



**NEWBERRY FOREST MANAGEMENT UNIT
COMPARTMENT REVIEW PRESENTATION**

COMPARTMENT # 92 ENTRY YEAR: 2009

Compartment Acreage: 2805 County: Luce

Revision Date: 9/21/07

Stand Examiner: Jason Tokar

Legal Description: T47N R11W Sections 17, 20, 22, 27, 30, 32, 33 &34

RMU (if applicable):

Management Goals: Timber management, wildlife habitat, recreation and limited fisheries are the main uses of the area. The overriding goal is to maintain or improve the forest health, productivity and diversity of the area to promote and enhance these uses. Treatments prescribed will help ensure the sustainability of the forest resource and continue to enhance the quality of the wildlife habitat. Timber management (aspen, northern hardwoods, red pine) will continue with the current sustainable level of management, promoting an array of both age class and structural diversity in the cover types.

Soil and Topography: The dominant soil type of the compartment is Kalkaska sand, an outwash sand, found throughout the compartment. There are isolated pockets of Wallace sand that occur. Cover types are overwhelmingly upland aspen and natural white pine, along with lesser amounts of red pine (planted), northern hardwoods and jack pine. Several large opening complexes are also present. The topography of the compartment is level to rolling. Steeper slopes occur around numerous small pothole lakes in the compartment.

Ownership Patterns, Development, and Land Use in and Around the Compartment: The compartment is one large contiguous block of State land with only one 80 private parcel within the boundary. State land borders the compartment to the north and east. The Forestland Group borders the compartment to the west. Several small private land owners along with The Forestland Group border the compartment to the northwest. Adjacent ownership to the south is a combination of State land and The Forestland Group. Development in and around the compartment is low due to the large amount of State land and Forestland Group land in the vicinity. Several small camps and one permanent residence are located adjacent to and within the compartment. The main types of land use are hunting, ORV and snowmobile riding, and dog sledding.

Unique, Natural Features (include only non-site specific and non-sensitive information): MNFI doesn't list any occurrences within the compartment. Potential is there for a variety of flora and fauna including red shouldered hawk, eagle, osprey, moose and wolf.

Archeological, Historical, and Cultural Features (include only non-site specific and non-sensitive information): The Bureau of History does not list any historical features within the compartment. One old homestead was found. Routed DNR sign on site which reads; "Peterson Homestead, Farmed 1917-1925, Acquired by State of Michigan 1931". Contact will be made with the Bureau of History to inform them of the site.

Special Management Designations or Considerations: None designated. BMP guidelines will be followed with any timber management adjacent to or near water sources.

Watershed and Fisheries Considerations: Fisheries Values

Good. Bass Lake is a multi-species lake managed by Fisheries Division. Although it was stocked in the past with various species of trout, it is now stocked only with walleyes. The lake offers anglers walleye, northern pike, smallmouth bass, yellow perch, and rock bass. Peanut Lake was an excellent brook trout lake until the late 1990s. At that time, it became inundated with yellow perch and largemouth bass, to the detriment of trout. We tried to reclaim it with rotenone, but within a couple of years it again was loaded with perch and bass. Our 2007 netting survey captured perch and bass, with not enough trout to continue the management. At this time, Fisheries Division has discontinued active management at Peanut Lake. It will probably remain acceptable to anglers for perch and bass. Wolverine Lake is an annually-stocked rainbow trout lake. However, recent residential building practices caused habitat damage to a portion of the shoreline. In addition, the continuing drought has lowered the lake level to 6-8 ft below the long-term normal. Even so, it is still providing trout for anglers. Young Lake is a small brook trout lake, stocked annually. Water level is currently quite low, but angling success is good.

Wildlife Habitat Considerations: Compartment 92 lies in central Luce county in the Grand Marais Sandy End Moraine and Outwash ecological sub-subsection. The compartment is a mix of aspen and white pine with northern hardwoods and grass openings scattered throughout. Species diversity of all stand types is good. Pre-settlement vegetation patterns of the subsection appear to be consistent with the current landscape.

