P R O S P E C T U S

DxP SCALED SALE

SBA SET ASIDE

GRANTS PASS RESOURCE AREA
JOSEPHINE MASTER UNIT

Medford Sale # ORM07-TS14-11
July 24, 2014 (SQF)

#1. Burnt Rattler Salvage,
Douglas & Josephine Counties, O&C and P.D.

BID DEPOSIT REQUIRED: $79,700.00

All timber designated for cutting in SE¼SW¼, NE¼SE¼, S½SE¼ Section 9; W½SW¼ Section 10, NW¼, SW¼ Section 11; Lot 5, Lot 6, Lot 11, Lot 12, Lot 14, Lot 15 Section 13; S½NE¼ Section 14; NE¼, NW¼, E½SW¼, W½SE¼, SE¼SE¼ Section 15; NE¼, NW¼, N½SW¼, NE¼SE¼, S½SE¼ Section 23; NW¼NW¼, W½SE¼ Section 25; NE¼NE¼ Section 26; S½NE¼, N½SE¼ Section 27, T. 33 S., R. 7 W., Willamette Meridian.

Approx. Number Merch. Trees	Est. Volume MBF 32' Log	Species	Est. Volume MBF 16' Log	Appr. Price Per MBF*	Est. Volume Times Appraised Price
19,056	6,007	Douglas-fir	7,444	$102.60	$763,754.40
1,070	921	Sugar Pine	1,117	$17.10	$19,100.70
598	751	Ponderosa Pine	901	$15.10	$13,605.10
2	1	Incense cedar	1	$104.20	$104.20
20,726	7,680	**Totals**	9,463		$796,564.40

*Stumpage values have been determined by market value estimates and analytical appraisal methods were used to compute the appraised price. Additional information concerning the appraised price is available at the Medford District Office.

**This is an SBA Set-Aside timber sale. Bidding is limited to small business concerns as defined by the Small Business Act, §3, 72 Stat. 384, 15 U.S. Code 632, and the regulations of the Small Business Administration, Title 13, Code of Federal Regulations, Part 121, as amended.

TIMBER AUCTION LOCATION – The timber auction will be held at the Grants Pass Inter-agency Office, located at 2164 NE Spalding Ave., Grants Pass, Oregon, at 9 a.m. on Thursday, July 24, 2014.

CRUISE INFORMATION – The timber has been cruised using the PCMTRE sampling method to select sample trees. The sample trees have been cruised with the aid of a Relaskope and their volume expanded to a total sale volume. Maps showing the location and description of these sample trees are available at the Grants Pass Interagency Office.

The timber volumes for the blue marked trees along road 33-7-11.0 were based on a 100% cruise using form class tables for estimating board foot volume of trees in 16-foot logs.

All 9,463 mbf of the sale volume is salvage material. With respect to merchantable trees of all conifer species: the average tree is 22.7 inches DBHOB; the average gross merchantable log contains 154 bd. ft.; the total gross volume is approximately 13,837 M bd. ft; and 68% recovery is expected. (Average DF is 21.9 inches DBHOB; average gross merchantable log DF contains 137 bd. ft.)

Bidders will be restricted to bidding on a unit (MBF) rate of the Douglas-fir volume. All other species will be sold at appraised price per unit (MBF). The minimum bid increment will be $0.10 per MBF.

LOG EXPORT AND SUBSTITUTION RESTRICTIONS - All timber sold to the Purchaser under the terms of the contract, except exempted species, is restricted from export under the United States in the form of unprocessed timber and is prohibited from use as a substitute for exported private timber.

The BLM has revised the log export restrictions special provision to reduce the log branding and painting requirements. The new requirements include branding of one end of all logs with a scaling diameter of over 10 inches. All loads of 11 logs or more, regardless of the diameter of the logs, will have a minimum of 10 logs branded on one end. All logs will be branded on loads of 10 logs or less. One end of all branded logs will be marked with yellow paint. At the discretion of the Contracting Officer, the Purchaser may be required to brand and paint all logs. The Purchaser shall bear any increased costs for log branding and painting.

CUTTING AREA – Thirty two (32) units containing three hundred eighty three (383) acres must be clear cut, and one (1) unit containing six (6) acres must be partial cut. This includes six (6) right-of-ways.

CUTTING TIME - Contract duration will be twenty four (24) months for cutting and removal of timber.

ACCESS - Access to the sale area is available via State and County public roads, an existing BLM road system, and a segment of road falling under the Right-of-Way and Road Use Agreement M-887B with Plum Creek Timberlands, LP. Among other conditions, this agreement requires road maintenance to be performed by the Purchaser on roads listed in Exhibits C & D used for timber haul, **a performance bond of $10,000** per the Right-of-Way and Road Use Agreement M-887B with Plum Creek Timberlands, LP, as well as the completion and execution of two License Agreements between (1) the Purchaser and Plum Creek Timberlands, LP and (2) the Purchaser and Josephine County Forestry Department.

ROAD MAINTENANCE - The Purchaser will be required to maintain all of the spurs and temporary routes which he constructs plus 10.89 miles of existing BLM & Industry controlled roads. The BLM will maintain 7.67 miles of the existing roads. The Purchaser will be required to pay a maintenance and rockwear fee of $1.25 per MBF per mile for the use of the BLM maintained roads *(estimated amount of $47,034.19).* The Purchaser will also be required to pay a rockwear fee of $0.49 per MBF per mile for the use of the Purchaser maintained roads *(estimated amount of $6,749.95)*.

ROAD CONSTRUCTION - The contract will require the Purchaser to construct 40.7 stations/0.77 miles of new temporary route. Additional information is available in the timber sale prospectus.

SOIL DAMAGE PREVENTION – Pursuant to Section 26 of Form 5450-4, Timber Sale Contract, the Purchaser shall not conduct mechanical ground-based harvesting, ground-based yarding, skid trail and landing rehabilitation, temporary route construction, temporary route reconstruction, or temporary route decommissioning in all harvest units, or skyline based yarding with one-end suspension in harvest units 9-5, 10-1, 11-2 (west of Rx change line), 13-2, 13-4, 13-4A, 13-6, 14-2, 15-1A, 15-1B, 23-1A south, 23-2A north, 23-2B, 23-2C, 23-3B, 23-4A, 23-7, 23-10C south, 25-2A, and 27-B between October 15 of one calendar year and May 15 of the following calendar year both days inclusive. Purchaser may request in writing, a conditional waiver of this restriction. If wetting winter rains have not occurred; the weather forecast is monitored daily; all winterization actions can reasonably occur prior to the season ending storm event; soil moisture conditions are dry, as determined by the inability of a soil sample taken at four (4) to six (6) inches to maintain form when compressed and by the inability of soil moisture at the surface to be

readily displaced, causing ribbons and ruts along equipment tracks, then the Contracting Officer may approve a conditional waiver. If impacts to soil resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

Pursuant to Section 26 of Form 5450-4, Timber Sale Contract, the Purchaser shall not conduct any haul on natural surface and rocked roads on the Contract Area between October 15 of one calendar year and May 15 of the following calendar year, both days inclusive. Purchaser may request in writing, a conditional waiver of this restriction. If the Authorized Officer determines that hauling would not result in road damage or the transport of sediment to nearby stream channels based on soil moisture conditions or rain events, the Contracting Officer may approve a conditional waiver for hauling. If soil moisture conditions or rain events are anticipated to cause impacts to roads or stream water quality resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

EQUIPMENT REQUIREMENTS – A shovel or track mounted hydraulic excavator with a hydraulic thumb or rotating controllable grapple head equipped with an arm capable of reaching twenty (20) feet and Oregon OSHA-approved rollover protection (required for Unit 15-2A only). A yarding tractor not greater than 9 feet wide as measured from the outer edges of standard width shoes and equipped with an integral arch and a winch for lining logs seventy-five (75) feet. A skyline yarder capable of one-end suspension with a minimum lateral yarding capability of seventy-five (75) feet while maintaining a fixed position during inhaul; capable of multi-span; and capable of an external yarding distance of one thousand five hundred (1,500) feet slope distance. A yoder capable of one-end suspension with a minimum lateral yarding capability of seventy five (75) feet while maintaining a fixed position during inhaul (required for Unit 23-2B only). A helicopter equipped with a dropline with a minimum length of one hundred fifty (150) feet.

SLASH DISPOSAL - Slash disposal within the harvest units will consist of a combination of lop and scatter, yum yarding hardwoods, machine pile and cover machine piles, machine pile burn, hand pile and cover hand piles, hand pile burn, cover and burn landing decks, and chip landing decks as described in SD-5 of the Special Provisions. Hand pile and/or machine pile and cover slash located in harvest units within one hundred (100) feet of roads where it coincides with a harvest unit boundary. Lop and scatter the rest of the area within units. A post logging assessment shall be conducted to determine final slash treatment needs in all units. The initial appraisal prescribed three hundred nine (309) acres of lop and scatter, eighty five (85) acres of yum yarding hardwoods, fifty (50) acres of hand pile and cover hand piles, fifty (50) acres of hand pile burn and mop up, twenty six (26) acres of machine pile and cover piles, twenty six (26) acres of machine pile burn and mop up, forty four (44) acres of cover and burn landing piles, and two (2) acres of chipping landing piles.

CONTRACT TERMINATION - A Special Provision has been added to the contract which enables the Contracting Officer to suspend the contract to facilitate protection of certain plant or animal species, and/or to modify or terminate the contract when necessary to comply with the Endangered Species Act, or comply with a court order. This contract provision limits the liability of the Government to the actual costs incurred by the Purchaser which have not been amortized by timber removed from the contract area.

PERFORMANCE BOND - A performance bond in the amount of 20% of the total purchase price will be required.

OTHER -

1. No extension of time beyond the normal 30 days will be granted for completing bonding and contract signing requirements.

2. In cable and ground based yard units, all trees designated for cutting shall be whole tree yarded or yarded with tops attached unless tops are needed in contour felling areas or are needed to meet coarse woody debris (CWD) requirements as determined by the

Authorized Officer.

3. All leave trees will be selected by the Purchaser through Designation by Prescription (DxP) criteria as outlined in Exhibit E, except for roadway hazard trees along BLM road 33-7-11.0 which will be blue marked (for cut tree removal) by the BLM.

4. In ground based yard units, the Purchaser may use a mechanical harvester, feller-processor, or feller buncher with approval of the Authorized Officer. The machine must have a boom with a lateral reach of at least twenty (20) feet. See Special Provision L-7 for more details.

5. In harvest units 9-4, 11-2, 15-1A, 23-2A north, and 25-1A on approximately eighty five (85) acres all hardwood trees between eight (8) inches diameter and sixteen (16) inches diameter at the large end exceeding six (6) feet in length shall be yarded and decked at the location shown on Exhibit S.

6. In harvest units 10-1, 11-2, 13-2, 13-4, 13-4A, 15-1A, 15-4B, 23-2A, 23-2B, 23-3A, 23-4B, and 25-2A as shown on Exhibit A, all trees needed to meet Contour Felling Exhibit F and not reserved shall be felled parallel to the contour of the slope unless waived by the Authorized Officer. See Special Provision L-15 and Exhibit F for more details.

7. No harvest operations within units 9-4, 9-5, 9-9, 15-1A, 15-4C, and 23-6B shall be conducted between March 1 and June 30 of the same calendar year, both days inclusive. This restriction shall not apply if it can be shown from northern spotted owl protocol surveys conducted by the BLM in accordance with accepted standards that owl nesting and/or fledging activities are not occurring during the year and/or time of harvest. See Special Provisions L-18a and E-6 for more details.

8. No harvest operations within harvest units 9-4, 9-9, 23-1A north, 23-2A south and portion of 11-2 (east of Rx change line) between October 15 of one calendar year and May 15 of the following calendar year both days inclusive for **talus soil restrictions**. Purchaser may request in writing, a conditional waiver of this restriction. If wetting winter rains have not occurred; the weather forecast is monitored daily; soil moisture conditions are dry, as determined by the inability of a soil sample taken at four (4) to six (6) inches to maintain form when compressed and by the inability of soil moisture at the surface to be readily displaced, causing ribbons and ruts along equipment tracks, then the Contracting Officer may approve a conditional waiver.

9. The use of the helicopter landing on the 33-7-13.7 road in T.33S, R.7W, Sec. 24 on Josephine County land and cable corridors that cross Josephine County land in T.33S, R.7W, Sec. 24 for unit 23-7 shall comply with the terms and conditions given in the crossing plat and Right-of-Way and Road Use Agreement M-1538 with Josephine County Forestry Department.

10. Be aware that there are Wolf Pup timber sale units adjacent to Burnt Rattler units and within the Burnt Rattler sale area. The Wolf Pup timber sale is already sold and currently under contract.

11. The purchase of this salvage timber entitles the Purchaser to volume-for-volume and contract term-for-contract term extensions without reappraisal of qualifying Federal Timber Sale contracts for green timber held by the Purchaser.

NARRATIVE DESCRIPTION OF HOW TO GET TO THE TIMBER SALE AREA –
To access harvest units 9-4, 9-5, 9-9, 10-1, 11-2, 13-2, 13-4, 13-4A, 13-6, 14-2, 15-1A, 15-1B, 15-2A, 15-4A, 15-4B, 15-4C, 23-1A, 23-2A, 23-2B, 23-2C, 23-3A, 23-3B, 23-4A, 23-4B, 23-7, and 23-10C and roadside hazard trees along BLM Rd# 33-7-11.0: From Interstate 5, take exit 80

toward Glendale. Turn left onto Glendale Valley Rd. Continue onto Sether Ave. Sether Ave. turns slightly left and becomes Gilbert Ave. Turn left onto Molly St. Turn right onto Pacific Ave. Pacific Ave. becomes Mt. Rueben Rd. Continue on Mt. Rueben Rd. for about 4 miles, and then turn left onto Rattlesnake Creek Rd. (BLM Rd. # 33-7-2.1) which becomes Upper Rattlesnake Rd. (BLM Rd. # 33-7-13.0) to reach Rattlesnake Ridge and access units.

To access harvest units 23-6A, 23-6B, and 27-B: From Interstate 5, take exit 71 toward Sunny Valley. Turn right onto Lariat Dr. Turn left onto Leland Rd. Turn right onto Lower Grave Creek Rd. Cross the bridge and turn left to stay on Lower Grave Creek Rd. Turn right onto Fall Creek Rd. (BLM Rd. # 33-7-36.0). Stay left onto Upper Falls Creek Rd (BLM Rd. # 33-7-35.0). Continue on BLM Rd. # 33-7-35.0 to access unit 27-B or take a left onto Dry Poorman Rd. (BLM Rd. # 33-7-35.1).

To access harvest units 25-1A and 25-2A: From Interstate 5, take exit 71 toward Sunny Valley. Turn right onto Lariat Dr. Turn left onto Leland Rd. Turn right onto Lower Grave Creek Rd. Cross the bridge and turn right onto Lower Wolf Creek Rd. Turn left onto Sugar Hook Rd. (BLM Rd. # 33-7-36.1).

ENVIRONMENTAL ASSESSMENT - An environmental assessment DOI-BLM-OR-M070-2014-006-EA was prepared for this sale, and a Finding of No Significant Impact has been documented. This document is available for inspection as background for this sale at the Medford District Office.

THIS IS A SALE PROSPECTUS ONLY. THESE ARE THE SPECIAL PROVISIONS AS THEY WILL BE WRITTEN IN THE CONTRACT. ATTACHMENTS MAY NOT INCLUDE ALL EXHIBITS REFERRED TO IN THE CONTRACT PROVISIONS. THE COMPLETE CONTRACT, INCLUDING ALL EXHIBITS, IS AVAILABLE FOR INSPECTION AT THE MEDFORD DISTRICT OFFICE.

Section. 41. Timber Reserved from Cutting -The following timber on this contract area is hereby reserved from cutting and removal under the terms of this contract and is retained as the property of Government:

(A) AR-1 All timber on the Reserve Areas as shown on Exhibit A and all trees marked with a combination of orange paint, orange flagging, and/or posters which are on or mark the boundaries of the Reserve Areas.

(B) IR-2 All timber except approximately four hundred fifty two (452) Douglas-fir trees, two (2) incense-cedar trees, ten (10) ponderosa pine trees, and eight (8) sugar pine trees marked for cutting heretofore by the Government with blue paint above and below stump height along BLM road 33-7-11.0, as shown on Exhibit A.

(C) IR-6 All leave trees required to meet the Selection Criteria as outlined in Exhibit E, in harvest units as shown on Exhibit A. If leave trees must be felled for safety, they shall be left on-site if retention would not cause safety hazards.

(D) IR-6 All pre-existing dead and down wood required to meet the Selection Criteria as outlined in Exhibit E, in harvest units as shown on Exhibit A.

Section 42.

(A) Log Exports

(1) LE-1 All timber sold to the Purchaser under the terms of the contract, except exempted species, is restricted from export from the United States in the form of unprocessed timber, and is prohibited from being used as a substitute for exported private timber. For the purpose of this contract, unprocessed timber is defined as: (1) any logs, except those of utility grade or below, such as sawlogs, peeler logs; and pulp logs; (2) cants or squares to be subsequently remanufactured exceeding eight and three-quarters (8-3/4) inches in thickness; (3) split or round bolts or other roundwood not processed to standards or specifications suitable for end product uses; or (4) western red cedar lumber which does not meet lumber of American Standards Grades of Number 3 dimension or better, or Pacific Lumber Inspection Bureau R-List Grades of Number 3 Common or better. Thus, timber manufactured into the following will be considered processed: (1) lumber and construction timbers regardless of size, manufactured to standards and specifications suitable for end-product uses; (2) chips, pulp, and pulp products; (3) green or dry veneer and plywood; (4) poles and piling cut or treated for use as such; (5) cants, squares, and lumber cut for remanufacturing of eight and three quarters (8-3/4) inches in thickness or less; or (6) shakes and shingles.

Substitution will be determined under the definition found in 43 CFR 5400.0-5(n).

The Purchaser is required to maintain and upon request to furnish the following information:

1. Date of last export sale.

2. Volume of timber contained in last export sale.

3. Volume of timber exported in the past twelve (12) months from the date of last export sale.

4. Volume of Federal timber purchased in the past twelve (12) months from the date of last export sale.

5. Volume of timber exported in succeeding twelve (12) months from date of last export sale.

6. Volume of Federal timber purchased in succeeding twelve (12) months from date of last export sale.

In the event the Purchaser elects to sell any or all of the timber sold under this contract in the form of unprocessed timber, the Purchaser shall require each party buying, exchanging, or receiving such timber to execute a "Certificate as to Non-

substitution and the Domestic Processing of Timber." The original of such certificate shall be filed with the Authorized Officer. Additionally, when the other party is an affiliate of the Purchaser, the Purchaser will be required to update information under item (2) of Form 5450-17 (Export Determination) and file the form with the Authorized Officer.

In the event an affiliate of the Purchaser has exported private timber within twelve (12) months prior to purchasing or otherwise acquiring Federal timber sold under this contract, the Purchaser shall, upon request, obtain from the affiliate information in the form specified by the Authorized Officer and furnish the information to the Authorized Officer.

Prior to the termination of this contract, the Purchaser shall submit to the Authorized Officer Form 5460-15 (Log Scale and Disposition of Timber Removed Report), which shall be executed by the Purchaser. In addition, the Purchaser is required under the terms of this contract to retain for a three-year period from the date of termination of the contract the records of all sales or transfer of logs involving timber from the sale for inspection and use of the Bureau of Land Management.

Unless otherwise authorized in writing by the Contracting Officer, the Purchaser shall brand clearly and legibly one end of all logs with a scaling diameter (small end inside bark) of over ten (10) inches, prior to the removal of timber from the contract area. All loads of eleven (11) logs or more will have a minimum of ten (10) logs clearly and legibly branded on one end regardless of the diameter of the logs. All logs will be branded on loads of ten (10) logs or less. One end of all branded logs to be processed domestically will be marked with a three (3) square inch spot of highway yellow paint. The Purchaser will stop trucks for accountability monitoring at mutually agreed upon locations when notified by the Authorized Officer.

If multiple trailers (mule trains) are used, each bunked load shall be considered an individual load, and these guidelines will apply to each bunked load. If a flatbed stake trailer is used, each bundle will be treated as a separate load.

At the discretion of the Contracting Officer, the Purchaser may be required to brand and paint all logs. Any increased costs for log branding and painting shall be the responsibility of the Purchaser.

In the event of the Purchaser's noncompliance with this subsection of the contract, the Authorized Officer may take appropriate action as set forth in Section 10 of this contract. In addition, the Purchaser may be declared ineligible to receive future awards of Government timber for a period of one year.

(B) Logging

(1) L-1 Before beginning operations on the contract area for the first time or after a shutdown of seven (7) or more days, the Purchaser shall notify the Authorized Officer in writing of the date they plan to begin operations. This written notification must be received by the Authorized Officer no less than seven (7) days prior to the date the Purchaser plans to begin or resume operations. The Purchaser shall also notify the Authorized Officer in writing if they intend to cease operations for any period of (7) or more days.

(2) L-3 All trees designated for cutting in salvage harvest units shall be cut so that the resulting stumps shall not be higher than twelve (12) inches measured from the ground on the uphill side of the trees.

(3) L-4 All conifer trees eight (8) inches or larger D.B.H.O.B. and not reserved in Section 41 nor in Exhibit E shall be felled in all salvage harvest units as shown on Exhibit A.

(4) L-4 All live and dead standing hardwood trees and brush greater than twelve (12) inches in height and less than six (6) inches D.B.H.O.B. shall be felled in all harvest units as shown on Exhibit A.

(5) L-6 In cable and ground based yard harvest units as shown on Exhibit A, all trees designated for cutting shall be felled and whole tree yarded or yarded with tops attached except when excessive stand damage occurs; except when tops are needed to meet contour felling requirements; or except when tops are needed to meet coarse woody debris (CWD) requirements as determined by the Authorized Officer. If excessive stand damage occurs, all trees shall be bucked into log lengths prior to being yarded.

(6) L-7 In the cable yarding areas of harvest units as shown on Exhibit A, all trees designated for cutting shall be manually felled. Ground-based yarding portions of harvest units as shown on Exhibit A may be felled mechanically using a harvester, feller-processor, or feller-buncher with the approval of the Authorized Officer and in accordance with the following specifications:

(a) Mechanized felling operations shall be limited to slopes of thirty-five (35) percent or less.

(b) Mechanized felling operations are subject to seasonal operating restrictions as described in Section 42(B)(11) of this contract.

(c) The harvester, feller-processor, or feller-buncher shall be approved by the Authorized Officer prior to the start of mechanized felling operations. Only purpose built carriers with boom-mounted felling heads may be approved. The boom must have a lateral reach of twenty (20) feet or

more, and the machine's lateral reach must be utilized as much as possible. The purpose-built carrier may be of the articulated, rubber-tired design, or the zero-clearance tail swing leveling track-mounted design.

(d) The harvest equipment shall walk on existing or created slash as directed by the Authorized Officer.

(7) L-7MC Yarding on the areas designated herein and shown on Exhibit A shall be done in accordance with the yarding requirements or limitations for the designated area.

Designated Area	Yarding Requirements or Limitations
ROADSIDE HAZARD TREES BLUE-MARKED FOR CUT Unit RD 11 (BLM Road 33-7-11.0)	The Purchaser shall not skid logs on any road, from ditchline to outside shoulder of road, unless approved by the Authorized Officer. Care shall be taken to avoid damaging roads during operations. Any road damage shall be repaired by the Purchaser to the satisfaction of the Authorized Officer. Log decks shall only be allowed on the fill slope. Log decks will not be permitted in the ditchline, nor the cutslope, unless approved by the Authorized Officer. Landing size shall not exceed one-quarter (¼) acre, shall be located along existing roads and/or temporary routes, and shall be approved by the Authorized Officer. No landing creation or expansion shall occur without prior approval from the Authorized Officer. Design landings with adequate drainage. Conifer tops and limbs, hardwoods, brush, and other cut vegetation created from the roadway clearing treatment shall be lopped and scattered and treated concurrently with felling operations. All logging debris shall be removed from roads and ditches upon completion of yarding operations. All mechanized equipment shall only operate on existing road surfaces.

Designated Area	Yarding Requirements or Limitations
SHOVEL YARD UNIT: 15-2A	Yarding shall be done with a shovel or track mounted hydraulic excavator. The excavator shall be equipped with a hydraulic thumb or a rotating controllable grapple head, have an arm capable of extending at least twenty

	(20) feet, and have rollover protection as required by Oregon OSHA. Shovel shall operate on ground less than thirty-five (35) percent slope and utilize the reach of the arm as much as possible to reduce compaction. Shovel shall not turn on knoll area. Landing size shall not exceed one-quarter (¼) acre, shall be located along existing roads and/or temporary routes within unit boundaries, and shall be approved by the Authorized Officer. Expansion of existing landings within the Riparian Reserve shall not be permitted. Design landings with adequate drainage so that they are not hydrologically connected to the ditchline of roads. DO NOT rip or scarify shovel operating trails or landings. Directional falling to lead and away from streams, reserve trees and snags, resource concern buffers, and unit boundaries will be required. Do not yard cull material greater than sixteen (16) inches diameter at the large end and sixteen (16) feet in length and greater to landings.

Designated Area	Yarding Requirements or Limitations
GROUND BASED YARD UNITS: 9-5, 10-1, 13-2, 15-1A, 23-1A, 23-4A, 23-7, 25-1A	Yarding tractor width shall not be greater than nine (9) feet track width and shall be equipped with an integral arch. Skid roads shall not exceed a width of twelve (12) feet on average per unit. Prior to applying the Selection Criteria outlined in Exhibit E and/or falling any timber in the unit, all new skid roads shall be pre-designated by the Purchaser and approved by the Authorized Officer. Yarding tractors shall operate only on tractor skid roads approved by the Authorized Officer. Existing Skid roads shall be used when possible. New skid roads shall be placed at least one hundred fifty (150) feet apart where topography will allow. New skid roads must be located on ground less than thirty-five (35) percent slope. Upon completion of harvest, utilized skid

	trails would be rehabilitated. Yarding tractors will be equipped with integral arches and winch systems capable of lining logs at least seventy five (75) feet. Landing size shall not exceed one-quarter (¼) acre, shall be located along existing roads and/or temporary routes within unit boundaries, and shall be approved by the Authorized Officer. Expansion of existing landings within the Riparian Reserve shall not be permitted. Design landings with adequate drainage so that they are not hydrologically connected to the ditchline of roads. In Units 15-1A and 23-4A, DO NOT rip or scarify skid trails or landings. Directional falling to lead and away from streams, reserve trees and snags, resource concern buffers, and unit boundaries will be required. The use of blades while tractor yarding will be limited, equipment shall walk over as much ground litter as possible. Delivered log lengths shall not exceed forty one (41) feet. Do not yard cull material greater than sixteen (16) inches diameter at the large end and sixteen (16) feet in length and greater to landings.

Designated Area	Yarding Requirements or Limitations
CABLE UNITS: 9-4, 9-5, 9-9, 10-1, 11-2, 13-2, 13-4, 13-4A, 13-6, 14-2, 15-1A, 15-1B, 23-1A, 23-2A, 23-2B, 23-2C, 23-3B, 23-4A, 23-7, 25-2A, 27-B	Yarding shall be done with a standing skyline-type cable yarding system which will suspend one end of the log clear of the ground during inhaul on the yarding corridor. The skyline-type system shall be equipped with a clamping, energized or mechanical slackpulling carriage capable or yarding fifteen hundred (1,500) feet slope distance from the landing and has a minimum lateral yarding capability of seventy-five (75) feet. The carriage shall be capable of maintaining a fixed position on the skyline during lateral yarding and shall be able to pass intermediate support jacks as required. The rigging of tail or lift trees, intermediate supports, and use of tailholds

	outside the units shall be required where necessary to meet this requirement. Yarding corridors shall be perpendicular to the contours unless approved by the Authorized Officer. Prior to applying the Selection Criteria outlined in Exhibit E and/or falling any timber in the unit, all yarding corridors, tail/lift trees, and/or intermediate support trees shall be pre-designated by the Purchaser and approved by the Authorized Officer. Directional falling to lead and away from streams, reserve trees and snags, resource concern buffers, and unit boundaries will be required. Existing cable corridors shall be used whenever possible. Yarding corridors shall be approximately one hundred fifty (150) feet apart, measured at the tailholds. Yarding corridor widths shall not exceed six (6) feet either side of the skyline centerline. Landing size shall not exceed one-quarter (¼) acre, shall be located along existing roads, swing trails, and/or temporary routes within unit boundaries, and shall be approved by the Authorized Officer. Expansion of existing landings within the Riparian Reserve shall not be permitted. Design landings with adequate drainage so that they are not hydrologically connected to the ditchline of roads. In Unit 23-2B, yarding shall be done with a yoder unless waived by the Authorized Officer. In Units 10-1 (SW portion of unit), 15-1A, 23-2A, 23-2B, 23-2C, and 23-4A DO NOT rip or scarify landings. All yarding corridors will be water-barred and will be covered with slash prior to seasonal winter rains. Do not yard cull material greater than sixteen (16) inches diameter at the large end and sixteen (16) feet in length and greater to landings.

Designated Area	Yarding Requirements or Limitations
HELICOPTER UNITS 15-1A, 15-1B, 15-4A, 15-4B, 15-4C, 23-3A, 23-4B, 23-6A, 23-6B, 23-10C	All yarding will be done with an aerial system. Log landing size shall not exceed one (1) acre and all landings shall be approved by the Authorized Officer prior to construction. Expansion of existing landings within the Riparian Reserve shall not be permitted. Design landings with adequate drainage so that they are not hydrologically connected to the ditchline of roads. Service pad and helispot construction cannot occur without prior approval of the Contract Administrator and shall not be larger than necessary. A dropline with a minimum length of one hundred fifty (150) feet is required. Logs to be yarded will be lifted vertically to a height above the adjacent leave trees without horizontal movement. All multiple log turns will be vertically lifted from a small enough radius to result in minimal damage to the residual forest stand as determined by the Authorized Officer. In units 15-1A and 15-1B the logging systems change lines between cable yard and helicopter yard are posted with blue posters as shown on Exhibit A.

(8) L-11 No new landing shall be located within two hundred (200) feet of streams as shown on Exhibit A.

(9) L-12 Helicopter landings shall be placed at the approximate locations as shown on Exhibit A, unless an alternate landing site is approved by the Authorized Officer.

(10) L-15 In harvest units 10-1, 11-2, 13-2, 13-4, 13-4A, 15-1A, 15-4B, 23-2A, 23-2B, 23-3A, 23-4B, and 25-2A as shown on Exhibit A, all trees needed to meet Contour Felling Exhibit F except those reserved, shall be felled parallel to the contour of the slope and prior to falling trees on the adjacent slope in locations as shown on Exhibit F above specified roads and riparian reserves. If the Authorized Officer determines that the adjacent area has sufficient ground cover vegetation present to effectively trap sediment this requirement shall be waived.

(11) L-18 No mechanical ground-based harvesting or ground-based yarding shall be conducted in the contract area between October 15 of one calendar year and May 15 of the following calendar year both days inclusive. Purchaser may request in

writing, a conditional waiver of this restriction. If wetting winter rains have not occurred; the weather forecast is monitored daily; all winterization actions can reasonably occur prior to the season ending storm event; the soil moisture conditions are dry, as determined by the inability of a soil sample taken at four (4) to six (6) inches to maintain form when compressed and by the inability of soil moisture at the surface to be readily displaced, causing ribbons and ruts along equipment tracks, then the Contracting Officer may approve a conditional waiver. If impacts to soil resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

(12) L-18 No tree felling or yarding shall be conducted in harvest units 13-4, 13-4A and portions of units 11-2 (east of Rx change line flagged in white), and 23-10C south as shown on Exhibit A between October 15 of one calendar year and May 15 of the following calendar year both days inclusive. Purchaser may request in writing, a conditional waiver of this restriction on **talus soil areas**. If wetting winter rains have not occurred; the weather forecast is monitored daily; the soil moisture conditions are dry, as determined by the inability of a soil sample taken at four (4) to six (6) inches to maintain form when compressed and by the inability of soil moisture at the surface to be readily displaced, causing ribbons and ruts along equipment tracks, then the Contracting Officer may approve a conditional waiver. If impacts to soil resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

(13) L-18 No one-end suspension cable yarding shall be conducted on **slopes greater than seventy (70) percent** in harvest units 9-4, 9-9 and portions of harvest units 11-2 (east of Rx change line), 23-1A north, and 23-2A south as shown on Exhibit A between October 15 of one calendar year and May 15 of the following calendar year both days inclusive. Purchaser may request in writing, a conditional waiver of this restriction. If yarding can be accomplished using full suspension, then the Contracting Officer may approve a conditional waiver. If impacts to wet soil resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

(14) L-18 No one-end suspension cable yarding shall be conducted in harvest units 9-5, 10-1, 13-2, 13-6, 14-2, 15-1A, 15-1B, 23-2B, 23-2C, 23-3B, 23-4A, 23-7, 25-2A, 27-B and portions of harvest units 9-4 (part of unit north of Rx change line), 11-2 (part of unit west of Rx change line), 23-1A south, and 23-2A north as shown on Exhibit A between October 15 of one calendar year and May 15 of the following calendar year both days inclusive. Purchaser may request in writing, a conditional waiver of this restriction. If yarding can be accomplished using full suspension or wetting winter rains have not occurred; the weather forecast is monitored daily; all winterization actions can reasonably occur prior to the season ending storm event; the soil moisture conditions are dry, as determined by the inability of a soil sample taken at four (4) to six (6) inches to maintain form when compressed and by the inability of soil moisture at the surface to be readily

displaced, causing ribbons and ruts along equipment tracks, then the Contracting Officer may approve a conditional waiver. If impacts to soil resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

(15) L-18 No roadside hazard tree operations, landing construction, skid trail and landing rehabilitation, temporary route construction, temporary route reconstruction, or temporary route decommissioning shall be conducted in the contract area between October 15 of one calendar year and May 15 of the following calendar year, both days inclusive. Purchaser may request in writing, a conditional waiver of this restriction. If wetting winter rains have not occurred; the weather forecast is monitored daily; all winterization actions can reasonably occur prior to the season ending storm event; moisture conditions on the road are deemed acceptable and do not result in continuous mud splash or tire slide, fines being pumped through road surfacing from the subgrade, road drainage causing a visible increase in stream turbidities, surface rutting, surface ribboning, or any condition that would result in water being chronically routed into tire tracks or away from designed road drainage during precipitation events, then the Contracting Officer may approve a conditional waiver. If moisture conditions on the road resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

(16) L-18 No log loading or haul on neither natural surface nor rocked roads shall be conducted on the Contract Area between October 15 of one calendar year and May 15 of the following calendar year, both days inclusive. Purchaser may request in writing, a conditional waiver of this restriction. If the Authorized Officer determines that hauling would not result in road damage or the transport of sediment to nearby stream channels based on soil moisture conditions or rain events, Contracting Officer may approve a conditional waiver for hauling. If soil moisture conditions or rain events are anticipated to cause impacts to roads or stream water quality resulting from said conditional waiver are not acceptable as determined by the Authorized Officer, the waiver will be revoked.

(17) L-18a No harvest operations within units 9-4, 9-5, 9-9, 15-1A, 15-4C, and 23-6B shall be conducted between March 1 and June 30 of the same calendar year, both days inclusive. This restriction will not apply if it can be shown from northern spotted owl protocol surveys conducted by the Bureau of Land Management in accordance with accepted standards that northern spotted owl nesting and/or fledging activities are not occurring during the year and/or time of harvest.

(18) L-20 During logging operations, the Purchaser shall keep the 33-7-13.5, 33-7-13.6, and 33-7-13.7 roads, where they pass through the contract area, clear of trees, rock, dirt, and other debris so far as it is practicable. The roads shall not be blocked by such operations for more than thirty (30) minutes.

(19) L-21 The Purchaser shall provide two (2) flagmen to control traffic on the 33-7-11.0 road where it passes through roadside blue-marked hazard tree areas whenever tree felling operations are in progress in this area.

(20) L-24 Prior to the commencement of operations the Purchaser shall obtain from the Authorized Officer written approval of a written operations and logging plan commensurate with the terms and conditions of the contract which shall include measures needed to assure protection of the environment and watershed. A pre-work conference between the Purchaser's authorized representative and the Authorized Officer's representative must be held at a location designated by the Authorized Officer before the logging plan will be approved.

(21) L-25 Before cutting and removing any trees necessary to facilitate logging in the Units shown on Exhibit A, the Purchaser shall identify the location of the skid roads, cable yarding roads, and tailhold, tieback, guyline, lift, intermediate support, and danger trees on the ground in a manner approved by the Authorized Officer at the pre-work conference and documented in the Logging Plan. Said Purchaser identification of trees to be cut and removed does not constitute authority to proceed with cutting and removal. In addition, before proceeding the following conditions must be met:

(a) All skid roads and/or cable yarding roads upon which timber is identified by the Purchaser to be cut and removed in accordance with this special provision must be necessary for the safe and expeditious removal of timber sold under this contact and shall be limited to the minimum width necessary for yarding of logs with a minimum of damage to reserve trees; however, unless otherwise approved in writing by the Authorized Officer, the width of each skid road, and/or cable yarding road shall be limited to twelve (12) feet.

(b) The Purchaser may immediately cut and remove additional timber to clear skid roads and cable yarding roads; and provide tailhold, tieback, guyline, lift and intermediate support trees; and clear danger trees when the trees have been marked with color of paint designated at the pre-work meeting, paint above and below stump height by the Authorized Officer and thereby approved for cutting and removal by the Authorized Officer. The volume of the timber to be sold will be determined by the Authorized Officer in accordance with Bureau of Land Management prescribed procedures. No timber may be cut or removed under terms of this provision unless sufficient installment payments have been made in accordance with Sec. 3.(b). of the contract or sufficient bonding has been provided in accordance with Sec. 3.(d). of the contract.

(c) The Purchaser agrees that sale of this additional timber shall be accomplished by a unilateral modification of the contract executed by the Contracting Officer and that such timber shall be sold at the unit prices

shown in Exhibit B of this contract unless: the value of the timber must be reappraised subject to the terms for contract extension set forth in Sec. 9 of the contract.

(d) This authorization for the Purchaser to cut and remove additional timber prior to the execution of a modification may be withdrawn by the Contracting Officer if the Authorized Officer determines that the Purchaser has cut and removed any tree not previously marked and approved for cutting by the Authorized Officer, which under Section 10 of the contract constitutes a violation of the contract and under Section 13 of the contract may constitute a trespass rendering the Purchaser liable for damages under applicable law.

(e) If authorization is withdrawn, the Contracting Officer shall issue a written notice to the Purchaser that the sale of additional timber under this special provision is no longer approved. In this case, the Purchaser shall inform the Authorized Officer at least one (1) working day prior to the need for cutting and removing any additional timber, and execute a bilateral modification prior to cutting for such additional approved timber at the unit prices shown in Exhibit B of the contract or in accordance with Sec. 8 or Sec. 9 of the contract as determined by the Authorized Officer in accordance with this provision. The Contracting Officer may issue a written order to the Purchaser to suspend, delay, or interrupt any or all contract work for the period of time deemed necessary and appropriate for the Government to safely measure and mark additional timber.

(22) L-25M Except for logs sold and removed from the contract area, and except for logs reserved in Section 41, all hardwoods from areas specified below and shown on Exhibit S, which meet the length and diameter specifications shown below, shall be yarded and decked or windrowed at the log destination area(s) described below and shown on Exhibit S. If a log or piece of log meeting the specifications shown below is bucked and left in place, all portions of that log shall be yarded and decked or windrowed to the following described log destination area(s).

Specified Areas	Log Destination Areas	Log Specifications
9-4, 11-2, 15-1A, 23-2A north, and 25-1A shown on Exhibit S.	Deck hardwoods along Roads and Temp. Routes as shown on Exhibit S.	Logs, including hardwoods, which are eight (8) inches or larger, but less than seventeen (17) inches in diameter at the large end and longer than six (6) feet in length.

(23) L-28 In cable yard harvest units as shown on Exhibit A, the Purchaser shall make cable yarding road changes by completely spooling the cables and restringing the layout from the head spar to the new tailhold to protect advance reproduction and/or reserve trees and snags present in those areas.

(C) Road Construction – Maintenance – Use

(1) RC-1a The Purchaser shall construct, improve and/or renovate all roads and other structures in strict accordance with the plans and specifications shown on Exhibit C, which is attached hereto and made a part hereof.

(2) RC-1b Prior to removal of any timber, except right-of-way timber, the Purchaser shall complete all construction, improvement, or renovation of structures and roads as specified in Exhibit C.

(3) RC-1d The Purchaser shall not commence work on road improvements, or renovation until receiving written notice to do so from the Authorized Officer. Work shall be commenced no later than 5 days after such notice, and shall be completed within 1 year after such notice.

(4) RC-2 BLM Maintenance. The Purchaser is authorized to use the roads listed below, and as shown on Exhibits C and D, which are under the jurisdiction of the Bureau of Land Management, for the removal of Government timber sold under the terms of this contract and the hauling of rock as required in Exhibit C, provided that the Purchaser pay the required maintenance fees described in Section 42(C)(7). The Purchaser shall pay current Bureau of Land Management maintenance fees for the sale of additional timber under modification to the contract.

Road No. and Segment	Length Miles Used	Road Control	Road Surface Type
33-7-02.1 (A-D)	2.54	BLM	ABC
33-7-13.0	0.90	BLM	GRR
33-7-13.7	2.92	BLM	GRR
33-7-35.0	1.31	BLM	PRR
Total	**7.67 miles**		

(5) RC-2a Purchaser Maintenance. The Purchaser is authorized to use the roads listed below, and shown on Exhibits C and D, which are under the jurisdiction of the Bureau of Land Management and Plum Creek Timberlands, LP, for the removal of Government timber sold under the terms of this contract and for the hauling of rock as required in Exhibit C, provided that the Purchaser comply with the conditions set forth in Section 42(C)(9) and pay the required rock wear obligation described in Section 42(C)(8). The Purchaser shall pay current Bureau of Land Management rock wear fees for the sale of additional timber under modification to the contract.

Road No. and Segment	Length Miles Used	Road Control	Road Surface Type
33-7-09.1	0.37	BLM	NAT*
33-7-11.0 (A-B)	2.04	BLM	GRR/ASC
33-7-11.4	0.20	BLM	NAT*
33-7-13.2	0.02	BLM	ASC
33-7-13.4	0.79	BLM	ASC
33-7-13.5 (A-B)	1.74	BLM	ASC
33-7-13.5 (C1)	0.04	Plum Creek	ASC
33-7-13.5 (C2-E)	1.71	BLM	ASC
33-7-13.5 (F)	0.21	BLM	NAT*
33-7-13.6 (A-B)	1.17	BLM	ASC/ NAT*
33-7-23.0	0.59	BLM	GRR
33-7-23.2	0.12	BLM	NAT*
33-7-23.4	0.38	BLM	NAT*
33-7-36.1	1.51	BLM	GRR
Total	**10.89 Miles**		

**No rock wear fees assessed on NAT surfaced roads; listed only for authorization of use.*

(6) RC-2d The Purchaser shall be authorized to use other roads not included in Section 42(C)(4) and Section 42(C)(5); provided, that in the use of such roads, the Purchaser shall pay the Government current Bureau of Land Management road maintenance and/or rock wear fees for the particular surface type of the roads used.

For administrative purposes the total maintenance and rock wear obligation due shall be based upon the estimated volume set forth in Exhibit B of this contract and mileage of roads used as determined by the Authorized Officer.

In the event logs are hauled over more than one route, the estimated volume set forth in Exhibit B shall be proportioned on the basis of actual volume removed. Prior to the use of such roads, the Purchaser shall give written notice to the Authorized Officer of the roads intended for use in the removal of the timber purchased under this contract, together with an estimate of the volume to be hauled over such roads.

Adjustments of fee obligations for additional timber volume shall be amended per Section 42(C)(7) and Section 42(C)(8) of this contract.

(7) RC-2e The Purchaser is authorized to use the roads listed in Section 42(C)(4) which are under the jurisdiction of the Bureau of Land Management, and maintained by the Bureau of Land Management, for the removal of Government timber sold under the terms of the contract; provided, that the Purchaser shall pay a road maintenance fee (which includes rock wear) of ***$1.25*** per thousand board feet log scale per mile for the use of said roads. The total maintenance fee due shall be based upon volumes determined pursuant to Section 2 and 3 of this contract and mileage of roads used as determined by the Authorized Officer. Prior to the use of such roads, the Purchaser shall give written notice to the Authorized Officer of the roads intended for use in the removal of timber purchased under this contract, together with an estimate of the volume to be hauled over such roads. **The Purchaser will be required to label, with a permanent ink marker, each load ticket with the corresponding unit number as directed by the Authorized Officer.** The Authorized Officer shall establish an installment schedule of payment of the maintenance obligation. If it is determined by the Authorized Officer, after all merchantable timber has been cut and scaled, that the total maintenance payments made under this contract exceed the total maintenance payment due, such excess shall be returned to the Purchaser within sixty 60 days after such determination is made.

(8) RC-2e$_{(rw)}$ The Purchaser is authorized to use the roads listed in Section 42(C)(5) which are under the jurisdiction of the Bureau of Land Management, and maintained by the Purchaser, for the removal of Government timber sold under the terms of the contract; provided, that the Purchaser shall pay a road rock wear fee of ***$0.49*** per thousand board feet log scale per mile for the use of said roads. The total rock wear fee due shall be based upon volumes determined pursuant to Section 2 and 3 of this contract and mileage of roads used as determined by the Authorized Officer. Prior to the use of such roads, the Purchaser shall give written notice to the Authorized Officer of the roads intended for use in the removal of timber purchased under this contract, together with an estimate of the volume to be hauled over such roads. **The Purchaser will be required to label, with a permanent ink marker, each load ticket with the corresponding unit number as directed by the Authorized Officer.** The Authorized Officer shall establish an installment schedule of payment of the rock wear obligation. If it is determined by the Authorized Officer, after all merchantable timber has been cut and scaled, that the total rock wear payments made under this contract exceed the total rock wear payment due, such excess shall be returned to the Purchaser within sixty 60 days after such determination is made.

(9) RC-2h Except for road maintenance in accordance with Section 42(C)(10), the Purchaser shall perform any required road repair and maintenance work on roads used by him, under the terms of Exhibit D, "Road Maintenance Specifications," of this contract, which is attached hereto and made a part hereof.

(10) RC-3 In the use of road 33-7-13.5 (Segment C1), the Purchaser shall comply with the conditions of Right-of-Way and Road Use Agreement No. M-887B between

the United States of America and Plum Creek Timberlands, LP. This document is available for inspection at the Bureau of Land Management, Medford Interagency Office, 3040 Biddle Road, Medford, Oregon 97504. Prior to the use of said road, the Purchaser shall furnish the Authorized Officer a copy of the executed License Agreement. Default by the Purchaser of said Right-of-Way and Road Use Agreement, or any License Agreement executed pursuant thereto, for failure to pay appropriate road use fees shall be considered a violation of this contract. The amount of unpaid fees shall be considered as the amount of damage suffered by the Government as a result of the violation of this provision.

(11) RC-8 The Purchaser shall be required to secure written approval to use vehicles or haul equipment over Government owned or controlled roads and/or structures when that vehicle or equipment exceeds the maximum allowable weights or dimensions established by the State for vehicles operating without a permit.

Details of such equipment shall be furnished to the Authorized Officer for evaluation of load characteristics, at least fifteen (15) days prior to proposed move-in.

Details shall include:

(a) Axle weights when fully loaded.
(b) Axle spacing.
(c) Transverse wheel spacing.
(d) Tire size.
(e) Outside width of vehicle.
(f) Operating speed.
(g) Frequency of use.
(h) Special features (e.g., running tracks, overhang loads, etc.)

The Purchaser shall be responsible for repair of any damage to roads or structures caused by the use of overweight or over-dimension vehicles (1) without written approval, (2) in violation of the conditions of a written approval, or (3) in a negligent manner. The amount of actual damage shall be determined by the Authorized Officer following a technical inspection and evaluation.

(D) Environmental Protection

(1) E-1 In addition to the requirement set forth in Section 26 of this contract, the Purchaser shall implement the following noxious weed control measures:

(a) In order to prevent the potential spread of noxious weeds into the Medford District BLM, the operator would be required to clean all logging, construction, chipping, grinding, shredding, rock crushing, and transportation equipment prior to entry on BLM lands.

(b) Cleaning shall be defined as removal of dirt, grease, plant parts, and material that may carry noxious weed seeds into BLM lands. Cleaning prior to entry onto BLM lands may be accomplished by using a pressure hose.

(c) Only equipment inspected by the BLM would be allowed to operate within the Analysis Area. All subsequent move-ins of equipment as described above shall be treated the same as the initial move-in.

(d) Prior to initial move-in of any equipment, and all subsequent move-ins, the operator shall make the equipment available for BLM inspection at an agreed upon location off Federal lands.

(d) Equipment would be visually inspected by the Authorized Officer to verify that the equipment has been reasonably cleaned.

(2) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall only use certified weed-free hay and native grass seed species approved by the Authorized Officer for rehabilitation activities. All seeding shall be contingent upon seed availability.

(3) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall prepare a Spill Prevention, Control, and Countermeasure Plan for all hazardous substances to be used in the contract area, as directed by the Authorized Officer. Such plan shall include identification of Purchaser's representatives responsible for supervising initial containment action for releases and subsequent cleanup. Such plans must comply with the State of Oregon DEQ OAR 340-142, Oil and Hazardous Materials Emergency Response Requirements.

(4) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall not refuel equipment, store, or cause to have stored, any fuel or other petroleum products within one hundred fifty (150) feet of all riparian management or wet areas. All Petroleum products shall be stored in durable containers and located so that any accidental releases will be contained and not drain into any stream system. Hydraulic fluid and fuel lines on heavy mechanized equipment would be in proper working condition in order to minimize potential for leakage into streams. Absorbent materials shall be onsite to allow for immediate containment of any accidental spills. Spilled fuel and oil shall be cleaned up and disposed of at an approved disposal site.

(5) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall not locate new landings in areas that contribute eroded fines to dry draws and swales. If landing location cannot be avoided, ensure that properly installed sediment control measures are placed and maintained, as needed, to keep eroded material onsite.

(6) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall cover cable yarding corridors, ground based skid trails, and other areas of exposed soil resulting from this action. Slash, wood chips, and/or straw mulch would be placed over them to reduce the risk of surface erosion and to protect water quality. This would occur prior to seasonal winter rains. Slash would not exceed a depth of 18 inches.

(7) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall ensure that silt fencing or other sediment control measures are properly placed and maintained during use and periods of non-use when utilizing existing landings that have the potential to release eroded fines into a stream or wet area, directly or via draws or ditchlines.

(8) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall, prior to October 15 of the same operating season, winterize and rehabilitate temporary routes, landings, corridors, skid trails and other areas of exposed soils by properly installing and/or using water bars, berms, sediment basins, gravel pads, hay bales, small dense woody debris, seeding and/or mulching, to reduce sediment runoff and divert runoff water away from headwalls, slide areas, high landslide hazard locations or steep erodible fill slopes as directed by the Authorized Officer.

(9) E-1 In addition to the requirement set forth in Section 26 of this contract, the Purchaser shall as directed by the Authorized Officer rehabilitate all temporary routes, skid trails, and all landings outside of the road prism by one of the following methods:

(a) If the Authorized Officer deems ripping will not cause unacceptable damage to the root systems of residual trees the Purchaser shall discontinuously subsoil with winged ripper teeth, simultaneously water bar, seed, mulch, and barricade.

