

Compartment Review Presentation

Pigeon River Country Forest Management Unit

Compartment 53013 Entry Year 2018 Acreage: 1,859

County Cheboygan

Management Area: Pigeon River Country

Revision Date: 2016-07-15

Stand Examiner: Richard McDonald

Legal Description:

T33 - R01W, sections 19, 30, 31

Identified Planning Goals:

Maintain current species mix and apply appropriate management techniques to mature stands of timber that are in need of treatment.

Soil and topography:

Uplands are generally rolling to mostly level. Soils are predominantly sand of varying associations including, Rubicon, Au Gres, and Cheboygan sands.

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

Entirely state-owned throughout the compartment, however, Wildwood subdivision and other large tracts of privately owned land bounds it to the west.

Unique Natural Features:

A representative from Michigan's Natural Features Inventory will be on hand at the formal compartment review.

Archeological, Historical, and Cultural Features:

None identified.

Special Management Designations or Considerations:

Proposed Hardwood Natural Area (stand 2) in north end of compartment.

Watershed and Fisheries Considerations:

Both Bird Tally Creek and Grindstone Creek have their origins within this compartment. Both creeks flow into the Pigeon River, which is a Natural River.

Wildlife Habitat Considerations:

Please refer to Wildlife Biologist's comments.

Mineral Resource and Development Concerns and/or Restrictions

Surface sediments consist of glacial outwash sand and gravel and postglacial alluvium and coarse-textured glacial till. The glacial drift thickness varies between 200 and 600 feet. Beneath the glacial drift is the Devonian Antrim Shale that is quarried for cement products elsewhere in the State. A gravel pit is located to the west and there is good potential on the uplands. This area was previously leased for oil and gas development. The Antrim Shale is thinning and subcrops in this area and may be too thin for production. The Niagaran reef trend is located five miles to the southeast. There is limited oil and gas potential for known producing formations in this compartment.

Consistent with the objectives of the Concept of Management there are no plans to engage in mining activities (sand, gravel, stone, etc.) or oil and gas development in this Compartment. Nondevelopment (no surface infrastructure including pipelines, new roads, utility lines, well pads, etc.) oil and gas leasing may be considered.

Vehicle Access:

There is good access to most, if not all, of the compartment. Most of the forest roads, however, have been closed to wheeled motorized vehicles with virtually all those closures still intact.

Survey Needs:

None required.

Recreational Facilities and Opportunities:

No maintained recreational facilities exist within this compartment. Hunting, mushroom and berry picking are the main forms of recreation in this area. The High Country Pathway travels through the NE ¼ of section 31.

Fire Protection:

Access is generally good in case of any fire suppression efforts, though the area is generally at low risk to any wildfire potential. Most road systems are closed with berms.

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

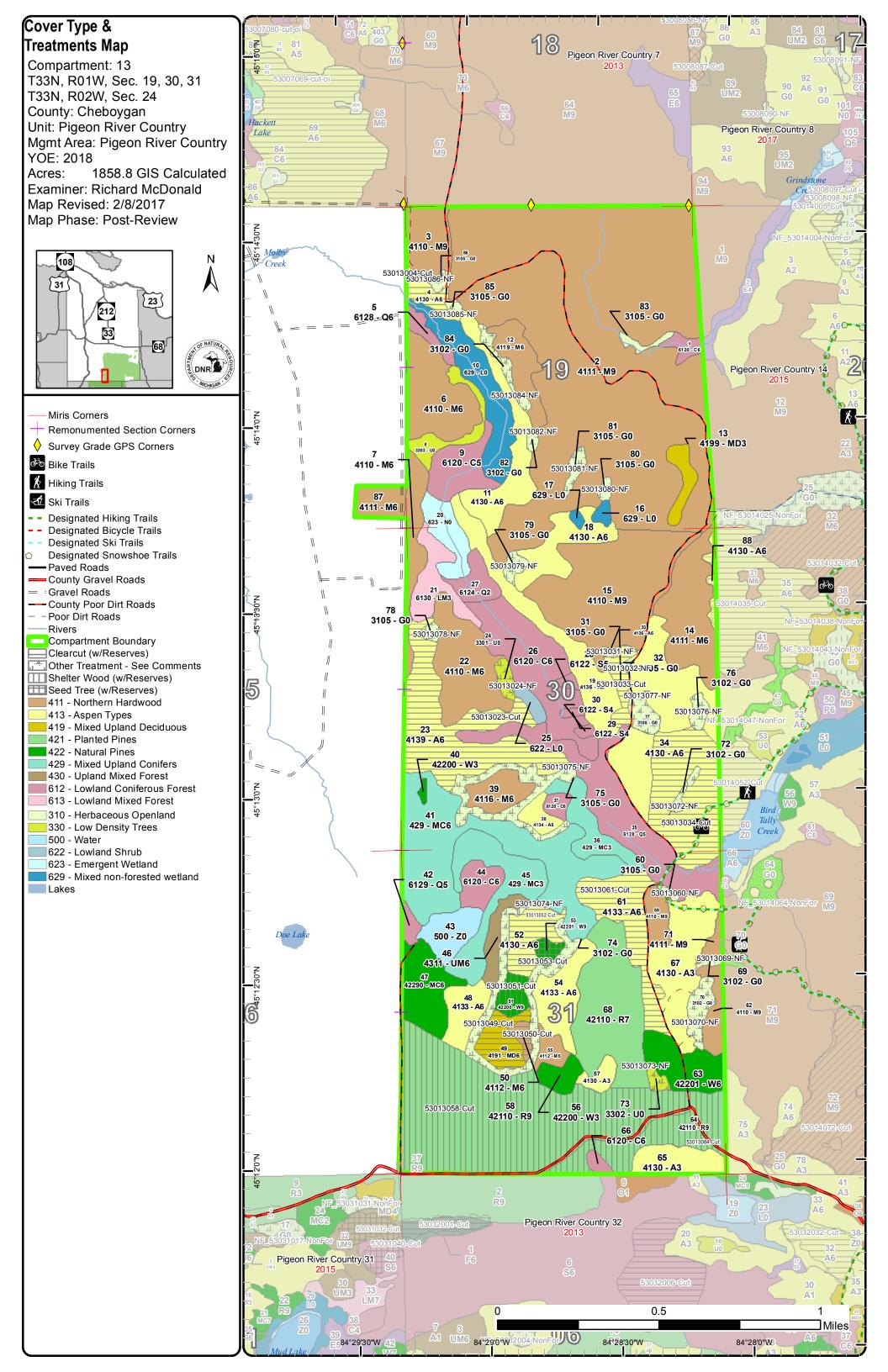
The following information is displayed, where pertinent, on the attached compartment maps:

