Compartment Review Presentation

Sault Ste. Marie Forest Management Unit

Compartment 45142
Entry Year 2022
Acreage: 1,910
County Mackinac
Management Area: Lake Michigan Shoreline

Revision Date: 2020-07-29

Stand Examiner: Kenny Fanelli

Legal Description:

T42N R7W Sec. 3, 4, & 5, Hendricks Township
T43N R7W Sec. 7, Hendricks Township

Identified Planning Goals:

The compartment has been managed in the past for red pine, northern hardwoods, and aspen. This entry period, management efforts will focus on the final harvest of the remaining mature red pine in the compartments as well as harvesting aspen mixed stands throughout. Other activities include the continued monitoring of young red pine plantations for prospective pests. Almost all of the hardwood stands in the compartment have been impacted by beech bark disease resulting in a loss of stocking and thick beech regeneration.

Soil and topography:

Level to gently rolling topography with the exception of the steep escarpment ridge that runs just south of and parallel to US-2. Wallace sands dominate the entire compartment north of US-2. Histosols and Aquents, Markey-Carbondale Muck, Leafriver-Croswell complex, and Esau-Zela complex
soils are present in the lower topography south of US-2.

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

There are large private holdings along the Lake Michigan shoreline and US-2. There are also a few scattered small private holdings.

Unique Natural Features:

MNFI has identified potential for several protected species in this compartment.

Archeological, Historical, and Cultural Features:

None

Special Management Designations or Considerations:

Pipeline ROW corridors pass through the compartment. The shoreline areas and travel along US-2 require special management considerations.

Watershed and Fisheries Considerations:

This compartment contains upper stream reachs of Paquin
Creek. Paquin Creek is a cold-water stream that supports stream-resident fish community of brook trout, pearl dace, slimy sculpin, central mudminnow, brook stickleback. Paquin Creek is also important that is supports natural reproduction of Lake Michigan potadromous fishes such as steelhead, Chinook salmon, and coho salmon. Implementation of BMP's 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 is part of the Lake Michigan Shoreline MA where featured wildlife species are piping plover and white-tailed deer. A steep hill south of US-2 separates areas within the compartment. The southwestern portion south of US-2 is dominated by lowland conifer swamp but touches Lake Michigan and contains areas of Great Lakes coastal marsh. These habitats support a number of rare features and contains Great Lakes Marsh ERAs. The majority of the compartment is in an upland setting on sandy soils primarily north of US-2 and contains aspen, northern hardwoods, and red pine. Upland stands have been managed while lowland areas near Lake Michigan have primarily been protected. Portions of the compartment are part of deer wintering complex. The lowland conifer stands near Lake Michigan provide cover for wintering deer. Some other areas provide food resources.

Wildlife objectives include protecting rare species and habitats near Lake Michigan including the coastal marsh, retaining the lowland conifer areas south of US-2, maintaining early successional habitat, encouraging diversity in northern hardwood and red pine stands, and preventing the spread of invasive species. Aspen stands are in varying age classes, and some will be treated with the goal of regenerating young aspen habitat that will benefit deer, ruffed grouse and numerous other bird species, snowshoe hare, and a variety of other wildlife. A stream corridor will be left to protect the riparian habitat and travel corridor. Lowland areas south of US-2 including the ERAs will be left to protect the coastal marsh and associated habitat as well as cover for wintering deer.

Mineral Resource and Development Concerns and/or Restrictions

Surface sediments consist of lacustrine (lake) sand and gravel. There is upwards to 100 feet of Glacial Drift thickness. The Silurian Engadine Group subcrops below the Glacial Drift. The Engadine is quarried for stone/limestone elsewhere in the UP. The nearest gravel pit is two miles to the east. There may be some gravel potential in the compartment. There is no economic oil and gas production in the UP. Portions of the land is surface only.

Vehicle Access:

Access is very good throughout the entire compartment. US-2, Hiawatha trail, Paquin Creek Rd., and Epoufette Bay Rd. are the main roads in the compartment. Pipeline ROW's and two-tracks offer access to the compartment interior.

Survey Needs:

No survey needs for proposed treatments this entry period.

Recreational Facilities and Opportunities:

Snowmobile trail runs through the compartment along pipeline ROWs and Paquin Creek Rd. Deer, grouse, rabbit, and bear hunting are common in this compartment. Mushroom and Blueberry picking is also possible along pipeline ROWs.

Fire Protection:

There is potential for fire ignition in this compartment from the heavy recreational use. There are extensive areas of pine fuels in this compartment. Access in this compartment is very good, with
no area being greater than .5 miles from US-2, Hiawatha Trail, or Paquin Creek Rds. Pipeline ROW's and two-tracks offer extensive access into the compartment interior and act as fire breaks. Available water sources would include: Paquin Creek and Lake Michigan.

Additional Compartment Information:

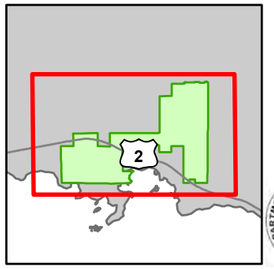
The following reports from the Inventory are attached:

- **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 & Treatments Map



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T42N R07W, Sec. 3-5, T43N R07W, Sec. 34
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YOE: 2022
Acres: 1,910 GIS Calculated
Examiner: Kenny Fanelli
Map Revised: 8/10/2020
Map Phase: Web Post

Lorem Ipsum

- Miris Corners
- Remonumented Section Corners
- Survey Grade Corners
- Counties
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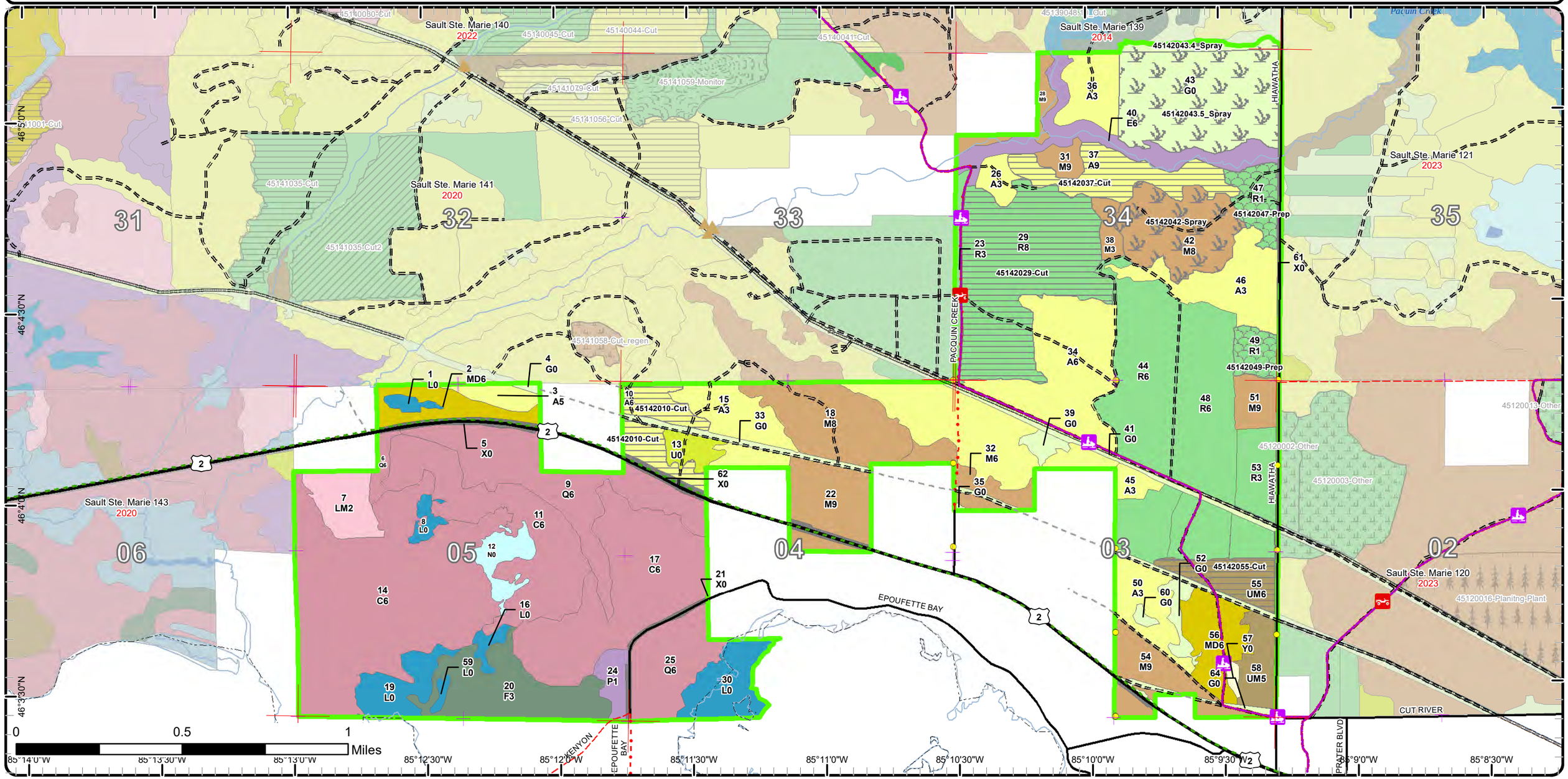