1. Use a minimum 200 flywheel horsepower tractor with mounted rippers having shanks and teeth consistent with drawings and specifications shown on Exhibit R of this contract, which, is attached hereto and made a part hereof.

2. Rip to a depth of eighteen (18) inches, and no further than thirty six (36) inches apart.

3. Ripping will occur before October 15 of the year of harvest.

4. Any step landings shall be re-contoured following use.

(b) If the Authorized Officer deems ripping will cause an unacceptable amount of damage to the root systems of residual trees the Purchaser shall

scarify to a depth of up to six (6) inches and simultaneously water bar, seed, mulch, and barricade.

(c) **DO NOT RIP OR SCARIFY** shovel operating trails, skid trails, temporary routes, or landings associated with the following units as directed by the Authorized Officer: Units 15-1A, 15-2A, 23-2A, 23-2B, 23-2C, and 23-4A.

All rehabilitation shall occur within twenty four (24) months of harvest and during the dry season.

(10) E-1 In addition to the requirement set forth in Sec. 26 of this contract, the Purchaser shall place material removed during excavation in locations where it cannot enter streams or other water bodies.

(11) E-2 The water bars to be constructed as required by Sec. 26(c) shall be constructed in accordance with the specifications shown on Exhibit C (pg.26), which is attached hereto and made a part hereof.

(12) E-4 The Purchaser shall immediately discontinue specified construction or timber harvesting operations upon written notice from the Contracting Officer that:

(a) threatened or endangered plants or animals protected under the Endangered Species Act of 1973, as amended, may be affected by the operation, and a determination is made that consultation or reinitiation of consultation is required concerning the species prior to continuing operation, or;

(b) when, in order to comply with the Endangered Species Act the Contracting Officer determines it may be necessary to modify or terminate the contract, or;

(c) federal proposed, federal candidate, Bureau sensitive or State listed species protected under BLM Manual 6840 - Special Status Species Management - have been identified, and a determination is made that continued operations would affect the species or its habitat, or;

(d) other active raptor nests have been discovered, and a determination is made that continued operations under this contract would adversely affect the present use of the discovered nesting area by the raptor, or;

(e) when, in order to comply with a court order which enjoins operations on the sale or otherwise requires the Bureau of Land Management to suspend operations, or;

(f) when, in order to comply with a court order, the Contracting Officer determines it may be necessary to modify or terminate the contract, or;

(g) species have been discovered which were identified for protection through survey and manage and/or protection buffer standards and guidelines established in the ROD and RMP, and the Contracting Officer determines that continued operations would affect the species or its habitat, or;

(h) when, in order to protect species which were identified for protection through survey and manage and/or protection buffer standards and guidelines established in the ROD and RMP, the Contracting Officer determines it may be necessary to modify or terminate the contract.

Those operations necessary for a safe removal of personnel and equipment from the contract area and those directed by the Contracting Officer which are required in order to leave the contract area in an acceptable condition will be permitted. Discontinued operations may be resumed upon receipt of written instructions and authorization by the Contracting Officer.

During any period of suspension, the Purchaser may withdraw performance and payment bond coverage aside from that deemed necessary by the Authorized Officer to secure cut and/or removed timber for which the Bureau of Land Management has not received payment, and/or unfulfilled contract requirements associated with harvest operations that have already occurred and associated post-harvest requirements.

In the event of a suspension period or a combination of suspension periods that exceed a total of 30 days, the First Installment held on deposit may be temporarily reduced upon the written request of the Purchaser. For the period of suspension extending beyond 30 days, the First Installment on deposit may be reduced to five (5) percent of the First Installment amount listed in Section 3.a. of the contract. Any First Installment amount temporarily reduced may be refunded or transferred to another BLM contract at the request of the Purchaser. However, if the Purchaser has outstanding debt owing the United States, the Contracting Officer must first apply the amount of First Installment that could be refunded to the debt owed in accordance with the Debt Collection Improvement Act, as amended (31 USC 3710, et seq.). Upon Purchaser's receipt of a bill for collection and written notice from the Contracting Officer lifting the suspension, the Purchaser shall restore the First Installment to the full amount shown in Section 3.a. of the contract within 15 days after the bill for collection is issued, subject to Section 3.g. of the contract. The Purchaser shall not resume contract operations until the First Installment amount is fully restored.

In the event of a suspension period or a combination of suspension periods that exceed a total of 30 days, the unamortized Out-of-Pocket Expenses for road or other construction required pursuant to Exhibit C of the contract shall be refunded

or transferred to another BLM contract at the request of the Purchaser. Upon written notice from the Contracting Officer lifting the suspension, the Purchaser shall reimburse the Government the amounts refunded or transferred. The Purchaser may choose to pay this reimbursement at once or in installments payable at the same time as payments are due for the timber under the contract and in amounts approximately equal to the expenses associated with the timber for which payment is due.

In the event that a Court-ordered injunction results in a suspension period in which the Purchaser loses operating time of 30 calendar days or more between January 1 and December 31 during the contract period, the Contracting Officer shall unilaterally modify the contract based on reappraisal of the remaining volume as of the date that the suspension is lifted. The 30 days can be the sum of days accruing during more than one operating season. Reappraisal may result in a decrease to the unit price bid per species. Reappraisal will be based on the loss of net volume due to the deterioration of logs during the period of delay and any associated changes in the amortization of logging costs per unit of volume, as determined by the Authorized Officer. Amortization of road construction cost over a reduced net volume will be considered as well as any additional move-in or logging costs caused by the delay, as determined by the Authorized Officer. Reappraisal will adjust Exhibit B volume and values, and will not consider changes in the market price of timber.

In the event that operating time is lost as a result of the incorporation of additional contract requirements, or delays due to Endangered Species Act consultation with the U.S. Fish and Wildlife Service or U.S. National Marine Fisheries Service, or court-ordered injunctions, the Purchaser agrees that an extension of time, without reappraisal, will constitute a full and complete remedy for any claim that delays due to the suspension hindered performance of the contract or resulted in damages of any kind to the Purchaser.

The Contracting Officer may determine that it is necessary to terminate the cutting and removal rights under the contract in order to comply with the Endangered Species Act, protect occupied marbled murrelet sites in accordance with the ROD and RMP, protect species that have been discovered which were identified for protection through survey and manage and/or protection buffer standards and guidelines established in the ROD and RMP, or comply with a court order. Following the issuance of a written notice that cutting and removal rights will be terminated, the Purchaser will be permitted to remove timber cut under the contract, if allowed by the Endangered Species Act, marbled murrelet occupied site protection in accordance with the ROD and RMP, survey and manage and/or protection buffer standards and guidelines established in the ROD and RMP, or court order requirements necessitating the modification or termination.

In the event cutting and removal rights are terminated under this subsection, the Purchaser agrees that the liability of the United States shall be limited to the actual costs incurred by the Purchaser which have not been amortized by timber removed from the contract area. This calculation of liability shall utilize actual Purchaser costs and Government estimates of timber volumes. At the Authorized Officer's request, the Purchaser agrees to provide documentation of the actual costs incurred in the performance of the contract. In addition, the Purchaser shall be released from the obligation to pay the contract price for any timber which is not authorized to be removed from the contract area.

The Purchaser specifically and expressly waives any right to claim damages, other than those described in the preceding paragraphs, based on an alleged breach of any duty to the Purchaser, whether express or implied, in regard to the manner in which the Government defended the litigation which resulted in the court order affecting the operation of the contract. This waiver also extends to any claims based on effects on the operation of the contract that arise from litigation against another agency. Furthermore, the Purchaser specifically acknowledges and agrees that a court ruling that the Government violated the Administrative Procedures Act cannot be interpreted, in itself, to mean that the Government had not acted reasonably in regard to its duties to the Purchaser under this contract.

(13) E-6 The Purchaser shall notify the Authorized Officer in writing by February 1 of each calendar year if operations are expected to take place on the contract area as limited in Section 42(B)(17)(L-18a) of the contract, between March 1 and September 30, both days inclusive. If notification is not received by the Authorized Officer by February 1, felling, bucking, yarding, road construction, or any other activity with the potential to disturb nesting northern spotted owls may not be allowed during this time period.

Upon receipt of a notice that the Purchaser expects to perform such operations during this time period, the Government will conduct surveys to determine whether spotted owls are nesting within 0.25 miles of the harvest units. If it is determined that spotted owls are not nesting or that no young have been produced, the Authorized Officer may lift the seasonal restriction on such operations in writing. Without this written approval, such operations are prohibited from March 1 through September 30 of each year.

(E) Miscellaneous

(1) M-2 The Government at its option may check scale any portion of the timber removed from the contract area. The Purchaser hereby agrees to make such contract timber available for scaling at a location designated by the Authorized Officer. In the event that BLM elects to check scale and if such check scaling causes a delay in log transportation time, an adjustment will be made to the purchase price as follows. If the entire sale is check scaled, the purchase price of this contract shall be reduced by seven thousand ninety seven 25/100 dollars

($7,097.25). In the event that only a portion of the contract timber is scaled, the purchase price shall be reduced by that portion of seven thousand ninety seven 25/100 dollars ($7,097.25), which is equal to the percentage of timber sold which was actually scaled by the Government. For purposes of computing this price reduction, the percentage of timber sold which has been scaled shall be determined by the Government. Any reduction in purchase price under the terms of this provision shall be full compensation to the Purchaser for any expense or loss incurred as a result of such scaling.

(F) Fire Prevention and Control

(1) F-1a Fire Prevention and Control. Primarily for purposes of fire prevention and control, the Purchaser shall comply with the following provisions:

(a) Prior to the operation of power driven equipment in construction or logging operations under this contract during the closed fire season or periods of fire danger, prepare a fire prevention and control plan to the satisfaction of the State of Oregon, Department of Forestry.

(b) Provide and maintain in good repair, on the contract area, the following equipment for use during closed fire season or periods of fire danger:

1. F-2a Fire fighting tools shall be kept at each landing or at such other place as the Authorized Officer shall designate whenever people are working on the contract area. All fire fighting tools shall be kept in a sturdily constructed box which shall be painted red and lettered on the front or top in large letters, "For Fire Only."

The box shall have a hinged lid and a hasp by which the lid can be sealed. One box may serve two landings not over six hundred (600) feet apart. When filled, the box shall not weigh over two hundred (200) pounds. The fire tools shall be in good condition, be tight on strong handles, and have sharp cutting edges. There shall not be less than four (4) tools in each box nor less than one (1) tool for each person working on the contract area. Three-fourths (¾) of all fire tools shall be shovels, hazel hoes, or other scraping tools. The fire tools shall be used only for fighting fire.

2. F-2b A round pointed size "0" or larger shovel in good condition shall be within fifty (50) feet of any power saw when in operation.

3. F-2c At each landing during periods of operation one (1) tank trucks. Each truck shall have three hundred (300) gallons minimum capacity with five hundred (500) feet minimum of hose and a nozzle acceptable to the Authorized Officer and a mounted or portable pump conforming to the standards set forth in Oregon

Revised Statute ORS 477.645 through ORS 477.670 and any rule promulgated pursuant to those statutes. All hose couplings shall have the standard thread adopted by the State Fire Marshall pursuant to ORS 476.410 as amended or be provided with suitable adapters. At the close of each working day, all bulldozers and tank trucks shall be filled with fuel and made ready for immediate use. All tank trucks and portable tanks shall be filled with water and made available for immediate use.

4. F-2d Serviceable radio or radio-telephone equipment able to provide prompt and reliable communication between the contract area, the Medford BLM District Office, and Oregon Department of Forestry. Such communication shall be available during periods of operation including the time watch-service is required.

5. F-2e A pair of headlights capable of being quickly attached to each bulldozer used on the contract area. The headlights shall be adequate to provide illumination sufficient to allow use of the bulldozers for fire fighting and construction of fire trails at night.

6. F-2f A headlight for each person in the woods crew adequate to provide sufficient illumination for night fire fighting. A headlight shall be of the type that can be fastened to the head so as to allow independent use of the hands. It shall be equipped with a battery case so designed that it can be either carried in the hip pocket or fastened to the belt. The head of the light and the battery case shall be connected by insulated wires. At least one extra set of batteries shall be provided for each such headlight.

7. F-2g Two (2) back-pack pumps at each landing and one (1) at each tail block, all to be kept full of water and in good operating condition.

8. F-2h A chemical fire extinguisher of at least eight (8) ounces minimum capacity of a type approved by the Oregon State Forester shall be carried during the closed fire season or periods of fire danger by each saw operator using a power saw on the contract area. Such fire extinguisher shall be filled and in effective operating condition and shall at all times be immediately available to the operator when the saw is being fueled or the motor of the saw is running. A size "0" or larger shovel shall be available with each gas can when refueling. Any fueling of a power saw shall be done in an area which has first been cleared of all flammable material. Power saws shall be moved at least twenty (20) feet from the place of fueling before the engine is started. Each power saw shall be equipped with an exhaust system and a spark arresting

device which are of types approved by the Oregon State Forester.

9. F-5 Where blocks and cables are used on the contract area during periods of fire danger, the Purchaser shall remove all flammable material at least ten (10) feet from the place where the tail or any other block will hang when the cable is tight. Such clearings shall be inspected periodically by the Purchaser and shall be kept free of flammable material.

(G) Slash Disposal and Site Preparation

(1) SD-1 Fire Hazard Reduction. In addition to the requirements of Sec. 15 of this contract, and notwithstanding the Purchaser's satisfactory compliance with State laws and regulations regarding offsetting or abating the additional fire hazard created by this operation and the State's willingness to release the Purchaser from liability for such hazard, the Purchaser shall remain responsible to the Government for performance of the following hazard reduction measures required by this contract:

Prior to commencement of any operation under this Section G of the contract, a slash disposal and pre-work conference between the purchaser's representative and the Authorized Officer must be held at a location designated by the Authorized Officer. All slash disposal shall be done in accordance with the plans developed at this pre-work conference. Slash, as defined for this section, shall mean all material (brush, limbs, tops, unmerchantable stems, and chunks) severed or knocked over as a result of purchasers operations under the terms of this contract.

(a) SD-1a LOP AND SCATTER Lop and scatter all slash located in all Units except 23-6A as directed by the Authorized Officer. Slash will be scattered on yarding corridors, and where possible throughout the unit, on landings, and on temporary roads. All cut slash (any material less than six inches in diameter) shall be lopped to no more than four (4) feet in length and all top and side branches must be free of the central stem so that slash is reduced to the extent that it is within eighteen (18) inches of the ground at all points. All slash shall be arranged in a discontinuous pattern across the forest floor.

(b) SD-1c HAND PILING Hand pile and cover all slash located within one hundred (100) feet along roads in Units 9-4, 9-5, 9-9, 10-1, 11-2, 13-2, 13-4, 13-4A, 13-6, 14-2, 15-1A (along temp. route 15-1A beyond the helicopter landing only, NOT BLM Rd. 33-7-13.5), 15-1B, 23-1A, 23-2A, 23-2B, 23-2C, 23-3B, 23-4A, 23-7, 23-10C, and 25-A as directed by the Authorized Officer in accordance with the following specifications:

1. Piling shall be accomplished by hand. Finished piles shall be tight

and free of earth.

2. Pile all slash which is between one (1) inch and six (6) inches in diameter on the large end and exceeds two (2) feet in length.

3. Piles shall be placed within unit boundaries, however, outside of wildlife buffers, roadways, turnouts, shoulders, or cut banks. No piles shall be placed on down logs or stumps. No piles shall be placed adjacent to or within twenty five (25) feet of harvest unit boundaries. Finished piles shall be tight and free of earth.

4. A five (5) foot by five (5) foot cover of four (4) millimeter black plastic shall cap each handpile to maintain a dry ignition point. The cover shall be firmly fixed to the pile to hold it in place. Approximately one third (⅓) of the pile shall lie above this plastic cover. The ignition point will consist of fine fuel material such as needles, small limbs, and branches less than one half (½) inch in diameter and free of dirt. Piles shall be constructed by aligning individual pieces in the same direction and placing the heavier slash on top. Piles shall have a stable base to prevent toppling. The long axis of individual pieces shall be oriented up and down the slope. Protruding pieces shall be trimmed to allow covering in a manner that permits the pile to shed water. Height shall be no less than five (5) feet and no greater than eight (8) feet; width shall be no less than six (6) feet and shall not exceed eight (8) feet; piles shall be circular and not windrowed. No pile shall be located in any stream channel; on down logs or stumps; within ten (10) feet of any other pile or the trunk of the nearest living reserve tree. No portion of the pile will be under the crown of any living tree.

(c) SD-1d Operations required by this provision shall be kept current with yarding as directed by the Authorized Officer and shall be conducted as follows:

1. Units shall be piled and covered during the same season that they are logged.

2. Landing piles and handpiles located on temporary routes, skid trails, or landings would be burned, chipped, or otherwise removed from these sites within eighteen (18) months of unit harvest completion.

(d) SD-1e LANDING SLASH Pile all slash located within twenty (20) feet on each side of harvest unit landings. Clear down to mineral soil within twenty (20) feet of each finished pile. Slash shall be piled by machine equipped with a hydraulic thumb or a rotating controllable grapple head,

or by hand and piles shall be located in tractor skid trails, cable yarding corridor chutes, or on landings located away from reserve trees, snags, and coarse woody debris. Finished piles shall be tight and free of earth.

1. A ten (10) foot by ten (10) foot cover of four (4) millimeter black plastic shall cap each pile to maintain a dry ignition point. The cover shall be firmly fixed to each pile to hold it in place.

2. To minimize scorch and mortality, landing piles would not be placed adjacent to or within 15 feet of leave trees.

3. Along BLM Road 33-7-13.5 in T.33S, R.7W, Sec. 15 and along Temp. Route 15-1A (from junction with BLM Rd. 33-7-13.5 to the helicopter landing), all Landing Piles shall be chipped as directed by the Authorized Officer.

(e) SD-1g MACHINE PILING Pile all slash and debris in the tractor yarding portions of harvest units 9-5, 10-1, 15-1A, 23-1A, 23-4A, 23-6A, 23-7, and 25-1A in accordance with the following specifications:

1. Piling shall be accomplished with a track mounted hydraulic excavator. The excavator shall be equipped with a hydraulic thumb or a rotating controllable grapple head. The excavator shall have a minimum reach of twenty (20) feet. Finished piles shall be tight and free of earth.

2. The excavator shall not operate on slopes greater than thirty-five (35) percent slope.

3. Excavator shall operate on existing skid trails prior to rehabilitation. Where activity generated slash is not reachable from an existing skid trail, the excavator may make one (1) pass off the skid trail.

4. All equipment shall be approved by the Authorized Officer.

5. Machine piles shall be located as far away as possible from green trees, snags, or unit boundaries to minimize damage.

6. Machine piles shall be kept free of dirt and other non-woody debris and constructed as compactly as possible. There should be an adequate supply of fine fuels located within and under the covered area of the pile to ensure ignition of the larger fuels. Completed piles shall be free of projecting limbs or slash which would interfere with adequate covering of the piles. To the maximum extent possible, hardwood slash shall be mixed with conifer slash

to create piles that are more burnable. Logging debris greater than eight (8) inches in diameter at the small end shall not be piled.

7. The machine piles shall be adequately covered with a cap ten (10) feet by ten (10) feet of four (4) millimeter black polyethylene plastic to ensure ignition. The plastic shall be held in place with woody debris or tied with rope or twine to ensure coverage. Coverage shall be completed when piles are constructed, or as directed by the Authorized Officer.

(f) SD-4a SLASHING DAMAGED RESIDUALS Slash all sprung or otherwise severely damaged trees between one (1) inch and eight (8) inches D.B.H.O.B. concurrently with logging as directed by the Authorized Officer in all harvest units as shown on Exhibit A.

(2) SD-2 Notwithstanding the provisions of Sec. 15 of this contract, the Government shall assume all obligations for disposal or reduction of fire hazards created by Purchaser's operations on Government lands, except for burning and mop-up assistance as required herein. In accordance with written instructions to be issued by the Authorized Officer at least ten (10) days in advance of earliest date of required performance, the Purchaser shall, under supervision of the Authorized Officer or designated representative, assist in preparing units for burning, mop-up, and patrol by furnishing, at the Purchaser's own expense, the services of personnel and equipment on each unit as shown below.

(a) Burn and mop-up piled units and landings as shown on Exhibit A in accordance with Section 42(G)(2) and 42(G)(3).

1. Prescribed fire plans shall be prepared for burning activities to ensure that resource and fire management objectives are met by setting parameters under which the burning may take place. Prescribed burning within the harvest units shall be conducted in a manner that will minimize damage to reserve trees, duff and soil, and to avoid loss of large, coarse woody debris and will be consistent with ecosystem management objectives. The Purchaser shall burn ninety (90) percent of piles for satisfactory completion of treatment, as directed by the Authorized Officer.

2. Piles shall be burned in the fall to spring season after one or more inches of precipitation has occurred to reduce the potential for fire spread and scorch and mortality to the residual trees and shrubs. Patrol and mop-up of burning piles shall occur when needed to prevent treated areas from re-burning or becoming and escaped fire. The timing of prescribed burns depends on these parameters and the availability of adequate fire suppression resources as a contingency plan in the event of escaped fire.

3. For Igniting and Burning Piles on Units 9-4, 9-5, 9-9, 10-1, 11-2, 13-2, 13-4, 13-4A, 13-6, 14-2, 15-1A (along temp. route 15-1A beyond the helicopter landing only and NOT ALONG BLM Rd. 33-7-13.5), 15-1B, 23-1A, 23-2A, 23-2B, 23-2C, 23-3B, 23-4A, 23-6A, 23-7, 23-10C, 25-1A, 25-2A and All Landing Piles as described by the Authorized Officer:

    a. One (1) person to supervise crew(s) and equipment operators, and to serve as Purchaser's representative.

    b. One (1) crew with ten (10) members per crew, including a designated crew foreman. Each crew shall be equipped with fuel, ten (10) drip torches, shovels, pulaskis, one (1) power saw and one (1) backpack pump; one (1) tool for each crew member.

    c. All crews shall arrive on the project area with radios capable of inter-crew communications and communication with a BLM representative at a ratio of one (1) radio per every five (5) crew members.

    d. All ignition personnel will be directly supervised by a BLM representative.

4. For Mop-up of Piles on Units 9-4, 9-5, 9-9, 10-1, 11-2, 13-2, 13-4, 13-4A, 13-6, 14-2, 15-1A (along temp. route 15-1A beyond the helicopter landing only and NOT ALONG BLM Rd. 33-7-13.5), 15-1B, 23-1A, 23-2A, 23-2B, 23-2C, 23-3B, 23-4A, 23-6A, 23-7, 23-10C, 25-1A, 25-2A, and All Landing Piles as described by the Authorized Officer:

    a. One (1) person to supervise crew(s) and equipment operators, and to serve as Purchaser's representative.

    b. One (1) crew with ten (10) members per crew, including a designated crew foreman. Each crew shall be equipped with fuel, ten (10) drip torches, shovels, pulaskis, one (1) power saw and one (1) backpack pump; one (1) tool for each crew member.

    c. All crews shall arrive on the project area with radios capable of inter-crew communications and communication with a BLM representative at a ratio of one (1) radio per every five (5) crew members.

d. All ignition personnel will be directly supervised by a BLM representative.

Aircraft and pilots used for Logging Residue Reduction or the suppression of escaped fires from Logging Residue Reduction operations, shall be acquired from a list of aircraft and pilots approved (i.e., carded for these specific activities) by the Office of Aircraft Services or the U.S. Forest Service. This list is available from BLM District Offices upon request.

All listed personnel shall be physically fit, experienced, and fully capable of functioning as required. All personnel shall arrive at the project area(s) with the following personal safety equipment: long sleeve natural fabric shirt, full length natural fabric trousers, minimum eight (8) inch top leather boots, hardhat, and leather gloves. All listed tools and equipment shall be in good usable condition. All power-driven equipment shall be fully fueled and available for immediate use. During periods of use under this subsection, the Purchaser shall provide fuel and maintenance for all such power-driven equipment.

Except as provided hereafter for fire escapement, the Purchaser shall continue the required assistance in mop-up on each unit to be burned as shown on Exhibit A as required in Section 42(G) for four hundred fifty (450) work hours for each piled unit and piled landing as directed by the Authorized Officer within a ten (10) day period for each piled unit and piled landing beginning 8:00 a.m. the day following completion of ignition in that unit or until released from such services by the Authorized Officer, whichever occurs first.

In the event of a fire escapement, Purchaser's personnel and equipment shall, under supervision of the Authorized Officer or designated representative, take action to suppress, including control and mop-up, the escaped fire until released from such service by the Government. If it becomes necessary to suppress a fire which escapes from the prescribed fire area for a period beyond midnight of ignition day, then the Government shall, at its option: (1) reimburse Purchaser for such additional use of personnel and equipment at wage rates shown in the current Administratively Determined Pay Rates for Western Area and at equipment rates shown in the current Oregon-Washington Interagency Fire Fighting Equipment Rental Rates schedule, until the Purchaser is released from such service by the Government, or (2) release the Purchaser from additional suppression work and assume responsibility for suppressing the escaped fire.

In situations where an escaped fire is controlled and contained by an adequate fire break (i.e., trail, road, stream, rock formation, etc.), the Government may permit the Purchaser to remove personnel for that day; provided that, all mop-up work on the escaped fire area is included with mop-up work on the prescribed fire area. In such an event, the Purchaser must sign a statement of agreement to complete mop-up work on all escaped fire areas concurrently with mop-up work on the prescribed fire area.

In case of injury to personnel or damage to equipment furnished by the Purchaser as required by this subsection, liability shall be borne by the Purchaser, unless such injury or damage is caused by Government negligence.

Time is of the essence in complying with this provision. In the event the Purchaser fails to provide the personnel and equipment required herein, the Purchaser shall be responsible for all additional costs incurred by the Government in disposing of slash including but not limited to the wages and other costs of providing federal employees and others as substitute labor force, the cost of providing substitute equipment and appropriate additional overhead expenses. If the Purchaser's failure results in deferral of burning and new conditions necessitate additional site preparation work and/or use of additional personnel and equipment to accomplish planned burning, the Purchaser also shall be responsible for such additional costs.

(3) SD-5 Perform logging residue reduction and site preparation work on approximately four hundred thirty one (431) acres of harvest area located in Harvest Unit No.(s) 9-4, 9-5, 9-9, 10-1, 11-2, 13-2, 13-4, 13-4A, 13-6, 14-2, 15-1A, 15-1B, 15-2A, 23-1A, 23-2A, 23-2B, 23-2C, 23-3A, 23-3B, 23-4A, 23-4B, 23-6A, 23-6B, 23-7, 23-10C, 25-1A, 25-2A, 27-B, and Road 33-7-11.0 as shown on Exhibit A, and all Landing Piles as directed by the Authorized Officer.

(a) The required work shall consist of any treatment or combination of treatments listed in the table below, as determined by the Authorized Officer and specified in writing by the Contracting Officer. The number of acres of each treatment shall be determined by the Authorized Officer.

Treatment	Description	Cost/Acre
Lop and Scatter	< 20 tons/acre	$60.00
Handpile and Cover	< 50 piles/acre	$370.00
Hand pile burn and Mop-up	< 50 piles/acre	$40.00
Machine pile and Cover	< 20 piles/acre	$300.00
Machine pile burn and Mop-up	< 20 piles/acre	$35.00
Cover and Burn Landing Decks	< 20 piles/acre	$70.00
Chip Landing Decks	2 days expected	$2,560/day

(b) The following treatments were assumed for appraisal purposes on this contract:

Appraised Treatment	Acres	Cost/Acre	Total Cost Per Treatment
Lop and Scatter	309	$60.00	$18,540.00

Hand pile and Cover	50	$370.00	$18,500.00
Hand pile burn and Mop-up	50	$40.00	$2,000.00
Machine pile and Cover	26	$300.00	$7,800.00
Machine pile burn and Mop-up	26	$35.00	$910.00
Cover and Burn Landing Decks	44	$70.00	$3,080.00
Chip Landing Decks	2	$2,560.00/day	$5,120.00
Total Appraised Cost			**$55,950.00**

(c) The Total Purchase Price set forth in Section 2 shall be adjusted by the amount that the total cost of the site preparation treatments designated pursuant to Section 42(G)(3)(a) differs from $55,950.00 as calculated by using the estimated acres determined by the Authorized Officer and the per acre costs listed in Section 42(G)(3)(a).

Seasonal Restriction Matrix

Burnt Rattler Salvage Timber Sale

ORM07-TS14-11

Unrestricted Period

Restricted Period

Restricted To Dry Condition; Waiver Required

Restricted Period; NSO surveys can possibly waive restriction if surveys determine owls are non-nesting

* In-stream work periods for culvert cleaning are June 15th- September 15th

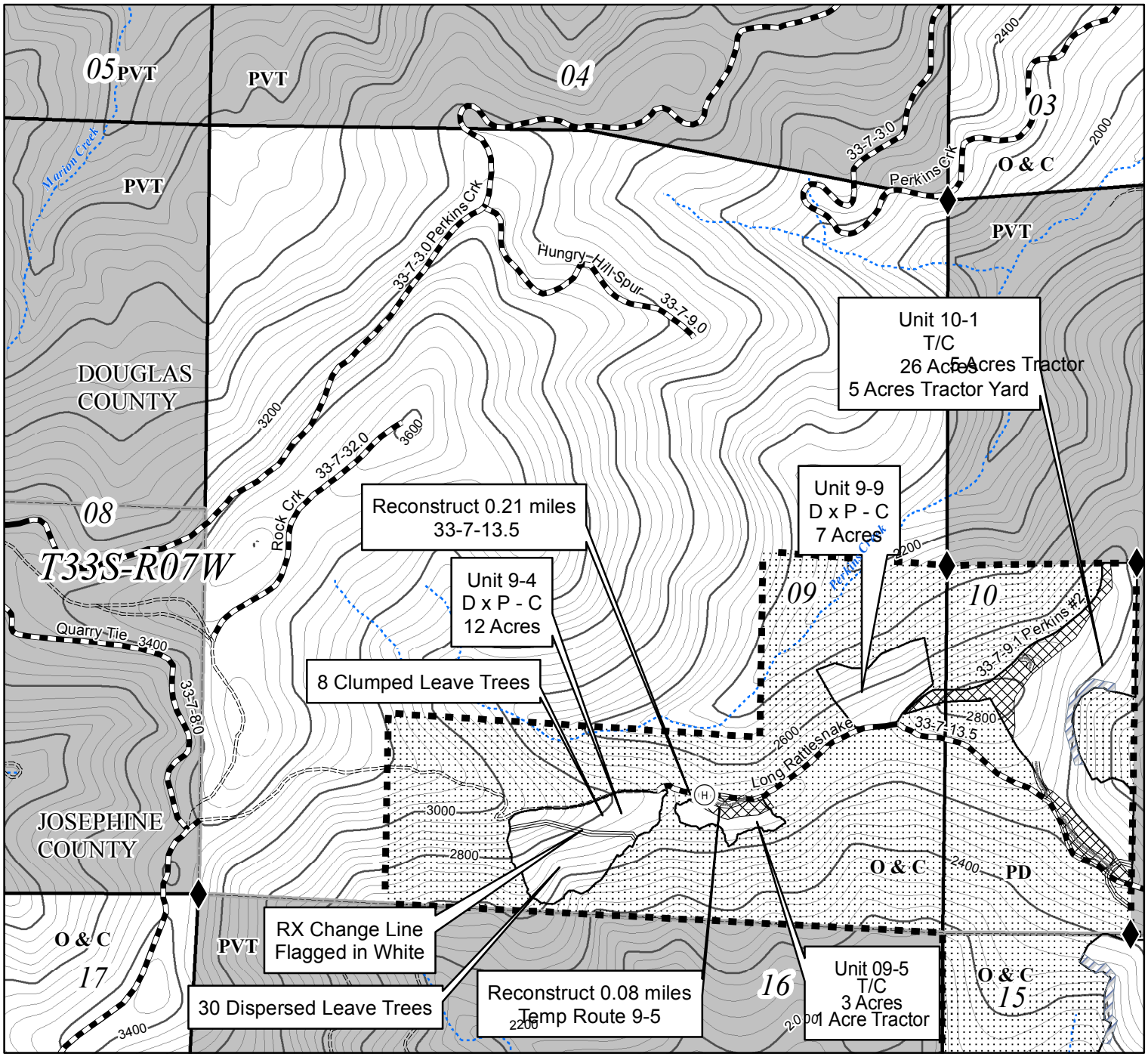
Dry Condition Haul = Loading and hauling would not occur on all hydrologically connected roads when water is flowing in the ditchlines or during any conditions that would result in any of the following; surface displacement such as rutting or ribbons; continuous mud splash or tire slide; fines being pumped through road surfacing from the subgrade and resulting in a layer of surface sludge; road drainage causing a visible increase in stream turbidities, or any condition that would result in water being chronically routed into tire tracks or away from designed road drainage during precipitation events. Hauling on natural surface or rocked roads would not resume for a minimum of 48 hours following any storm event that results in ½ inch or more precipitation within a 24 hour period, and until road surface is sufficiently dry to prevent any of the above conditions from reoccurring.

Dry Condition Yarding and Temporary Route Work = Tractor and one-end suspension cable yarding, temporary route work, and rehabilitation activities would not occur when soil moisture at a depth of 4-6 inches is wet enough to maintain form when compressed, or when soil moisture at the surface would readily displace, causing ribbons and ruts along equipment tracks. These conditions are generally found when soil moisture is 30% at a depth of 4-10 inches.

		Jan		Feb		Mar		Apr		May		Jun		Jul		Aug		Sep		Oct		Nov		Dec	
Sale Area	**Activity**	1	15	1	15	1	15	1	15	1	15	1	15	1	15	1	15	1	15	1	15	1	15	1	15
Units 10-1, 11-2 (west of Rx change line), 13-2, 13-6, 14-2, 15-1B, 15-2A,15-4A, 15-4B, 23-1A south, 23-2A north, 23-2B, 23-2C, 23-3A, 23-3B, 23-4A, 23-4B, 23-6A, 23-7, 23-10C north, 25-1A, 25-2A, 27-B	Manual Falling and Bucking																								
	Helicopter Yarding																								
	Mechanical Ground Based Harvesting and Yarding																								
	Cable Yarding																								
	Loading, Hauling, and Road Construction, Reconstruction, Decommissioning & Maintenance*																								
Talus Soil Areas: Units 11-2 (east of Rx change line), 13-4, 13-4A, 23-10C south	Manual Falling and Bucking																								
	Cable Yarding																								
	Helicopter Yarding																								
	Loading, Hauling, and Road Construction, Reconstruction, Decommissioning & Maintenance*																								
Owl Seasonal Restrictions: Units 9-5, 15-1A, 15-4C, 23-6B	Manual Falling and Bucking																								
	Helicopter Yarding																								
	Cable Yarding																								
	Mechanical Ground Based Harvesting and Yarding																								
	Loading, Hauling, and Road Construction, Reconstruction, Decommissioning & Maintenance*																								
Cable Yard on Slopes > 70%: Units 11-2 (east of Rx change line), 23-1A north, 23-2A south	Manual Falling and Bucking																								
	Helicopter Yarding																								
	Cable Yarding																								
	Mechanical Ground Based Harvesting and Yarding																								
	Loading, Hauling, and Road Construction, Reconstruction, Decommissioning & Maintenance*																								
Owl Seasonal Restrictions & Cable Yard on Slopes > 70%: Unit 9-9	Manual Falling and Bucking																								
	Cable Yarding																								
	Loading, Hauling, and Road Construction, Reconstruction, Decommissioning & Maintenance*																								
Owl Seasonal Restrictions, Talus Soil Areas & Cable Yard on Slopes > 70%: Unit 9-4	Manual Falling and Bucking																								
	Cable Yarding																								
	Loading, Hauling, and Road Construction, Reconstruction, Decommissioning & Maintenance*																								

U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 09, WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



0 500 1,000 2,000 Feet

1 inch = 1,000 feet

**Note: Temporary Route (TR#) centerlines are flagged in red.

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Medford District Office
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(541) 618-2200

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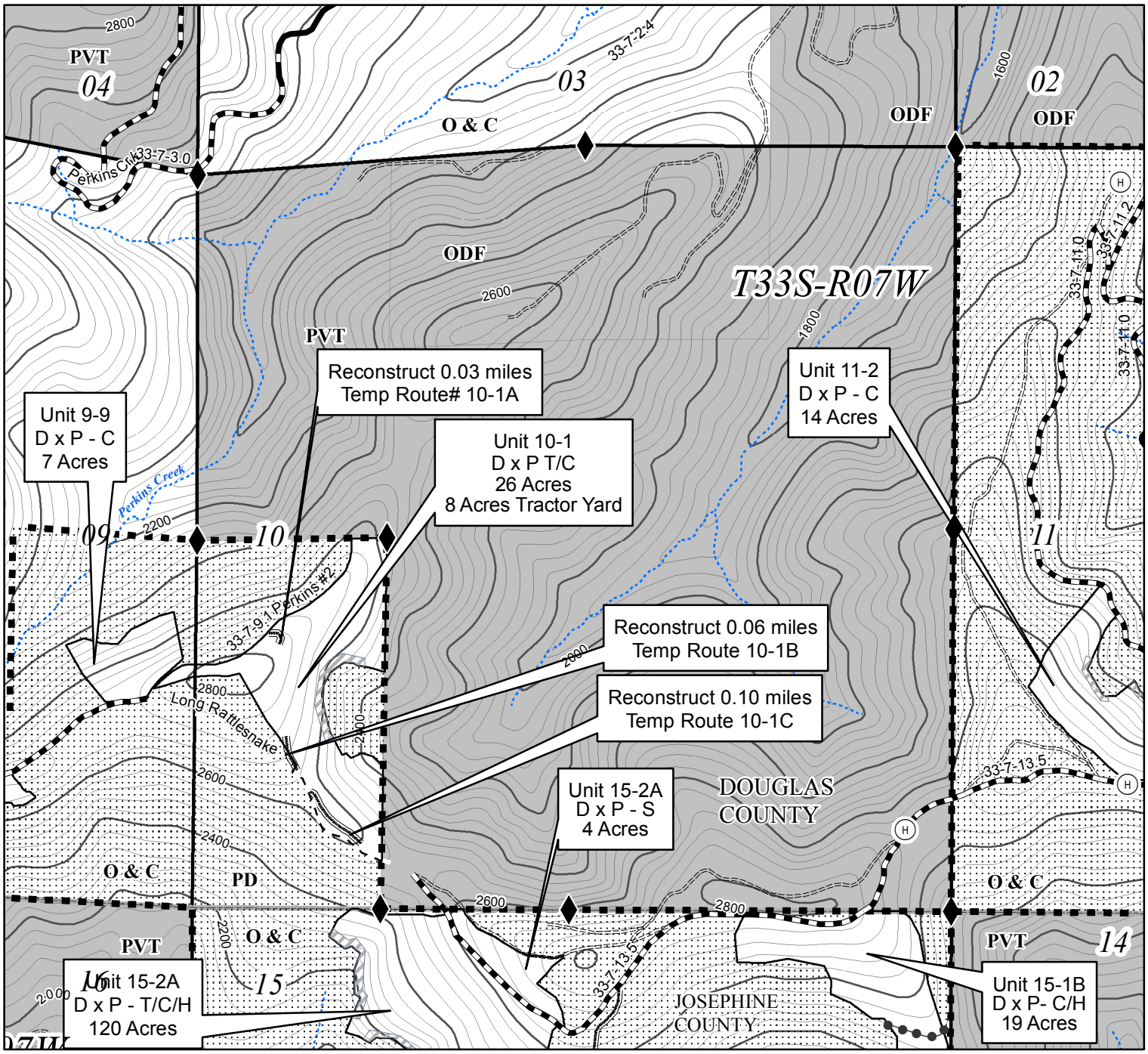
May 09, 2014

