

**U.S. Department of Interior
Bureau of Land Management
Roseburg District, Oregon**

**Boss Day Raider Density Management
Decision Document**

Preparer: Jeffrey Wall
Roseburg District BLM
777 NW Garden Valley Blvd.
Roseburg, OR 97470

Preparation Date: May 7, 2007

**U.S. Department of Interior
Bureau of Land Management
Roseburg BLM District, Oregon**

**Boss Day Raider Density Management
Decision Document**

SECTION 1 – THE DECISION

Introduction

Boss Day Raider is a forest density management project identified in the Upper Umpqua Watershed Plan (EA # OR -104-02-09) and its subsequent Decision Record (October 8, 2003). This decision is consistent with the Roseburg District Record of Decision and Resource Management Plan (ROD/RMP) adopted in June 1995 and the Upper Umpqua Watershed Plan. The implementation of this decision will meet the following objectives from the Upper Umpqua Watershed Plan (pg. 2):

- For mid seral forests on BLM lands designated for wildlife and fish needs, accelerate stand diversity and development of late-successional characteristics such as large crown ratios, larger lateral branches, multiple canopy layers, and a greater number of larger conifers while maintaining a healthy ecosystem.

Decision

It is my decision to authorize implementation of the Boss Day Raider Density Management timber sale in Section 1, T. 24 S., R. 08 W., W.M. following the project design features (PDFs) established in the Upper Umpqua Watershed Plan as adjusted in the Decision Record. This timber sale is located within the Late-Successional Reserve (LSR) land-use allocation. The unit that will be treated is a second-growth forested stand that ranges in age from 30-65 years old. Boss Day Raider will provide approximately 5.216 MMBF of merchantable timber available for auction. All of this volume is within the LSR. This decision is subject to administrative remedy under 43 CFR § 5003.2 and 5003.3. The description of the action authorized by this decision is described below.

Timber Harvest

One unit (1) consisting of approximately 390 acres of mid-seral forest, aged 30-65 years, will have density management treatments applied. The average size tree that will be harvested is 11.5 inches diameter breast height (DBH).

An additional 11 acres will be cleared or brushed for road and spur right-of-ways to access the harvest areas (Appendix A). Therefore, the Boss Day Raider project is a total of 401 acres.

Treatment Prescription

Density management will be used to reduce the number of trees in stands dominated by Douglas-fir that are even-aged. Trees will primarily be removed from the suppressed and intermediate canopy classes, although some co-dominant and dominant trees could be removed where necessary to meet specific density objectives. The harvest unit is marked to retain approximately 60-70 square feet of basal area (low residual density).

The prescription for tree marking was designed to create variable spacing between the remaining trees. This was accomplished by occasionally leaving clumps of trees, clearing around large limbed trees, and varying the spacing to select a tree of particular species and/or growth form. Existing snags were protected to the greatest extent possible by marking all snags greater than 6 inches DBH for retention.

Trees selected for retention are dominant and co-dominant from a variety of conifer and hardwoods species greater than 8 inches DBH. Some smaller shade tolerant trees such as western red cedar and western hemlock may be marked to maintain the existing species diversity. Trees selected for retention have at least a 30 percent live crown ratio so that live crown expansion and accelerated diameter growth will be more likely following treatment (Daniel, et. al. 1979).

Variable no-harvest buffers have been placed around non-fish bearing streams. There are no fish-bearing streams immediately adjacent to the treatment unit. No-harvest means that some trees may be felled in these areas to create or enhance habitat but trees will not be commercially removed. The project area includes fish bearing streams downstream of the harvest units along the haul route, but no adverse effects. There are fish bearing streams downstream of the harvest units adjacent to the haul route.

There are approximately 884 snags 8-19 inches DBH and 75 snags 20 inches DBH or greater. The need for recruitment of additional green trees as snags and coarse woody debris to meet criteria established in the project design features will be assessed within two years of the completion of harvest activities (pgs. 6-7).

Timber Cruising

This project will yield approximately 5.216 MMBF of timber available for auction.

A small amount of additional timber could potentially be included as modifications to this project. These additions will be limited to the removal of individual trees or small groups of trees that are blown down, injured from logging, are a safety hazard, or trees needed to facilitate the action. Historically, this addition has been less than ten percent of the total sale quantity.

Firewood

Firewood cutting and salvaging of logging debris (slash) will occur in cull decks, logging landings, and near roads after the density management activities have been completed.

Timber Yarding

The action will require 303 acres of skyline cable yarding and 98 acres of ground-based yarding. Up to 10 acres of additional, incidental ground-based logging may be necessary (i.e. removal of guy line anchor trees, isolated portions of units, etc.) and will occur on gentle slopes (less than 35 percent), during the dry season.

Timber Hauling

Approximately 5.37 miles of rocked road and 2.78 miles of unsurfaced road will be used for the hauling of timber, for a total of 8.15 miles of haul route. A total of 5.37 miles of existing road will be renovated (brought back to its original design) and utilized for wet-season haul and approximately 0.28 miles of existing road will be renovated and used for dry-season haul. Approximately 2.50 miles of newly constructed roads and spurs will be used for dry-season haul.

Fuel Treatment

Slash within 50 feet of logging landings will be machine-piled and burned (under the direction of a written site specific prescription or "Burn Plan"). Approximately 14 acres of piles will be burned.

Road Activities

The action will include dry season and wet season logging activities and use existing roads to the greatest extent practical. Following the project design features described on pgs. 8-9, road construction, renovation, and decommissioning will be restricted to the dry season (normally May 15 to Oct. 15).

