

Compartment Review Presentation

Roscommon Forest Management Unit

Compartment 71158 Entry Year 2018 Acreage: 1,289

County Roscommon

Management Area: Upper Muskegon

Revision Date: 2016-07-26

Stand Examiner: Jason Lewicki

Legal Description:

T21N, R04W sections 22 and 27

Identified Planning Goals:

Vegetation management in the Upper Muskegon management area (MA) (Figure 2.27.1) will provide forest products; maintain or enhance wildlife habitat; protect areas of unique threatened, endangered and special concern species; and provide for forest-based recreational uses. Timber management for this 10-year period will focus on harvesting older jack pine and balancing age class distributions of oak, aspen and red pine. Wildlife habitat management objectives include perpetuating early-successional communities for species adapted to young forests for hunting and other wildlife-related recreation. Expected trends within this 10-year planning period are the need to manage exotic species (especially Phragmites and glossy buckthorn), the need to continue to manage cover types for a balanced age-class distribution and an expected increase in recreation pressure.

Soil and topography:

Soils on the uplands are primarily grayling sands while lowlands are dominated by peat. The compartment topography is flat to very gently rolling.

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

The entire compartment and much of the surrounding township is under state ownership.

Unique Natural Features:

None known

Archeological, Historical, and Cultural Features:

None known.

Special Management Designations or Considerations:

None known.

Watershed and Fisheries Considerations:

None.

Wildlife Habitat Considerations:

Mineral Resource and Development Concerns and/or Restrictions

Sections 22 & 27, T21N R4W, Roscommon County

Surface sediments consist of glacial outwash sand and gravel and postglacial alluvium and possibly some dune sand. The glacial drift thickness varies between 400 and 600 feet. Beneath the glacial drift are the Jurassic red beds and Pennsylvanian Saginaw Formation. The Saginaw is quarried for clay elsewhere in the state. Sand and gravel pits are sparse in the area and information is limited. There are a couple of small sand pits just to the west, along Highway 127. The few water well logs available indicate a high probability of sand and gravel, but the water table may be shallow. Headquarters Field is located two miles to the east. The field has produced over 11.3 million bbls of oil and 4.2 Bcf of gas primarily from the Devonian Richfield Formation and is in secondary recovery operations currently. Nearly all state minerals in the area are currently leased.

Vehicle Access:

Old 27 runs along its western border. Multiple county roads and forest two tracks make vehicle access very good throught this compartment.

Survey Needs:

None

Recreational Facilities and Opportunities:

Denton Creek 50" ORV trail and Houghton Lake Snowmobile Trail #6 occur within the parcel. Utilize logging ahead signs are placed on the trail to notify users of logging activity. Dispersed recreation occurs within the compartment from the varying cover types offering camping, hunting and gathering (Mushrooms/Berries) opportunities.

Fire Protection:

