



TIMBER SALE PRESCRIPTION

GENERAL

Date 5/5/08	Forest, Mineral and Fire Management Unit Roscommon
Timber Sale Number (if applicable) 71-033-08-01	Sale Name (or prescription name) Reilly Road Oak

LOCAL CONTACT

Name Steve Anderson	Telephone (989) 275 - 4622
Email Address anderss1@michigan.gov	FAX (989) 275 - 6203

Map of Project Area Attached

LEGAL DESCRIPTION

T22N R03W Section(s) 30 & 32 Description SW1/4 of Sec. 30 and NE1/2 of Sec. 32

Year of Entry: 2008 Compartment(s):113 Stand Number(s): 22 & 35

THIS TIMBER SALE CONTRACT IS BASED ON THE FOLLOWING ACREAGE

Estimated Acres: 108 Source: OI GPS Other _____

Payment will be made on the basis of these estimated acres.

TREATMENT & OBJECTIVE

STAND #	COVER TYPE	ACRES	BA	TREATMENT	MANAGEMENT OBJECTIVE
22	08	45	50	Seed Tree	Oak
35	09	63	130	Shelterwood Prep	Oak

PRESCRIPTION

1. Stand 22 - Cut all species except white oak, red pine, and white pine. Protect oak regeneration under 4". Average residual basal area of white oak, red pine, and white pine will be approximately 20 SF/acre. Management objective for this stand is oak.
2. Stand 35 - Cut all aspen, jack pine, and red maple. Mark 20 SF/Acre of lower quality oak sawlogs and pulp to cut leaving higher quality red and white oak. If removal of oak will cause excessive damage to the surrounding residual red and white pine it should be left in place. Target residual basal area is 90 SF +/- 10 SF of white and red oak and white and red pine. Manage for a mixed stand of oak and pine.
3. Both stands - Mark non-oak den trees and future snag trees.
- 4.
- 5.

Access Access is via Reilly road east and west of Reserve Road, south of M-55.

DNR PREPARATION WORK TO BE DONE PRIOR TO CONTRACT WORK	ESTIMATED DATE

CONTRACT WORK CAN BEGIN

Immediately Date:

CONTRACT WORK MUST BE COMPLETED BY Date 12/15/08

PAINT LINE WORK

This is included in the bid This is not included in the bid

Paint line work to be performed: (See attached map for locations)

TYPE OF LINE	WORK TO BE DONE	NOT APPLICABLE	PAINT COLOR	
Private boundary	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/> Blue	<input type="checkbox"/> Other:
Sale boundary	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/> Red	<input type="checkbox"/> Other:
Sale cutting unit lines	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/> Yellow	<input type="checkbox"/> Other:
Retention Islands	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/> Red	<input type="checkbox"/> Other:

Exclusions to mark and why

Mark a 2-3 acre retention island in the middle of Stand 22, north east of Stand 23. Mark a 2-3 acre retention island in the middle of Stand 35. Meet on-site with DNR personnel prior to commencement of fieldwork for additional instructions on leaving retention.

Standards for marking lines against private land

N.A.

AREA CALCULATION

This is included in the bid This is not included in the bid

UNIT	METHOD	STANDARD
Unit Lines	<input checked="" type="checkbox"/> GPS <input type="checkbox"/> String Chain <input type="checkbox"/> Other	
Retention Island	<input checked="" type="checkbox"/> GPS <input type="checkbox"/> String Chain <input type="checkbox"/> Other	
Stand	<input checked="" type="checkbox"/> GPS <input type="checkbox"/> String Chain <input type="checkbox"/> Other	

Special Instructions:

Unit lines should be recorded as line features and stands/retention islands should be recorded as area features. See also Appendix A.

TIMBER CRUISING SPECIFICATIONS

This is included in the bid This is not included in the bid

Required Basal Area Factor: 10 20 Other:

Cruise Line Directions Variable

CRUISING UNITS	NUMBER OF PLOTS PER ACRE	SPACING (CHAINS)
Stand 22	1	3 X 3
Stand 35	1.2	3 X 4
		X
		X
TOTAL NUMBER OF CRUISE POINTS		

Cruise Special Instructions:

Determine and record residual basal area by species for each plot on both Stand 22 and Stand 35. See also Appendix B.

Unless otherwise specified, the tally sheets used must be those supplied by the Forest, Mineral and Fire Management Unit.