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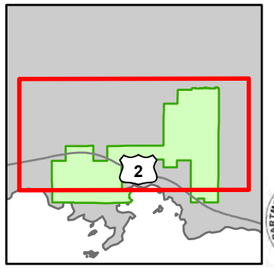

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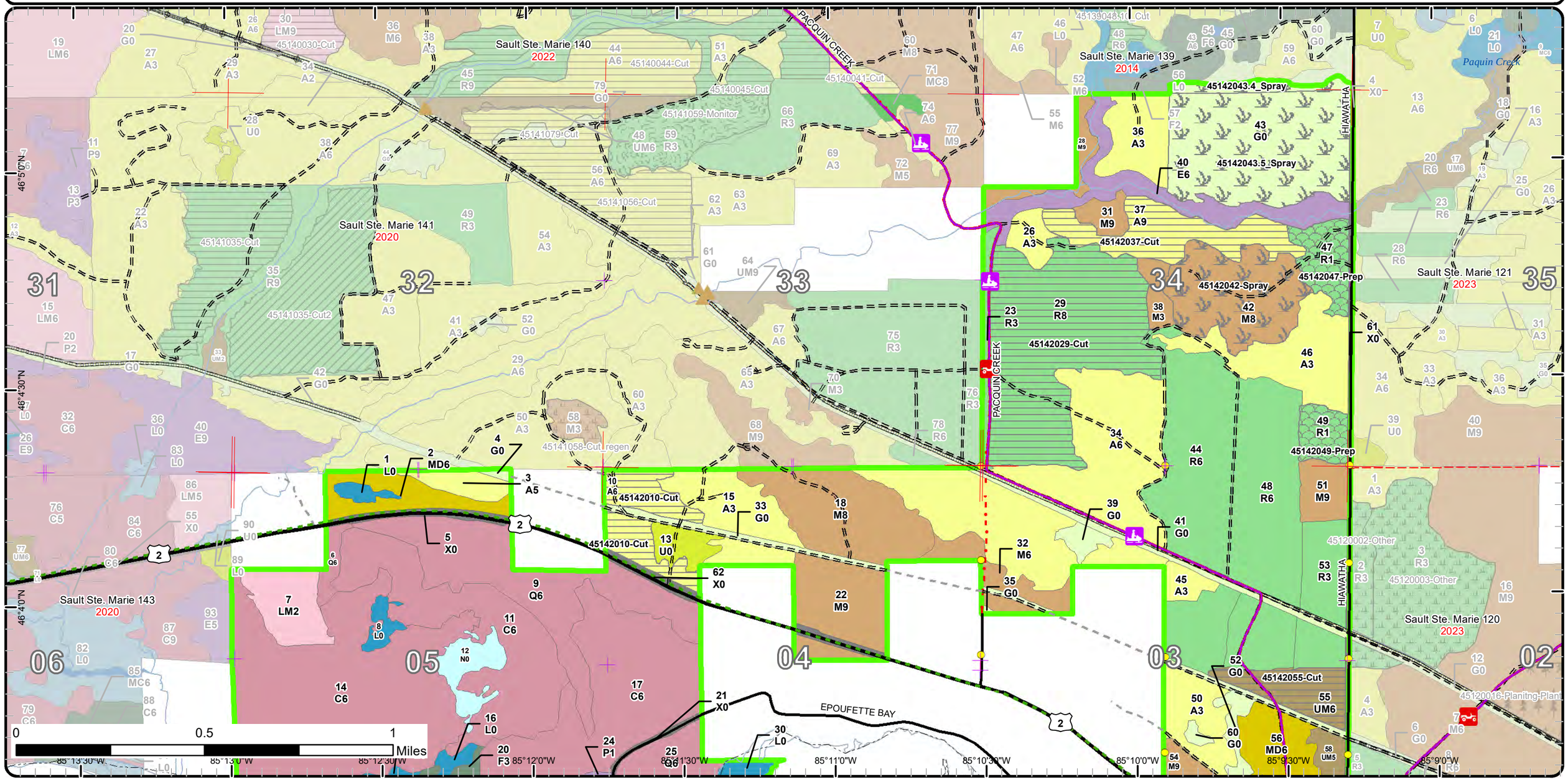

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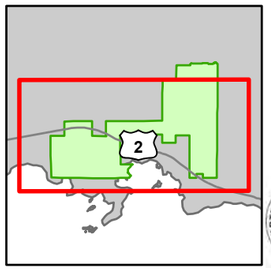

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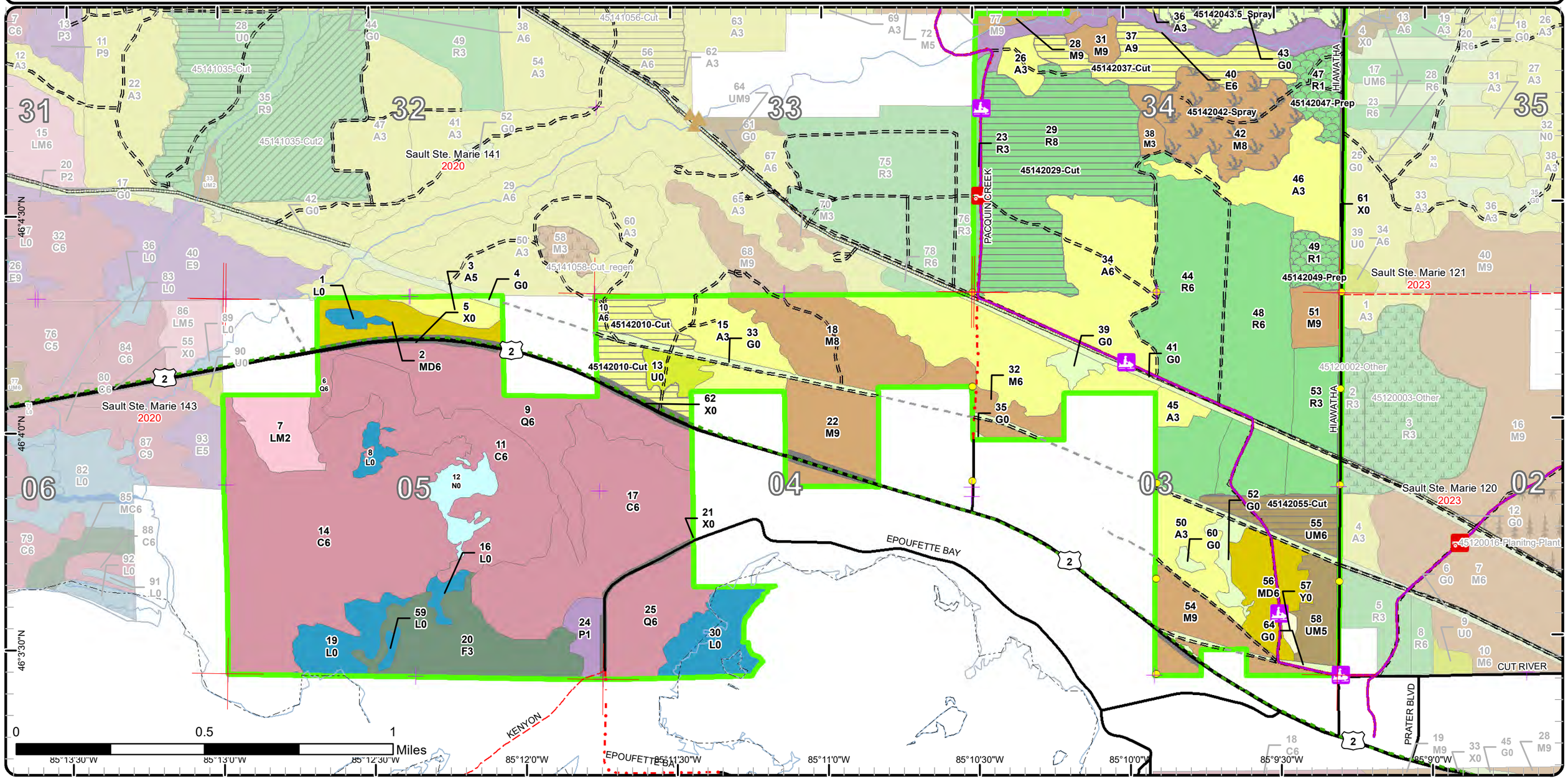
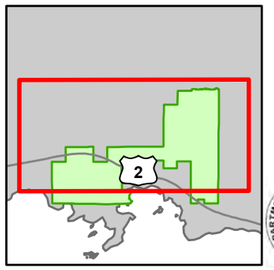