Construction

Approximately 2.50 miles of new roads and spurs will be constructed. New road and spur construction will take place within the density management unit. The new road is numbered 24-8-1.7 and is 0.21 miles, and the new spurs are numbered spur 3 thru spur 9 and total 2.29 miles. The operator may rock spurs 7, 9, the extension and landing at the end of spur #2, and landings 1 and 2 at their own expense.

Renovation

Approximately 5.65 miles of existing roads and spurs will be renovated. Road renovation will consist of installing or maintaining drainage structures (culverts and drainage ditches), reshaping the road surface, replenishing road surface with crushed rock where deficient, and brushing road shoulders. The roads that will be renovated are numbered 24-8-2.7, 24-8-1.1, 24-8-1.2, 24-8-1.5, 24-7-7.1, 24-7-18.0 segment B, 24-7-18.0 segments D and E, and spurs numbered 1 and 2.

Culverts

A total of two new culverts will be installed on the 24-7-18.0 road: and 12 culverts replaced on the 24-7-18.0 road, two on the 24-7-7.1 road, two on the 24-8-1.2 road, and one on the 24-8-1.5 road.

Decommissioning

Roads numbered 24-8-2.7, the last 0.14 miles of 24-8-1.5, the first 0.11 miles of 24-8-1.7 and spurs numbered 1, 2, and 6 will be blocked with a trench barrier. After treatment, the roads will be blocked after water bars are installed and the road surface is mulched with logging slash where available, or with weed free straw when logging slash is not available.

Roads numbered 24-8-1.1, the last 0.10 miles of road numbered 24-8-1.7 and spurs 3, 4, 5, 5A, 5B, 6A, 7, 8, and 9 will be blocked with a trench barrier. After treatment, the roads and spurs will be blocked after water barring, sub-soiling, mulching with logging

slash where available or with weed free straw when logging slash is not available. Approximately four miles of existing and new skid trails will be subsoiled in the ground based harvest areas.

These roads will be decommissioned in the manner described above for hydrological purposes upon completion of the harvesting contract.

Compliance and Monitoring

Compliance with this decision will be ensured by frequent on the ground inspections by the Contracting Officer's Representative. Monitoring will be conducted as per the direction given in Appendix I of the RMP (pgs. 189-209).

SECTION 2 – PROJECT DESIGN FEATURES

The following project design features and best management practices are adopted as part of the implementation of this decision to reduce adverse environmental impacts. They are designed to avoid, minimize or rectify impacts on resources. These measures will also help projects meet the objectives of the Aquatic Conservation Strategy.

Seasonal Restrictions

Seasonal restrictions will be applied based on consultation criteria to reduce impacts to federally listed species and in accordance with best management practices to reduce sedimentation impacts to aquatic species, and to reduce soil compaction in order to maintain soil productivity. These restrictions are described below.

Project Design Features to Minimize Effects to Wildlife Threatened & Endangered Species

Project design features for Boss Day Raider Density Management were based on project design criteria from the following documents:

- Letter of Concurrence (LOC) regarding the *Reinitiation of consultation on Roseburg District Bureau of Land Management FY 2005-2008 Management Activities* (Ref. # 1-15-05-I-0511 [June 24, 2005]), and the
- *Upper Umpqua Watershed Plan Decision Record* (October 8, 2003).

➤ Bald Eagle

There are no restrictions for bald eagles since there are no known bald eagle nest sites within 0.25 mile or 0.5 mile line-of-sight of the harvest units.

➤ Northern Spotted Owl

Disturbance

There are no known spotted owl sites, activity centers, or unsurveyed suitable habitat within 65 yards of the unit boundary. Therefore, seasonal restrictions for spotted owls are not necessary.

Habitat

Suitable Habitat

- No suitable spotted owl nesting, roosting, and foraging habitat will be removed or modified by this project.

Dispersal-only Habitat

- Approximately 401 acres of dispersal-only habitat will be degraded. A minimum average canopy closure of 40-60 percent will be maintained in thinned stands. Therefore, these stands are expected to retain dispersal function because post-project canopy cover will not fall below 40 percent.

➤ Marbled Murrelet

Disturbance

This project is within the Marbled Murrelet Inland Management Zone 1 (within 0-35 miles of the coast). There are no known occupied sites within 100 yards of Unit 1. However, there is unsurveyed suitable habitat within 100 yards of Unit 1. Therefore, seasonal restrictions from April 1st thru August 5th and daily operating restrictions from August 6th thru September 15th, both days inclusive, are necessary for marbled murrelets northwest, east, and southeast of the unit boundary.

Habitat

- In accordance with the Letters of Concurrence from the U.S. Fish & Wildlife Service for activities on the Roseburg District (Ref. # 1-15-05-I-0511 [June 24, 2005]), surveys for potential structure were conducted (Oct. 2006) following Residual Habitat Guidelines (pgs. 68-69, Plan Maintenance for FY2004, *Annual Program Summary & Monitoring Report – FY2005*). Twenty-four trees meeting the criteria for potential structure for marbled murrelets were discovered within the original boundary of the unit.

The unit boundary was adjusted to remove ten of the platform trees from within the unit. The remaining fourteen trees were scattered throughout the east half of the unit. Interlocking canopies within at least half-site potential tree height of each of the fourteen scattered trees will be maintained to retain local conditions of platform trees.

