



Compartment Review Presentation

Roscommon Forest Management Unit

Compartment 71012

Entry Year 2017

Acreage: 1,030

County Roscommon

Management Area: AuSable Outwash

Revision Date: 2015-07-08

Stand Examiner: Doug Bates

Legal Description:

T24N R02W Sections 9 & 16

Identified Planning Goals:

Diversify both species and age classes in both early and late successional types.

Soil and topography:

Mostly flat with minimal undulating topography. Soils are Grayling Sand and Rifle Peat.

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

The compartment is mostly a contiguous block. There are two private property interface involving semi-developed subdivisions in the SWSW Section 9 and SESW Section 16. The Village of Roscommon sewage lagoons also adjoins state land by the Au Sable River. The DNR Airport is within this compartment.

Unique Natural Features:

None noted.

Archeological, Historical, and Cultural Features:

None recorded nor discovered during fieldwork.

Special Management Designations or Considerations:

None noted.

Watershed and Fisheries Considerations:

The South Branch of the Au Sable River touches a small portion of the compartment's north end.

Wildlife Habitat Considerations:

Mineral Resource and Development Concerns and/or Restrictions

Sections 9 & 16, T24N R2W, Roscommon County

Surface sediments consist of glacial outwash sand and gravel and postglacial alluvium. The glacial drift thickness varies between 400 and 600 feet. Beneath the glacial drift are the Mississippian Michigan Formation and Marshall Sandstone. The Michigan is quarried for gypsum and the Marshall was previously used as a building stone in other areas of the state. Most of the good gravel pits are associated with upland areas. The nearest gravel pits are 1.5 miles west (Section 18) and 2 miles northwest (Section 32, T25N R2W). There may be some potential within the compartment. St. Helen Field lies three miles to the east. The field has produced over 8.7 million bbls of oil and 14.7 Bcf gas from the Devonian Richfield Member. It is in secondary recovery operations currently. All of the State land in the compartment is currently leased.

Vehicle Access:

Vehicle access to the southern 2/3rds of the compartment is good via county roads and forest two-tracks. Vehicle access to the northern third is currently limited by private property. A possible access route is being looked at for future needs.

Survey Needs:

None at this time.

Recreational Facilities and Opportunities:

Some dispersed recreational hunting occurs within the parcel for bird watching, small game hunting, and some deer. There is a small portion of the Roscommon to Saint Helen snowmobile trail in the SW ¼ of Section 16. Protect confidence markers for designated trails (orange diamonds/ red triangles). All stumps within 20 feet of the snowmobile trail shall be Flush-Cut to ensure stumps do not result in unsafe conditions. Non-merchantable understory maintained adjacent to trail

shall be protected and be maintained next to trail tread to promote narrow use.

If the snowmobile trail/ORV Route is to be used for hauling during the snowmobile season of December 1 thru March 31 a snow bed must be preserved. Placement of material on the trail due to icy conditions will need to be approved by the department.

During active logging operations provide notification signs on recreational trails. Design landing and decking areas away from recreational trails whenever possible.

Fire Protection:

Additional Compartment Information:

The DNR Airport has multiple treatments either currently taking place or with be in the future to eliminate surrounding woody vegetation that pose a safety concerns to the runways. Treatments range from prescribed burns to aerial herbicide.

The following reports from the Inventory are attached:

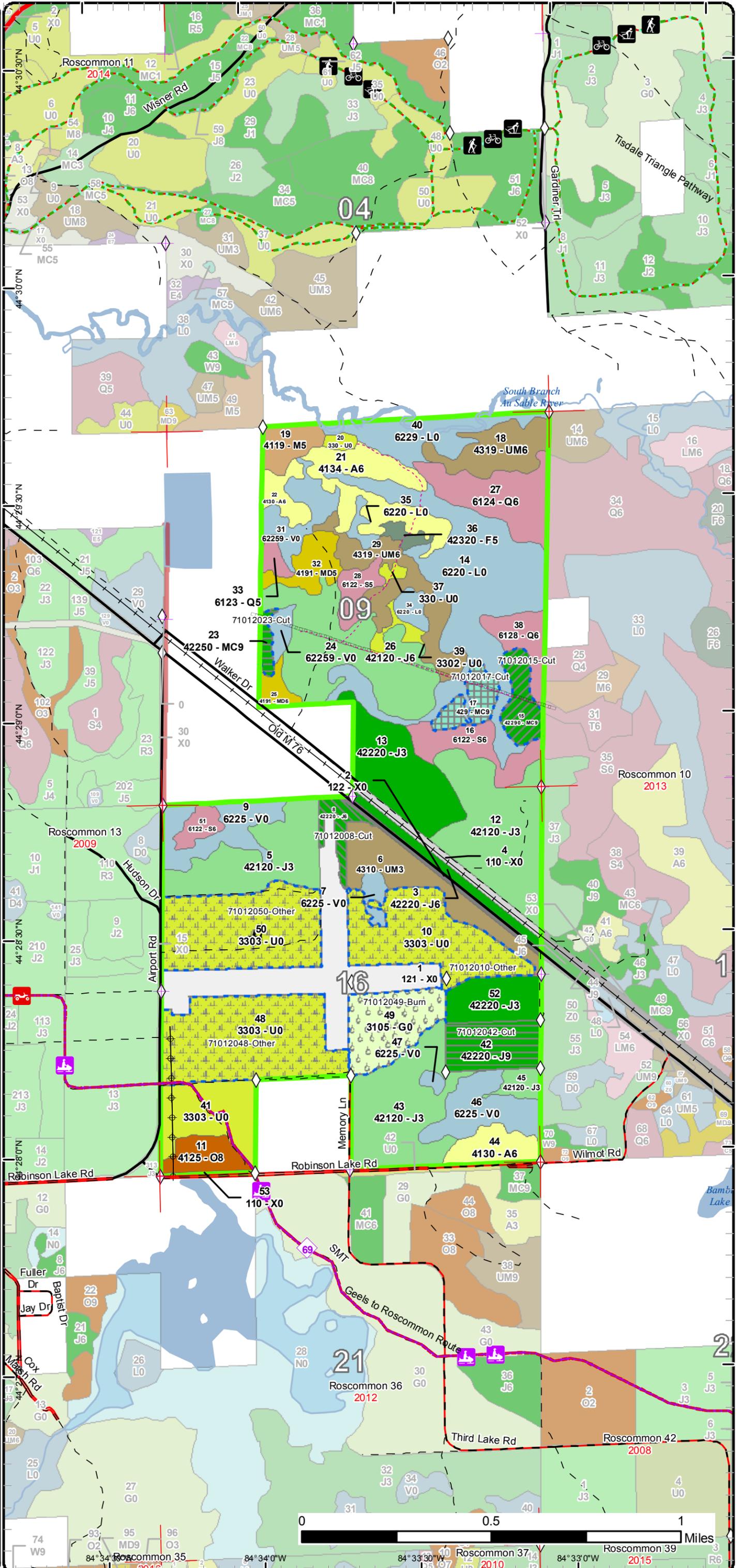
- Total Acres by Cover Type and Age Class**
- Cover Type by Harvest Method**
- Proposed Treatments – No Limiting Factors**
- Proposed Treatments – With Limiting Factors**
- Stand Details (Forested and Nonforested)**
- Dedicated and Proposed Special Conservation Areas**
- Site Condition Details**

