



Compartment Review Presentation

Sault Ste. Marie Forest Management Unit

Compartment 171

Entry Year 2015

Acreage: 1,576

County Mackinac

Management Area: Mackinac Mix

Revision Date: 06/21/2013

Stand Examiner: Amy Douglass

Legal Description:

T43N-R9W, Sections 2, 10 & 11

Identified Planning Goals:

The goals are to maintain and enhance age class diversity and forest health. Much of the pine was planted during the CCC days. Red pine was planted primarily, with some mixed areas of red pine, white pine and jack pine. Age class diversity for red pine is starting, with a couple areas clearcut and replanted in 1998 and 2000. There are four other sites waiting to be planted to red pine, two of which are part of Phase II of the Red Pine Project. The aspen has been actively managed since the 70's. The few hardwood stands in the area have all been affected by Beech Bark Disease. No additional treatment is recommended for these stands, unless the beech understory is herbicided.

Soil and topography:

The majority of the compartment is composed of nearly level and undulating areas on outwash plains and lake plains, with some gently rolling and rolling areas to very steep areas. Associated soils within this area are Wallace sand, Paquin sand, Paquin-Spot complex, and Paquin-Finch sands. The majority of Section 2 is composed of the ridge and swale complex on outwash plains and lake plains, with Wallace-Spot complex as the major soil type. The depressions and nearly level areas on lake plains and outwash plains are dominated by Markey-Spot-Finch complex.

Ownership Patterns, Development, and Land Use in and Around the Compartment:

State lands adjoin the compartment to the south, east and north. The Hiawatha Sportsman's Club abuts to the west. The 320 acres of private land within Section 2 is held by just 3 separate landowners. The NENE of Section 11 is the small burg of Gilchrist. Peter's Creek Ski Trail was developed in 1994. The SESE of Section 10 is a State Police radio tower site. The tower was constructed in 1999.

Unique Natural Features:

No Unique Natural Features known.

Archeological, Historical, and Cultural Features:

There are known concerns within the compartment. All proposed management activities have taken these concerns into consideration.

Special Management Designations or Considerations:

Planned treatments should not be in conflict with the snowmobile trail.

Watershed and Fisheries Considerations:

This compartment contains the upper reaches of Kinny Creek. It is a small stream that supports a fish community of brook trout, steelhead, sculpins and minnows. Implementation of BMP's that will aid in preventing sediment input from road crossings and upland areas are critically important to protect spawning areas for trout and other stream-resident fishes. Buffering the river is also critical to ensure future inputs of woody material to the stream channel, discourage aspen regeneration close to the stream channel, and provide shading to protect water temperature from warming to a degree that will inhibit trout survival.

Wildlife Habitat Considerations:

This compartment lies within the Mackinac Mix Management Area. Pre-settlement vegetation generally consisted of northern hardwoods, hemlock-beech, and hemlock-white pine forests. Dry sandy areas were dominated by white pine, hemlock, red pine, and localized jack pine forests. Lowland conifer swamps featured northern white cedar, tamarack, balsam fir, and black spruce. Current vegetation composition in the lowlands appears to be similar to the pre-settlement species composition, but upland areas are now dominated by red pine and aspen.

Wildlife habitat management objectives include leaving some pine to promote age class diversity within the aspen and red pine forest community, and maintaining wetland and stream corridors by buffering these features appropriately. Examples of a few species that may be found this compartment include leopard frog, red-backed salamander, American woodcock,

red squirrel, and white-tailed deer.

Mineral Resource and Development Concerns and/or Restrictions

Surface sediments consist of lacustrine (lake) sand and gravel. There is insufficient data to determine the glacial drift thickness. The Silurian Engadine and Manistique Groups subcrop below the glacial drift. The Engadine is quarried for stone/limestone elsewhere in the UP. Gravel pits are not located in the compartment and potential may be limited. There is no economic oil and gas production in the UP.

Vehicle Access:

Access is good to the majority of the compartment. Hiawatha Trail, a paved county road, crosses Section 11. Cranberry Lake Road, a sand county road, runs north off Hiawatha Trail. Other maintained DNR roads include Gilchrist Tower Road, North Beach Road and Peter's Creek Truck Trail. Several two track roads access other areas of the compartment.

Survey Needs:

A survey may be needed against the Hiawatha Sportsman's Club line along north line of Section 10. The HSC may plan on harvesting their timber along that line at the same time.

Recreational Facilities and Opportunities:

Snowmobile trail #2 runs north through the central portion of the compartment. This is the main trail from Naubinway to the Newberry/Rexton cut off. Peter's Creek Ski Trail was established in 1994. It was put in and maintained by volunteers. Funding was granted for disking and seeding the trail in 2003. The area is also used for grouse, woodcock, deer and bear hunting. Fishing opportunities may exist in parts of Kinny and Peter's Creeks. Mushroom and berry picking opportunities exist within the compartment.

Fire Protection:

While the opportunity exists for wildfires within the compartment, none have been noted in recent years. Section 2 is within the southern boundary of one of the old zone dispatch areas within the Naubinway Area. Certainly the fuel types (pine) within the compartment are conducive to wildfires and the potential exists for a fire start in the areas adjacent to these types. However, this area is close to the Naubinway Office and has good vehicle access throughout most of the compartment. Access to the adjacent Hiawatha Club is through locked gates.

Additional Compartment Information:

Hiawatha Sportsman's Club is located to the west of the compartment. Notable differences in prior management are seen along this line. Most notable are where the CCC planted pine on state lands and the Hiawatha Club lands were not planted. An 800 megahertz State Police radio tower was erected in the SESE of Section 10 in 1999. The easement involves an 8 acre parcel of land.

The following reports from the Inventory are attached:

- Total Acres by Cover Type and Age Class**
- Cover Type by Harvest Method**
- Proposed Treatments – No Limiting Factors**
- Proposed Treatments – With Limiting Factors**
- Stand Details (Forested and Nonforested)**
- Dedicated and Proposed Special Conservation Areas**
- Site Condition Details**

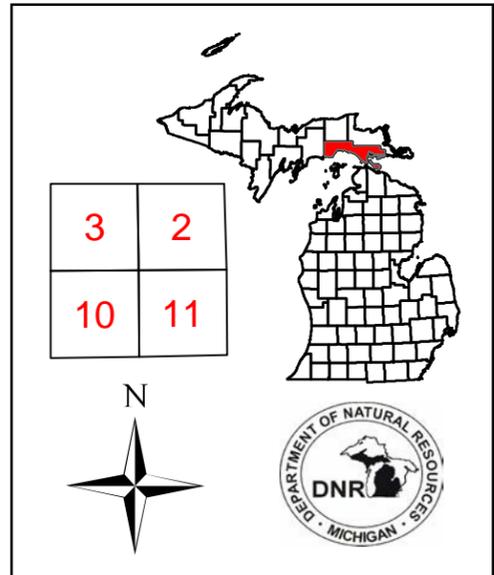
The following information is displayed, where pertinent, on the attached compartment maps:

- Base feature information, stand boundaries, cover types, and numbers**
- Proposed treatments**
- Site condition boundaries**
- Details on the road access system**