- There is suitable marbled murrelet habitat adjacent to the unit, along the northwest, east, and southeast unit boundaries. Mid seral stands adjacent to suitable habitat will be treated with a lighter thinning prescription, maintaining interlocking canopies within at least half-site potential tree height from suitable habitat.

➤ Snags

Snags will be retained or created in the following manner in accordance with direction from the *Upper Umpqua Watershed Plan Decision Document* (pgs. 6-7; Oct. 8, 2003):

- Snags greater than 20 inches DBH and greater than 16 feet tall were located and counted on a stand-by-stand basis. Currently, there are approximately 75 snags meeting the above criteria based on field surveys.
- Tree marking was designed to protect existing snags to the extent possible.

- Those that pose a safety concern will be cut and left for coarse woody debris.
- Currently there are approximately 470 snags on south slopes and 489 snags on north slopes, ranging in size from 8 to 58 inches in diameter at breast height.
- Within two years of the completion of harvest activities, if there are less than three snags per acre on north slopes and one snag per acre on south slopes, snags will be created on a per acre basis from the larger diameter class of existing live trees to meet the minimum interim needs. Trees damaged from the harvest will be preferentially selected for girdling and recruited as snags.

➤ Coarse Woody Debris

Coarse woody debris will be retained or created in the following manner in accordance with direction from the *Upper Umpqua Watershed Plan Decision Document* (pg. 7; Oct. 8, 2003):

- All existing coarse woody debris will be retained.
- Within two years of the completion of harvest activities, up to two trees per acre (approximately 800 trees) will be recruited as additional coarse woody debris. Trees that have fallen since the completion of harvest activities will be credited to recruitment of coarse woody debris. Trees damaged from the harvest will be preferentially selected for falling and recruited as coarse woody debris.

Project Design Features to Minimize Erosion and Sedimentation Effects to Aquatic Species

- To protect aquatic resources within riparian areas, a variable width streamside no-harvest buffer has been established along all streams and wet areas. The variable buffer width is 10 to 60 feet from the outer edge of the active stream channel for all non-fish bearing streams. There are no fish bearing streams within the treatment unit. The buffer width varies to include areas of instability, wide areas of riparian vegetation, or sensitive areas identified during site review. Variation in the non-fish bearing stream buffer was based on site level review of soils, hydrology, fisheries, vegetation, and riparian habitat:
 - Soil was reviewed for the presence or absence of steep slopes, potential erosion, sedimentation, and soil displacement issues.
 - Hydrology was reviewed for overland and groundwater flow conditions (perennial, seasonal, ephemeral classification, wetlands, seeps, and springs).
 - Two identified wet areas were removed from the treatment area.
 - Fisheries were reviewed for the influence non-fish bearing streams have on downstream aquatic habitat.
 - Vegetation was reviewed for diversity and crown characteristics (ground cover, vegetative composition, stream shading, etc).
 - Riparian habitat was reviewed for the presence of key habitat components (aspect, vegetative composition and structure, snags, downed wood, etc).
- At the minimum, one-tree retention has been maintained along the stream bank for bank stability. Minimum buffer widths have been used primarily on first and second order ephemeral or highly interrupted intermittent streams. These streams lack riparian vegetation and riparian habitat components, soil stability issues, and potential impact to downstream fisheries. Management within the buffer could include selected felling

and/or girdling of trees where doing so will benefit riparian habitat. Trees will not be commercially removed from this buffer area.

- Stream channels and riparian habitat will be protected from logging damage by directionally felling trees that are within 100' of streams away from the streams and yarding logs away from or parallel to the streams.
- Yarding corridors parallel to non-fish bearing streams will be at least 40 feet way from the edge of the active stream channel and will be avoided along swale bottoms.
- Skyline yarding is required where cable logging is specified. This method will limit ground disturbance by requiring at least partial suspension during yarding. For all cable yarding, corridors will be 15 feet in width or less.
- Partial suspension and waterbarring yarding trails that are excessively furrowed will reduce the risk of slope failure and limit erosion. Partial suspension lifts (i.e. suspends) the front end of the log during in-haul to the landing, thereby lessening the “plowing” action that disturbs the soil. In some limited, isolated areas partial suspension may not be physically possible due to terrain or lateral yarding. Excessive soil grooves that occur from “plowing” action will be hand waterbarred and filled with limbs or other organic debris

Project Design Features to Minimize Effects of New Road Construction and Road Use

- All new roads will be constructed in upland LSR. Roads will be available for use during the density management contract. These roads will be decommissioned for hydrological purposes (as described on pg. 4) upon completion of the harvesting contract.
- Prior to the wet season, all new road construction not surfaced with rock will be waterbarred and blocked to traffic during the same dry season as constructed. Over-wintering an unsurfaced road for use the following dry season will be allowed in this case since the unit size and degree of seasonal restrictions make completing harvest within one dry season impractical. Over-wintering roads will also require water-barring, mulching with straw, and blocking to traffic.
- Road construction will be located away from streams and not present sedimentation risks. Roads will be located on ridge tops and or stable slopes that do not exceed 30 percent. All new road construction, renovation, and decommissioning will occur during dry periods of the year, generally between May 15 and the onset of regular fall rains or as determined by weather patterns.
- Erosion control measures (waterbarring, seeding, mulching, straw bales, bioengineering, etc.) will be applied where needed on newly constructed roads, renovated roads, or decommissioned road and/or spurs.

