

Compartment Review Presentation

Sault Ste. Marie Forest Management Unit

Compartment 45133
Entry Year 2019
Acreage: 1,854
County Mackinac

Management Area: Sage Truck Trail

Revision Date: 2017-07-11

Stand Examiner: Matt Edison

Legal Description:

T44N-R7W Sections 8, 9, 16 & 17; Hendricks Township

Identified Planning Goals:

During this entry period timber management will be minimal within this compartment. There will be selection harvest of northern hardwood stands. Overall the compartment contains a high percentage of lowland conifer and mixed upland/lowland conifer and aspen. The accessible stands have been harvested in the past are now nearing the point where further treatment and regeneration could be considered in the next entry and beyond.

Soil and topography:

Topography is gently rolling upland divided by the West and South branches of the Hendrie River. There is lowland on the north and south edges of the compartment. Soils within the compartment include Wallace sand, Markey-Spot-Finch complex, Finch-Dawson-Pullup complex, Paquin –Finch sands, and Allendale-Wakely complex. Soil is thin in areas and Karst features are present.

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

There are three 40 acre private holdings within the inner area of the compartment. Section 16 is adjacent to the compartment in the Southeast and is comprised entirely of privately owned land (Michigan Karst Conservancy) except for one 40 acre parcel that is state owned. The MKC land has many trails and is used recreationally for hiking, caving, etc. Sections 8, 9, and 17 are all surrounded by state ownership. There is a management easement through private land in sections 8 & 9 allowing access to state land.

Unique Natural Features:

Per MNFI, there is a potential for rare, threatened or endangered plant and animal species and natural communities within this compartment. Stands to be managed will be checked for species of concern. Management will be modified if species are found within those stands per management guidelines for that species.

Archeological, Historical, and Cultural Features:

Michigan Karst Conservancy owns land in section 16. Caves found in section 16.

Special Management Designations or Considerations:

Stands 50 and 70 are under special use permit to the Michigan Karst Society. The most extensive limestone cave system in Michigan is in section 16.

Watershed and Fisheries Considerations:

Fisheries Values: Excellent

Fisheries Concerns: This compartment contains the South and West Branch Hendrie Rivers. Both are designated trout streams. Trout are present in these streams and any further beaver activity should not be promoted. Buffers should be applied in treatment stands with a large aspen component and proposed clear-cuts. Streams appear to already be factor limited and buffered in preparation for future treatments.

Wildlife Habitat Considerations:

Compartment 133 is part of the Sage Truck Trail Management Area where featured wildlife species include American marten, black bear, ruffed grouse, snowshoe hare, and white-tailed deer. It contains a mix of cover types ranging from northern hardwoods and upland mixed stands to lowland conifers including black spruce and cedar types. Wildlife objectives include maintaining deer wintering complex, diversifying northern hardwoods and mixed stands to benefit marten, hawks, and bear, and maintaining lowland cover for a variety of wildlife including deer and bear. Portions of this compartment are in deer wintering complex, and treatments in stands in wintering complex will be conducted during the winter months (Dec. 1 - Mar. 31) so tops are available as browse to wintering deer. Hemlock will be retained, and cherry and other mast-producing species will be encouraged to provide food sources for bear and other species. Rare species and their habitats will be protected.

Mineral Resource and Development Concerns and/or Restrictions

Sections 8-9 & 16-17, T44N R7W, Mackinac Co.

There is some sand and gravel production in the area but potential within the compartment appears to be limited. Potential for high-purity (high-calcium) limestone within the compartment is very good. The former Fiborn Quarry is located adjacent to the compartment and Graymont's proposed underground mine is located a few miles to the southwest. There is no current economic oil and gas production in the UP and there is no known metallic mineral potential in this region.

Vehicle Access:

Vehicle access is fair in this compartment. Norton Camp road is a good quality dirt road and is the main access running through the compartment. There are numerous two tracks and old existing logging roads that reach well into each section of the compartment. The areas in section 9 east of Hendrie River and north of Norton Camp road has very limited access due to the lowland type.

Survey Needs:

None needed for treatments this entry.

Recreational Facilities and Opportunities:

All types of hunting is pursued in this compartment. The caves in section 16 offer unique recreational opportunities. Fishing is available in the branches of the Hendrie River.

Fire Protection:

Fire activity within this compartment has been minimal historically. However, with areas of lowland conifer and limited access, there is potential for mop-up of intense fires if one occurs. The Hendrie River branches provide a readily available water source if needed.