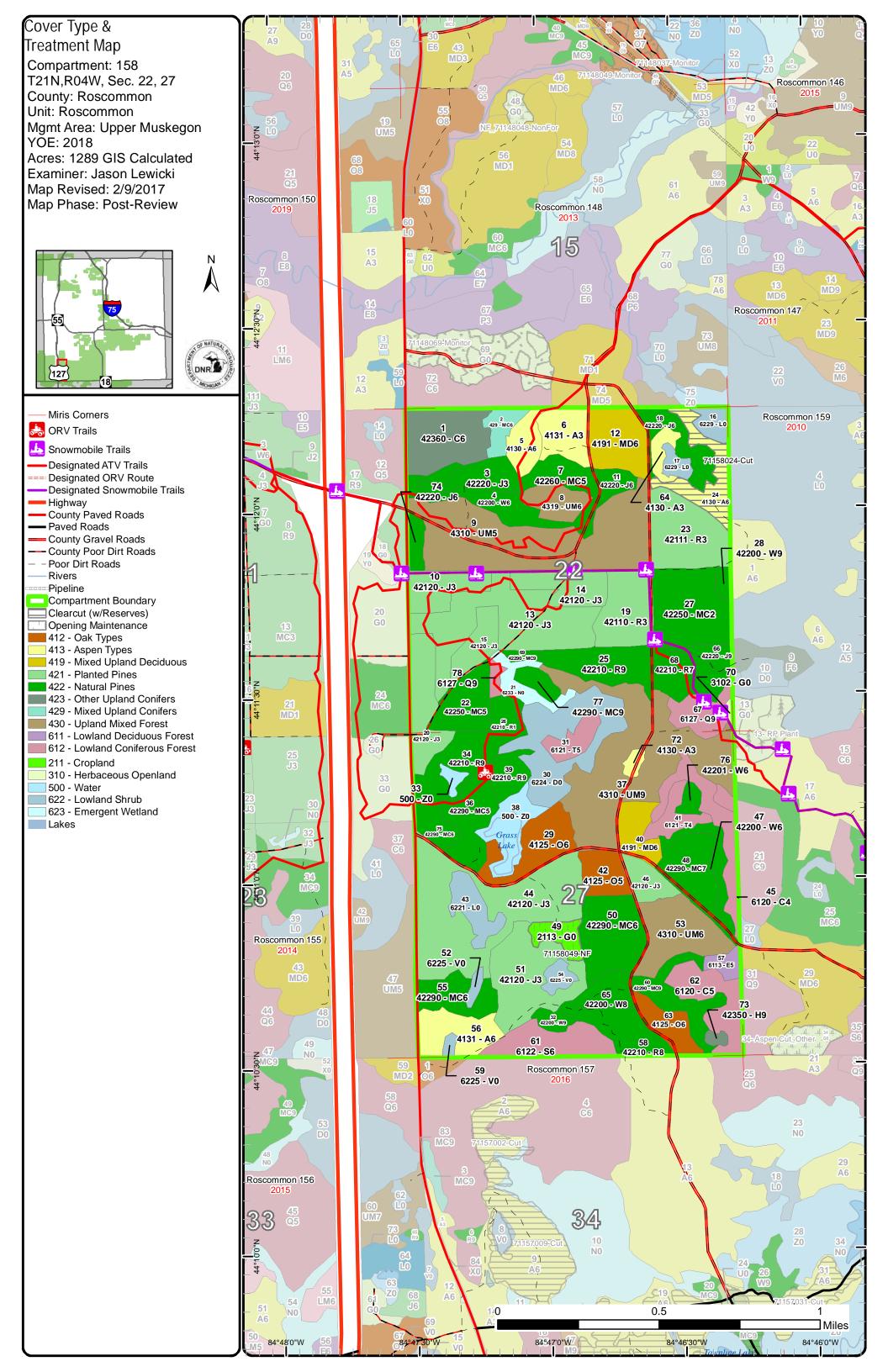
Additional Compartment Information:

