harvest buffer was placed on both sides of the South Pyramid Creek Trail and logging and hauling operations were restricted during heavy recreational use periods (EA, page 61).
- Full-leave, no-harvest buffers are maintained along stream courses to protect water quality, habitat for fish and other aquatic species, and to maintain riparian habitat for various plant and
animal species. In addition these unharvested, Riparian Reserves serve as dispersal corridors for various wildlife species (EA, page 37, 57, and Appendix A).

- Finally, no old growth harvest was proposed in any alternatives for this project (EA, page 32).

Upon review of the environmental consequences of this project in light of the careful project design here, there would be no significant adverse impacts to resources in this unroaded area (EA, pages 65-183).

Comment #2: Don’t log mature and old growth trees or clearcut native forests. Instead manage the thousands of acres of even-aged stands on the district to restore diversity while also extracting wood products.

Response to Comment #2: Old growth trees will not be logged in any alternative and native forests will not be clearcut in the selected alternative. Native forests will be thinned however.

While it is true that there are other places on Sweet Home Ranger District with young, dense plantations that could be thinned, this analysis area is also available. This analysis area was identified through the watershed analysis, by management allocations established in the amended Forest Plan and by analysis of areas here that were suitable and available for timber harvest (EA, pages 15-20 and 21-23).

Approximately half of the area that is suitable and available for timber management in the planning area is dominated by 75-150 year old trees which naturally regenerated after wildfires (EA, page 11-12, 22). It was decided to concentrate on the 75-150 year old stands in the planning area that were showing signs of declining vigor and growth. Some trees in these stands are dying due to overcrowding and competition for water, light and nutrients.

For the following reasons it was determined that there was a need to treat these stands at this time:
(a) Forest calculations of Probable Sale Quantity presume that fiber productivity on General Forest/Matrix lands is realized through healthy growth rates, (b) potential stand growth and timber yield would be foregone by leaving high stand densities on these General Forest/Matrix lands for extended periods and (c) stands at high densities are at greater risk of fire, insect or disease infestations and volume losses (EA, pages 21-23).

Comment #3: Proposed alternatives don't offer an environmentally sound choice. Please develop and implement an alternative that does not have such high environmental impacts to wildlife habitat.

Response to Comment #3: From a detailed reading of public comments it appears that the “impacts to wildlife” referred to include: thinning to uniform spacing resulting in a homogenous habitat, impacts to both suitable and dispersal habitat for spotted owls, impacts to snag and down woody habitat, and goshawk nest protection.

- **Thinning** that is prescribed, leaving 40-60% canopy closure in these stands, will not result in homogeneity. Many of these stands contain unthinned Riparian Reserves of 150, 172, 300 or 344 feet either side of stream channels. In addition there are unthinned buffers on special habitats such as meadows, seeps, and rock gardens that are within or adjacent to proposed harvest units.
Further there are no-harvest buffers around sensitive plants and along the South Pyramid Trail. Some harvest units are located adjacent to younger, managed stands. So the combination of thinned and unthinned areas within a stand, differences in tree size classes within and between stands and natural openings within and adjacent to stands results in considerable habitat variability here (see Alternative descriptions in the EA, pages 35-64 and Appendix A – Unit prescriptions).

- As for **spotted owl habitat** (a) there would be no harvest in the Santiam Area of Concern, (b) full-leave, no harvest Riparian Reserves would maintain dispersal habitat through General Forest/Matrix lands, (c) all proposed harvest units retain, at a minimum, required dispersal habitat conditions in the Critical Habitat Unit (CHU). (d) Thinning will degrade or downgrade existing habitat for about a decade until trees grow in height, diameter and canopies close together again (EA, page 110-121), and (e) medium home ranges within 1.2 miles of known spotted owl activity centers in the planning area will meet the US Fish and Wildlife criteria of maintaining at least 40% suitable habitat (EA, page 110-121).

- The Forest Service recognizes the value of snags and down wood as important ecosystem components. For this project, existing **snags and down woody material** will be retained in harvest units whenever possible during logging operations (EA, page 36). Some snags will be felled if they pose a safety threat to workers (EA, pages 55 and 125-130). To mitigate these losses some green trees, over and above those proposed to be left after thinning, will be retained in harvest units until after sale activities are complete (EA, page 36 and pages 125-130). Some of these “extra” trees will be topped to create snag habitat and some will be felled to contribute to down woody material after completion of the sale (EA, page 36).

  The word choice in purpose number 3 for the project (EA, page 1) was poor in that it implies that dead trees would be used as wood products. Given that existing snags and down woody material would be retained in harvest units whenever possible (EA, page 36), the intent of this statement is that the trees to be thinned in the stands are those that are likely to die due to competition from stronger, more dominant trees not those already dead. These trees that would potentially die as a result of competition would be utilized as wood products.