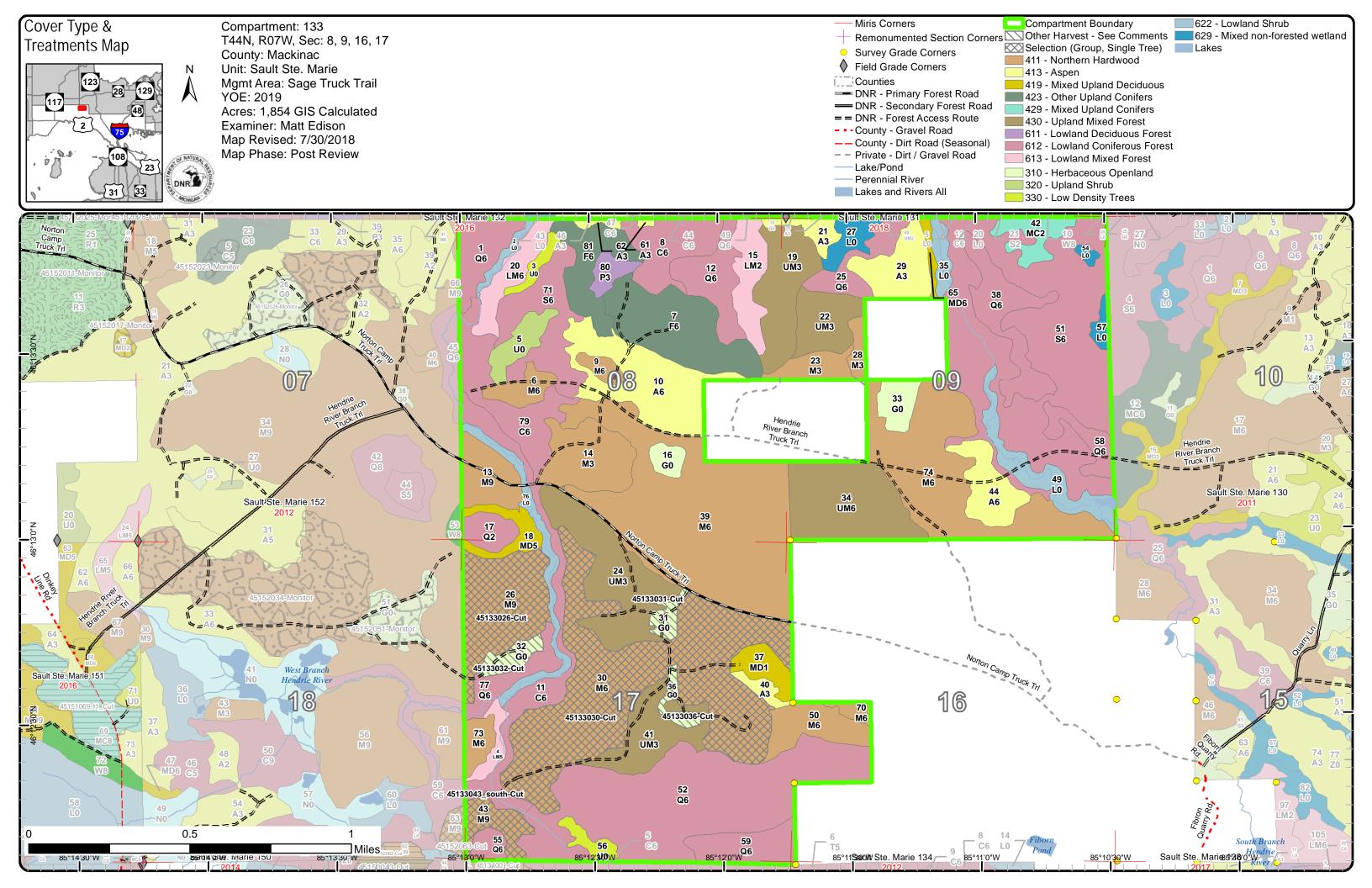
Additional Compartment Information:

