

Pre-Operations Report

Operation Name: East Wood
County: Tillamook
Management Basin: Nestucca

Table 1. Operation Areas, Types and Acres

Area	Type of Operation	Gross Acres	Net Acres ¹
1	MC	44	42
Total		44	42

¹ The net acres are based on orthophotos and GIS and exclude roads, stream buffers (special stewardship), other stream buffers and reserve areas.

I. PHYSICAL DESCRIPTION OF OPERATION AREA:

Slopes have a N to NW aspect and range from 0% to 25%. Elevations range from 600 to 1000 feet. The major soil type is Pinochle.

East Wood is on gentle rolling topography near the main stem of East Creek. The underlying rock is sedimentary origin rocks of the Yamhill Formation massive to thin-bedded dark gray siltstone commonly associated with tuff beds and thin sandstones. The northeast 2/3 of the sale area is mapped as part of a very large deep-seated landslide feature.

II. CURRENT STAND CONDITION:

Table 2. Stand Inventory Information³

Area	Prescription	Stand ID ¹	Species	Age	DBH	BA	TPA	SDI	Net Acres ²
1	MC	304	DF/WH/RA	43	13/20/12	113/18/20	116/7/26	48	42

¹ The source of stand inventory information is from field reconnaissance cruise plots taken in 2004 and SLI in 2002.

² The net acres are based on orthophotos and GIS and exclude roads, and stream buffers (special stewardship), other stream buffers and reserve areas.

³ These numbers are based on plot data taken to this point and final numbers may differ significantly from the actual conditions. The directive for minor and major modifications will be followed for further review.

The sale area was planted with Douglas fir in 1963-64. This area was pre-commercially thinned in 1993 and commercially thinned in 1998.

The sale area has been inventoried using the Stand Level Inventory (SLI) procedure and the stand has been identified as UDS. What defines this stand is the Douglas-fir dominated overstory with clumpy areas of brush. There are

scattered large legacy trees left from previous harvests. Regen and older forest structure border the sale area.

See Table 2 for specific stand data.

The Douglas-fir has Swiss needle cast (SNC) symptoms and poor live crown ratios resulting in slowed diameter and/or height growth. The stand has been mapped by SNC aerial surveys in each of the last three years. No other significant insect or disease problems have been discovered at this time.

There is scattered hemlock, spruce and patches of alder throughout the sale.

The brush component in all the sale areas is comprised primarily of vine maple, sword fern, salmonberry or Oregon grape. The majority of vine maple is in small clumps in openings. Salmonberry is in thick clumps and stringers near and around streams.

There are some large snags in various states of decay and/or some hard snags created from wind, snow, and/or bear damage. SLI reports approximately 3 snags per acre, with .3 per acre over 24" DBH. Down wood consists of scattered large old logs (36"+) in Class 3 and 4 stages of decay and some windthrow in decay classes 1 and 2 and slash from recent partial cut activity. SLI reports approximately 1700 cubic feet per acre total down wood with 181 cubic feet per acre in decay classes 1 and 2.

III. DESIRED STAND CONDITION:

Table 3. Stand Structure Information

Area	Stand ID	Current	Post Harvest ¹	Desired Future	Net Acres
1	304	UDS	REG	GEN	42

¹ The stand is expected to develop into this condition in the five to ten years after this operation is completed except in REG stands which occur after harvest.

See Section IV: Proposed Management Prescription for more information on Green Tree, Down Wood, and Snag Strategies during operation. Also refer to Landscape Design in the Summary document for more information on strategies to move the district toward Desired Future Condition goals.

As this area is surrounded by private and Federal landowners, treatment of this area will create a mosaic over the landscape of openings, gaps, variable densities and mixed species. Unmanaged hardwood and conifer mixes will be left in and adjacent to this stand in headwalls, and/or in riparian buffers as well as scattered in the unit.

As the future stand is established and matures the residual trees from this treatment will add to the complexity of sizes, species and densities. These trees

will also add to snags and down wood over time and through the life of the subsequent stand.

Stand Level Inventory (SLI) will be scheduled for five to seven years after stand establishment. This inventory will provide more data on down wood and snags in the harvest units. If the stand is deficient in either of these characteristics, additional amounts will be created.

IV. PROPOSED MANAGEMENT PRESCRIPTION:

Modified Clearcut:

On the sale area, Douglas-fir and alder will be targeted for harvest. Incidental hemlock will also be harvested. All other species will be reserved. A diameter limit will be used to select an average of 4 to 8 trees per acre to meet the green tree retention goals and promote complex stands. The largest of the trees, regardless of species, will be retained to meet this goal.

Understory vegetation will be enhanced by the additional growing space available.

Green Tree, Down Wood and Snag Strategies

See also Section III: Desired Future Condition for long term strategies

A variety of methods will be used to achieve green tree retention requirements. These residual green trees will supplement the future stand by promoting growth of dominant/co-dominant leave trees. Small non-merchantable hardwood and conifer will also be retained where possible. These leave trees function as future source of snags and down wood recruitment across the landscape. Residual trees will be in clumps and scattered throughout the treatment area. Additional areas adjacent to the harvest unit will be evaluated for use as Green Tree Retention during sale preparation.

Existing down wood will be left in the sale areas. Down wood recruitment is expected through mortality and windthrow of residual or leave trees, felled snags and requiring tops to be left in the unit during ground harvest activities. Small non-merchantable hardwood and conifer will be retained where possible in the harvest unit with the expectation they can become short-term snags and down wood.

Existing snags not determined to be a safety hazard will be retained and any felled snags will be left for down wood. Creation of snags is expected during harvest activities (rub trees or tail trees) and over time by natural processes.