Wildlife objectives will be achieved by the retention of hard and soft mast producing trees, wildlife den and nest trees and snags in harvested stands and the preservation of conifer components in aspen and hardwood stands. Many stands will retain large white pine as a component. Soft mast (cherry) is abundant in the compartment and will be retained in harvested stands. Wildlife species expected to use this compartment include ruffed grouse, woodcock, white-tailed deer, black bear, fisher, marten, coyotes, gray wolves and fox.

Mineral Resource and Development Concerns and/or Restrictions: Sections 22, 27 & 32 - 34, T47N-R11W, Luce County

Surface sediments consist of an end moraine of coarse-textured till, glacial outwash sand and gravel and postglacial alluvium. There is insufficient data to determine the glacial drift thickness. The Ordovician Collingwood and Utica Shales subcrop below the glacial drift. These rocks do not have a current economic use. There are no gravel pits in the area, but there should be some potential. There is no economic oil and gas production in the UP.

Vehicle Access: The compartment is located 5 miles north of McMillan. There is substantial vehicle access to the compartment. County Road 455 runs east and west through the center of the compartment while County Road 415 runs north and south through the entire compartment. A network of woods roads, including Silver Creek Road (maintained) and Wolverine Lake Road, transects the area providing additional access to all parts of the compartment.

Survey Needs: For management activities to occur, the following corners need to be set: Various corners in the NW1/2 of Section 32; and SE1/16, NE1/16 of Section 33. The Section corner common to Sections 27, 28, 33 and 34 should be verified (private post) and verification of the existence of the NW1/16 of Section 22.

Recreational Facilities and Opportunities: Recreational facilities include the Snowmobile Trail and the Silver Creek ORV Trail, and boating access sites on Peanut Lake, Young Lake, and Bass Lake. Wolverine Lake also has an unofficial/un-maintained access site. A few miles of dog sled training route transect the compartment. Other recreational opportunities include hunting, fishing, hiking and wildlife viewing. Numerous hunting camps are located in and adjacent to the compartment.

Fire Protection: Potential for large fire runs is fair. Eastern portion contains some contiguous pine types. Much of the remaining area is broken up by hardwood types and grassy openings, creating areas for defensible fire lines. Upland ground and fair two track network could aid suppression forces in accessing remote areas. Private property risk to fire would be moderate.

Additional Compartment Information: The access sites and State land at Bass Lake and Peanut Lake were added to this compartment. Previously, these lands had not been assigned to any compartment. Bass Lake SF Campground is temporarily closed due to budget constraints.

- **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**

12/7/2007 3:37:23 PM

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

LAKE SUPERIOR STATE FOREST

NEWBERRY FOREST MGT UNIT

LUCE COUNTY

COMPARTMENT: 92

Table 3

(acres shown in boxes)

STAND AGE CLASS

COVER TYPE	Not Coded	0-9	10-19	20-29	30-39	40-49	50-59	60-69	70-79	80-89	90-99	100-109	110-119	120-129	130-139	140-149	150-159	All Aged	Total
Aspen			433	87		129	82	88	117										936
Bog or Marsh	11																		11
Grass	348																		348
Jack Pine		45					9	7											61
Lowlnd Brush	3																		3
Non Stocked	22																		22
Red Pine						163	1												164
Spruce Fir						33													33
Upland Brush	109																		109
Upland Hdwds								32										361	393
Water	11																		11
White Pine			5	41	59			26		52								531	714
Total	504	45	438	128	59	325	92	153	117	52								892	2805

12/7/2007 3:37:33 PM

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

LAKE SUPERIOR STATE FOREST

NEWBERRY FOREST MGT UNIT

LUCE COUNTY

COMPARTMENT: 92

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	936																										936	
V Bog or Marsh			11																								11	
G Grass					348																						348	
J Jack Pine							61																				61	
L Lowlnd Brush									3																		3	
X Non Stocked													22														22	
R Red Pine																164											164	
F Spruce Fir																			33								33	
U Upland Brush																									109		109	
M Upland Hdwds	32																								361		393	
Z Water																									11		11	
W White Pine																										714	714	
Total	968		11		348		61		3				22			164			33					109	361	11	714	2805

