



**GRAYLING FOREST MANAGEMENT UNIT
COMPARTMENT REVIEW PRESENTATION**

COMPARTMENT # 198 ENTRY YEAR: 2007

GIS Compartment Acreage: 1454 County: Crawford

Revision Date: 9-8-2005

Stand Examiner: Jason Lewicki

Legal Description: T25N R4W Sections 10,11,and 12

RMU (if applicable): N/A

Management Goals: To maintain forest health, productivity, sustainability, species diversification, and structural diversity throughout the compartment while providing for multiple use, visual management, and military training needs as allowed by the twenty year management agreement.

Soil and Topography: Soils and topography vary greatly across the compartment. There is some steep terrain in the north west of section 10. While other areas maintain relatively flat. Soils and site productivity also vary greatly from Klacking sands growing excellent hardwoods in the west to Grayling sands growing poor quality low site index pin oak in the east.

Ownership Patterns, Development, and Land Use in and Around the Compartment: Each section contains fairly large tracks of private property with multiple owners. Entire area was classified as development for oil and gas in past, no development occurred as of 1997. Section 10 is under the ten year management agreement with the Michigan National Guard. This agreement allows for camping and maneuvers but does not allow use of heavy equipment or high intensity live ammunition firing. Tracked vehicles are prohibited on these lands except to cross designated tank trails. Wheeled vehicles restricted to existing trails and are not to be driven cross country. MDNR management activities take precedence on these lands, though we try to tailor management activities so they are compatible with National Guard training needs.

Unique, Natural Features : None

Archeological, Historical, and Cultural Features: An old stone foundation is found in section 11 stand 136. Former twp landfill located in western portion of std 406.

Special Management Designations or Considerations: Military Board Land.

Watershed and Fisheries Considerations: None

Wildlife Habitat Considerations: This compartment contains many opportunities to create maintained wildlife openings. Many “G” or “U” types throughout this compartment could easily be used for this purpose.

Mineral Resource and Development Concerns and/or Restrictions: Old gas well and pipelines in section 10(stand 412). Surface sediments consist of ice-contact and glacial outwash sand and gravel and postglacial alluvium. The glacial drift thickness varies between 400 and 600 feet. Beneath the glacial drift is the Michigan Formation. The Michigan is quarried for gypsum elsewhere in the State. A gravel pit is located in Section 9 and potential is good on the upland areas. The compartment is leased for oil and gas and is part of the Military area. The Compartment is located to the east of Beaver Creek Field. The field has produced over 21 MBO from the Devonian Richfield and over 5 Bcf gas from the Ordovician Prairie du Chien.

Vehicle Access: Vehicle access within the compartment is excellent. Military, 5 Mile and oak road are maintained throughout the year. Oak road is seasonal and a portion of it becomes the snowmobile trail in the winter. There are also numerous trail roads traversing the compartment. All new roads created through management activities are to be closed upon completion. No existing trail roads have been identified for closure.

Survey Needs: None needed at this time. Many RLS corners found.

Recreational Facilities and Opportunities: Numerous access roads, diverse cover types, and abundant numbers of deer, grouse and turkeys makes for excellent hunting opportunities. The snowmobile trail # 7 also runs through the compartment.

Fire Protection: There is a fair amount of urban interface due to the amount of private property but large wildfire potential is minimal due to mainly hardwood cover types. Response time to this area would be fairly long due to it’s distance from the Grayling Field Office. There is excellent equipment access due to abundant county roads and trails. A fire hydrant is located in the NW corner of section 12 along the south side of 5-mile road. There are no natural water points within the compartment.

Additional Compartment Information:

LOTS Compartment Acreage:_____

- **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**

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

AUSABLE STATE FOREST

GRAYLING FOREST MGT UNIT

CRAWFORD COUNTY

COMPARTMENT: 198

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	634													14													648
G Grass					51																						51
J Jack Pine							15																				15
O Oak														296													296
R Red Pine																191											191
U Upland Brush																								24			24
M Upland Hdws	18																							204			222
W White Pine																										7	7
Total	652				51		15							310		191							24	204		7	1454

AUSABLE STATE FOREST

GRAYLING FOREST MGT UNIT

CRAWFORD COUNTY

COMPARTMENT: **198**

Table 10 - COMPARTMENT VOLUME SUMMARY - ALL STANDS

COMPARTMENT SUMMARY			
TOTAL VOLUME		CUT VOLUME	
Hardwood	11499 Cds	Hardwood	1507 Cds
Hardwood	1223 Mbf	Hardwood	154 Mbf
Softwood	2716 Cds	Softwood	1106 Cds
Softwood	1286 Mbf	Softwood	65 Mbf
Sum TotVol	19233 Cds	Sum CutVol	3051 Cds
Total Cmpt Acres		Acres Proposed For Cut.....	286
1454			