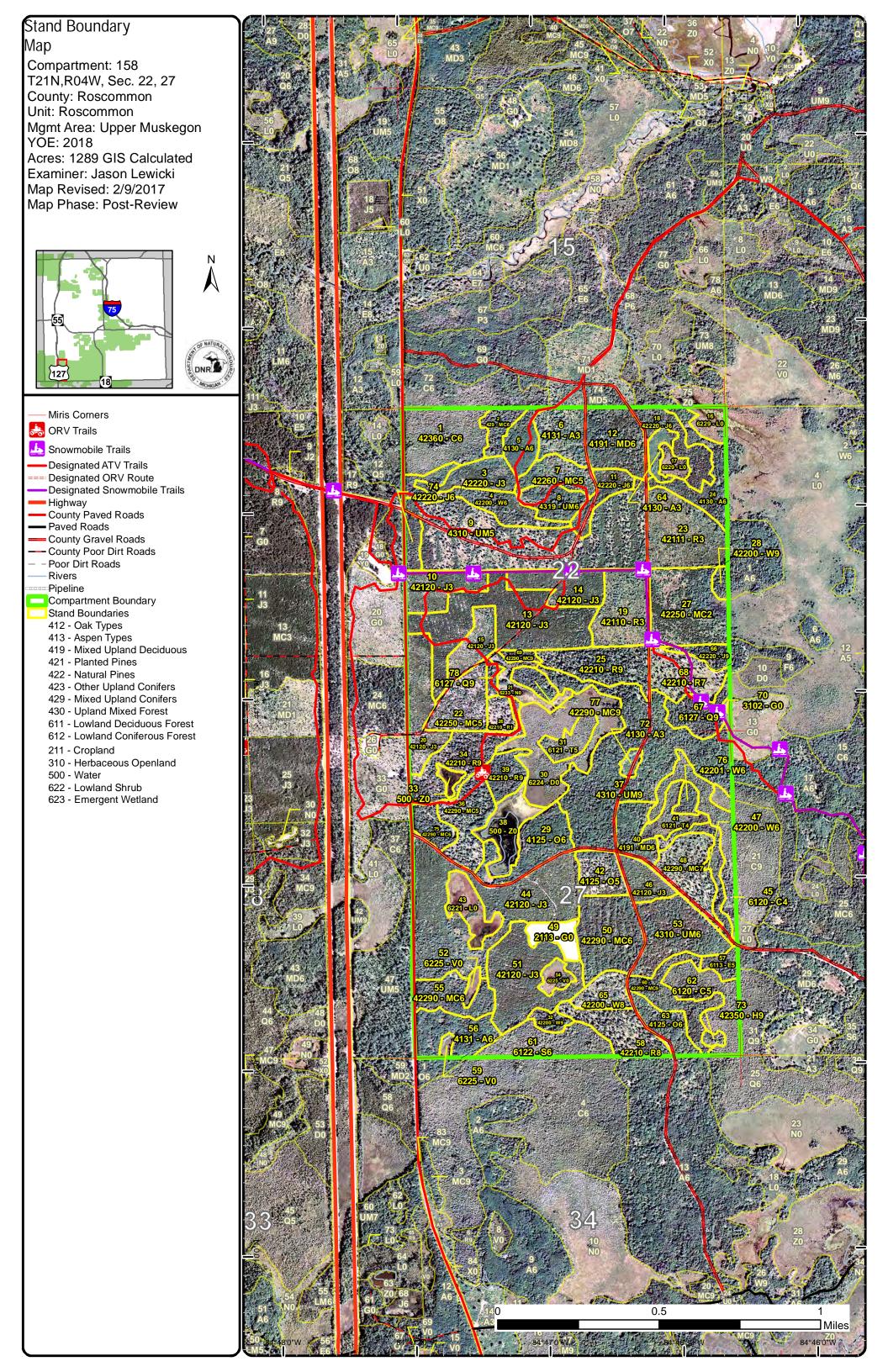
The following reports from the Inventory are attached:

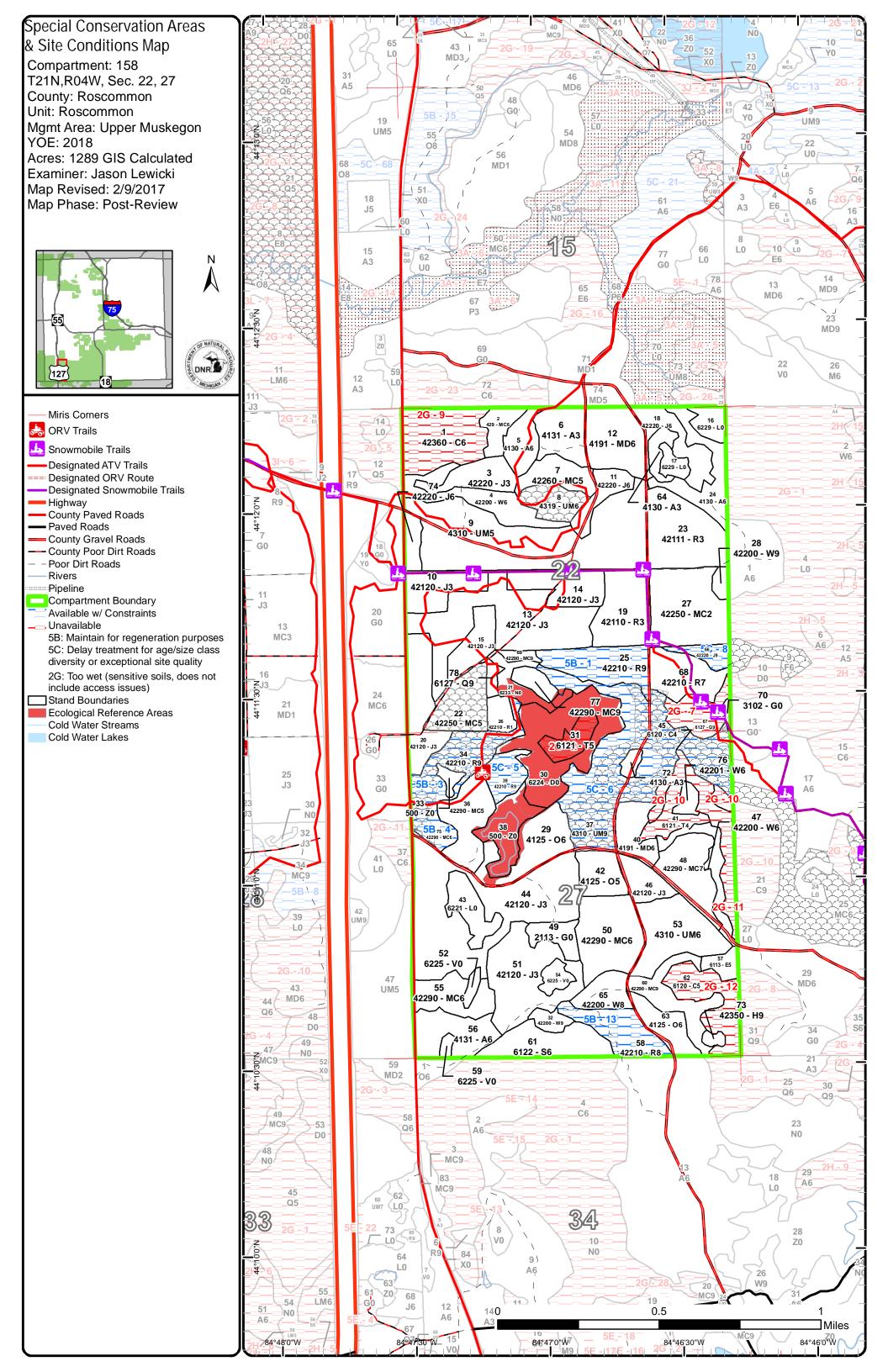
Total Acres by Cover Type and Age Class
Cover Type by Harvest Method
Proposed Treatments – No Limiting Factors
Proposed Treatments – With Limiting Factors
Stand Details (Forested and Nonforested)
Dedicated and Proposed Special Conservation Areas
Site Condition Details