LAKE SUPERIOR STATE FOREST

NEWBERRY FOREST MGT UNIT

LUCE COUNTY

COMPARTMENT: **92**

Table 10 - COMPARTMENT VOLUME SUMMARY - ALL STANDS

COMPARTMENT SUMMARY			
TOTAL VOLUME		CUT VOLUME	
Hardwood	14588 Cds	Hardwood	5264 Cds
Hardwood	343 Mbf	Hardwood	32 Mbf
Softwood	18778 Cds	Softwood	3570 Cds
Softwood	598 Mbf	Softwood	54 Mbf
Sum TotVol	35248 Cds	Sum CutVol	9006 Cds
Total Cmpt Acres		Acres Proposed For Cut.....	
2805		455	

NEWBERRY FOREST MGT UNIT

**Proposed Treatments
With NO Limiting Factors**

Compartment: 92

Entry Year: 2009

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDF Status
5	M6	8		50	northern hardwood	unevenaged	shelterwood-prep	2		
<p>comnts Fmd : Lower quality red maple with aspen and large white pine and white spruce. Thicker balsam understory. Some good quality red maple with a lot of low quality red maple. Some dead tops and decline in some of the white pine. Aspen is showing some rot. Prescribe stand for harvest. Shelterwood w/reserves to meet retention guidelines. Residual BA of 50 sq ft, removing low quality red maple, white pine aspen and a few white spruce. Retain good quality red maple, healthy white pine and white spruce.</p> <p>Wld : leave red maple, white pine in good condition and spruce.</p>										
6	M6	29		53	northern hardwood	unevenaged	selection	1		
<p>comnts Fmd : Primarily red maple with a sugar maple component. M6 stand with M9 pockets. Best quaity is in the pole size trees (9-10 inches). Some large. Overmature trees throughout. Stand slopes to the north and east. Decrease in quality near the bogs. Good advanced regeneration in the understory. Areas with Y. Birch regeneration. Stand will be treated by single tree selection system of harvest. Residual trees should favor the best quality pole size red maple and hard maple. Release areas of advanced regeneration (gaps). Retain a component of yellow birch where present in the stand. Higher component of conifers along stand edges. Retain a component of conifers present in the stand.</p> <p>Wld : retain a component of conifers and yellow and white birch in various diameters. Protect the boggy or wet areas.</p>										
8	M6	32	60	58	aspen (upland)	mature	final harvest	1		
<p>comnts Fmd : Stand has lots of species variety. Low quality red maple, spruce, balsam, white pine, and good quality aspen. Thick F3 understory throughout most of the stand. A few scattered hemlock. Maple is showing decline and lots of rot. Site is well suited for aspen. Small 1-2 ft aspen seedlings throughout. Treat stand by clearcut with reserves harvest system. Convert the stand to aspen. Retention/stand diversity will be obtained by leave patches and also individual trees. Leave small buffers along the bog edges. Mark some large white spruce and white pine for residual. Leave all hemlock and all conifers 4 inches or less in diameter. Scattered large, unmerchantable aspen to be left.</p> <p>Wld : leave hemlock and some large spruce and white pine. Leave all small conifers less than 4 inches in diameter. Leave a cherry component of various diameters and birch. Protect bog areas with a buffer.</p>										