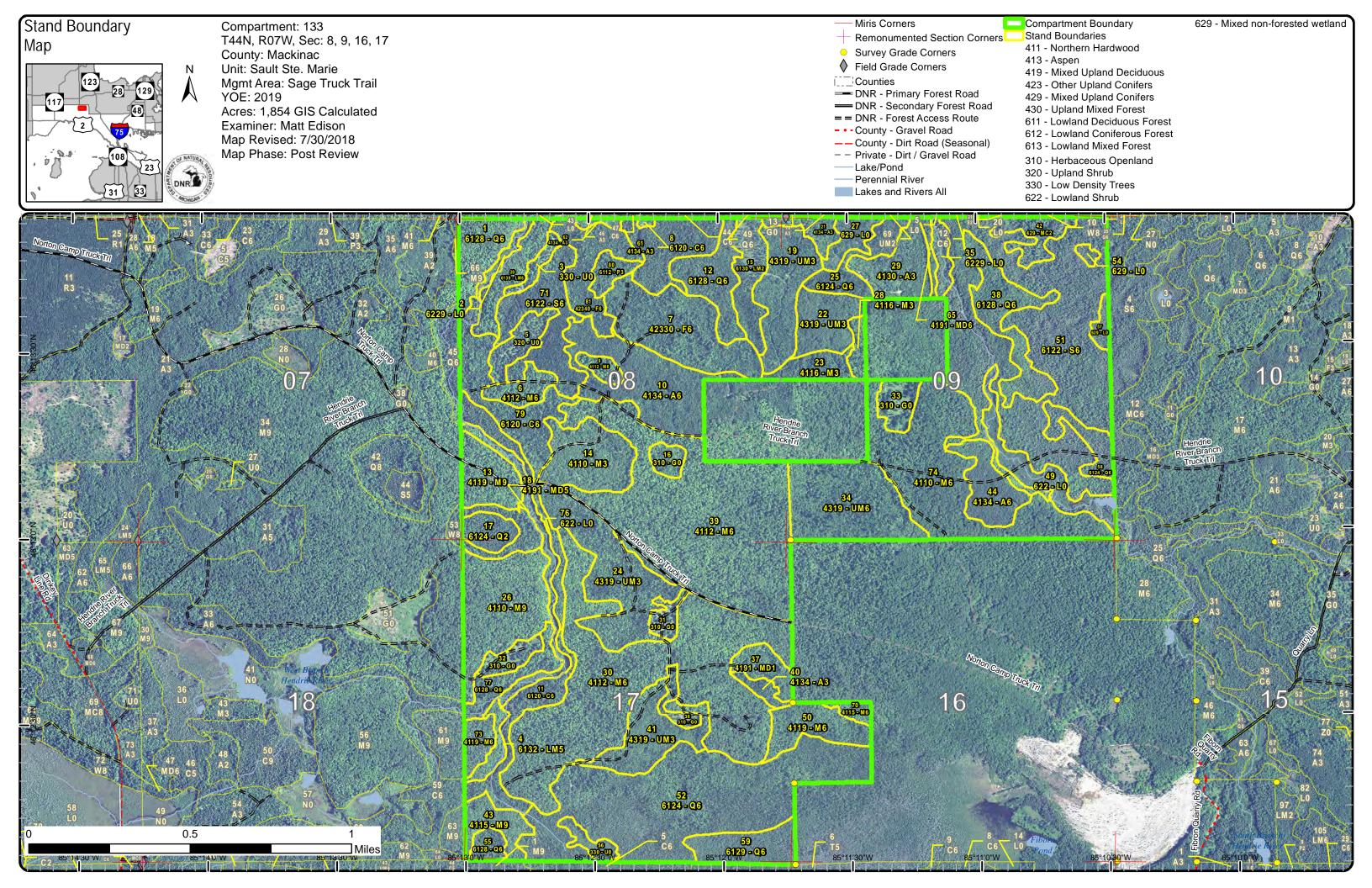
The following reports from the Inventory are attached:

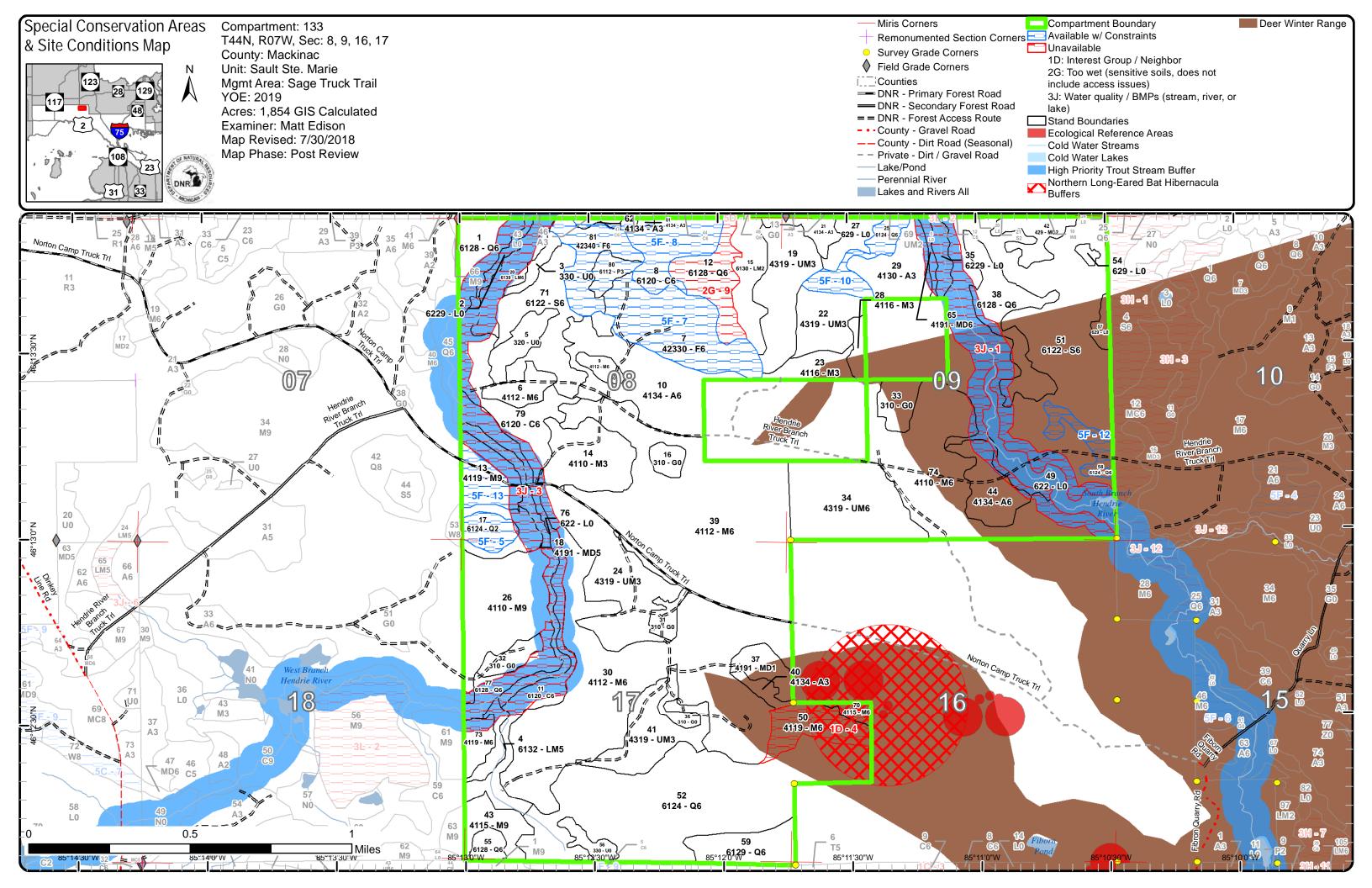
Total Acres by Cover Type and Age Class Cover Type by Harvest Method Proposed Treatments – No Limiting Factors Proposed Treatments – With Limiting Factors Stand Details (Forested and Nonforested) Dedicated and Proposed Special Conservation Areas Site Condition Details