Stand Boundary Map



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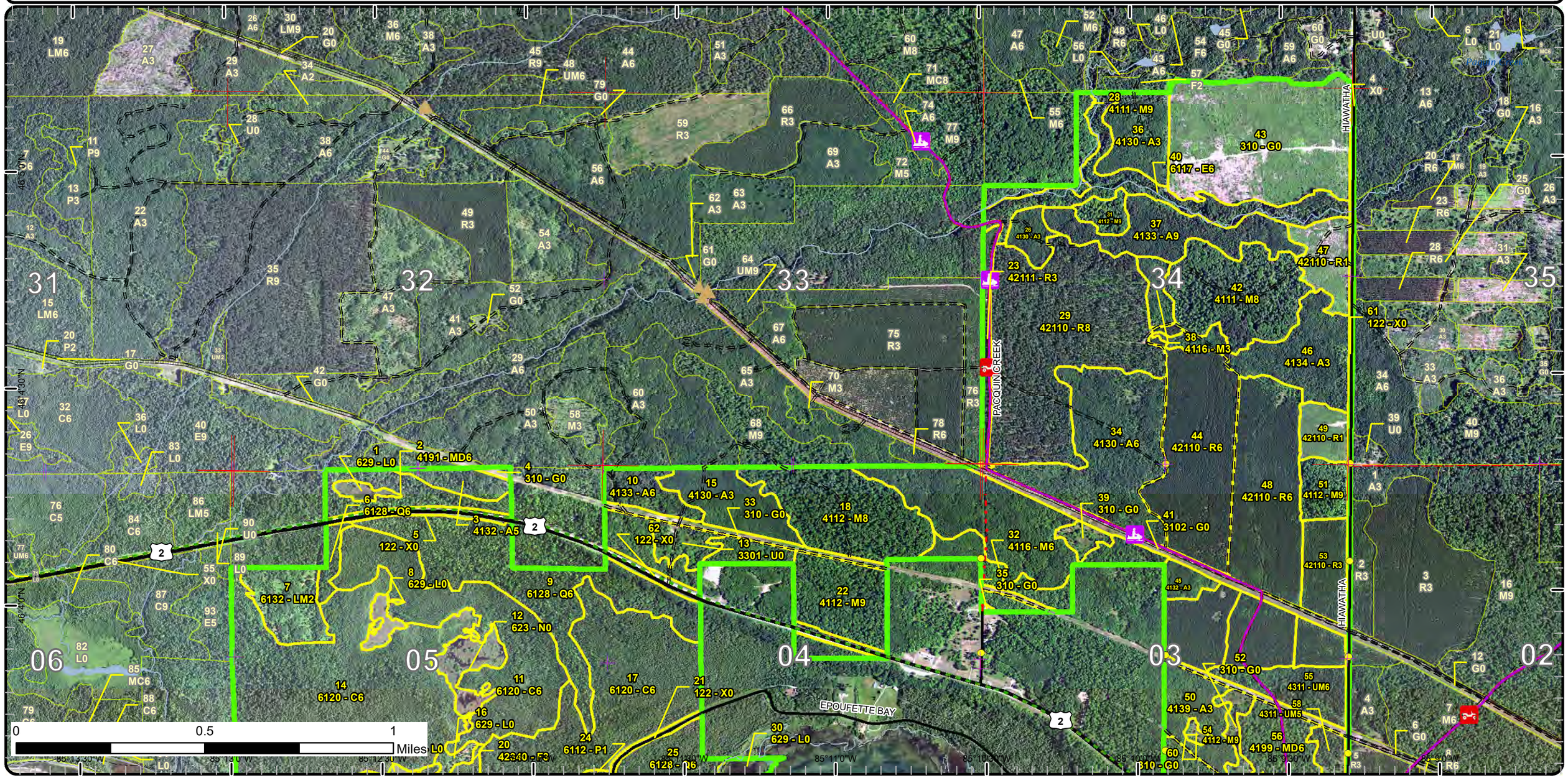

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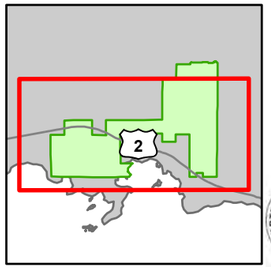

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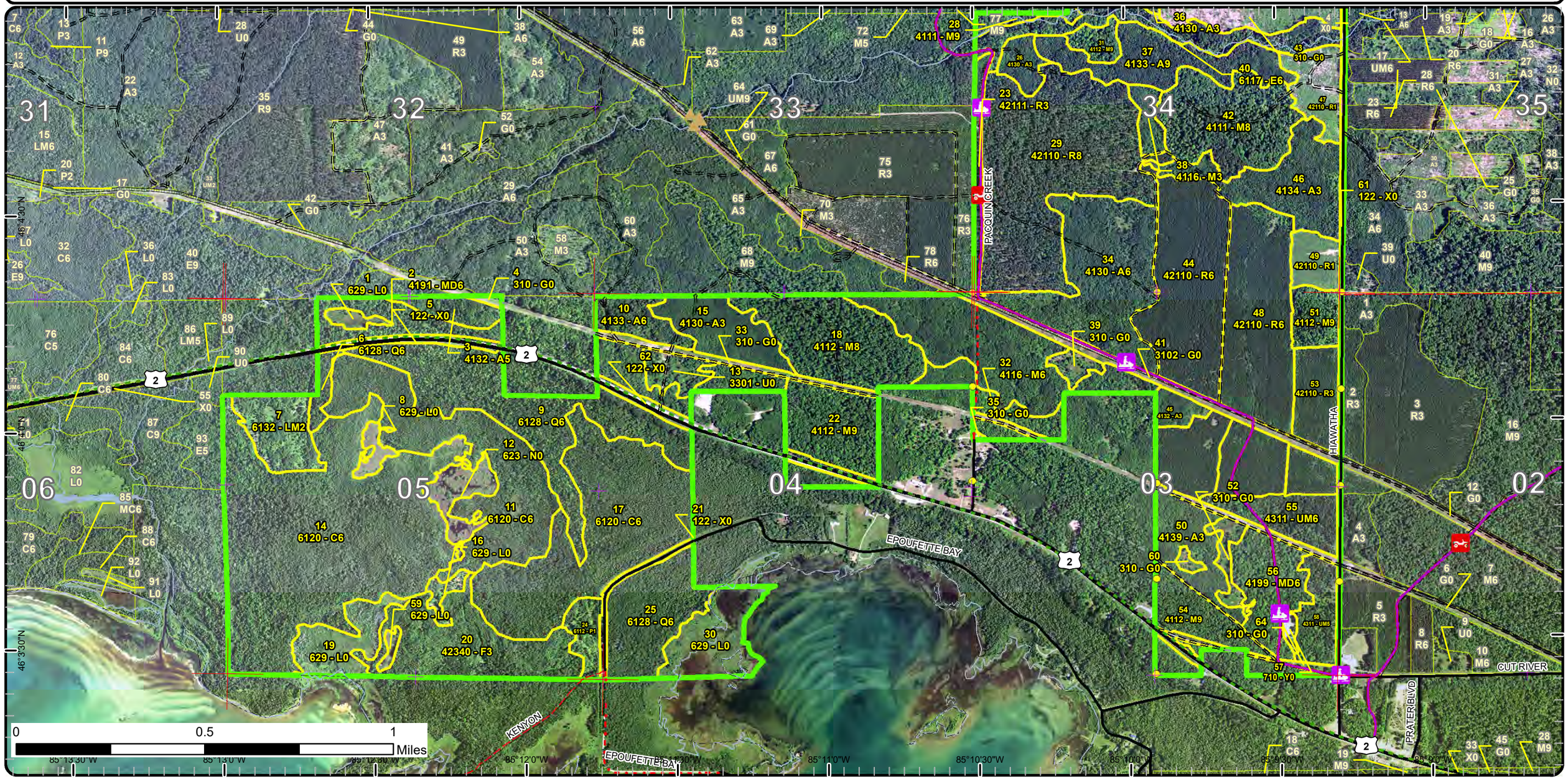
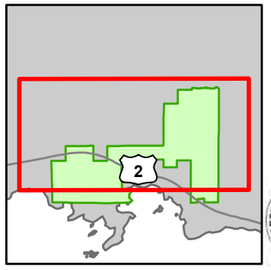