14	J2	38	3	47	jack pine	nonstocked		0	other - specify in remarks	
<p>comnts Fmd : Slim's Jack Pine, sale #42-027-00-01. Sale completed on 8/30/2002. FTP #42-533 completed 5/2004. Regeneration count completed 5/8/2007 = 959 trees/acre (783 A, 137 JP, 39 WP). Continue to monitor for success - JP is still < 12 inches in height. Good component of cherry regeneration (additional 293 tr/ac) present.</p>										
15	A6	15	56	55	aspen (upland)	mature	final harvest	1		
<p>comnts Fmd : Aspen stand with a good component of low quality, limby white pine. Some spruce, balsam and scattered jack pine. Stand edges have lots of limby white pine and small diameter aspen. Better quality white pine in western poriton of the stand. Good component of white pine 2-4 inches in diameter. Prescribe stand for harvest. Clearcut with reserves. Leave spruce and cherry as residual, mark white pine to cut (leave limby white pine as residual/retention). Small diameter aspen can be left along stand edges. Leave conifers 4 inches or less in diameter.</p> <p>Wld : leave spruce and cherry and large limby white pine and small 2-4" conifers</p>										
31	A6	12	54	52	aspen (upland)	mature	final harvest	2		
<p>comnts Fmd : Variable aspen stand. Pockets of mature aspen and other areas of thicker white pine with aspen. Good white pine component along the edges. Pockets of younger aspen, aminly in open areas. Decline and mortality in the aspen. Prescribe the stand for treatment. Clearcut with reserves. Retain all conifers 4 inches or less in diameter. Mark white pine to leave as residual (large, limby). Leave smaller aspen along stand edges.</p> <p>Wld : leave all conifers 4" and less in diameter and some large white pine. In addition, leave cherry in the stand.</p>										
41	A6	35	54	52	aspen (upland)	mature	final harvest	1		
<p>comnts Fmd : Aspen stand with pockets of smaller diameter aspen and areas of large diameter, mature aspen. Mature aspen throughout. Red pine and white pine throughout (thicker in pockets). Aspen showing some decline, rot and dead tops. Scattered jack pine in the southern portion of the stand. White pine is limby, pulp quality. Dead aspen and jack pine in the stand. Prescribe for treatment. Clearcut with reserves</p> <p>Wld : leave all conifers 4 " and less. Leave a cherry component and some mature red and white pine and spruce.</p>										
43	J5	7	61	60	jack pine	mature	final harvest	1	natural regeneration	
<p>comnts Fmd : Mature jack pine stand. Blowdown and wind damage. Dead trees and others with dead tops. Open areas with lower BA. Younger jack pine along the stand edges. Lots of mortality and blowdown. Scattered white pine. Stand is in need of management. Prescribe for clearcut. Small acreage stand with high number of snags. No retention.</p> <p>Wld : leave some white pine. Leave standing snags</p>										