Cover Type & Treatment Map

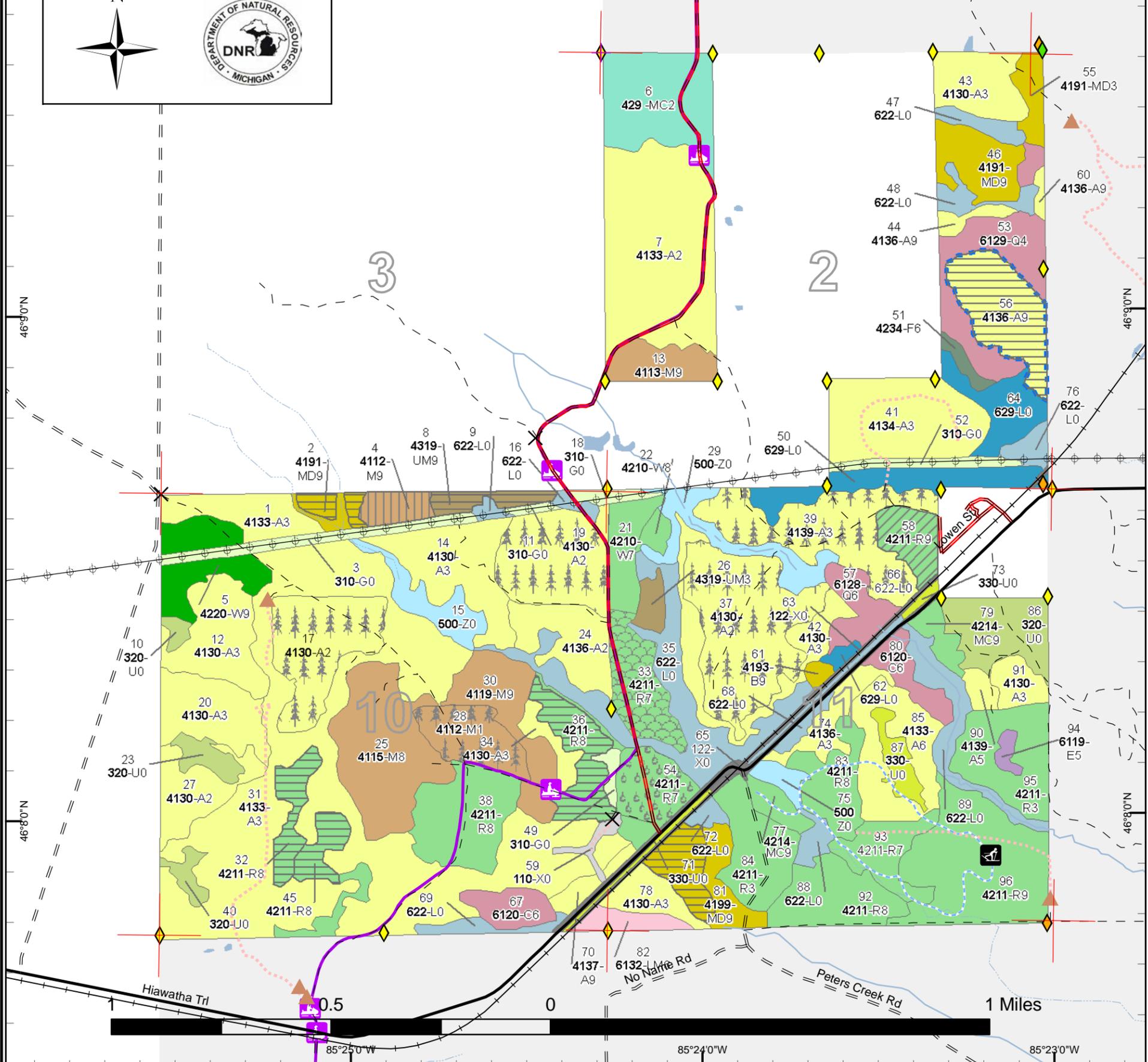
Compartment: 171
 T43N R09W Sections 2, 3, 10, 11
 County: Mackinac
 Unit: Sault Ste. Marie
 YOE: 2015
 Acres: 1,576 GIS Calculated
 Examiner: Amy Douglass
 Map Revised: 06/17/2014
 Map Phase: Post-Review

Stand #
 23
Stocking Density
 (412)0 - A7
 Level 3 OI
 Level 4 Code
Cover Type Code



Legend

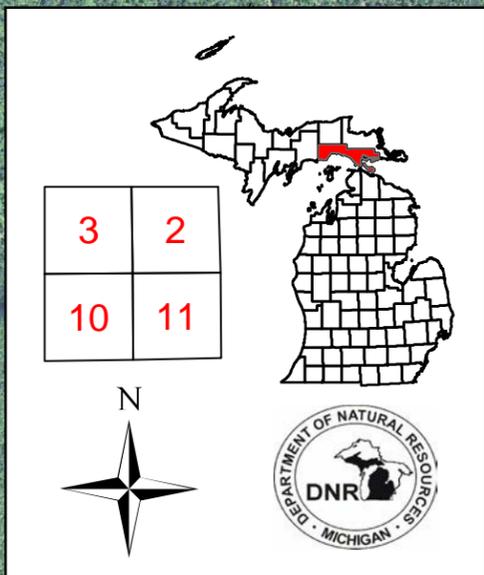
—	Miris Corners	▨	Clearcut (w/Reserves, Patch/Strip)
+	Remonumented Section Corners	▨	Shelter Wood (w/Reserves)
◆	Survey Grade	▨	Thinning (Crown, Low, Systematic)
◆	PLSS Corner	▨	Planting (tree species)
◆	GPS Point	▨	Prescribed Burn
X	Gate	▨	Site Preparation
▲	Berms	▨	Treatments w/ Site Condition
⚡	Ski Trails		Forest Stands
🚙	Snowmobile Trails		Level 3
—	Highway	■	411 - Northern Hardwood
—	County Paved Roads	■	413 - Aspen Types
—	Paved Roads	■	419 - Mixed Upland Deciduous
—	County Gravel Roads	■	421 - Planted Pines
—	Gravel Roads	■	422 - Natural Pines
—	Poor Dirt Roads	■	423 - Other Upland Conifers
—	County Poor Dirt Roads	■	429 - Mixed Upland Conifers
—	Trail (Non-Recreation)	■	431 - Upland Mixed Forest
—	Closed Roads	■	611 - Lowland Deciduous Forest
—	Railroads	■	612 - Lowland Coniferous Forest
—	Powerline	■	613 - Lowland Mixed Forest
—	Ski Trail		Non-Forest Stands
—	Snowmobile Trail		Level 3
—	Stream	■	110 - Low Intensity Urban
—	Intermittent Stream	■	122 - Road/Parking Lot
—	Lakes and Rivers	■	310 - Herbaceous Openland
—	State Forest Land	■	320 - Upland Shrub
		■	330 - Low-Density Trees
		■	500 - Water
		■	622 - Lowland Shrub
		■	629 - Mixed non-forested wetland