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







Compartment 133 Year of Entry 2019

Sault Ste. Marie Mgt. Unit

Matt Edison : Examiner



Age Class

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Aspen	0	0	35	5	75	0	0	0	0	0	0	0	0	0	0	0	0	0	115
Cedar	0	0	0	0	0	0	0	0	0	0	38	64	0	0	0	0	0	0	102
Herbaceous Openland	36	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	36
Low-Density Trees	11	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	11
Lowland Aspen/Balsam Poplar	0	0	0	0	7	0	0	0	0	0	0	0	0	0	0	0	0	0	7
Lowland Conifers	0	0	0	0	21	11	32	172	0	41	12	20	0	0	0	0	0	0	308
Lowland Mixed Forest	0	20	0	17	7	0	0	0	0	0	0	0	0	0	0	0	0	0	44
Lowland Shrub	68	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	67
Lowland Spruce/Fir	0	0	0	0	174	0	0	0	37	0	0	0	0	0	0	0	0	0	211
Mixed Upland Deciduous	0	0	0	12	11	0	0	3	0	0	0	0	0	0	0	0	0	0	26
Northern Hardwood	0	0	0	0	0	0	0	0	4	15	0	0	0	0	0	0	0	601	619
Upland Conifers	0	0	13	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	13
Upland Mixed Forest	0	0	0	144	55	0	0	0	0	0	0	0	0	0	0	0	0	0	199
Upland Shrub	12	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	12
Upland Spruce/Fir	0	0	0	80	0	0	0	0	0	0	0	0	0	0	0	0	0	0	80
Total	127	20	48	258	350	11	32	175	41	56	50	84	0	0	0	0	0	601	1850



Report 2 - Treatment Summary

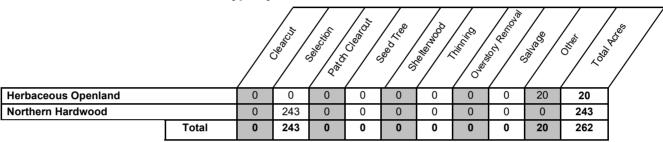
Sault Ste. Marie Mgt. Unit Year of Entry: 2019

Acres of Harvest

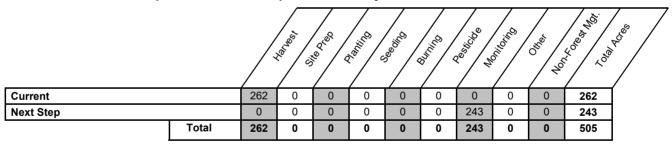
Compartment 133
Total Compartment Acres: 1,854

Commercial Harvest - 262 Harvests with Site Condition - 0 Next Step Harvest - 0 Habitat Cut - 0

Cover Type by Harvest Method



Proposed and Next Step Treatments by Method



Compartment: 133 Year of Entry: 2019

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Treatment Acres Stand Size Stand BA **Treatment Treatment Cover Type** Age **Approval** Density Method Objective Status d Name CoverType Age Range Type Structure 26 45133026-Cut 52.1 4110 - Sugar Maple Sawtimber 66 81-110 Harvest Single Tree 411 - Northern Uneven-Draft Field Association Well Selection Hardwood Aged Boundary

Habitat Cut: No Site Condition:

Prescription Thin stand to regulation (approximately 70-90 ba). Promote quality black cherry and yellow birch where present. Do not cut any White Pine, hemlock, or oak if present. Leave 1-2 wolfy trees per acre, and leave at least 2 yellow birch and/or maple with rough bark per acre where present. Specs:

Next Step Monitoring, Natural Regen (Re-Inventory)

Treatments:

Acceptable Any mix of maple, birch, aspen, cherry, balsam fir, spruce, white pine, or hemlock.