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	fdf Status
45	R6	14	47	53	red pine	immature	thinning	1		
comnts Fmd : Red pine stand planted in 1960. Thick pockets and areas where its more open. White pine component within the stand. BA ranges from 70 up to 180. Open areas have advanced white pine in the understory. No red pine regeneration throughout most of the stand. Middle of the stand is very open with BA down to 40 sq ft. A few small pockets of jack pine. Moderate quality to the red pine, shorter heights, limby. Showing characteristics of a natural pine stand due to the variability. Prescribe stand for treatment. Shelterwood harvest. Target BA of 50 sq ft average.										
Wld : leave white pine of various age classes in the stand.										
49	R6	82	47	53	red pine	immature	shelterwood-seed	1		
comnts Fmd : Red pine stand planted in 1960. Thick pockets and areas where its more open. White pine component within the stand. BA ranges from 70 up to 180. Open areas have advanced white pine in the understory. No red pine regeneration throughout most of the stand. Middle of the stand is very open with BA down to 40 sq ft. A few small pockets of jack pine. Moderate quality to the red pine, shorter heights, limby. Showing characteristics of a natural pine stand due to the variability. Prescribe stand for treatment. Shelterwood harvest. Target BA of 50-60 sq ft average. Maintain a component of aspen and white pine within the stand. Possibly leave BA slightly higher along Co Rd 455 for visual concerns (70 sq ft within 50 ft of road).										
Wld : leave aspen and most white pine in the stand										
58	A6	59	68	59	aspen (upland)	mature	final harvest	2		
comnts Fmd : Aspen stand with a good white pine component. More white pine (short, limby) along the stand edges. Pockets of white pine throughout. Aspen is in clumps/clones. Aspen is showing signs of rot and decline. Red maple component. Scattered white birch is dying out. Southern end of the stand is very low quality aspen with dead tops. Open areas with low quality near the road. Lots of species diversity throughout. Stand is in need of harvest. Prescribe for treatment. Clearcut with reserves. Leave some large diameter, limby white pine as residual along with all white birch. Lots of small aspen, maple and conifers to be left after the harvest.										
Wld : Leave all non-white pine conifers (unless needed to remove for maneuverability) and cherry. Leave much of the large diameter white pine										
69	A6	20	56	55	aspen (upland)	low quality	final harvest	3		
comnts Fmd : Poor quality aspen throughout. Clones of nicer, taller aspen. Most of the aspen is showing dieback and dead tops. Component of balsam, spruce, white birch, cherry and white pine throughout. Aspen is mature. Prescribe for treatment. Clearcut with reserves. Retain all hemlock, and conifers 4 inches and less in diameter. Retain some spruce, balsam and limby white pine as residual as well as a few low quality aspen.										
Wld : leave a few large conifers (any species) , hemlock and small conifers (4" and less) and a cherry component.										
81	A6	33	68	59	aspen (upland)	mature	final harvest	2		
comnts Fmd : Mature aspen, showing some rot and decline. Throughout the stand the aspen is in bad shape. Edge of the stand along stand 82 has a higher component of white spruce and white pine. Fair amount of red maple in the southern portion of the stand. Understory of balsam, spruce, maple and beech. Prescribe for harvest. Clearcut with reserves. Retain some large white pine and spruce. Mark a few patches of hardwoods to leave (small islands).										
Wld : leave some large white pine and spruce. Leave cherry and a paper birch component if it exists.										
82	M6	12		50	northern hardwood	unevenaged	selection	2		
comnts Fmd : Mainly red maple with beech. Most of the beech is dead or dying due to BBD. Good amount of red maple 14-16 inch in diameter. Larger red maple is lower quality. Some mortality. Pockets of M9. Good black cherry component. Hemlock throughout. Prescribe for treatment. Single tree selection harvest with regeneration gaps. Leave all hemlock. 1997 comments mentioned underplanting white pine and red oak after treatment. Stand was not treated last entry year.										
Wld : leave hemlock and a cherry component (of varying diameters). Underplant oak and white pine if possible..										
85	A6	8	68	59	aspen (upland)	mature	final harvest	2		
comnts Fmd : Mature aspen, showing some rot and decline. Throughout the stand the aspen is in bad shape. Edge of the stand along stand 82 has a higher component of white spruce and white pine. Fair amount of red maple in the southern portion of the stand. Understory of balsam, spruce, maple and beech. Prescribe for harvest. Clearcut. No retention. Small acreage, narrow stand, surrounded by similar cover types. Leave all conifers 4 inches and less in diameter after harvest.										
Wld : leave all conifers 4 inches and less in diameter.										
105	A6	7	59	50	aspen (upland)	mature	final harvest	1		
comnts Fmd : Partially open stand. Mature aspen. Some rot and cankers starting. Good component of 2-5" dbh white spruce to leave as residual after the harvest. Large dbh, limby white pine. Lots of small white pine in the understory. A couple of tamarack. Larger diameters, taller and more open than adjacent stand (stand 103). Prescribe for harvest. Clearcut with reserves. Leave some large white pine, smaller spruce and balsam.										
Wld : leave some large white pine and conifers 4 inches in diameter and less. Leave cherry										