U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 10 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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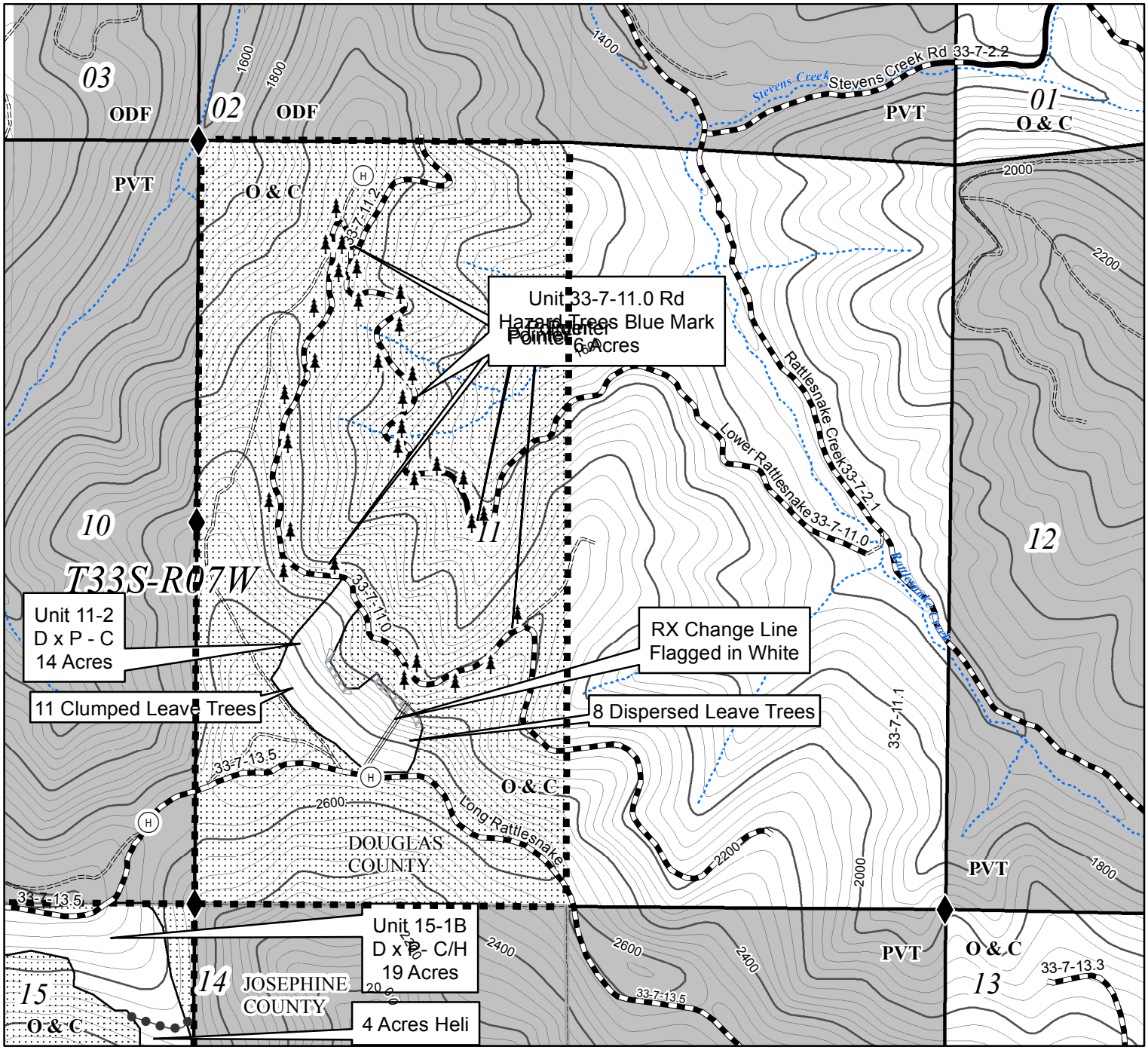
T. 33 S., R. 7 W., SEC. 11 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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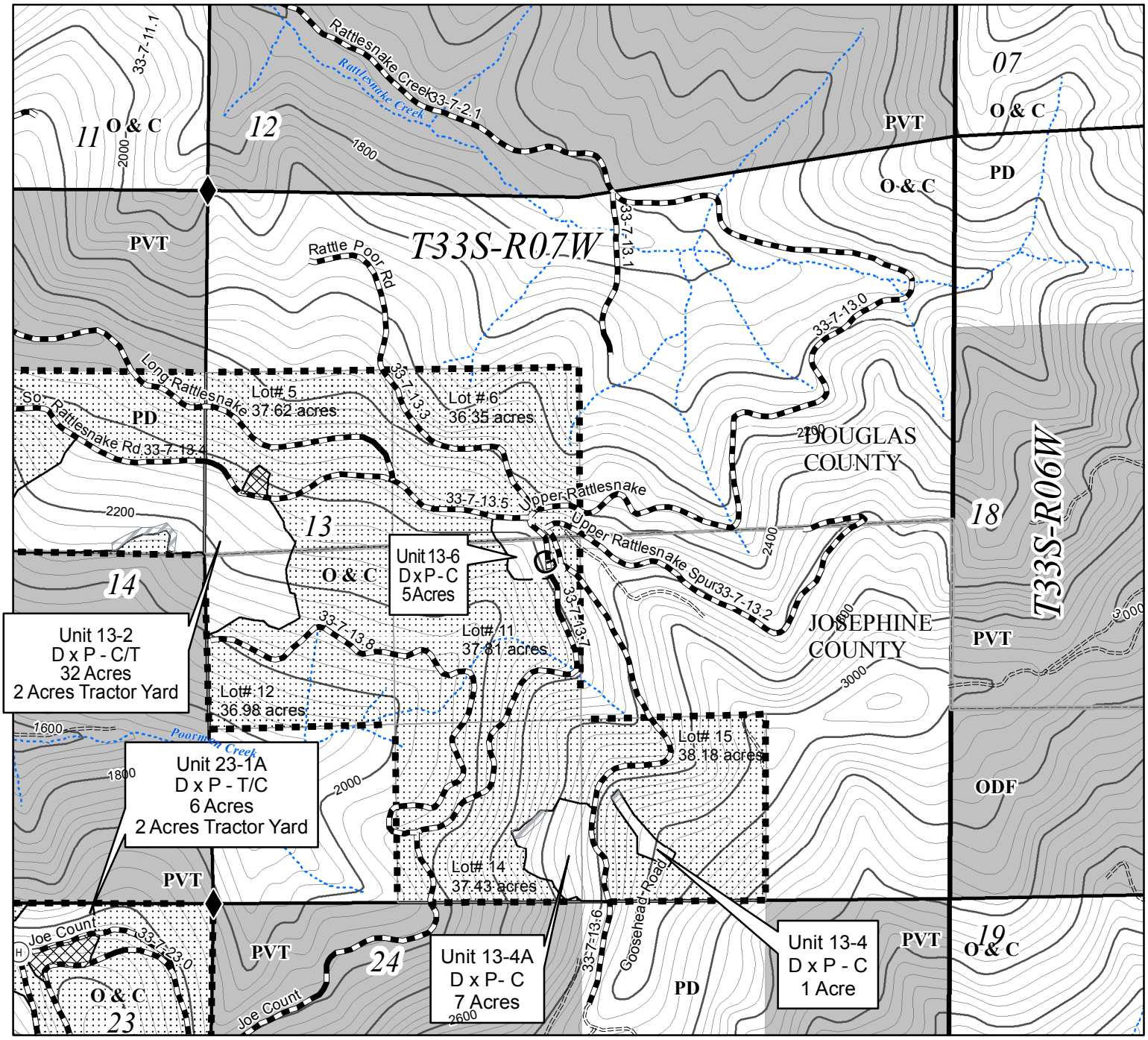
T. 33 S., R. 7 W., SEC. 13 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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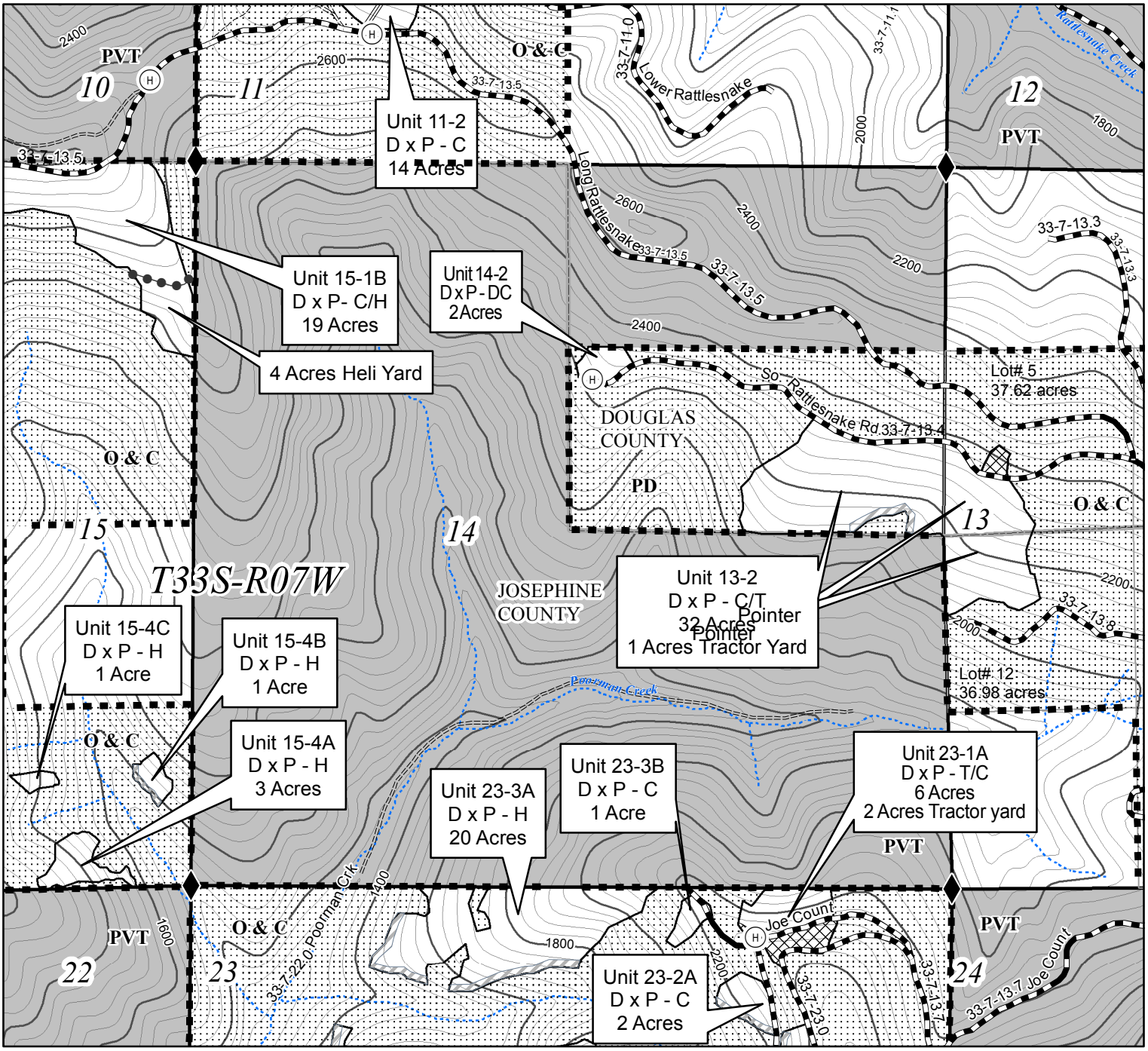
T. 33 S., R. 7 W., SEC. 14 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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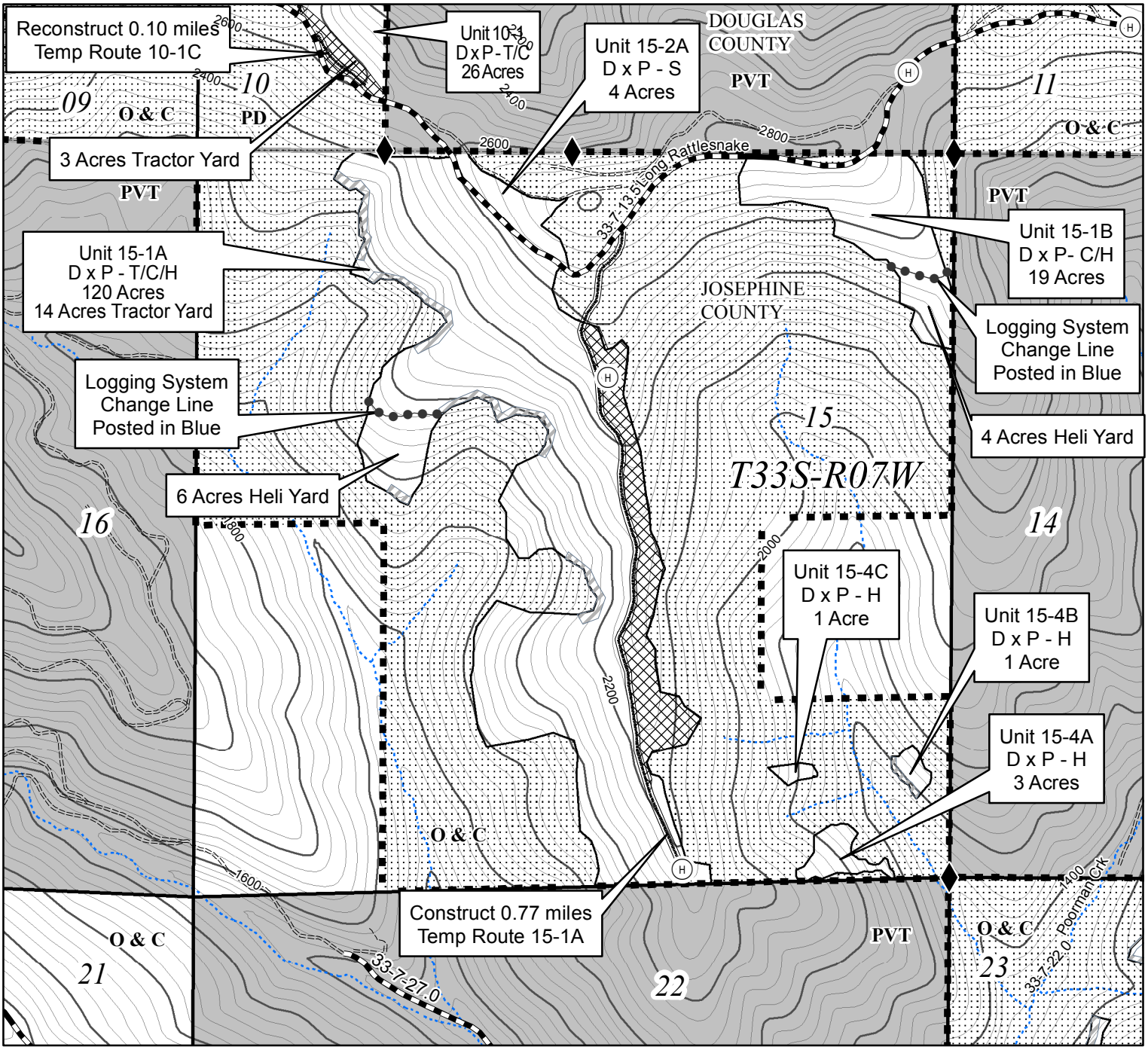
T. 33 S., R. 7 W., SEC. 15 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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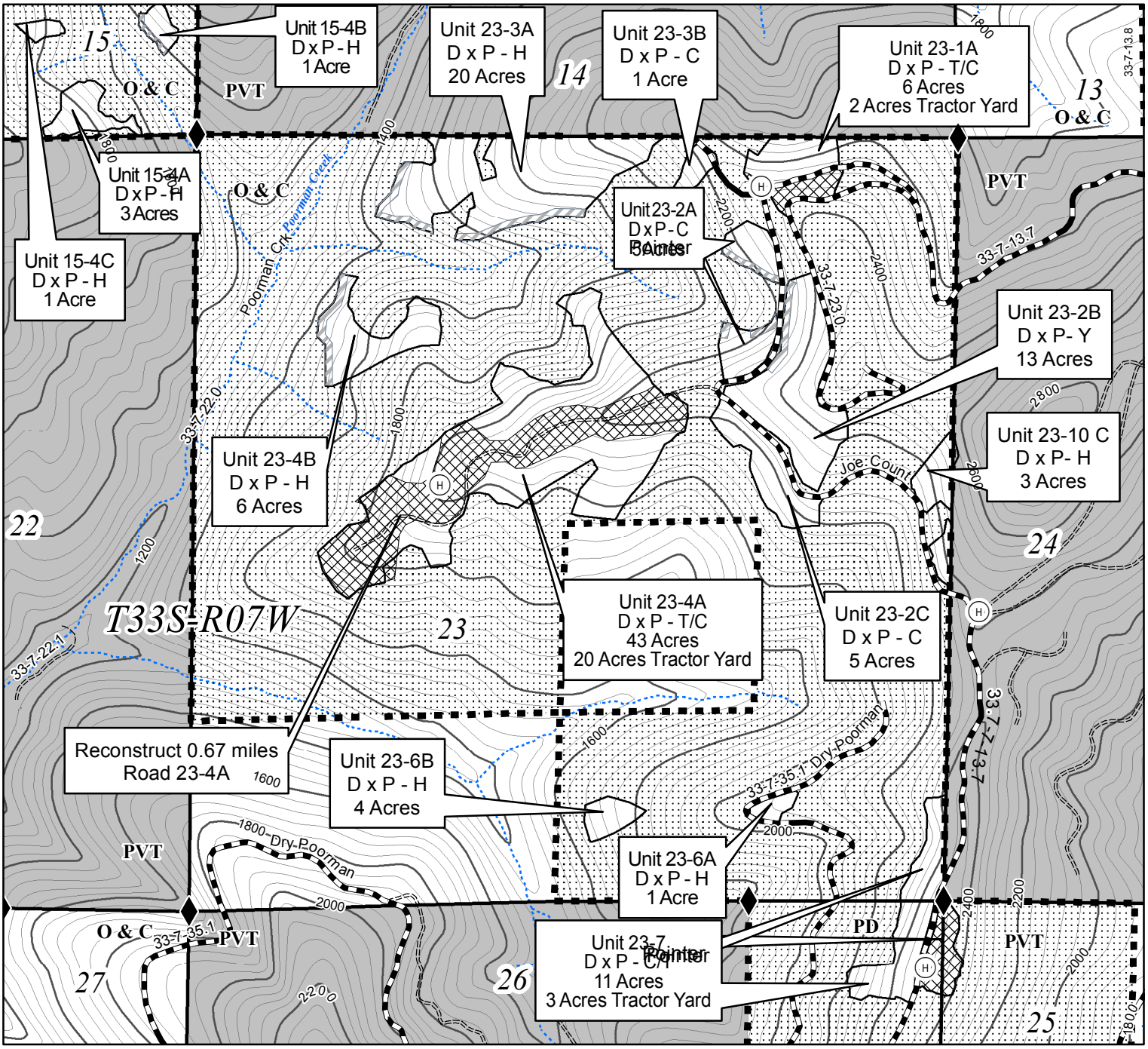
U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 23 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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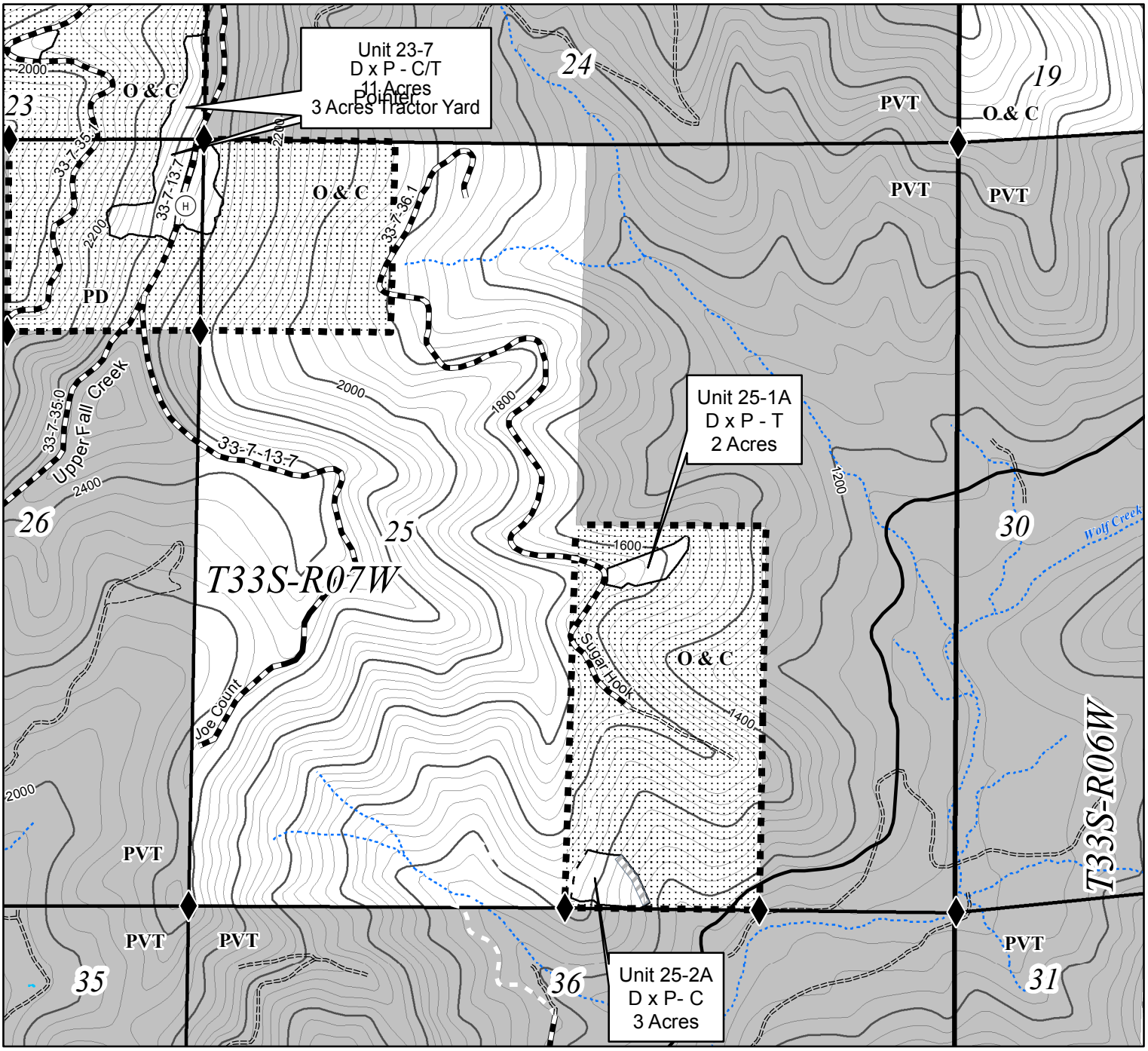
U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 25 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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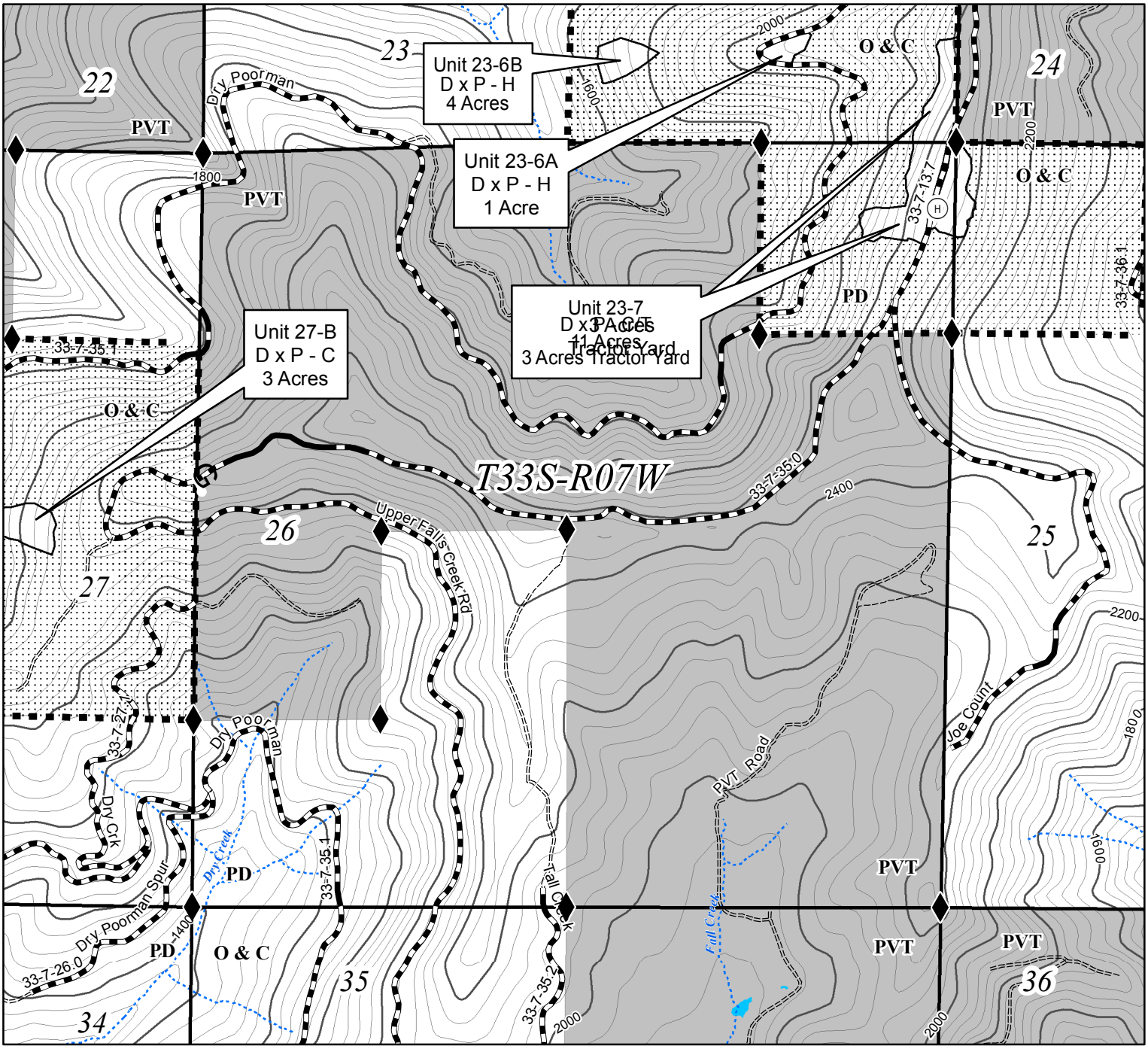
U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 26 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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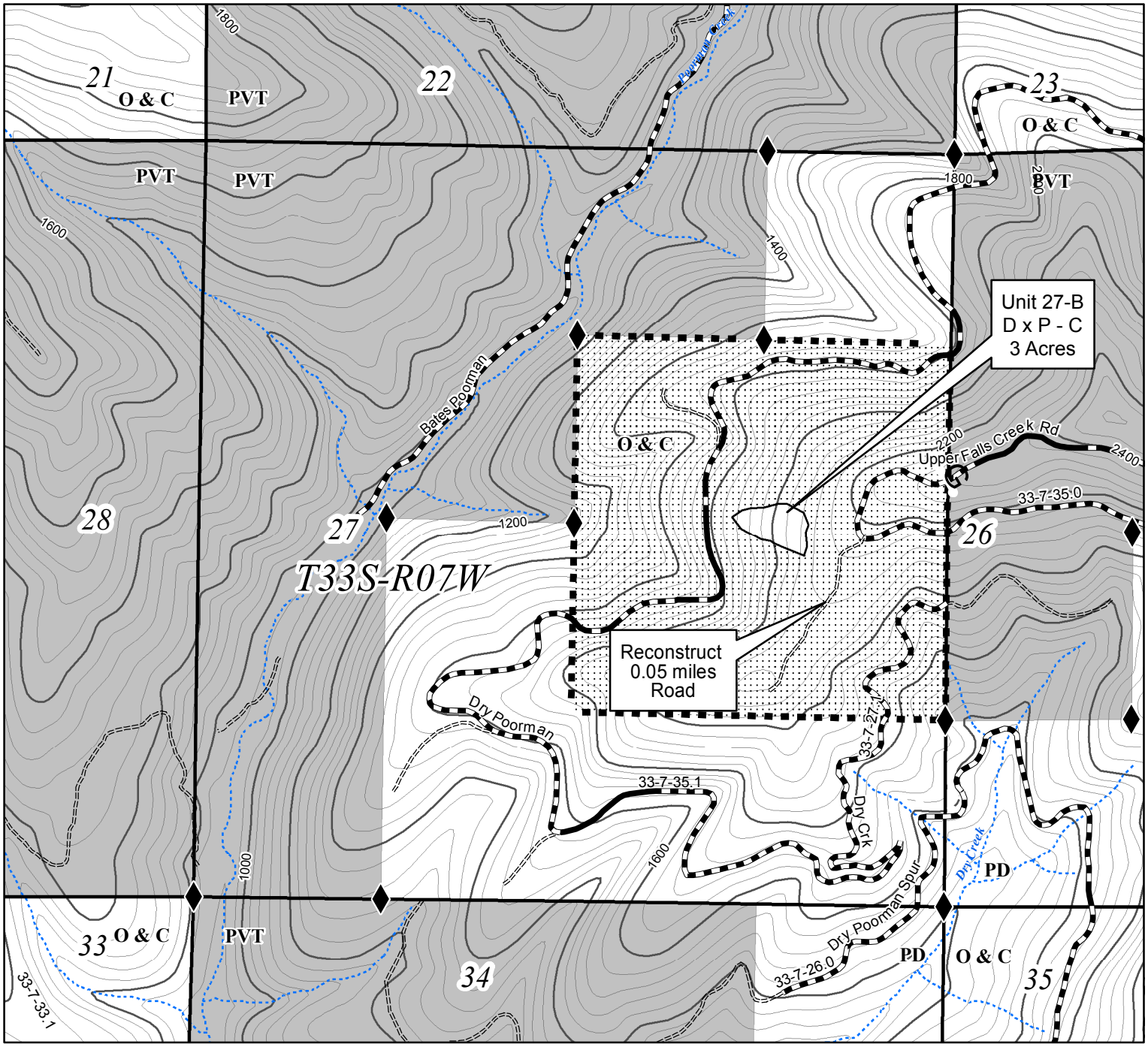
U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 27 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT A



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May 09, 2014

Legend

Road Surface Type

- Rocked Road
- Paved Road
- Natural Surface Road
- Temp Routes
- Helicopter Landings Sites
- Found Monuments Corners/ Brass Caps
- Contour Felling
- Rx Change Line
- Logging Systems Change Line
- Tractor and Shovel Yard Areas
- G Gate
- Contract Boundary
- Reserve Area
- Timber Sale Units

- Index 200 ft Contour
- Intermediate 40 ft Contour
- Perennial and Intermittent
- Waterbody
- County Line
- Range
- Section

Ownership

- BLM
- Non-Federal

Logging System	Harvest Type	Acres
D x P - C	Designation by Prescription- Cable	71
D x P - C/T	Designation by Prescription- Cable and Tractor	121
D x P - H	Designated by Prescription- Helicopter	38
D x P - DC	Designated by Prescription- Down Cable	2
D x P- C/T/H	Designated by Prescription- Cable and Tractor and Helicopter	120
D x P- C/H	Designated by Prescription-Cable and Helicopter	19
D x P - Y	Designated by Prescription- Yoder	5
D x P- T	Designated by Prescription- Tractor	3
D x P - S	Designation by Prescription- Shovel	4
	Timber Sales Area	389
	Reserve Area	1875.4
	Total Contract Area	2264.4

DC Down Cable
H Helicopter
Y Yoder
S Shovel Yard Area
T Tractor (Ground Bases) Yarding
C Cable Yard Area
O&C BLM O & C Land
PD BLM Public Domain Land
PVT Private Lands
ODF Oregon Dept. of Forestry

**Note: Temporary Road (TR#) centerlines are flagged in red.

May 09, 2014

United States Department of the Interior
Bureau of Land Management
Medford District Office
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SUMMARY

UNIT	ACRES	PERSCRIPTION	LOGGING SYSTEM
9-4	12	D X P	C
9-5	3	D X P	C/T
9-9	7	D X P	C
10-1	26	D X P	C/T
11-2	14	D X P	C
13-2	32	D X P	C/T
13-4	1	D X P	C
13-4A	7	D X P	C
13-6	5	D X P	C
14-2	2	D X P	DC
15-1	120	D X P	C/T/H
15-1B	19	D X P	C/H
15-2A	4	D X P	S
15-4A	3	D X P	H
15-4B	1	D X P	H
15-4C	1	D X P	H
23-1A	6	D X P	C/T
23-2A	5	D X P	C
23-2B	13	D X P	C
23-2C	5	D X P	Y
23-3A	20	D X P	H
23-3B	1	D X P	C
23-4A	43	D X P	C/T
23-4B	6	D X P	H
23-6A	1	D X P	T
23-6B	4	D X P	H
23-7	11	D X P	C/T
23-10-C	3	D X P	H
25-1A	2	D X P	T
25-2A	3	D X P	C
27-B	3	D X P	C
BLUE MARKED HAZ TREES	6	D X P	T
TOTAL	389		

Logging System	Acres
Helicopter	49
Cable	264
Downhill Cable	2
Yoder	13
Ground based	57
Shovel	4

* ALL ACRES COMPUTED BY GPS TRAVERSE

*NOTE: TEMPORARY ROAD (TR # CENTERLINES ARE FLAGGED IN RED

May 09, 2014

United States Department of the Interior
Bureau of Land Management
Medford District Office
3040 Biddle Road
Medford, OR 97504
(541) 618-2200

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT (BLM)

Contract No.: ORM07-TS-14-11
Sale Name: Burnt Rattler
Issuing Office: Medford District

EXHIBIT B
SCALE SALE
PURCHASE PRICE SCHEDULE AND MEASUREMENT SPECIFICATIONS

I. **Total Actual Purchase Price** - In accordance with Section 3.(d). of the contract, the Purchaser agrees to pay the Government for the timber sold under the contract in accordance with the following schedule and measurement requirements. Timber sold is comprised of Merchantable Timber, Merchantable Timber Remaining, and Other Timber as defined below. In the event an Extension of Time is approved, the prices per measurement unit are subject to readjustment (refer to Section 9 of the contract).

Schedule of Species, Measurement Units, and Prices		
Species	Measurement Unit	Price Per Measurement Unit
Merchantable logs - Douglas-fir	MBF	
Sugar Pine	MBF	
Ponderosa Pine	MBF	
Utility logs	MBF	Not Applicable

II. **Merchantable Timber** - All timber which can be cut into logs, which equal or exceed the following specifications, shall be considered merchantable timber. Purchaser shall pay for same in accordance with Sec. 3 of the contract at the unit prices shown in Section I of this Exhibit.

Schedule of Minimum Material Specifications			
Species and Products	Length	Diameter (inside bark at small end)	Net Scale
All Species	8 feet	6 inches	33 1/3% of gross volume of any log segment or 10 bf.

III. **Merchantable Timber Remaining - Measurement Requirements** - The remaining volume of any merchantable sold timber on the contract area shall be determined as provided in Section 3.(e). of the contract. Purchaser shall pay for same in accordance with Sec. 3 of the contract at the unit prices shown in Section I of this Exhibit.

IV. **Scaling**

A. **Log Rule and Measurement** - All logs shall be scaled according to the Northwest Log Rules Eastside Log Scaling Handbook, as amended, or supplemented by BLM before the first advertisement date of the sale. A Scaling Authorization Form (OR 5300-18) must be completed prior to

beginning of operations. If sample log scaling is agreeable to Purchaser and the Contracting Officer, the procedures will be agreed upon in writing regarding sample design, number of log sorts, expansion of sample volumes for computation of Merchantable Timber volume, etc.

B. **Scaling Service** - Log scaling services shall be provided and performed by BLM personnel or parties under contract to BLM.

1. All logs shall be scaled and volumes determined by BLM or a certified contract scaler.

2. The BLM scaler or contract scaler is designated to collect Eastside MBF scale data from all loads.

C. **Other Timber** - If any timber is of a species or size not listed in Section II of this Exhibit (above) or is of a quality different from merchantable timber described herein, the Authorized Officer shall establish volumes and values in accord with Standard BLM methods.

D. **Defect Caused by Abnormal Delay** - Scaling deductions made for rot, check or other defect resulting from abnormal delay in scaling caused by Purchaser shall be recorded separately and charged to the Purchaser in accordance with Section 3. of the contract.

E. **Log Presentation** - Purchaser shall present logs so that they may be scaled in an economical and safe manner in accordance with the Memorandum(s) of Agreement for Yard Scaling required in Section IV.G.5. of this Exhibit.

F. **Check Scale** - The Government will conduct check scales as set forth in the following section.

Normally a check scale includes at least 200 short logs (20 feet or less) or at least 100 multiple-segment logs. Sample the species and defect situation as fairly as possible. Individually analyze more complex scaling situations and increase the number of logs check scaled if necessary.

The following standards will be used to determine the proficiency of individual scalers.

Gross Scale. A variance of one percent in gross scale is the standard unless otherwise justified.

Net scale. The allowable variance is as follows:

Check scaler's percent defect in logs	Scalers allowable variance
0-10 percent	2 percent
over 10 percent	.2 x percent defect to a maximum of 5 percent

Determinations as to volume of timber made by a government check scaler in conformance with the standards as set forth herein shall be final.

All loads check scaled by BLM will be identified with the check scaler's initials legibly marked or painted in the face of the first log in each load. When such checks show a variance in scale in excess of acceptable standards, in two or more consecutive check scales, an adjustment to the volume reported as scaled will be made by BLM. Such adjustments will be made based on the difference between available BLM check scales and the original scale during the period covered by the unsatisfactory check scales. Unless otherwise approved in writing by the Authorized Officer, the volume to which this difference will be applied will be 50 percent of the volume scaled between the last satisfactory check and the first unsatisfactory check, 100 percent of the volume scaled during the unsatisfactory check, and 50 percent of the volume between the last unsatisfactory check scale and the next satisfactory check scale.

G. **Accountability**

1. Purchaser shall notify the Authorized Officer three (3) days prior to starting or stopping of hauling operations performed under the contract.

2. All logs will be painted and branded at the landing and accounted for in accordance with Sec. 41(A)(1) of the contract. Each truck driver shall obtain a load receipt and a BLM scaler receipt from the Log Truck Ticket Book issued by the Authorized Officer and comply with the instructions specified on the cover of said book. While products are in transit, the truck driver shall display the load receipt and BLM scaler receipt on the bunk or wing log at the front of the load on the driver's side. All logs on each load shall be delivered to the destination listed on the woods receipt. The BLM scaler receipt shall be surrendered at the location of BLM scaling, the unloading location, or as requested by BLM.

3. The Purchaser shall not haul logs from the contract area on weekends; Memorial Day, Fourth of July, Labor Day, Thanksgiving, Christmas, and New Year's holidays; or outside the hours of 4:00 a.m. to 8:00 p.m. daily, unless otherwise approved in writing by the Authorized Officer or designated in the Approved Logging Plan (Refer to Section 41 (B.10) of the contract).

4. The Purchaser shall furnish BLM a map showing the route which shall be used to haul logs from the timber sale area to the scaling location. Such route shall be the most direct haul route between the two points, unless another route is approved by BLM. The route of haul may be changed only with advance notice to and approval by BLM. The haul route map shall be attached to the Approved Logging Plan.

5. All loads will be scaled at scale locations listed on the Scaling Authorization (Form OR 5300-18) as approved by the Authorized Officer. The Purchaser shall ensure that all scale site owners listed on the Scaling Authorization enter into a Memorandum of Agreement for Yard Scaling before requesting BLM approval of the Scaling Authorization. Areas for scaling BLM logs will be designated on the ground and identified on the yard map as required in the Memorandum(s) of Agreement for Yard

Scaling.

6. Any removal of logs from loaded trucks before being accounted for and/or scaled as required by the contract shall be considered a willful trespass and render the Purchaser liable for damages under applicable law. Any payment made for purchase of such logs shall be deducted from amount due because of trespass.

H. **Scaling Lost Products** - The value of lost loads shall be equal to the highest value load for the month in which the lost load is hauled regardless of where the highest value load is scaled. If no loads have been scaled in that month, value will be determined from the closest month in which loads were scaled.

V. **Estimated Volumes and Values -** The following volume estimates and calculations of value of timber sold are made solely as an administrative aid for determining payment amounts, when payments are due, the value of timber subject to any special bonding provisions, and other purposes specified in various portions of the contract. The cutting areas are shown on Exhibit A of the contract.

A. **Merchantable Timber Volume Removed from Contract Area** - The total volume of removed timber shall be determined using the Government's records of scaled volumes of timber skidded or yarded monthly, or a shorter period if agreed to by the Purchaser and Government, to loading points or removed from the contract area.

B. **Merchantable Timber Not Yet Removed from Contract Area** - The value of merchantable timber which has not been removed will be determined by multiplying the value per acre as shown below times the amount of acreage subject to the purpose of the value determination, as determined by the Authorized Officer:

Total Estimated Purchase Price And/Or Schedule of Volumes and Values for Merchantable Timber Not Yet Removed from Contract Area					
Cutting Area		Total Estimated Volume (MBF)		Total Estimated Purchase Price	
Cutting Area Number	Approximate Number of Acres	Volume per Acre	Total Volume	Value per Acre	Total Value
9-4	12	24.5	294		
9-5	3	24.3	73		
9-9	7	24.4	171		
10-1	26	24.4	635		
11-2	12	24.5	294		
13-2	32	24.4	780		
13-4	1	24.0	24		
13-4A	7	24.4	171		

13-6	5	24.2	121		
14-2	2	24.5	49		
15-1A	120	24.4	2,933		
15-1B	19	24.4	463		
15-2A	4	24.3	97		
15-4A	3	27.3	82		
15-4B	1	27.0	27		
15-4C	1	27.0	27		
23-1A	6	24.3	146		
23-2A	5	24.2	121		
23-2B	13	24.4	317		
23-2C	5	24.2	121		
23-3A	20	27.3	546		
23-3B	1	24.0	24		
23-4A	43	24.4	1,050		
23-4B	6	27.3	164		
23-6A	1	24.0	24		
23-6B	4	27.3	109		
23-7	11	24.4	268		
23-10C	3	27.3	82		
25-1A	2	24.5	49		
25-2A	3	24.3	73		
27-2B	3	27.3	82		
33-7-11.0	6	7.7	46		
Sale Totals	387	24.5	9,463		

OVERNIGHT LOAD CONTROL RECORD	
Log Delivery Location	
Timber Sale	
1	Time and Date Load Delivered
2	Sale Name
3	Load Receipt No.
4	Number of Logs
5	Signature of Person Receiving the Load
6	Date and Time Load Released
7	Signature of Person Releasing the Load

Instructions:

1. Designated individual fills out the heading and lines 1 through 5 (including FULL SIGNATURE in ink on line 5.)

2. Contractor or BLM scaler will fill out lines 6 and 7 (including FULL SIGNATURE in ink) when loads are released for scaling, otherwise the BLM and/or yard owner will be required to sign.

3. Unless otherwise agreed, scaler will attach this form to the Load Receipt.

OVERNIGHT LOAD CONTROL RECORD	
Log Delivery Location	
Timber Sale	
1	Time and Date Load Delivered
2	Sale Name
3	Load Receipt No.
4	Number of Logs
5	Signature of Person Receiving the Load
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2. Contractor or BLM scaler will fill out lines 6 and 7 (including FULL SIGNATURE in ink) when loads are released for scaling, otherwise the BLM and/or yard owner will be required to sign.

3. Unless otherwise agreed, scaler will attach this form to the Load Receipt.

United States of America

Department of the Interior

Bureau Of Land Management

Timber Sale Appraisal

District :	Medford	**Contract # :**	ORM07-TS14-11
Sale Name :	Burnt Rattler	**Job File # :**	M11301
Sale Date :	07/24/2014	**Master Unit :**	Josephine
Appraisal Method :	16' MBF	**Planning Unit :**	Grants Pass

Contents

Exhibit B 2

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Exhibit B

The following estimates and calculations of timber sold are made solely as an administrative aid for determining: (1) Adjustments made or credits given in accordance with Sections 6, 9, or 11; (2) When payments are due; and (3) Value of timber subject to any special bonding provisions. The value of timber will be determined by multiplying the value per acre as shown below, times the amount of acreage as determined by the authorized officer, which has been cut or removed or designated for taking.

Except provided in Section 2, Purchaser shall be liable for the total purchase price even though the quantity of timber actually cut or removed or designated for taking is less than the estimated volume or quantity shown. Cutting areas are shown on the Exhibit A.

Sale Totals (16' MBF)

Species	Net Volume	Bid Price	Sale SubTotal
Douglas-fir	7,444		
Sugar Pine	1,117		
Ponderosa Pine	901		
Incense-cedar	1		
Sale Totals	**9,463**		

Unit Details (16' MB)

Unit 10-1 **26 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	502		
Ponderosa Pine	62		
Sugar Pine	71		
Unit Totals	**635**		

Unit 11-2 **14 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	232		
Ponderosa Pine	29		
Sugar Pine	33		
Unit Totals	**294**		

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Unit 13-2 **32 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	618		
Ponderosa Pine	75		
Sugar Pine	87		
Unit Totals	**780**		

Unit 13-4 **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	19		
Ponderosa Pine	2		
Sugar Pine	3		
Unit Totals	**24**		

Unit 13-4A **7 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	135		
Ponderosa Pine	17		
Sugar Pine	19		
Unit Totals	**171**		

Unit 13-6 **5 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	97		
Ponderosa Pine	11		
Sugar Pine	13		
Unit Totals	**121**		

Unit 14-2 **2 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	39		
Ponderosa Pine	5		
Sugar Pine	5		
Unit Totals	**49**		

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Unit 15-1A **120 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	2,319		
Ponderosa Pine	287		
Sugar Pine	327		
Unit Totals	**2,933**		

Unit 15-1B **19 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	367		
Ponderosa Pine	45		
Sugar Pine	51		
Unit Totals	**463**		

Unit 15-2A **4 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	77		
Ponderosa Pine	9		
Sugar Pine	11		
Unit Totals	**97**		

Unit 15-4A **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	61		
Ponderosa Pine	7		
Sugar Pine	14		
Unit Totals	**82**		

Unit 15-4B **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	20		
Ponderosa Pine	2		
Sugar Pine	5		
Unit Totals	**27**		

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Unit 15-4C **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	20		
Ponderosa Pine	2		
Sugar Pine	5		
Unit Totals	**27**		

Unit 23-10C **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	61		
Ponderosa Pine	7		
Sugar Pine	14		
Unit Totals	**82**		

Unit 23-1A **6 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	116		
Ponderosa Pine	14		
Sugar Pine	16		
Unit Totals	**146**		

Unit 23-2A **5 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	97		
Ponderosa Pine	11		
Sugar Pine	13		
Unit Totals	**121**		

Unit 23-2B **13 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	251		
Ponderosa Pine	31		
Sugar Pine	35		
Unit Totals	**317**		

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Unit 23-2C **5 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	97		
Ponderosa Pine	11		
Sugar Pine	13		
Unit Totals	**121**		

Unit 23-3A **20 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	406		
Ponderosa Pine	47		
Sugar Pine	93		
Unit Totals	**546**		

Unit 23-3B **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	19		
Ponderosa Pine	2		
Sugar Pine	3		
Unit Totals	**24**		

Unit 23-4A **43 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	831		
Ponderosa Pine	102		
Sugar Pine	117		
Unit Totals	**1,050**		

Unit 23-4B **6 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	122		
Ponderosa Pine	14		
Sugar Pine	28		
Unit Totals	**164**		

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Unit 23-6A **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	19		
Ponderosa Pine	2		
Sugar Pine	3		
Unit Totals	**24**		

Unit 23-6B **4 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	81		
Ponderosa Pine	9		
Sugar Pine	19		
Unit Totals	**109**		

Unit 23-7 **11 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	212		
Ponderosa Pine	26		
Sugar Pine	30		
Unit Totals	**268**		

Unit 25-1A **2 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	39		
Ponderosa Pine	5		
Sugar Pine	5		
Unit Totals	**49**		

Unit 25-2A **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	58		
Ponderosa Pine	7		
Sugar Pine	8		
Unit Totals	**73**		

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Unit 27-B **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	61		
Ponderosa Pine	7		
Sugar Pine	14		
Unit Totals	**82**		

Unit 9-4 **12 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	232		
Ponderosa Pine	29		
Sugar Pine	33		
Unit Totals	**294**		

Unit 9-5 **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	58		
Ponderosa Pine	7		
Sugar Pine	8		
Unit Totals	**73**		

Unit 9-9 **7 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	135		
Ponderosa Pine	17		
Sugar Pine	19		
Unit Totals	**171**		

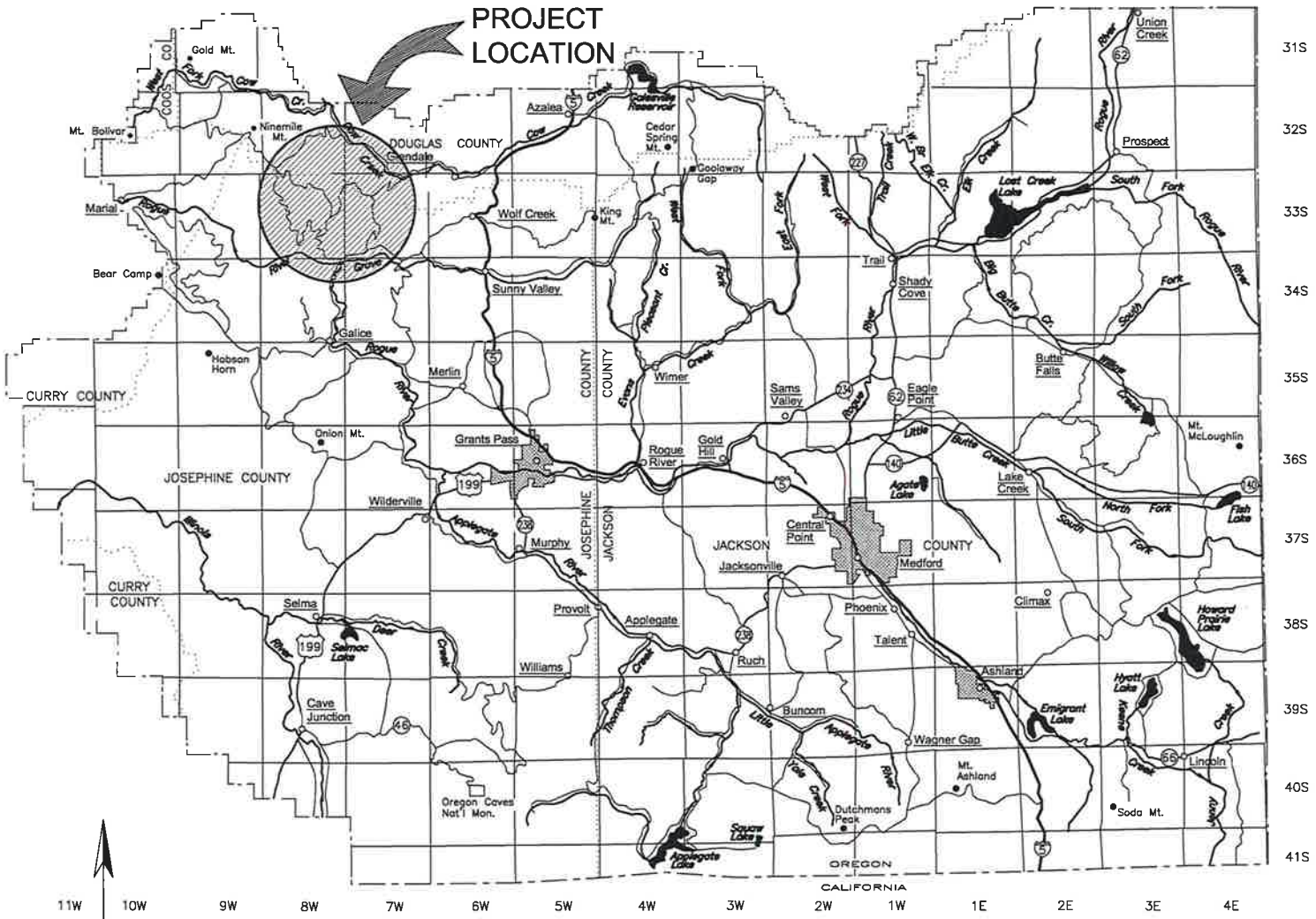
Unit RD11 **6 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	43		
Incense-cedar	1		
Ponderosa Pine			
Sugar Pine	2		
Unit Totals	**46**		

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT

EXHIBIT C1
SHEET 1 OF 1

BURNT RATTLER
TIMBER SALE
TRACT NO. ORM07-TS-14-11



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THINK
SAFETY

EXHIBIT NO.	DESCRIPTION
C1	TITLE SHEET
C2	ROAD RENOVATION MAPS
C3	ESTIMATE OF QUANTITIES
C4	SPECIFICATION SHEET
C5	TYPICAL ROAD DATA
C6	DRAINAGE & EROSION CONTROL DETAILS
C7	ROADSIDE BRUSHING DETAIL
C8	ROAD RENOVATION WORKLIST
C9	WRITTEN SPECIFICATIONS
C10	SPECIAL PROVISIONS
D1	ROAD MAINTENANCE SPECIFICATIONS
D2	ROAD MAINTENANCE MAP

REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE SPECIFICATION SHEET

DESIGNED:
REVIEWED:
APPROVED: E. Freeman

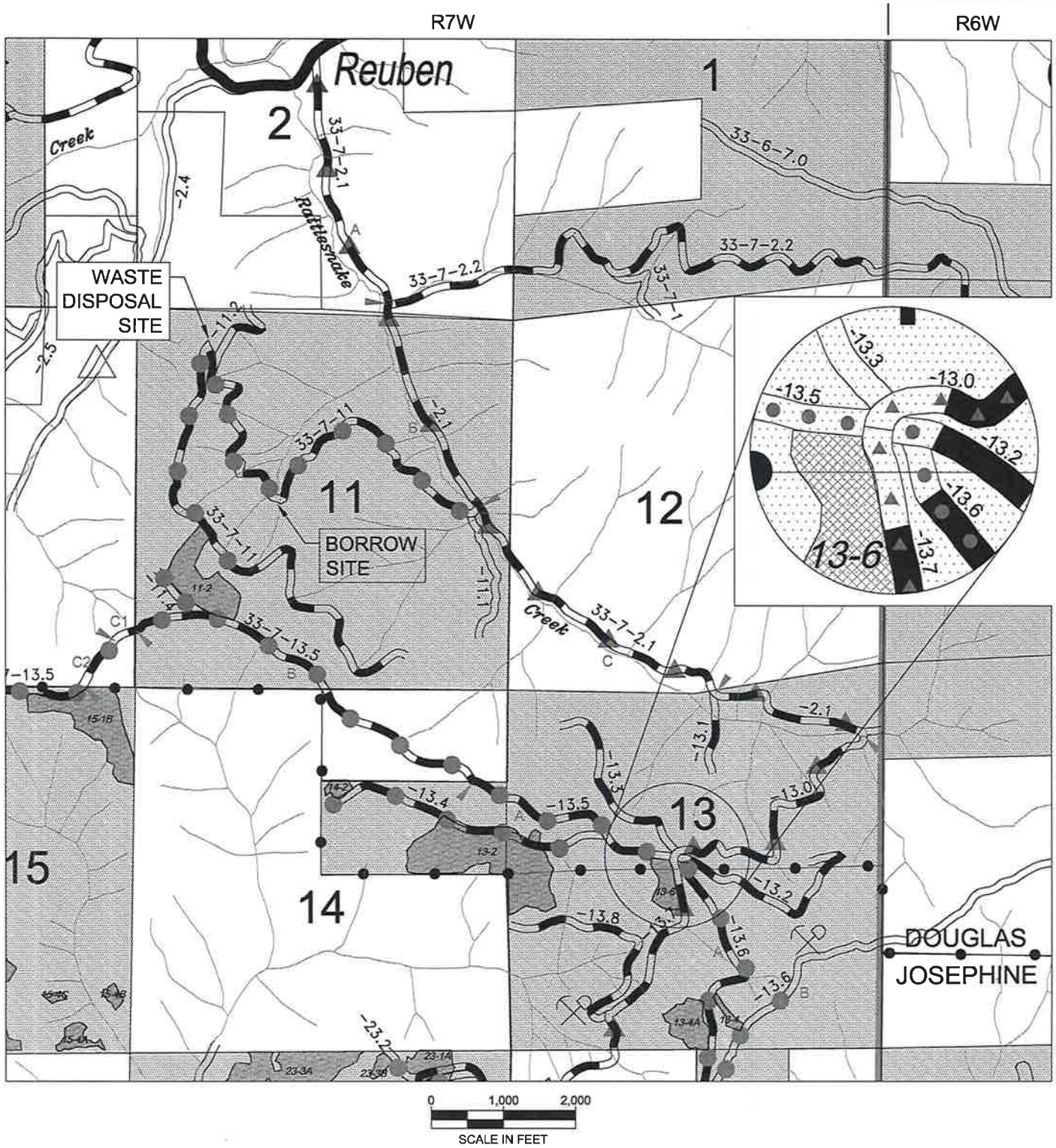
DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 1 OF 1

DRAWING NO.: OR-11-9113.4-1

EXHIBIT C2

SHEET 1 OF 3

BURNT RATTLER T.S.
TRACT NO. ORM07-TS-14-11



BLM OWNERSHIP

T.S. UNITS 20-1

BST ROAD

CRUSHED ROCKED ROAD

NATURAL SURFACE ROAD

PRIVATE ROAD

GATE

TEMPORARY ROUTE (TR)

BLM RENOVATION

PURCHASER RENOVATION

N

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REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE ROAD RENOVATION MAP

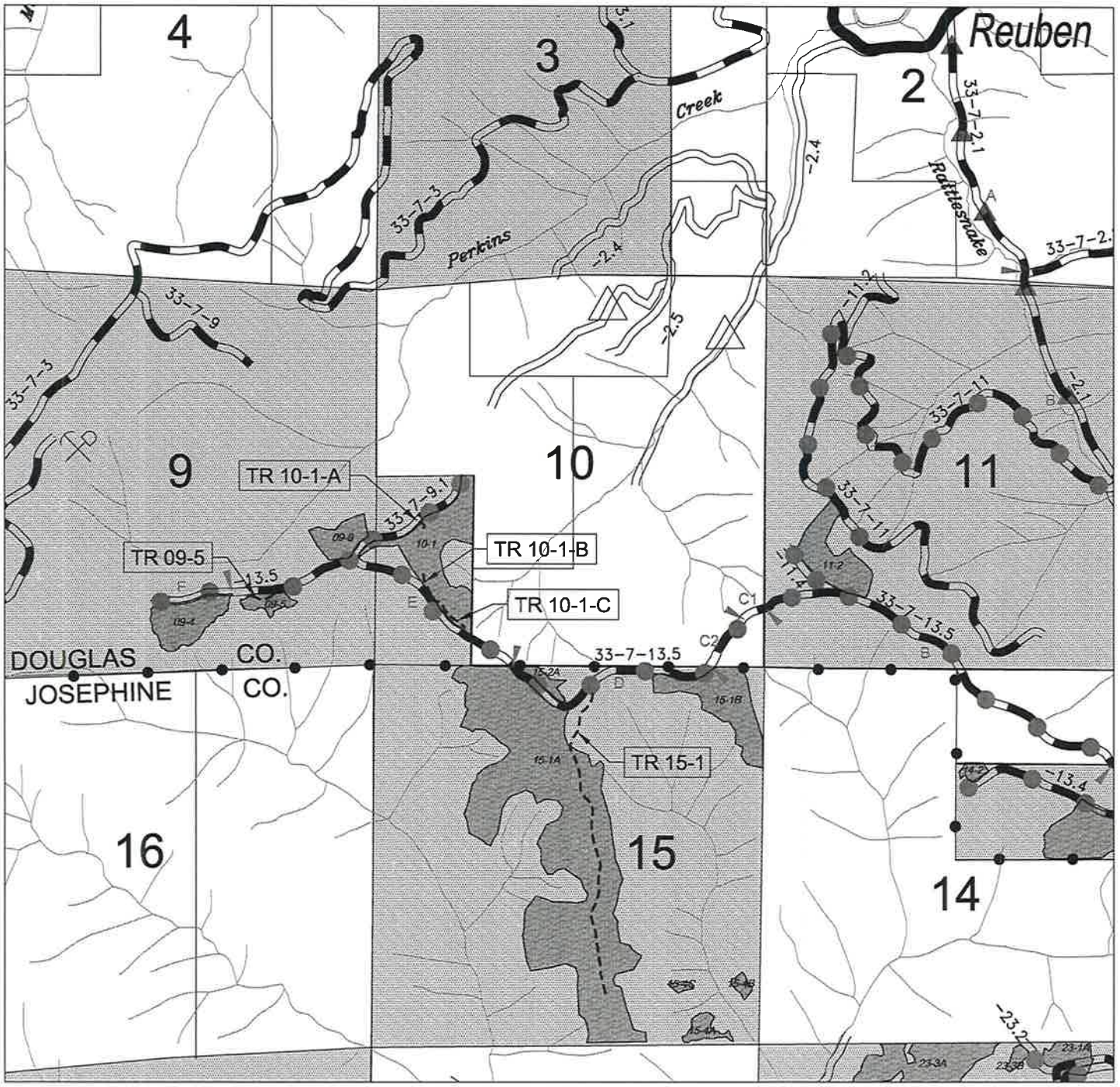
DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: 1" = 2,000 FT
DATE: JUN 2014	SHEET: 1 OF 3
DRAWING NO.: OR-11-9113.4-1	

EXHIBIT C2

SHEET 2 OF 3

BURNT RATTLER T.S.
TRACT NO. ORM07-TS-14-11



BLM OWNERSHIP

T.S. UNITS 20-1

BST ROAD

CRUSHED ROCKED ROAD

NATURAL SURFACE ROAD

PRIVATE ROAD

GATE

TEMPORARY ROUTE (TR)

BLM RENOVATION

PURCHASER RENOVATION

N

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REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE ROAD RENOVATION MAP

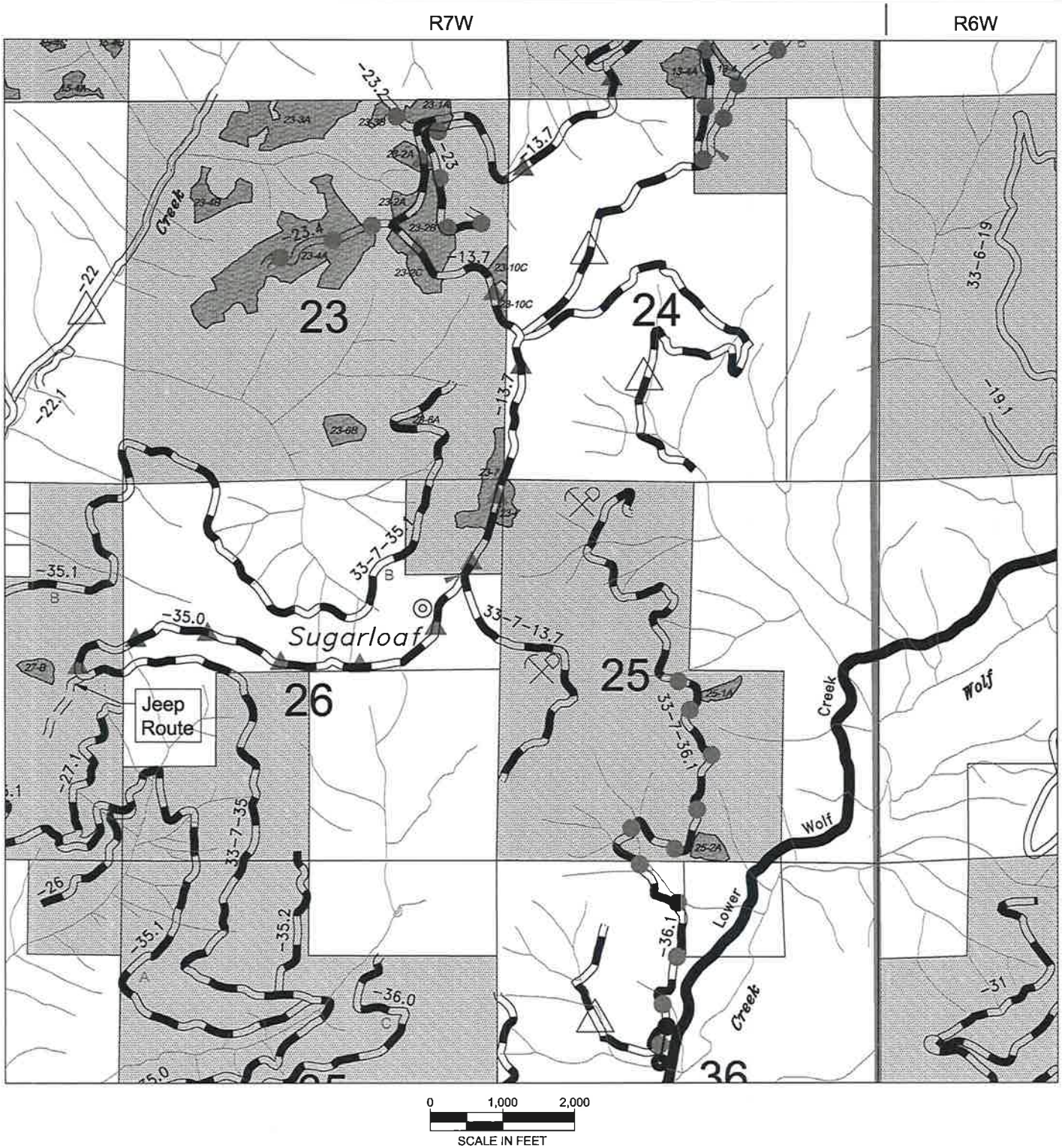
DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: 1" = 2,000 FT
DATE: JUN 2014	SHEET: 2 OF 3
DRAWING NO.: OR-11-9113.4-1	

EXHIBIT C2

SHEET 3 OF 3

BURNT RATTLER T.S.
TRACT NO. ORM07-TS-14-11



REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE ROAD RENOVATION MAP

DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: 1" = 2,000 FT
DATE: JUN 2014	SHEET: 3 OF 3
DRAWING NO.: OR-11-9113.4-1	

EXHIBIT C3
SHEET 1 OF 2

ROAD NUMBER	FROM (M.P.)	TO (M.P.)	LENGTH (MILES)	CLEARING AND GRUBBING	EXCAVATION		DRAINAGE									RENOVATION					AGGREGATE			SOIL STABILIZATION	ROADSIDE BRUSHING	MISCELLANEOUS					
							CORRUGATED METAL PIPE 16 GA																								
							SIZE					DOWNSPOUT																			
												FULL ROUND		HALF ROUND																	
					ROCK	COMMON	18"	24"	30"	36"	ELBOWS	18"	24"	18"	24"	BLADE, WATER, & COMPACT EX. ROAD	DITCH CLEANING	CULVERT CLEANING	SCARIFICATION	BORROW MATERIAL	PIT RUN	CRUSHED BASE ROCK	RIP RAP			INSTALL EROS. CONTROL DEVICES	RECONSTRUCT EX. WATERDIPS	CONSTRUCT WATERBARS	CONSTRUCT WATERDIPS	CONTINUOUS RIPPING	INSTALL OR RECONST. EX. BARRICADE
SPECIFICATION NO. →				200	300		400									500					700	1000		1800	2100	8000					
UNITS →	MP	MP	MILE	ACRE	CY	CY	LF	LF	LF	LF	EA	LF	LF	LF	LF	MILE	MI	MI	MI	CY	CY	CY	CY	ACRE	ACRE	SITE	EA	EA	EA	MI	EA
33-7-09.1	0.00	0.37	0.37													0.37		0.37							0.40						
33-7-11.0 (A-B)	0.00	2.04	2.04			30										2.04	1.80	2.04		5				0.40	1.90	1					
33-7-11.4	0.00	0.20	0.20													0.20		0.20							0.20						
33-7-13.2	0.00	0.02	0.02													0.02		0.02							0.02						
33-7-13.4	0.00	0.79	0.79													0.79		0.79							0.80		1				
33-7-13.5 (A-E)	0.00	3.49	3.49													3.49		3.49							3.40						
33-7-13.5 (F)	3.49	3.70	0.21													0.21								0.40	0.20			4			1
33-7-13.6 (A-B)	0.00	1.17	1.17													1.17		1.17							1.10						
33-7-23.0	0.00	0.59	0.59													0.59		0.59							0.60						
33-7-23.2	0.00	0.12	0.12													0.12		0.12							0.10						
33-7-23.4	0.00	0.38	0.38													0.38								0.40	0.40			5		1	1
33-7-36.1	0.00	1.51	1.51													1.51		1.51							1.50						
TOTALS			10.89			30										10.89	1.80	10.30		5				1.20	10.62	1	1	9		1	2

RENOVATION NOTES

1. ROADS LISTED FOR SURFACE RESHAPING SHALL CONSIST OF BLADING, WATERING, & ROLLING PER CONTRACT SPECIFICATIONS & DRAWINGS.