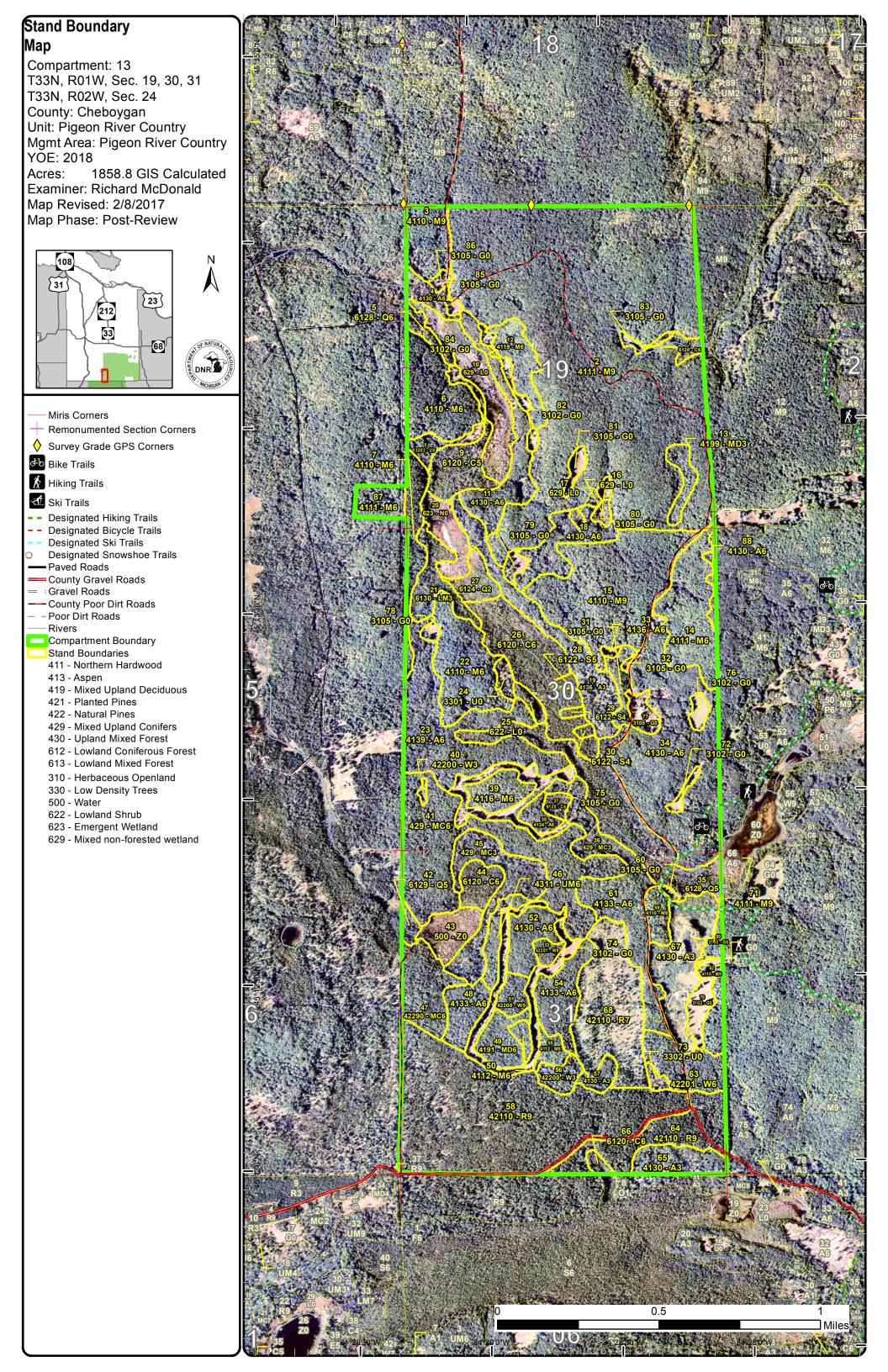
Base feature information, stand boundaries, cover types, and numbers Proposed treatments