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 158 Year of Entry 2018

Roscommon Mgt. Unit

Jason Lewicki: Examiner



Age Class

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	¥ ⁶	LA OF C				§ /\$		/ % /&					0, 10, 10, 10, 10, 10, 10, 10, 10, 10, 1					g* Jue	No. No.
Aspen	0	8	15	0	0	11	37	0	0	0	0	0	0	0	0	0	0	0	71
Bog	9	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9
Cedar	0	0	0	0	0	0	0	0	0	0	72	0	0	0	0	0	0	0	72
Cropland	8	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	8
Hemlock	0	0	0	0	0	0	0	0	0	0	0	2	0	0	0	0	0	0	2
Herbaceous Openland	1	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	1
Jack Pine	0	0	152	114	0	21	0	0	0	6	0	0	0	0	0	0	0	0	293
Lowland Conifers	0	0	0	0	0	0	0	0	0	16	0	0	0	0	0	0	0	0	16
Lowland Deciduous	0	0	0	0	0	0	0	0	5	0	0	0	0	0	0	0	0	0	5
Lowland Shrub	23	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	23
Lowland Spruce/Fir	0	0	0	0	0	0	0	0	22	0	0	0	0	0	0	0	0	0	22
Marsh	9	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	9
Mixed Upland Deciduous	0	0	0	0	0	12	22	0	0	0	0	0	0	0	0	0	0	0	34
Natural Mixed Pines	0	0	12	35	18	0	24	29	37	6	21	2	0	0	0	0	0	0	183
Oak	0	0	0	12	22	12	0	0	0	0	0	0	0	0	0	0	0	0	46
Red Pine	0	0	56	0	6	0	0	0	0	64	18	0	10	0	0	0	0	0	154
Tamarack	0	0	0	0	0	0	11	0	0	0	9	0	0	0	0	0	0	0	20
Treed Bog	38	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	38
Upland Conifers	0	0	0	0	0	8	0	0	0	0	0	0	0	0	0	0	0	0	8
Upland Mixed Forest	0	0	0	0	0	112	11	0	0	0	0	0	0	83	0	0	0	0	206
Water	19	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	19
White Pine	0	0	0	0	0	0	10	19	17	0	0	4	0	0	0	0	0	0	50
Total	107	8	235	161	46	176	115	48	81	92	120	8	10	83	0	0	0	0	1289
		_																	



