

CADILLAC FOREST MANAGEMENT UNIT**COMPARTMENT REVIEW PRESENTATION****COMPARTMENT # 011 ENTRY YEAR: 2009****Compartment Acreage (GIS Acres): 902 County: Lake**

Revision Date: 09/27/2007 4:04 PM**Stand Examiner:** Rick-James Hill**Legal Description:** T19N R12W Sections 10 and 15**RMU (if applicable): 310****Management Goals:** Recreation

Soil and Topography: The soils of this compartment are predominately graycalm sands. This area is flat having characteristics of glacial outwash.

Ownership Patterns, Development, and Land Use in and Around the Compartment: State land to the west Private land adjoins the other 3 sides of the compartment.

Unique, Natural Features (include only non-site specific and non-sensitive information: Loon to the e on Ahmikwam Lake and to the nw. Numerous massasauga records to the w. Great blue heron rookeries to the se and sw. Bald eagle to the nw and ne. Wood turtle to the w. Potential for great blue heron rookery, wood turtle, osprey, eagle, goshawk, red-shouldered hawk, massasauga, box turtle and Blanding's turtle. Potential for ebony boghaunter and secretive locust in bogs.

Archeological, Historical, and Cultural Features (include only non-site specific and non-sensitive information): none

Special Management Designations or Considerations: High recreation use including a campground, ORV trails, and snowmobile trails within the compartment merits consideration for utilizing Visual management techniques.

Watershed and Fisheries Considerations:

Wildlife Habitat Considerations:

Priority wildlife species deer, bear and turkey. This is the only compartment in this RMU. Agreements called for no change in habitat types. Most of the compartment is poor quality oak converting to white pine. The Manistee River corridor is heavily used as deer yarding area and wildlife travel corridor especially by bears. Management objective is to maintain the diversity of the cover types and age classes. (L. Smith, 9/24/07)

Mineral Resource and Development Concerns and/or Restrictions: Sections 10 & 15, T19N-R12W, Lake Co. Surface sediments consist of glacial outwash sand and gravel and postglacial alluvium. The glacial drift thickness varies between 400 and 600 feet. Beneath the glacial drift is the Mississippian Michigan Formation. The Michigan is quarried for gypsum in other areas of the State. A gravel pit is located in Section 23 and there may be potential. The nearest oil and gas production is the one well abandoned Luther Field located in Section 14. The Field produced over 28,000 BO from the Traverse Limestone. The compartment is not currently leased for oil and gas exploration.

Vehicle Access: A forest road access plan is detailed on the compartment map. Identified are state and county roads as well as forest roads and trails under the jurisdiction of the DNR. Also indicated are forest roads and trails under the jurisdiction of the DNR that are proposed for abandonment. These roads were determined to be in excess of the access needs in the area, are a threat to the resources, or are a concern environmentally.

Proposed new roads or roads recommended for substantial improvement are noted below: none

Survey Needs: none

Recreational Facilities and Opportunities: This compartment contains the Carrieville campground. The little Manistee Lincoln hills ORV route and single track run through this compartment. The ORV route is groomed in the winter as a snowmobile trail. There are also excellent opportunities to trout fish in this compartment on the little Manistee River. Opportunities for hunting and trapping are also present in this compartment.

Fire Protection: IA for this compartment would be from the Baldwin Field Office. There are some pine areas, which could be of concern. There are urban interface areas, and also high recreational use within the compartment, which could lead to a increased fire potential. Access for equipment would be fairly good, with the exception of the Little Manistee River area & the tributaries.

Additional Compartment Information: none

The following parcels are recommended for acquisition if they become available for sale:

- **The following 5 reports from the Operations Inventory System (OIPC) are attached:**
 - ◆ **Cover Type by Age Class**
 - ◆ **Cover Type by Management Objective**
 - ◆ **Compartment Volume Summary**
 - ◆ **Proposed Treatments – No Limiting Factors**
 - ◆ **Proposed Treatments – With Limiting Factors**

- **The following information is displayed, where pertinent, on the attached compartment maps:**
 - ◆ **Base feature information, stand numbers, cover types**
 - ◆ **Proposed treatments**
 - ◆ **Proposed road access system**
 - ◆ **Suggested potential old growth**

9/27/2007 10:40:31 AM

Michigan Department of Natural Resources - Operations Inventory System
Individual Compartment Report

PERE MARQUETTE STATE FOREST

CADILLAC MGT UNIT

LAKE COUNTY

COMPARTMENT: 11

Table 3A

(acres shown in boxes)