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

Compartment: 12
 T24N, R02W 09, 16
 County: Roscommon
 Unit: Roscommon
 Mgmt Area: AuSable Outwash
 YOE: 2017
 Acres: 1030 GIS Calculated
 Examiner: Doug Bates
 Map Revised: 7/22/2015
 Map Phase: Pre-Review



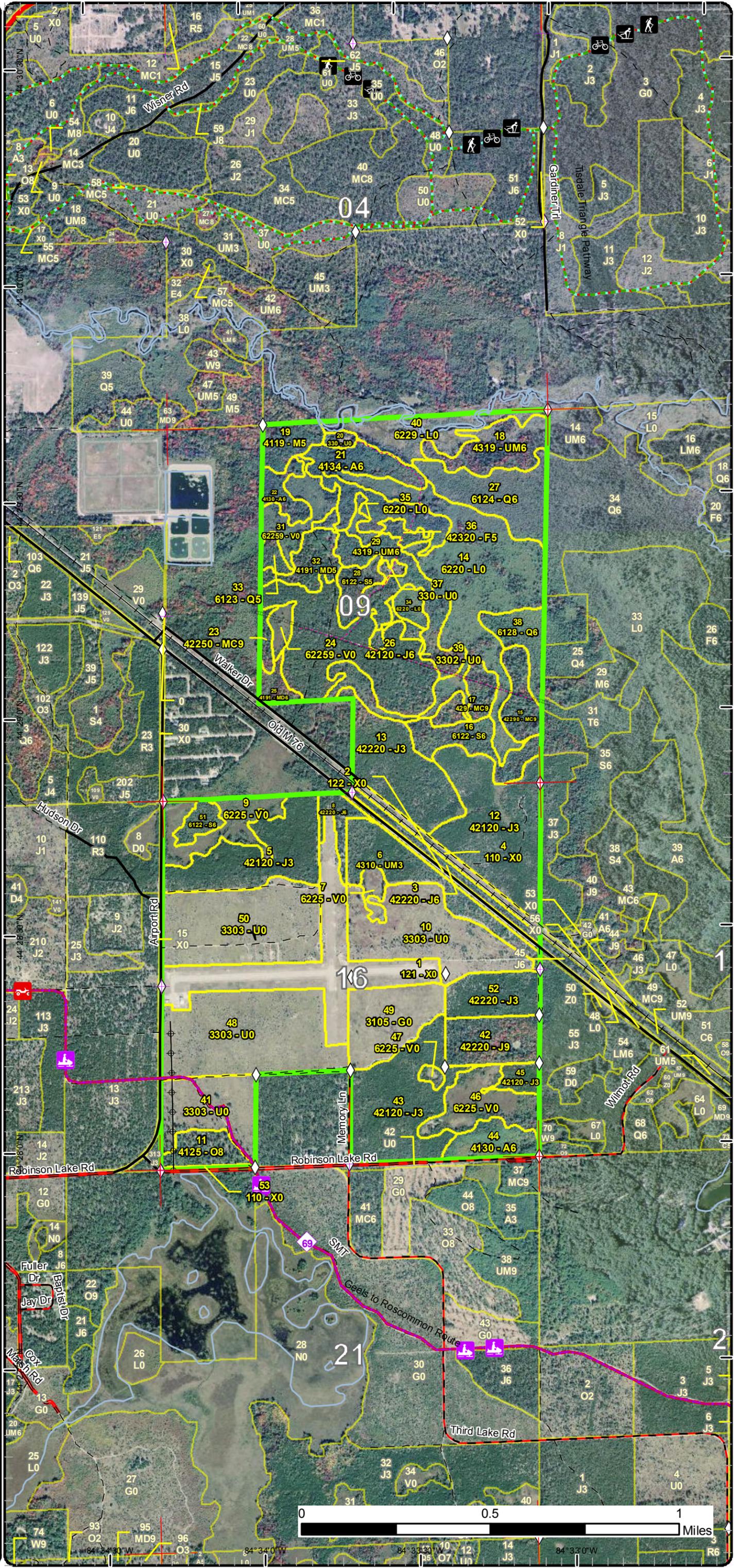
- ✚ Remonumented Section Corner
- ◇ Field Grade GPS Corners
- Miris Corners
- Highway
- Paved Roads
- County Gravel Roads
- Poor Dirt Roads
- County Poor Dirt Roads
- Trail (Non-Recreation)
- ✈ Airport
- 🚲 Bike Trails
- 👤 Hiking Trails
- 🛻 ORV Routes
- 🎿 Ski Trails
- 🏠 Snowmobile Trails
- Designated Hiking Pathways
- Designated Bicycle Trails
- Designated Ski Trails
- Designated ORV Routes
- Designated Snowmobile Trails
- Railroads
- Rivers
- Lakes
- Pipeline
- Powerline
- Treatments with Site Conditions
- Clearcut (w/Reserves)
- Other Treatment - See Comments
- Prescribed Burn
- Other Harvest - See Comments
- Thinning (Crown, Low, Systematic)
- Seed Tree (w/Reserves)
- Forest Covertype
- 411 - Northern Hardwood
- 412 - Oak Types
- 413 - Aspen Types
- 419 - Mixed Upland Deciduous
- 421 - Planted Pines
- 422 - Natural Pines
- 423 - Other Upland Conifers
- 429 - Mixed Upland Conifers
- 430 - Upland Mixed Fores
- 612 - Lowland Coniferous Forest
- Non-Forest Covertype
- 110 - Low Intensity Urban
- 121 - Airport
- 122 - Roads/Parking Lot
- 310 - Herbaceous Openland
- 330 - Low Density Trees
- 622 - Lowland Shrub