- In the EA, page 29, the issue surrounding **goshawk nest site protection** states that there is controversy about the adequacy of the goshawk protections. The controversy is not a scientific dispute about the adequacy or suitability of the protections but rather a disagreement raised by the public during scoping and is likely the result of a wide variation in goshawk guidelines from other geographic regions with different forest types and ecosystems. Based on a fairly extensive review of research documented in the EA on pages 143-147, proposed goshawk protection measures proposed for this project are consistent with both research and management direction.
Comment # 4:  the analysis of environmental consequences to snags and down woody habitat relies on the Forest Plan's snag retention standard which is outdated and scientifically discredited and the intended use of the DecAid model is being misused.

Response to Comment #4: The project meets Forest Plan standards and guidelines for snags and down woody material for the selected alternative (EA, pages 120-130). Retention of existing snags and down woody material, except where worker safety is at risk, and creation of additional snags and down wood following harvest activities will maintain the required minimum 40% potential population levels of primary cavity excavators and the full 100% population potential for two species: black-backed woodpeckers and flammulated owls, within harvest units (EA, page 120-135).

Given the Forest Plan standards and guidelines and understanding that the designed use of the DecAid model is at the landscape, rather than stand level (EA, page 125), this model was used during projects analysis to help evaluate snag and down wood habitat in the planning area and to help estimate effects on species dependent on that habitat (EA, page 120-130). The DecAid model serves as a reference for comparing snag and down wood levels in the project area to snag and down wood levels documented in various studies and inventories that have been incorporated into this model. (In fact the model incorporates most of the studies referred to in ONRC’s comments about new snag information). DecAid Advisor gives an indication of the range of snag and down woody conditions to be met across the landscape (EA, page 125-126) while the management standards for snag and down wood retention are Forest Plan standards and guidelines. Snags and down woody material recruitment needs and provisions to meet those needs are addressed further on pages 120-130 in the EA.

Comment # 5: Concern about the visibility of harvest units 6a and 8a from the South Pyramid Trail.

Response to Comment #5: The project meets Forest Plan standards and guidelines for forest trail systems (see forest-wide standards and guidelines FW-043 through FW-053, in the Willamette Forest Plan, p. IV-52 to IV-54). The interdisciplinary team determined that a 100-foot trail corridor would adequately meet standard and guideline FW-045 given vegetative screening and topographic position of the unit in relation to the trail as well as the thinning prescription proposed for nearby harvest units. Both units 6a and 8a currently have 300+ trees per acre. Leaving a 100 foot no-harvest buffer in these dense stands, between the trail and the thinning, will provide a vegetative screen between the trail user and the thinned areas. In addition, the trail only skirts a small portion of the eastern and western sections of unit 8a before it veers away from the unit and follows the creek (see figure 1). In the area where the trail is nearest the unit there will be a 100-foot,
no-harvest screen. In the area where the trail veers away from the unit there will be an even larger no-harvest screen because the trail lies within a Riparian Reserve management allocation where no harvest is planned. Unit 6a is more than the maximum 300-foot trail corridor width from the trail. The IDT felt that there were no site-specific circumstances that necessitated varying the corridor width beyond the 300 foot maximum width for this unit. In addition to vegetative screening, there is also topographic screening along much of this trail segment.

Furthermore, the trail frontage affected is less than half of the distance allowed per mile in a ten year period, therefore meeting standard and guideline FW-047.

Finally, for a class III trail such as this, the visual quality objective (VQO) is partial retention (FW-050). In the foreground zone along the trail, partial retention VQO’s allow management activities to be noticeable but require that they remain subordinate when viewed from the foreground along the trail. The 100-foot no harvest buffer and thinning prescriptions for proposed harvest units meet this VQO.

**Finding of No Significant Impact**

After considering the environmental effects described in the EA, I have determined that these actions will not have a significant effect on the quality of the human environment considering the context and intensity of impacts (40 CFR 1508.27). Thus, an environmental impact statement will not be prepared. I base by finding on the following:

1. My finding of no significant environmental effects is not biased by the beneficial effects of the action.

2. There will be no significant effects on public health and safety. All slash treatments are designed to comply with the Oregon Visibility State Implementation Plan and the Oregon Smoke Management Plan which meets Clean Air Act standards (EA, p. 78-81). Mitigation measures and Best Management Practices combined with full-leave, no harvest Riparian Reserves will minimize effects to water quality (EA, p. 37, 57-58, 100-101). Hazard trees that pose a threat to human safety during logging operations and along the haul routes will be removed to meet Oregon Occupational Health and Safety standards (see EA, p. 59).