MANAGEMENT OBJECTIVE TYPE

COVER TYPE	A	S	V	C	G	H	J	I	L	P	N	Q	X	O	B	R	K	Y	F	E	T	D	U	M	Z	W	Total
A Aspen	118																										118
V Bog or Marsh			27																								27
G Grass					14																						14
Q Mx Swmp Cnfr												2															2
X Non Stocked													11														11
O Oak														357												9	366
R Red Pine																97											97
E Swamp Hrdwds																				39							39
U Upland Brush							8																18				26
W White Pine																										202	202
Total	118		27		14		8					2	11	357		97				39				18		211	902

PERE MARQUETTE STATE FOREST

CADILLAC MGT UNIT

LAKE COUNTY

COMPARTMENT: 11

Table 10 - COMPARTMENT VOLUME SUMMARY - ALL STANDS

COMPARTMENT SUMMARY			
TOTAL VOLUME		CUT VOLUME	
Hardwood	2724 Cds	Hardwood	485 Cds
Hardwood	1671 Mbf	Hardwood	345 Mbf
Softwood	4780 Cds	Softwood	2136 Cds
Softwood	1240 Mbf	Softwood	243 Mbf
Sum TotVol	13326 Cds	Sum CutVol	3797 Cds
Total Cmpt Acres		Acres Proposed For Cut.....	291
902			

CADILLAC MGT UNIT

**Proposed Treatments
With NO Limiting Factors**

Compartment: 11

Entry Year: 2009

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDf Status
1	R6	36	51	60	red pine	immature	thinning	1		
comnts Fmd : Thin 1/3 of this stand by marking or row thin. Retention will be included in the 2/3rds residual as single trees.										
2	O6	8	84	50	oak	mature	seed tree	1	natural regeneration	
comnts Fmd : o8o6 an aspen once in a while, this stand has some mortality clearcut and scarafy, leave a few oaks (5-10sf) for seed and visuals. Retention will be included in the 5-10sf residual as single trees. Acceptable regen includes Mixed Oak Red Maple, and aspen. If regen fails plant jack pine in a weave.										
3	W4	23	48	60	white pine	mature		0	pruning	
comnts Fmd : This is a white pine stand that was released 20 years ago its growing vary slowly.										
5	W6	6	48	60	white pine	immature	thinning	1	pruning	
comnts Fmd : There is an overstory of oak and red maple so release the white pine and get some oak sprouting. Do not cut white pine under 70 SF if possible.										
7	O6	1	84	55	oak	mature	final harvest	1	natural regeneration	
comnts Fmd : Clearcut this stand as there is mortality and the strip on old 63 worked well. Due to size include with stand 2. clearcut and scarafy, leave a few oaks (5-10sf) for seed and visuals. Retention will be included in the 5-10sf residual as single trees. Acceptable regen includes Mixed Oak Red Maple, and aspen. If regen fails plant jack pine in a weave.										
9	W6	28	48	55	white pine	immature	thinning	1	pruning	
comnts Fmd : A white pine stand with some overstory oak. This stand should have the overstory removed to release the white pine do not cut the pine any lower then 70 SF if possible. Leave an oak one in a while to help species diversity. Retention will be included in the white pine residual and the oak being left.										
11	W6	28	48	60	white pine	immature	thinning	3	pruning	
comnts Fmd : White pine stand was released in 1989 thin 40 to 50 SF out of the stand by marking because of indistinct rows. Retention will be included in the white pine residual.										
12	O6	9	48	60	white pine	immature	final harvest	1	planting	
comnts Fmd : The white pine was planted in 1959 and has been supresed for 50 years I do not believe it will grow after relese, plant to red pine after clearcut. No retention due to site conversion and planting.										
13	O9	10	82	55	oak	mature	final harvest	1	natural regeneration	
comnts Fmd : Clearcut this stand herbicide post harvest to control pen sedge . Acceptable regen includes Mixed Oak, Aspen and Red maple. If regen fails plant jack pine.										
19	O9	4	82	55	oak	mature	shelterwood-seed	1		
comnts Fmd : Stand is heavy to white oak. I would like to try a heavy shelterwood cut to 40 sf residual. Also I would like to see post harvest scarafication by trenching. If regen fails in ten years do not remove the overstory, leave it for mast. Acceptable regen includes Red Maple, Aspen, Mixed Oak, and White Oak. Retention will be included in the 40 SF left for seed. The retention will be a mix of the species present in this stand										
21	R6	8	49	60	red pine	immature	thinning	1		
comnts Fmd : Thin this stand by 1/3, by row thin or marked thin. Also remove competing hardwoods. Retention will be included in the 2/3rds residual as single trees. The retention will be a mix of the species present in this stand.										
27	R6	7	49	60	red pine	immature	thinning	1		
comnts Fmd : When we cut manage to compliment campground-individual tree selection. thin to enhance natural look around campground winter cut with orange maked for removal.										
31	R9	43	48	60	red pine	immature	thinning	1		
comnts Fmd : Red pine plantation, trail system runs thru stand. Thin this stand by 1/3rd by marking or row at the forester's discretion. Retention will be included in the 2/3rds residual as single trees. The retention will be a mix of the species present in this stand.										
32	O9	3	82	59	oak	mature	shelterwood-seed	1	natural regeneration	
comnts Fmd : Due to the large amount of white oak in this stand I would like to try a heavy shelterwood that leaves a residual of 40 sf. With scarfy with trenching to follow the harvest. Acceptable regen is Red Maple, Mixed Oak, and white oak if regen doesn't occur leave the residual for mast. Retention will be included in the 40 SF left for seed. The retention will be a mix of the species present in this stand.										
34	O6	16	87	55	oak	mature	final harvest	1	natural regeneration	
comnts Fmd : Clearcut this stand, there should be enough aspen and red maple to insure some regen. Acceptable regen includes Red maple Aspen and mixed oak. If regen fails after 10 years plant jack pine. Retention will be 3 to 10 percent of the area of the stand to be left around the ORV trails.										