2. DITCH/CULVERT CLEANING SHALL CONSIST OF DITCH BLADING AND RESHAPING, CLEARING DEBRIS, VEGETATION, SEDIMENT, ROCK AND ALL OTHER MATERIAL HINDERING THE FLOW OF RUNOFF PER CONTRACT SPECIFICATIONS & DRAWINGS.

*FOR INFORMATIONAL USE ONLY.
QUANTITIES SHOWN ARE NOT PAY ITEMS.

AGGREGATE GRADATION REQUIREMENTS

ITEM 900

SIZE	GRADATION
4 inch	A
3 inch	B
2 inch	C
1 1/2 inch	D

ITEM 1000

SIZE	GRADATION
3 inch	A,C,F
2 inch	B,D,G,H

ITEM 1200

SIZE	GRADATION
1 1/2 inch	C,C-1
1 inch	D,D-1
3/4 inch	E,E-1

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REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER
TIMBER SALE
ESTIMATE OF QUANTITIES

DESIGNED:
REVIEWED:
APPROVED: E. Freeman

DRAFTED BY: ELF | SCALE: NONE
DATE: JUN 2014 | SHEET: 1 OF 2
DRAWING NO.: OR-11-9113.4-1

EXHIBIT C3
SHEET 2 OF 2

ROAD NUMBER	FROM (M.P.)	TO (M.P.)	LENGTH (MILES)	CLEARING AND GRUBBING	EXCAVATION		DRAINAGE									RENOVATION				AGGREGATE					MISCELLANEOUS					
							CORRUGATED METAL PIPE 16 GA																							
							SIZE					DOWNSPOUT																		
												FULL ROUND		HALF ROUND																
					ROCK	COMMON	18"	24"	30"	36"	ELBOWS	18"	24"	18"	24"	BLADE, WATER, & COMPACT EX. ROAD	DITCH & CULVERT CLEANING	SCARIFICATION	BORROW MATERIAL	PIT RUN	CRUSHED BASE ROCK	RIP RAP	SOIL STABILIZATION	ROADSIDE BRUSHING	INSTALL EROS. CONTROL DEVICES	RECONSTRUCT EX. WATERDIPS	CONSTRUCT WATERBARS	CONSTRUCT WATERDIPS	REMOVE EX. BARRICADE	CONSTRUCT BARRICADE
SPECIFICATION NO. →				200	300		400									500				700	1000		1800	2100	8000					
UNITS →	MP	MP	MILE	ACRE	CY	CY	LF	LF	LF	LF	EA	LF	LF	LF	LF	MILE	MILE	MILE	CY	CY	CY	CY	ACRE	ACRE	SITE	EA	EA	EA	EA	EA
TEMP ROUTE RECONSTRUCTION:																														
Jeep Route	0.00	0.05	0.05													0.05		0.05					0.10	0.10			1		1	1
Temp Rte 09-5	0.00	0.08	0.08													0.08		0.08					0.20	0.10			1			2
Temp Rte 10-1-A	0.00	0.03	0.03													0.03		0.03					0.10	0.10			1			1
Temp Rte 10-1-B	0.00	0.06	0.06													0.06		0.06					0.10	0.10			1			1
Temp Rte 10-1-C	0.00	0.10	0.10													0.10							0.20	0.10			2			1
TEMP ROUTE NEW CONSTRUCTION:																														
Temp Rte 15-1A	0.00	0.77	0.77	1.50		2963										0.77					358		1.50				8	2		1
TOTALS			1.09	1.50		2963										1.09		0.22			358		2.20	0.50			14	2	1	7

RENOVATION NOTES

1. ROADS LISTED FOR SURFACE RESHAPING SHALL CONSIST OF BLADING, WATERING, & ROLLING PER CONTRACT SPECIFICATIONS & DRAWINGS.

2. DITCH/CULVERT CLEANING SHALL CONSIST OF DITCH BLADING AND RESHAPING, CLEARING DEBRIS, VEGETATION, SEDIMENT, ROCK AND ALL OTHER MATERIAL HINDERING THE FLOW OF RUNOFF PER CONTRACT SPECIFICATIONS & DRAWINGS.

*FOR INFORMATIONAL USE ONLY.
QUANTITIES SHOWN ARE NOT PAY ITEMS.

AGGREGATE GRADATION REQUIREMENTS

ITEM 900

SIZE	GRADATION
4 inch	A
3 inch	B
2 inch	C
1 1/2 inch	D

ITEM 1000

SIZE	GRADATION
3 inch	A,C,F
2 inch	B,D,G,H

ITEM 1200

SIZE	GRADATION
1 1/2 inch	C,C-1
1 inch	D,D-1
3/4 inch	E,E-1

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SAFETY

REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER
TIMBER SALE
ESTIMATE OF QUANTITIES

DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 2 OF 2
DRAWING NO.: OR-11-9113.4-1	

EXHIBIT C4
SHEET 1 OF 3

ROAD NUMBER	FROM (M.P.)	TO (M.P.)	LENGTH (MILES)	TYPICAL STATION TYPE	ALIGNMENT: MAXIMUM DEGREE OF CURVE	ROAD WIDTH [1-3]: SUBGRADE	ROAD WIDTH [1-3]: DITCH	GRADIENT: MAXIMUM FAVORABLE	GRADIENT: MAXIMUM ADVERSE	BRUSHING WIDTH: BEYOND: TOP CUT	BRUSHING WIDTH: BEYOND: TOE FILL	BRUSHING WIDTH: EXISTING ROAD(S): L	BRUSHING WIDTH: EXISTING ROAD(S): R	SURFACING [3]: BASE COURSE: MINIMUM WIDTH	SURFACING [3]: BASE COURSE: COMPACTION DEPTH	SURFACING [3]: BASE COURSE: TYPE [2]	SURFACING [3]: BASE COURSE: GRADING	SURFACING [3]: SURFACE COURSE: MINIMUM WIDTH	SURFACING [3]: SURFACE COURSE: COMPACTION DEPTH	SURFACING [3]: SURFACE COURSE: TYPE [2]	SURFACING [3]: SURFACE COURSE: GRADING	REMARKS
33-7-09.1	0.00	0.37	0.37	1		16'	-					4	4							NAT		
33-7-11.0 (A)	0.00	1.80	1.80	6		16'	3'					4	4							B		
33-7-11.0 (B)	1.80	2.04	0.24	2		16'	-					4	4							D		
33-7-11.4	0.00	0.20	0.20	1		16'	-	AS-BUILT	AS-BUILT			4	4							NAT		
33-7-13.2	0.00	0.02	0.02	2		17'	-					4	4							B		
33-7-13.4	0.00	0.79	0.79	2		17'	-					4	4							D		
33-7-13.5 (A-E)	0.00	3.49	3.49	2		17'	-					4	4							D		
33-7-13.5 (F)	3.49	3.70	0.21	1		14'	-					4	4							NAT		
33-7-13.6 (A)	0.00	0.81	0.81	2		16'	-					4	4							D		
33-7-13.6 (B)	0.81	1.17	0.36	1		16'	-					4	4							NAT		
33-7-23.0	0.00	0.59	0.59	2		16'	-					4	4							B		
33-7-23.2	0.00	0.12	0.12	1		14'	-					4	4							NAT		
33-7-23.4	0.00	0.38	0.38	3		14'	-					4	4							NAT		

NOTES

1. EXTRA SUB-GRADE WIDTHS
   TO EACH FILL SHOULDER, ADD 1 FOOT FOR FILLS OF 1-6 FEET AND 2 FEET FOR FILLS OVER 6 FEET. WIDEN THE INSIDE SHOULDER OF ALL CURVES AS FOLLOWS WHEN THE DEGREE OF CURVE EQUALS:
   - 7-21 ADD 1 FT.
   - 22-35 ADD 2 FT.
   - 36-48 ADD 3 FT.
   - 49-64 ADD 4 FT.
   - 65-96 ADD 5 FT.

MATERIALS	CUT SLOPE	FILL SLOPE
COMMON	1/2 : 1	1 1/2 : 1
SOFT ROCK & SHALE	1/2 : 1	1 1/2 : 1
SOLID ROCK	1/2 : 1	angle of repose

2. SURFACING TYPES
   - A. PIT RUN ROCK
   - B. GRID ROLLED ROCK MATERIAL
   - C. SCREENED ROCK MATERIAL
   - D. CRUSHED ROCK MATERIAL

3. TURNOUTS
   - A. WIDTH 10 FT. IN ADDITION TO SUB-GRADE WIDTH, OR AS SHOWN ON THE PLANS.
   - B. LOCATED APPROXIMATELY, AS SHOWN ON THE ROAD PLANS.
   - C. INVISIBLE AND NOT MORE THAN 750 FT. APART.

4. SURFACING
   TURNOUTS, CURVE WIDENING, AND ROAD APPROACH APRONS SHALL BE SURFACED.

5. CLEARING WIDTH
   SEE SUBSECTION 2100

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REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER
TIMBER SALE
SPECIFICATION SHEET

DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF | SCALE: NONE
DATE: JUN 2014 | SHEET: 1 OF 3
DRAWING NO.: OR-11-9113.4-1

EXHIBIT C4
SHEET 2 OF 3

ROAD NUMBER	FROM (M.P.)	TO (M.P.)	LENGTH (MILES)	TYPICAL STATION TYPE	ALIGNMENT	ROAD WIDTH 1-3		GRADIENT		BRUSHING WIDTH				SURFACING 3								REMARKS
										BEYOND		EXISTING ROAD(S)		BASE COURSE				SURFACE COURSE				
					MAXIMUM DEGREE OF CURVE	SUBGRADE	DITCH	MAXIMUM FAVORABLE	MAXIMUM ADVERSE	TOP CUT	TOE FILL	L	R	MINIMUM WIDTH	COMPACTION DEPTH	TYPE 2	GRADING	MINIMUM WIDTH	COMPACTION DEPTH	TYPE 2	GRADING	
33-7-36.1	0.00	1.51	1.51	2		16'	-					4	4							B		
TEMP ROUTE RECONSTRUCTION:																						
Temp Rte 09-5	0.00	0.08	0.08	3		12'	-					4	4							NAT		
Temp Rte 10-1-A	0.00	0.03	0.03	3		12'	-					4	4							NAT		
Temp Rte 10-1-B	0.00	0.06	0.06	3		12'	-					4	4							NAT		
Temp Rte 10-1-C	0.00	0.10	0.10	3		12'	-					4	4							NAT		
Jeep Route	0.00	0.05	0.05	3		12'	-					4	4							NAT		
TEMP ROUTE NEW CONSTRUCTION:																						
Temp Rte 15-1A	0.00	0.22	0.22	2		12'	-	-	18%											D		Rock to heli-landing
Temp Rte 15-1A	0.22	0.77	0.55	3		12'	-	4%	11%											NAT		

AS-BUILT

AS-BUILT

NOTES

1. EXTRA SUB-GRADE WIDTHS
   TO EACH FILL SHOULDER, ADD 1 FOOT FOR FILLS OF 1-6 FEET AND 2 FEET FOR FILLS OVER 6 FEET. WIDEN THE INSIDE SHOULDER OF ALL CURVES AS FOLLOWS WHEN THE DEGREE OF CURVE EQUALS:
   - 7-21 ADD 1 FT.
   - 22-35 ADD 2 FT.
   - 36-48 ADD 3 FT.
   - 49-64 ADD 4 FT.
   - 65-96 ADD 5 FT.

MATERIALS	CUT SLOPE	FILL SLOPE
COMMON	1/2 : 1	1 1/2 : 1
SOFT ROCK & SHALE	1/2 : 1	1 1/2 : 1
SOLID ROCK	1/2 : 1	angle of repose

2. SURFACING TYPES
   - A. PIT RUN ROCK
   - B. GRID ROLLED ROCK MATERIAL
   - C. SCREENED ROCK MATERIAL
   - D. CRUSHED ROCK MATERIAL

3. TURNOUTS
   - A. WIDTH 10 FT. IN ADDITION TO SUB-GRADE WIDTH, OR AS SHOWN ON THE PLANS.
   - B. LOCATED APPROXIMATELY, AS SHOWN ON THE ROAD PLANS.
   - C. INVISIBLE AND NOT MORE THAN 750 FT. APART.

4. SURFACING
   TURNOUTS, CURVE WIDENING, AND ROAD APPROACH APRONS SHALL BE SURFACED.

5. CLEARING WIDTH
   SEE SUBSECTION 2100

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REV. NO.	DESCRIPTION	DATE	APPROV.

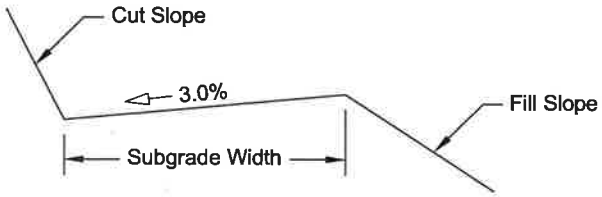
UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER
TIMBER SALE
SPECIFICATION SHEET

DESIGNED:
REVIEWED:
APPROVED:

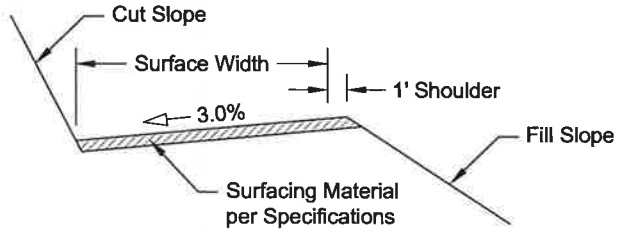
DRAFTED BY: ELF | SCALE: NONE
DATE: JUN 2014 | SHEET: 2 OF 3
DRAWING NO.: OR-11-9113.4-1

EXHIBIT C4
SHEET 3 OF 3



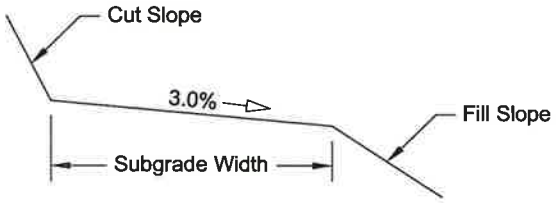
TYPICAL GRADING SECTION

TYPE 1



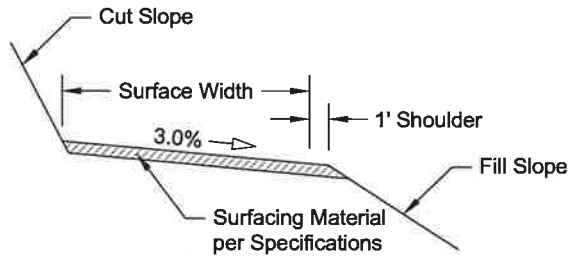
TYPICAL SURFACING SECTION

TYPE 2



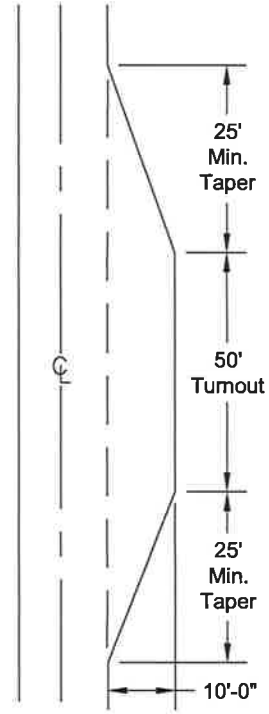
TYPICAL GRADING SECTION

TYPE 3



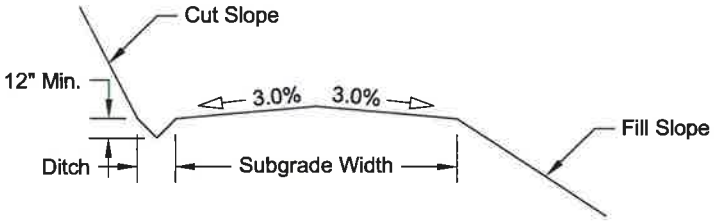
TYPICAL SURFACING SECTION

TYPE 4



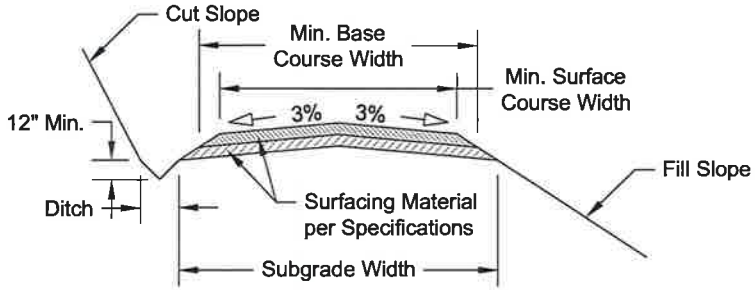
TYPICAL TURNOUT

PLAN VIEW



TYPICAL GRADING SECTION

TYPE 5



TYPICAL SURFACING SECTION

TYPE 6

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SAFETY

REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE SPECIFICATION SHEET

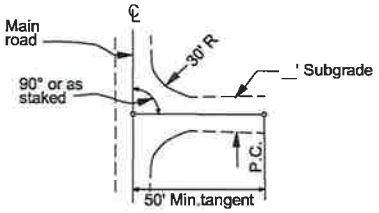
DESIGNED:
REVIEWED:
APPROVED: E. Freeman

DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 3 OF 3

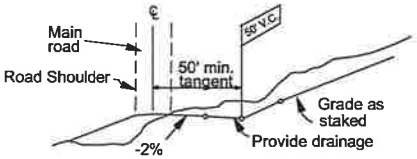
DRAWING NO.: OR-11-9113.4-1

EXHIBIT C5
SHEET 1 OF 1

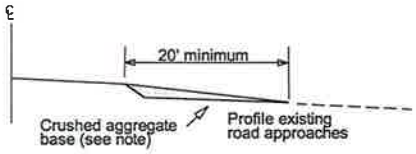
TYPICAL ROAD APPROACHES



PLAN



PROFILE



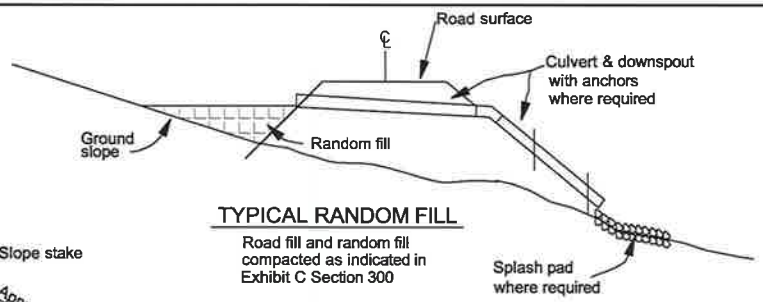
TYPICAL SURFACING SECTION

NOTES:

1. The profile of the existing approach roads shall be tapered to meet the shoulder line of the main roadway and shall receive the same wearing surface.

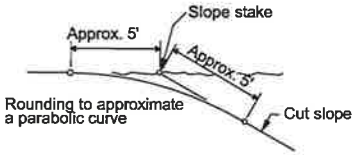
2. The crushed aggregate base shall be of the same gradation as used in the adjacent roadbed.

3. Approaches shall be finished with the same treatment as shown for the adjacent roadbed.

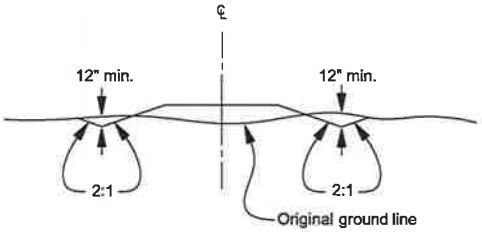


TYPICAL RANDOM FILL

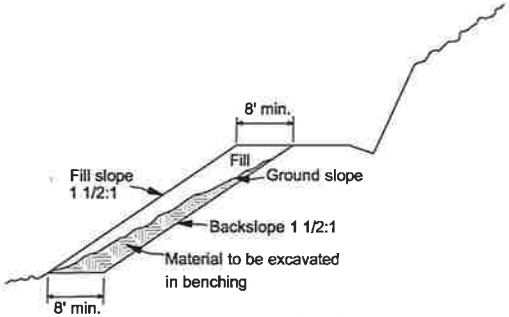
Road fill and random fill compacted as indicated in Exhibit C Section 300



CUT SLOPE ROUNDING

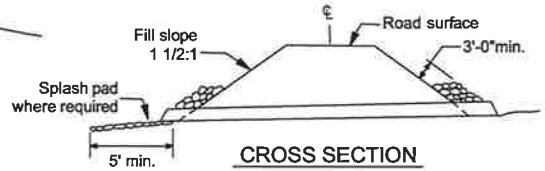


TYPICAL ROAD SECTION FOR TURNPIKE CONSTRUCTION

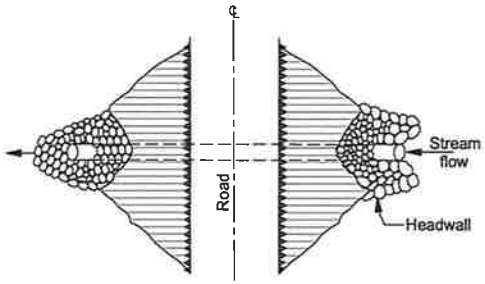


SPECIAL COMPACTION TYPICAL BENCHING SECTION

RIPRAP AT CULVERTS



CROSS SECTION



PLAN

NOTES: RIPRAP AT CULVERTS

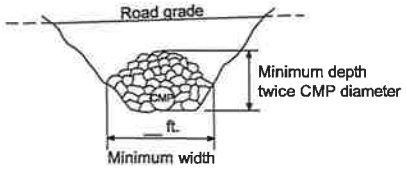
1. Riprap shall be placed in such a manner that it will not damage the culvert.

2. Trenching will be done as required by the Authorized Officer.

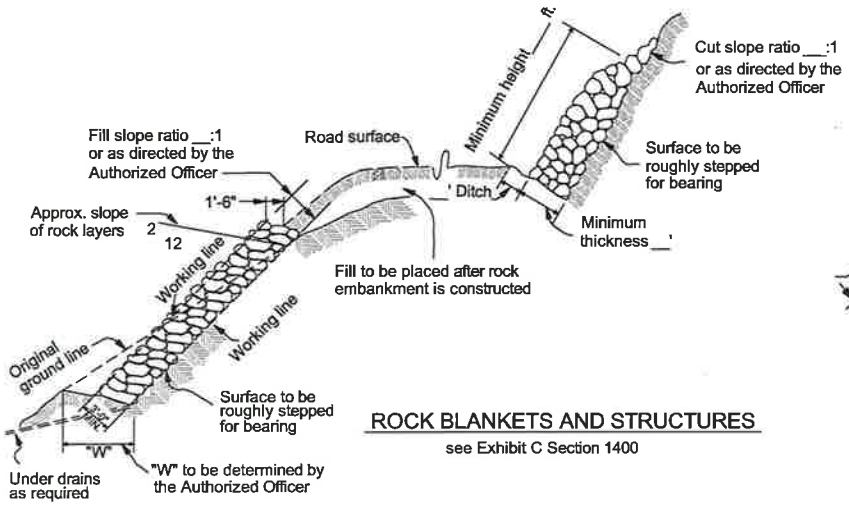
3. Minimum depth of splash pads shall be 1FT.

4. Minimum quantity shall be 1CY per culvert.

5. Riprap shall be placed before October 1st of the year the culvert is installed.

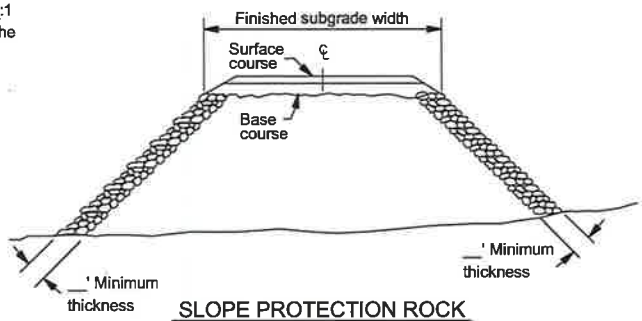


ELEVATION



ROCK BLANKETS AND STRUCTURES

see Exhibit C Section 1400



SLOPE PROTECTION ROCK

see Exhibit C Section 1400

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REV. NO.	DESCRIPTION	DATE	APPROV.

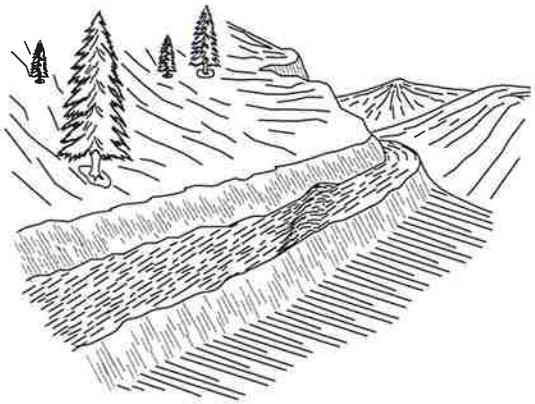
UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE
TYPICAL ROAD DATA

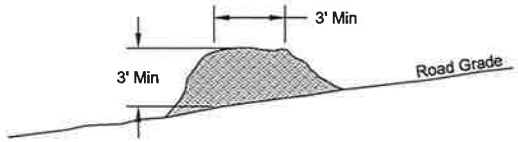
DESIGNED:
REVIEWED:
APPROVED: E. Freeman

DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 1 OF 1
DRAWING NO.: OR-11-9113.4-4	

EXHIBIT C6
SHEET 1 OF 3



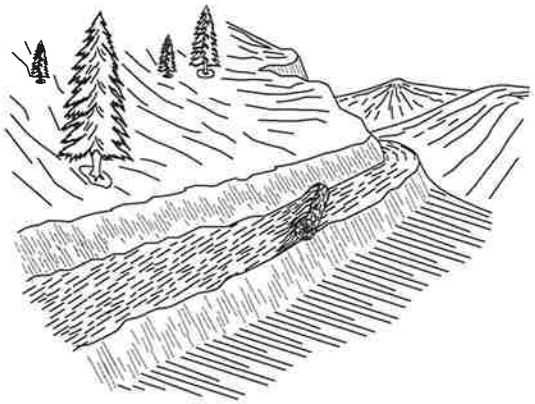
EARTHEN BARRICADE



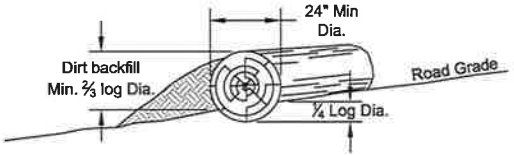
1. Earthen barricade shall be constructed as shown above.
2. All barricades shall be skewed 30 degrees.
3. The length shall be sufficient to extend from the cut bank to the fill slope.
5. The minimum height and width of the earthen barricade shall be 3'.

EARTHEN BARRICADE LOCATION

ROAD NUMBER	M.P.
33-7-13.5 (Seg F)	*3.50*
33-7-23.4	*0.01*
TEMP ROUTE 09-5	*0.01*
	0.07
TEMP ROUTE 10-1-A	*0.01*
TEMP ROUTE 10-1-B	*0.01*
TEMP ROUTE 10-1-C	*0.01*
TEMP ROUTE 15-1A	*0.01*



LOG BARRICADE

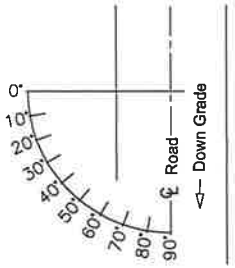


1. Log barricade shall be constructed as shown above.
2. All barricades shall be skewed 30 degrees.
3. The length shall be sufficient to extend from the cut bank to the fill slope.
4. The minimum small end diameter of the log barricade shall be 24".

LOG BARRICADE LOCATION

ROAD NUMBER	M.P.
Jeep Route	*0.01*

SKEW DIAGRAM



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REV. NO.	DESCRIPTION	DATE	APPROV.

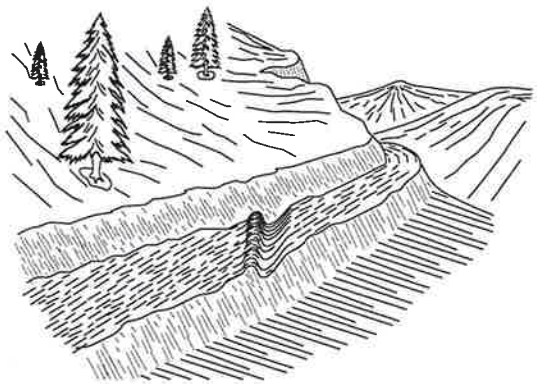
UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE DRAINAGE & EROSION CONTROL DETAILS

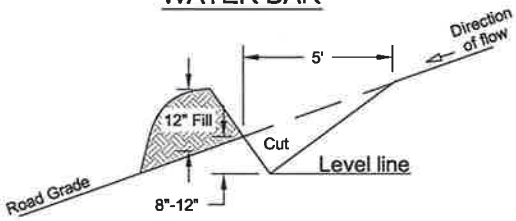
DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 1 OF 3
DRAWING NO.: OR-11-9113.4-4	

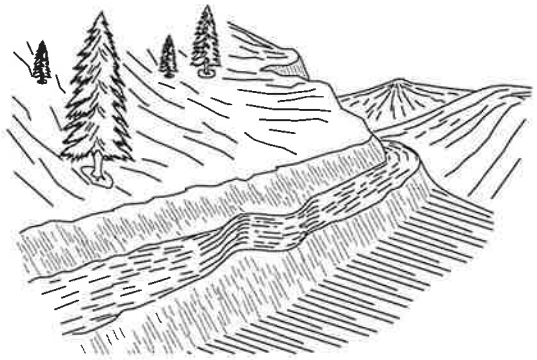
EXHIBIT C6
SHEET 2 OF 3



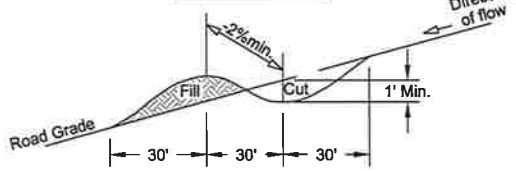
WATER BAR



1. Water bars shall be constructed as shown above.
2. Exact location will be flagged by the Authorized Officer prior to construction, unless reconstructing an existing bar.
3. All water bars shall be skewed 30 degrees.
4. Upon completion of skidding logs, for the logging season, each skid road will have cross drainage constructed as shown above.

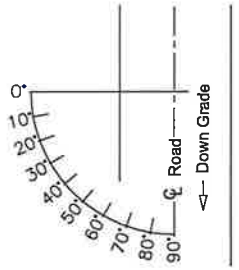


WATER DIP



1. Water dips shall be constructed as shown above.
2. Exact location will be flagged by the Authorized Officer prior to construction, unless reconstructing an existing dip.
3. All water dips shall be skewed 30 degrees.
4. The length shall be sufficient to extend from the cut bank to the fill slope and be readily crossed by passenger type vehicles.

SKEW DIAGRAM



WATER DIP/BAR SPACING*

ROAD GRADE	LOAM OR CLAY LOAM	DECOMPOSED GRANITE
%	FEET	FEET
4-6	400	300
7-9	300**	200**
10-14	200	150
15-20	150	90
21-40	90	50
41-60	50	25

* Distances are maximum.

** On grades in excess of 10%, construct water bars.

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REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

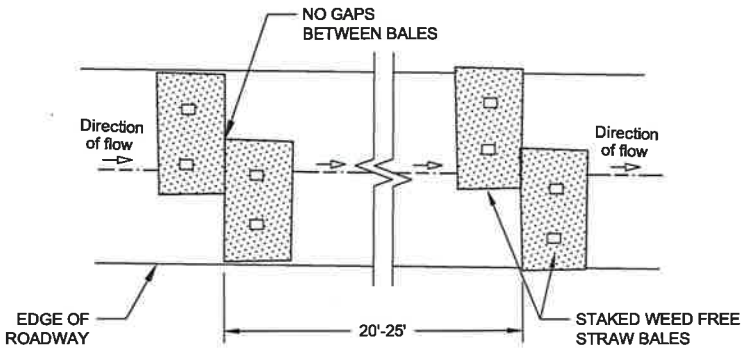
BURNT RATTLER TIMBER SALE DRAINAGE & EROSION CONTROL DETAILS

DESIGNED:
REVIEWED:
APPROVED:

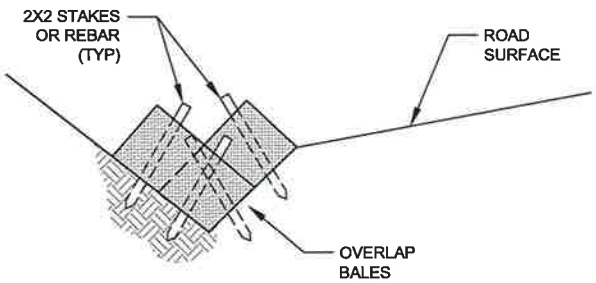
DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 2 OF 3
DRAWING NO.: OR-11-9113.4-4	

EXHIBIT C6
SHEET 3 OF 3

STRAW BALE CHECK DAMS



PLAN



PROFILE

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REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

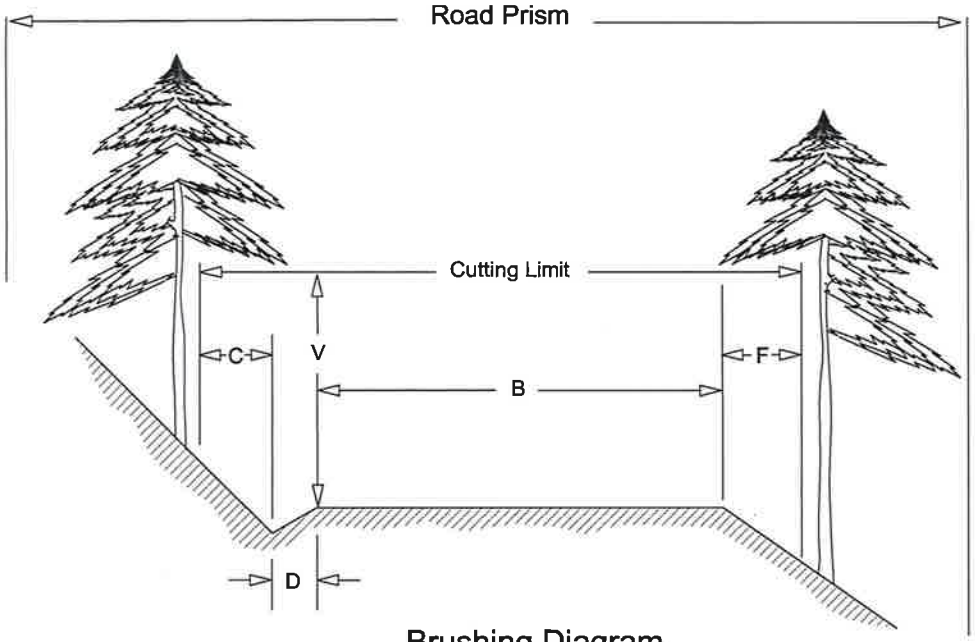
BURNT RATTLER
TIMBER SALE
DRAINAGE & EROSION
CONTROL DETAILS

DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 3 OF 3

DRAWING NO.: OR-11-9113.4-4

EXHIBIT C7
SHEET 1 OF 1



Brushing Diagram

Cutting Limit = C + D + B + F

B = Road Bed Subgrade (includes turnouts)
Cut all vegetation to max. height of 1".

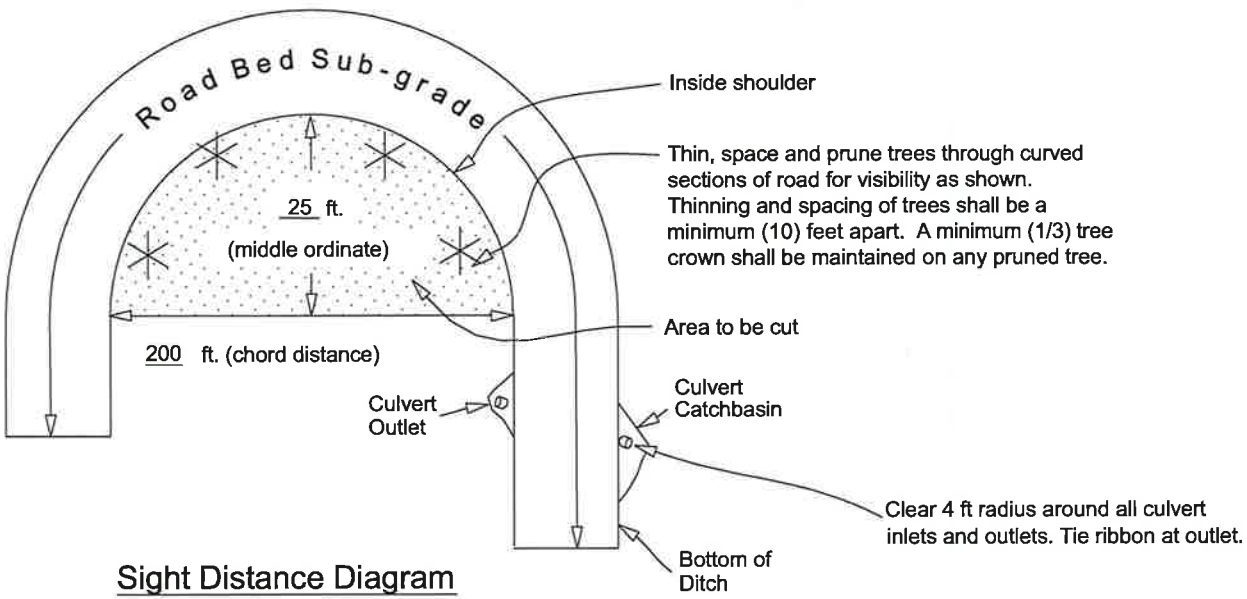
C = 4 ft - Distance to be brushed on cut slope
beyond centerline of ditch. Cut all vegetation to max height of 6".

D = Centerline of ditch to inside shoulder. Cut all vegetation to max. height of 1".

F = Distance to be brushed on fill slope beyond outside shoulder
Cut all vegetation to max. height of 6".

V = 14 ft - Height of vertical cutting limit

Inside Corner



Sight Distance Diagram

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REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER
TIMBER SALE
ROADSIDE BRUSHING DETAIL

DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: NONE
DATE: JUN 2014	SHEET: 1 OF 1
DRAWING NO.: OR-11-9113.4-4	

revised 08/2010

All distances shown are horizontal except for V

Road Renovation Work List

Definitions:

ABC = Aggregate Base Course	ASC = Aggregate Surface Course	BST = Bituminous
CY = Cubic Yard	CMP = Corrugated Metal Pipe	GRR = Grid Rolled Rock
MP = Mile Post	NAT = Natural Road Surface	PRR= Pit Run Rock
Seg = Segment		

*The existing road renovation work list consists of work to be performed to the road **prior** to its use. All work shall comply with the contract specifications and drawings.*

Existing Road Renovation

33-7-09.1 - Perkins #2

NAT

MP	Description
0.00	Junction with 33-7-13.5 Road. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning all culvert inlets and outlets; and roadside brushing.
0.03	Existing 18"Ø CMP
0.08	Unit 09-9 boundary on left
0.19	Junction with new Temp Route 10-1-A on right
0.20	Existing 18"Ø CMP
0.37	End road renovation/landing area

33-7-11.0 - Lower Rattlesnake

Seg A-B -- GRR/ASC

MP	Description
0.00	Junction with 33-7-2.1 Road; Begin Seg A. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning ditch/flow lines; cleaning all culvert inlets and outlets; and roadside brushing.
0.01	Existing Concrete Box Culvert at Rattlesnake Creek crossing. Creek crossing noted for critical habitat (Coho). ***Install all erosion and sediment control BMP's per specifications prior to starting any road renovations.***
0.04	Junction with 33-7-11.1 Road on left
0.12	Existing 18"Ø CMP
0.19	Existing 18"Ø CMP
0.27	Existing 18"Ø CMP
0.33	Existing 18"Ø CMP
0.51	Existing 18"Ø CMP with 10' downspout
0.73	Borrow material site on left
0.74	Begin Roadside Unit (Blue marked hazard trees)
0.76	Existing 18"Ø CMP
0.79	Existing 18"Ø CMP
0.90	Existing 18"Ø CMP
0.97	Existing 18"Ø CMP
1.07	Road fill slope failure on right. Repair failure with approximately 5 CY's of borrow material from borrow site located at MP 0.73 and stabilize fill slope with seed and mulch after acceptance.

1.14	Existing 18"Ø CMP
1.26	Existing 18"Ø CMP
1.27	Existing 18"Ø CMP
1.31	Junction with 33-7-11.2 Road on right
1.37	Junction with existing spur road on right; waste disposal site location on landing to right
1.41	Junction with existing spur road on right
1.47	Existing 18"Ø CMP
1.79	Existing 18"Ø CMP
1.80	End Seg A/Begin Seg B – Typical Section change (crown to inslope)
1.84	Existing 18"Ø CMP with 30' downspout
1.87	Begin removal of approximately 30 CY's of cut bank slide material. Haul unsuitable material to the waste disposal site located at landing on spur road at MP 1.37
1.93	Unit 11-2 boundary uphill on right
1.97	Unit 11-2 boundary uphill on right
2.01	Existing 24"Ø CMP
2.04	End road renovation and Roadside Unit (Blue marked hazard trees)

33-7-11.4 – Foley Road
NAT

MP	**Description**
0.00	Junction with 33-7-13.5 Road. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning all culvert inlets and outlets; and roadside brushing.
0.09	Existing 18"Ø CMP
0.18	Unit 11-2 boundary on right
0.20	End road renovation

33-7-13.2 - Upper Rattlesnake Spur
ASC

MP	**Description**
0.00	Junction with 33-7-13.0 Road (Spider Junction). Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; and roadside brushing.
0.02	End road renovation. Junction with 33-7-13.6 Road on right.

33-7-13.4 – So. Rattlesnake Road
ASC

MP	**Description**
0.00	Junction with 33-7-13.5 Road. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning all culvert inlets and outlets; and roadside brushing.
0.04	Existing 18"Ø CMP
0.16	Existing 18"Ø CMP
0.18	Unit 13-2 boundary on right
0.19	Existing water dip. Reconstruct per specifications and details.
0.26	Existing 18"Ø CMP
0.36	Existing water dip. Reconstruct per specifications and details.

0.44	Existing 18"Ø CMP
0.46	Unit 13-2 boundary on right
0.61	Existing 18"Ø CMP
0.71	Existing 18"Ø CMP
0.72	Unit 14-2 boundary on right
0.79	End road renovation/landing area

33-7-13.5 - Long Rattlesnake

Seg A-E -- ASC

MP	Description
0.00	Junction with 33-7-13.0 Road (Spider Intersection); Begin Seg A. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning all culvert inlets and outlets; and roadside brushing.
0.02	Existing 18"Ø CMP
0.05	Unit 13-6 boundary on left
0.15	Existing 18"Ø CMP
0.19	Junction with 33-7-13.4 Road on left
0.46	Existing 18"Ø CMP
0.52	Spur road on right
0.56	Existing 18"Ø CMP
0.62	End Seg A/Begin Seg B
0.87	Existing 18"Ø CMP
1.05	Spur road on right
1.23	Existing 18"Ø CMP
1.50	Junction with 33-7-11.4 Road on right
1.72	Spur road on right
1.74	End Seg B/Begin Seg C1
1.78	End Seg C1/Begin Seg C2
1.79	Proposed Heli-Landing area
1.82	Existing 18"Ø CMP
1.95	End Seg C2/Begin Seg D; Unit 15-1B boundary on left
2.11	Unit 15-1B boundary on left
2.18	Existing 18"Ø CMP
2.19	Spur road on right
2.27	Existing 18"Ø CMP
2.28	Junction with Temp Route 15-1A on left
2.36	Unit 15-2A boundary on right
2.38	Existing 18"Ø CMP
2.39	Unit 15-1A boundary on left
2.40	Existing Water dip
2.49	Existing 18"Ø CMP
2.62	Existing 18"Ø CMP; Unit 15-1A boundary on left
2.64	Unit 15-2A boundary on right
2.65	End Seg D/Begin Seg E
2.71	Spur road on right
2.76	Unit 10-1 boundary on right
2.91	Junction with Temp Route 10-1-C on right
2.93	Junction with Temp Route 10-1-B on right
2.99	Existing 18"Ø CMP
3.07	Existing 18"Ø CMP

3.16	Junction with 33-7-09.1 Road on right
3.37	Unit 09-5 boundary on left
3.39	Junction with Temp Route 09-5 on left (loop)
3.44	Unit 09-5 boundary on left
3.45	Junction with Temp Route 09-5 on left (loop)
3.49	End Seg E/Begin Seg F
3.50	Construct earthen barricade
3.52	Construct water bar
3.58	Construct water bar
3.64	Construct water bar
3.69	Construct water bar
3.70	End road renovation

33-7-13.6 - Goosehead

Seg A-B -- ASC/NAT

MP	Description
0.00	Junction with 33-7-13.2 Road; Begin Seg A. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning all culvert inlets and outlets; and roadside brushing.
0.07	Existing 18"Ø CMP
0.13	Existing 18"Ø CMP
0.27	Existing 18"Ø CMP
0.35	Existing 24"Ø CMP
0.40	Junction with dozer line/spur on left
0.44	Existing 18"Ø CMP
0.50	Unit 13-4A boundary on right
0.59	Existing 18"Ø CMP
0.71	Existing 18"Ø CMP
0.77	Unit 13-4A boundary on right
0.81	Junction with spur on right. End Seg A(ASC)/Begin Seg B(NAT)
0.83	Existing 18"Ø CMP
0.98	Junction with Dozer line/spur on left
1.04	Unit 13-4 boundary on left
1.06	Unit 13-4 boundary on left
1.17	Landing area/Truck Turn-around. End road renovation.