- All haul routes used during wet season hauling will be inspected prior to haul activities to assess the current conditions of those roads as they pertain to sedimentation concerns to adjacent streams. Where winter haul occurs along a rocky route with defined stream crossings, road design is currently adequate. Project design features that reduce sedimentation such as silt fences, gravel lifts, and weather dependant operation specifications will prevent sediment contribution to live streams. Activities will be suspended when conditions are such that meaningfully, measurable stream-sedimentation will occur. The suspension will be lifted when conditions improve or remediation measures are implemented.
- On the very steep slopes (75 percent and greater) accessed by the rocky spurs #1 and 2, no cable yarding shall be permitted during periods of the wet season from November 15th to April 15th, inclusive, when soil moisture levels are near-saturated or higher. Soil moisture levels are near-saturated when most or all of the soil pores and voids between soil particles are filled with water – generally greater than 30 percent soil moisture. The newly constructed natural surfaced landing and the end of spur #2 would need to be rocky at operator's expense during the dry season before wet season operations would be allowed.

Project Design Features to Maintain Soil Productivity

- A harvester/forwarder system is required in the areas designated for ground-based yarding.
- Ground-based operations will only occur when soil moisture conditions limit effects to soil productivity (these conditions generally occur between May 15th and the onset of regular fall rains [typically October 15th] or may be determined by on-site examination).
- Forwarder trails will be designated. The forwarder will operate on branch and limb covered areas traversed by the harvester.
- Harvesters will cut trees no further than twelve inches from the ground so that there will be enough stump clearance for sub-soiling excavators.
- Detrimental compaction in new trails and old trails used in this harvest, landings and log deck areas will occupy less than 10 percent of the ground-based portions of the units. Detrimental compaction is defined as compaction that increases soil bulk density by 15 percent or more or alters soil structure to platy or massive to a depth of four inches or more.
- Ground based operations will be limited to slopes less than 35 percent. The harvester only will be allowed on short slope pitches of up to 150 feet between 35 and 45 percent.
- Skid trails which were created by prior entries will be reused to the extent practical.
- To mitigate for soil compaction, approximately four miles of harvester/forwarder trails, old skid trails, and old roadbed will be sub-soiled. In addition, approximately one acre of

areas used to deck logs adjacent to landings will be subsoiled. Sub-soiled trails and roadbeds will be mulched with logging slash where available or with weed free straw if logging slash is not available, and topsoil will be pulled back onto the sub-soiled surface.

- Slash piles will be burned during the late fall to mid-spring season when the soil and duff layer moisture levels are high (ROD/RMP, pg. 140) and the large down logs have not dried. This practice will protect the soil duff layer and down logs from being totally consumed by fire and the surface layer from being negatively altered (i.e., loss of organic matter, erosion, change of soil physical properties, alteration of soil ecology and soil nutrients).

Project Design Features to Minimize Effects from Noxious Weeds

- Construction and logging equipment/machinery will be cleaned prior to moving into the proposed project site. Cleaning will remove weed seed and help control and prevent the spread of noxious weeds.
- Areas of ground disturbance will be mulched with logging slash. If logging slash is unavailable native grass seed or a suitable alternative (i.e., native straw, wood chips, etc.) would be applied following ground disturbance.
- Noxious weed infestations and results from ground disturbance mitigations at the project sites will be monitored.

Miscellaneous Project Design Features

To prevent and report accidental spills of petroleum products or other hazardous material and provide for work site cleanup:

The operator will be required to comply with all applicable State and Federal laws and regulations concerning the storage, use and disposal of industrial chemicals and other hazardous materials. All equipment planned for in-stream work (e.g. culvert and/or ditch line upgrades) will be inspected beforehand for leaks. Accidental spills or discovery of the dumping of any hazardous materials will be reported to the Authorized Officer and the procedures outlined in the "Roseburg District Hazardous Materials (HAZMAT) Emergency Response Contingency Plan" will be followed. Hazardous materials (particularly petroleum products) will be stored in appropriate and compliant UL-Listed containers and located so that any accidental spill will be fully contained and will not escape to ground surfaces or drain into watercourses. Other hazardous materials such as corrosives and/or those incompatible with flammable storage shall be kept in appropriate separated containment. All construction materials and waste will be removed from the project area.

- **Cultural resources** - A cultural resource inventory was completed (July, 2006). No cultural resources were identified. Stipulations will be placed in the contract to halt operations in the event of inadvertent discoveries of new cultural resource sites (e.g. historical or prehistorical ruins, graves, fossils or artifacts)

References

Daniel, T.W., J. Helms, and F. Baker. 1979. Principles of Silviculture. McGraw Hill Book Company, 2nd edition.

SECTION 3 – THE DECISION RATIONALE

This decision implements the guidance provided in the Upper Umpqua Watershed Plan Decision signed October 8, 2003 for that portion of the plan covering the Boss Day Raider project area. It incorporates the “adjustments made” as described in the Upper Umpqua Watershed Plan decision (pgs. 3-9).

The project design features listed above will minimize soil compaction, limit erosion, protect slope stability, protect wildlife, protect air and water quality, and protect fish habitat, as well as protect other identified resource values. I have reviewed the resource information contained in Table 1 “Summary of Effects of the Action” (below) and in Appendices A-J (available upon request from the Swiftwater Field Office). This decision recognizes that impacts could occur to some of these resources; however, the impacts to resource values will not exceed those identified in the *Final - Roseburg District Proposed Resource Management Plan / Environmental Impact Statement* (PRMP/EIS, 1994). This decision provides timber commodities resulting from silvicultural treatments whose effects to the environment are within those anticipated and already analyzed in the RMP/EIS.