Regen:

Other Comment:

10/01/2018 **Proposed Start Date:**

45133030-Cut 111-4112 - Maple. Poletimber Harvest Single Tree 411 - Northern Uneven-Draft Field Beech, Cherry Well 140 Selection Hardwood Aged Boundary Association

Habitat Cut: No Site Condition:

Prescription Thin stand to regulation (approximately 70-90 ba). Promote quality Yellow Birch and Black Cherry where present. Do not cut any Hemlock or oak if present. Leave 1-2 wolfy trees per acre, and leave at least 2 yellow birch and/or maple with rough bark per acre where present. Specs:

Next Step Monitoring, Natural Regen (Re-Inventory)

Treatments:

Acceptable Any mix of maple, birch, cherry, aspen, balsam fir, white pine, or spruce.

Regen:

Other Comment:

Proposed Start Date: 10/01/2018

45133031-Cut 6.0 310 - Herbaceous Unspec Other - Specify 310 -Draft Field Nonstocked Harvest Openland ified Herbaceous Boundary Openland

Habitat Cut: No Site Condition:

Prescription Clearcut for opening maintenance. Consult wildlife for any follow up treatments.

Specs:

Next Step

Treatments:

<u>Acceptable</u>

Regen:

Other Comment:

Proposed Start Date:

10/01/2018

45133032-Cut 310 -Draft Field 0.8 310 - Herbaceous Nonstocked Unspec Harvest Other - Specify Openland ified Herbaceous Boundary Openland

Habitat Cut: No Site Condition:

Prescription Clear-cut for opening maintenance. Consult wildlife division for follow up treatments..

Specs:

Next Step

Treatments:

<u>Acceptable</u> Regen:

Other

Comment:

Proposed Start Date: 10/01/2018 Sault Ste. Marie Mgt. Unit

Acres

Report 3 -- Treatments

Treatment

Type

Compartment: 133 Year of Entry: 2019

Age

Structure

Approval

Name 45133036-Cut 36

Treatment

5.6 310 - Herbaceous Openland

Stand

CoverType

Nonstocked

Size

Density

Stand

Age

Unspec

BA

Range

ified

Harvest Other - Specify

Treatment

Method

310 -Herbaceous

Cover Type

Objective

Openland

Status Draft Field Boundary

Habitat Cut: No

Site Condition:

Prescription Clearcut for opening maintenance. Consult wildlife division for follow up treatments.

Specs:

s

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n

d

Next Step

Treatments:

Acceptable Regen:

Other Comment:

Proposed Start Date:

10/01/2018

45133043 sou th-Cut

14.5 4115 - Y.Birch. Hemlock NH

Sawtimber 81 111-Well 140 Harvest

Single Tree Selection

4110 - Sugar Maple Association

Uneven-Aged

Draft Field Boundary

Habitat Cut: No

Site Condition:

Prescription Mark stand to 80 to 90 Basal Area. Retain some beech with the smooth bark and wildlife trees. Some ironwood if present and all juneberry and conifer should be left. Some larger canopy gaps may be desirable around the cherry and yellow birch if possible to regenerate those species and Specs: enhance the advanced regeneration present. Open up the drip line of the hemlock. Follow BMP guidelines along the stream and wetland edges. Actual treatment size may vary depending on what conditions are found on the ground.

Next Step Monitoring, Natural Regen (Intermediate)

Treatments:

Acceptable Any mix of maple, birch, cherry, beech, balsam, pine, cedar, or hemlock.

Regen:

Need to put road and bridge from the east across west branch of Hendrie River to access the stand. Should be cut with stands 56 and 63. Care Other Comment: must be taken to prevent erosion and problems from the bridge and road placements on and around the trout streams. Old next step comments: Follow-up treatment with a regeneration survey as per the work instructions. Acceptable regeneration is maple, cherry, beech, paper and yellow birch, balsam fir, spruce, aspen and hemlock.

Proposed Start Date: 10/01/2018

Total Treatment 262.4 Acreage Proposed:

Sault Ste. Marie Mgt. Unit

Matt Edison : Examiner

Compartment: 133
Year of Entry: 2019

Availa	ability for	Managemer	nt					
Total	Acres	Acres Avail	Acres	D	omina	nt Site	e Con	ditions
Acres	Available	With Condition	Not Available		5F	1D	2G	3J
115	107	3	5	Aspen	3			5
102	38	27	37	Cedar	27			37
36	36	0	0	Herbaceous Openland				0
11	11	0	0	Low-Density Trees				0
7	0	7	0	Lowland Aspen/Balsam Poplar	7			
309	219	39	51	Lowland Conifers	39		24	26
44	28	0	16	Lowland Mixed Forest	0			16
68	39	0	29	Lowland Shrub				29
211	37	0	174	Lowland Spruce/Fir				174
26	18	0	8	Mixed Upland Deciduous	0			8
620	560	13	46	Northern Hardwood	13	26		20
13	13	0	0	Upland Conifers				
199	196	0	2	Upland Mixed Forest				2
12	12	0	0	Upland Shrub				
80	3	77	0	Upland Spruce/Fir	77			0
1,854	1,319	167	368	Total Forested Acres	167	26	24	318
	71%	9%	20%	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)	76	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						
3	Unavailable	3J: Water quality / BMPs (stream, river, or lake)	116	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						