Report 2 – Treatment Summary

Roscommon Mgt. Unit Year of Entry: 2018

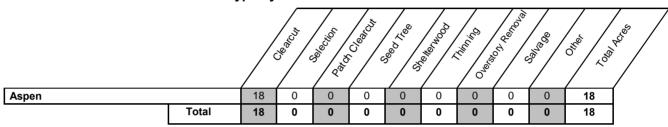
Acres of Harvest

Compartment 158
Total Compartment Acres: 1,289

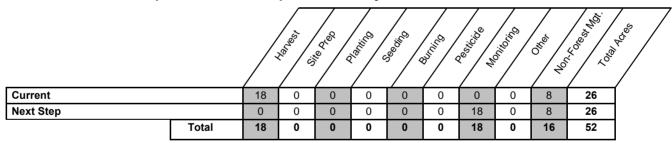
TONELLOM1

Commercial Harvest - 18 Harvests with Site Condition - 0 Next Step Harvest - 0 Habitat Cut - 0

Cover Type by Harvest Method



Proposed and Next Step Treatments by Method



Roscommon Mgt. Unit Report 3 -- Treatments Compartment: 158 s Year of Entry: 2018 t а **Treatment** Acres Stand Size Stand BA **Treatment Treatment Cover Type Approval** Age n CoverType Method Objective d Name Density Age Range Type Structure **Status** 71158024-Cut 413 - Aspen 24 17.9 4130 - Aspen Poletimber 51 51-80 Clearcut with Even-Aged Draft Field Harvest Well Retention Boundary **Habitat Cut: No Site Condition:** Prescription Clearcut and manage for aspen. Leave aspen retention in the form of small islands mixed with pine and oak. Leave scattered red pines 1-3 per Specs: acre. Apply drumming log spec. Next Step Monitoring, Natural Regen (Re-Inventory) Treatments: Acceptable Aspen at fully stocked levels.

Regen:
Other
Comment:

Proposed Start Date: 10/01/2017

49 71158049-NF 8.0 2113 - Forage Crops Nonstocked Unspec NonForestMgt Herbaceous/Crop ified Single Grass Planting Herbaceous Openland Soundary

Habitat Cut: No Site Condition:

<u>Prescription</u> Mow, cultivate, fertilize, seed as required to maintain established Wildlife Opening, Headquarters Field 7.

Specs:

NonForestMgt, Herbaceous/Crop/Grass Planting

25.9

Treatments:

Acceptable Regen:

Other Comment:

Proposed Start Date: 10/01/2017

Total Treatment
Acreage Proposed:

Compartment: 158

Roscommon Mgt. Unit

Jason Lewicki : Examiner Year of Entry: 2018

Availa	ability for	Managemer	nt					
Total	Acres	Acres Avail	Acres		Domina	nt Site	e Cond	ditions
Acres	Available	With Condition	Not Available		5B	5C	2G	
71	71	0	0	Aspen				
9	9	0	0	Bog				
72	0	0	72	Cedar			72	
8	8	0	0	Cropland				
2	2	0	0	Hemlock				
1	1	0	0	Herbaceous Openland				
292	286	6	0	Jack Pine		6		
16	3	0	13	Lowland Conifers			13	
5	5	0	0	Lowland Deciduous				
23	23	0	0	Lowland Shrub				
22	22	0	0	Lowland Spruce/Fir				
9	9	0	0	Marsh				
34	34	0	0	Mixed Upland Deciduous				
184	176	8	0	Natural Mixed Pines	8			
45	45	0	0	Oak				
154	80	74	0	Red Pine	64	10		
20	0	0	20	Tamarack			20	
38	38	0	0	Treed Bog				
8	8	0	0	Upland Conifers				
206	123	83	0	Upland Mixed Forest		83		
19	19	0	0	Water				
51	51	0	0	White Pine				
1,289	1,013	171	105	Total Forested Acres	73	98	105	
	79%	13%	8%	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 Condition	Acres	Other Site Condition	Other Site Condition	Other Site Condition	Other Site Condition
1	Available	5B: Maintain for regeneration purposes	22	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						