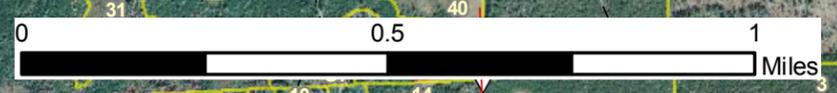
84°34'00"W Roscommon 35 2016 84°33'30"W Roscommon 37 2010 84°33'00"W Roscommon 39 2015

Stand Boundary Map

Compartment: 12
 T24N, R02W 09, 16
 County: Roscommon
 Unit: Roscommon
 Mgmt Area: AuSable Outwash
 YOE: 2017
 Acres: 1030 GIS Calculated
 Examiner: Doug Bates
 Map Revised: 7/22/2015
 Map Phase: Pre-Review



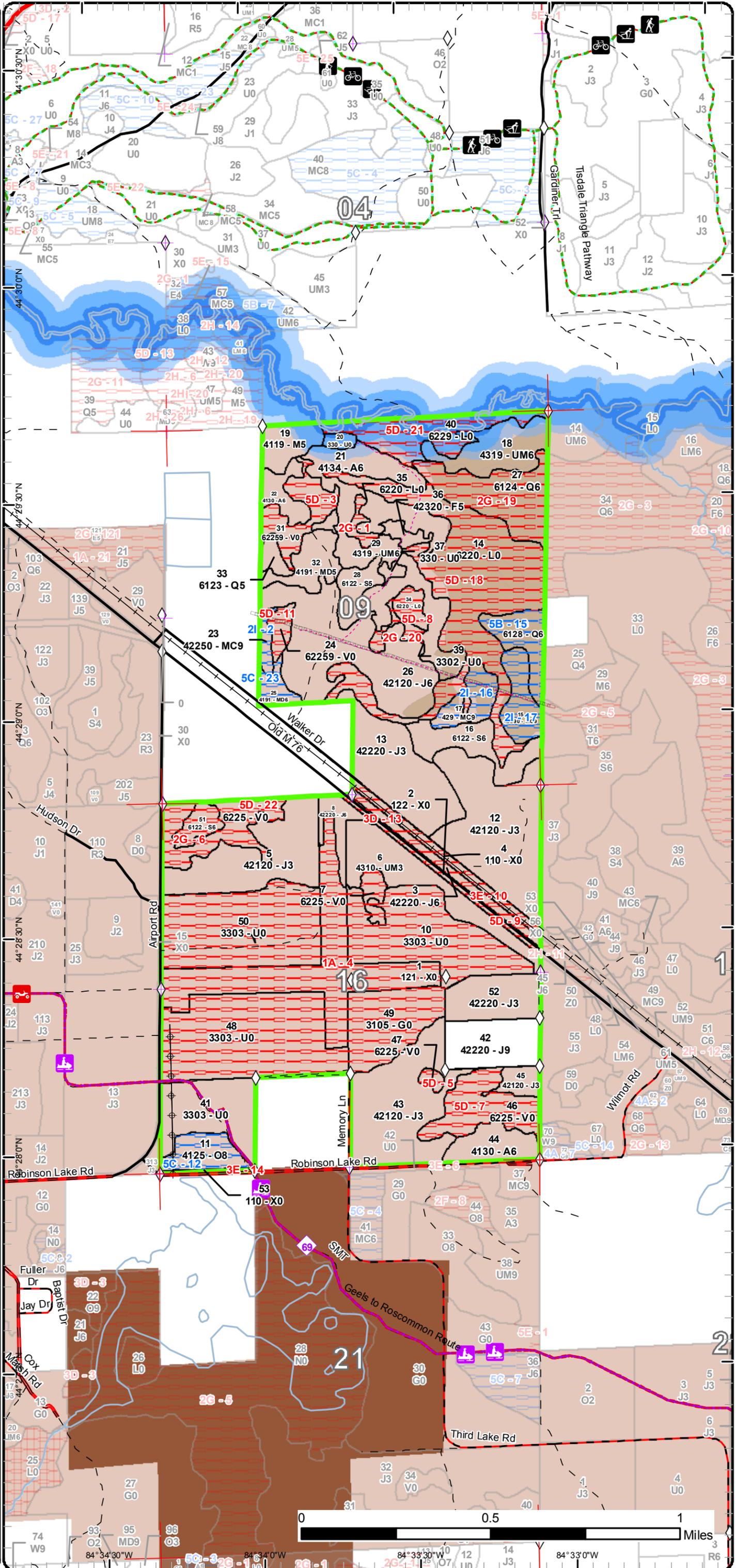
- ✦ Remonumented Section Corner
- ◇ Field Grade GPS Corners
- Miris Corners
- Highway
- Paved Roads
- County Gravel Roads
- Poor Dirt Roads
- County Poor Dirt Roads
- Trail (Non-Recreation)
- ✈ Airport
- 🚲 Bike Trails
- 👤 Hiking Trails
- 🚙 ORV Routes
- 🏂 Ski Trails
- 🏠 Snowmobile Trails
- Designated Hiking Pathways
- Designated Bicycle Trails
- Designated Ski Trails
- Designated ORV Routes
- Designated Snowmobile Trails**
- Designated Snowmobile Trails
- Railroads
- Rivers
- Pipeline
- Powerline
- Stand Boundaries
- Forest Covertype**
- 411 - Northern Hardwood
- 412 - Oak Types
- 413 - Aspen Types
- 419 - Mixed Upland Deciduous
- 421 - Planted Pines
- 422 - Natural Pines
- 423 - Other Upland Conifers
- 429 - Mixed Upland Conifers
- 430 - Upland Mixed Fores
- 612 - Lowland Coniferous Forest
- Non-Forest Covertype**
- 110 - Low Intensity Urban
- 121 - Airport
- 122 - Roads/Parking Lot
- 310 - Herbaceous Openland
- 330 - Low Density Trees
- 622 - Lowland Shrub