Report 4 – Site Conditions

Sault Ste. Marie Mgt. Unit

Matt Edison : Examiner

Compartment: 133 Year of Entry: 2019

4	Unavailable	1D: Interest Group / Neighbor	26	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
5	Available	5F: Evaluated for Forest Health Considerations	10	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
7	Available	5F: Evaluated for Forest Health Considerations	84	Unspecified	Unspecified	Unspecified	Unspecified
	Comments: Monitoring for SBW						
8	Available	5F: Evaluated for Forest Health Considerations	31	Unspecified	Unspecified	Unspecified	Unspecified
	Comments: Monitoring for SBW						
9	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	24	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
10	Available	5F: Evaluated for Forest Health Considerations	16	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						

Report 4 – Site Conditions

Sault Ste. Marie Mgt. Unit

Matt Edison : Examiner

Compartment: 133 Year of Entry: 2019

12	Available	5F: Evaluated for Forest Health Considerations	12	Unspecified	Unspecified	Unspecified	Unspecified
С	omments:						
13	Available	5F: Evaluated for Forest Health Considerations	13	Unspecified	Unspecified	Unspecified	Unspecified

Mgt. Unit

Compartment: #Type!
Year of Entry:



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				

Compartment: 133
Year of Entry 2019



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.

Conservatio Area	п Туре	Description	ERA = Ecological Reference Area HCVA = High Conservation Value Area SCA = Special Conservation Area
SCA	Cold Water Stream	A coldwater stream has temperature and dissolved oxygen cond stocked trout populations and those of other coldwater fish speci year to year. Coldwater streams in Michigan typically provide the contributions of groundwater to their stream flows. Such streams designated as trout resources by Fisheries Order 210.	es (e.g., slimy sculpin) to persist from se conditions due to substantial
SCA	Habitat Area	An area that provide some specific need for the life cycle of wildle and Waterfowl Production Areas, deer wintering complexes in loopenings and savannas. Habitat areas are distinct from critical hendangered or threatened species (such as Kirtland's warbler or general in nature, are not primarily associated with threatened or covered by species recovery plans that are developed in cooperations.	wland conifer communities, grassland abitat designated for recovery of piping plover areas) in that they are more endangered species, and are not
SCA	Riparian Area	A transitional area between aquatic and terrestrial ecosystems in influences the aquatic ecosystem and vice-versa. Because of the streams and open water wetlands, riparian areas harbor a high communities are ecologically and socially significant in their effect as aesthetics, habitat, bank stability, timber production, and their	e unique conditions adjacent to lakes, liversity of plants and wildlife. Riparian cts on water quality and quantity, as well
ERA	Ecological Reference Areas	Ecological Reference Areas (ERAs) are high quality examples of identified as Element Occurrences (EOs) by the Michigan Natura context of their natural community classification system. Element (Excellent) or B (Good) and a Global (G) or State (S) element (ra threatened (2), or rare (3) serve as an initial base of ERAs. They the State. The system is comprised of individual or associations managed for restoration and maintenance of natural ecological p submit recommendations for lands as ERAs using the DNR Constitution.	Il Features Inventory (MNFI) within the Cocurrences with viability ranks of A rity) ranking of endangered (1), may be located upon any ownership in of natural community types that are processes and values. The public may