Stand Boundary Map

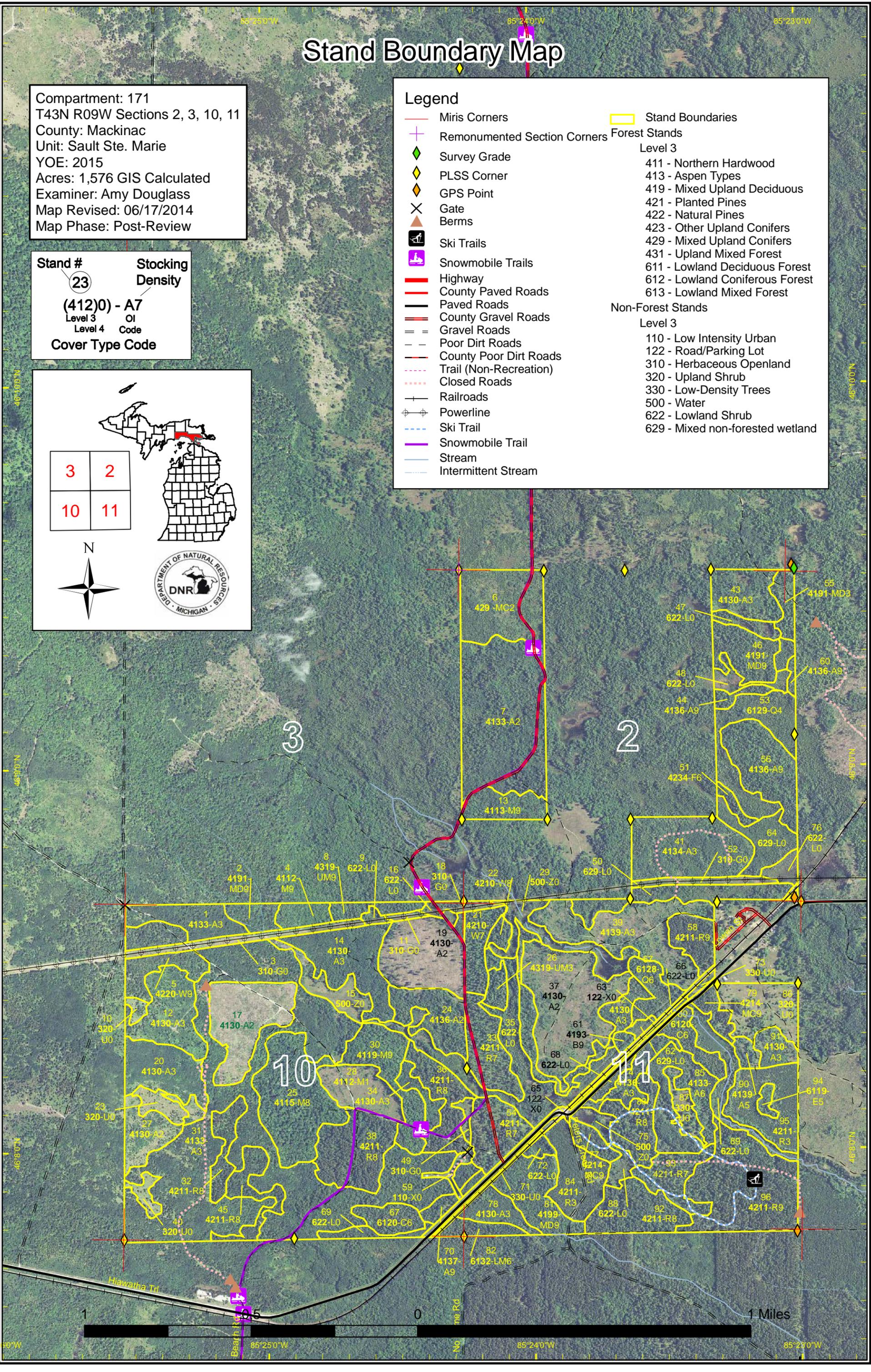
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—+—	Miris Corners	□	Stand Boundaries
+	Remonumented Section Corners	Forest Stands	
◆	Survey Grade	Level 3	
◇	PLSS Corner	411 - Northern Hardwood	
◆	GPS Point	413 - Aspen Types	
X	Gate	419 - Mixed Upland Deciduous	
▲	Berms	421 - Planted Pines	
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▲	Berms	Stream	
▲	Berms	Intermittent Stream	



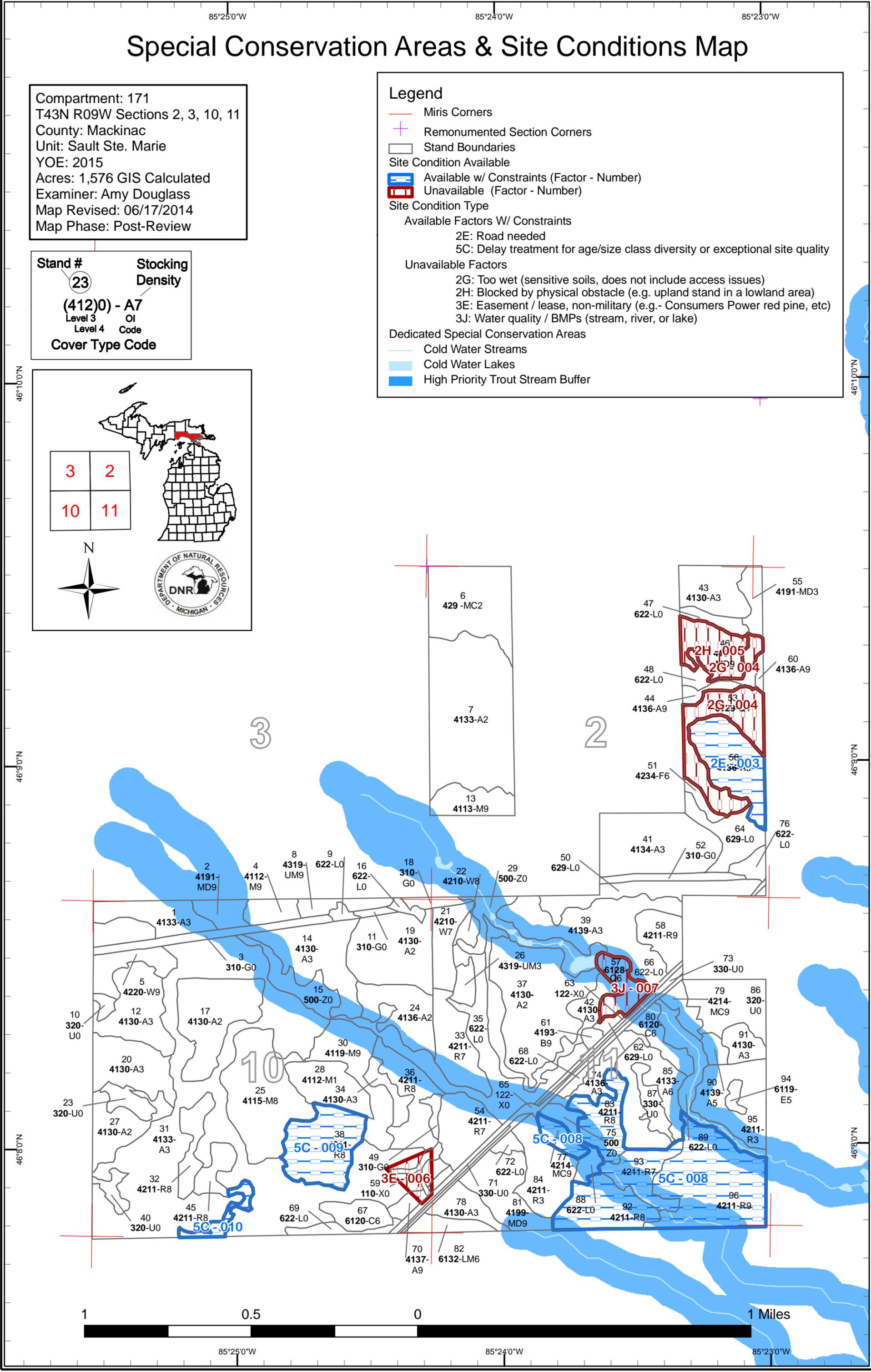
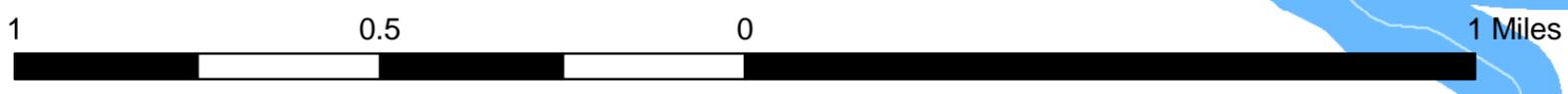
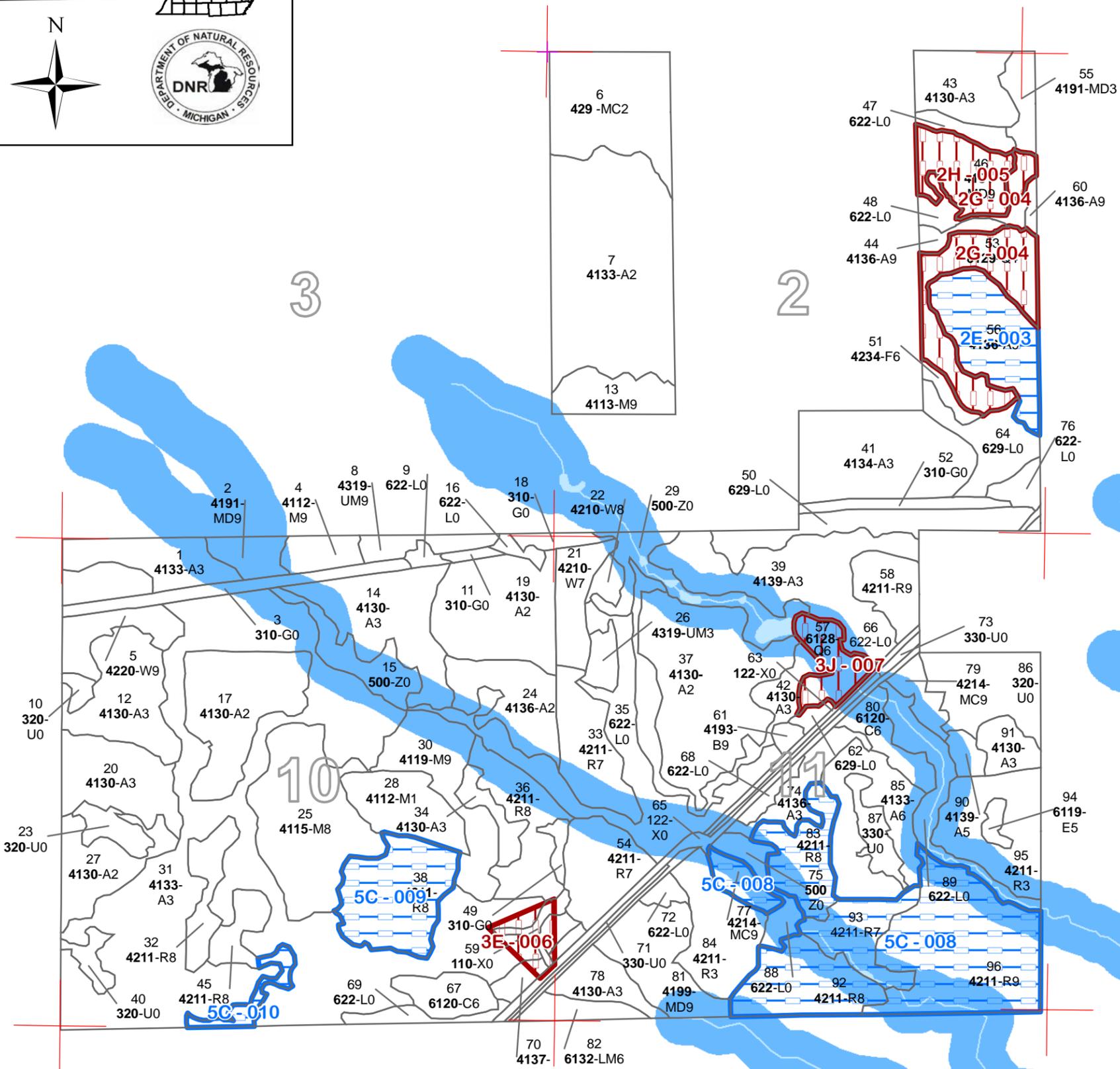
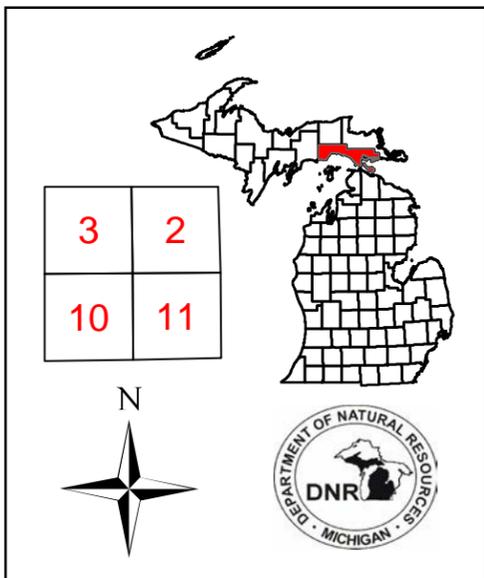
Special Conservation Areas & Site Conditions Map