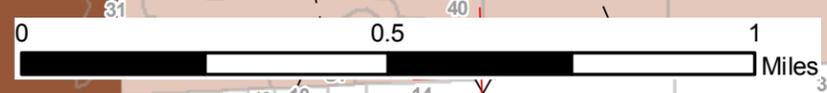
84° 34' 30" W 84° 33' 30" W 84° 33' 0" W 84° 33' 0" W

Special Conservation Areas & Site Conditions Map

Compartment: 12
 T24N, R02W 09, 16
 County: Roscommon
 Unit: Roscommon
 Mgmt Area: AuSable Outwash
 YOE: 2017
 Acres: 1030 GIS Calculated
 Examiner: Doug Bates
 Map Revised: 7/22/2015
 Map Phase: Pre-Review



- ✚ Remonumented Section Corner
- ◇ Field Grade GPS Corners
- Miris Corners
- Highway
- Paved Roads
- County Gravel Roads
- Poor Dirt Roads
- County Poor Dirt Roads
- Trail (Non-Recreation)
- ✈ Airport
- 🚲 Bike Trails
- 👤 Hiking Trails
- 🚙 ORV Routes
- 🎿 Ski Trails
- 🏠 Snowmobile Trails
- Designated Hiking Pathways
- Designated Bicycle Trails
- Designated Ski Trails
- Designated ORV Routes
- Designated Snowmobile Trails**
- Designated Snowmobile Trails
- Railroads
- Rivers
- Pipeline
- Powerline
- Stand Boundaries
- Site Condition**
- Available w/ Constraints
- Unavailable
- Available Factors W/ Constraints**
- 2I: Survey needed
- 5B: Maintain for regeneration purposes
- 5C: Delay treatment for age/size class diversity or exceptional site quality
- Unavailable Factors**
- 1A: Federal/State/Local Law
- 2G: Too wet (sensitive soils, does not include access issues)
- 3D: Recreational / Scenic values
- 3E: Easement / lease, non-military (e.g.- Consumers Power red pine, etc)
- 5D: Unproductive Forest Land
- Special Conservation Areas**
- Natural Rivers Vegetative Buffer
- Natural Rivers Zoning District
- Cold Water Streams
- Cold Water Lakes
- High Priority Trout Stream Buffer
- Wildlife Management Areas
- Research, Development, and Military Lands



84°34'30"W 84°33'30"W 84°33'0"W 84°33'0"W

Report 1 – Total Acres by Cover Type and Age Class



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	13	37	0	0	0	0	0	0	0	0	0	0	0	0	0	50
Bog	66	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	66
Herbaceous Openland	27	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	27
Jack Pine	0	0	53	144	55	7	0	9	0	0	0	21	0	0	0	0	0	0	289
Low-Density Trees	200	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	200
Lowland Conifers	0	0	0	0	0	0	0	0	0	4	12	0	27	0	0	0	0	0	43
Lowland Shrub	112	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	112
Lowland Spruce/Fir	0	0	0	0	0	0	0	17	8	0	0	0	0	0	0	0	0	6	31
Mixed Upland Deciduous	0	0	0	0	12	0	0	0	0	5	0	0	0	0	0	0	0	0	17
Natural Mixed Pines	0	0	0	0	0	0	0	0	0	0	3	0	0	0	12	0	0	0	15
Northern Hardwood	0	0	0	0	0	0	0	0	0	0	10	0	0	0	0	0	0	0	10
Oak	0	0	0	0	0	0	0	0	0	0	11	0	0	0	0	0	0	0	11
Upland Conifers	0	0	0	0	0	0	0	0	0	0	10	0	0	0	0	0	0	0	10
Upland Mixed Forest	0	0	26	0	27	0	0	0	0	0	20	0	0	0	0	0	0	0	73
Upland Spruce/Fir	0	0	0	0	3	0	0	0	0	0	0	0	0	0	0	0	0	0	3
Urban	72	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	72
Total	477	0	79	157	134	7	0	26	8	9	66	21	27	0	12	0	0	6	1029



Report 2 – Treatment Summary

Roscommon Mgt. Unit
Year of Entry: 2017

Acres of Harvest

Compartment 12
Total Compartment Acres: 1,030

Commercial Harvest - 28
Harvests with Site Condition - 25
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
Jack Pine	21	0	0	0	0	0	0	0	7	28
Natural Mixed Pines	3	0	0	0	12	0	0	0	0	15
Upland Conifers	0	0	0	10	0	0	0	0	0	10
Total	24	0	0	10	0	12	0	0	7	53

Proposed and Next Step Treatments by Method

	Harvest	Site Prep	Planting	Seeding	Burning	Pesticide	Monitoring	Other	Non-Forest Mgt.	Total Acres
Current	53	0	0	0	27	0	0	166	0	246
Next Step	0	166	0	0	166	0	34	0	34	400
Total	53	166	0	0	193	0	34	166	34	646



S t a n d	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Approval Status
8	71012008-Cut	7.1	42220 - Natural Jack Pine	Poletimber Well	49	81-110	Harvest	Other - Specify	310 - Herbaceous Openland		Proposal

Habitat Cut: No**Site Condition:**

Prescription Final harvest all species to a 2 inch d.b.h.. Tops must be chipped also. Convert site to open herbaceous land for airport runway purposes.

Specs:

Next Step

Treatments:

Acceptable

Regen:

Other Old next step comments:

Comment:

Proposed Start Date: 10/1 /2016

10	71012010- Other	47.6	3303 - Mixed Low Density Trees	Nonstocked		Unspec ified	Other	Other	310 - Herbaceous Openland		Proposal
----	--------------------	------	-----------------------------------	------------	--	-----------------	-------	-------	---------------------------------	--	----------

Habitat Cut: Yes**Site Condition: Federal/State/Local Law**

Prescription Aerial herbicide to kill off woody vegetation, i.e. oak, red maple, and jack pine so can be later roller chopped and/or burnt to maintain open grass status.