TIMBER MARKING SPECIFICATIONS

This is included in the bid This is not included in the bid

Precise specifications to be delineated at pre-work meeting with DNR staff

Total Merchantable Residual BA (Basal Area) - Stand 35 : 90 (Minimum 80 to Maximum 100)

TREATMENT		NUMBER	SIZE
Regeneration Gaps Per Acre			
Girdled Trees Per Acre			
PRODUCT	MARKING SYMBOL	MINIMUM DBH	TOP DIB
Sawlogs			
Sawbolts			
Pulpwood			

TYPE OF WORK	WORK TO BE DONE	NOT APPLICABLE	PAINT COLOR
Trees marked to leave – Stand 22	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/> Green <input type="checkbox"/> Other
Trees marked to cut – Stand 35	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/> Orange <input type="checkbox"/> Other

TALLY INTENSITIES	
SPECIES / PRODUCT	RATIO
	1 :
	1 :
	1 :
	1 :

SPECIAL MARKING INSTRUCTIONS

Stand 22 - Mark at least 1 wildlife den tree and/or well crowned red oak mast tree per acre. See also Appendix C.

Stand 35 - Cut all aspen, jack pine and red maple via specification. Leave all red and white pine. Mark lower quality red and white oaks to cut removing approximately 20 SF/acre of oak. Target residual basal area is 90 SF/acre or red/white oaks and red/white pine.

Unless otherwise specified, the tally sheets used must be those provided by the Forest, Mineral and Fire Management Unit.

RESTRICTIONS

1. Forest, Mineral and Fire Management Division must to be able to identify who did what on the timber sale.
2. The contractor may not have more than two markers in one payment unit without prior approval.
3. Each marker should have an assigned area to mark (not strips).

PAINT

1. Call Dale Ekdorn at (989) 275 - 4622, to make arrangements for paint.
2. Paint will be supplied from Roscommon Field Office.
3. Contractor's work schedule must coincide with the DNR work schedule for paint supply.
4. The DNR will not be available on weekends or evenings.

DELIVERABLES

1. A list of names that marked or cruised each payment unit.
2. A summary of paint used (in quarts).
3. Tally summaries for each payment unit (one summary, regardless of the number of markers) and all of the original tally sheets.
4. GPS files for any GPS work.

ROSCOMMON MANAGEMENT UNIT
MARKING BOUNDARIES AND AREA

1. The attached type map delineates the contract marking area.
2. Marking must be done in dry weather and when tree surfaces are not wet.
3. Paint the boundary line in such a way that it can be seen both from the inside of the sale area and when walking along the line from either direction (two sides).
4. The Roscommon Management Unit does not contract the marking of private lines on any of our timber sales. Management Unit personnel will mark private lines with blue paint and the contractor will mark remaining stand(s) with red paint so as to obtain complete closure of all stands designated for cutting.
5. If sale is to be divided into cutting units, line location will be as shown on attached map of sale. Cutting lines will be marked with yellow paint on four sides of trees.
6. Place Marks approximately six feet above the base of the tree.
7. The contractor will keep track of total quarts of paint used per-sale by color.
8. Contractor must use GPS to determine acreage.
9. Position Mode must be set so that GPS receiver collects data from a minimum of four satellites and 3D.
10. GPS receiver must log PDOP, SNR, number of satellites, and mode of collection (Manual/GPS).
11. PDOP mask must not exceed 7. This can be modified if approved by the Unit Manager.
12. GPS data must be differentially correct and provided in either ESRI .SHP or Trimble .COR format. Files will contain PDOP(HDOP at the discretion of the Unit Manager), SNR, number of satellites, and mode of collection (Manual/GPS) for each point collected. In addition, supply a disk of traverse file along with hard copy of the corrected traverse file.

ROSCOMMON MANAGEMENT UNIT
TIMBER CRUISING SPECIFICATIONS

1. Cruise at a rate specified in the Timber Sale Preparation Prescription.
2. Use a 10-factor prism for all plots. Plots shall be evenly distributed throughout sale area.
3. Use the product standards to determine products and heights of products. See appendix D of product summary in the "The Compleat Marker: A Guide to Managing Northern Hardwoods on Michigan State Forests".
4. Mark location of plots on the map, using the plot number.
5. Unless otherwise agreed to by the contract administrator and the contractor, plot center will be marked by a stake or stick firmly inserted in the ground (not snow) with ribbon attached to it at a height of not less than two feet above the ground, and labeled with the plot number. In addition, ribbon at least 12 inches long must be attached to a tree closest to plot center.
6. All cruise sheets must have compartment number, stand number, unit number, prism factor, date, individual tree species, and the cruiser's name.
7. A copy of the POSALE program will be provided to the successful bidder for cruise data entry. Original cruise sheets and a disk containing the cruise data exported from POSALE must be delivered upon the completion of the sale. **Note: At the cruise data entry screen in POSALE, when prompted to enter the stand acres, enter your actual GPS acres for that stand—NOT the contract's estimated inventory-based acreage.**

ROSCOMMON MANAGEMENT UNIT
LEAVE TREE MARKING SPECIFICATIONS

1. Leave Trees must be marked at breast height and also stump marked with green paint.
2. Paint on leave trees must be able to be seen from all sides of the tree.
3. Den trees and good mast trees, if found, must be marked to leave for wildlife.