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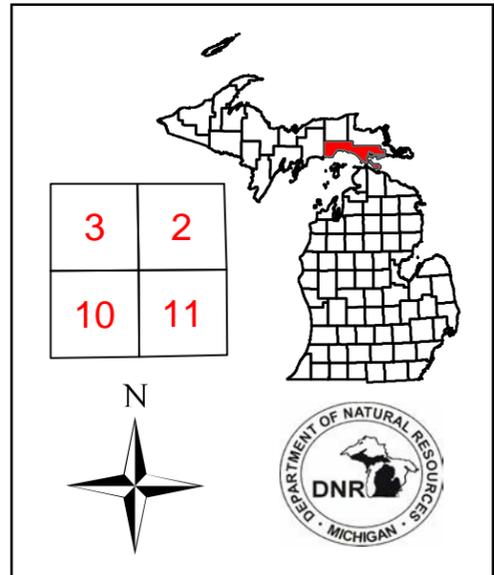
- Miris Corners
- + Remonumented Section Corners
- Stand Boundaries
- Site Condition Available
- ▨ Available w/ Constraints (Factor - Number)
- ▨ Unavailable (Factor - Number)
- Site Condition Type
- Available Factors W/ Constraints
 - 2E: Road needed
 - 5C: Delay treatment for age/size class diversity or exceptional site quality
- Unavailable Factors
 - 2G: Too wet (sensitive soils, does not include access issues)
 - 2H: Blocked by physical obstacle (e.g. upland stand in a lowland area)
 - 3E: Easement / lease, non-military (e.g.- Consumers Power red pine, etc)
 - 3J: Water quality / BMPs (stream, river, or lake)
- Dedicated Special Conservation Areas
 - Cold Water Streams
 - Cold Water Lakes
 - High Priority Trout Stream Buffer



Cover Type & Treatment Map

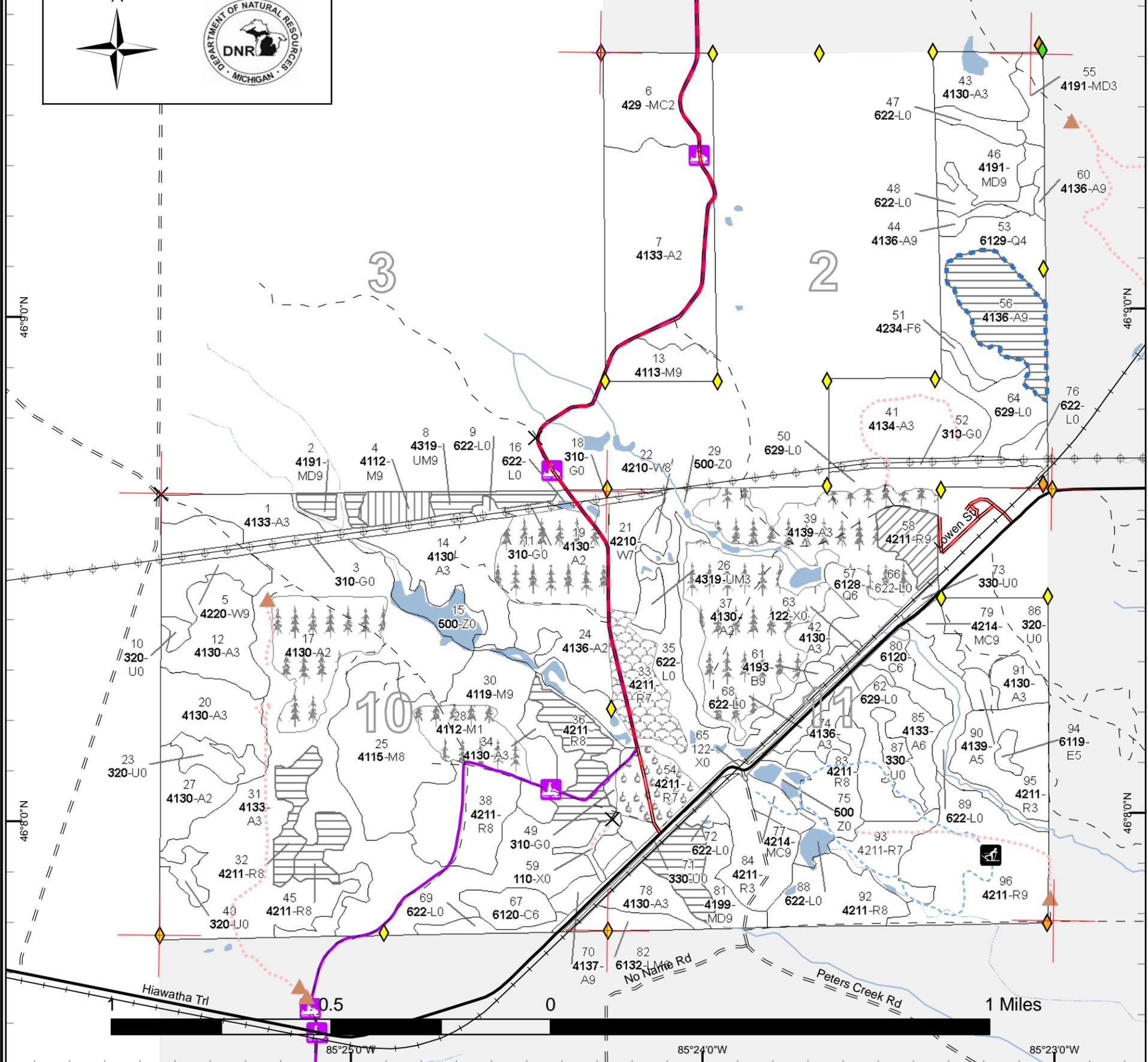
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	Closed Roads		
	Railroads		
	Powerline		
	Ski Trail		
	Snowmobile Trail		
	Stream		
	Intermittent Stream		
	Lakes and Rivers		
	State Forest Land		