As a result of this decision, the density management actions that will be undertaken to: (1) maintain healthy growth rates and contribute timber for the local and regional economy while protecting certain forest components for wildlife in stands on BLM LSR lands, and (2) accelerate stand diversity in mid-seral forests on BLM lands within the riparian area.

The variable low-residual density thinning will develop late-successional characteristics more quickly including multiple canopy layers, large trees with large limbs, and vegetative diversity. In the long-term, the quality of dispersal habitat for the northern spotted owl will improve, as well as provide future nesting habitat for the northern spotted owl and marbled murrelet

My predecessor reviewed the public comments from the EA and provided additional time for interested parties to develop input and to participate in a field tour of the project area. This interactive participation resulted in substantive adjustments in the proposed action initially presented in the Upper Umpqua Watershed Plan EA. These adjustments were incorporated in the Upper Umpqua Watershed Plan Decision signed October 8, 2003 and subsequently in the project design features for this project.

Survey and Manage

The Bureau of Land Management (BLM) is aware of the August 1, 2005, U.S. District Court order in Northwest Ecosystem Alliance et al. v. Rey et al. which found portions of the *Final Supplemental Environmental Impact Statement to Remove or Modify the Survey and Manage Mitigation Measure Standards and Guidelines* (January, 2004) (EIS) inadequate. Subsequently in that case, on January 9, 2006, the Court ordered:

- set aside the 2004 Record of Decision *To Remove or Modify the Survey and Manage Mitigation Measure Standards and Guidelines in Forest Service and Bureau of Land*

Management Planning Documents Within the Range of the Northern spotted Owl (March, 2004) (2004 ROD) and

- reinstate the 2001 *Record of Decision and Standards and Guidelines for Amendments to the Survey and Manage, Protection Buffer, and other Mitigation Measure Standards and Guidelines* (January, 2001) (2001 ROD), including any amendments or modifications in effect as of March 21, 2004.

The Swiftwater Field Office does not expect that the litigation over the red tree vole and the Annual Species Review process in Klamath-Siskiyou Wildlands Center et al. v. Boody et al will affect this project, because the development and design of this project exempt it from the Survey and Manage program. In Northwest Ecosystem Alliance et al. v. Rey et al the U.S. District Court modified its order on October 11, 2006, amending paragraph three of the January 9, 2006 injunction. This most recent order directs:

"Defendants shall not authorize, allow, or permit to continue any logging or other ground-disturbing activities on projects to which the 2004 ROD applied unless such activities are in compliance with the 2001 ROD (as the 2001 ROD was amended or modified as of March 21, 2004), except that this order will not apply to:

- a. Thinning projects in stands younger than 80 years old;
- b. Replacing culverts on roads that are in use and part of the road system, and removing culverts if the road is temporary or to be decommissioned;
- c. Riparian and stream improvement projects where the riparian work is riparian planting, obtaining material for placing in-stream, and road or trail decommissioning; and where the stream improvement work is the placement large wood, channel and floodplain reconstruction, or removal of channel diversions; and
- d. The portions of project involving hazardous fuel treatments where prescribed fire is applied. Any portion of a hazardous fuel treatment project involving commercial logging will remain subject to the survey and management requirements except for thinning of stands younger than 80 years old under subparagraph a. of this paragraph."

Since the Boss Day Raider Density Management project will thin 401 acres of forest stands that are 30-65 years old, it meets exemption "a" above. Therefore, it is my determination that the Boss Day Raider density management treatment complies with remedies for Northwest Ecosystem Alliance vs. Rey, et.al. and Klamath Siskiyou Wildlands center vs. Boody, et.al.

In addition, Survey and Manage Species were considered in the Upper Umpqua Watershed Plan Environmental Assessment (pgs. 35-36, E-25 through E-26).

Aquatic Conservation Strategy (ACS) Compliance

In March 2007, the U.S. District Court, in Pacific Coast Federation of Fishermen's Association, et al. v. National Marine Fisheries Service, et al. and American Forest Resource Council, an Oregon nonprofit corporation, et. al. set aside the 2004 Final Supplemental Environmental Impact Statement for Aquatic Conservation Strategy (ACS FSEIS). The Upper Umpqua EA was written in 2003, according to the Northwest Forest Plan and prior to the 2004 ACS FSEIS. As such, the analysis within the Upper Umpqua EA addresses ACS in a Manner consistent with the March 2007 ruling.

- Standards and Guidelines, in effect in 2003 (prior to the 2004 ACS FSEIS), were adhered to when developing the project objectives and project design features (ROD/S&G, pgs. C-2 through C-3, C-11 through C-61) for application at the site level.
- The Upper Umpqua Watershed Plan (2003) is a combined watershed and environmental analysis. This plan contains the sixth and seventh field watersheds considered during the planning of this project.
- Cumulative effects were considered in the Upper Umpqua Watershed Plan (pgs. 20, 27-28, 32-33, and E-14).
- The Upper Umpqua Watershed Plan analyzed ACS objectives and does not retard or prevent the attainment of ACS objectives (in effect in 2003). The Boss Day Raider Management project objective to accelerate stand diversity and development would Maintain and restore the distribution, diversity, and complexity of watershed and landscape scale features to ensure protection of the aquatic systems to which species, populations, and communities are uniquely adapted. Appendix D of the Upper Umpqua Watershed Plan EA outlines how ACS objectives would be achieved or achievement of those objectives would not be precluded (pgs. D-1 through D-6).