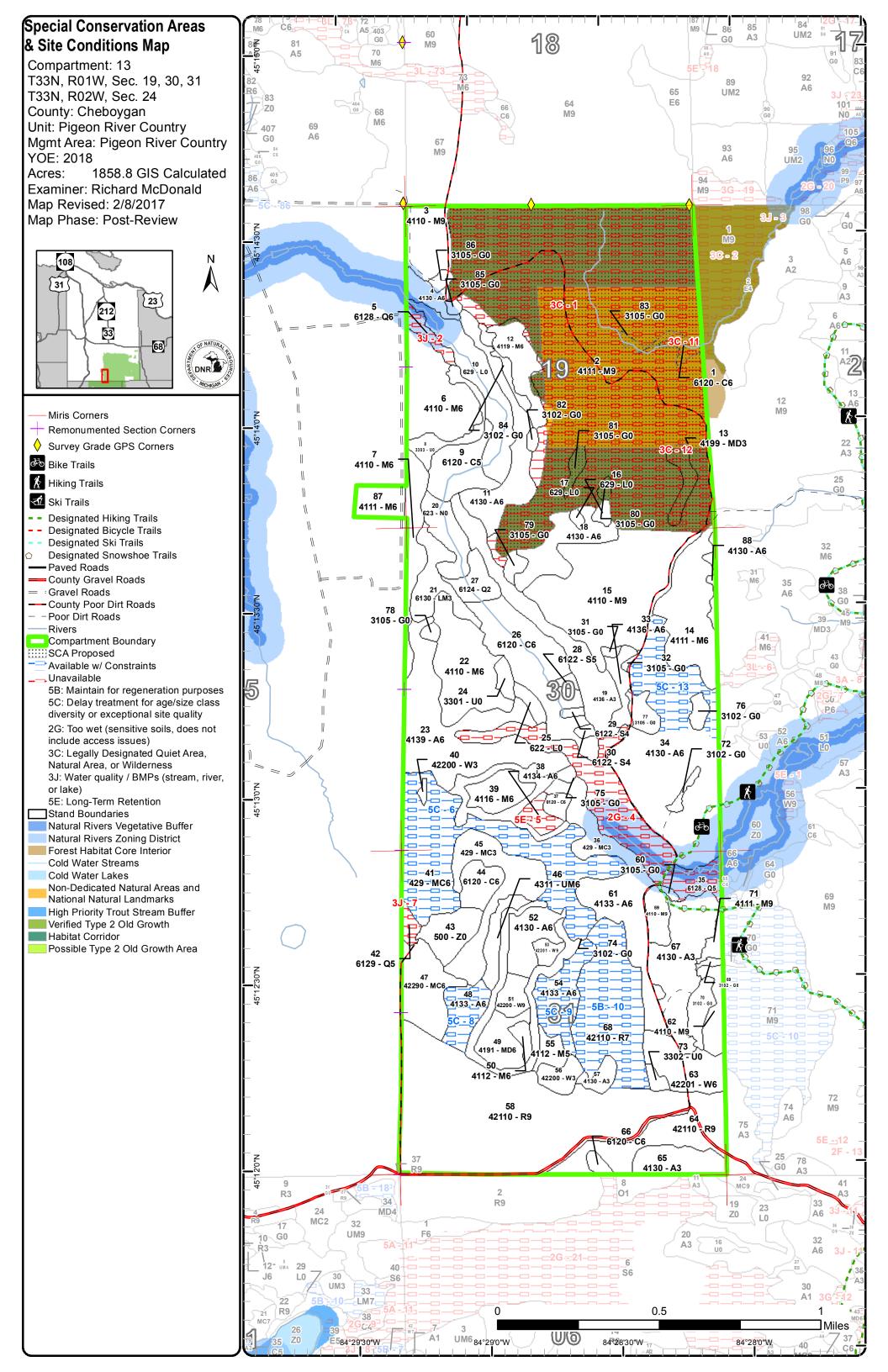
Site condition boundaries

Site condition boundaries

Details on the road access system







Pigeon River Country Mgt. Unit

Richard McDonald : Examiner

Compartment 13

Year of Entry 2018



Age Class

	Hon	Ko S	3/2	\$\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\	\$ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	8 / 6	8	3/8	18 / 18	\$ \ \$	8 8	\$ \\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	00 Z	\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\	, & / &	\$ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	LIN A	g* Jue	See 10 10 10 10 10 10 10 10 10 10 10 10 10
Aspen	0	36	0	50	53	225	0	0	0	7	0	0	0	0	0	0	0	31	402
Cedar	0	0	0	0	0	0	0	0	0	0	4	3	3	72	0	0	0	0	82
Herbaceous Openland	81	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	81
Low-Density Trees	16	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	16
Lowland Conifers	0	0	0	9	0	0	0	0	0	5	0	0	0	58	0	0	0	0	72
Lowland Mixed Forest	0	0	0	16	0	0	0	0	0	0	0	0	0	0	0	0	0	0	16
Lowland Shrub	36	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	36
Lowland Spruce/Fir	0	0	0	0	0	0	5	0	0	0	0	0	0	0	0	0	0	0	5
Marsh	14	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	14
Mixed Upland Deciduous	0	0	0	7	0	13	0	0	0	0	0	0	0	0	0	0	0	0	20
Natural Mixed Pines	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	23	23
Northern Hardwood	0	0	0	0	16	56	0	0	0	0	77	13	380	0	0	0	0	123	665
Red Pine	0	0	0	0	0	0	0	0	0	237	0	0	0	0	0	0	0	0	237
Upland Conifers	0	0	0	48	0	0	0	0	82	0	0	0	0	0	0	0	0	0	130
Upland Mixed Forest	0	0	0	0	0	9	0	0	0	0	0	0	0	0	0	0	0	0	8
Water	14	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	0	14
White Pine	0	0	1	0	7	0	0	0	24	0	7	0	0	0	0	0	0	0	39
Total	161	36	1	130	76	303	5	0	106	249	88	16	383	130	0	0	0	177	1860



Report 2 – Treatment Summary

Pigeon River Country Mgt. Unit Year of Entry: 2018

Acres of Harvest

Compartment 13
Total Compartment Acres: 1,859

Commercial Harvest - 380 Harvests with Site Condition - 0 Next Step Harvest - 0 Habitat Cut - 0

Cover Type by Harvest Method

		1										
		/(# / C	10 10 10 10 10 10 10 10 10 10 10 10 10 1			DOM ON A	Children of the State of the St	Key Co.	85 / 85 / 85 / 85 / 85 / 85 / 85 / 85 /		
Aspen		172	0	0	0	0	0	0	0	0	172	
Mixed Upland Deciduous		13	0	0	0	0	0	0	0	0	13	
Northern Hardwood		3	0	0	0	0	0	0	0	0	3	
Red Pine		0	0	0	0	182	0	0	0	0	182	
White Pine		0	0	0	4	7	0	0	0	0	10	
,	Total	188	0	0	4	188	0	0	0	0	380	