Special Conservation Areas



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- 3A: Conservation Values incompatible with harvest at this time
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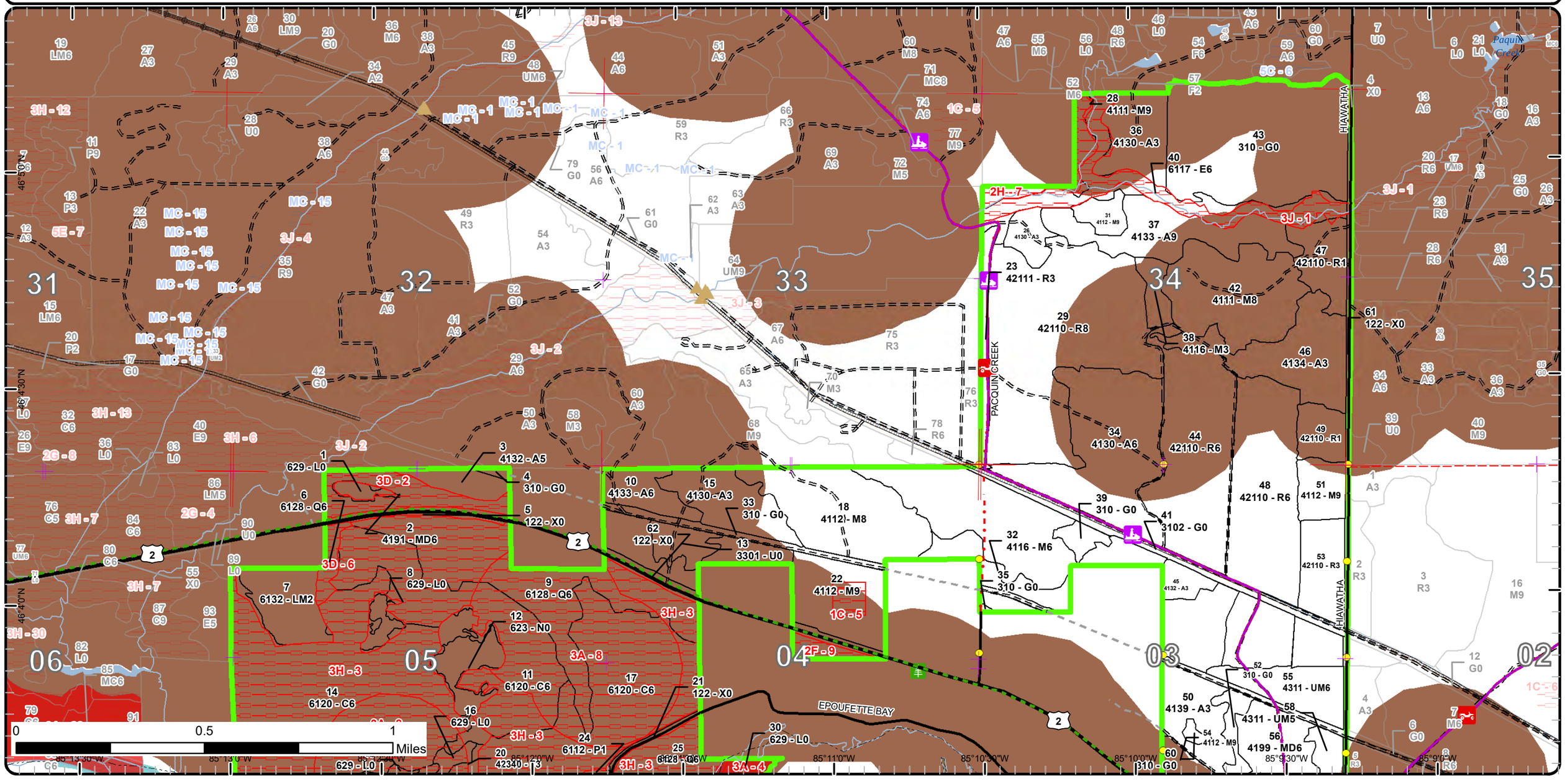

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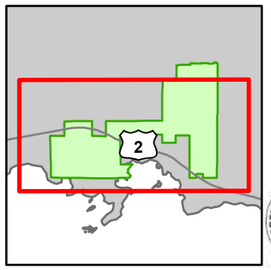

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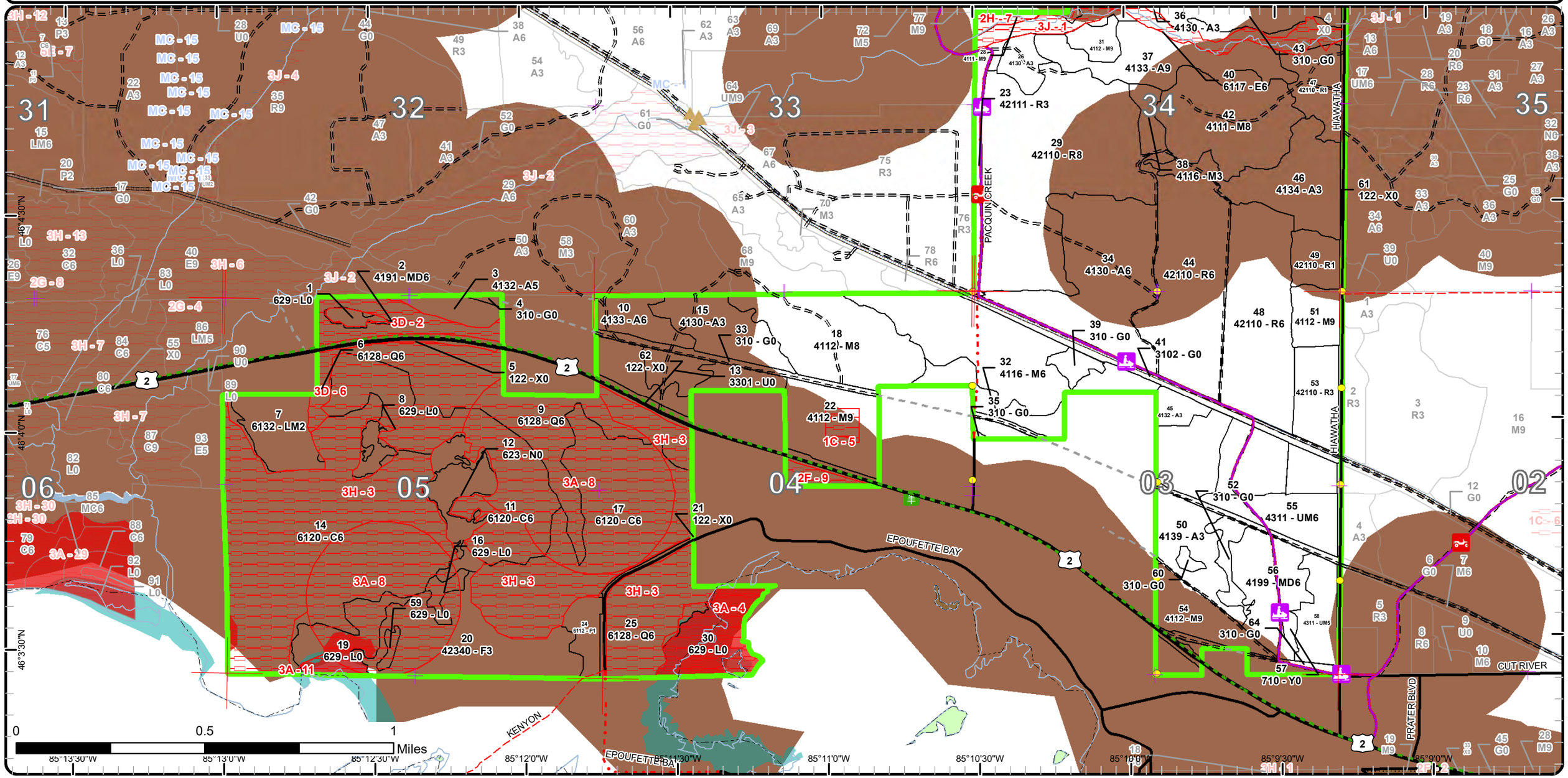

Report 1 – Total Acres by Cover Type and Age Class

Sault Ste. Marie Mgt. Unit **Compartment 142 Year of Entry 2022**

Kenny Fanelli : Examiner

Age Class

	Non-Forest	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+	Uneven-Aged	Total
Aspen	0	0	0	64	82	163	38	0	0	0	0	0	0	0	0	0	0	0	**347**
Cedar	0	0	0	0	0	0	0	0	0	0	0	0	285	80	0	0	0	0	**365**
Herbaceous Openland	148	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**148**
Low-Density Trees	10	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**10**
Lowland Aspen/Balsam Poplar	0	0	0	0	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	0	0	6	39	0	76	0	0	0	0	**121**
Lowland Deciduous	0	0	0	0	0	0	0	40	0	0	0	0	0	0	0	0	0	0	**40**
Lowland Mixed Forest	0	0	0	22	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**22**
Lowland Shrub	65	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**65**
Marsh	14	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**14**
Mixed Upland Deciduous	0	0	0	0	0	0	30	20	0	0	0	0	0	0	0	0	0	0	**50**
Northern Hardwood	0	0	0	0	8	0	25	0	143	51	0	0	0	0	0	0	0	0	**227**
Red Pine	0	29	29	185	0	0	0	0	0	121	0	0	0	0	0	0	0	0	**364**
Sand, Soil	2	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**2**
Upland Mixed Forest	0	0	0	17	21	0	0	0	0	0	0	0	0	0	0	0	0	0	**38**
Upland Spruce/Fir	0	0	0	0	54	0	0	0	0	0	0	0	0	0	0	0	0	0	**54**
Urban	35	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	**34**
Total	**274**	**29**	**29**	**288**	**175**	**163**	**93**	**60**	**143**	**172**	**6**	**39**	**285**	**156**	**0**	**0**	**0**	**0**	**1911**

Report 2 – Treatment Summary

Sault Ste. Marie Mgt. Unit

Year of Entry: 2022

Compartment 142

Total Compartment Acres: 1,910

Acres of Harvest

Commercial Harvest - 206

Harvests with Site Condition - 0

Next Step Harvest - 0

Habitat Cut - 0

Cover Type by Harvest Method

	Clearcut	Selection	Patch Clearcut	Seed Tree	Shelterwood	Thinning	Overstory Removal	Salvage	Other	Total Acres
Aspen	65	0	0	0	0	0	0	0	0	**65**
Red Pine	120	0	0	0	0	0	0	0	0	**120**
Upland Mixed Forest	21	0	0	0	0	0	0	0	0	**21**
Total	**206**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**0**	**206**

Proposed and Next Step Treatments by Method

	Harvest	Site Prep	Planting	Seeding	Burning	Pesticide	Monitoring	Other	Non-Forest Mgt.	Total Acres
Current	206	29	0	0	0	148	0	0	0	**383**
Next Step	0	149	149	0	120	276	539	0	0	**1232**
Total	**206**	**178**	**149**	**0**	**120**	**424**	**539**	**0**	**0**	**1615**

Stand	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Habitat Cut

Proposed Treatments:

10	**45142010-Cut**	27.5	4133 - Aspen, Mixed Pine	Poletimber Well	47	Unspecified	Harvest	Clearcut with Retention	413 - Aspen	Even-Aged	No

Prescription Specs: Clear cut all hardwoods to 2 inches and conifers to 4 inches. Mark retention pockets as well as some individual trees to meet the retention requirements.