CADILLAC MGT UNIT

**Proposed Treatments
With NO Limiting Factors**

Compartment: 11

Entry Year: 2009

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDF Status
37	W6	64	54	60	white pine	immature	thinning	3	pruning	
comnts Fmd : This stand should be thined this year of entry with a removal 50 sf of white pine pulp. Retention will be included in the white pine residual. The retention will be a mix of the species present in this stand.										
40	W6	14	48	60	white pine	immature	final harvest	1	planting	
comnts Fmd : This is old planted white pine that has been over topped for 50 years I do not belive it will grow if released. I would like to see it clearcut and replanted to red pine. No residual due to site conversion and planting.										
42	R9	3	49	60	red pine	immature	thinning	1		
comnts Fmd : This stand should be thined by 1/3 by row or marked thin. Retention will be included in the 2/3rds residual as single trees. The retention will be a mix of the species present in this stand										
43	W6	3	49	60	white pine	immature	thinning	1	pruning	
comnts Fmd : Release this stand, Retention will be included in the white pine residual.										
116	U2	1	6	55	jack pine	mature		0	planting	
comnts Fmd : coming back to black cherry plant to jack pine.										
117	U2	7	6	55	jack pine	mature		0	planting	
comnts Fmd : coming back to black chery plant jack pine.										

Total Acres..... 322

CADILLAC MGT UNIT

**Proposed Treatments
With Limiting Factors**

Compartment: 11

Entry Year: 2009

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDI Status
25	O8	46	82	50	oak	immature		0	natural regeneration	

TREATMENT LIMITING FACTORS: Retention of stand for regeneration purposes (ie. shelterwood)





comnts Fmd : STAND TREATED IN 2001 DIAM. CUT SALE # 429901, stand has low stocking of scrub oak with a mix of aspen, white pine, red maple and oak coming back this stand could be burned to help the oak regen if this occurs areas of good aspen regen shuld be protected. Aspen near the little manistee river have been getting eaten by beaver.

Total Acres..... 46

Field Map

Compartment 11
 T19N, R12W, Sec. 10, 15
 County: Lake
 Unit: Cadillac
 YOE: 2009
 Acres: 902 GIS Calculated
 Stand Examiner: Rick-James Hill
 Map Revised: 8/24/2007
 Map Phase: Pre-review

Legend

-  Miris Corners
-  Paved Roads
-  Gravel Roads
-  Poor Dirt Roads
-  Trails
-  Water Features
-  ORV Trails
-  Campground
-  Stand Boundaries
-  018 - Planting/Other
-  047 - Natural Regeneration/Prescribed Burning
-  081 - Pruning/Hand Tools
-  100 - Final Harvest
-  116 - Final Harvest/Planting
-  145 - Planting/Natural Regeneration/Mechanical, other
-  300 - Shelterwood - seed
-  345 - Shelterwood - seed/Natural Regeneration/Mechanical, other
-  400 - Thinning
-  481 - Thinning/Pruning/Hand Tools