Report 4 – Site Conditions

Roscommon Mgt. Unit Jason Lewicki : Examiner

Compartment: 158
Year of Entry: 2018

Comments: 3 Available Comments: 4 Available Comments: 5 Available Comments:	e 5B: Maintain for regeneration purposes					
Comments: 4 Available Comments: 5 Available						
4 Available Comments: 5 Available	regeneration purposes	24	Unspecified	Unspecified	Unspecified	Unspecified
Comments: 5 Available						
5 Available	e 5B: Maintain for regeneration purposes	9	Unspecified	Unspecified	Unspecified	Unspecified
Comments:	e 5C: Delay treatment for age/size class diversity or exceptional site quality	10	Unspecified	Unspecified	Unspecified	Unspecified
6 Available	5C: Delay treatment for age/size class diversity or exceptional site quality	83	Unspecified	Unspecified	Unspecified	Unspecified
Comments:						
7 Unavailab	ele 2G: Too wet (sensitive soils, does not include access issues)	13	Unspecified	Unspecified	Unspecified	Unspecified
Comments:						

Report 4 – Site Conditions

Roscommon Mgt. Unit Jason Lewicki : Examiner Compartment: 158
Year of Entry: 2018

8	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	6	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						
9	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	30	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						
10	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	11	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						
11	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	20	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						
12	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	22	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						
13	Available	5B: Maintain for regeneration purposes	18	Unspecified	Unspecified	Unspecified	Unspecified
(Comments:						

Compartment: 158
Year of Entry: 2018



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
	Potential Old Growth		SCA Removal	11
Comments				
This area no longer me	eets the criteria to be classified as a Spec	ial Conservation Area.		
	Potential Old Growth		SCA Removal	42
Comments				
This area no longer me	eets the criteria to be classified as a Spec	ial Conservation Area.		
	Potential Old Growth		SCA Removal	61
Comments				
This area no longer me	eets the criteria to be classified as a Spec	ial Conservation Area.		

Roscommon Mgt. Unit Compartment: 158
Year of Entry 2018



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.

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.		ervatioi Area	n Type	Description	HCVA = High Conservation Value Area SCA = Special Conservation Area
	E		9	identified as Element Occurrences (EOs) by the Michigan Natucontext of their natural community classification system. Eleme (Excellent) or B (Good) and a Global (G) or State (S) element (threatened (2), or rare (3) serve as an initial base of ERAs. The the State. The system is comprised of individual or association managed for restoration and maintenance of natural ecological	ural Features Inventory (MNFI) within the ent Occurrences with viability ranks of A (rarity) ranking of endangered (1), ey may be located upon any ownership in s of natural community types that are I processes and values. The public may

s t	Roscommor	n Mgt. Unit		Report 7	- Forested	Stands Compartment: 158 Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
1	42360 - Upland Cedar	Poletimber Well	30.3	97	81-110	
2	429 - Mixed Upland Conifers	Poletimber Well	7.6	49	51-80	A mix of white pine, red maple and balsam fir stand. Some scattered aspen. North west part of stand has some mature maple.
3	42220 - Natural Jack Pine	Sapling Well	12.9	27	Immature	More open to the northeast. Transitons to lowland in that direction.
4	42200 - Natural White Pine	Poletimber Well	19.4	66	51-80	Mixed, variable stand of jack pine and white pine. Areas of upland, dry jack pine and areas of white pine, red maple and fir.
5	4130 - Aspen	Poletimber Well	10.6	48	Unspecified	Bigtooth aspen stand with some scattered pine, oak and maple. ORV trail runs through stand.
6	4131 - Aspen, Oak	Sapling Well	15.4	19	Immature	Mix of oak, aspen and cherry. Scattered pole white pine. Some pole red maple left from the 4" cut also.
7	42260 - Natural Pine, Mixed Deciduous	Poletimber Medium	12.2	19	Immature	
8	4319 - Mixed Upland Forest	Poletimber Well	11.4	51	81-110	White pine and red maple pole timber stand with super canopy white pine. Some birch poles.
9	4310 - Pine, Oak Mix	Poletimber Medium	83.5	46	1-50	Stand was strip cut twice. Once in 1990 and again in 2008. Stand is variable with mixed ages. Appears as oak, red and white pine were left from last harvest.
10	42120 - Planted Jack Pine	Sapling Well	16.1	15	Immature	planted to JP in 2002
11	42220 - Natural Jack Pine	Poletimber Well	9.7	27	1-50	Natural jack pine stand just entering pole timber size. Some oak and aspen mixed in especially on the west edge along the road.
12	4191 - Mixed Upland Deciduous with Conifer	Poletimber Well	22.1	51	51-80	A couple of nice BTA clones along west edge.
13	42120 - Planted Jack Pine	Sapling Well	54.9	27	Immature	Old notes indicate that part of stand was roller chopped.
14	42120 - Planted Jack Pine	Sapling Well	17.6	15	Immature	planted to JP in 2002
15	42120 - Planted Jack Pine	Sapling Well	12.2	16	Immature	planted to JP in 2001
18	42220 - Natural Jack Pine	Poletimber Well	15.0	46	51-80	
19	42110 - Planted Red Pine	Sapling Well	24.3	15	Immature	Red pine plantation with jack pine and oak mixed in.