33-7-23.0 - Sugarman Ridge Spur

GRR

MP	Description
0.00	Junction with 33-7-13.7 Road. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning all culvert inlets and outlets; and roadside brushing.
0.12	Existing 18"Ø CMP
0.13	Unit 23-1A boundary on right
0.21	Unit 23-1A boundary on right
0.24	Existing 18"Ø CMP
0.29	Unit 23-2B boundary on right
0.35	Existing 18"Ø CMP

0.48	Existing 18"Ø CMP
0.50	Unit 23-2B boundary on right
0.59	Truck Turn-around area. End road renovation.

33-7-23.2 – Spur Road

NAT

MP	**Description**
0.00	Junction with 33-7-13.7 Road. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; and roadside brushing.
0.08	Unit 23-3B boundary on left
0.12	End road renovation at Unit 23-3B boundary on left

33-7-23.4 – Spur Road

MP	**Description**
0.00	Junction with 33-7-35.0 Road. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; and roadside brushing.
0.01	Remove existing small earth berm for use and construct/replace with standard earthen barricade after use
0.04	Construct water bar
0.12	Construct water bar
0.20	Construct water bar
0.28	Construct water bar
0.36	Construct water bar
0.38	End road renovation

33-7-36.1 - Sugar Hook

GRR

MP	**Description**
0.00	Junction with Lower Grave Road – County Road No 1100. Begin road renovation which includes reshaping road surface (blading, watering, and rolling) to road specifications; cleaning all culvert inlets and outlets; and roadside brushing.
0.01	Existing 18"Ø CMP
0.02	Gate
0.04	Existing 18"Ø CMP
0.07	Junction with Spur Road on left
0.12	Existing 18"Ø CMP
0.17	Existing 18"Ø CMP
0.32	Existing 18"Ø CMP
0.40	Existing 18"Ø CMP
0.48	Existing 18"Ø CMP
0.57	Existing 18"Ø CMP
0.66	Existing 18"Ø CMP
0.76	Existing 24"Ø CMP
0.82	Existing 18"Ø CMP
0.84	Existing 18"Ø CMP
0.93	Existing 18"Ø CMP

0.98	Existing 18"Ø CMP
1.00	Unit 25-2A boundary on right
1.05	Existing 18"Ø CMP
1.07	Unit 25-2A boundary on right
1.14	Existing 18"Ø CMP
1.25	Existing 18"Ø CMP
1.28	Spur on right
1.30	Existing 18"Ø CMP
1.41	Existing 18"Ø CMP
1.47	Existing 18"Ø CMP
1.48	Unit 25-1A boundary on right
1.51	End road renovation at Unit 25-1A boundary on right.

Temporary Route Reconstruction/Construction

All Temporary Routes are NAT surface, unless noted otherwise. Upon completion of timber extraction, all Temp Routes associated with each Unit are to be decommissioned which consists of ripping, installation of water bars where noted, placing of seed and mulch, and constructing earthen or log barricades. Each route listed below will be ripped unless noted otherwise.

Jeep Route

MP	Description
0.00	Junction with 33-7-35.0 Road. Begin reconstruction
0.01	Remove existing log barricade and replace upon completion
0.03	Construct water bar
0.05	End reconstruction

Temp Route 09-5

MP	Description
0.00	Junction with 33-7-13.5 Road. Begin Temp Route reconstruction
0.01	Construct earthen barricade
0.04	Construct water bar
0.07	Construct earthen barricade
0.08	Junction with 33-7-13.5 Road. End Temp Route reconstruction

Temp Route 10-1-A

MP	Description
0.00	Junction with 33-7-09.1 Road. Begin Temp Route reconstruction
0.01	Construct earthen barricade
0.02	Construct water bar
0.03	End Temp Route reconstruction

Temp Route 10-1-B

MP	Description
0.00	Junction with 33-7-13.5 Road. Begin Temp Route reconstruction
0.01	Construct earthen barricade
0.03	Construct water bar
0.06	End Temp Route reconstruction

Temp Route 10-1-C - This temporary route will NOT be ripped; partial decommission only.

MP	Description
0.00	Junction with 33-7-13.5 Road. Begin Temp Route reconstruction.
0.01	Construct earthen barricade
0.03	Construct water bar
0.08	Construct water bar
0.10	End Temp Route reconstruction

<u>Temp Route 15-1A -</u> This temporary route will <u>NOT</u> be ripped; partial decommission only.

MP	**Description**
0.00	Junction with 33-7-13.5 Road. Begin Temp Route new construction. Upon acceptance of subgrade, the Purchaser (or their Contractor) shall furnish, place, water, and roll/compact an 8" layer of 3"-minus crushed base rock material placed in (2) 4" lifts per contract specifications.
0.01	Construct earthen barricade
0.05	Construct water dip
0.10	Construct water dip
0.17	Construct water bar
0.22	Approximate location of helicopter landing. End surface rocking.
0.25	Construct water bar
0.33	Construct water bar
0.41	Construct water bar
0.49	Construct water bar
0.57	Construct water bar
0.65	Construct water bar
0.73	Construct water bar
0.77	End Temp Route new construction

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

ROAD SPECIFICATIONS

SPECIAL PROVISIONS INDEX

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2600	DECOMMISSIONING

GENERAL – 100

101 - Prework Conference(s):

A prework conference will be held prior to the start of new construction, improvements, reconstruction, quarry development, surfacing, and soil stabilization. The Purchaser shall request the conference at least **72 hours prior** to the time it is to be held. The conference will be attended by the Purchaser and/or his representatives, subcontractors and/or his or their representatives and the Authorized Officer and/or his representatives.

The purpose will be to review the required work, exhibits and specifications, and to establish a work schedule and a list of the Purchaser's representatives and subcontractors.

102 - Definitions:

AASHTO - American Association of State Highway and Transportation Officials. Current editions of tests and specifications.

ASTM - American Society for Testing and Materials.

Base Course - Surfacing structure consisting of crushed gravel or stone, crushed sandstone, pit run rock, bank or river run gravels, etc., to provide support and, in the event no surface course is placed, the running surface for traffic load.

BLM - Bureau of Land Management

Borrow - Excavated material required for embankments and other portions of the work.

Culvert - A pipe, pipe-arch, arch, or box structure constructed of metal, concrete, plastic or wood which provides an opening under the roadway primarily for the conveyance of liquids, pedestrians or livestock.

Curve Widening - Widening required on inside of curves to accommodate long log and equipment hauling trucks.

Embankment - A structure of soil, aggregate, or rock material placed on a prepared ground surface and constructed to subgrade.

End Haul - Excavated material moved, other than by dozer, to an embankment or waste area to prevent sidecasting material outside of the road prism.

Excess Excavation - Material from the roadway in excess of that needed for construction of the designed roadway (waste).

Grading - Leveling to grade, shaping and smoothing of a road subgrade; the shaping of roadside ditches as to grade and contour. In some instances includes smoothing of the cut bank.

Pioneer Road - Temporary construction access built along the route of the project.

Plans - The approved drawings, or exact reproductions thereof which show the locations, character, dimensions, and details of the work to be done.

Purchaser - The individual, partnership, joint venture, or corporation contracting with the Government under the terms of a Timber Sale Contract and acting independently or through their, or its agents, employees, or contractors.

Roadbed - The graded portion of the road within top and side slopes, prepared as a foundation for the pavement structure and shoulders.

Road Centerline - Longitudinal center of roadbed.

Road Improvement - Work done to an existing road which improves it over its original design standard.

Road Renovation - Work done to an existing road which restores it to its original design.

Roadway - The portion of a road within limits of construction. Usually from the toe of the fill slope to a point where the cut slope intersects natural ground line.
Synonym - road prism.

Scale - In quarrying, consists of the removal of loose or overhanging rock adhering to the solid face after a shot or a round of shots has been fired.

Scarification - The process of loosening or breaking up of the surface layer of soil or road, usually to a specified depth.

Shoulder - The portion of the roadbed contiguous with the traveled way designed for accommodation of stopped vehicles, safety, and lateral support of base and surface courses.

Spalls - Flakes or chips of stone.

Specifications - A general term applied to all directions, provisions, and requirements pertaining to performance of the work.

Specific Gravity - The ratio of the density of a material to the density of water obtained by weighing known volumes of both items in air. A specific gravity less than one implies that the material will float.

Structures Bridges, culverts, catch basins, retaining walls, underdrains, flumes, splash pads, downspouts, and other project features which may be involved in the work and not otherwise classified in these specifications.

Subbase - Reinforcement of the subgrade with large particles of pit run or crushed stone. Usually confined to roads having wet subgrades or subgrades with weak support

characteristics.

Surface Course - Top layer of a road structure consisting of finely crushed gravels or asphalt designed to provide a smooth running surface for traffic load.

Subgrade - The top surface of a roadbed upon which the traveled way and shoulders are constructed.

Traveled Way - The portion of the roadbed used for the movement of vehicles, exclusive of shoulders.

Typical Cross Sections - Cross sectional plane of a typical roadway; showing natural ground line and designed roadway in relation to cut and fill, through cut, and through fill.

Turnout - Extra widening of the roadbed at appropriate intervals on single-lane roads for passing purposes.

102a - Tests Used in These Specifications:

AASHTO T 11	Quantity of rock finer than No. 200 sieve.
AASHTO T 27	Sieve analysis of fine and coarse aggregate using sieves with square openings; gradation.
AASHTO T 89	Liquid limit of material passing the No. 40 sieve. Water content at which the soil passes from a plastic to a liquid state.
AASHTO T 90	Plastic limits and plasticity index of soil. a. Plastic limit - lowest water content at which the soil remains plastic. b. Plasticity index - range of water content, within which the material is in a plastic state. Numerical difference between the liquid and plastic limits of the soil.
AASHTO T 96	Resistance to abrasion of small size coarse aggregate by use of the Los Angeles machine.
AASHTO T 99	Relationship between soil moisture and maximum density of soil. Method A - 4" mold, soil passing a No. 4 Sieve. 25 blows/layer & 3 layers. Method D - 6" mold, soil passing a 19.00mm 3/4 inches sieve. 56 blows/layer & 5 layers.
AASHTO T 176	Shows relative portions of fine dust or claylike materials in soil or graded aggregate.
AASHTO T 180	(OSHD 106-71) moisture density relationship of soil same as AASHTO T 99 proctor but uses a 10-lb rammer & 18-in drop.

AASHTO T 191 — Sand Cone. Density of soil in place: For subgrade use 6-inch or 12-inch cone. For rock surfacing for 1-1/2-inch minus to 3-inch minus use 12-inch cone.

AASHTO T 205 — Rubber balloon. Density of soil in place. Use for compacted or firmly bonded soil.

AASHTO T 210 — Durability of aggregates based on resistance to produce fines.

AASHTO T 224 — Correction for coarse particles in the soil.

AASHTO T 238 — Determination of density of soil and soil aggregates in place by nuclear methods.

AASHTO T 248 — Reducing field samples of aggregate to testing size by mechanical splitter, quartering, or miniature stockpile sampling.

DES. E-12 — Determination of relative density of cohesionless soils.

DMSO (dimethyl sulfide) - Determines volume of expanding clays in aggregates. Usually associated with marine basalts.

103 - Compaction equipment shall meet the following requirements:

103f - Vibratory roller. The drum diameter shall be not less than 48 inches, the drum width not less than 58 inches, and have a turning radius of 15 feet or less. Vibration frequency shall be regulated in steps to 1400, 1500, and 1600 vibrations per minute (VPM), corresponding to engine speeds of 1575, 1690, and 1800 RPM. The centrifugal force developed shall be 7 tons at 1600 RPM. It shall be activated by a power unit of not less than 25 horsepower. The vibratory roller shall be self-propelled or drawn by a vehicle of sufficient horsepower to enable the unit to travel through a loose layer of material at a speed ranging from 0.9 mile to 1.8 miles per hour, as directed by the Authorized Officer.

The towing vehicle and roller or self-propelled unit meeting the above requirements shall be considered a vibratory roller unit.

CLEARING AND GRUBBING - 200

201 - This work shall consist of clearing, grubbing, removing and disposing of vegetation, debris, surface objects, and protruding obstructions within the clearing limits in accordance with these specifications and conforming to the lines, grades, dimensions, and typical cross sections shown on the plans.

202 - Where clearing limits have not been staked, established by these specifications or shown on the plans, the limits shall extend 10 feet back of the top of the cut slope and 5 feet out from the toe of the fill slope.

203 - Clearing shall consist of the removal and disposal of trees, logs, rotten material, brush, and other vegetative materials and surface objects in accordance with these specifications and within the limits established for clearing as specified under Subsection 202 and as posted.

203b - Standing trees and snags to be cleared shall be felled within the limits established for clearing, unless otherwise authorized.

204 - Grubbing shall consist of the removal and disposal of stumps, roots, and other wood material embedded in the ground, and protruding obstacles remaining as a result of the clearing operation between the top of the cut slope and the toe of the fill slope.

205 - Clearing and grubbing debris shall not be placed or permitted to remain in or under road embankment sections.

206 - Clearing and grubbing debris shall be disposed of by scattering in accordance with Subsection 210 and at the following road/temp route locations:

Road No.	From M.P.	To M.P.
Temp Route 15-1A	0.00	0.77

210 - Disposal of clearing and grubbing debris shall be by scattering over government owned lands outside of established clearing limits in a manner acceptable to the Authorized Officer. The areas for such scattering shall have the prior approval of the Authorized Officer.

212 - No grading will be permitted prior to completion and approval by the Authorized Officer of the required clearing and grubbing work, except that stump grubbing may proceed with the excavation of the road prism.

213 - No clearing or grubbing debris shall be left lodged against standing trees.

EXCAVATION AND EMBANKMENT - 300

301 - This work shall consist of excavating, overhaul, placement of embankments, backfilling, leveling, ditching, grading, insloping, outsloping, crowning, and scarification of the subgrade, compaction, disposal or excess and unsuitable materials, and other earth-moving work in accordance with these specifications and conforming to the typical cross sections shown on the plans.

302 - Excavation shall consist of the excavation of temporary route and landing cut sections, borrow sites, backfilling, leveling, ditching, grading, compaction and other earth moving work necessary for the construction of the roadway in accordance with these

specifications and conforming to the lines, grades, dimensions, and typical cross sections shown on the plans, and as marked on the ground with stakes or metal tags.

303 - Suitable material removed from the excavation shall be used in the formation of embankment subgrade, shoulders, slopes, bedding, backfill for structures, and for other purposes as shown on the plans.

305 - Embankment construction shall consist of the placement of excavated and borrowed materials, backfilling, leveling, grading, compaction, and other earth-moving work necessary for the construction of the roadway and landings in accordance with these specifications and conforming to the lines, grades, dimensions, and typical cross sections shown on the plans, and as marked on the ground with stakes or metal tags.

305a - Material used in the construction of embankment sections shall be free of stumps, cull logs, brush, muck, sod, roots, frozen material and other deleterious materials and shall be placed and compacted as specified.

305b - Embankment materials shall be placed in successive parallel layers on areas cleared of stumps, cull logs, brush, sod, and other vegetative and deleterious materials, except as provided under Subsection 204. Roadway/temporary route embankments of earth material shall be placed in horizontal layers not exceeding 8 inches in depth.

305c - Embankments formed of material containing less than 25 percent rock not larger than 8 inches in the greatest dimension shall be placed in 12-inch layers. Material containing more than 25 percent rock not larger than 12 inches in the greatest dimension shall be placed in successive layers not exceeding 2 feet in thickness. Individual rocks and boulders greater than 12 inches in diameter may be used to construct 2 foot embankment layers, provided they are carefully distributed, with interstices filled with fine material to form a dense and compact mass.

306a - Minimum compaction for each layer of embankment and selected roadway/temporary route excavation material placed at optimum moisture shall be 1 hour of continuous compacting for each 150 cubic yards.

306e - The final subgrade including landings shall be compacted to full width with compacting equipment conforming to the requirements of Subsections 103f, 103g, and 103h. Minimum compaction shall be 1 hour of continuous compacting for each 6 stations of road or a fraction of as measured along the centerline of the constructed road. Landings and shall be compacted by routing construction equipment over full width.

306f - Compaction of embankment layers placed as specified under Subsection 305b above shall be accomplished by routing construction equipment over full width of embankment structures.

306g - All fill slopes shall be compacted to 85% of maximum density, either by walking with cat/excavator or by pressing with excavator bucket, to prevent surface erosion and raveling.

308 - In the case of rock fills, placement of material in layers is not required and such material may be placed by end-dumping or other methods approved by the Authorized Officer provided that the rock be reasonably prevented from escaping beyond the embankment toe.

309 - The top of cut slopes shall be rounded by blending into the adjacent terrain for a distance not less than 1 foot and not more than 3 feet beyond the top of the cut. Rounding shall be performed in soils that can be shaped without ripping or blasting.

312 - When material, except solid rock, encountered in cuts at subgrade, is suitable for use in forming the finished roadbed, the top 6-inch layer of the subgrade shall be thoroughly scarified for the full width of the roadbed. Roots, sod, and other deleterious material or stones that will not pass a 6-inch square opening shall be removed. The scarified material shall be processed to the optimum moisture content suitable for maximum density and compacted in accordance with these specifications.

313 - In cut areas where solid rock is encountered at, or near subgrade, the rock shall be excavated to a minimum depth of 6 inches below subgrade elevation and the excavated area backfilled with suitable material. The backfill material shall be processed to the optimum moisture content suitable for maximum density and compacted to full width in accordance with the requirements of Subsection 306a.

314 - When heavy clays, muck, clay shale, or other deleterious material for forming the roadbed is encountered in cuts at subgrade, it shall be excavated to a minimum depth of 2 feet below the subgrade elevation and the excavated area backfilled with a selected borrow material approved by the Authorized Officer. The backfill material shall be uniformly moistened or dried to the optimum moisture content suitable for maximum density in accordance with the requirements of Subsection 306a. Unsuitable material shall be disposed of as directed by the Authorized Officer.

320 - Ditches shall conform to the slope, grade, dimensions, and shape of the required cross section shown on the plans. Roots, stumps, rocks, and other projections shall be removed to form smooth, even slopes.

321 - Excess excavated, unsuitable, or slide materials shall not be disposed of on areas where the material will encroach on a stream course or other body of water. Such materials shall be disposed of in accordance with Subsection 321b.

321b - Excess construction material as specified under Subsection 321 shall be loaded, hauled and disposed of at a disposal site as approved by the Authorized Officer.

323 - In the construction of channel changes and stream crossing embankment sections, natural stream flow shall be maintained unless otherwise provided.

324 - Excavated material shall not be allowed to cover boles of standing trees to a depth in excess of 2 feet on the uphill side.

RENOVATION OF EXISTING ROADS - 500

501 - This work shall consist of reconditioning and preparing the roadbed and shoulders, cleaning and shaping drainage ditches, trimming vegetation from cut and embankment slopes, and cleaning and repairing drainage structures of existing roads in accordance with these specifications, as shown on the plans.

501a - Renovation work shall include the removal and disposal of slides in accordance with these specifications.

502 - Existing road surfaces shall be bladed and shaped to the lines, grades, dimensions, and typical cross sections shown on the plans at the following locations:

Road No.	From M.P.	To M.P.
33-7-09.1	0.00	0.37
33-7-11.0 (A-B)	0.00	2.04
33-7-11.4	0.00	0.20
33-7-13.2	0.00	0.02
33-7-13.4	0.00	0.79
33-7-13.5 (A-F)	0.00	3.70
33-7-13.6 (A-B)	0.00	1.17
33-7-23.0	0.00	0.59
33-7-23.2	0.00	0.12
33-7-23.4	0.00	0.38
33-7-36.1	0.00	1.51

502b - Drainage ditches shall be bladed and shaped in accordance with the lines, grades, dimensions, and typical cross sections shown on the plans.

503a - Debris from slide(s) at the following location(s):

Road No.	From M.P.	To M.P.
33-7-11.0 (B)	1.87	1.99

Shall be hauled to the designated disposal site(s) at the following location(s):

Road No.	From M.P.	To M.P.
33-7-11.0 (A)	1.37	1.37

504 - Existing road surface shall be uniformly moistened or dried to the optimum moisture content suitable for maximum density and compacted to full width with equipment conforming to requirements of Subsection 103f.

504a - Minimum compaction required shall be 1 hour of continuous rolling for each 4 stations of road as measured along the centerline of road.

506 - The inlet end of all existing drainage structures, as shown on the plans and on the existing roadways listed in Subsection 502, shall be cleared of vegetative debris and boulders that are of sufficient size to obstruct normal stream flow. Pipe inverts shall be cleared of sediment and other debris lodged in the barrel of the pipe. The outflow area of all pipe structures shall be cleared of rock and vegetative obstructions which will impede the structure's designed outflow configuration. Catch basins shall conform to the lines, grade, dimensions, and typical diagram shown on the plans.

509 - The finished grading shall be approved in writing by the Authorized Officer. The Purchaser shall give the Authorized Officer notice 3 days prior to final inspection of the grading operations.

WATERING - 600

601 - This work shall consist of furnishing and applying water required for the compaction of embankments, roadbeds, backfills, base courses, surface courses, finishing and reconditioning of existing roadbeds laying dust, or for other uses in accordance with these specifications.

602 - Water, when needed for compaction or laying dust, shall be applied at the locations, in the amounts, and during the hours as directed by the Authorized Officer. Amounts of water to be provided will be the minimum needed to properly execute the compaction requirements in conformance with these specifications, and for laying dust during work periods.

603 - Water trucks used in this work shall be equipped with a distributing device of ample capacity and of such design as to ensure uniform application of water on the roadbed.

605 - The Purchaser shall secure the necessary water permits and pay all required water fees for use of water source(s) selected by the Purchaser and approved by the Authorized Officer.

AGGREGATE BASE COURSE – 1000
CRUSHED ROCK MATERIAL

1001 - This work shall consist of furnishing, hauling, and placing one or more lifts of 3"-minus crushed rock material on temporary route beds approved for placing crushed rock material, in accordance with these specifications and conforming to the dimensions and

typical cross sections shown on the plans. Material not conforming to these specifications will be rejected and shall be removed from the road.

1002a - Crushed rock materials may be obtained from a commercial source selected by the Purchaser at his option and expense providing that the rock materials selected comply with the specifications in this section.

1004 - Crushed rock materials shall consist of hard durable rock fragments conforming to the following gradation requirements:

TABLE 1004
Percentage by Weight Passing Square Mesh Sieves
(AASHTO T 11 & T 27)

GRADATION

Sieve Designation	A	B	C	D	F	G	H	Jaw Run Rock
3-inch	100	-	100	-	100	-	-	45-65
2-inch	90-95	100	-	100	65-95	100	100	-
12-inch	-	90-95	-	-	-	-	-	-
1-inch	45-75	50-90	-	-	-	50-85	60-90	-
3/4-inch	-	-	-	-	28-70	-	-	-
2-inch	-	-	-	-	-	27-60	44-70	-
3/8-inch	-	-	-	-	-	-	-	-
No. 4	15-45	15-50	-	-	10-35	15-40	28-50	0-10
No. 8	-	-	-	-	-	-	20-41	-
No. 10	-	-	-	-	-	-	-	-
No. 30	-	-	-	-	5-22	8-26	9-26	-
No. 40	5-25	5-25	-	-	-	-	-	-
No. 200	2-15	2-15	-	-	3-10	3-12	3-12	-

1007 - That portion of crushed rock material passing the No. 40 sieve, including blending filler, shall have liquid limits of not more than 35, and a plasticity index of not less than 4 and not more than 12 as determined by AASHTO T 89 and AASHTO T 90.

1009 - The roadbed, as shaped and compacted under Sections 300 and 500 of these specifications, shall be approved in writing by the Authorized Officer prior to placement of crushed rock materials. Notification for final inspection prior to rocking shall be 72 hours prior to that inspection and shall be 10 days prior to start of rocking operations.

1010 - Crushed rock materials shall be placed and processed on the approved roadbed in accordance with these specifications and conforming to the lines, grades, dimensions, and typical cross sections shown on the plans and compacted in layers not to exceed 4 inches in depth. When more than one layer is required, each shall be shaped, processed, compacted, and approved in writing by the Authorized officer before the succeeding

layer is placed. Irregularities or depressions that develop during compaction of the top layer shall be corrected by loosening the material at these places and adding or removing crushed rock material until the surface is smooth and uniform.

1010a - Crushed rock material used to repair or reinforce a soft, muddy, frozen, yielding, or rutted roadbed shall not be construed as surfacing under this specification unless approved as such by the Authorized Officer prior to placement.

1012 - Each layer of crushed rock material shall be placed, processed, shaped, moistened or dried to uniform moisture content suitable for maximum compaction, and compacted to full width by compaction equipment conforming to the requirements of Subsection 103f. Minimum compaction shall be one hour of continuous compacting for each 6 stations, or fraction thereof, of crushed rock material placed per layer/lift.

EROSION CONTROL - 1700

1701 - This work shall consist of measures to control sedimentation or water pollution during all construction operations and hauling through the use of berms, dikes, dams, sediment basins, fiber mats, netting, gravel, mulches, grasses, slope drains, and other erosion control devices or methods in accordance with these specifications and conforming to the lines, grades, dimensions and typical cross sections shown on the plans.

1711 - The Purchaser shall furnish and install sediment and check dams conforming to the requirements and details shown and listed on the respective exhibits at the following locations:

Road No.	From M.P.	To M.P.
33-7-11.0 (A)	0.00	0.03

SOIL STABILIZATION - 1800

1801 - This work shall consist of seeding and mulching on designated cut, fill, disposal, and special areas in accordance with these specifications and as shown on the plans. This work is required for road acceptance under this contract.

1802a - Soil stabilization work consisting of seeding and mulching shall be performed on temporary route construction, temporary route reconstruction, and existing road renovations in accordance with these specifications and as shown on the plans.

1803 - Soil stabilization work as specified under Subsection 1802a shall be performed during the following seasonal periods:

From: August 1 to: October 31

If soil stabilization of disturbed areas is not completed by the specified fall date, the Purchaser shall treat disturbed areas and then complete the requirements of Soil Stabilization 1800 the next construction season.

The Authorized Officer may modify the above seasonal dates to conform to existing weather conditions and changes in the construction schedule.

1803a - The Purchaser shall begin soil stabilization work within 10 days of the starting work date when notified by the Authorized Officer.

1804 - The BLM shall provide native grass/forb seed or other plant materials for this project.

1806a - Additional soil stabilization work consisting of seeding and mulching, may be required at the option of the Authorized Officer. Providing the additional stabilization is not due to Purchaser negligence as specified in Sec. 12 of the contract, a reduction in the total purchased price shall be made to offset the cost of furnishing and applying such additional stabilization material. Cost shall be based upon the unit price set forth in the current BLM Timber Appraisal Production Cost Schedule.

1808 - Mulch materials conforming to the requirements of Subsection 1808a shall be furnished by the Purchaser in the amounts specified under Subsection 1811 and applied in accordance with Subsection 1812.

1808a - Straw mulch shall be certified weed free from commercial grain fields and native grass fields. Straw mulch shall be from oats, wheat, rye, or other approved grain crops and shall be free from, mold, or other objectionable material. Straw mulch shall be in an air-dry condition and suitable for placement.

1809 - Straw mulch material shall be delivered to the work area in a dry state. Material found to be wet will not be accepted. Material to be used in the mulching operation may be stockpiled along the road designated for treatment provided that it is maintained in a dry state and has the approval of the Authorized Officer.

1811 - The Purchaser shall furnish and apply to approximately 4.30 acres designated for treatment as shown on the plans, a mixture of grass and legume seed and mulch material at the following rate of application:

Two Stage Dry:

Grass & Legume Seed	10 lbs./acre
Mulch	2,000 lbs./acre

1814 - The Purchaser may reduce the application rate on partially covered slopes and refrain from application on areas already well stocked with grass or on rock surfaces as

determined by the Authorized Officer.

1815 - The seed and mulch materials shall be placed by the dry method in accordance with the requirements set forth in Subsection 1815b.

1815b - Dry Method - Blowers, mechanical seeders, seed drills, landscape seeders, cultipacker seeders, or other approved mechanical seeding equipment may be used when seed is to be applied in dry form.

1819 - The Purchaser shall notify the Authorized Officer at least 3 days in advance of the date they intend to commence the specified soil stabilization work.

1821 - Mulch that collects at the ends of culverts or accumulates to excessive depths on the slopes shall be evenly spread by hand methods, as directed by the Authorized Officer.

1824 - Twine, rope, sacks, and other debris resulting from the soil-stabilization operation shall be picked up and disposed of to the satisfaction of the Authorized Officer.

ROADSIDE BRUSHING - 2100

2101 - This work shall consist of the removal of vegetation from the road prism – variable distance, and inside curves in accordance with these specifications and conforming to the lines, grades, dimensions, and typical cross sections shown on the drawings.

2102 - Roadside brushing may be performed mechanically with self-powered, self-propelled equipment or manually with hand tools, including chain saws.

2103 - Vegetation cut manually and/or mechanically less than 6 inches in diameter when measured at DBH shall be cut to a maximum height of 1 inch above the ground surface or above obstructions such as rocks or stumps on cut and fill slopes and all limbs below the 1 inch area will be severed from the trunk.

2103a - Vegetation shall be cut and removed from the road bed between the outside shoulders and the ditch centerline and such vegetation shall be cut to a maximum height of 1 inch above the ground and running surface. Limbs below the 1 inch area will be severed from the trunk. Sharp pointed ends will not be permitted. Cuts shall be parallel to the ground line or running surface.

2104 - Trees in excess of 6 inches in diameter at DBH shall be limbed, so that no limbs extend into the treated area or over the roadbed to a height of 14 feet above the running surface of the roadway on cut and fill slopes, within the road prism-variable distance. Limbs shall be cut to within 1 inch of the trunk to produce a smooth vertical face. Removal of trees larger than 6 inches in diameter for sight distance or safety may be directed by the Authorized Officer.

2105 - Vegetation that is outside of the road prism-variable distance that protrudes into the road

prism and within 14 feet in elevation above the running surface shall be cut, to within 1 inch of the trunk to produce a smooth vertical face.

2106 - Vegetative growth capable of growing 1 foot in height or higher shall be cut, within the road prism-variable distance or as directed by the Authorized Officer.

2107 - Inside curves shall be brushed out for a sight distance of 200 feet chord distance or a middle ordinate distance of 25 feet, whichever is achieved first. Overhanging limbs and vegetation in excess of 1 foot in height shall be cut within these areas.

2108 - Self-propelled equipment shall not be permitted on cut and fill slopes or in ditches.

2109 - Debris resulting from this operation shall be scattered downslope from the roadway. Debris shall not be allowed to accumulate in concentrations. Debris in excess of 1 foot in length and 2 inches in diameter shall not be allowed to remain on cut slopes, ditches, roadways or water courses, or as directed by the Authorized Officer.

2113 - Roadside brushing shall be accomplished as shown on the plans and as listed below:

Road No.	From M.P.	To M.P.
33-7-09.1	0.00	0.37
33-7-11.0 (A-B)	0.00	2.04
33-7-11.4	0.00	0.20
33-7-13.2	0.00	0.02
33-7-13.4	0.00	0.79
33-7-13.5 (A-F)	0.00	3.70
33-7-13.6 (A-B)	0.00	1.17
33-7-23.0	0.00	0.59
33-7-23.2	0.00	0.12
33-7-23.4	0.00	0.38
33-7-36.1	0.00	1.51
Temp Route 09-5	0.00	0.08
Temp Route 10-1-A	0.00	0.03
Temp Route 10-1-B	0.00	0.06
Temp Route 10-1-C	0.00	0.10
Jeep Route	0.00	0.05

2116 - Mechanical brush cutters shall not be operated when there are people and occupied vehicles within 400 feet of the immediate operating area.

2117 - Traffic warning signs shall be required at each end of the work area. Signs shall meet the

requirements of the Manual on Uniform Traffic Devices.

DECOMMISSIONING - 2600

2601 - Decommissioning includes ripping ***(unless noted otherwise)***, installing water bars, placement of slash and soil stabilization material, and blocking the roads from access by vehicles. Routes treated with all decommissioning actions except for ripping are listed as partially decommissioning. This work is required for route acceptance under Section 18 of this contract.

2603 - Decommissioning and partial decommissioning shall be performed on all temporary routes in accordance with these specifications, and as shown on the plans at the following locations:

Road No or Location	From Sta/MP	To Sta/MP	(D)ecommission or (P)artial
Jeep Route	0.00	0.05	D
Temp Route 09-5	0.00	0.08	D
Temp Route 10-1-A	0.00	0.03	D
Temp Route 10-1-B	0.00	0.06	D
Temp Route 10-1-C	0.00	0.10	P
Temp Route 15-1A	0.00	0.77	P

2604 - Decommissioning work shall be completed after timber extraction, logging activities and after road use.

2605 - Where draw crossing fill material is to be excavated and removed, the finished bottom of draw profile shall be re-established to its original channel grade and adjacent banks shall be re-established to their original back-slope ratios.

2606 - Stockpiled slash shall be used to protect exposed areas created by the Purchaser's decommissioning operations described in these sections. Slash shall be uniformly spread and placed without bunching. The operation shall produce a dense, uniform mat. All slash stockpiles created by the purchaser shall be utilized for decommissioning operations. Where slash is not available or no longer remaining, exposed soil areas shall be stabilized in accordance with Section 1800 – Soil Stabilization.

2608 – Protect areas mulched and treated with slash placement from damage by Purchaser traffic or construction equipment. Damaged areas shall be repaired by the Purchaser.

2609 - Access shall be blocked with barricades as shown on Exhibit C6 and as also listed on Exhibit C8.

2610 - All vegetation and slash shall be removed from the immediate area designated for excavation. Temporary routes shall be cleared of all vegetation and slash prior to ripping.

The resultant slash shall be stockpiled in a manner that will allow retrieval and uniform spreading in accordance with Section 2606. No vegetation or slash shall be mixed with excavated material to be placed.

2611 - Ripping and Water barring shall be done on designated traveled ways, turnouts, disturbed areas, and landings.

2613 - Water bars shall be installed across full width of temporary routes. Water bars shall be constructed as shown on Exhibit C6.

2614 - Protection of exposed surfaces shall be accomplished by placement of soil stabilization material in accordance with Section 1800 and placement of slash described in Section 2606 on temporary routes, disturbed areas, landings, cut banks, fill slopes and other areas disturbed by the Purchaser's decommissioning operations in accordance with these specifications and as shown on the plans.

SPECIAL PROVISIONS

1. Before the initial start of road renovation, construction, reconstruction, or surfacing operations, or after a shutdown of 7 or more days, the Purchaser shall notify the Authorized Officer 48 hours in advance of the date they plan to begin operations. The Purchaser shall also notify the Authorized Officer if they intend to cease operations for any period of 30 or more days.

2. The contractor shall protect and is responsible for any damage to existing telephone lines, transmission lines, fiber optic lines, fences, ditches, and other existing improvements as required in Section 14. Damage to utilities and existing improvements shall be promptly paid for or repaired to a condition which is, in the opinion of the Authorized Officer and the governing utility company, at least as good as the condition just prior to such damage.

3. All disturbed soil shall be seeded and mulched. Purchaser shall apply native grass seed and Certified Weed Free straw mulch for soil stabilization operations. BLM will furnish native grass seed, **if available**. Certified weed free straw mulch will be the responsibility of the contractor.

4. All stream channel culvert inlets shall be cleaned between **July 1st and September 15th** in accordance with Oregon Department of Fish and Wildlife (ODFW) in-stream work period guidelines.

5. Ensure that all large wood is retained in the stream channel during culvert cleaning activities by moving logs which had accumulated on the stream side of a culvert to the downstream side of the culvert.

6. While roadside brushing, there shall be no scarring or any other damage of the tree trunk or bole allowed. All debris resulting from roadside brushing activities shall be scattered downslope. Use of excavators for brush removal will be at the discretion of the Authorized Officer. **All culvert inlets and outlets shall be brushed for a radius of 4 feet.**

7. While roadside brushing through private industry lands, conifer trees at the edges of the cleared area (see cutting limit, Exhibit C7) shall have the branches pruned rather than being felled.

8. All stumps, designated by the Authorized Officer, which would interfere with normal blading and road renovation operations (including turnouts), shall be removed in such a way as to not cause damage to the drainage ditch or the road bed. Stumps that are ground-down, shall be ground to a minimum of 3 inches below existing grade.

General road maintenance specifications are designated by numeric symbols according to the type of work performed as follows:

SECTION	DESCRIPTION
3000	General
3100	Operational Maintenance
3200	Seasonal Maintenance
3300	Final Maintenance
3400	Other Maintenance

GENERAL - 3000

3001 - The Purchaser shall be required to maintain all roads listed and/or referenced in Section 42, as shown on the Exhibit D maps of this contract, and in accordance with Sections 3000, 3100, 3200, 3300, and 3400 of this exhibit.

3001a - The Purchaser shall be required to provide maintenance on roads in accordance with Subsection 3403, 3403a, and 3040.

3002 - The Purchaser shall maintain the cross section of existing dirt or graveled roads to the existing geometric standards. Any roads required to be constructed, improved, or renovated under terms of this contract shall be maintained to the geometric standards required in Exhibit C of this contract.

3003 - The minimum required maintenance on any roads shall include the provisions specified in Subsections 3101, 3104, and 3105.

3004 - The Purchaser shall be responsible for providing timely maintenance and cleanup on any road(s) with logging units substantially completed prior to moving operations to other roads. The maximum length of non-maintained or non-cleanup of the road prism shall not exceed the sum of one (1) mile at any time. Release of maintenance requirements may be granted, upon written request, when the conditions specified in Sections 3300 and 3400 are met satisfactorily.

OPERATIONAL MAINTENANCE - 3100

3101 - The Purchaser shall blade and shape the road surface and shoulders with a motor grader. Banks shall not be undercut. Back blading with tractors or similar equipment will be allowed only around landings and other areas when approved by the Authorized Officer.

3103 - The Purchaser shall maintain established berms and place additional berms using adjacent material where needed to protect fills as directed by the Authorized Officer.

3104 - The Purchaser shall perform other road cleanup including removal of debris, fallen timber, bank slough, and slides which can practicably be accomplished by a motor grader, rubber tired front end bucket loader, rubber tired backhoe or comparable equipment, and by the use of hand tools.

3104a - Removal of bank slough and slide material includes placement of material at the nearest designated, suitable disposal site where material cannot erode into streams, lakes, or reservoirs or cause undue damage to road fill slopes which have been planted or mulched to control soil erosion as directed by the Authorized Officer.

3104b - The Purchaser shall be responsible for removal of all slides or slough, up to fifteen (15) station yards in quantity, at any one site. This work includes unlimited multiple sites on all roads required to be maintained by the Purchaser.

Prior to removal of any slough or slide material exceeding fifteen (15) station yards at any one site, the Purchaser and the Authorized Officer or their Authorized Representatives shall agree in writing, in the field, to the quantity of material, method of disposal, and the disposal site. Work may commence immediately after agreement.

Upon completion of agreed upon work, a reduction in timber sale purchase price will be made to offset the cost of the work, based on current BLM Road Cost Guide. Adjustments in purchase price for completed work shall be made as necessary and no less than once per year when actual work is ongoing.

3105 - The Purchaser shall be responsible for maintaining normal flow in drainage structures. This includes cleaning out drainage ditches, catch basins, clearing pipe inverts of sediment and other debris lodged in the barrel of the pipe, and maintaining water dips and water-bars using equipment specified in Subsection 3104 and other culvert cleaning and flushing equipment.

3106 - The Purchaser shall be responsible for repair and replacement of all materials eroded from road shoulders and fill slopes, up to fifteen (15) station yards in quantity, at any one site. This work includes unlimited multiple sites on all roads required to be maintained by the Purchaser. Prior to repair and replacement of eroded material exceeding fifteen station yards at any one site, the Purchaser and the Authorized Officer or their Authorized Representatives shall agree in writing, in the field, to the quantity of material, borrow source and method of repair. Work may commence immediately after agreement.

Upon completion of agreed upon work, a reduction in timber sale purchase price will be made to offset the cost of the work based upon current BLM Road Cost Guide. Adjustments in purchase price for completed work shall be made as necessary and no less than once per year when actual work is ongoing.

3107 - The Purchaser shall cut or trim trees and brush which obstructs vision or prevents the safe passage of traffic along the traveled way when directed by the Authorized Officer.

The Purchaser shall also cut trees or brush encroaching on the road prism that are a result of his activities or winter damage during the contract period. Disposal of such vegetative material shall be by scattering below the road.

3108 - The Purchaser shall avoid fouling gravel or bituminous surfaces through covering with earth and debris from side ditches, slides or other sources. The Purchaser shall also avoid blading surfacing material off the running surface of the roadway. Skidding of logs on the roadway in or outside designated logging units is not authorized without prior written approval by the Authorized Officer. Repair required caused by such skidding activity is not considered maintenance and shall be repaired at the Purchaser's expense.

3108a - The Purchaser shall perform logging operations on gravel and/or bituminous roadways only where the locations have been marked on the ground and/or approved by the Authorized Officer. Repair of the road shall be as specified in Subsection 3401.

SEASONAL MAINTENANCE - 3200

3201 - The Purchaser shall perform preventative maintenance at the end of Purchaser's hauling each season and during non-hauling periods which occur between other operations on the contract area. This includes requirements specified in Section 3100.

3202 - The Purchaser shall perform and complete maintenance specified in Sections 3000, 3100, and 3200 on all roads maintained by him, prior to October 1st each year, except as specified in Subsection 3203, after initial commencement of construction or logging operations. Thereafter, all roads shall have continuous preventive maintenance and road cleanup until suspension of seasonal operations. This includes all roads used and not used during the proceeding operating seasons.

3203 - The Purchaser shall complete road cleanup and maintenance, as specified in Section 3100, at the completion of logging operations on any roads located in an area separate from the area where logging activities will resume.

3204 - The Purchaser shall be responsible for performing post storm inspections and maintenance during the winter season to minimize erosion and potential road or watershed damage.

FINAL MAINTENANCE - 3300

3301 - The Purchaser shall complete final maintenance and/or damage repairs on all roads used under terms of their contract within thirty (30) calendar days following the expiration of Purchaser's right to cut and remove timber (Sec. 4) and in accordance with Sec. 16(b) of this contract. This work shall include any maintenance and/or damage repairs specified in Sections 3000, 3100, and 3200 necessary to meet the conditions specified in Subsection 3002 and shall be executed in accordance with Subsection 3302 of this section.

The Authorized Officer may grant acceptance of Purchaser's maintenance responsibility in part where certain individual roads or road segments are no longer of any use to the Purchaser's remaining removal operations, providing that all contract requirements as specified under Sec. 16(b), Special Provisions (Sections 3000, 3100, 3200 and 3300 of the maintenance specifications) have been completed and a relinquishment of cutting and removal rights on cutting units tributary to these roads is signed by the Purchaser. Request for partial acceptance must be submitted in writing by the Purchaser.

3302 - The Purchaser shall perform final road maintenance only when weather or soil moisture conditions are suitable for normal maintenance equipment operations as determined by the Authorized Officer.

If final maintenance is delayed after the date required in Subsection 3301 of this contract by adverse soil moisture or unsuitable equipment operating conditions, the Purchaser will be notified by the Authorized Officer when soil moisture and equipment operating conditions are suitable. The Purchaser shall then be required to complete final

maintenance within 30 days.

OTHER MAINTENANCE - 3400

3401 - The Purchaser shall repair any damage to road surfaces that was specified under Subsection 3108 and 3108a. This repair includes restoring the roadway to the designed standard and replacement of surfacing with approved surface material. This repair is not limited to use of equipment specified in Subsection 3104.

3402 - The Purchaser shall be permitted to remove ice and snow from roads authorized for use under this contract only when prior written approval has been secured from the Aurthorized Officer. The Purchaser shall submit a written request for permission to remove ice and snow in advance of the date operations are to begin.

Upon receiving written aurthorization for ice and snow removal, the Purchaser will perform the work according to the conditions and equipment requirements set forth in the Authorization.

3403 - The Purchaser shall be required to furnish and apply non-saline water during dry hauling periods, when directed by the Authorized Officer, for the purpose of laying dust and to prevent loss of surface material. The first application of water shall be made at the rate of one- half gallon per yd^2 of road surface traveled. Subsequent applications shall be made for each 40 MBF of timber or 120 yds^3 of rock hauled. Subsequent watering may be done at a rate less than one-half gallon per yd^2 when a specified lesser rate is approved by the Authorized Officer.

All haul roads shall be watered for entire length and/or as approved by the Authorized Officer.

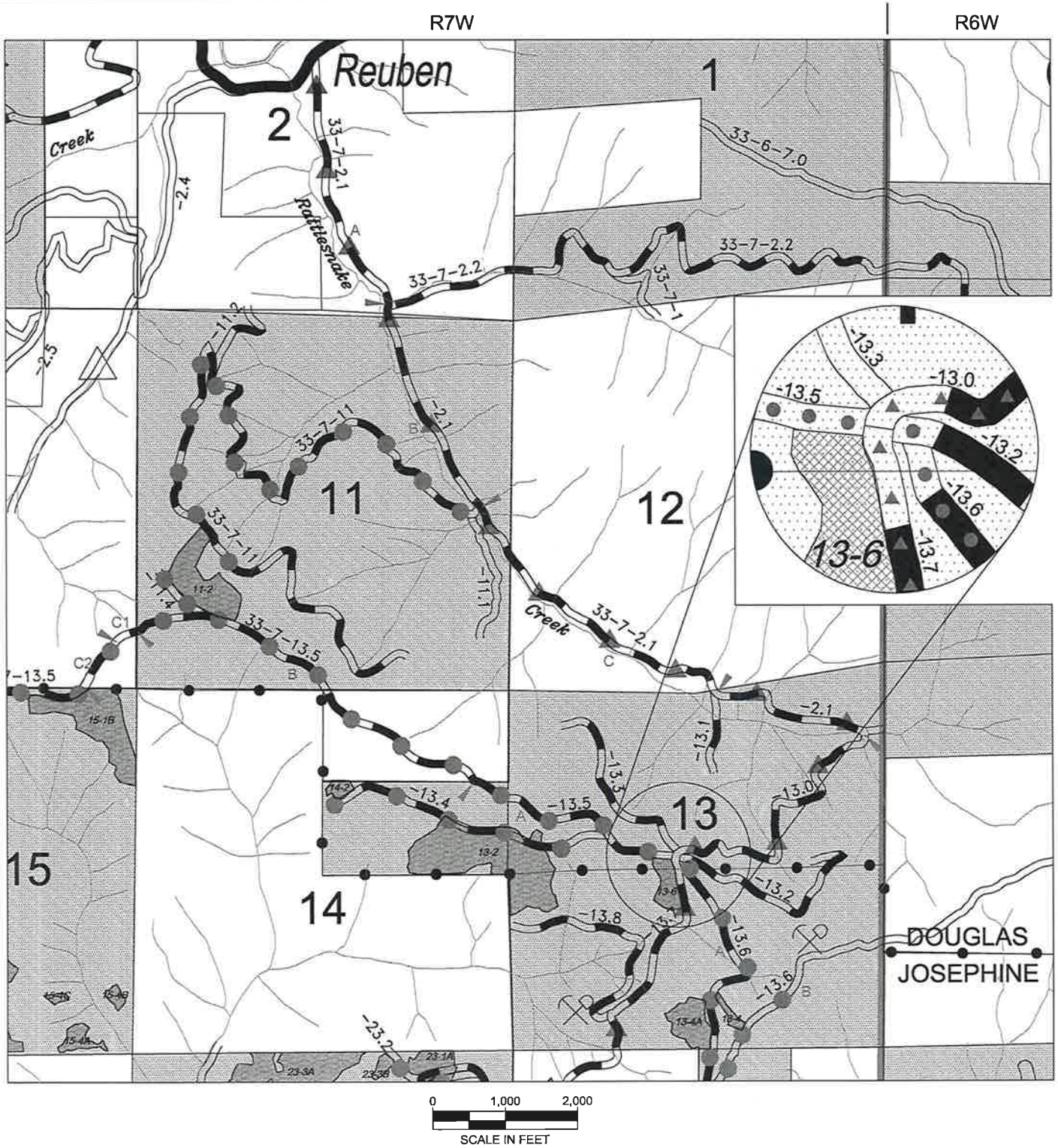
3403a - During dry hauling conditions when watering is not required, the Purchaser shall reduce hauling speeds to 10 MPH and/or restrict the number of loads hauled to 4 per day in lieu of watering.

3404 - The Purchaser may at his option and expense, substitute lignin sulfonate, magnesium chloride, or bituminous dust palliatives for water on any or all road segments listed in Subsection 3403 or 3403a provided that written approval is received from the Authorized Officer. Such authorization shall include approval of product specifications for the application of the product to be used. Multiple applications may be required to maintain the conditions specified in Subsection 3403.