Proposed and Next Step Treatments by Method

		/.	is a line is	Q / Q	o'iiino o		o in a	O O O O	o inomo		4° / 3	
Current		380	0	0	0	0	0	0	0	82	462	
Next Step		0	0	0	0	0	0	380	0	0	380	
	Total	380	0	0	0	0	0	380	0	82	841	

Pigeon River Country Mgt. Unit Report 3 -- Treatments Compartment: 13 s Year of Entry: 2018 t а **Treatment** Stand Size Stand BA **Treatment Treatment Cover Type** Acres Age **Approval** n Name CoverType Density Age Range Type Method Objective Structure d 53013004-Cut 7.0 81-110 Clearcut Draft Field 4130 - Aspen Poletimber 82 Harvest 413 - Aspen Even-Aged Well

Habitat Cut: No Site Condition:

Prescription Clearcut with no retention due to it's small size.

Specs:

Monitoring, Natural Regen (Re-Inventory) Next Step

Treatments:

Acceptable A moderate to well stocked stand of Aspen or Aspen mixed with other existing species will be acceptable. Due to frequent beaver activity along

this drainage, Aspen is at risk of being negatively impacted. Regen:

Other Comment:

Proposed Start Date: 10/01/2017

4139 - Aspen, 413 - Aspen 23 53013023-Cut 61.6 Poletimber 49 111-Harvest Clearcut with Even-Aged Draft Field Mixed Deciduous Well 140 Retention Boundary

Habitat Cut: No Site Condition:

Prescription Clearcut with 2-3 retention islands. Also, mark some larger diameter trees (1-2 per acre) to cut and leave for grouse drumming logs.

Specs:

Next Step Monitoring, Natural Regen (Re-Inventory)

Treatments:

Acceptable A moderate to well stocked stand of Aspen or Aspen mixed with other existing species will be acceptable.

Regen:

Other Comment:

Proposed Start Date: 10/01/2017

53013024-NF 310 -Draft Field 3.6 3301 - Low Density Nonstocked Unspec NonForestMgt Other - Specify Deciduous Trees Herbaceous ified Boundary Openland

Habitat Cut: No Site Condition:

Prescription Mow, plant, brush, burn, and/or herbicide to maintain opening. Plant hard or soft mast.

Specs:

Next Step Treatments:

<u>Acceptable</u>

Regen:

Other Comment:

10/01/2017 **Proposed Start Date:**

53013031-NF 1.0 3105 - Mixed Nonstocked Unspec NonForestMgt Other - Specify 310 -Draft Field Herbaceous **Upland Herbaceous** Boundary ified Openland

Site Condition: Habitat Cut: No

Prescription Mow, plant, brush, burn or herbicide to maintain openings. Plant hard or soft mast.

Specs:

Next Step

Treatments:

Acceptable

Regen:

Other Comment:

Proposed Start Date:

10/01/2017

Status

Boundary

Pigeon River Country Mgt. Unit Report 3 -- Treatments Compartment: 13 S Year of Entry: 2018 t а **Treatment Cover Type Treatment** Acres Stand Size Stand BA Treatment Age **Approval** n Name CoverType Density Age Range Type Method Objective Structure **Status** d 53013032-NF Draft Field 32 0.6 3105 - Mixed Nonstocked Unspec NonForestMgt Other - Specify 310 -**Upland Herbaceous** ified Herbaceous Boundary Openland **Habitat Cut: No Site Condition:** Prescription Mow, plant, brush, burn or herbicide to maintain openings. Plant hard or soft mast. Specs: Next Step Treatments: <u>Acceptable</u> Regen: Other Comment: **Proposed Start Date:** 10/01/2017 Draft Field 53013033-Cut 7.3 4136 - Aspen, Poletimber 49 81-110 Harvest Clearcut 413 - Aspen Even-Aged Well Boundary Mixed Conifer **Habitat Cut: No Site Condition:** Prescription Clearcut with no retention due to stand size. Specs: Next Step Monitoring, Natural Regen (Re-Inventory) Treatments: Acceptable A moderate to well stocked stand of Aspen or Aspen mixed with other hardwood species will be acceptable. Regen: Other Comment: **Proposed Start Date:** 10/01/2017 53013034-Cut 50.3 4130 - Aspen Poletimber 49 81-110 Harvest Clearcut with 413 - Aspen Even-Aged Draft Field Well Boundary Retention Site Condition: **Habitat Cut: No** Prescription Clear cut with 2-3 retention islands within the stand. Along the southeast portion along the creek, it may be necessary to stay up on top of some Specs: of the steeper slopes that lead to the creek bottom. Maintain the integrity of the trail with limited impact by logging equipment. The boundary line may need to be adjusted to accomplish this. Crossing of trail during logging operations should be limited to one or two locations. The trail shall be signed on both ends of the job to warn of logging operations ahead. Retention areas should be focused along the trail and road to reduce visual impact. Next Step Monitoring, Natural Regen (Re-Inventory) Treatments: Aspen is the objective and should regenerate well. Anything less than a moderate to well stocked stand of Aspen regeneration should be Acceptable Regen: considered a failure. A combination of other species along with Aspen will be acceptable. Other Comment: **Proposed Start Date:** 10/01/2017 413 - Aspen 53013049-Cut 12.6 4191 - Mixed Poletimber 41 111-Harvest Clearcut with Draft Field Even-Aged **Upland Deciduous** Well 140 Retention Boundary with Conifer **Habitat Cut:** No Site Condition:

Prescription Clearcut with single tree retention. Cut everything except the Oak and a few scattered mature pine. Mark a few (1-2 per acre) larger diameter

Specs: trees to cut and leave for drumming logs.