Next Step Treatments: Monitoring, Natural Regen (Re-Inventory)

Acceptable Regen: A mix of aspen, red maple, white pine, birch, spruce, and fir.

Other Comment:

Site Condition

Proposed Start Date: 10/1 /2021

29	**45142029-Cut**	119.6	42110 - Planted Red Pine	Sawtimber Medium	82	81-110	Harvest	Clearcut with Retention	4211 - Planted Red Pine	Even-Aged	No

Prescription Specs: Clear cut all species down to two (2) inches. Retain red pine along the sale boundary adjacent to stand 37 and 38.

Next Step Treatments: Burn, Slash; SitePrep, Trenching; Planting, Initial Plant; Pesticide, Aerial - Site Prep; Pesticide, Aerial - Release; Monitoring, Artificial Regen(1yr); Monitoring, Artificial Regen(3yr)

Acceptable Regen: Red Pine

Other Comment:

Site Condition

Proposed Start Date: 10/1 /2021

37	**45142037-Cut**	37.5	4133 - Aspen, Mixed Pine	Sawtimber Well	54	81-110	Harvest	Clearcut with Retention	4133 - Aspen, Mixed Pine	Two-Aged	No

Prescription Specs: Clear cut all species down to two (2) inches except white pine, cedar, and hemlock if present. Apply appropriate buffer to the northern boundary along Paquin Creek. Mark an additional retention pocket around around one of the red pine pockets found within the stand.

Next Step Treatments: Monitoring, Natural Regen (Re-Inventory)

Acceptable Regen: Moderately to fully stocked aspen, red pine, white pine, red maple, sugar maple, birch, spruce, or fir.

Other Comment:

Site Condition

Proposed Start Date: 10/1 /2021

Stand	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Habitat Cut
42	45142042-Spray	51.3	4111 - S.Maple, Hard Mast Association	Sawtimber Medium	82	51-80	Pesticide	Hand Application	411 - Northern Hardwood	Even-Aged	No

Prescription Specs: Spray for garlic mustard.

Next Step Treatments: Monitoring, Invasive Species

Acceptable Regen:

Other Comment: Hand pull when able.

Site Condition

Proposed Start Date: 10/21/2020

Stand	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Habitat Cut
47	45142047-Prep	17.6	42110 - Planted Red Pine	Sapling Poor	4	Immature	SitePrep	Roller Chopping	4211 - Planted Red Pine	Even-Aged	No

Prescription Specs: This stand is being restarted after it failed regeneration. Roller chop and follow up with spraying and replanting.

Next Step Treatments: Pesticide, Aerial - Site Prep; Planting, Replant; Monitoring, Artificial Regen(1yr); Monitoring, Artificial Regen(3yr); SitePrep, Trenching

Acceptable Regen: Fully stocked red pine.

Other Comment:

Site Condition

Proposed Start Date: 10/1 /2021

Stand	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Habitat Cut
49	45142049-Prep	11.6	42110 - Planted Red Pine	Sapling Poor	4	Immature	SitePrep	Roller Chopping	4211 - Planted Red Pine	Even-Aged	No

Prescription Specs: This stand is being restarted because of failed regeneration. Roller chop and follow up with spraying and replanting.

Next Step Treatments: Pesticide, Aerial - Site Prep; SitePrep, Trenching; Planting, Replant; Monitoring, Artificial Regen(1yr); Monitoring, Artificial Regen(3yr)

Acceptable Regen: Fully stocked red pine.

Other Comment:

Site Condition

Proposed Start Date: 10/1 /2021

Stand	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Habitat Cut
55	45142055-Cut	21.0	4311 - Pine, Aspen Mix	Poletimber Well	36	81-110	Harvest	Clearcut with Retention	4319 - Mixed Upland Forest	Even-Aged	No

Prescription Specs: Clear cut all species down to two inches. Mark a retention pocket on the east side of the stand but at least one tree length away from any right of way.

Next Step Treatments: Monitoring, Natural Regen (Re-Inventory)

Acceptable Regen: A mix of aspen, jack pine, red maple, cherry, and birch.

Other Comment:

Site Condition

Proposed Start Date: 10/1 /2021

Approved Treatments:

Stand	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Habitat Cut
43	45142043.4_Spray	7.7	310 - Herbaceous Openland	Nonstocked	0	Unspecified	Pesticide	ERROR	4211 - Planted Red Pine	Even-Aged	No

Prescription Specs: Release RP

Next Step Treatments: ; ; Monitoring, Artificial Regen(3yr); Monitoring, Herbicide Use; Pesticide, (Inactive)Aerial

Acceptable Regen: RP

Other Comment: Percent to Treat = 100%

Site Condition

Proposed Start Date: 10/1 /2019

Stand	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Habitat Cut
43	45142043.5_Spray	88.8	310 - Herbaceous Openland	Nonstocked	0	Unspecified	Pesticide	ERROR	4211 - Planted Red Pine	Even-Aged	No

Prescription Specs: Spray to release RP.

Next Step Treatments: Monitoring, Herbicide Use

Acceptable Regen:

Other Comment: only about 1/2 of this stand needs to be sprayed.

Site Condition

Proposed Start Date: 10/1 /2019

Total Treatment Acreage Proposed: **382.6**

Report 4 – Site Conditions

Sault Ste. Marie Mgt. Unit

Kenny Fanelli : Examiner

Compartment: 142

Year of Entry: 2022

Availability for Management

Total Acres	Acres Available	*Acres Avail With Condition*	Acres Not Available		Dominant Site Conditions 1C	2F	2H	3A	3D	3H	3J
347	346	*0*	0	**Aspen**							0
364	15	*0*	350	**Cedar**				132		218	
148	147	*0*	0	**Herbaceous Openland**							0
10	10	*0*	0	**Low-Density Trees**							
10	10	*0*	0	**Lowland Aspen/Balsam Poplar**							
121	0	*0*	120	**Lowland Conifers**				35	6	80	
40	8	*0*	32	**Lowland Deciduous**							32
22	22	*0*	0	**Lowland Mixed Forest**							
65	13	*0*	52	**Lowland Shrub**				52	1	0	
14	14	*0*	0	**Marsh**							
50	30	*0*	20	**Mixed Upland Deciduous**					20		
227	207	*0*	20	**Northern Hardwood**	5	5	10				1
364	364	*0*	0	**Red Pine**							0
2	2	*0*	0	**Sand, Soil**							
38	38	*0*	0	**Upland Mixed Forest**							
54	33	*0*	21	**Upland Spruce/Fir**				21			
34	34	*0*	0	**Urban**							0
1,910	1,294		616	Total Forested Acres	5	5	10	240	26	297	33
	68%		32%	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
1	**Unavailable**	**3J: Water quality / BMPs (stream, river, or lake)**	33	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
2	**Unavailable**	**3D: Recreational / Scenic values**	21	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						

3	**Unavailable**	**3H: Deer Wintering Area - habitat is incompatible with harvest at this time**	297	Unspecified	Unspecified	Unspecified	Unspecified

Comments:

4	**Unavailable**	**3A: Conservation Values incompatible with harvest at this time**	30	Unspecified	Unspecified	Unspecified	Unspecified

Comments:
ERA

5	**Unavailable**	**1C: Other dept or div proc/practices**	5	Unspecified	Unspecified	Unspecified	Unspecified

Comments:
Walters Research Project: Long-term beech regeneration monitoring, up to 20 years (through 2039)

6	**Unavailable**	**3D: Recreational / Scenic values**	6	Unspecified	Unspecified	Unspecified	Unspecified

Comments:

7	**Unavailable**	**2H: Blocked by physical obstacle (e.g. upland stand in a lowland area)**	10	Unspecified	Unspecified	Unspecified	Unspecified

Comments:

8	**Unavailable**	**3A: Conservation Values incompatible with harvest at this time**	206	Unspecified	Unspecified	Unspecified	Unspecified

Comments:
ERA

9	**Unavailable**	**2F: Too steep**	5	Unspecified	Unspecified	Unspecified	Unspecified

Comments:

11	**Unavailable**	**3A: Conservation Values incompatible with harvest at this time**	4	Unspecified	Unspecified	Unspecified	Unspecified