Report 1 – Total Acres by Cover Type and Age Class



	Age Class														Total
	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 +	Uneven Age	
Aspen	186	95	378	0	30	0	0	5	32	0	0	0	0	0	726
Cedar	0	0	0	0	0	0	0	0	0	10	9	0	0	0	19
Herbaceous Openland	24	0	0	0	0	0	0	0	0	0	0	0	0	0	24
Low-Density Trees	10	0	0	0	0	0	0	0	0	0	0	0	0	0	10
Lowland Conifers	0	0	0	0	0	0	0	0	28	11	0	0	0	0	40
Lowland Deciduous	0	0	0	0	0	0	0	0	2	0	0	0	0	0	2
Lowland Mixed Forest	0	0	0	0	0	0	0	0	0	0	6	0	0	0	6
Lowland Shrub	128	0	0	0	0	0	0	0	0	0	0	0	0	0	128
Mixed Upland Deciduous	7	0	0	0	0	0	0	7	39	0	0	0	0	0	53
Northern Hardwood	18	0	0	0	0	0	0	7	80	0	0	0	0	0	105
Paper Birch	0	0	0	0	0	0	0	2	0	0	0	0	0	0	2
Planted Mixed Pines	0	0	0	0	0	0	0	12	0	0	0	0	0	0	12
Red Pine	0	47	0	0	0	0	0	229	0	0	0	0	0	0	276
Upland Conifers	0	35	0	0	0	0	0	0	0	0	0	0	0	0	35
Upland Mixed Forest	0	0	5	0	0	0	0	7	0	0	0	0	0	0	11
Upland Shrub	34	0	0	0	0	0	0	0	0	0	0	0	0	0	34
Upland Spruce/Fir	0	0	0	0	0	0	0	0	3	0	0	0	0	0	3
Urban	20	0	0	0	0	0	0	0	0	0	0	0	0	0	20
Water	33	0	0	0	0	0	0	0	0	0	0	0	0	0	33
White Pine	0	0	0	0	0	0	0	16	20	0	0	0	0	0	35
Total	460	178	383	0	30	0	0	284	205	21	16	0	0	0	1576



Report 2 – Proposed Treatment Summaries

Sault Ste. Marie Mgt. Unit
Year of Entry 2015

Compartment 171
Total Compartment Acres: 1,576

Acres by Treatment Type

Commercial Harvest - 105 Tree Planting - 214 Other - 47
Habitat Cut - 0 Opening Maintenance - 0

Cover Type by Harvest Method

	Clearcut	Selection	Seed Tree	Shelterwood	Thinning	Other - Specify	Total Acres
Aspen Types	27	0	0	0	0	0	27
Mixed Upland Deciduous	17	0	0	0	0	0	17
Northern Hardwood	0	0	0	7	0	0	7
Planted Pines	36	0	0	0	12	0	47
Upland Mixed Forest	7	0	0	0	0	0	7
Total	86	0	0	7	12	0	105



S t a n d	Treatment Name	Acres	CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Approval Status
2	45171002-Cut	4.6	4191 - Mixed Upland Deciduous with Conifer	High Density Log	77		Harvest	Clearcut with Reserves	4191 - Mixed Upland Deciduous with Conifer	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Cut all species except white pine and hemlock. Buffer drainages. Retention will be in drainage buffers.										
<u>Specs:</u>										
<u>Other</u> May have to access part of stand from HSC. They may want to cut their land using this access.										
<u>Comments:</u>										
<u>Next</u> Regen survey per Work Instructions. Acceptable regen includes aspen, birch, red maple with white pine, spruce, hemlock and balsam.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										
4	45171004-Cut	7.2	4112 - Maple, Beech, Cherry Association	High Density Log	77	81-110	Harvest	Shelter Wood with Reserves	4112 - Maple, Beech, Cherry Association	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Mark to approx. 50 BA, trying to promote cherry where possible.										
<u>Specs:</u>										
<u>Other</u> HSC may want to access their land to the north from this access.										
<u>Comments:</u>										
<u>Next</u> Regen survey per Work Instructions. Acceptable regeneration includes red maple, black cherry, sugar maple, with some balsam.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										
8	45171008-Cut	6.7	4319 - Mixed Upland Forest	High Density Log	77		Harvest	Clearcut with Reserves	413 - Aspen	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Cut all species except white pine and hemlock. Retention will be along lower areas.										
<u>Specs:</u>										
<u>Other</u> HSC may want to access their land for harvest using this access.										
<u>Comments:</u>										
<u>Next</u> Regen survey per Work Instructions. Acceptable regeneration includes aspen, red maple, birch, with balsam, white pine and hemlock.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										
32	45171032-Cut	10.1	42110 - Planted Red Pine	Medium Density Log	79	81-110	Harvest	Clearcut	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Clearcut in preparation for replanting to red pine. No retention due to size of stand, and ease of burn and trenching.										
<u>Specs:</u>										
<u>Other</u> Block up with stand 45.										
<u>Comments:</u>										
<u>Next</u> Burn, trench and replant to red pine. Herbicide as necessary.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										
36	45171036-Cut	18.2	42110 - Planted Red Pine	Medium Density Log	79	111-140	Harvest	Clearcut with Reserves	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Clearcut in preparation for burn and replanting to red pine. Retention will be minimal - left as small buffer along creek.										
<u>Specs:</u>										
<u>Other</u> See locked OFS comments.										
<u>Comments:</u>										
<u>Next</u> Burn, trench and replant to red pine. Herbicide as necessary.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										