GRAYLING FOREST MGT UNIT

**Proposed Treatments
With NO Limiting Factors**

Compartment: 198 **Entry Year: 2007**

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDF Status
10	M6	61	85	63	northern hardwood	immature	selection	1		
comnts Fmd : Small diameter even aged hard maple stand. A few red oaks and aspen present. Crop tree thin. Girdle any aspen and beech.										
15	R6	25	51	65	red pine	mature	thinning	1		
comnts Fmd : Nice red pine stand thinned in 1990. Will be a marked "free" thinning, not row.										
19	O9	7	100	58	oak	mature	final harvest	1		
comnts Fmd : Old large diameter pin oak mixed with a few red maple and rotten aspen. Heavy red maple understory. Stand will probably regenerate to red maple with a few aspen clones. Will accept a mixed species regeneration.										
27	R9	13	50	65	red pine	mature	thinning	1		
comnts Fmd : 3-rd row thinned around 1990. Will be a marked "free" thinning.										
35	R6	45	50	64	red pine	mature	thinning	1		
comnts Fmd : Thin down to 100-110 BA. Contract marking??? Will be a marked "free" thinning.										
39	O6	5	73	64	oak	mature	shelterwood-seed	1		
comnts Fmd : Decent quality red oak. Small acreage, treat with stand 58. Remove all red maple and a few oaks. Protect white pine understory. Will accept mixed species regeneration of maple, oak and white pine.										
42	O9	8	80	55	oak	mature	shelterwood-seed	1		
comnts Fmd : Good red oak stand with white pine in understory. Remove red maple and a few oaks to release white pine and oak regen. Will accept a mix of species regeneration(oak,maple and white pine).										
48	O8	8	92	58	oak	mature	final harvest	1		
comnts Fmd : Lower quality red/white oak stand. Little red maple competition. Some decent oak regen. Do not cut white pine. If stand does not regenerate to fully stocked stand, consider hand planting wide spaced red pine. Will accept a mix of species regeneration.										
58	O9	28	73	64	oak	mature	shelterwood-seed	1		
comnts Fmd : 50-80 BA of nice red oak logs. Good white pine regen present throughout the stand. Remove all red maple and some oak in thicker areas. Shortwood to protect whitepine. Leave about 30-50 BA of oak. Consider girdleing some aspen within the stand to create standing snags(stand lacks dead verticle structure)??? Will accept a mix of species of oak, maple and white pine regeneration.										
104	A6	15	90	48	aspen (upland)	mature	final harvest	1		
comnts Fmd : Pocket of BTA seperated from old stand 4 to create another age class of aspen within the compt.										
127	R9	20	50	65	red pine	mature	thinning	1		
comnts Fmd : 3-rd row thinned around 1990. Stand will be a marked "free" thinning.										
131	R9	3	85	64	red pine	mature	shelterwood-seed	1		
comnts Fmd : M2/W2 understory a few oak. Natural red, white pine stand with scattered oak maple and hemlock, Remove some overstory to create canopy gaps for white pine, hemlock and oak regen. Will accept a mix of species regeneration.										
144	O9	4	51	60	oak	mature	final harvest	1		
comnts Fmd : Low quality mixed oak, fair amount of mortality. Large oak and aspen have very visable fire scars probably caused most of the mortality. Stand will probably regenerate to a mix of red maple and aspen possibly a few oak. Manage for maple and aspen if not fully stocked with oak.										
146	A6	19	47	65	aspen (upland)	mature	final harvest	1		
comnts Fmd : Stand snakes through oak stand. Some areas heavier to oak than aspen. Areas of good white pine regeneration. Scattered large red and white pine. Final harvest, for aspen sustainability. Leave all white pine regeneration and some large red and white pine as super canopy trees. Do not contract.										
406	G0	16		70	grass	nonstocked		0	opening maintenance	
comnts Fmd : W 1/2 OF STD CONTAINED OLD TWP LANDFILL, SI FROM STD 7, CONTAINS SCATTERED JPINE AND PIN CHERRY a few aspen clones. Wildlife will remove some invadeing trees via manual treatment. Maintain opening as needed via mowing and fertilization.										
412	G0	2		58	grass	nonstocked		0	opening maintenance	
comnts Fmd : ABANDONED WELLSITE, NOW GRASSY AREA. Maintain opening as needed via mowing and fertilization.										

GRAYLING FOREST MGT UNIT

**Proposed Treatments
With NO Limiting Factors**

Compartment: 198 **Entry Year: 2007**

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDf Status
438	G0	6		56	grass	nonstocked		0	opening maintenance	

comnts Fmd : Grass with some encraoching hardwoods and scotch pine. Parts of old foundation on north end. Some scattered maples throughout. Wildlife will remove invading trees via manual treatment. Maintain opening as needed via mowing and fretilization.

Total Acres..... 285

GRAYLING FOREST MGT UNIT

**Proposed Treatments
With Limiting Factors**

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Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDF Status
37	M6	22	70	73	northern hardwood	mature	selection	1		

TREATMENT LIMITING FACTORS: Delayed treatment for age/size class diversity

comnts Fmd : Some areas of good hardwood pulp approaching log size. Scattered clumps of hemlock. Some advanced regen, most is beech, protect. Crop tree thin. Protect all hemlock and avoid marking near hemlock regeneration.

149	O6	3	73	58	oak	mature	shelterwood-seed	1		
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TREATMENT LIMITING FACTORS: Inadequate volume due to low stocking/small diameter/etc.

comnts Fmd : Medium site red oak.. Good white pine understory. Some red ample and white oak in understory. Do heavy shelterwood to promote white pine and oak regen. 30BA residual.

Total Acres..... 25