Comments:
ERA

Report 5 – 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 6 – 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	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	Great Lakes Islands	Great Lakes Islands provide significant habitat for numerous species, including many rare plants and animals, several of which are endemic or largely restricted to the Great Lakes region. Due to their isolation, islands provide good examples of many Great Lakes-associated natural communities and ecosystems, and thus have potential to provide insights for understanding the consequences of human disturbance on the increasingly fragmented ecosystems of the mainland.
SCA	Habitat Area	An area that provide some specific need for the life cycle of wildlife species, including State Wildlife Areas and Waterfowl Production Areas, deer wintering complexes in lowland conifer communities, grassland openings and savannas. Habitat areas are distinct from critical habitat designated for recovery of endangered or threatened species (such as Kirtland's warbler or piping plover areas) in that they are more general in nature, are not primarily associated with threatened or endangered species, and are not covered by species recovery plans that are developed in cooperation with Federal agencies.
SCA	Visual Management Area	An area of general social appreciation that is managed to recognize and preserve a particular visual value. Examples of these areas include scenic vistas, scenic or natural beauty roads, and lakeshore areas.
HCVA	Coastal Environmental Areas	The public designation process is defined by Part 323, Shorelands Protection and Management, of the Natural Resources and Environmental Protection Act, 1994 PA 451. The program is administered by the Michigan Department of Environmental Quality (DEQ). This is an inactive program with no new areas currently under consideration by the DEQ.
ERA	Ecological Reference Areas	Ecological Reference Areas (ERAs) are high quality examples of natural communities that have been identified as Element Occurrences (EOs) by the Michigan Natural Features Inventory (MNFI) within the context of their natural community classification system. Element Occurrences with viability ranks of A (Excellent) or B (Good) and a Global (G) or State (S) element (rarity) ranking of endangered (1), threatened (2), or rare (3) serve as an initial base of ERAs. They may be located upon any ownership in the State. The system is comprised of individual or associations of natural community types that are managed for restoration and maintenance of natural ecological processes and values. The public may submit recommendations for lands as ERAs using the DNR Conservation Area Recommendation Form.

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
1	629 - Mixed non-forested wetland	Nonstocked	3.6			No	
2	4191 - Mixed Upland Deciduous with Conifer	Poletimber Well	20.3	69	81-110	N/A	Stand is steep ridge that runs along u.s. 2. Possibly harvest north portion next entry, more aspen, but small dia. currently. Part along highway will not be merchantable.
3	4132 - Aspen, Jack Pine	Poletimber Medium	9.9	37	51-80	N/A	Variable mixed stand of small poor quality deciduous and jp. The aspen is ok quality, but still quite small.
4	310 - Herbaceous Openland	Nonstocked	1.2			No	Pipeline
5	122 - Road/Parking Lot	Nonstocked	6.9			No	
6	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	5.7	99	111-140	N/A	Original State Notes: Variable stand on gradiating slope along u.s.2. Stand is mix of birch, mr, cedar, hemlock, wp and some aspen. Low ground and wet on southern end. Gradiates into purer cedar. 06/13/2010
7	6132 - Mixed Lowland Forest with Cedar	Sapling Medium	22.4	24		N/A	Original Notes: Cut in 1996. Mack. mix of aspen, birch, bam, balsam. Cedar residual in pockets looks ok. 6/1/2010

Stand 2

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	20	Pole	6	
Paper Birch	30	Pole	7	69
Quaking Aspen	20	Pole	7	
Balsam Fir	20	Pole	6	

Sub-Canopy Species	Density	Avg. Height	Size
Balsam Fir	Medium	5 - 10 feet	Sapling
Maple (spp.)	Low	Variable	Sapling

Stand 3

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	15	Pole/Sapling	5	
Paper Birch	10	Pole	5	
Quaking Aspen	40	Pole/Sapling	5	37
Jack Pine	20	Sapling/Pole	4	
Black Cherry	15	Sapling	4	

Stand 6

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	15	Pole	8	
Paper Birch	20	Pole/Sapling	7	
Balsam Fir	10	Pole	5	
Northern White Cedar	40	Pole	8	99
White Pine	5	Pole/Log	5	

Sub-Canopy Species	Density	Avg. Height	Size
Balsam Fir	Medium	5 - 10 feet	Sapling

Stand 7

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	5	Sapling	3	
Paper Birch	5	Sapling/Pole	3	
Quaking Aspen	40	Sapling/Pole	4	24
Balsam Poplar	5	Sapling/Pole	4	
Balsam Fir	15	Sapling/Pole	4	
Northern White Cedar	30	Pole/Sapling	6	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
8	629 - Mixed non-forested wetland	Nonstocked	4.8			No	
9	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	75.5	120		N/A	Original Stand Notes: Mixed stand of variable quality cedar. Areas of w.p. overstory w/ hemlock, especially along escarpment. Obviously wetter along bottom lands along base of escarpment with numerous seeps. 6/1/2010
10	4133 - Aspen, Mixed Pine	Poletimber Well	27.5	47	Unspecified	N/A	Upland mackinac mix with a variety of size classes. Larger diameters on the south side of the pipeline.
11	6120 - Lowland Cedar	Poletimber Well	79.7	120	Unspecified	N/A	Original Stand Comment: Mostly old, poorer quality cedar. Deer sign, but not a lot. Very wet ground around inside edge. Some open patches with tag. Hemlock presence along fringe. 6/1/2010
12	623 - Emergent Wetland	Nonstocked	14.1			No	
13	3301 - Low Density Deciduous Trees	Nonstocked	9.9			No	
14	6120 - Lowland Cedar	Poletimber Well	181.9	115	Unspecified	N/A	Original Stand Comment: Large cedar stand. Varies from very wet in the east/northeast to not so wet and more species to west. 6/1/2010

Stand 9

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	15	Pole	9	
Paper Birch	10	Pole/Sapling	7	
Balsam Fir	20	Pole/Sapling	6	
Northern White Cedar	35	Pole/Sapling	9	120
White Pine	10	Log/Pole/XLog	15	

Sub-Canopy Species	Density	Avg. Height	Size
Balsam Poplar	Low	10 - 20 feet	Sapling
Balsam Fir	Medium	5 - 10 feet	Sapling
Tag Alder	Low	5 - 10 feet	Tall Shrub

Stand 10

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	10	Pole	6	
Paper Birch	10	Pole/Sap/Log	6	
Quaking Aspen	30	Pole	6	47
White Pine	30	Pole/Log	8	
Black Cherry	5	Sapling	4	
Bigtooth Aspen	15	Pole/Log	9	

Sub-Canopy Species	Density	Avg. Height	Size
White Pine	Medium	10 - 20 feet	Sapling
Balsam Fir	Low	Variable	Sapling

Stand 11

Canopy Species	% Cover	Size Class	DBH	Age
Balsam Fir	15	Pole/Sapling	5	
Black Spruce	10	Sapling/Pole	1	
Northern White Cedar	65	Pole/Sapling	8	120
Tamarack	5	Sapling/Pole	4	
Hemlock	5	Log/Pole	13	

Sub-Canopy Species	Density	Avg. Height	Size
Balsam Fir	Medium	5 - 10 feet	Sapling
Tag Alder	Medium	5 - 10 feet	Tall Shrub

Stand 14

Canopy Species	% Cover	Size Class	DBH	Age
Paper Birch	5	Pole/Sapling	5	
Balsam Fir	10	Pole/Sapling	6	
White Spruce	5	Pole	6	
Black Spruce	10	Sapling/Pole	1	
Northern White Cedar	70	Pole/Sapling	7	115

Sub-Canopy Species	Density	Avg. Height	Size
Conifers	Medium	5 - 10 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
15	4130 - Aspen	Sapling Well	34.1	26	51-80	N/A	CC in 1994. Aspen is doing well. Some poles but mostly premerch still.

Canopy Species	% Cover	Size Class	DBH	Age
Quaking Aspen	60	Sapling/Pole	4	26
Bigtooth Aspen	20	Pole/Sapling	5	
Balsam Fir	5	Pole/Sapling	5	
Black Cherry	5	Sapling/Pole	4	
Red Maple	10	Sapling/Pole	4	

Sub-Canopy Species	Density	Avg. Height	Size
Beech	Low	5 - 10 feet	Sapling
Red Maple	Low	< 5 feet	Seeding

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
16	629 - Mixed non-forested wetland	Nonstocked	4.3			No	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
17	6120 - Lowland Cedar	Poletimber Well	102.7	110		N/A	Original Stand Comment: Nice cedar stand. Some deer sign. Not much cedar regen. present. Wet along seep coming out from escarpment. variable with some areas heavier to balsam/ spruce. 6/1/2010

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	5	Pole/Sapling	8	
Paper Birch	15	Pole/Sapling	6	
Balsam Fir	20	Pole/Sapling	8	
White Spruce	10	Pole/Sapling	6	
Northern White Cedar	50	Pole/Sapling	8	110

Sub-Canopy Species	Density	Avg. Height	Size
Conifers	Medium	5 - 10 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
18	4112 - Maple, Beech, Cherry Association	Sawtimber Medium	56.3	79	51-80	N/A	Stand is right at the line between M7 and M8. Was thinned hard. Regen is thick with beech with only a little bit of maple making it through. It will be a long time before it can be harvested again. Beech salvaged in 2014.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	53	Log/Pole	12	79
Red Maple	35	Log/Pole	12	
Yellow Birch	10	Log/Pole	13	

Sub-Canopy Species	Density	Avg. Height	Size
Beech	High	10 - 20 feet	Sapling
Maple (spp.)	Low	Variable	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
19	629 - Mixed non-forested wetland	Nonstocked	21.9			No	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
20	42340 - Upland Spruce/Fir	Sapling Well	53.8	38	Unspecified	N/A	Original Stand Comment: Stand of mixed immature aspen and balsam/spruce. 6/1/2010 Partially clear cut in 1994 during the Club 440 Birch sale.