I find the Boss Day Raider Density Management complies with the ACS requirements set forth in the ROD/RMP (1994) and the subsequent District Court interpretations in the Pacific Coast Federation of Fisherman's Association (PCFFA) v. National Marine Fisheries Service (NMFS), 71 F. Supp. 2d 1063, 1069 (W.D. Wash. 1999).

SECTION 4 – PUBLIC INVOLVEMENT

For the Upper Umpqua Watershed Plan Environmental Assessment, comments were solicited from affected tribal governments, adjacent landowners and affected State and local government agencies. No comments were received from these sources. During the seventy-five day public review period for the Upper Umpqua Watershed Plan, comments were received from four individuals or organizations. As previously described in Section 3, comments and subsequent interaction with the public helped formulate the Upper Umpqua Watershed Plan decision (October 8, 2003) and is reflected in both that decision (pgs. 3-9) and in the project design features for this project as described here (April 20, 2007).

No comments or information have been received pertaining to the design of Boss Day Raider Density Management project.

SECTION 5 – PROTEST PROCEDURES

The decision described in this document is a forest management decision and is subject to protest by the public. In accordance with Forest Management Regulations at 43 CFR § 5003 Administrative Remedies, protests of this decision may be filed with the authorized officer [Marci Todd] within 15 days of the publication date of the notice of decision/timber sale advertisement in *The News-Review*, Roseburg, Oregon.

43 CFR § 5003.3 subsection (b) states that: “Protests shall be filed with the authorized officer and shall contain a written statement of reasons for protesting the decision.” This precludes the acceptance of electronic mail or facsimile protests. Only written and signed hard copies of

protests that are delivered to the Roseburg District Office will be accepted. The protest must clearly and concisely state the reasons why this decision is believed to be in error.

Protests received more than 15 days after the publication of the notice of decision/timber sale advertisement are not timely filed and shall not be considered. Upon timely filing of a protest, the authorized officer shall reconsider the decision to be implemented in light of the statement of reasons for the protest and other pertinent information available to her. The authorized officer shall, at the conclusion of her review, serve her decision in writing to the protesting party. Upon denial of a protest the authorized officer may proceed with the implementation of the decision.

For further information, contact Marci Todd, Field Manager, Swiftwater Field Office, Roseburg District, Bureau of Land Management, 777 NW Garden Valley Blvd; Roseburg, OR. 97470, 541 440-4931.

Marci L. Todd, Field Manager
Swiftwater Field Office

Date

Table 1. Summary of Effects of the Action: Boss Day Raider Density Management.

Context (What?)	Intensity (How Much?)	Reason for not being Significant.
Cultural Resources		
Cultural Resources.	Surveys were conducted (July, 2006) for cultural resources and Section 106 responsibilities under the National Historic Preservation Act were completed, in accordance with the 1998 Oregon State Historic Preservation Office protocols. No cultural resources were identified.	There will be no impacts to cultural resources.
Botany & Noxious Weeds (refer to <i>Appendices B</i> for details)		
Federally threatened (FT) Kincaid’s lupine and the federally endangered (FE) rough popcorn flower.	Surveys were completed (May, 2006) and no sites were discovered.	No impacts to these two federally listed plant species will occur since there are no known sites within the project area.
Survey & Manage (S&M) Species.	Boss Day Raider Density Management meets one of the exemption criteria for Survey and Manage from the October 11, 2006 U.S. District Court Order (refer to pgs. 11-12 for details).	The decision to eliminate Survey and Manage is effective on this project.
Bureau Sensitive (BS) and Assessment (BA).	Surveys were completed (May 2006) and no sites were discovered.	No impacts to BS and BA botanical species will occur since there are no known sites within the project area.
Bureau Tracking (BT) Species	Surveys were completed (May, 2006) and six sites of one species of BT vascular plant were detected within the project area.	Districts are encouraged to collect occurrence data on BT species but they will not be considered as Special Status Species for management purposes (IM-OR-2003-054).
Noxious weeds: Himalayan blackberry and Scotch broom occur in the project area.	All roads in this sale have scattered patches of Himalayan blackberry (approx. 0.1 acre) and Scotch broom (approx. 5 acres).	The roads were treated both chemically and mechanically in FY2005. The project area will be monitored for treatment effectiveness and follow-up treatments will be conducted as necessary. The project design features will minimize the spread of noxious weeds.