s t	Roscommon	Mgt. Unit		Report 7	' – Forested	Stands Compartment: 158 Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
20	42120 - Planted Jack Pine	Sapling Well	22.4	15	Immature	planted to JP in 2002
22	42250 - Pine, Oak	Poletimber Medium	18.2	36	1-50	Looks like a fire origin stand. Old plow lines evident.
23	42111 - Planted Red Pine, Mixed Deciduous	Sapling Well	32.1	15	Immature	
24	4130 - Aspen	Poletimber Well	17.9	51	51-80	Stand of primarily low quality quaking aspen poletimber. Scattered jack pine, red pine and oak. Aspen is experiencing decline.
25	42210 - Natural Red Pine	Sawtimber Well	22.0	86	81-110	red pine stand that was thinned in 2009. All jack pine, red maple and some oak removed. Some presumed Legacy red pine present. Jack pine sub canopy is found mostly on old skid trails.
26	42210 - Natural Red Pine	Sapling Poor	5.6	35	1-50	. OVERSTORY REMOVAL COMPLETE. SCATTERED MONARCHS LEFT FOR RETENTION. DATA UPDATED AND TREATMENT CLOSED.
27	42250 - Pine, Oak	Sapling Medium	34.5	27	1-50	Lower wet area on the east side of stand.
28	42200 - Natural White Pine	Sawtimber Well	2.9	76	81-110	
29	4125 - Black, N. Pin Oak	Poletimber Well	21.5	36	1-50	Fire generated oak stand. Old plow lines along the perimeter. Mature red, white and jack pine along lake edge.
31	6121 - Tamarack	Poletimber Medium	8.6	91	Unspecified	
32	42200 - Natural White Pine	Sawtimber Well	4.3	109	81-110	
34	42210 - Natural Red Pine	Sawtimber Well	23.8	86	81-110	Nice natural red pine stand that had oak and jack pine removed in the past.
36	42290 - Natural Mixed Pine	Poletimber Medium	20.3	76	1-50	Stand was shelter wood cut last entry. Stand has good amounts of oak and jack pine. Heavy jack pine regen is found in main skid trails from whole tree skidding. Traces of red and white pine regen.
37	4310 - Pine, Oak Mix	Sawtimber Well	82.7	121	81-110	Mixed stand of black oak and red pine. Heavy white pine understory. Old 185 (cored)year old legacy red pine scattered through the stand.
39	42210 - Natural Red Pine	Sawtimber Well	9.7	111	141-170	Natural red pine stand mixed with some white pine and oak. Scattered Legacy trees with old fire scars.
40	4191 - Mixed Upland Deciduous with Conifer	Poletimber Well	12.3	41	51-80	