S t a n d	Treatment Name	Acres	CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Approval Status
45	45171045-Cut	7.5	42110 - Planted Red Pine	Medium Density Log	79	81-110	Harvest	Clearcut with Reserves	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Clearcut in preparation for replanting to red pine. Retention will be left as the long, skinny fingers.										
<u>Specs:</u>										
<u>Other</u> Block up with stand 32.										
<u>Comments:</u>										
<u>Next</u> Burn, trench and replant to red pine. Herbicide as necessary.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										
58	45171058-Cut	11.5	42110 - Planted Red Pine	High Density Log	79	141-170	Harvest	Crown Thinning	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Thin to approx. 110 BA.										
<u>Specs:</u>										
<u>Other</u>										
<u>Comments:</u>										
<u>Next</u>										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										
81	45171081-Cut	12.1	4199 - Other Mixed Upland Deciduous	High Density Log	81		Harvest	Clearcut with Reserves	413 - Aspen	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Cut western half, retaining eastern half as retention and buffer for creek headwaters. Leave red pine and white pine and hemlock (where present).										
<u>Specs:</u>										
<u>Other</u>										
<u>Comments:</u>										
<u>Next</u> Regen survey per Work Instructions. Acceptable regeneration includes aspen, red maple, birch with balsam, red pine and white pine.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 10/01/2014										
33	45171033- Prep	19.6	42110 - Planted Red Pine	Low Density Log	79	1-50	Site Prep	Scarification	4221 - Natural Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Waiting for herbicide and scarify for natural red and white pine regeneration. FTP C44-551.										
<u>Specs:</u>										
<u>Other</u> Cut in 2008.										
<u>Comments:</u>										
<u>Next</u> Monitor for regeneration success and release needs.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 06/01/2013										
17	45171017- Plant	32.6	4130 - Aspen	Medium Density Sapling	3		Tree Planting	Hand Plant	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Waiting to be trenched, herbicided and planted under FTP C44-584, from RPP.										
<u>Specs:</u>										
<u>Other</u> Most of the area was a spruce plantation that was chipped in 2011. A little portion at the south end was formerly red pine. The area was not										
<u>Comments:</u> burned.										
<u>Next</u> Monitor for regeneration success and release needs.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 06/01/2013										



S t a n d	Treatment Name	Acres	CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Approval Status
19	45171019- Plant	33.2	4130 - Aspen	Medium Density Sapling	3		Tree Planting	Hand Plant	4133 - Aspen, Mixed Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Underplant red pine in areas not coming back to aspen.										
<u>Specs:</u>										
<u>Other</u> Area was cut in 2011. Standing WP and RP left.										
<u>Comments:</u>										
<u>Next</u> Monitor for regen success.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 06/01/2013										
28	45171028- Plant	17.7	4112 - Maple, Beech, Cherry Association	Low Density Sapling	3		Tree Planting	Hand Plant	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Waiting to be trenched, herbicided and planted under FTP C44-584, from RPP.										
<u>Specs:</u>										
<u>Other</u> This area was chipped in 2011 and not burned.										
<u>Comments:</u>										
<u>Next</u> Monitor for regeneration success and release needs.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 06/01/2013										
37	45171037- Plant	53.2	4130 - Aspen	Medium Density Sapling	4		Tree Planting	Hand Plant	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Waiting to be trenched, herbicided and planted under FTP C44-550.										
<u>Specs:</u>										
<u>Other</u> Cut in 2010.										
<u>Comments:</u>										
<u>Next</u> Monitor for regeneration success and release needs.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 06/01/2013										
39	45171039- Plant	41.6	4139 - Aspen, Mixed Deciduous	High Density Sapling	4		Tree Planting	Hand Plant	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete
<u>Prescription</u> Waiting to be trenched, herbicided and planted under FTP C44-550.										
<u>Specs:</u>										
<u>Other</u> Cut in 2010.										
<u>Comments:</u>										
<u>Next</u> Monitor for regeneration success and release needs.										
<u>Steps:</u>										
<u>Proposed</u>										
<u>Start Date:</u> 06/01/2013										



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Treatment Name	Acres	CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Approval Status
54 45171054-Burn	14.8	42110 - Planted Red Pine	Low Density Log	79	51-80	Prescribed Burn	Unspecified	4211 - Planted Red Pine	Fld. Tr. Bdy. - Incomplete

Prescription: Continue with under burn as per FTP C44-460.

Specs:

Other Comments: Easy access to try different methods of red pine/white pine natural regeneration. See locked OFS comments.

Next Steps: After burn: continue with scarification, herbicide and/or under planting as per FTP C44-460 and C44-512.

Proposed Start Date: 10/01/2014

21 45171021-Spray	12.4	42100 - Planted White Pine	Low Density Log	79	1-50	Pesticide	Skidder	42140 - Planted Mixed Pine	Fld. Tr. Bdy. - Incomplete
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Prescription: Waiting to for herbicide as site prep for underplanting under FTP C44-552.

Specs:

Other Comments: Cut in 2008.

Next Steps: Underplant to RP and monitor for regen success and release needs.

Proposed Start Date: 06/01/2013

**Total Treatment
Acreage Proposed: 303.0**

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	Treatment Name	Acres	CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Approval Status
56	45171056-Cut	27.1	4136 - Aspen, Mixed Conifer	High Density	81		Harvest	Clearcut with Reserves	413 - Aspen	Fld. Tr. Bdy. - Incomplete

Prescription Cut all species except red pine, white pine, hemlock and yellow birch. Stand continues into adjacent compartment 164.

Specs:

Other Comment: Was put up on sale 451050701 (All or Nothing) as an optional unit. It was not cut due to access issues. A railroad crossing would be needed, or crossing very wet ground.

Next Steps: Regen survey per Work Instructions. Acceptable regeneration includes aspen, red maple, birch, balsam, spruce, with some white pine.

Proposed

Start Date: 10/01/2014

Limiting Factor 2E: Road needed

**Total Treatment
Acreage Proposed: 27.1**

Report 5 – Site Conditions

Sault Ste. Marie Mgt. Unit

Amy Douglass : Examiner

Compartment 171

Year of Entry 2015

Availability for Management

Total Acres	Acres Available	Acres Not Available	Dominant Site Conditions	Dominant Site Conditions					
				No	5C	3J	3E	2H	2G
726	693	33	Aspen	693			6	27	
19	19		Cedar	19					
40		40	Lowland Conifers			11			28
2	2		Lowland Deciduous	2					
6	6		Lowland Mixed Forest	6					
53	37	17	Mixed Upland Deciduous	37				17	
105	105		Northern Hardwood	105					
2	2		Paper Birch	2					
12	12		Planted Mixed Pines	6	6				
276	276		Red Pine	134	142				
35	35		Upland Conifers	35					
11	11		Upland Mixed Forest	11					
3	3		Upland Spruce/Fir	3					
35	35		White Pine	35					
1,326	1,237	89	Total Forested Acres	1,089	148	11	6	44	28
	93%	7%	Relative Percent						

**Due to limitations in the current Site Conditions Analysis tool, all nonforested acres are considered available. Future development will enable analysis of nonforested types.*

Site No.	Dominant Site Cond Availability	Dominant Site Condition	Acres	Other Site Condition	Other Site Condition	Other Site Condition	Other Site Condition
003	Available	2E: Road needed	27				
Comments: Upland site set up with adjacent C-164 as optional unit but not cut. Access would entail crossing very low, wet ground or require a RR crossing which is cost prohibitive. Stand continues into C-164.							
004	Not Available	2G: Too wet (sensitive soils, does not include access issues)	28	5D: Unproductive Forest Land			
Comments:							

Report 5 – Site Conditions

Sault Ste. Marie Mgt. Unit

Amy Douglass : Examiner

Compartment 171

Year of Entry 2015

005	Not Available	2H: Blocked by physical obstacle (e.g. upland stand in a lowland area)	17	
Comments:				
006	Not Available	3E: Easement / lease, non-military (e.g.- Consumers Power red pine, etc)	8	
Comments: State Police Tower site				
007	Not Available	3J: Water quality / BMPs (stream, river, or lake)	11	2G: Too wet (sensitive soils, does not include access issues)
Comments:				
008	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	114	No Limiting Factor
Comments: Peter's Creek Ski Trail. Management has occurred within these stands with harvesting taking place in the non-winter months when the ski trail was in use. Managements was to be limited here when the ski trail was proposed.				
009	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	29	
Comments: Will clearcut and replant to red pine at next entry (after the adjacent stand 28 has been successfully re-established).				

Sault Ste. Marie Mgt. Unit

Report 5 – Site Conditions

Compartment 171

Amy Douglass : Examiner

Year of Entry 2015

010	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	5
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Comments:



Report 6 – PROPOSED SPECIAL CONSERVATION AREA* (SCA) DETAILS

* This is a partial list of SCAs for this compartment. Not included are those areas identified under other Department initiatives (Natural Rivers, Deer Wintering Areas, etc.). Those will be identified in separate, future map and report products.