Monitoring, Natural Regen (Re-Inventory) Next Step

Treatments:

Acceptable A moderate to well stocked stand of Aspen or Aspen mixed with other existing species will be acceptable.

Regen:

Other Comment

Proposed Start Date: 10/01/2017

Compartment: 13

Year of Entry: 2018

Pigeon Rive	r Country	Mgt.	Unit

a n d	Treatment Name	Acres	Stand CoverType	Size S Density	Stand Age	BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Approval Status	,
50	53013050-Cut	3.0	4112 - Maple, Beech, Cherry Association	Poletimber Well	49	81-110	Harvest	Clearcut	4199 - Other Mixed Upland Deciduous	Even-Aged	Draft Field Boundary	_

Habitat Cut: No Site Condition:

Prescription Clearcut small pocket of hardwood adjacent to mixed deciduous stand. With the relatively high percentage of beech and the fact that most of it, if not all, is infected with BBD, I recommend cutting everything. With the amount of aspen in the stand and surrounding it, there should be Specs:

enough to get a pretty well stocked stand of aspen back

Monitoring, Natural Regen (Re-Inventory) Next Step

Treatments:

Acceptable A moderate to well stocked stand of aspen with mixed hardwood will be acceptable.

Regen:

S

Other Comment:

Proposed Start Date: 10/01/2017

53013051-Cut 42200 - Natural Sawtimber 81-110 Harvest Shelterwood 4319 - Mixed Even-Aged Draft Field White Pine Well **Upland Forest** Boundary

Site Condition: **Habitat Cut: No**

Prescription Leave better quality white pine of about 30-40 sq. ft. Cut all other species except leave all Oak.

Specs:

Next Step Monitoring, Natural Regen (Re-Inventory)

Treatments:

Acceptable A moderate to well stocked stand of aspen, white pine and other mixed hardwood will be acceptable.

Regen:

Other Comment:

Proposed Start Date: 10/01/2017

53013052-Cut 141-Clearcut with Draft Field 15.3 4130 - Aspen Poletimber Harvest 413 - Aspen Even-Aged Well 170 Retention Boundary

Habitat Cut: No Site Condition:

Prescription Clearcut with 1-2 retention islands. Mark some larger diameter trees to cut and leave for grouse drumming logs. Leave any Oak that may me in

Specs:

Next Step Monitoring, Natural Regen (Re-Inventory)

Treatments:

Acceptable A moderate to well stocked stand of Aspen or Aspen mixed with other existing species will be acceptable.

Regen:

Other

Comment:

Proposed Start Date: 10/01/2017

53 53013053-Cut 42201 - Natural 81-110 Seed Tree 4319 - Mixed Draft Field Sawtimber 71 Harvest Even-Aged White Pine, Mixed Well **Upland Forest** Boundary

Deciduous

Site Condition:

Prescription Mark 20-30 sq. ft. of White Pine to leave. Concentrate on leaving straight, nicer quality White Pine. Cut all other species except leave any Oak

that may be in the stand. Specs:

Next Step Monitoring, Natural Regen (Re-Inventory)

Treatments:

Habitat Cut: No

Acceptable With the aspen component in the stand, it should just mix right in with stand 52 when it regenerates. The seed trees are there, hopefully, to Regen:

ensure a white pine component in the stand. A moderate to well stocked stand of aspen mixed with white pine and other existing species will be

acceptable.

Other Comment:

Proposed Start Date: 10/01/2017

Compartment: 13 Year of Entry: 2018



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
58	53013058-Cut	148.1	42110 - Planted Red Pine	Sawtimber Well	89	81-110	Harvest	Shelterwood with Retention	4221 - Natural Red Pine	Two-Aged	Draft Field Boundary

Habitat Cut: No Site Condition:

<u>Prescription</u> Shelterwood cut leaving 40-50 sq. ft. residual throughout the stand. Maintain oak and white pine component. Open up pockets of existing specs: regeneration to remove competition and create larger (100') gaps to encourage natural regeneration of red pine in those gaps. Encourage scarification of areas of poor regeneration during logging operations.

Next Step Monitoring, Natural Regen (Intermediate)

Treatments:

Acceptable A moderate to well stocked stand of primarily Red Pine regeneration mixed with other existing species will acceptable.

Regen:

S

Other Comment:

Proposed Start Date: 10/01/2017

60 53013060-NF 1.0 3105 - Mixed Nonstocked Unspec NonForestMgt Other - Specify Upland Herbaceous ified Soundary Openland

Habitat Cut: No Site Condition:

<u>Prescription</u> Mow, plant, brush, burn or herbicide to maintain openings. Plant hard or soft mast.

Specs:

Next Step Treatments:

Acceptable Regen:

Other Comment:

Proposed Start Date: 10/01/2017

61 53013061-Cut 30.7 4133 - Aspen, Poletimber 49 81-110 Harvest Clearcut with 413 - Aspen Even-Aged Draft Field Mixed Pine Well Retention Boundary

Habitat Cut: No Site Condition:

<u>Prescription</u> Clearcut with 2-3 retention islands. Mark to leave some nice quality Red and White Pine throughout the sale.

Specs:

Next Step Monitoring, Natural Regen (Re-Inventory)

Treatments:

Acceptable Aspen regeneration is expected to do well, but any combination of species will be acceptable in determining regeneration success.

Regen:

Other Use retention pocket around gate and access road to Pretzel Openings to prevent vehicles from driving around the gate.

Comment:

Proposed Start Date: 10/01/2017

64 53013064-Cut 33.6 42110 - Planted Sawtimber 89 81-110 Harvest Shelterwood with 4319 - Mixed Two-Aged Draft Field Red Pine Well Retention Upland Forest Boundary

Habitat Cut: No Site Condition:

Prescription Shelterwood cut using a mark to cut method leaving 40-50 sq. ft. Leave any Oak that there may be in the stand. Also, there will be 2-3 retention

<u>Specs:</u> islands left in the stand with no cutting within the boundaries of those islands.