3. There will be no significant effects on the unique characteristics of the area, because historic or cultural resources were avoided, buffered, or otherwise protected from the disturbing effects of harvest operations and yet-to-be discovered sites uncovered during project implementation will result in suspension of operations until appropriately addressed by the district archaeologist (EA page 180, Mitigation Measures page 62). No park lands or prime farmlands occur in the analysis area (EA page 183). Wetlands will be appropriately buffered from disturbance activities (EA, page 54). The Middle Santiam River is an eligible candidate for Wild and Scenic River status. A segment of this river forms the western boundary of the analysis area. This project does not propose any harvest units with ¼ mile of the river corridor so none of the identified Outstandingly Remarkable Values will adversely impacted by any alternative. The closest proposed units are well over a mile from the river corridor (EA pages 33 and 167-168).
4. The effects on the quality of the human environment are not likely to be highly controversial.  This project is based on the best available scientific information and site-specific data. The methodologies used to estimate the effects disclosed in the Environmental Consequences section of the environmental assessment are widely used in similar environmental analyses and have been reviewed by the research and academic communities. I am not aware of any credible, peer-reviewed scientific questioning of the methods used in this analysis, nor its results.

In the EA on page 29 the issue surrounding goshawk nest site protection states that there is controversy about the adequacy of the goshawk protections. The controversy is not a scientific dispute about the adequacy or suitability of the protections but rather a disagreement raised by the public during scoping and is likely the result of a wide variation in goshawk guidelines from other geographic regions with different forest types and ecosystems. Based on a review of research documented in the EA on pages 143-146, proposed goshawk protection measures proposed for this project (EA, p. 38) are consistent with research and management direction most applicable to the forest type found in the South Pyramid project area.

5. The action is not likely to set a precedent. Sweet Home Ranger District has considerable experience with the types of activities proposed by this project. About 800 acres of commercial thinning and related activities, similar to that proposed by the selected alternative, have been occurring annually on the district since about 1994. Samplings of these projects have been monitored and have been shown to meet the amended Forest Plan standards and guidelines. In addition the analysis in this document shows the effects of this project are not uncertain, and do not involve unique or unknown risk (see EA pages 65-183).

6. The action is not likely to establish a precedent for future actions with significant effects, because the type of thinning proposed is a common land management practice and the effects of this project are within the standards and guidelines outlined in the amended Willamette Forest Plan (see EA pages 65-183).

7. The cumulative impacts are not significant. All cumulative effects are within those discussed in the amended Forest Plan (see EA pages 65-68, 76-7781, 86-87, 92-93, 97-98, 99-100, 101, 107-108, 118-121, 124, 129-130, 135, 136, 140-141, 143, 153-154, 158-159, 163-164, 171-172, 178, 181 and Appendix K).

8. The action will have no significant adverse effect on districts, sites, highways, structures, or objects listed in or eligible for listing in the National Register of Historic Places, because an appropriate inventory was conducted for properties which may be eligible for inclusion in the National Register of Historic Places and appropriate avoidance measures taken so no effects to these resources are expected (see EA, pages 62, 179-182 and Appendix I). The action will also not cause loss or destruction of significant scientific, cultural, or historical resources (see same references).
9. No critical habitat for Endangered Species Act (ESA)-listed threatened or endangered plant species exists within the project area or would be affected by the project (Biological Evaluation – Botanical, March 2006, Appendix D).

This project will have no effect on ESA-listed fish species or designated critical habitat for listed fish species. There is no critical habitat extending above Green Peter dam which is about 26 miles below the project area (2006 Biological Assessment, TES Fish Species, Appendix E). Consultation with NOAA Fisheries was not required because this undertaking does not affect listed fish.

Biological Evaluations/Assessments in Appendix E and F address the effects of the project on endangered and threatened wildlife species and their habitat. Formal consultation with US Fish and Wildlife Service, as required under Section 7 of the Endangered Species Act, was completed for Northern spotted owls in 1998 and 2005 (Appendix F).

The 1998 consultation with U.S. Fish and Wildlife Service resulted in a determination that the project was “not likely to jeopardize the continued existence of the spotted owl or result in the destruction or adverse modification of spotted owl habitat,” (Biological Opinion 1998, p. 22 in Appendix F).