s t	Roscommon	n Mgt. Unit		Report 7	- Forested	Stands Compartment: 158 Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
41	6121 - Tamarack	Poletimber Poor	11.4	51	Unspecified	
42	4125 - Black, N. Pin Oak	Poletimber Medium	12.0	27	1-50	
44	42120 - Planted Jack Pine	Sapling Well	73.4	16	Immature	planted to JP in 2001
45	6120 - Lowland Cedar	Poletimber Poor	19.9	90	Unspecified	
46	42120 - Planted Jack Pine	Sapling Well	9.9	15	Immature	planted to JP in 2002
47	42200 - Natural White Pine	Poletimber Well	10.6	71	81-110	
48	42290 - Natural Mixed Pine	Sawtimber Poor	20.7	91	1-50	Stand was shelterwood/seed tree cut last entry. Red and white pine were lef along with some scattered oak. Understory is heavy to oak.
50	42290 - Natural Mixed Pine	Poletimber Well	29.0	61	1-50	Strips of young 2-4" jack pine from 1990 strip cuts with mature strips of jack , red and white pine. Allow younger strips to become merchantable before treating entire stand??
51	42120 - Planted Jack Pine	Sapling Well	36.0	27	1-50	Old notes indicate that stand may have been roller chopped. Air photo shows EW rows.
53	4310 - Pine, Oak Mix	Poletimber Well	28.2	41	1-50	SE corner is wetter and has solid red maple stump sprouts
55	42290 - Natural Mixed Pine	Poletimber Well	15.7	56	81-110	Mixed stand of white pine and red pine. Some aspen clones. Oak poletimber scattered throughout.
56	4131 - Aspen, Oak	Poletimber Well	19.0	56	51-80	Bigtooth aspen stand mixed with oak and white pine. More oak along the west side.
57	6113 - Lowland Maple	Poletimber Medium	5.1	73	51-80	
58	42210 - Natural Red Pine	Sawtimber Medium	18.4	96	1-50	Cut in 2009
60	42290 - Natural Mixed Pine	Sawtimber Well	17.4	71	51-80	2 pockets of natural red pine saw timber are found within stand.
61	6122 - Black Spruce	Poletimber Well	21.6	71	Unspecified	
62	6120 - Lowland Cedar	Poletimber Medium	21.8	97	Unspecified	

s t	Roscommon	Roscommon Mgt. Unit			- Forested	Stands Compartment: 158 Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
63	4125 - Black, N. Pin Oak	Poletimber Well	11.8	45	1-50	
64	4130 - Aspen	Sapling Well	5.2	6	Unspecified	
65	42200 - Natural White Pine	Sawtimber Medium	10.4	51	1-50	removed hardwoods and jack pine in 2009, left all red/white pine and some oak.
66	42220 - Natural Jack Pine	Sawtimber Well	5.8	86	81-110	Older Jack pine on high water table. Small pocket in the center of the stand holding standing water.
67	6127 - Lowland Pine	Sawtimber Well	13.1	89	141-170	leatherleaf ground cover, lots of white pine with scattered other conifers and hardwoods, doing well on its own,
68	42210 - Natural Red Pine	Sawtimber Poor	18.2	86	1-50	Cut in 2009
69	42290 - Natural Mixed Pine	Sawtimber Well	2.3	101	81-110	Old jack pine and red pine overstory with a younger age class of jack pine, white pine and oak poles mixed in. Old fire plow line found within stand.
72	4130 - Aspen	Sapling Well	2.7	6	Unspecified	
73	42350 - Upland Hemlock	Sawtimber Well	1.8	106	141-170	Nice little Hemlock stand.
74	42220 - Natural Jack Pine	Poletimber Well	5.9	46	51-80	Consider harvesting next entry. Double plow lines on the east edge.
75	42290 - Natural Mixed Pine	Poletimber Well	8.5	56	111-140	Stand of pole timber and small log white pine stand mixed with older white pine saw timber. Stand had the oak and jack pine removed in the past. Good understory of mixed oak.
76	42201 - Natural White Pine, Mixed Deciduous	Poletimber Well	3.6	71	81-110	
77	42290 - Natural Mixed Pine	Sawtimber Well	5.6	86	81-110	
78	6127 - Lowland Pine	Sawtimber Well	2.5	89	141-170	

Compartment: 158 Year of Entry: 2018



Stand	Cover Type	Acres	Managed Site	General Comments:
16	6229 - Mixed lowland shrub	6.5	No	Interested in balancing aspen ages in this part of compartment. This stand is a good candidate. More merchantable due to the mix of BTA. TREATMENT UPDATE COMPLETE
17	6229 - Mixed lowland shrub	4.2	No	
21	6233 - Wet Meadow	9.4	No	
30	6224 - Treed Bog	38.4	No	
33	500 - Water	2.5	No	
38	500 - Water	16.2	No	
43	6221 - Fen	12.3	No	
49	2113 - Forage Crops	8.0	Yes	
52	6225 - Bog	2.4	No	
54	6225 - Bog	4.8	No	
59	6225 - Bog	1.7	No	
70	3102 - Grass	1.3		