SCA Name	SCA Category	Detail Type	Recommendation	Acres
Comments				



Report 7 – EXISTING SPECIAL CONSERVATION AREA DETAILS

* This is a list of SCA's for this compartment along with a 1/4 mile buffer surrounding the compartment. Refer to the Special Conservation Area Map for locations of the below listed Conservation Areas.

ERA = Ecological Reference Area
 HCVA = High Conservation Value Area
 SCA = Special Conservation Area

Conservation Area	Type	Description
SCA	Archaeological Site	An aquatic or terrestrial area of the State that contains physical remains of human occupation. These are sites of cultural and historical significance that may occur upon terrestrial areas and Great Lakes bottomlands. They include thousands of Native American settlements and burial sites, as well as French and British outposts, nineteenth century logging camps, mines and homesteads. Beneath the waters of the Great Lakes, there are shipwrecks and other remains documenting the maritime trade. Such sites may be identified by Natural heritage data from the State Historic Preservation Office. Proposed treatments in this compartment will be implemented in such a manner as to maintain the integrity of these sites. Due to the sensitive nature of this information, no further detail about location is available.
SCA	Cold Water Lake	A coldwater lake has temperature and dissolved oxygen conditions that allow naturally-reproduced or stocked trout populations and those of other coldwater fish species to persist from year to year. Suitable conditions for coldwater fishes may occur in Michigan lakes if they are relatively deep, have substantial groundwater inflows, or are located in colder (northern) areas of the state. Such lakes are established by Director's action and designated as trout resources by Fisheries Order 200.
SCA	Cold Water Stream	A coldwater stream has temperature and dissolved oxygen conditions that allow naturally-reproduced or stocked trout populations and those of other coldwater fish species (e.g., slimy sculpin) to persist from year to year. Coldwater streams in Michigan typically provide these conditions due to substantial contributions of groundwater to their stream flows. Such streams are established by Director's action and designated as trout resources by Fisheries Order 210.
SCA	Riparian Area	A transitional area between aquatic and terrestrial ecosystems in which the terrestrial ecosystem influences the aquatic ecosystem and vice-versa. Because of the unique conditions adjacent to lakes, streams and open water wetlands, riparian areas harbor a high diversity of plants and wildlife. Riparian communities are ecologically and socially significant in their effects on water quality and quantity, as well as aesthetics, habitat, bank stability, timber production, and their contribution to overall biodiversity.



Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
1	4133 - Aspen, Mixed Pine	High Density Sapling	16.4	23		Scattered white pine left.
2	4191 - Mixed Upland Deciduous with Conifer	High Density Log	7.2	77		
4	4112 - Maple, Beech, Cherry Association	High Density Log	7.2	77	81-110	
5	42200 - Natural White Pine	High Density Log	19.8	81	81-110	White pine is limby and weeviled. Variable dbh (6"-18") white pine.
6	429 - Mixed Upland Conifers	Medium Density	35.3	14		Cut in 1999 and planted 4/29/2000 (FTP C44-511). Some low inclusions and aspen clumps.
7	4133 - Aspen, Mixed Pine	Medium Density	72.4	27		RP left standing. Pockets of wet ground - too complex to type out.
8	4319 - Mixed Upland Forest	High Density Log	6.7	77		Transition ground.
12	4130 - Aspen	High Density Sapling	25.4	7		Scattered white pine, red pine and beech left. Most large beech has succumbed to BBD.
13	4113 - R.Maple, Conifer	High Density Log	12.9	81	81-110	Red maple with rot and forks. Lots of balsam understory, but some areas a bit nicer without much understory. Some RP on north and east ends.
14	4130 - Aspen	High Density Sapling	30.0	26		A few small openings within stand.
17	4130 - Aspen	Medium Density	32.6	3		Red Pine Project site. Mostly a former spruce plantation to convert to RP.
19	4130 - Aspen	Medium Density	33.2	3		Former spruce plantation with aspen. Notes from sale set-up say if aspen regeneration fails we can rethink planting to RP. Site was chipped with some tops to remain. WP multi-stemmed and limby. A couple RP log trees left. Aspen 4'-8' tall.
20	4130 - Aspen	High Density Sapling	22.4	16		Beech was left at time of cut, mostly along north line. Most has succumbed to BBD - large woody debris now. Grouse dusting spots in old road.
21	42100 - Planted White Pine	Low Density Log	12.4	79	1-50	
22	42100 - Planted White Pine	Medium Density Log	3.2	79	51-80	Mostly upland with wet spots and drainages. WP is limby.
24	4136 - Aspen, Mixed Conifer	Medium Density	20.1	25		Includes some semi-open areas.



	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
25	4115 - Y.Birch, Hemlock NH	Medium Density Log	43.4	81	51-80	Site of the old Gilchrist Fire Tower. RM with dying tops. Beech pretty well gone from BBD - some still hanging on, others fallen over.
26	4319 - Mixed Upland Forest	High Density Sapling	4.7	25		Upland/lowland with drainages.
27	4130 - Aspen	Medium Density	17.0	16		Some scattered semi-open areas.
28	4112 - Maple, Beech, Cherry Association	Low Density Sapling	17.7	3		Part of the Red Pine Project. Residual saplings from cut are mainly HM and Beech.
30	4119 - Mixed Northern Hardwoods	High Density Log	23.5	81	51-80	Some RM with dying tops. Beech pretty well gone from BBD - some hanging on a little, some fallen over already.
31	4133 - Aspen, Mixed Pine	High Density Sapling	183.7	27		Some residual red pine in areas. Cut in several different sales from 1984 to 1987. On edge between sap and pole.
32	42110 - Planted Red Pine	Medium Density Log	10.1	79	81-110	
33	42110 - Planted Red Pine	Low Density Log	19.6	79	1-50	Thinned in 1989; shelterwood cut in 2010. Some blowdown after harvest.
34	4130 - Aspen	High Density Sapling	6.1	27		Narrow strip clearcut between M6 and RP plantation.
36	42110 - Planted Red Pine	Medium Density Log	19.7	79	111-140	Much tall maple regen than adjacent underburned area.
37	4130 - Aspen	Medium Density	53.2	4		Regeneration around 6'-10' tall.
38	42110 - Planted Red Pine	Medium Density Log	29.0	79	111-140	Understory is variable density. Some small areas of HM regen - seen on photo.
39	4139 - Aspen, Mixed Deciduous	High Density Sapling	41.6	4		Regeneration around 8'-12' tall. Some areas only 50 - 75% cover.
41	4134 - Aspen, Spruce/Fir	High Density Sapling	39.2	20		Some wet areas. Small approx. 2 acre cedar inclusion in northwest corner. Several semi-open areas.
42	4130 - Aspen	High Density Sapling	20.6	14		
43	4130 - Aspen	High Density Sapling	17.8	17		WP left standing. Low pocket within stand.
44	4136 - Aspen, Mixed Conifer	High Density Log	3.6	81		Small upland ridge within low, wet swamp.