Next Step Monitoring, Natural Regen (Intermediate)

Treatments:

Acceptable Advanced regeneration of a mixed upland forest type of Quaking Aspen, Red Maple and Balsam Fir is already present under the existing Red Pine. Where possible try to preserve that understory, but scarification should be encouraged where regeneration is light to try and get Red Pine.

Other After this stand was previously cut back around 1990 there has been quite an understory of aspen, red maple and balsam fir develop making

<u>Comment:</u> long term management of Red Pine on this site very difficult.

Proposed Start Date: 10/01/2017

S t	Pigeor	River Co	untry Mgt. Unit		Re	eport 3	Treatmen	nts	-	tment: 13 Entry: 2018	DNR DNR
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
69	53013069-NF	1.1	3102 - Grass	Nonstocke	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide	_	openin	igs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	eptable en:										
Othe Com	<u>r</u> ment:										
Prop	osed Start Date	<u>:</u> 10/01	/2017								
70	53013070-NF	7.4	3102 - Grass	Nonstocke	d 0	Unspec ified	NonForestMgt	Other - Specify	3105 - Mixed Upland Herbaceous		Draft Field Boundary
		lant, brush	Site Condition by burn or herbicide		openin	ıgs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	eptable en:										
Othe Com	<u>r</u> ment:										
Prop	osed Start Date	10/01	/2017								
72	53013072-NF	2.1	3102 - Grass	Nonstocke	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	igs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	e <u>ptable</u> en:										
Othe Com	<u>r</u> ment:										
<u>Prop</u>	osed Start Date	10/01	/2017								
73	53013073-NF	2.4 3	302 - Low Density Conifer Trees	Nonstocke	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		ant, brush	Site Condition , burn, and/or herb		ntain op	penings.	Plant hard or soft	t mast.			
	Step tments:										
Acce Rege	eptable en:										
Othe Com	<u>r</u> ment:										

Proposed Start Date: 10/01/2017

S t	Pigeon	River Co	ountry Mgt. Unit		Re	eport 3	Treatmen	its	-	tment: 13 Entry: 2018	OF NATURAL SOLUTION OF NAT
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
74	53013074-NF	20.9	3102 - Grass	Nonstocked	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	igs. Plan	t hard or soft mas	st.			
	: Step tments:										
Acce Rege	eptable en:										
Othe Com	<u>er</u> iment:										
Prop	osed Start Date:	<u>:</u> 10/01	/2017								
75	53013075-NF	16.9 l	3105 - Mixed Jpland Herbaceou	Nonstocked s	b	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	gs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	eptable en:										
Othe Com	e <u>r</u> iment:										
Prop	osed Start Date:	<u>:</u> 10/01	/2017								
76	53013076-NF	3.2	3102 - Grass	Nonstocked	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	igs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	eptable en:										
	iment:										
Prop	osed Start Date:	<u>:</u> 10/01	/2017								
77	53013077-NF	5.7 l	3105 - Mixed Jpland Herbaceou	Nonstocked s	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	igs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	eptable en:										
Othe Com	e <u>r</u> iment:										

10/01/2017

Proposed Start Date:

S t	Pigeor	River Co	ountry Mgt. Unit		Re	eport 3	Treatmen	nts	-	tment: 13 Entry: 2018	OF NATURAL PROPERTY OF NAT
a n d	Treatment Name	Acres	Stand CoverType	Size Density	Stand Age	I BA Range	Treatment Type	Treatment Method	Cover Type Objective	Age Structure	Approval Status
78	53013078-NF	1.7 l	3105 - Mixed Jpland Herbaceous	Nonstocke s	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide	=	openin	ngs. Plan	t hard or soft mas	st.	Opermana		
	Step tments:										
Acce Rege	eptable en:										
Othe Com	<u>r</u> ment:										
<u>Prop</u>	osed Start Date	<u>:</u> 10/01	/2017								
79	53013079-NF	3.0 (3105 - Mixed Jpland Herbaceous	Nonstocke	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	ngs. Plan	t hard or soft mas	st.	·		
	Step tments:										
Acce Rege	e <u>ptable</u> en:										
Othe Com	<u>er</u> ment:										
Prop	osed Start Date	<u>:</u> 10/01	/2017								
80	53013080-NF	1.5 l	3105 - Mixed Jpland Herbaceous	Nonstocke	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	ngs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	eptable en:										
Othe Com	<u>r</u> ment:										
<u>Prop</u>	osed Start Date	<u>:</u> 10/01	/2017								
81	53013081-NF	3.3 l	3105 - Mixed Jpland Herbaceous	Nonstocke s	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	ngs. Plan	t hard or soft mas	st.			
	Step tments:										
Acce Rege	eptable en:										
Othe Com	er ment:										

Proposed Start Date: 10/01/2017

S	Pigeor	River Co	ountry Mgt. Unit		Re	eport 3	Treatmer	nts	-	tment: 13 Entry: 2018	DNR DNR
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
82	53013082-NF	1.3	3102 - Grass	Nonstocke	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brusł	Site Condition n, burn or herbicide		openin	gs. Plan	t hard or soft ma	st.	Орешани		
	Step tments:										
Acce Rege	<u>ptable</u> en:										
Othe Com	<u>r</u> ment:										
Prop	osed Start Date	10/01	/2017								
84	53013084-NF	4.3	3102 - Grass	Nonstocke	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	gs. Plan	t hard or soft ma	st.			
	Step tments:										
Acce Rege	<u>ptable</u> en:										
Othe Com	<u>r</u> ment:										
Prop	osed Start Date	10/01	/2017								
85	53013085-NF	1.3 l	3105 - Mixed Jpland Herbaceous	Nonstocke S	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	gs. Plan	t hard or soft ma	st.			
	Step tments:										
Acce Rege	ptable en:										
	ment:										
	osed Start Date		/2017								
86	53013086-NF	2.0 l	3105 - Mixed Jpland Herbaceous	Nonstocke S	d	Unspec ified	NonForestMgt	Other - Specify	310 - Herbaceous Openland		Draft Field Boundary
		lant, brush	Site Condition n, burn or herbicide		openin	gs. Plan	t hard or soft ma	st.			
	Step tments:										
Acce Rege	ptable en:										
Othe Com	<u>r</u> ment:										
Prop	osed Start Date	10/01	/2017								
A	Total Treatme creage Propos		64.0								