EXHIBIT D2

SHEET 1 OF 3

BURNT RATTLER T.S.
TRACT NO. ORM07-TS-14-11



BLM OWNERSHIP

T.S. UNITS 20-1

BST ROAD

CRUSHED ROCKED ROAD

NATURAL SURFACE ROAD

PRIVATE ROAD

GATE

BLM MAINTENANCE

PURCHASER MAINTENANCE

N

ALWAYS
THINK
SAFETY

REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE ROAD MAINTENANCE MAP

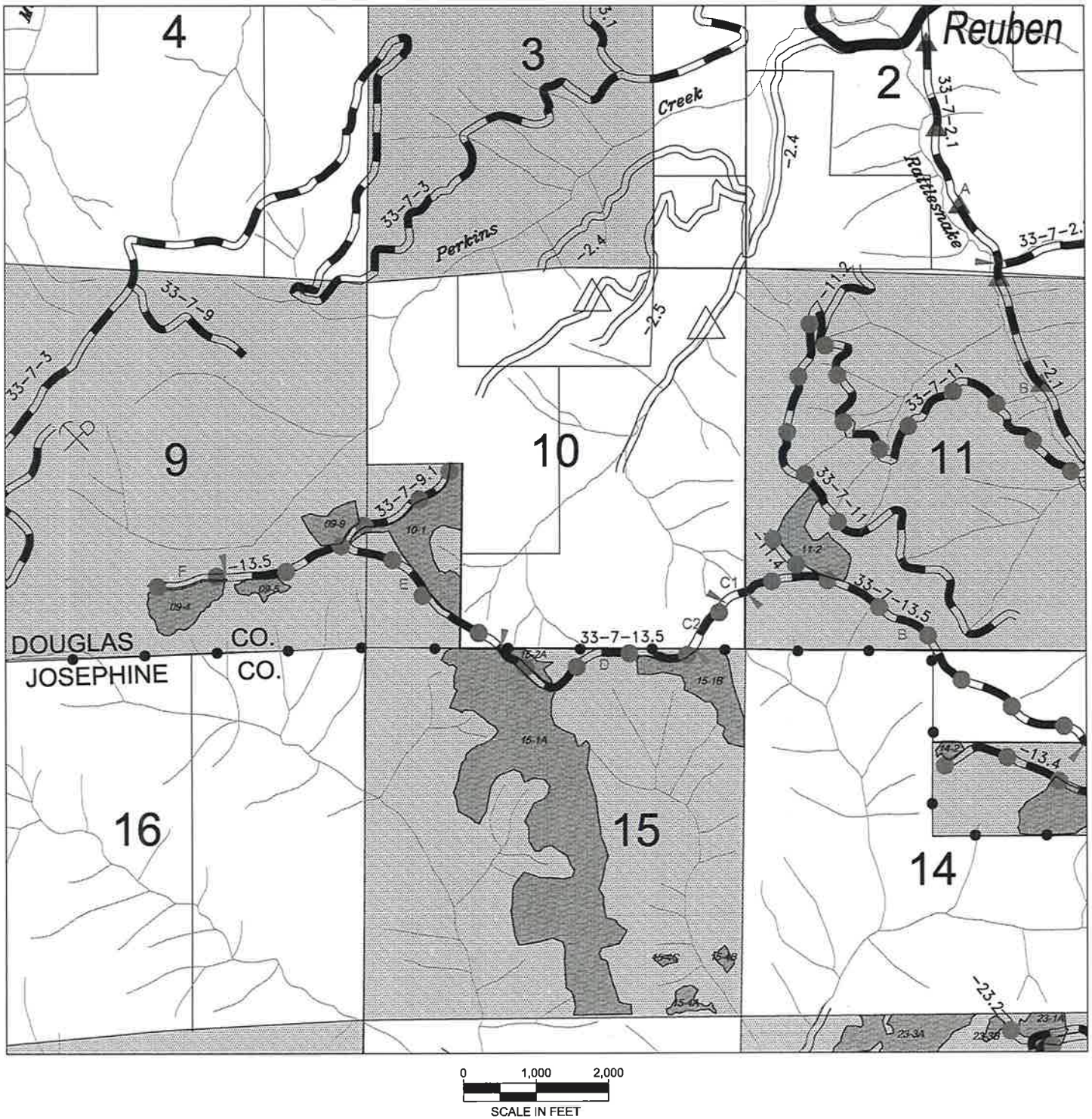
DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: 1" = 2,000 FT
DATE: JUN 2014	SHEET: 1 OF 3
DRAWING NO.: OR-11-9113.4-1	

EXHIBIT D2

SHEET 2 OF 3

BURNT RATTLER T.S.
TRACT NO. ORM07-TS-14-11



BLM OWNERSHIP

T.S. UNITS 20-1

BST ROAD

CRUSHED ROCKED ROAD

NATURAL SURFACE ROAD

PRIVATE ROAD

GATE

BLM MAINTENANCE

PURCHASER MAINTENANCE

ALWAYS THINK SAFETY

REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE ROAD MAINTENANCE MAP

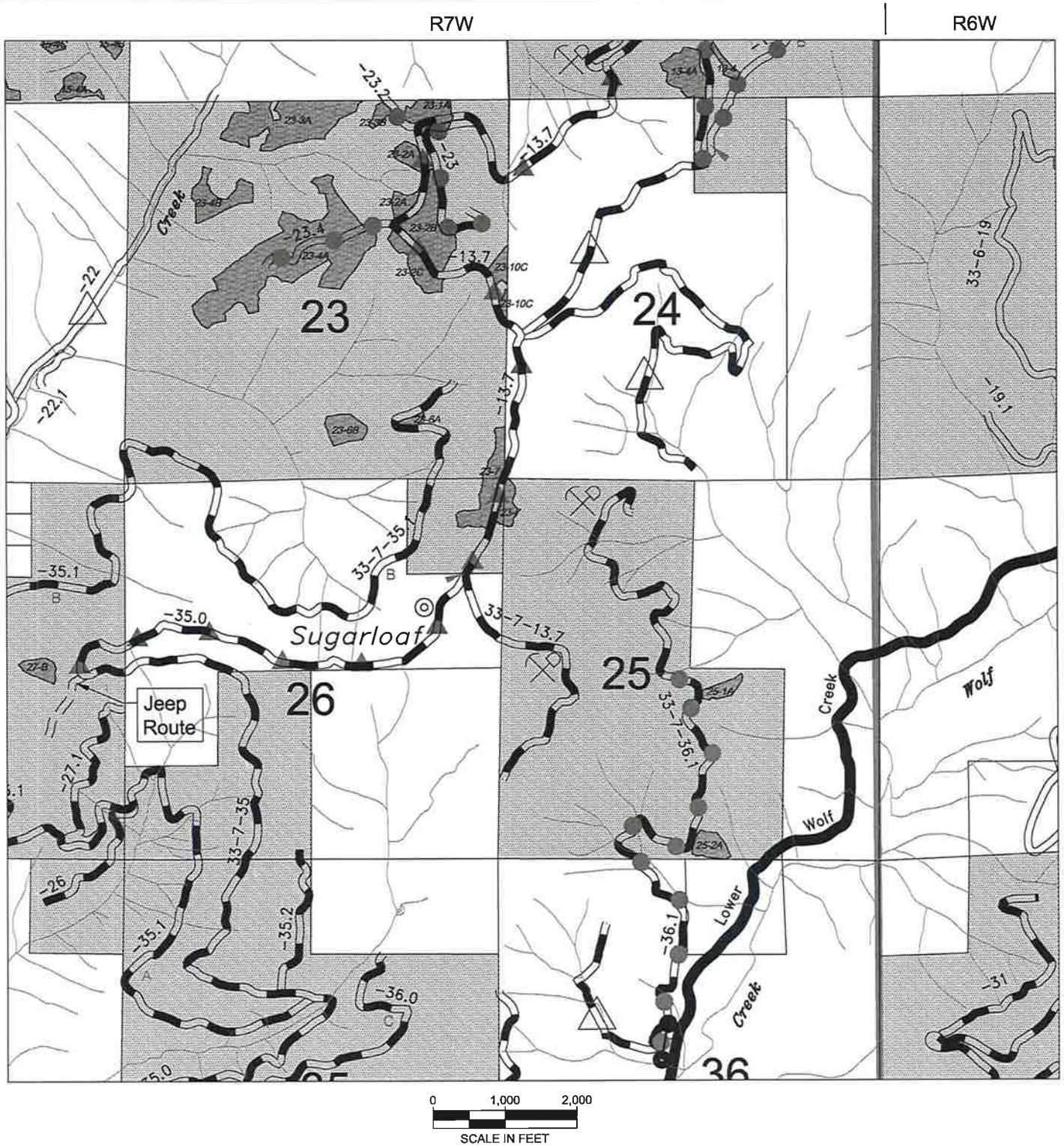
DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: 1" = 2,000 FT
DATE: JUN 2014	SHEET: 2 OF 3
DRAWING NO.: OR-11-9113.4-1	

EXHIBIT D2

SHEET 3 OF 3

BURNT RATTLER T.S.
TRACT NO. ORM07-TS-14-11



BLM OWNERSHIP

T.S. UNITS 20-1

BST ROAD

CRUSHED ROCKED ROAD

NATURAL SURFACE ROAD

PRIVATE ROAD

GATE

BLM MAINTENANCE

PURCHASER MAINTENANCE

N

ALWAYS THINK SAFETY

REV. NO.	DESCRIPTION	DATE	APPROV.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
MEDFORD DISTRICT - MEDFORD, OREGON

BURNT RATTLER TIMBER SALE ROAD MAINTENANCE MAP

DESIGNED:
REVIEWED:
APPROVED:

DRAFTED BY: ELF	SCALE: 1" = 2,000 FT
DATE: JUN 2014	SHEET: 3 OF 3
DRAWING NO.: OR-11-9113.4-1	

SELECTION CRITERIA-DESIGNATION BY PRESCRIPTION EXHIBIT E

The Selection Criteria shown below shall be used by the Purchaser in determining which trees are to be retained and which trees are to be cut and removed. Consider safety in determining whether a fire-killed or fire-injured snag should remain standing. The operator will have flexibility and responsibility to remove any snag or tree deemed unsafe for workers on site.

The Selection of retention shall comply with Burnt Rattler Special Provisions Sec 41. The Purchaser shall leave all boundary trees marked with orange paint and/or poster tags. Within harvest units, the Purchaser shall also leave live hardwoods and live green conifers with a low probability of mortality as defined in Appendix 1 of this Exhibit.

Before cutting and removing any trees necessary to facilitate logging in all Harvest Units shown on Exhibit A, the Purchaser shall identify the location of the skid roads, cable yarding roads, and tailhold, tieback, guyline, lift, intermediate support, and danger trees on the ground in a manner approved by the Authorized Officer at the pre-work conference and documented in the Logging Plan. Said Purchaser identification of trees to be cut and removed does not constitute authority to proceed with cutting and removal. Trees that are removed to facilitate logging do not count toward the leave tree requirements described below.

Treatment Objectives: Recover mortality and anticipated mortality in designated unit areas burned in the Douglas Complex Fire. Retain structural features of snags and coarse woody debris (CWD) per RMP direction:

- Snags: 2 snags per acre to meet the requirement for cavity nesting birds at 40 percent of potential population levels
- CWD: 120 linear feet of decay class 1 and 2 logs per acre ≥ 16 inches in diameter and ≥ 16 feet long. Where existing CWD is deficit, 2 additional snags per acre ≥ 16 inches in diameter shall be used to make up the deficit).

Retain structural features of the stand as wildlife components. See Tables 1 and 2 of this Exhibit for individual Unit retention targets.

Prescription: Salvage harvest fire-killed and fire-injured trees using the determining variable of percent crown scorch as defined in Appendix 1. Use retention criteria per unit described below to retain trees and coarse woody debris in clumps and/or dispersed stems (clumps are preferred). Fire-killed and fire-injured trees in excess of retention standards may be harvested. **Appendix 1** describes the condition of trees available for removal. **Appendix 2** illustrates desirable reserve snags and snag clumps. **Appendix 3** illustrates possible scenarios for distributing retention snags. **Appendix 4** describes the characteristics of snags and coarse woody debris.

In determining what material to retain to meet the required snag and coarse woody debris per acre, the Purchaser shall make selections based on the following criteria and apply these to **all** harvest units:

LIVE GREEN TREES

- Trees considered **not suitable** for harvest:
  - Conifers with a low probability of mortality (see Appendix 1).
  - Live hardwoods > 8 inches DBH.
  - Orange marked trees.

SNAGS

- Desired individual tree characteristics
  - Retain the largest available snags (≥ 16″ DBH) per acre if not a hazard to the operation (some units may not provide enough ≥ 16” DBH snags).
  - Favor retaining large wolf trees or trees with heavy branching or poor form.
  - Wildlife trees (painted orange “W” on the bole of the tree).
  - Favor leaving the most windfirm snags, considering taper (H/D ratio), exposure, etc.
  - Refer to **Appendix 2** for examples.
- Retained snags should reflect the species mix of the original stand.
- Retain and tally all non-hazardous large hardwood snags (≥ 16 inches DBH).
- If a retention snag needs to be fallen for safety concerns another snag of similar size will be retained in substitution.
- Leave trees may be dispersed or clumped.
  - In most units retention of clumps is preferred to dispersed single trees **except** in Del Norte (Talus soil portions) Units 11-2 (SE of Rx change line flagged in white: approx. 5 ac), 09-4 (S of Rx change line flagged in white: approx. 4.5 ac), 13-4 (1 ac), 13-4A (7 ac), and 23-10C north (2 ac) where more evenly spaced dispersed single tree retention is preferred and clumping avoided.
  - Distribution and size will depend on conditions in each unit and unit size will influence the amount of structure available. **Appendix 3** illustrates possible scenarios of distributing snags within a unit.
- When reserving snags in clumps consider the following:
  - In units greater than 5 acres, avoid placing clumps entirely on the sides or bottoms of the unit and preferably, include interior clumps in the distribution.
  - Clumps should vary in size and shape and range from a few trees to larger blocks.
  - Clumps are preferred within the interior of the unit as safe operations permit.
  - Clumps can also be placed along the bottom and/or along a portion of the sides in a wedge pattern from the edge of the unit.
  - Clumps may include any combination of live green leave trees, sub merchantable material, and snags (however only dead trees ≥ 16 inches DBH may be counted toward snag retention).
- Excess snags retained in a unit can count towards filling any deficit coarse woody debris retention.
- Cull trees ≥ 16” DBH can contribute towards snags (dropped culls can contribute to CWD if they meet the minimum specifications of ≥ 16’ x 16” Decay Class 1 or 2.

- Options to retain dispersed snags and/or snag clumps include:
  - Among understory trees
  - Among other leave trees that are live, large, and windfirm
  - Around shrub understories
  - Inoperable areas such as rock outcrops, steep slopes, sensitive soils
  - Around clusters of coarse woody debris

COARSE WOODY DEBRIS (CWD)

- Retain 120 linear feet per acre of CWD ≥ 16 inches large end diameter and ≥ 16 ft. minimum length (16" x 16') using decay class (DC) 1 and 2 material.
  - Refer to Appendix 4 Table 4-2 for conversion from tree diameter class to the number of qualifying 16 foot logs.
  - Where this retention cannot be met with existing CWD, use standing material to make up the deficit.
- If removing down woody material (DWM) for a merchantable product, ensure that 280 linear feet per acre of non-merchantable DWM is met first (total CWD and DWM should equal 400 linear feet per acre before extraction begins).

YARDING OF UNMERCHANTABLE MATERIAL (YUM)

- Five (5) conventional yarding system units have been designated as having excessive dead hardwood densities requiring removal: Units 09-4 (5 ac), 11-2 (3 ac), 15-1A (74 ac), 23-2A (2 ac), and 25-1A (1 ac).
- After meeting minimum snag and/or CWD retention amounts, YUM yard excess dead hardwood material 8-16 inches DBH from the unit and deck in the location as shown on Exhibit S maps.

PURCHASER TALLY OF MARKED TREES:

For all units, the Purchaser shall mark and record all retention snags (as determined by Appendix 1). Marked trees shall be recorded on tally cards by species using one (1) inch diameter class as shown:

1-in. Diameter Class	Diameter Range
16	15.6 – 16.5
17	16.6 – 17.5
18	17.6 – 18.5
19	18.6 – 19.5
20	19.6 – 20.5
21	20.6 – 21.5
22	21.6 – 22.5
23	22.6 – 23.5

Tables 1 and 2 provide the total count required for each unit. Falling of trees in a unit will occur only after marking has been accepted.

COMPLIANCE INSPECTION:

Compliance inspection of the marking will occur after unit tally cards are submitted to the Government and prior to the falling of trees within the unit to be inspected. Non-compliance with the Prescription and/or Selection Criteria shall constitute a contract violation which may

result in a suspension of operations as provided in Section 10 of the contract. Inspection will consist of:

1) A review of the tally cards on a unit basis to determine that each unit meets the minimum total number of snags as displayed in Tables 1 and 2.
2) Field review of the selection of leave trees in compliance with crown scorch guidelines (Appendix 1 and 2) and the Prescription in this Exhibit (pgs. 2-3).

INDIVIDUAL UNIT RETENTION

MATRIX RETENTION:

Units 09-4 (4.5 ac N of Rx change line), 09-5 (3 ac), 09-9 (7 ac), 10-1 (26 ac), 11-2 (12 ac W of Rx change line), 13-2 (34 ac), 13-6 (5 ac), 14-2 (2 ac), 15-1A (120 ac), 15-1B (19 ac), 15-2A (4 ac), 15-4A (3 ac), 15-4B (1 ac), 15-4C (1 ac), 23-6A (1 ac), 23-6B (4 ac), 23-7 (11 ac), 23-10C south (1 ac), 25-1A (2 ac), 25-2A (3 ac), and 27-B (3 ac):

- Retain a minimum of **2-4 largest available** snags per acre (≥ 16″ DBH): 2 snags/ac when 120 linear feet of CWD is met, 3-4 snags/ac when CWD is deficit.
- See Table 1 for required total snag retention to meet snag and CWD targets.
- Retain 280 linear feet of non-merchantable DWM before extracting merchantable DWM.
- YUM Portions of Units 15-1A and 25-1A: After all CWD and snag retention numbers are met, YUM yard excess dead hardwoods 8-16 inches DBH from portions of the units and deck in the location as shown on Exhibit S maps.

Table 1. Leave tree requirements (snags ≥ 16 inches DBH) to satisfy both snag and CWD retention guidelines

Unit	Acres	YUM Acres	Existing linear ft. CWD ≥ 16” & ≥ 16’ per acre	Minimum total number of snags ≥ 16” to retain for snag & CWD
09-4	4.5		171	8
09-5	3		0	7
09-9	7		513	9
10-1	26		86	46
11-2	12		570	11
13-2	32		220	61
13-6	5		342	7
14-2	2		342	0
15-1A*	120	74	377	180
15-1B	19		391	34
15-2A	4		0	11
15-4A	3		0	9
15-4B	1		0	4
15-4C	1		0	4
23-6A	1		0	4
23-6B	4		0	6
23-7	11		684	18

23-10C south	1		570	1
25-1A*	2	1	684	3
25-2A	3		0	8
27-B	3		0	11
* YUM hardwoods 8-16" DBH from portions of the Units as shown in Exhibit S				

WILDLIFE RETENTION:

Units 09-4 (7.5 ac S of Rx change line), 11-2 (5 ac SE of Rx change line), 13-4 (2 ac), 13-4 (1 ac), 13-4A (7 ac), 23-1A (6 ac), 23-2A (5 ac), 23-2B (13 ac), 23-2C (5 ac), 23-3A (20 ac), 23-3B (1 ac), 23-4A (43 ac), 23-4B (6 ac), and 23-10C north (2 ac):

- Retain a minimum of **4 largest available** snags per acre (≥ 16 ″ DBH).
- See Table 2 for required total snag retention to meet snag and CWD targets.
- Retain all CWD (no extraction of DWM).
- Del Norte (Talus soil portions) Units 09-4 (S of Rx change line flagged in white: approx. 4.5 ac), 11-2 (SE of Rx change line flagged in white: approx. 5 ac), 13-4 (1 ac), 13-4A (7 ac), and 23-10C north (2 ac): **Dispersed retention** is desired throughout the talus area as shown on Exhibit A. Prescription line changes are delineated on the ground with **white colored** flagging.
- YUM Portions of Units 09-4, 11-2, and 23-2A: After all CWD and snag retention numbers are met, YUM yard excess dead hardwoods 8-16 inches DBH from portions of the units and deck in locations as shown on Exhibit S.

Table 2. Leave tree requirements (snags ≥ 16 inches DBH) to satisfy snag, CWD, CHU, Del Norte salamander, and NSO core retention guidelines

Unit	Acres	YUM Acres	Minimum total number of snags ≥ 16" to retain for snag & CWD
09-4*†	7.5	5	30
11-2*†	5	3	8
13-4†	1		1
13-4A†	7		26
23-10C north†	2		4
23-1A†	6		20
23-2A*	5	2	10
23-2B	13		52
23-2C	5		14
23-3A	20		59
23-3B	1		4
23-4A	43		99
23-4B	6		0
* YUM hardwoods 8-16" DBH from portions of the Units as shown in Exhibit S			

† Dispersed retention (not clumped): 09-4 (S of Rx change line flagged in white: approx.. 4.5 ac), 11-2 (SE of Rx change line flagged in white: approx. 5 ac), 13-4 (1 ac), 13-4A (7 ac), and 23-10C north (2 ac)

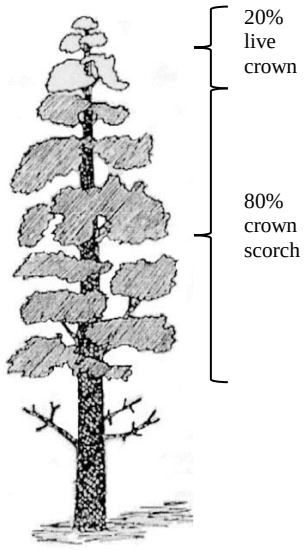
APPENDIX

1. The Southwest Oregon Forest Insect and Disease Service Center guidelines (SWOFIDSC 2001).

Species	% Crown Scorch
Douglas-fir	> 70
Sugar Pine	> 65
Ponderosa Pine	> 70
Incense Cedar	> 90
White Fir	> 40
Western Hemlock	> 25

Percent crown scorch is a measure of the proportion of foliage that has been killed by the fire relative to the entire amount of foliage that was present before the burn (scorched foliage should be obvious to the naked eye as yellowish brown or red needles). Lower branches dead before the fire should not be included when determining crown scorch.

Percent Crown Scorch

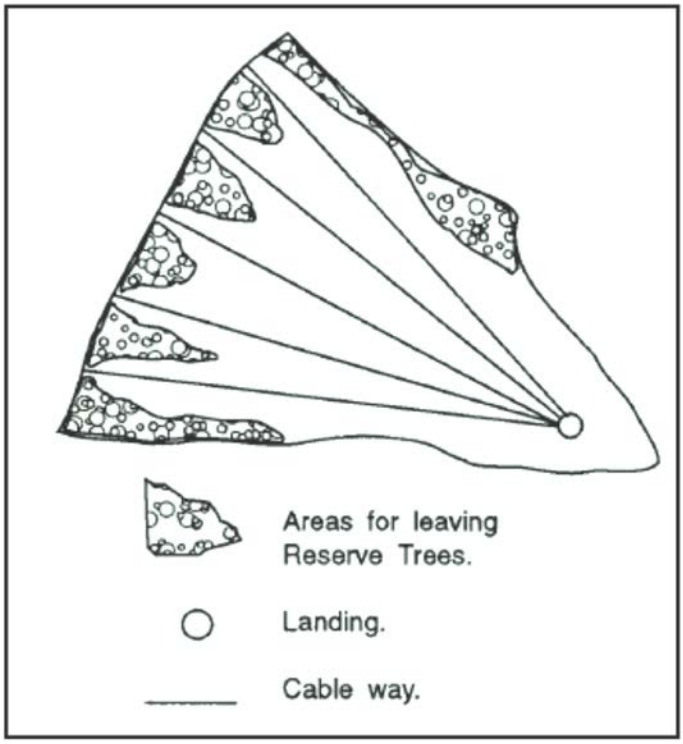


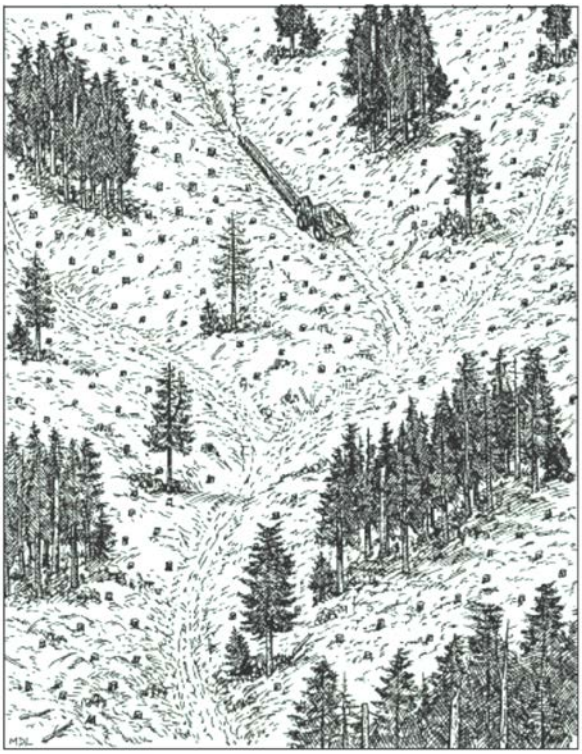
To evaluate visual estimation of percent crown scorch:

- Position yourself to view the entire tree crown, preferably at right angles to the direction of fire spread.
- Reconstruct the pre-fire crown appearance by looking at the fine branch structure and needles.
- Estimate the percent of crown killed by the fire based on your estimation of the pre-fire crown area. These include areas with yellowish brown, brown, or red needles, as well as blackened fine branches.
- Assess the tree with consideration to all sides of the crown. One side may show higher crown scorch than the opposite side.
- Borderline Douglas-fir can be evaluated for presence of boring dust. Borderline trees with boring dust greater than 90% of the bole are mass-attacked by beetles, will die regardless of fire injury, and can be removed.
- Lower crowns that contain blackened fine branches contribute to crown scorch. Lower branches lacking fine twigs were likely dead before the fire and should **not** be included in crown scorch (as pictured). Unsymmetrical crown bases may be visually moved to even out the crown shape.

2. Desirable leave tree clusters

3. Example scenarios of clump and clump-dispersed distributions in a unit.





Source: Guidelines for Selecting Reserve Trees (Publication F417-092-000 [08/2005]

4. Coarse Woody Debris and Snags

Trees designated for coarse woody debris should have characteristics of decay class 1 and 2 logs (e.g., bark intact, limbs intact, texture mostly sound, round shape). To meet the 1995 ROD/RMP guidelines, leave a minimum of 120 linear feet of logs per acre greater than or equal to 16 inches in diameter at the large end and 16 feet long (120 linear feet is equivalent to 7.5, 16-foot logs) (Information Bulletin OR-97-064 and Instruction Memorandum OR-95-028).

In addition, a minimum of 280 linear feet of DWM shall be retained, where present, to meet a combined total of 400 linear feet CWD and DWM. Where this number is met, additional merchantable DWM resulting from the fire event (windthrow, retardant drops, and other suppression activities) may be removed as a commercial product.

Table 4-1. Coarse Woody Debris / Down Woody Material Decay Classes

Log Characteristics	Decay Class				
	1	2	3	4	5
Bark	Intact	Intact	Trace	Absent	Absent
Twigs <3 cm.	Present	Absent	Absent	Absent	Absent
Texture	Intact	Intact to partly soft	Hard, large pieces	Small, soft blocky pieces	Soft and powdery
Shape	Round	Round	Round	Round to oval	Oval
Color of wood	Original color	Original color	Original color to faded	Light brown to reddish brown	Red brown to dark brown
Portion of log on ground	Tree elevated on support points	Tree elevated on support points but sagging slightly	Tree is sagging near ground	All of tree on ground	All of tree on ground
Invading roots	None	None	In sapwood	In heartwood	In heartwood

Table 4-2. Number of 16-foot Logs produced by Tree Diameter Class

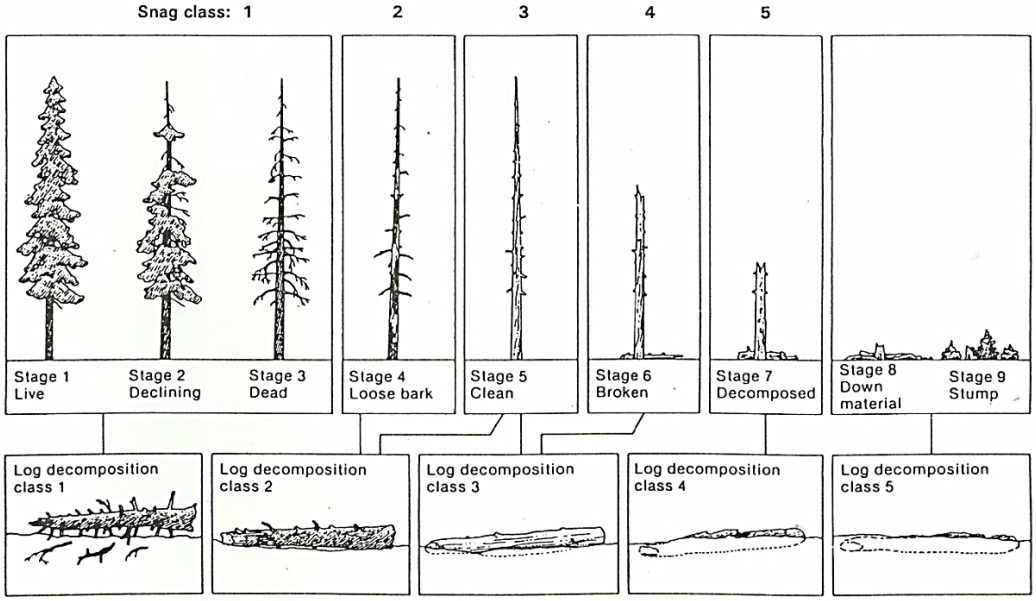
Tree DBH	Number of logs per tree 16″ by 16′
16″	1
20″	1
24″	3
28″	4
32″	5
36″	6
40″	6
44″	7
48″	7
52″	8
56″	8
60″	9
64″	9

Source: Forest Survey Handbook BLM Manual Supplement Handbook 5250-1. 1995. Stand Exam Detail Screen

Table 4-3. Physical Characteristics of Snags by Deterioration Stage

Stage	Characteristics
1	Limbs and branches all present Pointed tree top Tight bark Recently dead
2	Few limbs No fine branches Pointed or broken tree top Variable level of bark remaining
3	Limb stubs only Decay in upper bole Some decay at base of bole Variable level of bark remaining
4	Few or no stubs No fine branches Broken top Loose or no bark

THE FIVE SNAG CLASSES AND THEIR RELATIONSHIP TO LOG CLASSES



DEFINITIONS

Coarse Woody Debris (CWD): Portion of tree or entire tree that has fallen or been cut and left lying on the forest floor. Minimum qualifying stem as defined in this project must be ≥ 16 inches in diameter and ≥ 16 feet long.

Conifer: An evergreen tree that produces cones, needle-shaped leaves, and wood known commercially as "softwood".

DBH: Diameter of the tree at breast height, measured at four point five feet (4.5') above the ground level from the uphill side of the tree.

Down Woody Material (DWM): Logs lying on the forest floor that include merchantable and non-merchantable material in all decay classes.

Fire-Killed Tree: A standing or fallen conifer tree with 100% of the crown scorched showing brown needles or the crown is black with no needles.

Fire-Injured Tree: A conifer tree exhibiting crown scorch while still retaining green needles. Some fire-injured trees may die within the next 4 years (Appendix 1).

Fire-Injured Trees with a High Probability of Mortality: Standing trees that meet the description of fire-killed or fire-injured trees with a high probability of mortality defined in Appendix 1.

Hardwood: A live green broad-leaved tree which usually has a single well-devined trunk, exhibits > 30% live crown ratio and is capable of attaining a height greater than 20 feet. These include, but are not limited to alder, chinquapin, bigleaf maple, madrone, and oak species. Sprouting hardwood species may be in the form of multi-stemmed clumps originating from the base of a single defined stump.

Leave tree: Live green tree to be retained within the specifications of this prescription. These include live green conifers and large hardwoods, as well as fire-injured trees with a low probability of mortality as designated in Appendix 1.

Percent crown scorch: A measure of the proportion of foliage that has been killed by the fire relative to the entire amount of foliage that was present before the burn (scorched foliage should be obvious to the naked eye as yellowish brown or red needles).

Snag: 1. A dead or dying tree with physical characteristics exhibiting varying rates of decomposition (Appendix 4, Table 4-3). 2. Standing dead conifer or hardwood tree species (with a well-defined single main stem or trunk) from which the top has died or from which the leaves and most of the branches have fallen. 3. The remaining standing section of a tree whose crown has broken away from the stem. 4. Conifer trees that exhibit a high probability of mortality within the next 4 years (Appendix 1).

U.S.D.I. BLM MEDFORD DISTRICT
CONTRACT EXHIBIT F
TIMBER SALE NO. ORM07-TS-14-11
JOSEPHINE & DOUGLAS COUNTIES

BURNT RATTLER SALVAGE TIMBER SALE
T.33S., R.7W., SEC'S 10, 11, 13, 14, 15, 23, 25 WILL. MER.
CONTOUR FELLING EXHIBIT F

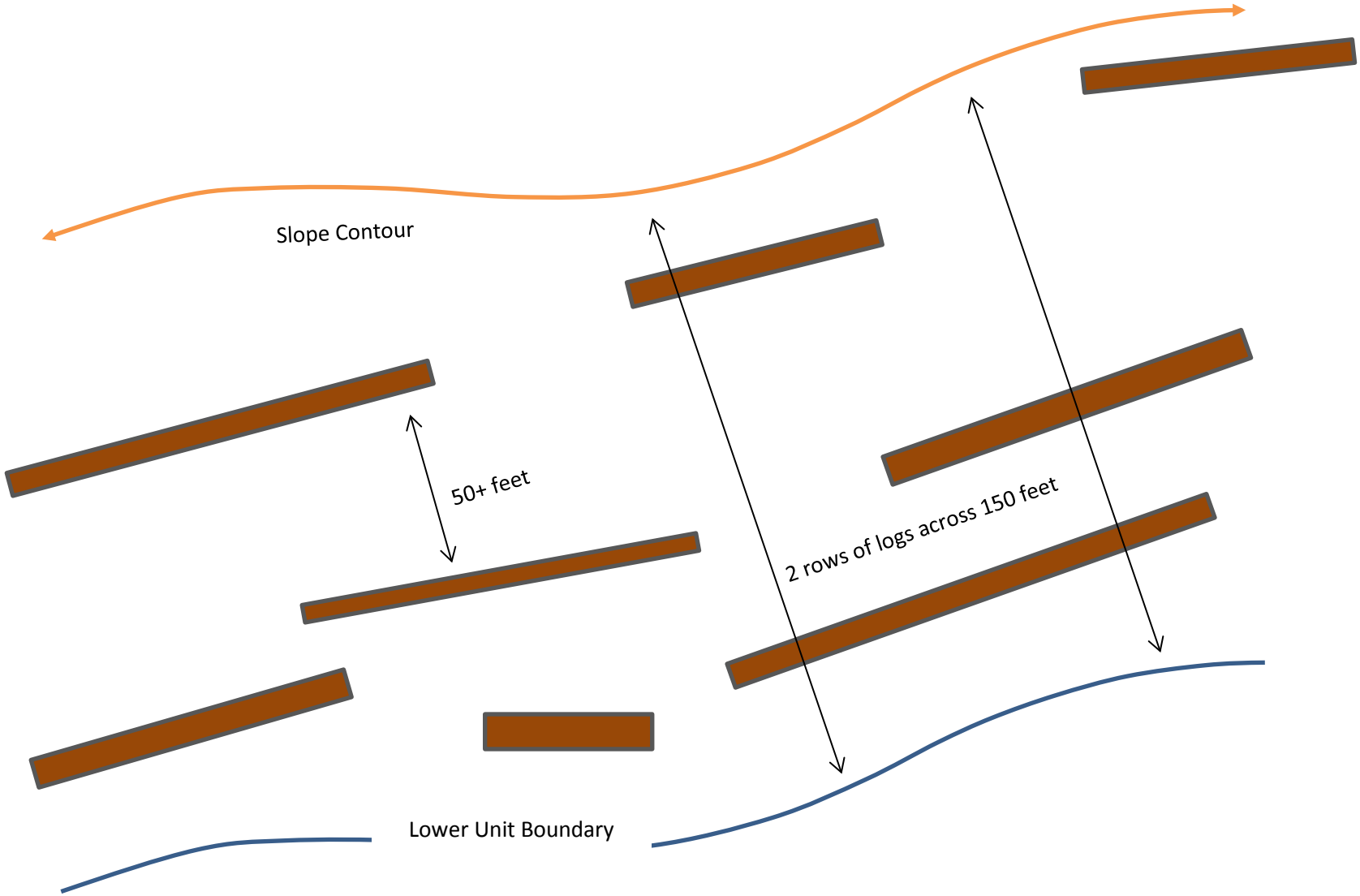
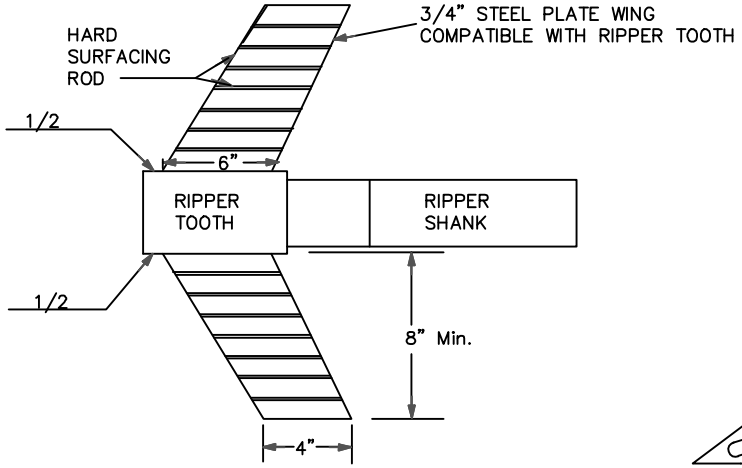
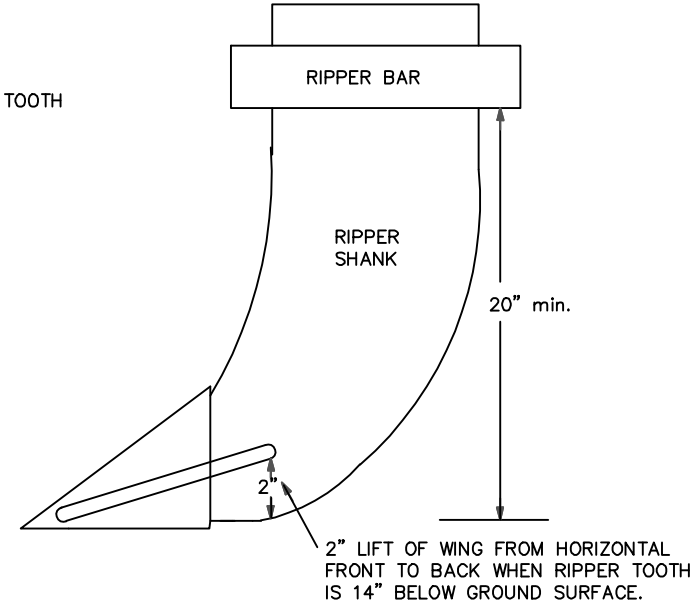


EXHIBIT R
SHEET _1_ OF _1_

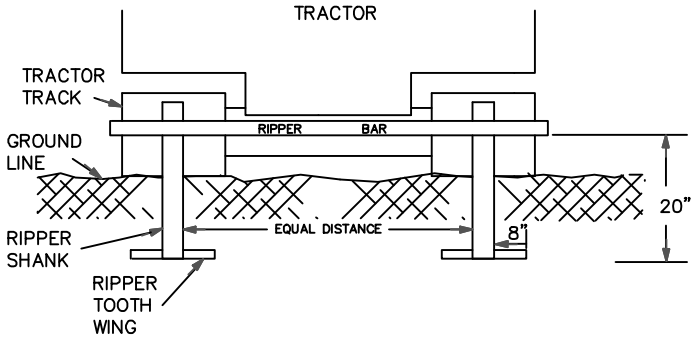


TOP VIEW



SIDE VIEW

TYPICAL RIPPER POSITION



NOTES: TYPICAL RIPPER TOOTH CONSTRUCTION

1. USE HARD SURFACING ROD FOR ALL EDGE AND SURFACE REINFORCEMENT.
2. WELD THAT ATTATCHES WINGS TO RIPPER TEETH MUST BE COMPATIBLE WITH METAL IN TEETH AND WINGS.
3. RIPPER SHANKS AND RIPPER TEETH MAY BE NEW OR USED.
4. WINGS SHALL PROVIDE TWO (2) INCHES OF LIFT FROM THE HORIZONTAL WHEN TEETH ARE EXTENDED FOURTEEN (14) INCHES BELOW THE GROUND SURFACE.

UNITED STATES DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
ASHLAND RESOURCE AREA MEDFORD DISTRICT

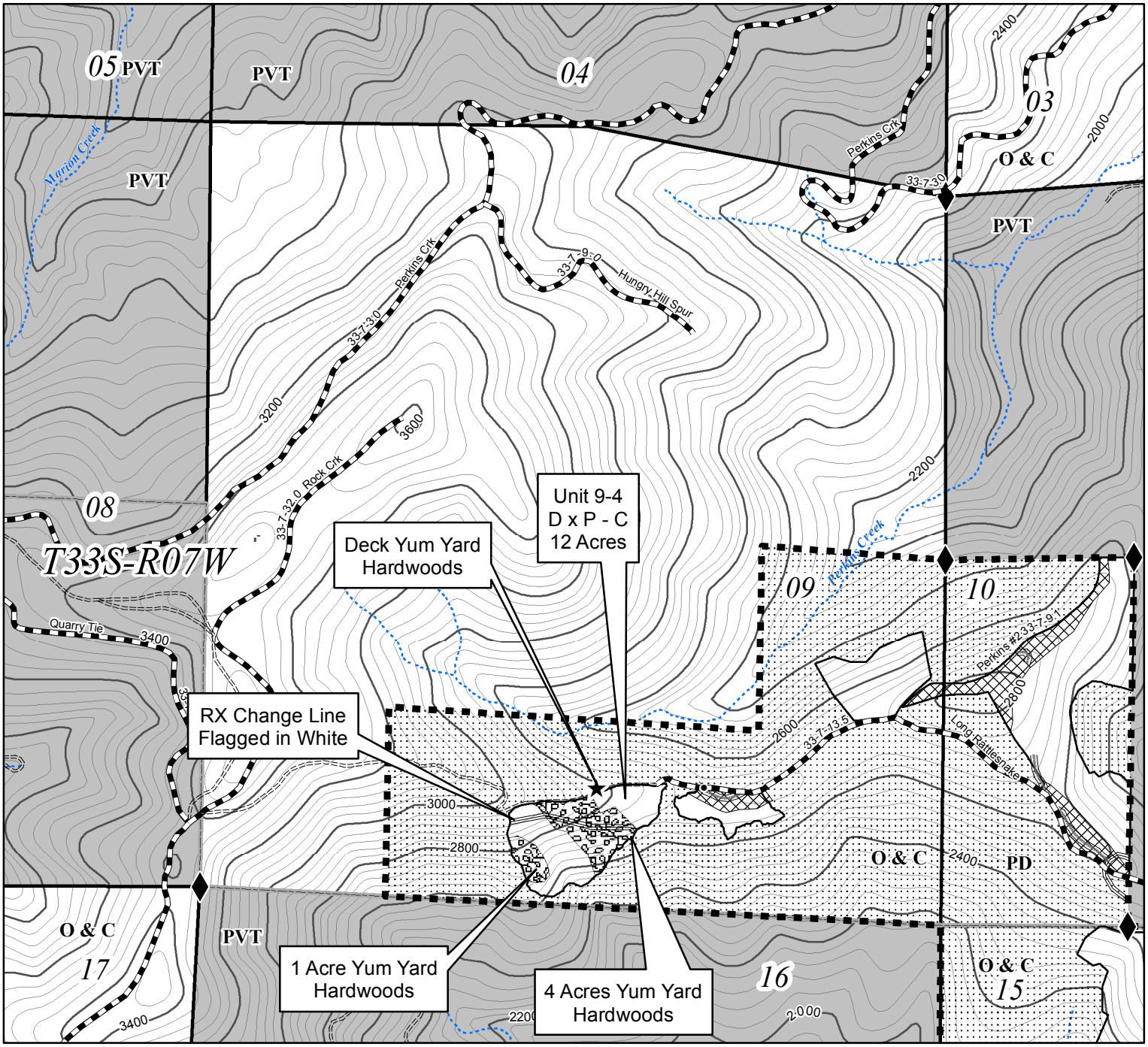
WING RIPPER DETAIL

DESIGNED
REVIEWED
APPROVED
CHIEF, BRANCH OF ENGINEERING OR DISTRICT ENGINEER

DRAWN: JWR	SCALE: NONE
DATE: October 2009	SHEET 1 OF 1
DRAWING NO.	

U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 09, WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT S YUM YARD



0 500 1,000 2,000 Feet

1 inch = 1,000 feet

FORTY FOOT CONTOUR INTERVAL

No warranty is made by the Bureau of Land Management as to the accuracy, reliability, or completeness of these data for individual or aggregate use with other data. Original data were compiled from various sources and may be updated without notification.

Legend

★ Deck Yum-Yarded Hardwoods

Road

SurfaceType

- Rocked Road
- Paved Road
- Natural Surface Road
- Areas of Required Yum Yarding
- Ground Based Yard
- Timber Sale Units

N W E S

United States Department of the Interior
Bureau of Land Management
Medford District Office
3040 Biddle Road
Medford, OR 97504
(541) 618-2200

U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 11 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

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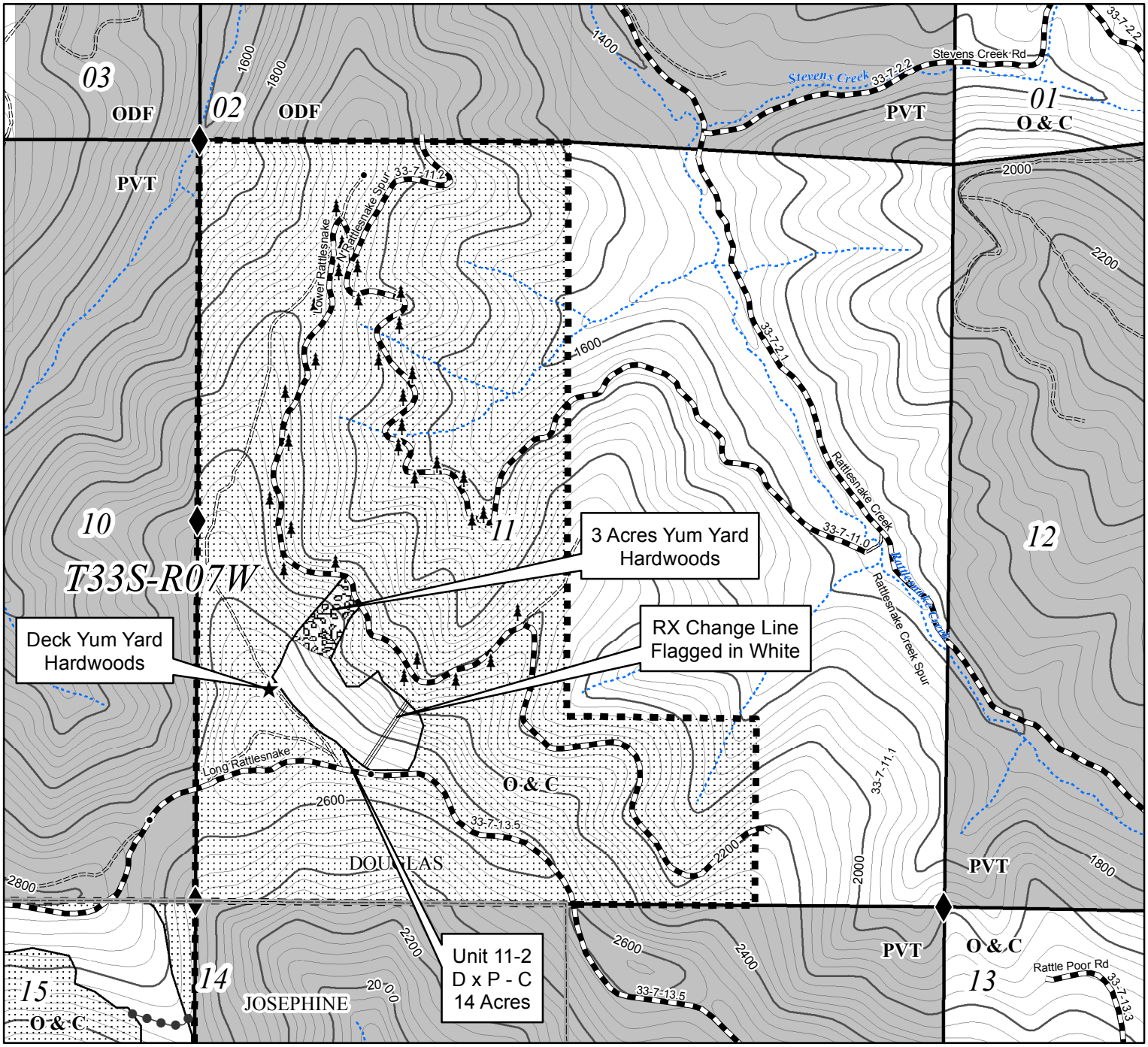

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Legend

★ Deck Yum-Yarded Hardwoods

Road

SurfaceType

- Rocked Road
- Paved Road
- Natural Surface Road
- Areas of Required Yum Yarding
- Ground Based Yard
- Timber Sale Units

N W E S

United States Department of the Interior
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BURNT RATTLER TIMBER SALE
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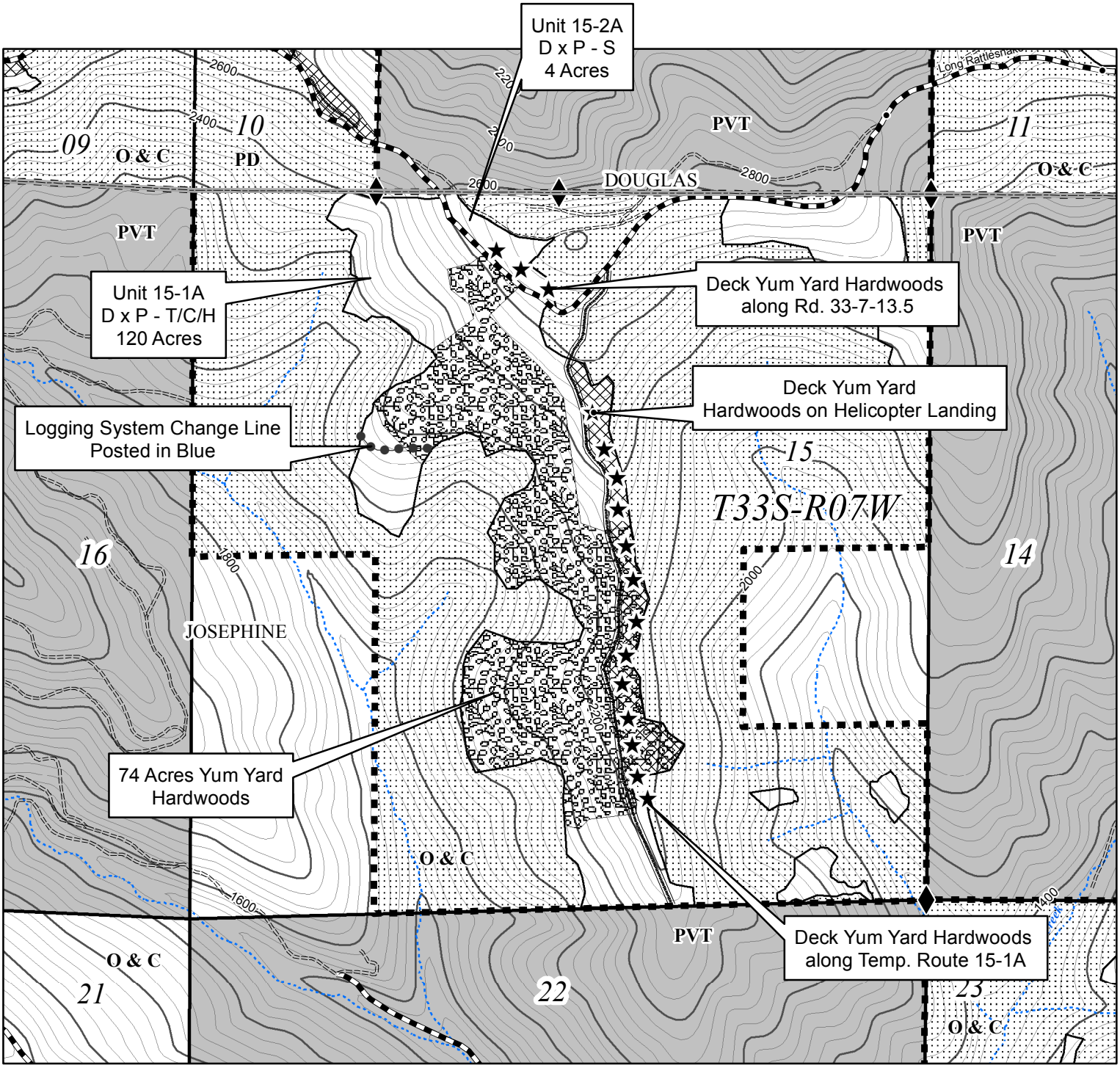

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Legend

★ Deck Yum-Yarded Hardwoods

Road

SurfaceType

- Rocked Road
- Paved Road
- Natural Surface Road
- Areas of Required Yum Yarding
- Ground Based Yard
- Timber Sale Units

N W E S

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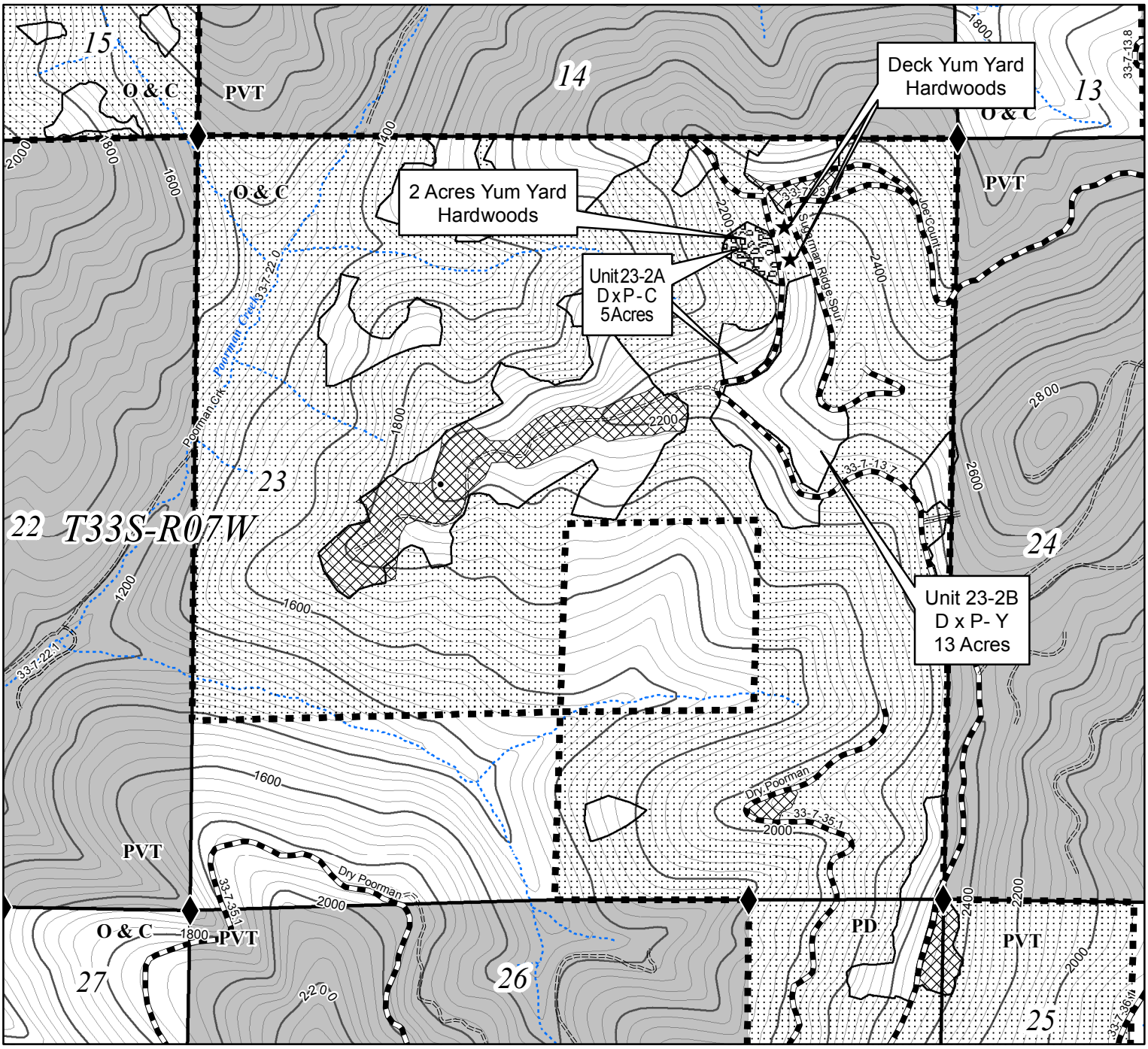
CONTRACT NO. ORM07-TS-14-11
EXHIBIT S YUM YARD



0 500 1,000 2,000 Feet

1 inch = 1,000 feet

FORTY FOOT CONTOUR INTERVAL

No warranty is made by the Bureau of Land Management as to the accuracy, reliability, or completeness of these data for individual or aggregate use with other data. Original data were compiled from various sources and may be updated without notification.