V. ESTIMATED TIMBER AND REVENUE INFORMATION:

Table 4. Timber and Revenue

Ownership		Sale Type	
BOF	CSL	Cash	Recovery
100%	%	<input type="checkbox"/>	X
Planned Quarter:		2	

	Conifer	Hardwood	Total
Net Volume (MBF)	508	25	533
Stumpage Value (\$/MBF)*	\$226.38	\$250	
Estimated Gross Value	\$115,000	\$6250	\$121,250
		Project Costs:	\$2000
		Estimated Net Value:	\$119,250

*Combined Douglas-fir and hemlock stumpage values based on harvest type.

VI. HARVESTING AND ACCESS CONSIDERATIONS:

The sale area is accessed via East Creek County Road and USFS Road 8377. These are currently all weather, crushed rock roads. See maps for specific road locations and conditions.

Approximately 0.1 miles of existing unsurfaced, and/or abandoned road will be improved which includes culvert replacement or removal and vacating. This work will bring all roads up to standards described in *the Forest Roads Manual*. Following harvest, roads within the sale areas will be reviewed for closure. See summary document for more information on this topic.

The operation is planned to be 100% ground yarding. An access agreement with USFS will be required for haul. If there are delays in obtaining an agreement the sale may be postponed to a later quarter.

Table 5. Transportation Planning Summary (Miles)⁴

Activity	Mainline	Collector	Rocked Spur ¹	Dirt Spur ¹
Construct	0	0	0	0
Improve	0	0	0	0
Maintain ²	0	3.6	0	0
Close/Block ³	0	0	0	0
Vacate ³	0	0	0	0.1

¹ Additional roads may be built by the operator at the time of harvest and will be approved by the State through the Operations Plan. These will be short dead end spurs and closed or blocked after harvest

² All roads accessing the sale area will be maintained during the life of the timber sale contract.

Maintenance miles in the table are those roads not being constructed or improved.

³ Roads not closed/blocked or vacated at the end of the sale will be reviewed for closure after reforestation is established.

⁴ The numbers in this table reflect planned Project Work associated with the sale.

VII. AQUATIC RESOURCES AND WATER QUALITY:

East Creek is a large Type F stream that is adjacent to the haul route. There is 1 unnamed small perennial, and 1 unnamed small seasonal Type N stream within the sale area. These streams will be reviewed and protected appropriately during sale layout based on flow, topography, and terrain.

Oregon Department of Fish and Wildlife (ODFW) will be requested to complete stream surveys before sale layout begins. Streams of unknown status will be treated as Type F until surveys are completed to verify fish use.

Stream buffers within or adjacent to harvest unit boundaries will be managed according to *Forest Management Plan* Riparian Strategies. The riparian areas will be reviewed during sale layout for current stand conditions and/or operational constraints for implementing FMP strategies.

In order to protect water quality during active operations, a variety of methods will be used to prevent sediment from entering live streams. These methods include (but are not limited to) maintaining culverts and other road drainage structures, using sediment control devices in road ditches when necessary, and monitoring logging and hauling operations. Culvert installation and replacement in live streams will be conducted between July 1 and September 15. Operations outside of this period will be reviewed with ODFW.

VIII. T&E SPECIES CONSIDERATIONS:

The sale area has been reviewed with the ODF Northwest Oregon Area Biologist. Surveys for marbled murrelets are not required for East Wood due to the absence of potentially suitable habitat.

It was determined that in the sale area there is potential northern spotted owl habitat within or adjacent to the sale boundary. Surveys will be conducted during the 2004 and 2005 survey season for northern spotted owl. All northern spotted owl surveys were and will be conducted in accordance with USFWS endorsed protocol.

T & E Plant species: The sale areas were checked against the Oregon Natural Heritage Program (ONHP) database of known threatened or endangered listed plant locations as well as local records in the Land Management Classification System (LMCS). No listed plants were identified within or adjacent to the sale areas.

IX. SLOPE STABILITY AND GEOTECHNICAL ISSUES:

There are only a few very small portions of the harvest unit that are steep slopes. Part of East Wood might be an ancient large-scale slump earthflow landslide

feature based on topographic shape only. Ancient landslide features of this type are typically not affected by timber harvest operations. The initial assessment by the geotechnical specialists is low. The geotechnical specialists may be consulted if concerns arise during sale layout.

X. RECREATION RESOURCES:

The sale area is designated as Non-Motorized in the *Tillamook State Forest Comprehensive Recreation Plan* (1993). This sale has been reviewed by the District Recreation Coordinator. No designated trails are planned for this area. Recreational use common to this area includes hunting and horseback riding.

XI. CULTURAL RESOURCES:

The *Tillamook State Cultural Assessment* does not list any cultural sites within or adjacent to the proposed sale boundary.

XII. SCENIC RESOURCES:

The sale area has a visual classification of Level 3, low sensitivity. No scenic impact is expected.

XIII. OTHER RESOURCE CONSIDERATIONS:

None known.

XIV. LAND MANAGEMENT CLASSIFICATION SUMMARY:

Table 6. Land Management Classification Summary

Area	LMCS Subclass	Focused Stewardship	Special Stewardship
1	Aquatic and Riparian	17	7

This table summarizes the acres of Focused and Special Stewardship within the operations. The acres in each operational area in this table do not necessarily add up to its gross or net acres, because of overlapping classifications under the Land Management Classification System (Feb. 2003). For example, a particular acre can be classified as Focused Stewardship for Aquatic and Riparian, Recreation, and Scenic resources.