Specs:

Next Step SitePrep, Roller Chopping; Burn, Opening

Treatments:

Acceptable

Regen:

Other Old next step comments:

Comment:

Proposed Start Date: 10/1 /2016

15	71012015-Cut	12.0	42290 - Natural Mixed Pine	Sawtimber Well	130	81-110	Harvest	Low Thinning	42260 - Natural Pine, Mixed Deciduous	Uneven- Aged	Proposal
----	--------------	------	-------------------------------	-------------------	-----	--------	---------	--------------	---	-----------------	----------

Habitat Cut: No**Site Condition: Unknown Access**

Prescription Do a remove from below treatment pushing the stand to potential old-growth. Remove all species to 2 inches except the red and white pine. Cut all white pine 18 inches or less. Thin the red pine to 70 basal area where stocking is present and favor leaving the large trees because of their wind firmness and old-growth path. Leave a 3 percent retention island. A hundred foot width tag alder finger west of the stand will need crane mats to cross for access in addition to the crane mat crossing to get to stand 17. Decking/landing will need to be in stand's 26 or 29. Add hare Spec. 5.2.4.7..

Next Step

Treatments:

Acceptable

Regen:

Other Old next step comments:

Comment:

Proposed Start Date: 10/1 /2016



S t a n d	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Approval Status
17	71012017-Cut	10.1	429 - Mixed Upland Conifers	Sawtimber Well	92	81-110	Harvest	Seed Tree with Retention	4221 - Natural Red Pine	Two-Aged	Proposal

Habitat Cut: No **Site Condition: Unknown Access**

Prescription Remove all species to a two inch d.b.h.. with the following exceptions: Do not cut any red pine, leave all white pine 18 inches and up, cut oak down to a five inch d.b.h. and marked a handful of the larger oaks for mast. Access with be via an abandoned pipeline R.O.W. that bisects the stand. There is about a 100 foot stretch of tag alder between this stand and higher ground to the west that will require crane matts. Recommend they do not truck across but rather just skid and place the landing on high ground to the west in either stands 26 or 29. Leave a retention pocket of approximately 3% by area. Add hare Spec. 5.2.4.7..

Next Step
Treatments:

Acceptable A stand of mixed pine be it red and/or white pine to varying percentages mixed in with oak and other deciduous species
Regen:

Other Old next step comments:
Comment:

Proposed Start Date: 10/1 /2016

23	71012023-Cut	3.3	42250 - Pine, Oak	Sawtimber Well	95	81-110	Harvest	Clearcut	4222 - Natural Jack Pine	Even-Aged	Proposal
----	--------------	-----	-------------------	-------------------	----	--------	---------	----------	-----------------------------	-----------	----------

Habitat Cut: No **Site Condition: Survey Needed**

Prescription *Final harvest all species. Just want a narrow haul road so wood will need to be roundwooded out to a separate decking location in Stand 26.
Specs: No chipping allowed.
*Access route will be down cleared R.O.W. for an abandoned pipeline to the edge of Stands 24 and 26 and skirt around the north edge of 24 into the treatment area.
*No retention due to small size.

Next Step
Treatments:

Acceptable Jack pine and an oak mix with varied percentage in either is acceptable as long as the stand is fully stocked as a whole
Regen:

Other Old next step comments:
Comment:

Proposed Start Date: 10/1 /2016

42	71012042-Cut	20.7	42220 - Natural Jack Pine	Sawtimber Well	101	Unspec ified	Harvest	Clearcut	4222 - Natural Jack Pine	Even-Aged	Proposal
----	--------------	------	------------------------------	-------------------	-----	-----------------	---------	----------	-----------------------------	-----------	----------

Habitat Cut: No **Site Condition:**

Prescription Final harvest all species to a two inch d.b.h.. There is enough natural regeneration present that it should come back naturally but if not trench and plant to jack pine. Advise no retention do to the very old age of the jack pine and possibility of attracting budworm to the area.

Next Step
Treatments:

Acceptable Jack pine mixed with oak to vary percentages in either as long as it is fully stocked
Regen:

Other Old next step comments:
Comment:

Proposed Start Date: 10/1 /2016

48	71012048- Other	63.4	3303 - Mixed Low Density Trees	Nonstocked		Unspec ified	Other	Other	310 - Herbaceous Openland		Proposal
----	--------------------	------	-----------------------------------	------------	--	-----------------	-------	-------	---------------------------------	--	----------

Habitat Cut: Yes **Site Condition: Federal/State/Local Law**

Prescription Aerial herbicide to kill off woody vegetation, i.e. oak, red maple, and jack pine so can be later roller chopped and/or burnt to maintain open grass status.

Next Step SitePrep, Roller Chopping; Burn, Opening
Treatments:

Acceptable
Regen:

Other Old next step comments:
Comment:

Proposed Start Date: 10/1 /2016



S t a n d	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Approval Status
49	71012049- Burn	27.0	3105 - Mixed Upland Herbaceous	Nonstocked		Unspec ified	Burn	Opening	310 - Herbaceous Openland		Proposal

Habitat Cut: Yes **Site Condition: Federal/State/Local Law**Prescription Prescribe burn on a rotation to kill off woody vegetation and convert to open grassland.Specs:Next StepTreatments:AcceptableRegen:Other Current FTP# C71-732 is what is being used for past prescribe burns done to site. Old next step comments:Comment:Proposed Start Date: 10/1 /2016

50	71012050- Other	55.0	3303 - Mixed Low Density Trees	Nonstocked		Unspec ified	Other	Other	310 - Herbaceous Openland		Proposal
----	--------------------	------	-----------------------------------	------------	--	-----------------	-------	-------	---------------------------------	--	----------

Habitat Cut: Yes **Site Condition: Federal/State/Local Law**Prescription Aerial herbicide to kill off woody vegetation, i.e. oak, red maple, and jack pine so can be later roller chopped and/or burnt to maintain open grassSpecs: status.Next Step

SitePrep, Roller Chopping; Burn, Opening

Treatments:AcceptableRegen:Other Old next step comments:Comment:Proposed Start Date: 10/1 /2016