s t	Sault Ste. Marie	Mgt. Unit		Report 7	– Forested	Stands Compartment: 133 Year of Entry: 2019
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
1	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	20.4	100	81-110	Smaller diameter fringe stand. Variable low ground with some areas of higher with mixed conifer and deciduous. Check in next entry for possible harvest.
4	6132 - Mixed Lowland Forest with Cedar	Poletimber Medium	6.7	36	51-80	Transition between upland stand and lower river corridor. Mix of everything, but small diameter and tag alder mixed in where lowest.
6	4112 - Maple, Beech, Cherry Association	Poletimber Well	10.3	73	81-110	Stand thinned as part of "Mystery Skull". Overall basal area still relatively in regulation, avg. About 90. Let go until next entry.
7	42330 - Upland Fir	Poletimber Well	53.2	29	Immature	Clear cut in 1989. Stand is mostly balsam & spruce with some aspen, cherry. Some Hemlock patches and scattered trees.
8	6120 - Lowland Cedar	Poletimber Well	27.6	100	141-170	Poor quality stand of cedar, balsam, and black spruce. There is a small presence of p. birch.
9	4112 - Maple, Beech, Cherry Association	Poletimber Well	5.3	66	81-110	Stand thinned as "Mystery Skull". Basal area is lower in this stand in comparison to others adjacent. Averages about 90 basal area. Lost the beech component from BBD. Leave this stand and check it again in 10 years.
10	4134 - Aspen, Spruce/Fir	Poletimber Well	53.4	35	141-170	Aspen/ balsam fir. Cut in 1984. Good looking stand. Check next entry for possible harvest.
11	6120 - Lowland Cedar	Poletimber Well	38.3	99		Hendrie River corridor. Dense mixed cedar-Q type.
12	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	24.3	81	81-110	Very wet stand of poor quality cedar and spruce. Some tamarack in places. A few areas of aspen and birch where slightly higher.
13	4119 - Mixed Northern Hardwoods	Sawtimber Well	21.2	72	81-110	Thinned as part of "Cherry Seed Hardwood" sale. still lower ba, about 90-100. check in 10 years.
14	4110 - Sugar Maple Association	Sapling Well	32.9	31	Immature	Opening that is nearly fully stocked with Cherry, but w/ some balsam and spruce.
15	6130 - Fir, Aspen, Maple	Sapling Medium	20.3	6	Immature	Cut in 2011
17	6124 - Lowland Spruce- Fir	Sapling Medium	10.5	46		Very Wet. Poor site, but is stocked with Spruce, Tamarack, Balsam, and some W. Pine. Old filled on bog.

4191 - Mixed Upland Deciduous with Conifer

4319 - Mixed Upland

Forest

18

19

Poletimber

Medium

Sapling Well

11.4

35.8

38

27

51-80

Immature

W.P. left after 80-82 cc. Filling in with Mr, balsam, and cherry brush

S t	Sault Ste. Marie	Sault Ste. Marie Mgt. Unit			- Forested	Stands Compartment: 133 Year of Entry: 2019
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
20	6139 - Mixed Lowland Forest	Poletimber Well	17.3	26	141-170	Absolute mixed stand of species and high/low ground. Partial ridge runs length. Small diameters and brushy. A few scattered White Pine. Lowland conifers in wet holes.
21	4134 - Aspen, Spruce/Fir	Sapling Well	8.3	16	Immature	Stand was cut in 2002. Mystery Skull. 45-006-01-01
22	4319 - Mixed Upland Forest	Sapling Well	22.2	27	Immature	
23	4116 - Mixed N. Hardwood - Aspen	Sapling Well	12.2	34	Immature	Poor hardwood brush
24	4319 - Mixed Upland Forest	Sapling Well	54.4	27	81-110	
25	6124 - Lowland Spruce- Fir	Poletimber Well	16.4	82	141-170	
26	4110 - Sugar Maple Association	Sawtimber Well	52.1	66	81-110	Thinned as part of "Cherry Seed" 45128-99-01. Good looking Hard maple, ready to thin this entry.
28	4116 - Mixed N. Hardwood - Aspen	Sapling Well	5.7	34	Immature	Poor hardwood brush
29	4130 - Aspen	Sapling Well	23.9	16	Immature	Cut in 20 Mystery Skull 45-006-01-01. Good looking aspen mix regeneration.
30	4112 - Maple, Beech, Cherry Association	Poletimber Well	176.2	86	111-140	Thinned as part of "Mystery Skull" sale. This stand varies across its area. Some areas with lower basal area from Beech dropping out. Basal area is not super high, but a thinning wouldn't hurt. Promote the mast producing species and do not cut any Hemlock.
34	4319 - Mixed Upland Forest	Poletimber Well	54.8	31	Immature	Small diameter mix of everything.
37	4191 - Mixed Upland Deciduous with Conifer	Sapling Poor	11.6	21	Immature	Grass opening with lots of cherry brush.
38	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	32.1	56	81-110	Mix along River corridor. Poor quality stems of Mr, P. Birch, Balsam mixed in with cedar and black spruce.
39	4112 - Maple, Beech, Cherry Association	Poletimber Well	163.2	76	81-110	Thinned as part of "Mystery Skull" 45-106-00-01. Stand was thinned same time as the adjacent stand to the south. The diameters are a little larger in this stand and the basal area is overall still within regulation. There appears to have been more beech in this stand than the adjacent and there are many areas of lower ba due to beech dropping out of the canopy. Hold for this entry and check it for thinning in 10 years.