	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
45	42110 - Planted Red Pine	Medium Density Log	12.9	79	81-110	Almost pole sized balsam - some 1 stick. Thick understory.
46	4191 - Mixed Upland Deciduous with Conifer	High Density Log	16.8	81		Mix of upland and lowland, surrounded by low, wet swamp.
51	42340 - Upland Spruce/Fir	High Density Pole	3.0	81		Narrow ridge in middle of swamp.
53	6129 - Mixed Coniferous Lowland Forest	Low Density Pole	28.3	81		Non-productive swamp with tag alder.
54	42110 - Planted Red Pine	Low Density Log	18.1	79	51-80	Underburned in 2002. FTP 44-460. HM regen spotty but widespread - 3'-10' tall. A few small areas with natural JP, RP regen 3'-5' tall.
55	4191 - Mixed Upland Deciduous with Conifer	High Density Sapling	7.1	4		Stand was strip cut in 1974 (1 chain cut, 2 chains left). Good reproduction (RM, Cherry, WB, H) at last entry warranted a shelterwood-seed cut. That cut was complete in 2010. It currently is a 3-storied stand: H & YB log over 1974 cut regen (40'-50' tall) and 2000 cut (10'-20' tall).
56	4136 - Aspen, Mixed Conifer	High Density Log	27.1	81		Was an optional unit with adjacent compartment (C-164) sale (All or Nothing). Best access is across the RR, but is cost prohibitive. Did not cut. Data taken from timber sale cruise.
57	6128 - Lowland Coniferous, Mixed Deciduous	High Density Pole	11.2	96		Kinny Creek headwaters flow thru stand. Graduates to upland on edges.
58	42110 - Planted Red Pine	High Density Log	11.5	79	141-170	
60	4136 - Aspen, Mixed Conifer	High Density Log	1.5	81		A small part of a Unit from "All or Nothing" from adjacent compartment (164) that was not cut. Data taken from timber sale cruise.
61	4193 - Birch, Aspen	High Density Log	1.9	72		Small birch stand between RR tracks and RP stand. Left for aesthetics and/or access to RP stand. Some low spots within stand.
67	6120 - Lowland Cedar	High Density Pole	9.5	96		
70	4137 - Aspen, Birch	High Density Log	5.0	77		Narrow stand bordering H-40. Mostly upland, tapering to lowland on the west.
74	4136 - Aspen, Mixed Conifer	High Density Sapling	10.3	27		RP & WP left standing. Some low spots within stand and along H-40.
77	42141 - Planted Mixed Pine, Mixed Deciduous	High Density Log	6.0	79	141-170	RP/WP stand with red maple. WP limby and sometimes multi-stemmed. RP - large limbed. A couple WB within stand. Peter's Creek Ski Trail Trailhead.



	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
78	4130 - Aspen	High Density Sapling	9.9	17		Cedar, hemlock and white pine left - residual < 10 BA, mainly on edges. High ridge along southern edge.
79	42140 - Planted Mixed Pine	High Density Log	6.1	79	81-110	Small plantation along Kinny Creek. JP seeding in to the south and east over the years. Very limby where predominantly JP.
80	6120 - Lowland Cedar	High Density Pole	9.1	101		Narrow finger along H-40 contains small diameter cedar with areas of Tamarack. Mostly wet with small narrow upland ridge. Kinny Creek flows thru stand.
81	4199 - Other Mixed Upland Deciduous	High Density Log	22.2	81		Mainly upland with some lowland pockets. Headwaters of Peter's Creek wander thru stand. Good buffer and critter corridor.
82	6132 - Mixed Lowland Forest with Cedar	High Density Pole	6.5	104		YB present.
83	42110 - Planted Red Pine	Medium Density Log	17.1	79	81-110	Peter's Creek Ski Trail runs thru stand.
84	42110 - Planted Red Pine	High Density Sapling	22.0	16		Plantation doing nicely. Occasional JP.
85	4133 - Aspen, Mixed Pine	High Density Pole	26.0	41		Some areas more pure aspen, other areas more mixed with conifer. Several small open areas. JP & WP scattered along opening edges.
90	4139 - Aspen, Mixed Deciduous	Medium Density Pole	3.7	42		WP limby, open grown. Old field filling in over the years.
91	4130 - Aspen	High Density Sapling	7.4	16		Red maple left along north edge for visuals. Includes some open areas with some larger remnant trees.
92	42110 - Planted Red Pine	Medium Density Log	22.9	79	81-110	Thinned 1997. Variable residual BA. Left all RP, WP, beech, WB and YB. Occasional YB & Beech.
93	42110 - Planted Red Pine	Low Density Log	15.2	79	1-50	Peter's Creek Ski Trail runs thru stand.
94	6119 - Mixed Lowland Deciduous Forest	Medium Density Pole	2.5	86		Low wet area.
95	42110 - Planted Red Pine	High Density Sapling	25.3	14		This stand was not burned, just trenched and hand planted. Will be good for comparison of burned vs. unburned plantations when adjacent Abandoned Axle sale is burned (in compartment 164). Includes some non-pine areas.
96	42110 - Planted Red Pine	High Density Log	52.5	79	111-140	An occasional WP and RP 3'-5' tall; more so on the western edge where it is more open. Peter's Creek Ski Trail runs thru stand.



Stand	Cover Type	Acres	Managed Site	Management Priority (Objective)	General Comments:
3	310 - Herbaceous Openland	11.2	Yes	Medium	Edison-Sault power line R-O-W.
9	622 - Lowland Shrub	1.8	Unspecified	Unspecified	Edison-Sault power line R-O-W.
10	320 - Upland Shrub	2.2	No	Unspecified	Contains some unmerchantable pine and aspen. Good for wildlife.
11	310 - Herbaceous Openland	1.5	Yes	Medium	Edison-Sault power line R-O-W.
15	50 - Water	12.1	No	Unspecified	Headwaters of Kinny Creek
16	622 - Lowland Shrub	2.1	Unspecified	Unspecified	Low, bog area on Edison-Sault power line R-O-W, with Cranberry Lake Road bisecting it.
18	310 - Herbaceous Openland	3.3	Yes	Medium	Edison-Sault power line R-O-W.
23	320 - Upland Shrub	6.1	No	Unspecified	Mostly open. WP of various sizes - 4" max dbh but short, bushy. Cherry shrubs - small. Scattered JP, A, etc.
29	50 - Water	16.5	No	Unspecified	Headwaters of Kinny and Peter's Creek.
35	622 - Lowland Shrub	39.9	No	Unspecified	Headwaters of Kinny and Peter's Creek.
40	320 - Upland Shrub	4.1	No	Unspecified	
47	622 - Lowland Shrub	5.0	No	Unspecified	Seasonally wet bog/pond.
48	622 - Lowland Shrub	6.0	No	Unspecified	Seasonally wet.
49	310 - Herbaceous Openland	2.4	No	Unspecified	Southern area burned with adjacent pine underburn.
50	629 - Mixed non-forested wetland	19.7	No	Unspecified	Some scattered trees.
52	3102 - Grass	6.0	Yes	Medium	Edison-Sault power line R-O-W.
59	11 - Low Intensity Urban	3.1	Yes	Medium	State Police radio tower site.
62	629 - Mixed non-forested wetland	1.9	No	Unspecified	



Stand	Cover Type	Acres	Managed Site	Management Priority (Objective)	General Comments:
63	122 - Road/Parking Lot	6.9	Yes	Medium	Railroad R-O-W
64	629 - Mixed non-forested wetland	14.9	No	Unspecified	Scattered C & T.
65	122 - Road/Parking Lot	9.8	Yes	Medium	H-40
66	622 - Lowland Shrub	2.4	No	Unspecified	Between RR and H-40.
68	622 - Lowland Shrub	2.6	No	Unspecified	Skinny strip along H-40. Scattered trees - T & C.
69	622 - Lowland Shrub	4.8	No	Unspecified	
71	3303 - Mixed Low Density Trees	2.1	No	Unspecified	Between RR and H-40. Scattered trees.
72	622 - Lowland Shrub	2.6	No	Unspecified	Headwaters of Peter's Creek
73	330 - Low-Density Trees	1.2	No	Unspecified	Between RR and H-40
75	50 - Water	4.3	No	Unspecified	Geese often nest here.
76	622 - Lowland Shrub	4.5	No	Unspecified	
86	3204 - Mast Producing Shrub	22.1	No	Unspecified	Small areas have filled in with JP. Old Township Dump located in southwest corner of stand. Hawthorn located in southeast corner of stand (planted by W/L).
87	3303 - Mixed Low Density Trees	7.0	No	Unspecified	Mainly G with old WP stumps. Scattered red maple. Herbicided in 1973. Peter's Creek Ski Trail runs thru stand.
88	622 - Lowland Shrub	4.2	No	Unspecified	
89	622 - Lowland Shrub	15.1	No	Unspecified	Kinny Creek.