**Total Treatment
Acreage Proposed: 246.1**

Report 5 – Site Conditions

Roscommon Mgt. Unit

Doug Bates : Examiner

Compartment: 12

Year of Entry: 2017

Availability for Management

Total Acres	Acres Available	Acres Avail		Dominant Site Conditions	Dominant Site Conditions												
		With Condition	Not Available		2B	2I	5B	5C	1A	2G	3D	3E	5D				
50	50	0	0	Aspen													
66	0	0	66	Bog					5								62
27	0	0	27	Herbaceous Openland					27								
289	280	0	9	Jack Pine								9					
198	29	0	169	Low-Density Trees					166	3							
43	4	12	27	Lowland Conifers			12			27							
112	0	0	112	Lowland Shrub						3							110
31	25	0	6	Lowland Spruce/Fir						6							
17	12	5	0	Mixed Upland Deciduous				5									
15	0	15	0	Natural Mixed Pines	12	3											
10	10	0	0	Northern Hardwood													
11	0	11	0	Oak				11									
10	0	10	0	Upland Conifers	10												
73	73	0	0	Upland Mixed Forest													
3	3	0	0	Upland Spruce/Fir													
72	0	0	72	Urban					55					10			7
1,028	485	54	489	Total Forested Acres	22	3	12	16	253	39	9	10					178
	47%	5%	48%	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	2G: Too wet (sensitive soils, does not include access issues)	3	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
2	Available	2I: Survey needed	3	2B: Unknown if access through adjacent landowner(s) is possible	2E: Road needed	Unspecified	Unspecified
Comments:							

Report 5 – Site Conditions

Roscommon Mgt. Unit
Doug Bates : Examiner

Compartment: 12
Year of Entry: 2017

3	Unavailable	5D: Unproductive Forest Land	14	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
4	Unavailable	1A: Federal/State/Local Law	253	Unspecified	Unspecified	Unspecified	Unspecified
Comments: Roscommon Conservation airport and it respective cleared boundaries							
5	Unavailable	5D: Unproductive Forest Land	2	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
6	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	6	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
7	Unavailable	5D: Unproductive Forest Land	22	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
8	Unavailable	5D: Unproductive Forest Land	5	2G: Too wet (sensitive soils, does not include access issues)	Unspecified	Unspecified	Unspecified
Comments:							

Report 5 – Site Conditions

Roscommon Mgt. Unit

Doug Bates : Examiner

Compartment: 12

Year of Entry: 2017

9	Unavailable	5D: Unproductive Forest Land	7	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
10	Unavailable	3E: Easement / lease, non-military (e.g.- Consumers Power red pine, etc)	9	Unspecified	Unspecified	Unspecified	Unspecified
Comments: Lake State Railroad and MichCon pipeline R.O.W..							
11	Unavailable	5D: Unproductive Forest Land	4	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
12	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	11	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
13	Unavailable	3D: Recreational / Scenic values	9	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
14	Unavailable	3E: Easement / lease, non-military (e.g.- Consumers Power red pine, etc)	1	Unspecified	Unspecified	Unspecified	Unspecified
Comments: Overhead powerline R.O.W..							

Report 5 – Site Conditions

Roscommon Mgt. Unit
Doug Bates : Examiner

Compartment: 12
Year of Entry: 2017

15	Available	5B: Maintain for regeneration purposes	12	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
16	Available	2B: Unknown if access through adjacent landowner(s) is possible	10	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
17	Available	2B: Unknown if access through adjacent landowner(s) is possible	12	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
18	Unavailable	5D: Unproductive Forest Land	82	2G: Too wet (sensitive soils, does not include access issues)	Unspecified	Unspecified	Unspecified
Comments:							
19	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	27	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
20	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	3	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							

Report 5 – Site Conditions

Roscommon Mgt. Unit

Doug Bates : Examiner

Compartment: 12

Year of Entry: 2017

21	Unavailable	5D: Unproductive Forest Land	23	2G: Too wet (sensitive soils, does not include access issues)	Unspecified	Unspecified	Unspecified
Comments:							
22	Unavailable	5D: Unproductive Forest Land	20	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							
23	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	5	Unspecified	Unspecified	Unspecified	Unspecified
Comments:							

Mgt. Unit

Compartment: #Type!

Year of Entry:



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

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

SCA Name	SCA Category	Detail Type	Recommendation	Acres
----------	--------------	-------------	----------------	-------

Comments



Report 7 – EXISTING SPECIAL CONSERVATION AREA DETAILS

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

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

Conservation Area	Type	Description
SCA	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	Research and Military Areas	These areas provide facilities and lands specifically dedicated for research, or other purposes. They include the 5,847 acre Forest Fire Experiment Station, the 12,000 acre Houghton Lake Wildlife Research Area, the Beaver Islands Archipelago Wildlife Research Area (that includes most of Garden Island, all of High and Hog Islands, all state owned land on Beaver, South Fox and North Fox Islands), the Cusino Wildlife Research Area, the 3,000 acre Hunt Creek Fisheries Research Station, the 125 acre Wyman Nursery, and over 144,000 acres of Military Lands.
SCA	Riparian Area	A transitional area between aquatic and terrestrial ecosystems in which the terrestrial ecosystem influences the aquatic ecosystem and vice-versa. Because of the unique conditions adjacent to lakes, streams and open water wetlands, riparian areas harbor a high diversity of plants and wildlife. Riparian communities are ecologically and socially significant in their effects on water quality and quantity, as well as aesthetics, habitat, bank stability, timber production, and their contribution to overall biodiversity.
HCVA	Natural Rivers	There are two Natural Rivers datasets which are derived from spatial buffers set from an established and approved distance from the river centerlines. The Natural Rivers Zoning District is a 400 foot buffer for most Natural Rivers. The Vegetative Buffer ranges from 25 to 100 feet. To view specific Zoning Districts and Vegetative Buffers for each Natural River see the table located on the I:\Documentation\GDSE data folder.