4134 - Aspen, Spruce/Fir

40

Sapling Well

4.8

26

81-110

Brushy part of adjacent opening.

s t				Report 7	- Forested	Stands Compartment: 133 Year of Entry: 2019
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
41	4319 - Mixed Upland Forest	Sapling Well	31.3	26	Immature	Stand of mixed cherry, balsam, Mr brush
42	429 - Mixed Upland Conifers	Sapling Medium	13.2	18	Immature	Part of "Dan's Moose Block' sale. Mostly aspen regen with scattered W.P.
43	4115 - Y.Birch, Hemlock NH	Sawtimber Well	14.5	81	111-140	Stand still has a raptor nest, but it does not appear active. Thin stand to regulation, but favor Hemlock and Yellow Birch as reserve. Mostly red maple, but some areas with decent sugar. Bridge needed for access at same crossing location as sale in adjacent stand.
44	4134 - Aspen, Spruce/Fir	Poletimber Well	21.6	34	111-140	Nice stand of aspen. Very dense will be nice in 10-20 years. Was cut in 1984. Healthy aspen, check next entry.
50	4119 - Mixed Northern Hardwoods	Poletimber Well	21.8	71	111-140	Stand is under special use permit to Mich. karst Conservancy due to cave openings being in the stand. No management in this unique area.
51	6122 - Black Spruce	Poletimber Well	173.9	35	141-170	Was cut in the 80's basically a treed bog/ wetland. Almost pure black spruce with very large wp left as a widely scattered overstory.
52	6124 - Lowland Spruce- Fir	Poletimber Well	151.1	61	141-170	Variable stand. Mix of species, heavier of each in different places. Only possible management would be in Northern most tip near cave entrances to east.
55	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	6.1	36	81-110	Small diameter pole of mixed conifer nada some deciduous. Scattered large white pine. Ground is much lower and wet compared to adjacent hardwood stand.
58	6124 - Lowland Spruce- Fir	Poletimber Well	12.3	90	51-80	Very wet, dense cedar / black spruce.
59	6129 - Mixed Coniferous Lowland Forest	Poletimber Well	21.1	67	111-140	Tamarack/Cedar mix.
61	4134 - Aspen, Spruce/Fir	Sapling Well	0.8	10	Immature	Stand was cut in 2008. Aspen regeneration with mix of spruce and balsam. A few residual overstory white pine.
62	4134 - Aspen, Spruce/Fir	Sapling Well	2.2	10	Immature	Stand was cut in 2008. Aspen regeneration with mix of spruce and balsam. A few residual overstory white pine.
65	4191 - Mixed Upland Deciduous with Conifer	Poletimber Well	3.4	62	51-80	Sliver stand along edge of drainage corridor.

4115 - Y.Birch, Hemlock NH

70

Poletimber

Well

4.1

71

111-140

Stand is under special use permit to Mich. karst Conservancy due to cave opening being in the stand. No management in this

unique area.

Compartment: 133



S t						Year of Entry: 2019
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
71	6122 - Black Spruce	Poletimber Well	37.2	71	141-170	Small size wetland spruce with some wp. Not very big, looks good. No sign of SBW.
73	4119 - Mixed Northern Hardwoods	Poletimber Well	8.7	76	141-170	Cut in 2016, thinned as "Slick Bridge Hardwood" 45-114-12-01.
74	4110 - Sugar Maple Association	Poletimber Well	91.5	71	81-110	Stand of pretty nice Sugar Maple. Scatter Cherry and Yellow Birch. Thinned in 2011. Pennant Race Hardwood 45-121-09-01
77	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	14.7	31	111-140	Stand within river influence zone. Mix of lowland conifer in wet areas and some small deciduous in higher ground. Very small. Good stream buffer.
79	6120 - Lowland Cedar	Poletimber Well	36.2	108	141-170	Stand cedar mix along Hendrie River corridor.
80	6112 - Lowland Aspen	Sapling Well	7.2	35	Immature	Stand was part of a large clear cut with adjoining stand. Hemlock were left in this stand as a component. Aspen, ,balsam mixed regeneration.
81	42340 - Upland Spruce/Fir	Poletimber Well	26.6	29	Unspecified	Clear cut in 1989. Stand is mostly balsam & spruce with some aspen, cherry. Very brushy

Compartment: 133 Year of Entry: 2019



Stand	Cover Type	Acres	Managed Site	General Comments:
2	6229 - Mixed lowland shrub	4.2	No	Stand of dense cedar along Hendrie River corridor.
3	330 - Low-Density Trees	5.2	No	Grass opening ridge with scattered Conifer.
5	320 - Upland Shrub	12.4	No	
16	310 - Herbaceous Openland	6.0	No	Filling in with cherry brush.
27	629 - Mixed non-forested wetland	9.8	No	
31	310 - Herbaceous Openland	6.0	No	Conduct openings maintenance if possible by cutting with other treatments in the area. Leave any oak and hemlock if present.
32	310 - Herbaceous Openland	8.0	No	Conduct openings maintenance if possible by cutting with other treatments in the area. Leave any oak and hemlock if present.
33	310 - Herbaceous Openland	10.8	No	
35	6229 - Mixed lowland shrub	7.0	No	River corridor.
36	310 - Herbaceous Openland	5.6	No	Conduct openings maintenance if possible by cutting with other treatments in the area. Leave any oak and hemlock if present. Any areas that are closed in already can be left.
49	622 - Lowland Shrub	23.3	No	River corridor.
54	629 - Mixed non-forested wetland	1.9	No	
56	330 - Low-Density Trees	6.2	No	Very wet flooded stand. Most of the cedar has died or is dying.
57	629 - Mixed non-forested wetland	4.2	No	
76	622 - Lowland Shrub	17.5	No	