



## TIMBER SALE PRESCRIPTION

### GENERAL

Date 4/11/08	Forest, Mineral and Fire Management Unit Traverse City
Timber Sale Number (if applicable) 61-037-08-01	Sale Name (or prescription name) Compartment 3 RPP

### LOCAL CONTACT

Name Tim Webb	Telephone (231) 922 -5280 ext. 6841
Email Address webbtl@michigan.gov	FAX (231) 922 - 1853

### LEGAL DESCRIPTION

T28N R14W Section(s) 36 Description N1/2NW, SWNW  
 Year of Entry: 2002 Compartment(s):003 Stand Number(s): 3 & 58

### THIS TIMBER SALE CONTRACT IS BASED ON THE FOLLOWING ACREAGE

Estimated Acres: 68 Source:  OI  GPS  Other GIS  
**Payment will be made on the basis of these estimated acres.**

### TREATMENT & OBJECTIVE

STAND #	COVER TYPE	ACRES	BA	TREATMENT	MANAGEMENT OBJECTIVE
3	R6	25	140	Final harvest	Red pine
3	R6	4	140	Thin	Red pine
58	J6	39	110	Final harvest	Red pine

### PRESCRIPTION

- Stand 3 – Final harvest. Except in Unit 1 (approximately 4 acres adjacent to Beeman Road) mark-to-cut using orange paint every third red pine tree.
- Stand 58 – Final harvest

**Access** From Empire go east on M-72 to Plowman Road, turn south. Go one mile to section 36 at the intersection of Beeman Road.

DNR PREPARATION WORK TO BE DONE PRIOR TO CONTRACT WORK	ESTIMATED DATE
Private Boundary	5/1/2008

**CONTRACT WORK CAN BEGIN**  
 Immediately  Date:  
**CONTRACT WORK MUST BE COMPLETED BY** Date: December 15, 2008

**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	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/> Yellow	<input type="checkbox"/> Other:
Retention	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/> Green	<input type="checkbox"/> Other:

**Exclusions to mark and why: See attached map.**

Areas indicated on the map with an "X" are to be excluded for retention and visual management.

**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
Sale	<input checked="" type="checkbox"/> GPS <input type="checkbox"/> String Chain <input type="checkbox"/> Other	
Payment Unit	<input checked="" type="checkbox"/> GPS <input type="checkbox"/> String Chain <input type="checkbox"/> Other	
Retention	<input type="checkbox"/> GPS <input type="checkbox"/> String Chain <input type="checkbox"/> Other	

**Special Instructions:** GPS files must provide acreage for the total sale area and for each payment unit. Unit lines must be recorded as line features.

See 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**    N/S

CRUISING UNITS	NUMBER OF PLOTS PER ACRE	SPACING (CHAINS)
Stand 3	0.8	3 x 3.9
Stand 58	0.8	3 x 3.9
		X
		X
<b>TOTAL NUMBER OF CRUISE POINTS</b>	58	

**Cruise Special Instructions:** Cruise all species separately. Separate cruise data by stand except for stand 3: cruise Unit 1 separate from the rest of stand 3. Enter cruise data into POSALE by stand, except enter Unit 1 data separately as stand 701 and adjust acreage accordingly.

FMFM Product Standards will be used as the cruising standards.

See APPENDIX B for other information.

**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): \_\_\_\_\_ (Minimum \_\_\_\_\_ to Maximum \_\_\_\_\_)

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	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/> Green <input type="checkbox"/> Other
Trees marked to cut	<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**

In Unit 1 (approximately 4 acres which is adjacent to Beeman Road) mark-to-cut using orange paint every third red pine tree.

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 Tim Webb at (231) 922 -5280, to make arrangements for paint.
2. Paint will be supplied from DNR Traverse City 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. All of the original cruise sheets.
4. GPS files for any GPS work.

TRAVERSE CITY 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). Each boundary line tree must be stump-marked at the base of the stump (one side) between the roots extending all the way to the ground.
4. 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.
5. Place Marks approximately six feet above the base of the tree.
6. The contractor will keep track of total quarts of paint used per-sale by color.
7. Contractor must use GPS to determine acreage.
8. Position Mode must be set so that GPS receiver collects data from a minimum of four satellites and 3D.
9. GPS receiver must log PDOP, SNR, number of satellites, and mode of collection (Manual/GPS).
10. PDOP mask must not exceed 7. SNR setting must be greater than or equal to 4. This can be modified if approved by the Unit Manager.
11. 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.
12. Sale boundaries are to be recorded as an area feature, not a line. Isolated stands must each be recorded as separate area features.
13. Payment Unit line must be recorded as a line feature bisecting the sale.

TRAVERSE CITY 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. Record residual BA of trees where applicable. Record any mark-to-girdle trees separately. Do not count mark-to-girdle trees toward the specified residual BA target.
5. Mark location of plots on the map, using the plot number.
6. 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.
7. All cruise sheets must have compartment number, stand number, unit number, prism factor, date, individual tree species, and the cruiser's name.
8. 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.**

TRAVERSE CITY 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.