Canopy Species	% Cover	Size Class	DBH	Age
Quaking Aspen	20	Pole/Sapling	6	
Bigtooth Aspen	20	Pole/Sapling	5	38
Balsam Fir	50	Pole/Sapling	5	38
White Spruce	10	Sapling/Pole	5	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
21	122 - Road/Parking Lot	Nonstocked	4.8			No	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
22	4112 - Maple, Beech, Cherry Association	Sawtimber Well	37.6	71	81-110	N/A	Stand is mostly red maple and sugar maple with scattered yellow birch. Maple regen is lacking and there is thick cover of beech. Stand was thinned in 2013 as part of the Beech Barrens Firewood Sale (45-116-11-01). All beech, aspen, and fir was removed.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	40	Log/Pole	12	71
Red Maple	50	Log/Pole	12	71

Sub-Canopy Species	Density	Avg. Height	Size
Beech	High	10 - 20 feet	Sapling
Red Maple	Low	< 5 feet	Seeding

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
23	42111 - Planted Red Pine, Mixed Deciduous	Sapling Well	9.4	20	Immature	N/A	No signs of RHPS at this time.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	20	Sapling	2	
Red Pine	60	Sapling	3	20
Black Cherry	20	Sapling	2	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
24	6112 - Lowland Aspen	Sapling Poor	10.0	38	Unspecified	N/A	Clear cut as part of the 440 Club Birch sale in 1994. Low quality scattered aspen, spruce, and fir.

Canopy Species	% Cover	Size Class	DBH	Age
Quaking Aspen	65	Sapling/Pole	4	38
Bigtooth Aspen	15	Sapling/Pole	4	
Balsam Fir	10	Sapling/Pole	4	
Northern White Cedar	10	Sapling	4	

Sub-Canopy Species	Density	Avg. Height	Size
Tag Alder	High	5 - 10 feet	Tall Shrub
Tamarack	Low	10 - 20 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
25	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	39.4	100	81-110	N/A	Original Stand Comment: Poorer quality cedar along lake shore. Very wet ground, with mix of mr, and some birch. 6/13/2010

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	10	Pole/Sapling	7	
Paper Birch	15	Pole/Sapling	6	
Balsam Fir	30	Pole/Sapling	6	
Northern White Cedar	45	Pole/Sapling	7	100

Sub-Canopy Species	Density	Avg. Height	Size
Conifers	Medium	5 - 10 feet	Sapling
Tag Alder	Low	10 - 20 feet	Tall Shrub

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
26	4130 - Aspen	Sapling Well	8.6	31		N/A	Aspen has over topped most of the maple in the stand and is doing well.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	5	Sapling	4	
Red Maple	10	Sapling/Pole	4	
Quaking Aspen	55	Pole/Sapling	5	31
Bigtooth Aspen	25	Pole/Sapling	5	
Black Cherry	5	Sapling	3	

Sub-Canopy Species	Density	Avg. Height	Size
Sugar Maple	Low	Variable	Sapling
Red Maple	Medium	Variable	Sapling
Beech	Medium	Variable	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
28	4111 - S.Maple, Hard Mast Association	Sawtimber Well	10.2	53	81-110	N/A	Stand is choked by Paquin creek and private property. Its widest points is about 250' and there is no access by road. Trees vary in size between poles and logs but because of its size and location harvesting isn't viable.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	60	Log/Pole	10	53
Red Maple	25	Pole	6	
Beech	10	Log/Pole	10	
Black Cherry	5	Pole/Sapling	5	11

Sub-Canopy Species	Density	Avg. Height	Size
Beech	Low	Variable	Sapling
Sugar Maple	Medium	Variable	Sapling
Balsam Fir	Low	Variable	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
29	42110 - Planted Red Pine	Sawtimber Medium	120.6	82	81-110	N/A	Stand was thinned in 2009 in the Left Side Pine Retry sale (110-07-01). All jack pine, aspen, and hardwood was thinned from the stand. Lots of hardwood growth in the under story as well as aspen growing in the larger gaps.

Canopy Species	% Cover	Size Class	DBH	Age
White Pine	10	XLog/Log	14	
Red Pine	90	XLog/Log	14	82

Sub-Canopy Species	Density	Avg. Height	Size
Red Maple	High	Variable	Sapling
Beech	Medium	Variable	Sapling
Quaking Aspen	Low	5 - 10 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
30	629 - Mixed non-forested wetland	Nonstocked	28.6			No	ERA: Great Lake Marsh

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
31	4112 - Maple, Beech, Cherry Association	Sawtimber Well	7.3	78	51-80	N/A	A lot of beech is already dead. Heavy beech regen.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	50	Log/Pole	11	78
Red Maple	30	Log/Pole	10	
Beech	10	Log/Pole	11	
Black Cherry	10	Log/Pole	10	

Sub-Canopy Species	Density	Avg. Height	Size
Beech	High	5 - 10 feet	Sapling
Sugar Maple	Low	< 5 feet	Seeding

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
32	4116 - Mixed N. Hardwood - Aspen	Poletimber Well	14.8	55	81-110	N/A	Mix of species as well as size classes. Mostly small diameters with some logs on the east end.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	50	Pole/Log/Sap	7	55
Paper Birch	5	Pole/Sapling	5	
Beech	15	Pole/Sap/Log	6	
Bigtooth Aspen	10	Pole/Sap/Log	5	
Black Cherry	10	Sapling/Pole	4	
Quaking Aspen	10	Sapling	3	

Sub-Canopy Species	Density	Avg. Height	Size
Red Maple	Medium	5 - 10 feet	Sapling
Beech	Low	5 - 10 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
33	310 - Herbaceous Openland	Nonstocked	15.0			No	Pipeline

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
34	4130 - Aspen	Poletimber Well	135.1	42	Unspecified	N/A	CC in 1978-1983. Aspen mixed with red maple and white pine. Many parts of the stand are still immature.

Canopy Species	% Cover	Size Class	DBH	Age
Quaking Aspen	40	Pole/Sapling	5	42
Bigtooth Aspen	20	Pole	7	
Red Maple	20	Pole/Sapling	6	
White Pine	14	Log/Pole	10	
Paper Birch	5	Pole/Sapling	6	
Jack Pine	1	Pole/Sapling	6	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
35	310 - Herbaceous Openland	Nonstocked	0.4			No	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
36	4130 - Aspen	Sapling Well	23.4	25		N/A	cc in 1995. The aspen has over topped most of the other tree species but red maple, paper birch,and cherry are scattered throughout. Sugar maple saplings become prevalent as you get close to Paquin Creek on the west end.
37	4133 - Aspen, Mixed Pine	Sawtimber Well	37.5	54	81-110	N/A	Stand is mostly mature, mix of log and pole size, aspen. There are scattered pockets of red pine throughout the stand as well as a lot along the creek on the north end.
38	4116 - Mixed N. Hardwood - Aspen	Sapling Well	7.5	36	51-80	N/A	Mixed stand of variable quality red maple, sugar maple, cherry, aspen, and balsam brush. Not much size yet, very brushy.
39	310 - Herbaceous Openland	Nonstocked	5.2			No	Pipeline r.ow.
40	6117 - Lowland Deciduous, Mixed Coniferous	Poletimber Well	39.6	66	Unspecified	N/A	Creek corridor that is mix of everything. Ranges from rm/ birch to spruce/cedar w/ tag alder everywhere. No management potential ever.
41	3102 - Grass	Nonstocked	16.3			No	Pipeline r.o.w.