NEWBERRY FOREST MGT UNIT

**Proposed Treatments
With NO Limiting Factors**

Compartment: 92

Entry Year: 2009

Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FDf Status
107	A6	34	60	50	aspen (upland)	mature	final harvest	1		
<p>comnts Fmd : Semi open aspen stand with white pine, white spruce, maple, cherry and balsam. Pockets of mature aspen and other areas are more open with young aspen. Mature aspen is showing some decline. Originally stands 107 and 108 were both part of one large stand. Split into two stands for harvesting (leave 1/2 for diversity). Stand 108 will be left for diversity for 10 years, more open with higher component of younger aspen. Stand 107 will be harvested this entry year. Clearcut with reserves. Leave large diameter limby white pine, leave all spruce.</p> <p>Wld : leave large diameter white pine and spruce unless needed to remove for maneuverability. Leave cherry in various diameters.</p>										
109	A6	17	70	50	aspen (upland)	mature	final harvest	1		
<p>comnts Fmd : Large diameter, mature and overmature aspen. Aspen is showing decline, rot and some mortality. Larger diameter and taller heights in the aspen than the adjacent aspen stand to the north. Good component of large diameter white pine (limby and tall). Higher BA of white pine near the creek corridor. Some blowdown in spots. Prescribe for harvest. Clearcut with reserves. Leave a 2 chain wide buffer near the creek where white pine basal area increases, diversity and retention.</p> <p>Wld : leave some large spruce and cherry component</p>										
114	M6	30		50	northern hardwood	unevenaged	thinning	2		
<p>comnts Fmd : Red maple stand with a component of hard maple. Scattered large white pine and white spruce. Lots of large diameter pulp quality red maple. Pockets of M9. Red maple has forks, doubles, multiple stems. Best quality in the stand is in the 9-10 inch diameter class. Quality decreases in the southern end of the stand. Beech in the stand is all but dead (BBD). Good understory throughout. Prescribe for treatment. Single tree selection harvest. Residual BA of 70-80. Remove overmature red maple. Favor the best quality trees (9-10 inch poles) for residual. Maintain a component of all species, retain some large diameter red maple.</p> <p>Wld : maintain species diversity for all species in the stand. Leave some large red maple and white pine and beech. Leave all hemlock.</p>										
123	R6	1	56	48	red pine	immature	thinning	3		
<p>comnts Fmd : Small patch of red pine and scotch pine planted on the west side of Co Rd 415. Red pine is doing well. Scotch pine is poor quality with some blowdown. Remove the scotch pine from the stand.</p> <p>Wld :</p>										
214	J2	7	3	47	jack pine	nonstocked		0	other - specify in remarks	
<p>comnts Fmd : Slim's Jack Pine, sale #42-027-00-01. Sale completed on 8/30/2002. FTP #42-533 completed 5/2004. Regeneration count completed 5/8/2007 = 959 trees/acre (783 A, 137 JP, 39 WP). Continue to monitor for success - JP is still < 12 inches in height. Good component of cherry regeneration (additional 293 tr/ac) present.</p>										
Total Acres.....		500								

**Proposed Treatments
With Limiting Factors**

Compartment: 92

Entry Year: 2009

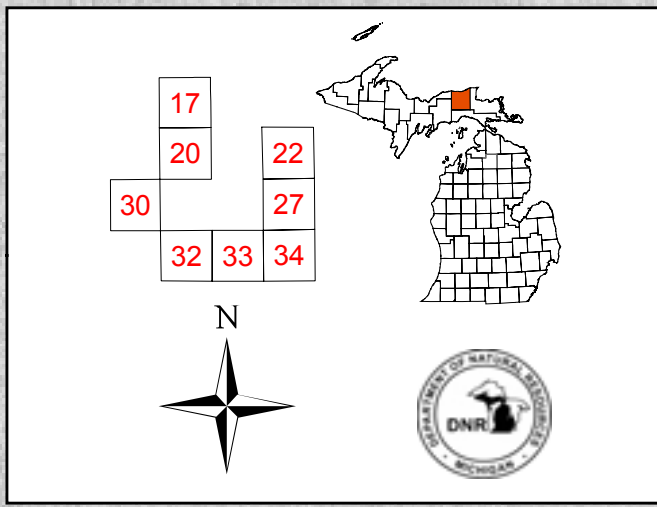
Stand	Cover Type	Acres	Age	Site Index	Mgt Obj	Condition	Method Cut	Harvest Priority	Cultural Need	FD Status
--------------	-----------------------	--------------	------------	-----------------------	--------------------	------------------	-----------------------	-----------------------------	--------------------------	----------------------

TREATMENT LIMITING FACTORS:

Total Acres..... 0

Field Map

Compartment 92
 T47N, R11W, Sec. 17, 20, 22, 27, 30, 32-34
 County: Luce
 Unit: Newberry
 YOE: 2009
 Acres: 2,805 GIS Calculated
 Stand Examiner: Jason Tokar
 Map Revised: 12/06/2007
 Map Phase: Pre-Review



- ### Legend
- RLS Corners
 - Miris Corners
 - County Gravel Roads
 - Poor Dirt Roads
 - Closed Roads
 - ORV Trails
 - Water Features
 - Homestead
 - Residences
 - Camps
 - Gates
 - ORV Trails
 - Snowmobile Trails
 - Dogsled Trails
 - Access Sites
 - Campgrounds
 - Stand Boundary
 - 098 - Other/Other
 - 100 - Final Harvest
 - 146 - Final Harvest/Natural Regeneration
 - 300 - Shelterwood-seed
 - 400 - Thinning
 - 700 - Shelterwood-prep
 - 800 - Selection