Context (What?)	Intensity (How Much?)	Reason for not being Significant.
Fisheries (refer to <i>Appendix C</i> for details)		
Oregon Coast Coho Salmon (NMFS determined that the Oregon Coast coho ESU does not warrant listing under the ESA at this time and therefore withdrew the proposed listing [Fed. Reg., Vol. 71 No. 12, Jan. 19, 2006]). However, under OR/WA BLM guidelines, the coho is considered Bureau Sensitive.	Prior to NMFS’s determination, the Roseburg District made a determination that this project will result in a “may effect, not likely to adversely affect [NLAA]” in the Upper Umpqua Watershed Density Management Plan Biological Assessment (Sept. 30, 2005) prepared for consultation with NMFS.	Project will not adversely affect the Oregon Coast Coho Salmon.
Essential Fish Habitat (EFH) for Coho Salmon and Chinook salmon.	Conservation measures incorporated into the project design features will prevent adverse effects to essential fish habitat.	Project will not adversely affect essential fish habitat. Therefore, consultation with National Marine Fisheries Service is not required.
Bureau Sensitive (BS), Assessment (BA), and Tracking (BT) Species.	Oregon Coast coho salmon (BS) and Coastal Cutthroat (BT) are documented within the project area. Umpqua Chub (BS) and Pacific Lamprey (BT) are suspected downstream of the project area.	Project design features will minimize soil erosion and sedimentation effects to aquatic species and aquatic habitat.
Hydrology (refer to <i>Appendix D and E</i> for details)		
Peak Flows within the Analytical Hydrologic Units (AHU).	Density management is not expected to have any measurable impact on peak flow within fish-bearing waters below the treatment areas. At the project level there may be increases in peak flows during smaller storm events (less than two year interval) in small non-fish bearing streams.	No measurable change in peak flows.
Sedimentation.	Project design features will minimize soil erosion and sedimentation effects to aquatic species and aquatic habitat. Sediment produced, as a result of haul, will be of such small magnitude that it will not be meaningfully measurable.	Sedimentation will be maintained below meaningfully measurable levels or haul will be suspended.

Context (What?)	Intensity (How Much?)	Reason for not being Significant.
Soils (refer to <i>Appendix F</i> for details)		
Mass Wasting and Landslides.	The probability of landslides or mass wasting events will slightly increase (less than 10 percent) on about nine acres of steep slopes. The landslides that might occur would be small (less than 0.1 acres). Harvest will not likely accelerate movement on two very slow moving earth flows (blocks of earth and weak rock that move in gliding motions down moderately steep (30-60 percent) slopes) that cover about two acres in the SW part of the unit. The earth flows' toes (the edge of displaced material furthest from the origin) were removed from harvest, as mitigation against accelerated movement.	Landslide initiations under this action have a low probability. Small landslide initiation on the lower four acres of these steep slopes could, but are not likely to reach streams. The earth flow toes occur immediately above the point of origin for two streams. Water quality will not be affected, because the movement of the earth flows is unlikely to be accelerated.
Soil Productivity.	Following timber treatment and subsequent sub-soiling as described above (pgs. 4-5 & 8-9), it is estimated that there will be a net improvement in soil productivity on approximately four acres.	Sub-soiling will accelerate the long-term recovery of soil-productivity.
Wildlife (refer to <i>Appendices G, H, I, and J</i> for details).		
In accordance with the Endangered Species Act, consultation with the U.S. Fish and Wildlife Service (USFWS) has been completed for the federally threatened (FT) bald eagle, northern spotted owl, and marbled murrelet and for spotted owl critical habitat and murrelet critical habitat.	A letter of concurrence from the USFWS for the re-initiation of consultation on Roseburg District Bureau of Land Management FY 2005-2008 Management Activities [Ref. # 1-15-05-I-0511] was received June 24, 2005.	The USFWS concurred that this action is <i>not likely to adversely affect</i> the bald eagle, spotted owl, spotted owl critical habitat, murrelet, and murrelet critical habitat (pg. 30 [Ref. # 1-15-05-I-0511]). Project design features will be implemented in compliance with the letters of concurrence.
Bald Eagle.	No noise/visual disruption effects to bald eagles will occur due to this action since there are no known nests within 0.5 mile of the harvest units. Based on 2006 surveys, the nearest nest	No disruption effects to bald eagles will occur and suitable nesting habitat will not be modified.

Context (What?)	Intensity (How Much?)	Reason for not being Significant.
	site (McGee Creek) is approximately 2.5 miles away. No suitable habitat will be removed or modified.	
Noise/Visual Disruption of Northern Spotted Owl nesting behaviors.	No noise/visual disruption effects to spotted owls will occur due to this action since there are no known spotted owl nests, activity centers, or unsurveyed suitable habitat within 0.25 mile of the harvest units.	No disruption effects to spotted owls will occur.
Northern Spotted Owl Habitat. There are five northern spotted owl sites (includes 16 activity centers) that are located within 1.5 miles (<i>Coast Range provincial home range</i>) of the proposed harvest unit. The South McGee (MSNO 2299A) site has an established 100-acre Known Owl Activity Center (KOAC).	Density management will degrade 401 acres of dispersal habitat but will not alter the ability of that stand to function as dispersal habitat. Since the treated stands will not be modified below 40 percent canopy cover, the stands will still function as dispersal habitat. No suitable habitat will be modified or removed.	Density management of the mid-seral stands will improve the quality of dispersal habitat within 5-10 years. Density management within the Riparian Reserves will diversify the forest for spotted owl use by developing larger diameter trees with multiple canopy layers. Beneficial effects to dispersal habitat from density management will persist until the upland Matrix portions of the stands undergo final harvest in the future. The USFWS concurs that this action <i>is not likely to adversely affect</i> spotted owls (pg. 19 [Ref. # 1-15-05-I-0511]).
Critical Habitat for the Northern Spotted Owl. This project is located within designated critical habitat unit OR-58 for the northern spotted owl.	Density management will degrade 401 acres of dispersal habitat within designated critical habitat. Thinning treatments will maintain canopy cover above 40 percent. Therefore, the stand will continue to provide sufficient primary constituent elements to provide for spotted owl dispersal. No suitable habitat will be modified or removed.	Because the primary constituent elements present in dispersal habitat will persist post-treatment, the USFWS concurs that this action <i>is not likely to adversely affect</i> spotted owls (pg.28 [Ref. # 1-15-05-I-0511]).