Consultation was reinitiated in 2005 for sales within Northern spotted owl critical habitat after an August 6, 2004 decision by the Ninth Circuit Court of Appeals associated with the Gifford Pinchot Task Force v. U.S. Fish and Wildlife Service. It was determined that the effects of the proposed action on primary constituent elements (nesting, roosting foraging, (NRF) and dispersal habitat of owl critical habitat within critical habitat units (CHUs) (in light of new information such as potential threats from barred owls, West Nile virus, sudden oak death syndrome, wildfires, climate change on regional vegetation patterns, effects of past timber harvest, and spotted owl population declines) are as follows:

- The four acres of proposed thinning in the CHU in units 6a and 8a will degrade about 0.02% of the suitable habitat available within CHU OR-15. Even though these units will degrade habitat, the habitat will “still function as dispersal habitat after harvest operations” and the proposed action “will not change the overall use of the landscape by the owls in the short term and may accelerate development of late and old structure within the treated areas.” For these reasons the U.S. Fish and Wildlife Service determined that these units “may affect but are not likely to adversely affect spotted owl critical habitat.” (Aug. 4, 2005 LOC, pp. 6-7, Appendix F) and;

- The proposed thinning of 28.5 acres of critical habitat in units 4a-c, 8b, 9 and 27 “are not likely to jeopardize the continued existence of the spotted owl or adversely modify spotted owl critical habitat (Aug. 11, 2005 Biological Opinion, p. 58-59, Appendix F).
10. The action will not violate Federal, State, and local laws or requirements for the protection of the environment. Applicable laws and regulations were considered in the EA (see EA pages 15-20 and 182-183, various references in the Environmental Consequences section of the EA and Appendix L). The action is consistent with the amended Willamette National Forest Land and Resource Management Plan (See EA pages 15-20).

Findings Required by Other Laws and Regulations

This decision to commercially thin 189 acres of dense, overstocked, mid-seral, natural stands using a combination of ground-based and helicopter yarding systems is consistent with the intent of the Willamette Forest Plan's long term goals and objectives (LMRP, pp. IV-2 – IV-6 as amended by the NW Forest Plan, 1994). The project was designed in conformance with land and resource management plan standards and incorporates appropriate land and resource management plan guidelines for General Forest/Martix as outlined on pages 15-20 of the environmental assessment (see also Land and Resource Management Plan, pages IV-45—95 and IV-227 – IV230, NW Forest Plan C-2 to C-6 and C-39 to C-48).

Implementation Date

If no appeals are filed within the 45-day time period, implementation of the decision may occur on, but not before, 5 business days from the close of the appeal filing period. When appeals are filed, implementation may occur on, but not before, the 15th business day following the date of the last appeal disposition.

Administrative Review or Appeal Opportunities

This decision is subject to appeal pursuant to Forest Service Regulations at 36 CFR 215. Any appeal of this decision must be in writing and fully consistent with the requirements as described in 36 CFR 215.14. An appeal may be mailed to Dallas Emch, Forest Supervisor, 211 E. 7th Avenue, Eugene Oregon 97440. Appeals may also be filed electronically at: appeals-pacificnorthwest-willamette@fs.fed.us. Electronic appeals must be submitted as part of the actual e-mail message or as an attachment in Microsoft Word (.doc), rich text (.rtf), or portable document format (.pdf) only. E-mails submitted other than to the above address will be rejected. It is the responsibility of the appellant to confirm receipt of appeals submitted by electronic mail. Appeals may be delivered to the Forest Service office at the street address listed above Monday – Friday (other than legal holidays) between 8:00 am and 4:30 pm. Appeals may be faxed to 541-225-6222, Attn. Dallas Emch. The appeal must be postmarked or received by the Appeal Deciding Officer (Forest Supervisor) within 45 days of the date the legal notice of this Decision is published in the Register Guard, Eugene Oregon. For further information regarding these appeal procedures contact Environmental Coordinator, Neal Forrester at 541-225-6436.

If this project is appealed, the Responsible Official (District Ranger) offers to meet with appellants to attempt to informally resolve the appeal.

In cases where no identifiable name is attached to an electronic message, a verification of identity will be required. A scanned signature is one way to provide verification.
Contact
For additional information concerning this decision or the Forest Service appeal process, contact Anita Leach, Planner, Sweet Home Ranger District, 4431 Highway 20, Sweet Home, OR 97386, phone (541) 367-3538.

/l/ Mike Rassbach
MIKE RASSBACH
District Ranger
Sweet Home Ranger District

December 14, 2006

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Figure 1. Selected Alternative South Pyramid

Alternative 2

Legend
- Project boundary
- Three Pyramids SIA
- Thinning - Helicopter
- Thinning - Ground-based
- Past Harvest Units

CLASS
- 2
- 3
- 4
- Roads
- Private Land
- Goshawk Buffer

Private Land

Goshawk Buffer

1a 2a

2b

4a 4b 4c

6a

8a

2047 2047 2047 2047 2047

2047 750 2047 747 2047 750 2047 852

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