Stand 36

Canopy Species	% Cover	Size Class	DBH	Age
Paper Birch	5	Sapling	3	
Quaking Aspen	75	Sapling	4	25
Balsam Fir	5	Sapling	3	
Black Cherry	5	Sapling	3	
Red Maple	10	Sapling	4	

Sub-Canopy Species	Density	Avg. Height	Size
Sugar Maple	Low	Variable	Sapling
Red Maple	Medium	Variable	Sapling
Balsam Fir	Low	Variable	Sapling

Stand 37

Canopy Species	% Cover	Size Class	DBH	Age
Bigtooth Aspen	29	Pole/Log	9	54
Quaking Aspen	25	Pole/Log	9	
Red Pine	25	XLog/Log	18	87
White Pine	5	XLog	18	
Red Maple	10	Log/Pole	10	
Balsam Fir	5	Pole	6	
Hemlock	1	Pole/Log	8	

Sub-Canopy Species	Density	Avg. Height	Size
Sugar Maple	Low	Variable	Sapling
Red Maple	Low	Variable	Sapling
Balsam Fir	Low	Variable	Sapling

Stand 38

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	15	Sapling	3	
Red Maple	30	Sapling/Pole	4	36
Quaking Aspen	25	Sapling/Pole	4	
Balsam Fir	15	Sapling	3	
Black Cherry	15	Sapling	3	

Stand 40

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	20	Pole/Sapling	5	66
Paper Birch	15	Pole/Sapling	5	
Quaking Aspen	15	Sapling/Pole	4	
Balsam Poplar	15	Sapling/Pole	4	
Balsam Fir	10	Sapling/Pole	4	
White Spruce	10	Sapling	4	
Northern White Cedar	15	Pole/Sapling	5	

Sub-Canopy Species	Density	Avg. Height	Size
Balsam Fir	Medium	< 5 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
42	4111 - S.Maple, Hard Mast Association	Sawtimber Medium	51.3	82	51-80	N/A	This is a stand of almost all large sugar maple. Almost all of the beech has died of BBD. There are a lot of snags and CWD as a result. There are still live beech in the stand but they shows signs of decline. This has lead to a loss in stocking and harvesting in this stand will likely not be possible until the basal area recovers. Current BA range is from 50-90. There is a thick midstory of beech and sugar maple (15' high) as well as dense sugar maple regeneration (<12") in the under story with some moderate browsing signs.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	70	Log/XLog	15	82
Red Maple	3	Log/Pole	12	
Yellow Birch	2	Log/XLog	15	
Beech	25	Log	12	83

Sub-Canopy Species	Density	Avg. Height	Size
Sugar Maple	Medium	Variable	Sapling
Beech	High	10 - 20 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
43	310 - Herbaceous Openland	Nonstocked	96.5	0	Unspecified	4211 - Planted Red Pine	Cut in 2015. Site Prep sprayed in 9/2016. Trenched in 2016. Planted in 2017 FTP# C44-602 Passed first and third year regeneration surveys.

Sub-Canopy Species	Density	Avg. Height	Size
Red Pine	High	< 5 feet	Sapling
Black Cherry	High	Variable	Tall Shrub
Red Maple	Low	Variable	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
44	42110 - Planted Red Pine	Poletimber Well	90.9	23	111-140	N/A	Planted in 1997. Thick red pine plantation with volunteer jack pine throughout. No signs of RHPS at this time. Trees are about 30' tall.

Canopy Species	% Cover	Size Class	DBH	Age
Red Pine	90	Pole/Sapling	5	23
Jack Pine	10	Pole/Sapling	5	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
45	4132 - Aspen, Jack Pine	Sapling Well	6.6	25		N/A	Cc in 1995. Healthy aspen with mix of cherry and some jp.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	5	Sapling/Pole	4	
Quaking Aspen	55	Sapling/Pole	4	25
Jack Pine	20	Sapling	4	
Black Cherry	20	Sapling/Pole	3	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
46	4134 - Aspen, Spruce/Fir	Sapling Well	40.3	36		N/A	cc in 1984, aspen with mix of maple and spruce and balsam.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	20	Sapling	4	
Quaking Aspen	40	Pole/Sapling	5	36
Balsam Fir	15	Sapling	4	
White Spruce	5	Sapling	4	
Sugar Maple	5	Sapling	4	
Bigtooth Aspen	15	Pole/Sapling	5	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
47	42110 - Planted Red Pine	Sapling Poor	17.6	4	Immature	N/A	Planted in May of 2016. 1st year regen check done. Looks ok overall. 670 trees per acre. 3rd year regen check was 46% survival at 308 trees per acre.

Canopy Species	% Cover	Size Class	DBH	Age
Red Pine	100	Sapling	1	4

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
48	42110 - Planted Red Pine	Poletimber Well	84.7	26	111-140	N/A	Planted in 1994. Volunteer jack pine throughout. No sign of RHPS at this time. Trees are about 30' tall.

Canopy Species	% Cover	Size Class	DBH	Age
Red Pine	90	Pole/Sapling	6	26
Jack Pine	10	Sapling/Pole	4	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
49	42110 - Planted Red Pine	Sapling Poor	11.6	4	Immature	N/A	Planted May of 2016.1st year regen check done. Looks ok overall. 670 trees per acre. Release sprayed in 2016. Continue to monitor for pest and release, and spray as needed. 3rd year regen due in 2019. 3rd year regen check 46% of the trees survived 308 trees per acre.

Canopy Species	% Cover	Size Class	DBH	Age
Red Pine	100	Sapling	1	4

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
50	4139 - Aspen, Mixed Deciduous	Sapling Well	23.5	34	Immature	N/A	Aspen has taken over as the dominant species with a lot of red maple also. Mostly still premerch with some poles.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	30	Sapling	3	
Paper Birch	5	Sapling	3	35
Quaking Aspen	35	Sapling	4	34
Balsam Fir	5	Sapling	4	
Black Cherry	5	Sapling	4	
Bigtooth Aspen	20	Pole/Sapling	6	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
51	4112 - Maple, Beech, Cherry Association	Sawtimber Well	12.8	76	81-110	N/A	Single tree harvested in 2014. Not much in the way of maple regen but heavy beech coming in in some of the larger gaps.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	40	Pole/Log	9	
Red Maple	55	Log/Pole	10	76
Yellow Birch	5	Log	12	

Sub-Canopy Species	Density	Avg. Height	Size
Beech	Medium	5 - 10 feet	Sapling
Balsam Fir	Low	5 - 10 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
52	310 - Herbaceous Openland	Nonstocked	7.0			No	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
53	42110 - Planted Red Pine	Sapling Well	29.0	19	Immature	N/A	Planted in 2001. Volunteer jack pine throughout. No sign of RHPS at this time. Trees are 15-20' tall.

Canopy Species	% Cover	Size Class	DBH	Age
Red Pine	90	Sapling	4	19
Jack Pine	10	Sapling	3	

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
54	4112 - Maple, Beech, Cherry Association	Sawtimber Well	29.7	77	51-80	N/A	Mostly red maple. Almost all beech has died which has affected basal area. Average is around 80sqft.

Canopy Species	% Cover	Size Class	DBH	Age
Sugar Maple	25	Pole/Log	9	
Red Maple	50	Log/Pole	10	77
Paper Birch	10	Pole	8	
Hemlock	5	Pole/Log	9	
Black Cherry	5	Pole	6	
Beech	5	Pole/Log	9	

Sub-Canopy Species	Density	Avg. Height	Size
Beech	Medium	Variable	Sapling
Balsam Fir	Low	< 5 feet	Sapling
Sugar Maple	Low	< 5 feet	Seeding

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
55	4311 - Pine, Aspen Mix	Poletimber Well	21.4	36	81-110	N/A	Stand is a mix of jack pine, aspen, and red maple.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	20	Sapling/Pole	4	
Bigtooth Aspen	15	Pole	7	
Jack Pine	45	Pole	6	36
Black Cherry	10	Pole/Sapling	5	
Quaking Aspen	10	Pole/Sapling	5	

Sub-Canopy Species	Density	Avg. Height	Size
Jack Pine	Low	5 - 10 feet	Sapling
Black Cherry	Low	5 - 10 feet	Sapling
Red Maple	Low	Variable	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
56	4199 - Other Mixed Upland Deciduous	Poletimber Well	29.8	55	81-110	N/A	Mix of species, mostly low quality poles. Understory is thick with beech and red maple.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	45	Pole/Sapling	5	55
Paper Birch	10	Pole/Sapling	5	
Beech	5	Pole	5	
Quaking Aspen	15	Pole/Sapling	5	
White Pine	10	Log/Pole	10	
Bigtooth Aspen	10	Pole/Sapling	5	
Balsam Fir	5	Pole	5	

Sub-Canopy Species	Density	Avg. Height	Size
Red Maple	Medium	Variable	Sapling
Quaking Aspen	Low	10 - 20 feet	Sapling
White Pine	Low	10 - 20 feet	Sapling
Beech	Medium	10 - 20 feet	Sapling
Sugar Maple	Low	< 5 feet	Seeding

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
57	710 - Sand, Soil	Nonstocked	2.0			No	
58	4311 - Pine, Aspen Mix	Poletimber Medium	17.1	29	51-80	N/A	Previous opening that has filled in with mostly jack pine and low quality hardwoods.

Canopy Species	% Cover	Size Class	DBH	Age
Red Maple	10	Pole/Sap/Log	6	
Quaking Aspen	20	Pole/Sapling	5	
Jack Pine	50	Pole/Sapling	5	29
Black Cherry	20	Sapling	3	

Sub-Canopy Species	Density	Avg. Height	Size
Jack Pine	Medium	5 - 10 feet	Sapling
Black Cherry	Low	5 - 10 feet	Sapling

Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	Managed Site	General Comments
59	629 - Mixed non-forested wetland	Nonstocked	2.1			No	
60	310 - Herbaceous Openland	Nonstocked	1.7			No	
61	122 - Road/Parking Lot	Nonstocked	11.9	0		No	
62	122 - Road/Parking Lot	Nonstocked	10.5		Unspecified	No	US-2
64	310 - Herbaceous Openland	Nonstocked	4.2		Unspecified	No	