Legend

★ Deck Yum-Yarded Hardwoods

Road

SurfaceType

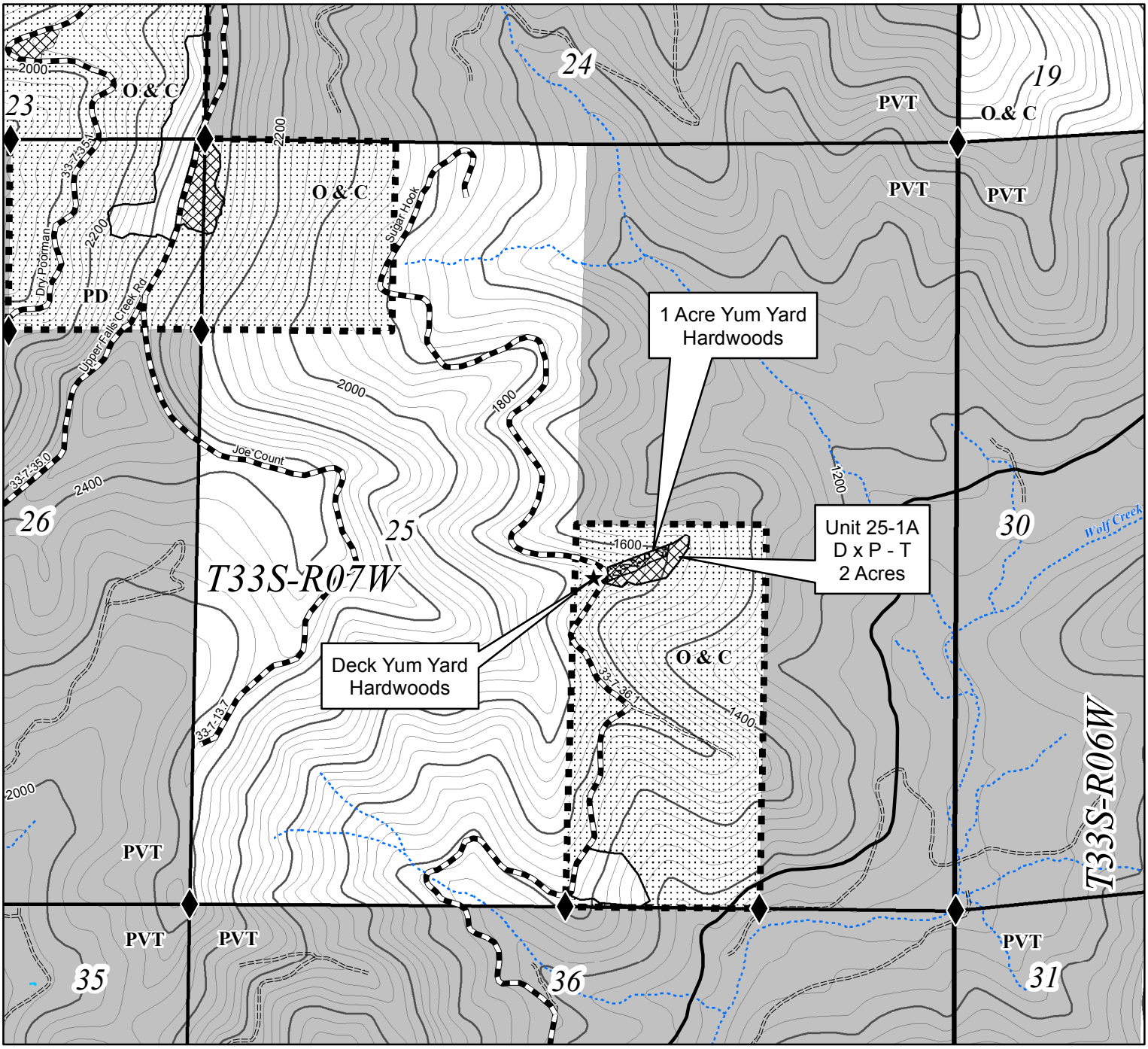
- Rocked Road
- Paved Road
- Natural Surface Road
- Areas of Required Yum Yarding
- Ground Based Yard
- Timber Sale Units

N S E W

United States Department of the Interior
Bureau of Land Management
Medford District Office
3040 Biddle Road
Medford, OR 97504
(541) 618-2200

U.S.D.I BLM MEDFORD DISTRICT SALE NO. ORM07-TS-14-11
T. 33 S., R. 7 W., SEC. 25 WILL. MER.
BURNT RATTLER TIMBER SALE
JOSEPHINE & DOUGLAS COUNTIES

TIMBER SALE CONTRACT MAP
CONTRACT NO. ORM07-TS-14-11
EXHIBIT S YUM YARD



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Legend

★ Deck Yum-Yarded Hardwoods

Road

SurfaceType

- Rocked Road
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N W E S

United States Department of the Interior
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United States of America

Department of the Interior

Bureau Of Land Management

Timber Sale Appraisal

District :	Medford	**Contract # :**	ORM07-TS14-11
Sale Name :	Burnt Rattler	**Job File # :**	M11301
Sale Date :	07/24/2014	**Master Unit :**	Josephine
Appraisal Method :	16' MBF	**Planning Unit :**	Grants Pass

Contents

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Legal Description

Forest Type	Township	Range	Section	Subdivision
O&C	33S	7W	9	SE1/4SW1/4, NE1/4SE1/4, S1/2SE1/4
PD	33S	7W	10	W1/2SW1/4
O&C	33S	7W	11	NW1/4, SW1/4
O&C	33S	7W	13	Lots 5, 6, 11, 12, 14, 15
PD	33S	7W	14	S1/2NE1/4
O&C	33S	7W	15	NE1/4, NW1/4, E1/2SW1/4, W1/2SE1/4, SE1/4SE1/4
O&C	33S	7W	23	NE1/4, NW1/4, N1/2SW1/4, NE1/4SE1/4, S1/2SE1/4
O&C	33S	7W	25	NW1/4NW1/4, W1/2SE1/4
PD	33S	7W	26	NE1/4NE1/4
O&C	33S	7W	27	S1/2NE1/4, N1/2SE1/4

Cutting Volume (16' MBF)

Unit	DF	SP	PP	IC					Total	Regen	Partial	ROW
9-4	232	33	29						294	12	0	0
9-5	58	8	7						73	3	0	0
9-9	135	19	17						171	7	0	0
10-1	502	71	62						635	26	0	0
11-2	232	33	29						294	14	0	0
13-2	618	87	75						780	32	0	0
13-4	19	3	2						24	1	0	0
13-4A	135	19	17						171	7	0	0
13-6	97	13	11						121	5	0	0
14-2	39	5	5						49	2	0	0
15-1A	2,319	327	287						2,933	120	0	0
15-1B	367	51	45						463	19	0	0
15-2A	77	11	9						97	4	0	0
15-4A	61	14	7						82	3	0	0
15-4B	20	5	2						27	1	0	0
15-4C	20	5	2						27	1	0	0
23-1A	116	16	14						146	6	0	0
23-2A	97	13	11						121	5	0	0
23-2B	251	35	31						317	13	0	0
23-2C	97	13	11						121	5	0	0
23-3A	406	93	47						546	20	0	0
23-3B	19	3	2						24	1	0	0
23-4A	831	117	102						1,050	43	0	0
23-4B	122	28	14						164	6	0	0
23-6A	19	3	2						24	1	0	0
23-6B	81	19	9						109	4	0	0
23-7	212	30	26						268	11	0	0
23-10C	61	14	7						82	3	0	0
25-1A	39	5	5						49	2	0	0
25-2A	58	8	7						73	3	0	0
27-B	61	14	7						82	3	0	0
RD11	43	2	0	1					46	0	6	0
Totals	**7,444**	**1,117**	**901**	**1**					**9,463**	**383**	**6**	**0**

Logging Costs per 16' MBF

Stump to Truck	$	248.36
Transportation	$	76.44
Road Construction	$	7.92
Road Amortization	$	0.00
Road Maintenance	$	7.37

Other Allowances :

Fuels Treatment	$ 5.91
Misc	$ 0.42
Other Costs	$ 8.58
Total Other Allowances :	**$ 14.91**

Total Logging Costs per 16' MBF $ **355.00**

Utilization Centers

Center #1 : Riddle, OR	38	Miles
Center #2	0	Miles
Weighted distance to Utilization Centers	38	

Length of Contract

Cutting and Removal Time	24	Months
Personal Property Removal Time	1	Months

Profit & Risk

Total Profit & Risk		11 %
Basic Profit & Risk	8 % + Additional Risk	3 %
Back Off		0 %

Tract Features

Avg Log	Douglas-fir : 137 bf	All : 154 bf
Recovery	Douglas-fir : 67 %	All : 68 %
Salvage	Douglas-fir : 100 %	All : 100 %

Avg Volume (16' MBF per Acre)	24
Avg Yarding Slope	0 %
Avg Yarding Distance (feet)	350
Avg Age	0
Volume Cable	71 %
Volume Ground	15 %
Volume Aerial	14 %
Road Construction Stations	0.00
Road Improvement Stations	0.00
Road Renovation Stations	0.00
Road Decomission Stations	0.00

Cruise

Cruised By	Caulfield, Franks, Cannon
Date	05/21/2014
Type of Cruise	PCMTRE
County, State	Josephine, OR

Net Volume

Green (16' MBF)	0
Salvage (16' MBF)	9,463
Douglas-fir Peeler	223
Export Volume	0
Scaling Allowance ($0.75 per 16' MBF)	$7,097.25

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Stumpage Summary

Stumpage Computation (16' MBF)

Species	Trees	Net Volume	Pond Value	(-) Profit & Risk	(-) Logging Cost	(+) Marginal Log Value	(-) Back Off	Appraised Price	Appraised Value
DF	19,056	7,444	$ 512.46	$ 56.37	$ 355.00	$ 1.54		$ 102.60	$ 763,754.40
SP	1,070	1,117	$ 170.80	$ 18.79	$ 355.00			**$ 17.10**	$ 19,100.70
PP	598	901	$ 151.07	$ 16.62	$ 355.00	$ 5.33		**$ 15.10**	$ 13,605.10
IC	2	1	$ 516.00	$ 56.76	$ 355.00			$ 104.20	$ 104.20
Totals	**20,726**	**9,463**							**$ 796,564.40**

Log Code by Percent

Species	Code #1	Code #2	Code #3	Code #4	Code #5	Code #6
Ponderosa Pine	88.0		2.0	7.0	3.0	
Sugar Pine	78.0		3.0	15.0	4.0	
Douglas-fir		1.0	2.0	73.0	24.0	
Incense-cedar				39.0	61.0	

Marginal Log Volume

Species	Grade #7	Grade #8
Ponderosa Pine		32
Sugar Pine		
Douglas-fir		92
Incense-cedar		

Appraised By : Franks, Annie **Date :** 06/03/2014

Area Approval By : Caulfield, Dave **Date :** 06/11/2014

District Approval By : **Date :**

Prospectus

Appraisal Method : (16' MBF)

Species	Trees	Net Volume 16' MBF	Net Volume 32' MBF	Net Volume CCF
Douglas-fir	19,056	7,444	6,007	11,732
Sugar Pine	1,070	1,117	921	1,444
Ponderosa Pine	598	901	751	1,250
Incense-cedar	2	1	1	1
Total	**20,726**	**9,463**	**7,680**	**14,427**

All Species

Gross Volume	Number Trees	Avg bf Volume Per Tree	DBH	Gross Merch Volume	Merch Logs	Avg bf Gross Merch Log
13,837	20,726	667	22.7	12,113	78,588	154

Merch Logs	Cull Logs	Total Logs	Logs per Tree	Net Volume	Gross Volume	Recovery
78,588	9,958	88,546	4.3	9,463	13,837	68 %

Douglas-fir

Gross Volume	Number Trees	Avg bf Volume Per Tree	DBH	Gross Merch Volume	Merch Logs	Avg bf Gross Merch Log
11,159	19,056	585	21.9	9,582	69,893	137

Merch Logs	Cull Logs	Total Logs	Logs per Tree	Net Volume	Gross Volume	Recovery
69,893	8,525	78,418	4.1	7,444	11,159	67 %

Cutting Areas

Unit	Regen Acres	Partial Cut Acres	Right Of Way Acres	Total Acres
9-4	12			12
9-5	3			3
9-9	7			7
10-1	26			26
11-2	14			14
13-2	32			32
13-4	1			1
13-4A	7			7
13-6	5			5
14-2	2			2
15-1A	120			120
15-1B	19			19
15-2A	4			4
15-4A	3			3
15-4B	1			1
15-4C	1			1
23-1A	6			6
23-2A	5			5
23-2B	13			13
23-2C	5			5
23-3A	20			20
23-3B	1			1
23-4A	43			43
23-4B	6			6
23-6A	1			1
23-6B	4			4
23-7	11			11
23-10C	3			3
25-1A	2			2
25-2A	3			3
27-B	3			3
RD11		6		6
Totals :	**383**	**6**		**389**

Exhibit B

The following estimates and calculations of timber sold are made solely as an administrative aid for determining: (1) Adjustments made or credits given in accordance with Sections 6, 9, or 11; (2) When payments are due; and (3) Value of timber subject to any special bonding provisions. The value of timber will be determined by multiplying the value per acre as shown below, times the amount of acreage as determined by the authorized officer, which has been cut or removed or designated for taking.

Except provided in Section 2, Purchaser shall be liable for the total purchase price even though the quantity of timber actually cut or removed or designated for taking is less than the estimated volume or quantity shown. Cutting areas are shown on the Exhibit A.

Sale Totals (16' MBF)

Species	Net Volume	Bid Price	Sale SubTotal
Douglas-fir	7,444		
Sugar Pine	1,117		
Ponderosa Pine	901		
Incense-cedar	1		
Sale Totals	**9,463**		

Unit Details (16' MB)

Unit 10-1 **26 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	502		
Ponderosa Pine	62		
Sugar Pine	71		
Unit Totals	**635**		

Unit 11-2 **14 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	232		
Ponderosa Pine	29		
Sugar Pine	33		
Unit Totals	**294**		

Unit 13-2 **32 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	618		
Ponderosa Pine	75		
Sugar Pine	87		
Unit Totals	**780**		

Unit 13-4 **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	19		
Ponderosa Pine	2		
Sugar Pine	3		
Unit Totals	**24**		

Unit 13-4A **7 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	135		
Ponderosa Pine	17		
Sugar Pine	19		
Unit Totals	**171**		

Unit 13-6 **5 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	97		
Ponderosa Pine	11		
Sugar Pine	13		
Unit Totals	**121**		

Unit 14-2 **2 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	39		
Ponderosa Pine	5		
Sugar Pine	5		
Unit Totals	**49**		

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Unit 15-1A **120 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	2,319		
Ponderosa Pine	287		
Sugar Pine	327		
Unit Totals	**2,933**		

Unit 15-1B **19 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	367		
Ponderosa Pine	45		
Sugar Pine	51		
Unit Totals	**463**		

Unit 15-2A **4 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	77		
Ponderosa Pine	9		
Sugar Pine	11		
Unit Totals	**97**		

Unit 15-4A **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	61		
Ponderosa Pine	7		
Sugar Pine	14		
Unit Totals	**82**		

Unit 15-4B **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	20		
Ponderosa Pine	2		
Sugar Pine	5		
Unit Totals	**27**		

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Unit 15-4C **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	20		
Ponderosa Pine	2		
Sugar Pine	5		
Unit Totals	**27**		

Unit 23-10C **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	61		
Ponderosa Pine	7		
Sugar Pine	14		
Unit Totals	**82**		

Unit 23-1A **6 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	116		
Ponderosa Pine	14		
Sugar Pine	16		
Unit Totals	**146**		

Unit 23-2A **5 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	97		
Ponderosa Pine	11		
Sugar Pine	13		
Unit Totals	**121**		

Unit 23-2B **13 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	251		
Ponderosa Pine	31		
Sugar Pine	35		
Unit Totals	**317**		

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Unit 23-2C **5 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	97		
Ponderosa Pine	11		
Sugar Pine	13		
Unit Totals	**121**		

Unit 23-3A **20 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	406		
Ponderosa Pine	47		
Sugar Pine	93		
Unit Totals	**546**		

Unit 23-3B **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	19		
Ponderosa Pine	2		
Sugar Pine	3		
Unit Totals	**24**		

Unit 23-4A **43 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	831		
Ponderosa Pine	102		
Sugar Pine	117		
Unit Totals	**1,050**		

Unit 23-4B **6 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	122		
Ponderosa Pine	14		
Sugar Pine	28		
Unit Totals	**164**		

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Unit 23-6A **1 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	19		
Ponderosa Pine	2		
Sugar Pine	3		
Unit Totals	**24**		

Unit 23-6B **4 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	81		
Ponderosa Pine	9		
Sugar Pine	19		
Unit Totals	**109**		

Unit 23-7 **11 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	212		
Ponderosa Pine	26		
Sugar Pine	30		
Unit Totals	**268**		

Unit 25-1A **2 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	39		
Ponderosa Pine	5		
Sugar Pine	5		
Unit Totals	**49**		

Unit 25-2A **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	58		
Ponderosa Pine	7		
Sugar Pine	8		
Unit Totals	**73**		

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Unit 27-B **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	61		
Ponderosa Pine	7		
Sugar Pine	14		
Unit Totals	**82**		

Unit 9-4 **12 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	232		
Ponderosa Pine	29		
Sugar Pine	33		
Unit Totals	**294**		

Unit 9-5 **3 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	58		
Ponderosa Pine	7		
Sugar Pine	8		
Unit Totals	**73**		

Unit 9-9 **7 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	135		
Ponderosa Pine	17		
Sugar Pine	19		
Unit Totals	**171**		

Unit RD11 **6 Acres** **Value per Acre : $0.00**

Species	Net Volume	Bid Price	Species Value
Douglas-fir	43		
Incense-cedar	1		
Ponderosa Pine			
Sugar Pine	2		
Unit Totals	**46**		

Sale Volume Totals

389 **Acres** 383 **Regen** 6 **Partial** 0 **R/W** 32 **Units**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Net	16' MBF GM	16' MBF Gross	32' MBF Net	32' MBF GM	32' MBF Gross	CCF Net	CCF GM	CCF Gross
Douglas-fir	19,056	69,893	8,525	7,444	9,582	11,159	6,007	7,757	9,069	11,732	15,139	17,564
Sugar Pine	1,070	5,173	804	1,117	1,375	1,445	921	1,128	1,185	1,444	1,751	1,869
Ponderosa Pine	598	3,518	628	901	1,155	1,232	751	964	1,028	1,250	1,594	1,733
Incense-cedar	2	4	1	1	1	1	1	1	1	1	1	1
Totals	**20,726**	**78,588**	**9,958**	**9,463**	**12,113**	**13,837**	**7,680**	**9,850**	**11,283**	**14,427**	**18,485**	**21,167**

Unit Totals

Unit : 9-4 **12 Acres** **12 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	621	2,240	287	350	298	232
Sugar Pine	26	136	18	42	40	33
Ponderosa Pine	19	117	20	38	36	29
Unit Totals	**666**	**2,493**	**325**	**430**	**374**	**294**

Unit : 9-5 **3 Acres** **3 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	155	560	72	88	74	58
Sugar Pine	7	34	5	10	10	8
Ponderosa Pine	5	29	5	10	9	7
Unit Totals	**167**	**623**	**82**	**108**	**93**	**73**

Unit : 9-9 **7 Acres** **7 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	362	1,307	168	204	174	135
Sugar Pine	15	80	11	24	23	19
Ponderosa Pine	11	68	12	22	21	17
Unit Totals	**388**	**1,455**	**191**	**250**	**218**	**171**

Unit : 10-1 **26 Acres** **26 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	1,345	4,854	622	759	645	502

Sugar Pine	58	295	39	91	87	71
Ponderosa Pine	43	253	44	83	79	62
Unit Totals	**1,446**	**5,402**	**705**	**933**	**811**	**635**

Unit : 11-2 **14 Acres** **14 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	621	2,240	287	350	298	232
Sugar Pine	26	136	18	42	40	33
Ponderosa Pine	19	117	20	38	36	29
Unit Totals	**666**	**2,493**	**325**	**430**	**374**	**294**

Unit : 13-2 **32 Acres** **32 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	1,656	5,974	766	934	794	618
Sugar Pine	72	362	48	111	108	87
Ponderosa Pine	52	312	54	102	97	75
Unit Totals	**1,780**	**6,648**	**868**	**1,147**	**999**	**780**

Unit : 13-4 **1 Acres** **1 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	52	187	24	29	25	19
Sugar Pine	3	11	1	4	4	3
Ponderosa Pine	2	10	2	3	3	2
Unit Totals	**57**	**208**	**27**	**36**	**32**	**24**

Unit : 13-4A **7 Acres** **7 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	362	1,307	168	204	174	135
Sugar Pine	15	80	11	24	23	19
Ponderosa Pine	11	68	12	22	21	17
Unit Totals	**388**	**1,455**	**191**	**250**	**218**	**171**

Unit : 13-6 **5 Acres** **5 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	259	933	120	146	124	97
Sugar Pine	11	57	7	18	17	13
Ponderosa Pine	8	49	9	16	15	11

Unit Totals	**278**	**1,039**	**136**	**180**	**156**	**121**

Unit : 14-2 **2 Acres** **2 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	103	373	48	58	50	39
Ponderosa Pine	4	19	3	7	6	5
Sugar Pine	5	23	3	7	6	5
Unit Totals	**112**	**415**	**54**	**72**	**62**	**49**

Unit : 15-1A **120 Acres** **120 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	6,208	22,403	2,872	3,504	2,973	2,319
Sugar Pine	269	1,359	179	416	403	327
Ponderosa Pine	198	1,168	204	383	368	287
Unit Totals	**6,675**	**24,930**	**3,255**	**4,303**	**3,744**	**2,933**

Unit : 15-1B **19 Acres** **19 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	983	3,547	455	555	471	367
Sugar Pine	43	215	29	66	64	51
Ponderosa Pine	32	185	32	61	57	45
Unit Totals	**1,058**	**3,947**	**516**	**682**	**592**	**463**

Unit : 15-2A **4 Acres** **4 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	207	747	96	117	99	77
Sugar Pine	9	46	6	14	13	11
Ponderosa Pine	6	39	6	12	12	9
Unit Totals	**222**	**832**	**108**	**143**	**124**	**97**

Unit : 15-4A **3 Acres** **3 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	74	404	24	86	80	61
Sugar Pine	22	94	21	19	17	14
Ponderosa Pine	2	14	4	11	9	7
Unit Totals	**98**	**512**	**49**	**116**	**106**	**82**

Unit : 15-4B 1 Acres 1 Regen 0 Partial 0 R/W

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	25	135	8	29	27	20
Sugar Pine	8	32	7	7	6	5
Ponderosa Pine	1	5	1	4	3	2
Unit Totals	**34**	**172**	**16**	**40**	**36**	**27**

Unit : 15-4C 1 Acres 1 Regen 0 Partial 0 R/W

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	25	135	8	29	27	20
Sugar Pine	8	32	7	7	6	5
Ponderosa Pine	1	5	1	4	3	2
Unit Totals	**34**	**172**	**16**	**40**	**36**	**27**

Unit : 23-1A 6 Acres 6 Regen 0 Partial 0 R/W

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	310	1,120	144	175	149	116
Sugar Pine	13	68	9	21	20	16
Ponderosa Pine	10	58	10	19	18	14
Unit Totals	**333**	**1,246**	**163**	**215**	**187**	**146**

Unit : 23-2A 5 Acres 5 Regen 0 Partial 0 R/W

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	259	933	120	146	124	97
Sugar Pine	11	57	7	18	17	13
Ponderosa Pine	8	49	9	16	15	11
Unit Totals	**278**	**1,039**	**136**	**180**	**156**	**121**

Unit : 23-2B 13 Acres 13 Regen 0 Partial 0 R/W

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	673	2,427	311	379	322	251
Sugar Pine	30	147	19	45	44	35
Ponderosa Pine	22	127	23	41	39	31
Unit Totals	**725**	**2,701**	**353**	**465**	**405**	**317**

Unit : 23-2C 5 Acres 5 Regen 0 Partial 0 R/W

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net

Douglas-fir	259	933	120	146	124	97
Sugar Pine	11	57	7	18	17	13
Ponderosa Pine	8	49	9	16	15	11
Unit Totals	**278**	**1,039**	**136**	**180**	**156**	**121**

Unit : 23-3A **20 Acres** **20 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	494	2,695	160	573	534	406
Sugar Pine	145	629	141	125	112	93
Ponderosa Pine	14	95	25	72	60	47
Unit Totals	**653**	**3,419**	**326**	**770**	**706**	**546**

Unit : 23-3B **1 Acres** **1 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	52	187	24	29	25	19
Sugar Pine	3	11	1	4	4	3
Ponderosa Pine	2	10	2	3	3	2
Unit Totals	**57**	**208**	**27**	**36**	**32**	**24**

Unit : 23-4A **43 Acres** **43 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	2,225	8,028	1,029	1,255	1,066	831
Sugar Pine	97	488	64	150	144	117
Ponderosa Pine	70	418	73	137	130	102
Unit Totals	**2,392**	**8,934**	**1,166**	**1,542**	**1,340**	**1,050**

Unit : 23-4B **6 Acres** **6 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	148	808	48	172	160	122
Sugar Pine	43	189	42	37	33	28
Ponderosa Pine	4	29	7	21	18	14
Unit Totals	**195**	**1,026**	**97**	**230**	**211**	**164**

Unit : 23-6A **1 Acres** **1 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	52	187	24	29	25	19
Sugar Pine	3	11	1	4	4	3
Ponderosa Pine	2	10	2	3	3	2

Unit Totals	**57**	**208**	**27**	**36**	**32**	**24**

Unit : 23-6B **4 Acres** **4 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	99	539	32	115	107	81
Sugar Pine	29	126	28	25	23	19
Ponderosa Pine	3	19	5	14	12	9
Unit Totals	**131**	**684**	**65**	**154**	**142**	**109**

Unit : 23-7 **11 Acres** **11 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	569	2,054	263	321	273	212
Sugar Pine	24	124	17	38	37	30
Ponderosa Pine	18	107	18	35	34	26
Unit Totals	**611**	**2,285**	**298**	**394**	**344**	**268**

Unit : 23-10C **3 Acres** **3 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	74	404	24	86	80	61
Sugar Pine	22	94	21	19	17	14
Ponderosa Pine	2	14	4	11	9	7
Unit Totals	**98**	**512**	**49**	**116**	**106**	**82**

Unit : 25-1A **2 Acres** **2 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	103	373	48	58	50	39
Ponderosa Pine	4	19	3	7	6	5
Sugar Pine	5	23	3	7	6	5
Unit Totals	**112**	**415**	**54**	**72**	**62**	**49**

Unit : 25-2A **3 Acres** **3 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	155	560	72	88	74	58
Sugar Pine	7	34	5	10	10	8
Ponderosa Pine	5	29	5	10	9	7
Unit Totals	**167**	**623**	**82**	**108**	**93**	**73**

Unit : 27-B **3 Acres** **3 Regen** **0 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	74	404	24	86	80	61
Sugar Pine	22	94	21	19	17	14
Ponderosa Pine	2	14	4	11	9	7
Unit Totals	**98**	**512**	**49**	**116**	**106**	**82**

Unit : RD11 **6 Acres** **0 Regen** **6 Partial** **0 R/W**

SpeciesName	# of Trees	Merch Logs	Cull Logs	16' MBF Gross	16' MBF GM	16' MBF Net
Douglas-fir	452	895	57	59	56	43
Sugar Pine	8	29	8	3	3	2
Incense-cedar	2	4	1	1	1	1
Ponderosa Pine	10	13				
Unit Totals	**472**	**941**	**66**	**63**	**60**	**46**

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT
Stump to Truck Costs

Total (16' MBF)

Total Stump to Truck Costs	Net Volume	Cost / Net Volume
$ 2,350,274.54	9,463	$ 248.36

Detail

Yarding & Loading

Yarding System	Unit Of Measure	Units	Cost / Unit	Total Cost
Helicopter	GMMBF	1,687	$ 361.68	$ 610,154.16
Med Twr=40-70	GMMBF	8,652	$ 153.58	$ 1,328,774.16
Shovel	GMMBF	124	$ 107.08	$ 13,277.92
Track Skidder	GMMBF	1,650	$ 120.42	$ 198,693.00
Subtotal				**$ 2,150,899.24**

Other Costs

Explanation	Unit Of Measure	Units	Cost / Unit	Total Cost
Directional Falling	GMMBF	946	$ 7.02	$ 6,640.92
Med. Twr. YUM	GMMBF HW	1,165	$ 99.62	$ 116,057.30
Track Skidder YUM	GMMBF HW	246	$ 76.61	$ 18,846.06
End Hauling Hardwoods 15-1A	GMMBF HW	425	$ 70.92	$ 30,141.00
End Hauling Hardwoods unit 11-2	GMMBF HW	51	$ 69.02	$ 3,520.02
End Hauling Hardwoods unit 9-4	GMMBF HW	80	$ 71.50	$ 5,720.00
Subtotal				**$ 180,925.30**

Additional Move-Ins

Equipment	# Move-In	Cost / Move In	Total Cost
Yarder / Loader	16	$ 150.00	$ 2,400.00
Yarder / Loader	42	$ 150.00	$ 6,300.00
Delimber	32	$ 150.00	$ 4,800.00
Skidder	45	$ 110.00	$ 4,950.00
Subtotal			**$ 18,450.00**

Other Allowances Costs

Total (16' MBF)

Total Other Allowances Costs	Net Volume	Cost / Net Volume *	Total Buy Out Cost
$141,059.00	9,463	$14.91	$0.00

Fuels Treatment

Detail (16' MBF)

Cost Item	Total Cost	Cost / Net Vol *	Buy Out	Buy Out Cost
Lop and Scatter-Lvl 4	$ 18,540.00	$ 1.96	N	$ 0.00
Hand Pile, Cvr - Level 3	$ 18,500.00	$ 1.95	N	$ 0.00
Hand Pile Brn-Level 3	$ 2,000.00	$ 0.21	N	$ 0.00
Excavator	$ 7,800.00	$ 0.82	N	$ 0.00
Hand Pile Brn-Level 1	$ 910.00	$ 0.10	N	$ 0.00
Hand Pile, Cvr - Level 2	$ 1,540.00	$ 0.16	N	$ 0.00
Hand Pile Brn-Level 2	$ 1,540.00	$ 0.16	N	$ 0.00
Chipping Operations	$ 5,120.00	$ 0.54	N	$ 0.00
Subtotal	**$ 55,950.00**	**$ 5.91**		**$ 0.00**

Misc

Detail (16' MBF)

Cost Item	Total Cost	Cost / Net Vol *	Buy Out	Buy Out Cost
Winterizing Corridors	$ 3,936.00	$ 0.42	N	$ 0.00
Subtotal	**$ 3,936.00**	**$ 0.42**		**$ 0.00**

Other Costs

Detail (16' MBF)

Cost Item	Total Cost	Cost / Net Vol *	Buy Out	Buy Out Cost
Equipment Washing	$ 4,440.00	$ 0.47	N	$ 0.00
Equipment Washing	$ 2,250.00	$ 0.24	N	$ 0.00
Flaggers (2)	$ 4,968.00	$ 0.52	N	$ 0.00
Ripping	$ 10,790.00	$ 1.14	N	$ 0.00
Hand Seeding @ 17 lb seed per hour	$ 11,000.00	$ 1.16	N	$ 0.00
Mulching (2 hours/5 bales)	$ 30,000.00	$ 3.17	N	$ 0.00
Waterbar Skids	$ 2,700.00	$ 0.29	N	$ 0.00
Landing Construction	$ 6,150.00	$ 0.65	N	$ 0.00
Landing Clean up	$ 8,200.00	$ 0.87	N	$ 0.00
Barricades	$ 675.00	$ 0.07	N	$ 0.00
Subtotal	**$ 81,173.00**	**$ 8.58**		**$ 0.00**

* Cost / Net Volume has been rounded to the nearest $0.01 Subtotals may not tie to Sale Total Cost / Net Volume.

General

Fire Salvage Sale
Minimum merch top 6 inch
Used Code 1 in Stumpage Summary for blue stain PP and SP
Unit 27-B is labeled unit 27-B in cruise printouts.
Unit 11-2 cruised with 12 acres because 2 acres had already been cut, unit boundary includes those 2 acres to make contract boundary
14 acres total
Volume is total standing dead and dying, no volume has been removed from printouts for snag retention

Yarding & Loading

STUMP TO TRUCK:
Helicopter: Approx. 6 acres in 15-1A, approx. 4 acres in 15-1B, and units 15-4A, 15-4B, 15-4C, 23-3A, 23-3B, and 23-10C
Med Twr: Unit 9-4, approx. 2 acres in 9-5, unit 9-9, approx. 18 acres in unit 10-1, unit 11-2, approx. 31 acres in unit 13-2, unit 13-4, unit 13-4A, unit 13-6, downhill cable in unit 14-2, approx. 100 acres in unit 15-1A, approx. 4 acres in unit 23-1A, unit 23-2A, unit 23-2B, yoader in unit 23-2C, unit 23-3B, approx. 23 acres in unit 23-4B, approx. 8 acers in unit 23-7, unit 25-2A, and unit 27-B
Track Skidder: Approx 1 acre in unit 9-5, approx. 8 acres in unit 10-1, approx. 1 acre in unit 13-2, approx. 14 acres in unit 15-1A, approx. 2 acres in unit 23-1A, approx. 20 acres in unit 23-4A, unit 23-6A, approx. 3 acres in unit 23-7, unit 25-1A, and unit RD 11
Shovel: Unit 15-2A (4 acres)

OTHER YARD & LOADING COSTS:
Directional Falling: Contour falling and directional falling costs, estimate no more than 946 GMMBF
Med Twr YUM: 1165 GMMBF HW (estimated volume for hardwoods) @ $93.67/MBF HW is additional cost to yard unmerch material (YUM yarding) in units 23-2A (estimate 2 acres), 9-4 (estimate 5 acres) , 11-2 (estimate 3 acres), and unit 15-1A (estimate 60 acres)
Track Skidder YUM: 246 GMMBF HW (estimated harwood volume) @ $76.61/MBF HW is additional cost to YUM yard hardwood in unit 25-1A (estimate 1 acre) and 15-1A (estimate 14 acres.
End Hauling Hardwoods unit 15-1A: Skidding an estimated 425 MBF of hardwoods to helicopter landing from approx. 25 acres of YUM yarding area in unit 15-1A. Cost/GMMBF includes skidder and loader (for decking materials)
End Hauling Hardwoods unit 11-2: Skidding an estimated 51 GMMBF of YUM yarded material to landing from approx. 3 acres in unit 11-2. Cost/GMMBF HW includes skidder and loader (for decking materials)
End Hauling Hardwoods unit 9-4: Skidding an estimated 80 GMMBF of YUM yarded material to landing from approx. 5 acres in unit 9-4. Cost/GMMBF includes skidder and loader (for decking materials)
ADDITIONAL MOVE-INS:
Yarder/Loader: Estimate no more than 16 hours to move Med Twr @ $150/hr (cable)
Yarder/Loader: Estimate no more than 42 hours to move Loader @ $150/hr (cable, tractor, helicopter)
Delimber: Estimate no more than 29 hours to move processor @ $150/hr (cable, tractor, helicopter)
Skidder: Estimate no more than 45 hours to move skidders/dozers @ $110/hour (tractor, cable, YUM)

Road Costs

(see Engineering Appraisal for details).

Transportation

Riddle, OR is closest SBA Utilization Center to contract area

(see Transportation appendix for details).

Other Allowances

FUELS TREATMENT:
Lop and Scatter: Estimate no more than 309 acres
Hand Pile, Cvr Lvl 3: Hand pile and cover, estimate no more than 50 acres @ $370/acre
Hand Pile, Brn Lvl 3: Burning hand piles, estimate no more than 50 acres @ $40/acre
Excavator: Machine Pile and Cover and estimate no more than 26 acres
Hand Pile Brn, Level 1: Machine Pile Burn and estimate no more than 26 acres @ $35/acre

Hand Pile, Cvr Level 2: Cover Landing Decks, estimate no more than 44 acres @ $35/acre
Hand Pile Brn - Level 2: Burning landing decks, estimate no more than 44 acres @ $35/acre
Chipping Operations: Estimate no more than 2 days of chipping
OTHER COSTS:
Equipment Washing: $370/piece for Yarder, loader, shovel (additional moveins added)
Equipment Washing: $250/piece for skidder, feller buncher, processor (additional moveins added)
Flaggers (2): 2 flaggers ($18/flagger/hour) for RD11 unit and for helicopter units, estimate no more than 138 hours
Ripping: Estimate no more than 26 acres of ripping of skid trails and landings (see special provisions for which units and landings allow ripping)
Hand seeding: Estimate no more than 50 acres to hand seed skid trails and landings
Mulching: Estimate no more than 50 acres to mulch skid trails and landings
Waterbar skids: Estimate no more than 36 hours to waterbar skids
Landing Construction: Estimate no more than 82 hours to construct all landings
Landing Cleanup: Estimate no more than 82 hours for landing cleanup
Barricades: Estimate no more than 9 hours for barricades
MISC:
Winterizing Corridors: Estimate no more than 246 hours to "winterize corridors" (waterbar, cover with slash, etc.)

Prospectus

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Summary of All Roads and Projects Updated: 5/1/2013

T.S. Contract Name: Burnt Rattler TS Tract No: TS-14-11 Sale Date: 07/24/2014
Prepared by: E. Freeman Ph: (541)471-6601 Print Date: 6/5/2014 5:18:49 PM
Construction: 0.00 sta
Improve: 0.00 sta Renov: 575.00 sta Decom: 0.00 sta Temp: 57.55 sta

200 Clearing and Grubbing: 0.0 acres $1,836.42
Clearing: 40.7 sta Grubbing: 1.5 acres
Slash Treatment: 0.0 acres

300 Excavation: 2,963 cy $9,374.41
Haul: 0 sta-yds

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $28,943.46
Blading 11.21 mi
Slide Removal 30 cy

Surfacing: $14,977.83
1000 Quarry Name: Commercial Source 358 cy

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 3.4 acres $1,823.11
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 11.1 acres $5,049.09

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $6,831.12

Mobilization: Const. $4,946.36 Surf. $1,145.33..... $6,091.69

Quarry Development: $0.00

Total: 9,463 mbf @ $7.918/mbf = $74,927.13

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities are COMPACTED in place cubic yards.

File T:\GP-GL\ENGINEERING\Timber Sales\2014 TS\Douglas Complex Fire Salvage TS\Burnt Rattler T.S\4 - Road Cost\Without 35.1 Road - USING THIS VERSION\Burnt Rattler TS - REVISED - without -35.1Rd - with rock.mdb

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-09.1 Road Name: Perkins #2
Road Renovation: 0.37 mi 16 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $941.56
Blading 0.37 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.4 acres $111.34

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $75.66 Surf. $0.00..... $75.66

Quarry Development: $0.00

Total: $1,128.56

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-09.1 Road Name: Perkins #2

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.37 mi = $192.30
  Compaction: $1329.15/mi x 0.37 mi = $491.79
  Clean Culverts: $270.05/mi x 0.37 mi = $99.92
  Water for Compaction
   Water Truck 2000 Gal 2 hr x $78.78/hr = $157.56

Subtotal: $941.56

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  Brushing width Left: 4ft. Right: 4ft.
  RoadSide Brushing Light: $278.34/acre x 0.40 acres = $111.34

Subtotal: $111.34

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 1.53% of total Costs = $75.66
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $75.66

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $1,128.56

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-11.0 (A) Road Name: Lower Rattlesnake
Road Renovation: 1.80 mi 16 ft Subgrade 3 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $5,145.20
Blading 1.80 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.2 acres $81.63
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 1.7 acres $473.18

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $156.12

Mobilization: Const. $420.81 Surf. $0.00..... $420.81

Quarry Development: $0.00

Total: $6,276.94

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-11.0 (A) Road Name: Lower Rattlesnake

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 1.80 mi = $935.50
  Pull Ditches: $140.38/mi x 1.80 mi = $252.68
  Compaction: $1329.15/mi x 1.80 mi = $2,392.47
  Clean Culverts: $270.05/mi x 1.80 mi = $486.09
  Water for Compaction
   Water Truck 2000 Gal 7 hr x $78.78/hr = $551.46
  Fill Slope Repair at MP 1.07
   Excavator 225 (1.5 CY) 4 hr x $94.61/hr = $378.44
   Dump truck 10 cy 2 hr x $74.28/hr = $148.56

Subtotal: $5,145.20

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:
 Comment: Seed and Mulch only; NO fertilizer
  Dry Method with Mulch: $544.21/acre x 0.15 acres = $81.63
        Includes Small Quantity Factor of 1.48

Subtotal: $81.63

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  Brushing width Left: 4ft. Right: 4ft.
  RoadSide Brushing Light: $278.34/acre x 1.70 acres = $473.18

Subtotal: $473.18

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:
  Erosion Control Device Installation
   General Laborer 2 hr x $32.86/hr = $65.72
   Pickup ½ Ton 2 hr x $45.20/hr = $90.40

Subtotal: $156.12

Road Number: 33-7-11.0 (A) Lower Rattlesnake Continued

Mobilization:
  Construction - 8.51% of total Costs = $420.81
  Surfacing - 0.00% by rock volume = $0.00

Subtotal:	$420.81

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal:	$0.00
Total:	$6,276.94

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-11.0 (B) Road Name: Lower Rattlesnake
Road Renovation: 0.24 mi 16 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $1,683.76
Blading 0.24 mi
Slide Removal 30 cy

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.2 acres $108.84
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.2 acres $55.67

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $132.81 Surf. $0.00..... $132.81

Quarry Development: $0.00

Total: $1,981.08

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-11.0 (B) Road Name: Lower Rattlesnake

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
Slide Removal 30 cy
Front End Loader $91.63/hr x 6.00 hr = $549.78
Dump Truck: $91.11/hr x 6.00 hr = $546.66
Blading: $519.72/mi x 0.24 mi = $124.73
Compaction: $1329.15/mi x 0.24 mi = $319.00
Clean Culverts: $270.05/mi x 0.24 mi = $64.81
Water for Compaction
Water Truck 2000 Gal 1 hr x $78.78/hr = $78.78

Subtotal: $1,683.76

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:
Comment: For cut bank stabilization/inboard ditch material removal
Dry Method with Mulch: $544.21/acre x 0.20 acres = $108.84
Includes Small Quantity Factor of 1.48

Subtotal: $108.84

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
Brushing width Left: 4ft. Right: 4ft.
RoadSide Brushing Light: $278.34/acre x 0.20 acres = $55.67

Subtotal: $55.67

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
Construction - 2.69% of total Costs = $132.81
Surfacing - 0.00% by rock volume = $0.00

Subtotal: $132.81

Road Number: 33-7-11.0 (B) Lower Rattlesnake Continued

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal:	$0.00
Total:	$1,981.08

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-11.4 Road Name: Foley Road
Road Renovation: 0.20 mi 16 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $502.56
Blading 0.20 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.2 acres $111.34

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $44.11 Surf. $0.00..... $44.11

Quarry Development: $0.00

Total: $658.01

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-11.4 Road Name: Foley Road

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.20 mi = $103.94
  Compaction: $1329.15/mi x 0.20 mi = $265.83
  Clean Culverts: $270.05/mi x 0.20 mi = $54.01
  Water for Compaction
   Water Truck 2000 Gal 1 hr x $78.78/hr = $78.78

Subtotal: $502.56

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 0.20 acres = $111.34

Subtotal: $111.34

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 0.89% of total Costs = $44.11
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $44.11

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $658.01

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-13.2 Road Name: Upper Rattlesnake Sp
Road Renovation: 0.02 mi 17 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $56.67
Blading 0.02 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.0 acres $11.13

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $4.87 Surf. $0.00..... $4.87

Quarry Development: $0.00

Total: $72.68

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-13.2 Road Name: Upper Rattlesnake Sp

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.02 mi = $10.39
  Compaction: $1329.15/mi x 0.02 mi = $26.58
  Water for Compaction
   Water Truck 2000 Gal 0.25 hr x $78.78/hr = $19.70

Subtotal: $56.67

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 0.02 acres = $11.13

Subtotal: $11.13

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 0.10% of total Costs = $4.87
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $4.87

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $72.68

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-13.4 Road Name: So. Rattlesnake Rd
Road Renovation: 0.79 mi 17 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres	$0.00
Clearing:0.0 sta Grubbing:0.0 acres	
Slash Treatment:0.0 acres	
300 Excavation:	$0.00
400 Drainage:	$0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2	
DownSpout: 0 lf	
PolyPipe: 0 lf	
500 Renovation:	$1,910.29
Blading 0.79 mi	
Surfacing:	$0.00
1300 Geotextiles:	$0.00
1400 Slope Protection:	$0.00
1800 Soil Stabilization: 0.0 acres	$0.00
1900 Cattleguards:	$0.00
2100 RoadSide Brushing: 0.8 acres	$445.34
2300 Engineering: 0.00 sta.	$0.00
2400 Minor Concrete:	$0.00
2500 Gabions:	$0.00
8000 Miscellaneous:	$500.00
Mobilization: Const. $205.20 Surf. $0.00.....	$205.20
Quarry Development:	$0.00
Total:	$3,060.83

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-13.4 Road Name: So. Rattlesnake Rd

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.79 mi = $410.58
  Compaction: $1329.15/mi x 0.79 mi = $1,050.03
  Clean Culverts: $270.05/mi x 0.79 mi = $213.34
  Water for Compaction
   Water Truck 2000 Gal 3 hr x $78.78/hr = $236.34

Subtotal: $1,910.29

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 0.80 acres = $445.34

Subtotal: $445.34

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:
  Reconsturct Existing Water Dip
   Tractor: D4 with winch 2 EA x $250.00/EA = $500.00

Subtotal: $500.00

Mobilization:
  Construction - 4.15% of total Costs = $205.20
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $205.20

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $3,060.83

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-13.5 (A-E) Road Name: Long Rattlesnake
Road Renovation: 3.49 mi 17 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $8,182.83
Blading 3.49 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 3.4 acres $1,419.53

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $690.00 Surf. $0.00..... $690.00

Quarry Development: $0.00

Total: $10,292.37

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-13.5 (A-E) Road Name: Long Rattlesnake

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 3.49 mi = $1,813.82
  Compaction: $1329.15/mi x 3.49 mi = $4,638.73
  Clean Culverts: $270.05/mi x 3.49 mi = $942.47
  Water for Compaction
   Water Truck 2000 Gal 10 hr x $78.78/hr = $787.80

Subtotal: $8,182.83

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  Brushing width Left: 4ft. Right: 4ft.
  RoadSide Brushing Light: $278.34/acre x 1.70 acres = $473.18
  RoadSide Brushing Medium: $556.68/acre x 1.70 acres = $946.36

Subtotal: $1,419.53

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 13.95% of total Costs = $690.00
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $690.00

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $10,292.37

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-13.5 (F) Road Name: Long Rattlesnake Extension
Road Renovation: 0.21 mi 14 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $467.04
Blading 0.21 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.4 acres $217.68
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.2 acres $111.34

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $800.00

Mobilization: Const. $114.69 Surf. $0.00..... $114.69

Quarry Development: $0.00

Total: $1,710.75

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-13.5 (F) Road Name: Long Rattlesnake Extension

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.21 mi = $109.14
  Compaction: $1329.15/mi x 0.21 mi = $279.12
  Water for Compaction
   Water Truck 2000 Gal 1 hr x $78.78/hr = $78.78

Subtotal: $467.04

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:
 Comment: Seed and mulch only; NO fertilizer
  Dry Method with Mulch: $544.21/acre x 0.40 acres = $217.68
        Includes Small Quantity Factor of 1.48

Subtotal: $217.68

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 0.20 acres = $111.34

Subtotal: $111.34

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:
  Construct Earthen Barricade
   Tractor: D4 with winch 1 EA x $300.00/EA = $300.00
  Construct water bars
   Tractor: D4 with winch 4 EA x $125.00/EA = $500.00

Subtotal: $800.00

Mobilization:
  Construction - 2.32% of total Costs = $114.69
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $114.69

Road Number: 33-7-13.5 (F) Long Rattlesnake Extension Continued

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal:	$0.00
Total:	$1,710.75

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-13.6 (A-B) Road Name: Goosehead
Road Renovation: 1.17 mi 16 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $2,873.04
Blading 1.17 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 1.1 acres $612.35

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $250.45 Surf. $0.00..... $250.45

Quarry Development: $0.00

Total: $3,735.84

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-13.6 (A-B) Road Name: Goosehead

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 1.17 mi = $608.07
  Compaction: $1329.15/mi x 1.17 mi = $1,555.11
  Clean Culverts: $270.05/mi x 1.17 mi = $315.96
  Water for Compaction
   Water Truck 2000 Gal 5 hr x $78.78/hr = $393.90

Subtotal: $2,873.04

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 1.10 acres = $612.35

Subtotal: $612.35

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 5.06% of total Costs = $250.45
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $250.45

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $3,735.84

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-23.0 Road Name: Sugarman Ridge Spur
Road Renovation: 0.59 mi 16 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $1,407.72
Blading 0.59 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.6 acres $334.01

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $125.16 Surf. $0.00..... $125.16

Quarry Development: $0.00

Total: $1,866.89

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-23.0 Road Name: Sugarman Ridge Spur

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.59 mi = $306.63
  Compaction: $1329.15/mi x 0.59 mi = $784.20
  Clean Culverts: $270.05/mi x 0.59 mi = $159.33
  Water for Compaction
   Water Truck 2000 Gal 2 hr x $78.78/hr = $157.56

Subtotal: $1,407.72

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 0.60 acres = $334.01

Subtotal: $334.01

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 2.53% of total Costs = $125.16
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $125.16

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $1,866.89

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-23.2 Road Name: Spur
Road Renovation: 0.12 mi 14 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $300.64
Blading 0.12 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.1 acres $27.83

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $23.60 Surf. $0.00..... $23.60

Quarry Development: $0.00

Total: $352.08

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-23.2 Road Name: Spur

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.12 mi = $62.37
  Compaction: $1329.15/mi x 0.12 mi = $159.50
  Water for Compaction
   Water Truck 2000 Gal 1 hr x $78.78/hr = $78.78

Subtotal: $300.64

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  Brushing width Left: 4ft. Right: 4ft.
  RoadSide Brushing Light: $278.34/acre x 0.10 acres = $27.83

Subtotal: $27.83

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 0.48% of total Costs = $23.60
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $23.60

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $352.08

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-23.4 Road Name: Spur
Road Renovation: 0.38 mi 14 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $820.74
Blading 0.38 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.4 acres $217.68
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.4 acres $222.67

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $1,075.00

Mobilization: Const. $167.87 Surf. $0.00..... $167.87

Quarry Development: $0.00

Total: $2,503.96

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-23.4 Road Name: Spur

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.38 mi = $197.49
  Compaction: $1329.15/mi x 0.38 mi = $505.08
  Water for compaction
   Water Truck 2000 Gal 1.5 hr x $78.78/hr = $118.17

Subtotal: $820.74

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:
 Comment: Seed and mulch only; NO fertilizer
  Dry Method with Mulch: $544.21/acre x 0.40 acres = $217.68
        Includes Small Quantity Factor of 1.48

Subtotal: $217.68

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 0.40 acres = $222.67

Subtotal: $222.67

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:
  Remove existing barricade
   Tractor: D4 with winch 1 EA x $150.00/EA = $150.00
  Construct earthen barricade
   Tractor: D4 with winch 1 EA x $300.00/EA = $300.00
  Construct water bar
   Tractor: D4 with winch 5 EA x $125.00/EA = $625.00

Subtotal: $1,075.00

Road Number: 33-7-23.4 Spur Continued

Mobilization:
  Construction - 3.39% of total Costs = $167.87
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $167.87

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $2,503.96

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: 33-7-36.1 Road Name: Sugar Hook
Road Renovation: 1.51 mi 16 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $3,672.25
Blading 1.51 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.0 acres $0.00

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 1.5 acres $835.02

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $0.00

Mobilization: Const. $323.88 Surf. $0.00..... $323.88

Quarry Development: $0.00

Total: $4,831.15

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: 33-7-36.1 Road Name: Sugar Hook

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 1.51 mi = $784.78
  Compaction: $1329.15/mi x 1.51 mi = $2,007.02
  Clean Culverts: $270.05/mi x 1.51 mi = $407.78
  Water for Compaction
   Water Truck 2000 Gal 6 hr x $78.78/hr = $472.68

Subtotal: $3,672.25

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Subtotal: $0.00

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 1.50 acres = $835.02

Subtotal: $835.02

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Subtotal: $0.00

Mobilization:
  Construction - 6.55% of total Costs = $323.88
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $323.88

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $4,831.15

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: Jeep Route Road Name: Existing Spur
Temporary Road: 0.05 mi 12 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $175.14
Blading 0.05 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.1 acres $54.42
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.1 acres $55.67

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $375.00

Mobilization: Const. $47.44 Surf. $0.00..... $47.44

Quarry Development: $0.00

Total: $707.68

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: Jeep Route Road Name: Existing Spur

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:

Comment: Scarification costs are listed for Ripping/Decommissioning purposes.