Pigeon River Country Mgt. Unit

Richard McDonald : Examiner

Availa	ability for	Managemen	nt							
Total	Acres	Acres Avail	Acres		Domina	nt Site	Con	ditions	5	
Acres	Available	With Condition	Not Available		5B	5C	2G	3C	3J	5E
401	330	65	6	Aspen		65				6
83	78	0	4	Cedar				4		
81	81	0	0	Herbaceous Openland						
16	16	0	0	Low-Density Trees						
72	9	0	63	Lowland Conifers			55		9	
16	16	0	0	Lowland Mixed Forest						
36	36	0	0	Lowland Shrub						
4	4	0	0	Lowland Spruce/Fir						
14	14	0	0	Marsh						
20	13	0	7	Mixed Upland Deciduous				7		
23	23	0	0	Natural Mixed Pines						
666	286	0	380	Northern Hardwood				380		
237	182	55	0	Red Pine	55					
129	48	82	0	Upland Conifers		82				
8	8	0	0	Upland Mixed Forest						
14	14	0	0	Water						
39	39	0	0	White Pine						
1,859	1,196	201	461	Total Forested Acres	55	146	55	392	9	6
	64%	11%	25%	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.

1	Unavailable	3C: Legally Designated Quiet Area, Natural Area, or Wilderness	380	Unspecified	Unspecified	Unspecified	Unspecified
	mments:	ardwood Natural Area.					

Report 4 – Site Conditions

Pigeon River Country Mgt. Unit Richard McDonald : Examiner

2	Unavailable	3J: Water quality / BMPs (stream, river, or lake)	5	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
4	Unavailable	2G: Too wet (sensitive soils, does not include access issues)	55	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
5	Unavailable Comments:	5E: Long-Term Retention	6	Unspecified	Unspecified	Unspecified	Unspecified
	Comments.						
6	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	82	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
7	Unavailable	3J: Water quality / BMPs (stream, river, or lake)	3	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						
8	Available	5C: Delay treatment for age/size class diversity or exceptional site quality	13	Unspecified	Unspecified	Unspecified	Unspecified
	Comments:						

Report 4 - Site Conditions

Compartment: 13

Pigeon River Country Mgt. Unit

age/size class diversity or exceptional site quality

Comments:

Year of Entry: 2018 **Richard McDonald: Examiner** 9 **Available** Unspecified Unspecified Unspecified Unspecified 5C: Delay treatment for 20 age/size class diversity or exceptional site quality Comments: Unspecified Unspecified Unspecified Unspecified 10 **Available** 5B: Maintain for 55 regeneration purposes Comments: Unspecified Unspecified 11 Unavailable 3C: Legally Designated Unspecified Unspecified 4 Quiet Area, Natural Area, or Wilderness Comments: Within Grindstone Creek Hardwood Natural Area 12 Unavailable 3C: Legally Designated 7 Unspecified Unspecified Unspecified Unspecified Quiet Area, Natural Area, or Wilderness Comments: Within Grindstone Creek Hardwood Natural Area 13 5C: Delay treatment for 32 Unspecified Unspecified Unspecified Unspecified **Available**

02/15/2017 1:51:28 PM - Page 3 of 3 DOHMN

Compartment: 013 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					
	Habitat Areas or Corridors	Habitat Corridor		0					
Comments									
	Habitat Areas or Corridors	Habitat Corridor	Proposed SCA	2					
Comments									
	ndstone Creek Non-dedicated Natu	ral Area							
	Habitat Areas or Corridors	Habitat Corridor	Proposed SCA	91					
Comments									
This area is part of the Grin	ndstone Creek Non-dedicated Natu	ral Area							
	Habitat Areas or Corridors	Habitat Corridor	Proposed SCA	91					
Comments									
This area is part of the Grin	ndstone Creek Non-dedicated Natu	ral Area							
	Habitat Areas or Corridors	Habitat Corridor	Proposed SCA	138					
Comments									
This area is part of the Grin	ndstone Creek Non-dedicated Natu	ral Area							
	Habitat Areas or Corridors	Habitat Corridor	Proposed SCA	138					
Comments									
This area is part of the Grin	ndstone Creek Non-dedicated Natu	ral Area							
Unspecified	Habitat Areas or Corridors	Habitat Corridor	Proposed SCA	2					
Comments GRINDSTONE HARDWOO									

Compartment: 13
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.

Conservati Area	ion Type	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 spec 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.	ies (e.g., slimy sculpin) to persist from ese conditions due to substantial
SCA	Non-Dedicated Natural Areas and National Natural Landmarks	This category is comprised of those Natural, Wilderness and Wilderness and Frequency of the second o	egislature has not occurred. The ural Areas, of the Natural Resources and ninistered by the DNR. Nominations e DNR. This is an active program, with
SCA	Potential Old Growth Areas	This category contains stands were identified for a broad range database as stand condition 8 as potential old growth (POG). identified through the Operations Inventory (OI)/Compartment Rentry 2008 and forward, potential old growth is managed for the through the Biodiversity Conservation Planning Process (BCPP) objective (as an ERA, HCVA, or other type of SCA) and is release designation; or 2) it is released from the potential old growth desprocess.	Approximately 310,000 acres have been eview process. For stands in Year of identified objective until it is: 1) vetted and given a specific designation and sed from the potential old growth
HCVA	Legally dedicated Natural Areas, Wilderness or Wild Areas	The nomination process is defined by Part 351, Wilderness and and Environmental Protection Act, 1994 PA 451. The program is require the submittal of a Natural Areas Nomination Packet to th proposed sites in various stages of review. Final dedication of no Areas is accomplished through legislative action.	administered by the DNR. Nominations e DNR. This is an active program, with
HCVA	Natural Rivers	There are two Natural Rivers datasets which are derived from spapproved distance from the river centerlines. The Natural Rivers most Natural Rivers. The Vegetative Buffer ranges from 25 to 10 and Vegetative Buffers for each Natural River see the table local folder.	s Zoning District is a 400 foot buffer for 00 feet. To view specific Zoning Districts