	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
3	42220 - Natural Jack Pine	Poletimber Well	8.6	65	Unspecified	Thin strip of land between M-76 and the Railroad. There is a strip of red pine of 5-6 rows wide about 100 yards long at the north end. The rest is natural regeneration of jack and oak. Appears there once was an old narrow gauge rail bed that run down the middle of this stand. Leave as a visual buffer and wind break along M-76.
5	42120 - Planted Jack Pine	Sapling Well	37.4	24	Immature	Plantation established in 1991. They reseeded bare spots in April 1993. The oak is sparse mixed evenly though and is slightly larger do to most being from stump sprouts.
6	4310 - Pine, Oak Mix	Sapling Well	26.4	16	Immature	Stand was seeded to jack pine with the Sigma Seeder in 1998. It is still predominately jack pine but is not to far behind. The oak is larger being most of it is from stump sprouts. This will end up being a mixed stand in the future.
8	42220 - Natural Jack Pine	Poletimber Well	7.1	49	81-110	Mature jack pine, may want to harvest to open area up around the grass landing strip and allow maintenance to be done by mechanical means, i.e. mowing.
11	4125 - Black, N. Pin Oak	Sawtimber Medium	11.1	91	51-80	Stand was thinned in the spring of 1998 removing all pine, aspen, and maple and thinning of the oak. It has good jack pine regeneration coming in along with oak both seeded and stump sprouted. There is an overhead powerline/clearing along the south line and a small (1/2 acre) leatherleaf bog on the southwest edge. A small pocket on the southwest corner was not treated and is thicker and was left as a visual for the treatment. It consists of heavy white pine mixed with jack pine. Leave for another rotation and do wither a shelterwood or seed tree harvest this will allow the current regeneration to get larger.
12	42120 - Planted Jack Pine	Sapling Well	53.4	14	Immature	Stand was harvest in Winter 2001 and trenched/seeded in the spring of 2001. Lots of stump sprouted oaks.
13	42220 - Natural Jack Pine	Sapling Well	36.1	25	Immature	Stand was harvested and then roller chopped. It was never seeded with all jack pine regeneration being natural.
15	42290 - Natural Mixed Pine	Sawtimber Well	12.0	130	81-110	Two-aged stand of super-canopy red pine with a mid-canopy of white pine, spruce, etc. The regeneration is good mainly being white pine and equal percentage of spruce, fir and traces of the other canopy species. The portion of the stand north of the abandoned pipeline R.O.W. has several wetter depressions.
16	6122 - Black Spruce	Poletimber Well	16.8	67	51-80	Tamarack stand that has converted to a lowland spruce type that has decent spruce regeneration along with red maple and traces of the other canopy species. It possibly could be harvested but would need to be a winter harvest and tracked equipment.
17	429 - Mixed Upland Conifers	Sawtimber Well	10.1	92	81-110	Mixed stand of overmature jack pine and pin oak of poor quality. Scattered about are a few super-canopy red and white pines. The regeneration is very good with a mix of white pine with lesser degrees of spruce followed up by some oak and jack pine.
18	4319 - Mixed Upland Forest	Poletimber Well	19.9	90	81-110	



Stand	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
19	4119 - Mixed Northern Hardwoods	Poletimber Medium	9.8	91	81-110	Stand is not in decline, but would like to see more regeneration in the understory. The canopy is fairly open. Check in ten years to see if regeneration is further along and may harvest then. Will need a temporary bridge to cross a drainage channel 30 feet across that is used to discharge the final product from the Village of Roscommon waste water lagoons. Permission may need to be obtained also to cross village property to access site.
21	4134 - Aspen, Spruce/Fir	Poletimber Well	29.7	36	Unspecified	Final harvest stand that has come back mostly to aspen in the canopy, but the balsam fir is full in the mid and sub-canopies. Where the aspen is not in the canopy balsam fir is. The aspen is poor quality but will hold another rotation. Would have to be a winter cut for access and coppice regeneration.
22	4130 - Aspen	Poletimber Well	7.6	36	Unspecified	
23	42250 - Pine, Oak	Sawtimber Well	3.3	95	81-110	Overmature jack pine stand that should have been treated with stand 26. The only way to access it is through stand 26. This is a small stand, recommend just a narrow skid trail be allowed through Stand 26 on the edge to access this stand. The wood can be hauled out roundwood the old pipeline R.O.W. and decked at the access road intersection.
25	4191 - Mixed Upland Deciduous with Conifer	Poletimber Well	5.3	89	51-80	The west half of the stand is the lower ground with spruce and red maple overstory with tag alder mixed in. The east half grades up to high ground with oak overstory and balsam fir and other regeneration underneath. This stand front on Walker Drive and may be a good site to construct a road and tie into the existing trail system that is in the compartment from the last treatments that used private land for access.
26	42120 - Planted Jack Pine	Poletimber Well	55.3	38	Unspecified	Jack pine plantation averaging just over one stick. Have some large log sized red pine trees left scattered about from the original cut for future snag trees.
27	6124 - Lowland Spruce-Fir	Poletimber Well	27.4	114	51-80	Q type that in areas is dominated by tamarack and balsam fir with some scattered cedars and birch. Tag alder and willow is thick in understory especially in more open areas. Stand is part of a large stand in C10 to the east. The species composition changes throughout.
28	6122 - Black Spruce	Poletimber Medium	8.1	75	51-80	The stand has numerous open areas scattered about that are just tag alder but they are small and surrounded by spruce. The overstory spruce has heavy spruce regeneration underneath. There are even areas where find red pine intermixed.
29	4319 - Mixed Upland Forest	Poletimber Well	26.5	36	51-80	A variable stand that appears to have been final harvested and now is coming back mixed but still a majority being aspen. Left some larger oaks post-harvest that are log sized now. The aspen is poor quality though and is present in some percentage in the entire stand. Where the aspen is the thickest in the overstory is where red maple regeneration is the heaviest and thins out as the canopy changes and will find regeneration such as fir and oak. In the middle of the stand, on the west side, will find an oak pocket inclusion with some aspen in it.