Blading: $519.72/mi x 0.05 mi = $25.99

Scarification: $866.20/mi x 0.05 mi = $43.31

Compaction: $1329.15/mi x 0.05 mi = $66.46

Water for compaction

Water Truck 2000 Gal 0.5 hr x $78.78/hr = $39.39

Subtotal: $175.14

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Comment: Seed and mulch only; NO fertilizer

Dry Method with Mulch: $544.21/acre x 0.10 acres = $54.42

Includes Small Quantity Factor of 1.48

Subtotal: $54.42

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:

RoadSide Brushing Medium: $556.68/acre x 0.10 acres = $55.67

Subtotal: $55.67

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Remove & replace log barricade

Excavator 225 (1.5 CY) 1 EA x $250.00/EA = $250.00

Construct water bar

Tractor: D4 with winch 1 EA x $125.00/EA = $125.00

Subtotal: $375.00

Road Number: Jeep Route Existing Spur Continued

Mobilization:
  Construction - 0.96% of total Costs = $47.44
  Surfacing - 0.00% by rock volume = $0.00

Subtotal:	$47.44

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal:	$0.00
Total:	$707.68

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: TR 09-5 Road Name: Temp Route
Temporary Road: 0.08 mi 12 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $256.60
Blading 0.08 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.2 acres $108.84
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.1 acres $55.67

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $725.00

Mobilization: Const. $82.36 Surf. $0.00..... $82.36

Quarry Development: $0.00

Total: $1,228.46

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: TR 09-5 Road Name: Temp Route

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:

Comment: Scarification costs are listed for Ripping/Decommissioning purposes.

Blading: $519.72/mi x 0.08 mi = $41.58

Scarification: $866.20/mi x 0.08 mi = $69.30

Compaction: $1329.15/mi x 0.08 mi = $106.33

Water for Compaction

Water Truck 2000 Gal 0.5 hr x $78.78/hr = $39.39

Subtotal: $256.60

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Comment: Seed and mulch only; NO fertilizer

Dry Method with Mulch: $544.21/acre x 0.20 acres = $108.84

Includes Small Quantity Factor of 1.48

Subtotal: $108.84

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:

RoadSide Brushing Medium: $556.68/acre x 0.10 acres = $55.67

Subtotal: $55.67

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Construct earthen barricade

Tractor: D4 with winch 2 EA x $300.00/EA = $600.00

Construct water bar

Tractor: D4 with winch 1 EA x $125.00/EA = $125.00

Subtotal: $725.00

Road Number: TR 09-5 Temp Route Continued

Mobilization:
  Construction - 1.66% of total Costs = $82.36
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $82.36

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal: $0.00

Total: $1,228.46

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: TR 10-1-A Road Name: Temp Route
Temporary Road: 0.03 mi 12 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $120.84
Blading 0.03 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.1 acres $54.42
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.1 acres $55.67

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $425.00

Mobilization: Const. $47.13 Surf. $0.00..... $47.13

Quarry Development: $0.00

Total: $703.06

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: TR 10-1-A Road Name: Temp Route

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:

Comment: Scarification costs are listed for Ripping/Decommissioning purposes.

Blading: $519.72/mi x 0.03 mi = $15.59

Scarification: $866.20/mi x 0.03 mi = $25.99

Compaction: $1329.15/mi x 0.03 mi = $39.87

Water for Compaction

Water Truck 2000 Gal 0.5 hr x $78.78/hr = $39.39

Subtotal: $120.84

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Comment: Seed and mulch only; NO fertilizer

Dry Method with Mulch: $544.21/acre x 0.10 acres = $54.42

Includes Small Quantity Factor of 1.48

Subtotal: $54.42

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:

RoadSide Brushing Medium: $556.68/acre x 0.10 acres = $55.67

Subtotal: $55.67

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Construct earthen barricade

Tractor: D4 with winch 1 EA x $300.00/EA = $300.00

Construct water bar

Tractor: D4 with winch 1 EA x $125.00/EA = $125.00

Subtotal: $425.00

Road Number: TR 10-1-A Temp Route Continued

Mobilization:
  Construction - 0.95% of total Costs = $47.13
  Surfacing - 0.00% by rock volume = $0.00

Subtotal:	$47.13

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal:	$0.00
Total:	$703.06

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: TR 10-1-B Road Name: Temp Route
Temporary Road: 0.06 mi 12 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $202.29
Blading 0.06 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.1 acres $54.42
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.1 acres $55.67

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $425.00

Mobilization: Const. $52.99 Surf. $0.00..... $52.99

Quarry Development: $0.00

Total: $790.37

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: TR 10-1-B Road Name: Temp Route

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:

Comment: Scarification costs are listed for Ripping/Decommissioning purposes.

Blading: $519.72/mi x 0.06 mi = $31.18

Scarification: $866.20/mi x 0.06 mi = $51.97

Compaction: $1329.15/mi x 0.06 mi = $79.75

Water for compaction

Water Truck 2000 Gal 0.5 hr x $78.78/hr = $39.39

Subtotal: $202.29

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:

Comment: Seed and mulch only; NO fertilizer

Dry Method with Mulch: $544.21/acre x 0.10 acres = $54.42

Includes Small Quantity Factor of 1.48

Subtotal: $54.42

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:

RoadSide Brushing Medium: $556.68/acre x 0.10 acres = $55.67

Subtotal: $55.67

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Construct earthen barricade

Tractor: D4 with winch 1 EA x $300.00/EA = $300.00

Construct water bar

Tractor: D4 with winch 1 EA x $125.00/EA = $125.00

Subtotal: $425.00

Road Number: TR 10-1-B Temp Route Continued

Mobilization:
  Construction - 1.07% of total Costs = $52.99
  Surfacing - 0.00% by rock volume = $0.00

Subtotal:	$52.99

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal:	$0.00
Total:	$790.37

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: TR 10-1-C Road Name: Temp Route
Temporary Road: 0.10 mi 12 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $0.00
Clearing:0.0 sta Grubbing:0.0 acres
Slash Treatment:0.0 acres

300 Excavation: $0.00

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $224.28
Blading 0.10 mi

Surfacing: $0.00

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 0.2 acres $108.84
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.1 acres $55.67

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $550.00

Mobilization: Const. $67.46 Surf. $0.00..... $67.46

Quarry Development: $0.00

Total: $1,006.25

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: TR 10-1-C Road Name: Temp Route

Section 200 Clearing and Grubbing:

Subtotal: $0.00

Section 300 Excavation:

Subtotal: $0.00

Section 400 Drainage:

Subtotal: $0.00

Section 500 Renovation:
  Blading: $519.72/mi x 0.10 mi = $51.97
  Compaction: $1329.15/mi x 0.10 mi = $132.92
  Water for compaction
   Water Truck 2000 Gal 0.5 hr x $78.78/hr = $39.39

Subtotal: $224.28

Surfacing:

Subtotal: $0.00

Section 1300 Geotextiles:

Subtotal: $0.00

Section 1400 Slope Protection:

Subtotal: $0.00

Section 1800 Soil Stabilization:
 Comment: Seed and mulch only; NO fertilizer
  Dry Method with Mulch: $544.21/acre x 0.20 acres = $108.84
        Includes Small Quantity Factor of 1.48

Subtotal: $108.84

Section 1900 Cattleguards:

Subtotal: $0.00

Section 2100 Roadside Brushing:
  RoadSide Brushing Medium: $556.68/acre x 0.10 acres = $55.67

Subtotal: $55.67

Section 2300 Engineering:

Subtotal: $0.00

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:
  Construct earthen barricade
   Tractor: D4 with winch 1 EA x $300.00/EA = $300.00
  Construct water bar
   Tractor: D4 with winch 2 EA x $125.00/EA = $250.00

Subtotal: $550.00

Mobilization:
  Construction - 1.36% of total Costs = $67.46
  Surfacing - 0.00% by rock volume = $0.00

Subtotal: $67.46

Road Number: TR 10-1-C Temp Route Continued

Quarry Development:
  Based on 0.00% of total rock volume

Subtotal:	$0.00
Total:	$1,006.25

ROAD CONSTRUCTION SUMMARY

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014
Road Number: TR 15-1A Road Name: Temp Route
Temporary Road: 0.77 mi 12 ft Subgrade 0 ft ditch 5/1/2013

200 Clearing and Grubbing: 0.0 acres $1,836.42
Clearing:40.7 sta Grubbing:1.5 acres
Slash Treatment:0.0 acres

300 Excavation: 2,963 cy $9,374.41

400 Drainage: $0.00
Culvert: 0 lf wt = 0 lbs factor = 1.2
DownSpout: 0 lf
PolyPipe: 0 lf

500 Renovation: $0.00

Surfacing: $14,977.83
Quarry Name: Commercial Source 358 cy

1300 Geotextiles: $0.00

1400 Slope Protection: $0.00

1800 Soil Stabilization: 1.5 acres $816.32
Includes Small Quantity Factor of 1.48

1900 Cattleguards: $0.00

2100 RoadSide Brushing: 0.0 acres $0.00

2300 Engineering: 0.00 sta. $0.00

2400 Minor Concrete: $0.00

2500 Gabions: $0.00

8000 Miscellaneous: $1,800.00

Mobilization: Const. $2,069.86 Surf. $1,145.33..... $3,215.19

Quarry Development: $0.00

Total: $32,020.17

Notes:
Quantities shown are estimates only and not pay items.
Surfacing Quantities shown are COMPACTED in place cubic yards.

Road Construction Worksheet

Road Number: TR 15-1A Road Name: Temp Route

Section 200 Clearing and Grubbing:
  Clearing - Medium: $30.57/sta x 40.66 sta = $1,242.98
  Grubbing - Light: $395.63/acre x 1.50 acres = $593.45
Subtotal: $1,836.42

Section 300 Excavation:
 Comment: Cut-Fill section ranging from 50-25% hillside slopes
  Excavation - Common: $1.72/cy x 2,963 cy = $5,096.36
  Layer Embankment - Common: $0.24/cy x 2,963 cy = $711.12
  Subgrade Compaction: 5 Sta/hr $15.10/sta. x 40.7 sta = $613.97
  Compaction - Common: $0.76/cy x 2,963 cy = $2,251.88
  Blading: $11.43/station x 40.66 stations = $464.74
  Water for compaction
   Water Truck 2000 Gal 3 hr x $78.78/hr = $236.34
Subtotal: $9,374.41

Section 400 Drainage:
Subtotal: $0.00

Section 500 Renovation:
Subtotal: $0.00

Section 1000 Crushed 1 1/2 to 3 in Quarry Name: Commercial Source
 Comment: Estimated from Commercial Quarry at the pit cost

Length	TopW	BotW	Depth	CWid	#TOs	Width	F.W.L	Taper	Other
0.22mi	12ft	13ft	8in						

  Rock Volume = 358cy
  Production: $7.01/cy x 358cy = $2,509.58
  Basic Rock Haul cost: $0.93/cy x 358cy = $332.94
  Rock Haul +15% grades: $2.79/cy-mi x 358cy x 4.00 mi= $3,995.28
  Rock Haul -15% grades: $1.39/cy-mi x 358cy x 11.00 mi= $5,473.82
  Rock Haul St& Co Roads: $0.62/cy-mi x 358cy x 8.00 mi= $1,775.68
  Blade, water, & compact rock
   Motor Grader 12G 3 hr x $117.37/hr = $352.11
   Water Truck 2000 Gal 3 hr x $78.78/hr = $236.34
   Vibratory roller, Steel Drum 4 hr x $75.52/hr = $302.08
Subtotal: $14,977.83

Section 1300 Geotextiles:
Subtotal: $0.00

Section 1400 Slope Protection:
Subtotal: $0.00

Section 1800 Soil Stabilization:
 Comment: Seed and mulch only; NO fertilizer
  Dry Method with Mulch: $544.21/acre x 1.50 acres = $816.32
        Includes Small Quantity Factor of 1.48
Subtotal: $816.32

Section 1900 Cattleguards:
Subtotal: $0.00

Section 2100 Roadside Brushing:
Subtotal: $0.00

Section 2300 Engineering:
Subtotal: $0.00

Road Number: TR 15-1A Temp Route Continued

Section 2400 Minor Concrete:

Subtotal: $0.00

Section 2500 Gabions:

Subtotal: $0.00

Section 8000 Miscellaneous:

Construct water bar

Tractor: D4 with winch 8 EA x $125.00/EA = $1,000.00

Construct water dip

Motor Grader 12G 2 EA x $250.00/EA = $500.00

Construct earthen barricade

Tractor: D4 with winch 1 EA x $300.00/EA = $300.00

Subtotal: $1,800.00

Mobilization:

Construction - 41.85% of total Costs = $2,069.86

Surfacing - 100.00% by rock volume = $1,145.33

Subtotal: $3,215.19

Quarry Development:

Based on 100.00% of total rock volume

Subtotal: $0.00

Total: $32,020.17

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Mobilization Costs - Construction and Surfacing

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014

Average Mobilization distance = 25 miles Factor = 0.59

Mobilization: Construction

Graders-all:	1 ea x (0.59 x $356.00/ea + 40 mi x $13.91/mi)=	$766.44
Rollers & Comp:	1 ea x (0.59 x $356.00/ea + 40 mi x $15.10/mi)=	$814.04
Excavators:	1 ea x (0.59 x $688.00/ea + 40 mi x $22.59/mi)=	$1,309.52
Tractors <= D7:	1 ea x (0.59 x $522.00/ea + 40 mi x $29.75/mi)=	$1,497.98
Dump Truck<=10cy:	1 ea x (0.59 x $185.00/ea + 40 mi x $3.70/mi)=	$257.15
Water Truck:	1 ea x (0.59 x $217.00/ea + 40 mi x $4.33/mi)=	$301.23
	Subtotal:	$4,946.36

Mobilization: Surfacing

Comment: Equipment estimated to be onsite for renovation

Graders-all:	1ea x (0.59 x $356.00/ea + 25 mi x $13.91/mi)=	$557.79
Rollers & Comp:	1ea x (0.59 x $356.00/ea + 25 mi x $15.10/mi)=	$210.04
	Subtotal:	$1,145.33

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

Summary of Construction Quantities

T.S. Contract Name: Burnt Rattler TS Sale Date: 07/24/2014

Road Number	Const	Improv	Renov	Decomm	Temp
33-7-09.1			19.54		
33-7-11.0 (A)			95.04		
33-7-11.0 (B)			12.67		
33-7-11.4			10.56		
33-7-13.2			1.06		
33-7-13.4			41.71		
33-7-13.5 (A-E)			184.27		
33-7-13.5 (F)			11.09		
33-7-13.6 (A-B)			61.78		
33-7-23.0			31.15		
33-7-23.2			6.34		
33-7-23.4			20.06		
33-7-36.1			79.73		
Jeep Route					2.64
TR 09-5					4.22
TR 10-1-A					1.58
TR 10-1-B					3.17
TR 10-1-C					5.28
TR 15-1A					40.66
Total Sta:			575.00		57.55

200 Clearing and Grubbing	Clearing stations	Grubbing acres	Slash acres
TR 15-1A	40.66	1.5	0.0
Totals:	40.66	1.5	0.0

300 Excavation	Excav C.Y.s	Haul sta-yds
TR 15-1A	2,963	0
Totals:	2,963	0

Water for compaction TR 15-1A
Water Truck 2000 Gal . . . . . 3 hr

400 Drainage
Totals: No Quantities

500 Renovation	Miles	Slide cy
33-7-09.1	0.37	0
33-7-11.0 (A)	1.80	0
33-7-11.0 (B)	0.24	30
33-7-11.4	0.20	0
33-7-13.2	0.02	0
33-7-13.4	0.79	0
33-7-13.5 (A-E)	3.49	0
33-7-13.5 (F)	0.21	0
33-7-13.6 (A-B)	1.17	0
33-7-23.0	0.59	0
33-7-23.2	0.12	0
33-7-23.4	0.38	0
33-7-36.1	1.51	0
Jeep Route	0.05	0
TR 09-5	0.08	0
TR 10-1-A	0.03	0
TR 10-1-B	0.06	0
TR 10-1-C	0.10	0
Totals:	11.21	30

Fill Slope Repair 33-7-11.0 (A)
Excavator 225 (1.5 CY) . . . . . 4 hr
Dump truck 10 cy . . . . . 2 hr
Water for Compaction 33-7-23.2
Water Truck 2000 Gal . . . . . 1 hr
Water for Compaction 33-7-11.4
Water Truck 2000 Gal . . . . . 1 hr
Water for Compaction 33-7-13.2
Water Truck 2000 Gal . . . . . 0.25 hr
Water for Compaction 33-7-13.4
Water Truck 2000 Gal . . . . . 3 hr
Water for Compaction 33-7-13.5 (A-E)
Water Truck 2000 Gal . . . . . 10 hr
Water for Compaction 33-7-11.0 (A)
Water Truck 2000 Gal . . . . . 7 hr
Water for Compaction 33-7-11.0 (B)
Water Truck 2000 Gal . . . . . 1 hr
Water for Compaction 33-7-09.1
Water Truck 2000 Gal . . . . . 2 hr
Water for Compaction 33-7-23.0
Water Truck 2000 Gal . . . . . 2 hr

Continuation of Construction Quantities

Water for compaction Jeep Road
Water Truck 2000 Gal . . . . . 0.5 hr
Water for Compaction 33-7-36.1
Water Truck 2000 Gal . . . . . 6 hr
Water for Compaction 33-7-13.5 (F)
Water Truck 2000 Gal . . . . . 1 hr
Water for Compaction TR 09-5
Water Truck 2000 Gal . . . . . 0.5 hr
Water for Compaction TR 10-1-A
Water Truck 2000 Gal . . . . . 0.5 hr
Water for compaction TR 10-1-B
Water Truck 2000 Gal . . . . . 0.5 hr
Water for compaction TR 10-1-C
Water Truck 2000 Gal . . . . . 0.5 hr
Water for compaction 33-7-23.4
Water Truck 2000 Gal . . . . . 1.5 hr
Water for Compaction 33-7-13.6 (A-B)
Water Truck 2000 Gal . . . . . 5 hr

Surfacing (Cubic Yards)

Quarry Name: Commercial Source

1000 Crushed 1 1/2 to 3 in	Roadway	Turnouts	Other	
TR 15-1A	358	0	0	358
Totals:	358	0	0	358

Blade, water, & compact rock TR 15-1A
Motor Grader 12G . . . . . 3 hr
Water Truck 2000 Gal . . . . . 3 hr
Vibratory roller, Steel Drum . . . . . 4 hr

1300 Geotextiles
Totals: No Quantities

1400 Slope Protection

Totals: 0

1800 Soil stabilization - acres	Dry W/O Mulch	Dry/with Mulch	Hydro Mulch
33-7-11.0 (A)	0.0	0.2	
33-7-11.0 (B)	0.0	0.2	
33-7-13.5 (F)	0.0	0.4	
33-7-23.4	0.0	0.4	
Jeep Route	0.0	0.1	
TR 09-5	0.0	0.2	
TR 10-1-A	0.0	0.1	
TR 10-1-B	0.0	0.1	
TR 10-1-C	0.0	0.2	
TR 15-1A	0.0	1.5	
Totals:	0.0	3.4	0.0

Small Quantity Factor of 1.48 used

1900 Cattleguards
Totals: No Quantities

2100 RoadSide Brushing	acres
33-7-09.1	0.4
33-7-11.0 (A)	1.7
33-7-11.0 (B)	0.2
33-7-11.4	0.2
33-7-13.2	0.0
33-7-13.4	0.8
33-7-13.5 (A-E)	3.4
33-7-13.5 (F)	0.2
33-7-13.6 (A-B)	1.1
33-7-23.0	0.6
33-7-23.2	0.1
33-7-23.4	0.4
33-7-36.1	1.5
Jeep Route	0.1
TR 09-5	0.1
TR 10-1-A	0.1
TR 10-1-B	0.1
TR 10-1-C	0.1
Totals:	11.1

2300 Engineering	stations
Totals:	0.00

2400 Minor Concrete

Totals: No Quantities

2500 Gabions

Totals: No Quantities

8000 Miscellaneous

Construct earthen barricade TR 10-1-C
Tractor: D4 with winch . . . . . 1 EA
Construct earthen Barricade 33-7-13.5 (F)
Tractor: D4 with winch . . . . . 1 EA
Construct earthen barricade TR 09-5
Tractor: D4 with winch . . . . . 2 EA
Construct earthen barricade TR 10-1-A
Tractor: D4 with winch . . . . . 1 EA
Construct earthen barricade TR 10-1-B
Tractor: D4 with winch . . . . . 1 EA
Construct earthen barricade TR 15-1A
Tractor: D4 with winch . . . . . 1 EA
Construct earthen barricade 33-7-23.4
Tractor: D4 with winch . . . . . 1 EA
Construct water bar TR 10-1-C
Tractor: D4 with winch . . . . . 2 EA
Construct water bar 33-7-23.4
Tractor: D4 with winch . . . . . 5 EA
Construct water bar TR 10-1-A
Tractor: D4 with winch . . . . . 1 EA
Construct water bar Jeep Route
Tractor: D4 with winch . . . . . 1 EA
Construct water bar TR 09-5
Tractor: D4 with winch . . . . . 1 EA
Construct water bar TR 15-1A
Tractor: D4 with winch . . . . . 8 EA

Continuation of Construction Quantities

Construct water bar TR 10-1-B
Tractor: D4 with winch . . . . . 1 EA
Construct water bars 33-7-13.5 (F)
Tractor: D4 with winch . . . . . 4 EA
Construct water dip TR 15-1A
Motor Grader 12G . . . . . 2 EA
Erosion Control Device Install 33-7-11.0 (A)
General Laborer . . . . . 2 hr
Pickup ½ Ton . . . . . 2 hr
Reconsturct Existing Water Dip 33-7-13.4
Tractor: D4 with winch . . . . . 2 EA
Remove & replace log barricade Jeep Route
Excavator 225 (1.5 CY) . . . . . 1 EA
Remove existing barricade 33-7-23.4
Tractor: D4 with winch . . . . . 1 EA

Sale: Burnt Rattler TS
Sale Date: 07/24/2014
Prep. By : Freeman
Tract No: TS-14-11

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

ROAD MAINTENANCE AND ROAD USE APPRAISAL WORK SHEET

Summary of Costs

1) Road Use - Amortization: (1) (R-3b) $0.00/9463 MBF (Tot Sale Vol) = $0.00/MBF 1/

---

2) Road Maintenance Obligation:

$47034.19 (2.1)	+	$0.00 (3.1)	+	$0.00 (3.2)	+	$6749.95 (5.1)	=	$53784.14 (R-2)

3) Other Maintenance Payments:

$0.00 (4.1)

4). Purchaser Maintenance Allowances:

(5.2A) Move In	$1353.32
(5.2B) Culverts, Catch Basins, Downspouts	$2940.84
(5.2C) Grading, Ditching	$5912.43
(5.2D) Slide Removal and Slump Repair	$0.00
(5.2E) Dust Palliative (Water)	$5718.24
(5.2F) Surface Repair (Aggregate)	$0.00
(5.2G) Other	$0.00

Total (5.2) = $15924.84 (R-2 & Ex. D)

2)+3)+4) Total = $69,708.98/9463 MBF (Total Sale Vol) = $7.37/MBF 1/

Costs are estimates only and do not include Profit and Risk.
1/ Enter on Timber Sale Summary Form OSO 5420-1.

OR110-9113-1

File T:\GP-GL\ENGINEERING\Timber Sales\2014 TS\Douglas Complex Fire Salvage TS\Burnt Rattler T.S\4 - Road Cost\Without 35.1 Road - USING THIS VERSION\Burnt Rattler TS - REVISED - without -35.1Rd - with rock.mdb

1) Road Use Fees - Amortization

R/W Number	Road Number	Rd Use Fee	x	Vol MBF	=	Road Use Obligation

(1.1) Subtotal $0.00

2) BLM Maintenance - Timber Haul 1/ 2/

Road Number and Segment	A Surf N Type	Mi	x	Maint Fee	x	Vol MBF	=	Total Maint
33-7-02.1 (A-B)	A ABC	1.42		1.25		9341		$16580.28
33-7-02.1 (C-D)	A ABC	1.12		1.25		9295		$13013.00
33-7-13.0	A GRR	0.90		1.25		9295		$10456.88
33-7-13.7	A GRR	0.14		1.25		3175		$555.63
33-7-13.7	A GRR	1.09		1.25		3054		$4161.08
33-7-13.7	A GRR	0.24		1.25		2655		$796.50
33-7-13.7	A GRR	0.30		1.25		1775		$665.63
33-7-13.7	A GRR	0.21		1.25		604		$158.55
33-7-13.7	A GRR	0.83		1.25		483		$501.11
33-7-13.7	A GRR	0.11		1.25		82		$11.28
33-7-35.0	A PRR	1.31		1.25		82		$134.28

(2.1) Subtotal $47034.19

1/ Rockwear is included in fee as a maintenance cost for BLM maintained roads.
2/ Include lump sum logging damage repair

3) Third Party Maintenance and Rockwear

		MAINTENANCE (3.1)					ROCKWEAR (3.2) 1/ 2/			
Agrmnt Number	Road Number	Mi	x	Fee	x	MBF =	Maint	Fee	x	MBF = Rkwear

(3.1) Subtotal $0.00 (3.2) Subtotal $0.00

1/ Rockwear is included in fee as a maintenance cost for BLM maintained roads.
2/ Include lump sum logging damage repair

4) Other Maintenance Payments - USFS or Others Perform Maintenance

Agency	Road Number	Fee MBF/Mi	x	Mi	=	Fee /MBF	x	Vol Hauled	=	Maint Cost

(4.1) Subtotal $0.00

5) Purchaser Maintenance - Rock Wear

TIMBER HAUL (5.1)/1/2

Road No 1/ and Segment	A N	Mi	RkWear x Fee	x	Vol MBF	=	Total RkWear
33-7-36.1	A	0.44	0.49		49		$10.56
33-7-36.1	A	1.07	0.49		122		$63.96
33-7-23.0	A	0.64	0.49		399		$125.13
33-7-13.6 (A)	A	0.14	0.49		24		$1.65
33-7-13.6 (A)	A	0.67	0.49		195		$64.02
33-7-13.2	A	0.02	0.49		195		$1.91
33-7-13.5 (E)	N	0.34	0.49		367		$61.14
33-7-13.5 (E)	N	0.24	0.49		855		$100.55
33-7-13.5 (E)	N	0.26	0.49		1173		$149.44
33-7-13.5 (D)	N	0.33	0.49		2240		$362.21
33-7-13.5 (D)	N	0.37	0.49		4339		$786.66
33-7-13.5 (C2)	N	0.17	0.49		4802		$400.01
33-7-13.5 (B)	N	0.25	0.49		4802		$588.25
33-7-13.5 (B)	N	0.87	0.49		5096		$2172.42
33-7-13.5 (A)	A	0.43	0.49		5096		$1073.73
33-7-13.5 (A)	A	0.19	0.49		5925		$551.62
33-7-13.4	A	0.33	0.49		49		$7.92
33-7-13.4	A	0.45	0.49		829		$182.79
33-7-11.0 (A-B)	A	2.04	0.49		46		$45.98

(5.1) Subtotal $6749.95

1/ All surfaced roads have a rockwear fee which includes an allowance for rock haul
2/ Include lump sum logging damage repair

Purchaser Operational Maintenance

Cost allowances must be limited to work required under timber sale Exhibit D.
If purchaser maint. such as dust control/damage repair is performed on BLM maint. roads, add appropriate mandatory Ex. D provisions. Note in prospectus.

Move In

Equipment 1/	No Units	x	Move in	x	Cost/ 50 Mi	x	Dist Factor	=	Sub-total
Motor Grader:	1		2		$356.00		0.8381		$596.73
Back Hoe:	1		1		$356.00		0.6727		$239.48
Loader:					$356.00		0.59		$0.00
Water Truck:	1		2		$217.00		0.8381		$363.74
Dump Truck 2/:	1		1		$228.00		0.6727		$153.38

(5.2A) Total $1353.32

1/ Equipment limited to that allowed in Exhibit D.

Culvert Maintenance - Including Catchbasins and Downpipes 1/

Miles	x	Cost/Mi	=	Subtotal
10.89		270.05		$2940.84

(5.2B) Total $2940.84

1/ Does not include purchase or installation of culvert pipe.

Grading (Includes Ditches and Shoulders) 1/

	Miles	x	Cost/Mi	x Freq	= Subtotal
Blade Road:	10.89		519.72	1	$5659.75
Blade Ditch:	1.80		140.38	1	$252.68

(5.2C) Total $5912.43

1/ Watch for double allowance on roadway preparation for dust palliative application.

Slide and Slough removal, Slump Repair (15 sta-yds. ea.) 1/

Type Equipment	No Slides /Slumps	x	Hours Each	x	Equip Cost	= Subtotal
Grader:	0		0		139.10	$0.00
Loader:	0		0		91.63	$0.00
Backhoe:	0		0		66.05	$0.00

(5.2D) Total $0.00

1/ Maximum haul is 15 sta. yds. Use grader or front end loader only.

Dust Palliative (Water) 1/

Spreading Hours

Miles	/	MPH	=	Hours	x	No Days	x	Freq /Day	=	Truck Hours
10.89		10		1.1		60		1		66
Load & Haul =				0.0		0		0		0
								Total Hours =		66

Truck Cost: $86.64/Hr. x 66.0 Hours = $5718.24

(5.2E) Total $5718.24

1/ Allow water for all BLM maintaintained non-oiled roads.

Surface Repair (Aggregate)

Production Cost:	0 C.Y.	x $0.00/C.Y.		=	$0.00
Haul to Stockpile:	0 C.Y.	x $3.72/C.Y.	x 0.00 Mi	=	$0.00
Stockpile:	0 C.Y.	x $1.26/C.Y.		=	$0.00
Load from Stockpile:	0 C.Y.	x $1.39/C.Y.		=	$0.00
Haul from Stockpile:	0 C.Y.	x $3.72/C.Y.	x 0.00 Mi	=	$0.00
Process with Grader:	0 C.Y.	x $1.40/C.Y.		=	$0.00

(5.2F) Total $0.00

Other

Fallen Timber Cutting: 1/	0.0 Hours x $0.00/Hour = $0.00
Brush Cutting/Tree Trimming: 2/	0.0 Hours x $0.00/Hour = $0.00
Oil/Asphalt Materials: 3/	Lump Sum = $0.00
Signing for Dust Palliatives: 4/	Lump Sum = $0.00
	Lump Sum = $0.00

(5.2G) Total $0.00

1/ Exhibit D Subsection 3104.
2/ Exhibit D Subsection 3107.
3/ Exhibit D Subsection 3401.
4/ Exhibit D Subsection 3405b.

Form 5440-9
(December 2004)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

DEPOSIT AND BID FOR [X] **TIMBER*** [ ] **VEGETATIVE RESOURCE (Other Than Timber)**

SCALE SALE

Name of Bidder	
Tract Number	ORM07-TS14-11
Sale Name	Burnt Rattler Salvage
Sale Notice *(dated)*	6/25/2014
BLM District	Medford

	Sealed Bid for Sealed Bid Sale	X	Written Bid for Oral Auction Sale

In response to the above dated Sale Notice, the required deposit and bid are hereby submitted for the purchase of designated timber/vegetative resource on the tract specified above.

Required bid deposited is **$79,700.00** and is enclosed in the form of ☐ cash ☐ money order ☐ bank draft ☐ cashier's check ☐ certified check ☐ bid bond of corporate surety on approved list of the United States Treasury ☐ guaranteed remittance approved by the authorized officer.

IT IS AGREED That the bid deposit shall be retained by the United States as liquidated damages if the bid is accepted and the undersigned fails to execute and return the contract, together with any required performance bond and any required payment within 30 days after the contract is received by the successful bidder. It is understood that no bid for less than the appraised price on a unit basis per species will be considered. If the bid is rejected the deposit will be returned.

BID SCHEDULE – LUMP SUM SALE

NOTE: Bidders should carefully check computations in completing the Bid Schedule

BID SUBMITTED					**ORAL BID MADE**	
PRODUCT SPECIES	UNIT	ESTIMATED VOLUME OR QUANTITY	UNIT PRICE	TOTAL VALUE	UNIT PRICE	TOTAL VALUE
Douglas-fir	MBF	7,444	X	=	X	=
Sugar Pine	MBF	1,117				
Ponderosa Pine	MBF	901	X			
Incense Cedar	MBF	1	X			
Total		**9,463**	X	=	X	=
			X	=	X	=
			X	=	X	=
			X	=	X	=
			X	=	X	=
			X	=	X	=
			X	=	X	=
			X	=	X	=
			X	=	X	=
			X	=	X	=
		TOTAL PURCHASE PRICE				

(Continued on reverse)

If sale contract is executed, undersigned is liable for total purchase price even though the quantity cut, removed, or designated

for taking is more or less than the total estimated volume or quantity shown above. Undersigned certifies bid was arrived at by bidder or offeror independently, and was tendered without collusion with any other bidder or offeror. In submitting or confirming this bid, undersigned agrees to the foregoing provisions, applicable regulations, and certifies that he is authorized to act as, or on behalf of, the bidder.

Bid submitted on *(date)*

(Check appropriate box, sign in ink, and complete the following)

☐ Signature, if firm is individually owned	Name of firm *(type or print)*
☐ Signatures, if firm is a partnership or L.L.C.	Business address, include zip code *(type or print)*
☐ Corporation organized under the state laws of	*(To be completed following oral bidding)* I HEREBY confirm the above oral bid By *(signature)*
Signature of Authorized Corporate Signing Officer	
Title	Date

Submit bid, in *duplicate*, to qualify for either an oral auction or sealed bid sale together with the required bid deposit made payable to the Department of the Interior – BLM. Oral Auction – Submit to Sales Supervisor prior to closing of qualifying period for tract.	Sealed Bid – Send to District Manager, who issued the sale notice, in a sealed envelope marked on the outside: (1) "Bid for Timber" (2) Vegetative Resource Other Than Timber (3) Time bids are to be opened (4) Legal description

NOTICE

The Privacy Act of 1974 and the regulation in 43 CFR 2.48(d) provide that you be furnished the following information in connection with information required by this application.

AUTHORITY: 38 FR 6280 and 43 CFR 5442.1

PURPOSE: To qualify an oral auction bidder, and then if successful, to bind bidder to certain contract conditions.

ROUTINE USE: To determine that an individual is qualified to participate in oral auction bidding, and, as surety that bidder will fulfill contract requirements.

EFFECT OF NOT PROVIDING INFORMATION: Filing this deposit and bid information is necessary only when an individual wishes to participate in a sealed or auction bid sale for timber or vegetative resources.

INSTRUCTIONS TO BIDDERS

1. *AUTHORITY* – Timber located on the revested Oregon and California Railroad Grant Lands and on the reconveyed Coos Bay Wagon Road Grant Lands is administered and sold pursuant to authority of the Act of August 28, 1937 (50 Stat. 874; 43 U.S.C. 1181a); timber located on other lands and other vegetative resources on all public lands of the United States under jurisdiction of the Bureau of Land Management are administered and sold pursuant to authority of the Act of July 31, 1947 (61 Stat. 681), as amended, by the Act of July 23, 1955 (69 Stat. 367; 30 U.S.C. 601 et. seq.). Regulations of the Secretary of the Interior governing sale of timber are codified in 43 CFR Group 5400.

2. *QUALIFICATIONS OF BIDDERS* – A bidder for sale of timber/vegetative resources must be either (a) a citizen of the United States, (b) a partnership composed wholly of such citizens, (c) an unincorporated association composed wholly of such citizens, or (d) a corporation authorized to transact business in the State in which the timber/vegetative resource is located.

3. *INSPECTION OF TIMBER/VEGETATIVE RESOURCES* – Bidder is invited, urged, and cautioned to inspect the timber/vegetative resource prior to submitting a bid. By executing the timber/vegetative resource sale contract, bidder warrants that the contract is accepted on the basis of his examination and inspection of the timber/vegetative resource and his opinion of its value.

4. *DISCLAIMER OF WARRANTY* – Government expressly disclaims any warranty of the fitness of the designated timber/vegetative resource for any purpose of the bidder; all timber/vegetative resources are to be sold "As Is" without any warranty of merchantability by Government. Any warranty as to the quantity or quality of timber/vegetative resource to be sold is expressly disclaimed by Government.

5. *BIDS* – Sealed or written bids for not less than the advertised appraised price, per timber/vegetative resource must be submitted in duplicate to the District Manager who issued *Timber/Vegetative Resource Sale Notice*.

(a) *Sealed Bid Sales* – Bids will be received until time for opening which is set out in the Notice. Enclose both copies of bid with required bid deposit in a sealed envelope marked on the outside *Bid for Timber/Vegetative Resource*, time bid is to be opened, tract number, and legal description of land on which timber/vegetative resource is located. In event of a tie, the high bidder shall be determined by lot from among those who submitted the tie bids.

(b) *Auction Sales* – Submission of the required bid deposit and a written bid is required to qualify for oral bidding. Oral bidding shall begin from the highest written bid. No oral bid will be considered which is not higher than the preceding bid. In the event there is a tie in high written bids, and no oral bidding occurs, the bidder who was the first to submit his bid deposit and written bid shall be declared the high bidder. If the officer conducting the sale cannot determine who made the first submission of high tie written bids, the high bidder shall be determined by lot. High bidder must confirm his bid, in writing, immediately upon being declared high bidder.

(c) Except as otherwise provided in 43 CFR 5442.2, bids will not be considered in resale of timber/vegetative resource remaining from an uncompleted contract from any person or affiliate of such person who failed to complete the original contract because of (1) cancellation for the purchaser's breach or (2) through failure to complete payment by expiration date.

(d) When it is in the interest of the Government to do so, it may reject any and all bids and may waive minor deficiencies in bids or in sale advertisement.

6. *BID FORMS* – All sealed, written bids, and confirmation of oral bids shall be submitted on forms provided by Government.

(a) *Lump Sum Sales* – Bids shall specify (1) Bureau of Land Management estimated volume, (2) price per unit, and (3) total purchase price. Estimated volume and price per unit are to be used for administrative and appraisal purposes only. Upon award of contract, high bidder shall be liable for total purchase price, including any adjustment which may be made as a result of reappraisal if an extension of time is granted, even though quantity of timber/vegetative resource actually cut, removed, or designated for taking is more or less than the estimated volume or quantity listed.

(b) *Timber Scale Sales* – Bids must state price per thousand board feet that will be paid for each species. High bidder will be determined by multiplying bid price per thousand board feet per species by Bureau of Land Management estimate of volume of each species. Purchaser shall be liable for purchase price of all merchantable timber sold under contract even though all such timber is not actually cut and removed prior to expiration of time for cutting and removal as specified in contract.*

7. *BID DEPOSIT* – All bidders must make a deposit of not less than the amount specified in the *Timber/Vegetative Resource Notice*. Deposit may be in the form of cash, money orders, bank drafts, cashiers or certified checks made payable to the Department of the Interior – BLM, bid bonds of a corporate surety shown on the approved list of the United States Treasury Department*, or any approved guaranteed remittance approved by the Authorized Officer. Upon conclusion of bidding, the bid deposit of all bidders, except high bidder, will be returned. The cash deposit of the successful bidder may be applied toward the required sale deposit and/or the purchase price. Cash not applied to the sale deposit or the purchase price, or a corporate surety bid bond, will be returned at the time the contract is signed by the Government.

8. *AWARD OF CONTRACT* – Government may require high bidder to furnish such information as is necessary to determine the ability of bidder to perform the obligation of contract. Contract will be awarded to high bidder, unless he is not qualified or responsible or unless all bids are rejected. If high bidder is not qualified or responsible or fails to sign and return the contract together with required performance bond and any required payment, contract may be offered and awarded to the highest bidders qualified, responsible, and willing to accept the contract.

9. *TIMBER/VEGETATIVE RESOURCE SALE CONTRACT* – To be executed by purchaser, has been prepared by Government, and may be examined in the District Manager's office.

10. *PERFORMANCE BOND* -

(a) A performance bond in an amount of not less than 20 percent of total purchase price is required, but the amount of the bond shall not be in excess of $500,000, except when the purchaser opts to increase the minimum bond to permit cutting prior to payment as provided in 43 CFR 5451.2, or in the event the purchaser is a holder of an unresolved default the bond may be increased as provided in 43 CFR 5450.1(b). Performance bond may be (1) bond of a corporate surety shown on approval list issued by the United States Treasury Department and executed on an approved standard form, (2) personal surety bond executed on an approved standard form if Government determines principals and bondsman are capable of carrying out the terms of the contract, (3) cash bonds, (4) negotiable securities of the United States, or (5) any guaranteed remittance approved by the Authorized Officer.

(b) If purchaser elects to cut timber without skidding or yarding it to a loading point or removing it prior to the payment of the second or subsequent installments, Government shall require an increase in amount of performance bond initially required by an amount equal to the value of timber to be cut. Such increase must be on a bond rider form supplied by Government and be approved, in writing, by Government prior to cutting timber covered by the bond increase. This increased amount of bond shall be used to assure payment for timber cut in advance of payment.*

11. *PAYMENT BOND* – If purchaser elects to (a) cut and remove timber, or (b) remove timber already cut which has been secured by an increased performance bond as provided in paragraph 10(b) above, before payment of the second or subsequent installments, Government shall require a payment bond on a form supplied by Government. Purchaser shall obtain written approval from Government of payment bond prior to cutting and/or removal of timber covered by the bond. Payment bond shall be used to assure payment for timber cut and/or removed in advance of payment.*

12. *PAYMENT OF PURCHASE PRICE* – For sales of $500 or more, Government may allow payment by installments. Except as discussed in paragraphs 10 and 11 above, no part of any timber/vegetative resource sold may be severed, cut, or removed unless advance payment has been made as provided in contract.

13. *LIQUIDATED DAMAGES* – Within thirty (30) days from receipt of *Timber/Vegetative Resource Sale Contract*, the successful bidder shall sign contract and return it to Government, together with required bond and any required payment. If successful bidder fails to comply within the stipulated time, his bid deposit shall be retained by Government as liquidated damages.

14. *NINETY-DAY SALES* – If no bid is received within time specified in the advertisement of sale and if Government determines that there has been no significant rise in the market value of timber/vegetative resource, it may, in its discretion, keep the sale open, not to exceed ninety (90) days.

**Applies to Timber Only*

15. *UNAUTHORIZED USE OF GOVERNMENT PROPERTY* – A sale may be refused to high bidder who has been notified that he has failed to make satisfactory arrangements for payment of damages resulting from unauthorized use of, or injury to, property of the United States.

16. *EQUAL OPPORTUNITY CLAUSE* – This contract is subject to the provisions of Executive Order No. 11246 of September 24, 1965, as amended, which sets forth the nondiscrimination clauses. Copies of this order may be obtained from the District Manager. 43 CFR 60-1.7(b) requires that the Equal Opportunity *Compliance Report Certification* will be completed by prospective contractors. Certification may be obtained from District Manager.

17. *LOG EXPORT* – All timber offered for sale except as noted in the *Timber Sale Notice* is restricted from export from the United States in the form of unprocessed timber and cannot be used as a substitute for exported private timber. For the purpose of this contract, unprocessed timber is defined as: (1) any logs except those of utility grade or below, such as sawlogs, peeler logs, and pulp logs; (2) cants or squares to be subsequently remanufactured exceeding eight and three quarters (8-3/4) inches in thickness; (3) split or round bolts or other roundwood not processed to standards and specifications suitable for end product use; or (4) western red cedar lumber which does not meet lumber of American Lumber Standards Grades of Number 3 dimension or better, or Pacific Lumber Inspection Bureau R-List Grades of Number 3 common or better. Timber manufactured into the following will be considered processed: (1) lumber and construction timbers, regardless of size, manufactured to standards and specifications suitable for end product uses; (2) chips, pulp and pulp products; (3) green or dry veneer and plywood; (4) poles and piling cut or treated for use as such; (5) cants, squares, and lumber cut for remanufacture of eight and three quarters (8-3/4) inches in thickness or less; or (6) shakes and shingles. In event purchaser wishes to sell any or all of timber restricted from export in the form of unprocessed timber, the buyer, exchanges, or recipient shall be required to comply with contractual provisions relating to "*unprocessed timber*". Special reporting, branding and painting of logs may be included in contract provisions.*

18. *DETAILED INFORMATION* – Detailed information concerning contract provisions, bid, performance bond forms, tract location maps, and access conditions may be obtained from the District Manager. All persons interested in bidding on the products listed are encouraged to familiarize themselves with all such detailed information.

*U.S. GOVERNMENT PRINTING OFFICE: 1993-839-310