Context (What?)	Intensity (How Much?)	Reason for not being Significant.
<p>Noise/Visual Disruption of Marbled Murrelet nesting behaviors. The project area is located approximately 32 miles from the coast, within Zone 1.</p>	<p>There is unsurveyed suitable habitat or occupied sites adjacent (north and east) to Unit 1. The harvest unit is approximately 1.8 miles from the nearest known occupied marbled murrelet site (Rader Creek [MSNO-R3002]).</p>	<p>To avoid disturbance impacts to the marbled murrelet, seasonal restrictions from April 1st thru August 5th, and Daily Operating Restrictions (two hours after sunrise to two hours prior to sunset) from August 6th thru September 15th will be implemented within 100 yards of unsurveyed suitable habitat.</p> <p>The USFWS concurs that the density management activities <i>are not likely to adversely affect</i> marbled murrelets (pg. 16 [Ref. # 1-15-05-I-0511]).</p>
<p>Marbled Murrelet Habitat.</p>	<p>Suitable nesting habitat will not be removed within or adjacent to the project area.</p> <p>Within the stands prescribed for density management under this decision, surveys for trees with suitable platform structures were conducted (October 2006) following the Residual Habitat Guidelines.</p>	<p>Density management will facilitate the development of future nesting habitat by increasing tree and limb growth rates; fostering the development of nesting platforms. In addition, thinning younger trees from around the older, large limbed trees will allow greater access for nesting providing an opportunity for murrelets to occupy these stands earlier.</p> <p>The USFWS concurs that the density management activities <i>are not likely to adversely affect</i> marbled murrelets (pg. 10 [Ref. # 1-15-05-I-0511]).</p>
<p>Critical Habitat for the Marbled Murrelet. This project is located within designated critical habitat unit OR-04-<i>e</i> for the marbled murrelet.</p>	<p>Within the stands prescribed for density management under this decision, surveys for trees with suitable platform structures were conducted (October 2006) following the Residual Habitat Guidelines.</p>	<p>Based on compliance with the Guidelines for stands with potential murrelet nesting habitat, density management activities are not expected to measurably affect the primary constituent elements of critical habitat because the potential murrelet nesting</p>

Context (What?)	Intensity (How Much?)	Reason for not being Significant.
	<p>Density management will degrade 401 acres of designated critical habitat. Thinning treatments will maintain canopy cover above 40 percent.</p> <p>No suitable habitat will be removed.</p>	<p>structure will be excluded from the treatment area or protected within the treatment area.</p> <p>Thinning activities within critical habitat are intended to improve forest health conditions or facilitate the development of structural characteristics of unsuitable habitat, and is consistent with recovery actions described in the Marbled Murrelet Recovery Plan (recovery action 3.2.1.3).</p> <p>Because primary constituent elements will not be removed, the USFWS concurs that this action <i>is not likely to adversely affect</i> marbled murrelets (pg. 16 [Ref. # 1-15-05-I-0511]).</p>
<p>Survey & Manage (S&M) Species.</p>	<p>Boss Day Raider Density Management meets one of the exemption criteria for Survey and Manage from the October 11, 2006 U.S. District Court Order (refer to pgs. 11-12 for details).</p>	<p>The decision to eliminate Survey and Manage is effective on this project.</p>
<p>Northwestern Pond Turtle (Bureau Sensitive)</p>	<p>Suitable habitat for the pond turtle may be present in a pump chance located outside of the south boundary. Pond turtles may overwinter in the upland habitat.</p>	<p>The action will not affect pond or upland overwintering habitat in a measurable way.</p>
<p>Purple Martin (Bureau Sensitive).</p>	<p>The harvest unit does not contain suitable habitat (e.g. open areas with snags) for purple martins. Purple martins may forage over the canopy of the existing stand.</p>	<p>The action will not affect the forage opportunities or quality for purple martins in a measurable way.</p>

<p>Spotted Tail-dropper (Bureau Sensitive).</p>	<p>The harvest unit contains habitat suitable for the spotted tail-dropper (e.g. moist coniferous forest with a substantial hardwood component), but there are no known sites within the project area.</p>	<p>No impact to the spotted tail-dropper will occur since the post-treatment stand condition appears to fall within the range of suitability for this species and its con-specifics.</p>
<p>Townsend's Big-eared Bat (Bureau Sensitive)</p>	<p>The harvest unit does not contain suitable habitat (e.g. late-successional forest associated with water; caves, rock crevices) for Townsend's big-eared bats. Suitable habitat is adjacent to the project area. Townsend's big-eared bats are expected to forage over the pump chances within the project area.</p>	<p>The action will not affect the forage opportunities or quality for Townsend's big-eared bats in a measurable way.</p>
<p>Remaining Bureau Sensitive (BS) and Bureau Assessment (BA) Species.</p>	<p>Evaluation of the remaining BS and BA wildlife species was completed in March 2007 and no known sites or concerns were identified (except for the northwestern pond turtle, purple martin, spotted tail-dropper, and Townsend's big-eared bat as discussed above).</p>	<p>No impacts to the remaining BS or BA wildlife species will occur since there are no known sites within the project area.</p>
<p>Bureau Tracking (BT) Species.</p>	<p>There are known detections of BT species, including clouded salamander, sharptail snake, and several myotis bat species within or within close proximity to the project area (ONHP 2007).</p>	<p>Districts are encouraged to collect occurrence data on BT species but they will not be considered as Special Status Species for management purposes (IM-OR-2003-054).</p>