	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
32	4191 - Mixed Upland Deciduous with Conifer	Poletimber Medium	11.8	36	51-80	Mixed stand that has a reversed "L" shape that is not as dense that was a grass opening but has since started to fill in with the surrounding timber types. The overall stand has aspen, jack pine, and oak. There are some other species mixed in as well such as red pine and maple.
33	6123 - Lowland Fir	Poletimber Medium	3.6	89	Unspecified	Lowland conifer stand that has some maple and paper birch particularly up at the northern tip. The understory is tag alder with the dominate regenerating species being spruce and fir. Stand is holding and reevaluate when stand 32 is up for treatment to see if possible to harvest this stand at the same time and get acceptable regeneration.
36	42320 - Upland Spruce	Poletimber Medium	3.2	36	Unspecified	A spruce and white pine stand with aspen and oak mixed in on the high ground and in the low pockets will find the tag alder. These low areas are found sporadically around the stand but not in great size.
38	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	12.4	90	111-140	Appears to have been maybe a suppressed stand based on the age of the trees and their size being under log size. There is a small pocket of super-canopy trees from a stand in the compartment to the east. The regeneration is heavy and the sub-canopy species reflects the overstory stand it's under. Advise not to harvest this rotation because feel to much of the small regeneration would become damaged. The overstory appears health, just small. Let it go another rotation or maybe two to get some growth on them and the regeneration up into the pole class which hopefully would reduce the percent of regeneration damaged by the treatment.
42	42220 - Natural Jack Pine	Sawtimber Well	20.7	101	Unspecified	A recently acquired private parcel that solidifies the state land holdings. It was never treated as evident by the age of the jack pine. Definitely needs to be harvested. Good regeneration already in understory.
43	42120 - Planted Jack Pine	Sapling Well	46.8	21	Immature	Site trench and planted to jack pine in 1994. Some aspen coming in with little more oak mainly off stump sprouts.
44	4130 - Aspen	Poletimber Well	12.7	21	Immature	Nice aspen stand just coming into pole size. Some mixed oak and maple regeneration underneath. Just a small percentage of oak in the canopy.
45	42120 - Planted Jack Pine	Sapling Well	5.3	21	Immature	Site was trenched and planted to jack pine in 1994. Some oak stump sprouts coming.
51	6122 - Black Spruce	Poletimber Well	5.7	95	Unspecified	Black spruce stand in the middle of a leatherleaf bog.
52	42220 - Natural Jack Pine	Sapling Well	18.2	24	Immature	This was a private parcel that was clearcut by the private landowner back in 1990 and acquired by the state shortly thereafter. It has come back thick to jack pine with a good percentage of stump sprouted oak also.



Stand	Cover Type	Acres	Managed Site	General Comments:
1	121 - Airport	55.5	Yes	The Michigan Department of Natural Resources airport. Paved runway with grass landing strips on crosswind side. Contains two hangers. The grass along the runway edges is mowed.
2	122 - Road/Parking Lot	6.7	No	Old M-76.
4	110 - Low Intensity Urban	8.9	No	Cleared R.O.W. containing the Lake States Railroad on the west side and a buried Gas Pipeline of Michcon's on the east edge.
7	6225 - Bog	4.6	No	Leatherleaf bog.
9	6225 - Bog	19.7	No	
10	3303 - Mixed Low Density Trees	47.6	Yes	This stand is not to become a forest stand again, but rather an open grass field to eliminate tall objects interfering with planes taking off and landing. A prescribed fire was attempted but failed to kill any of the oak and little of the jack pine. It has been decided to apply herbicide aerially and then either mechanically treat the woody vegetation, i.e. roller chop, and/or follow-up with a moderate prescribed burn cycle.
14	6220 - Alder/willow	82.0	No	Tag alder marsh with black spruce mainly along perimeter. There is some pockets scattered throughout of spruce but also cedar. There is trace of tamarack around perimeter also.
20	330 - Low-Density Trees	2.1	No	May have been an old landing site for the adjacent treatment done in the 70's, but is currently a grass opening with some of the native species slowly filling in on the edges but not enough to call it a forested stand.
24	62259 - Bog (OI)	4.2	No	Leatherleaf bog with some spruce and tamarack here and there.
31	62259 - Bog (OI)	14.3	No	Leatherleaf bog with some spruce, tamarack and pine scattered about in low numbers.
34	6220 - Alder/willow	4.6	No	Tag alder marsh.
35	6220 - Alder/willow	2.7	No	Tag alder marsh
37	330 - Low-Density Trees	1.6	No	May have been an old landing site for the adjacent treatment done in the 70's, but is currently a grass opening with some of the native species slowly filling in on the edges but not enough to call it a forested stand.
39	3302 - Low Density Conifer Trees	3.4	No	Tag alder marsh with fair amount of pole sized black spruce all over but they are not enough to meet the 25 percent canopy closure.
40	6229 - Mixed lowland shrub	23.0	No	



Stand	Cover Type	Acres	Managed Site	General Comments:
41	3303 - Mixed Low Density Trees	26.8	No	Hand planted with red pine seedlings in 2010. They planted less per acre (approx. 400) of red pine and wanted to get more interface with natural jack pine and oak. This has occurred, there is full mix of natural jack pine and oak both from stump sprouts and seeding. Should become a diverse stand in the future.
46	6225 - Bog	21.8	No	Leatherleaf bog with lowland jack pine around the perimeter.
47	6225 - Bog	1.8	No	Leatherleaf bog with a perimeter of lowland jack pine.
48	3303 - Mixed Low Density Trees	63.4	Yes	This stand is not to become a forest stand again, but rather an open grass field to eliminate tall objects interfering with planes taking off and landing. A prescribed fire was attempted but failed to kill any of the oak and little of the jack pine. It has been decided to apply herbicide aerially and then either mechanically treat the woody vegetation, i.e. roller chop, and/or follow-up with a moderate prescribed burn cycle.
49	3105 - Mixed Upland Herbaceous	27.0	Yes	This is an opening for the airport runway that is being kept from regenerating back into a forested stand by prescribed fire. The burn FTP # is C71-732. The purpose of the opening maintenance is for safety immediately adjacent to the runway of tall objects affecting aircraft take off and landings.
50	3303 - Mixed Low Density Trees	55.0	Yes	This stand is not to become a forest stand again, but rather an open grass field to eliminate tall objects interfering with planes taking off and landing. A prescribed fire was attempted but failed to kill any of the oak and little of the jack pine. It has been decided to apply herbicide aerially and then either mechanically treat the woody vegetation, i.e. roller chop, and/or follow-up with a moderate prescribed burn cycle.
53	110 - Low Intensity Urban	1.1	Yes	Overhead powerline and its cleared right-of-way.