S t	Pigeon River Country	y Mgt. Unit		Report 7	– Forested	Stands Compartment: 13 Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
1	6120 - Lowland Cedar	Poletimber Well	4.2	91	111-140	Headwater beginning of Grindstone Creek. The stand falls within the proposed Grindstone Hardwood Natural Area. Part of area to be nominated for SCA.
2	4111 - S.Maple, Hard Mast Association	Sawtimber Well	380.3	111	111-140	GRINDSTONE HARDWOOD NATURAL AREA. Part of area to be nominated for SCA.
3	4110 - Sugar Maple Association	Sawtimber Well	18.1	93	51-80	Stand was thinned with stand to the north in 2005 with stand to the north as part of West Fisherman Hardwood.
4	4130 - Aspen	Poletimber Well	7.0	82	81-110	Small stand between road and creek.
5	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Well	5.2	82	81-110	
6	4110 - Sugar Maple Association	Poletimber Well	33.0	93	51-80	Stand was thinned in 1993. Access thru Wildwood subdivision. Thinned again in 2011.
7	4110 - Sugar Maple Association	Poletimber Well	16.2	93	81-110	Stand was thinned in 1993. Access thry Wildwood subdivision. Selectively cut again in 2011.
9	6120 - Lowland Cedar	Poletimber Medium	18.1	121	51-80	Stand is dying off due to high water levels from Beaver activity.
11	4130 - Aspen	Poletimber Well	27.9	38	81-110	
12	4119 - Mixed Northern Hardwoods	Poletimber Well	15.9	38	51-80	Young hardwood stand on hillside next to car body opening cut at same time as adjacent aspen stand but came back primarily to hardwood.
13	4199 - Other Mixed Upland Deciduous	Sapling Well	7.3	29	Immature	Stand cut by wildlife to create brushy area. Within Grindstone Hardwood Natural Area now. Part of area to be nominated for SCA.
14	4111 - S.Maple, Hard Mast Association	Poletimber Well	37.4	101	81-110	Lesser quality hardwood especially as you go toward the south end of the stand.
15	4110 - Sugar Maple Association	Sawtimber Well	78.4	111	81-110	Stand was thinned in 2000.
18	4130 - Aspen	Poletimber Well	20.1	37	1-50	Decent Aspen coming along but tremendous sugar Maple reproduction underneath. May want to feature that and let aspen fall out of the stand.
19	4136 - Aspen, Mixed Conifer	Sapling Well	34.0	25	1-50	Some heavy browsing throughout stand allowing for more Fir and White Pine to fill in the canopy. The south end of the stand has been impacted the most with Cherry filling some of the open areas.

S t	Pigeon River Country	Mgt. Unit		Report 7	- Forested	Stands Compartment: 13 Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
21	6130 - Fir, Aspen, Maple	Sapling Well	15.9	25	Immature	Cut in 1002 with stand 27 as part of a swamp cut.
22	4110 - Sugar Maple Association	Poletimber Well	36.1	49	51-80	
23	4139 - Aspen, Mixed Deciduous	Poletimber Well	61.6	49	111-140	Nice pole/log stand with good aspen.
26	6120 - Lowland Cedar	Poletimber Well	44.2	121	81-110	Wet swamp
27	6124 - Lowland Spruce- Fir	Sapling Medium	9.2	25	Immature	
28	6122 - Black Spruce	Poletimber Medium	1.7	56	1-50	Strip cut in swamp.
29	6122 - Black Spruce	Poletimber Poor	1.3	56	1-50	: Strip cut in swamp.
30	6122 - Black Spruce	Poletimber Poor	1.3	56	1-50	Old strip cut.
33	4136 - Aspen, Mixed Conifer	Poletimber Well	7.3	49	81-110	
34	4130 - Aspen	Poletimber Well	97.9	49	81-110	Heavy sugar Maple regeneration in a large portion of this stand which should be part of discussion on what to do with Sugar Maple regeneration we do have. South and west portion of the stand has different character, with Balsam Fir understory dominating that part of the stand. We may want to split stand into two upon further discussion.
35	6128 - Lowland Coniferous, Mixed Deciduous	Poletimber Medium	54.7	121	51-80	Headwaters of Bird Tally Creek. Some blowdown and quite wet.
36	429 - Mixed Upland Conifers	Sapling Well	16.2	24	Immature	
37	6120 - Lowland Cedar	Poletimber Well	3.4	111	51-80	
38	4134 - Aspen, Spruce/Fir	Poletimber Well	5.8	49	51-80	
39	4116 - Mixed N. Hardwood - Aspen	Poletimber Well	12.0	49	81-110	
40	42200 - Natural White Pine	Sapling Well	0.9	19	Immature	Small opening filling with white pine.
41	429 - Mixed Upland Conifers	Poletimber Well	81.5	73	111-140	Rather poor quality White Pine. Aspen is generally in decent shape, but due to cutting prescribed on 2 sides of this stand, any treatment should be delayed until next entry.

S t	Pigeon River Country	Mgt. Unit		Report 7	- Forested	Stands Compartment: 13 Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
42	6129 - Mixed Coniferous Lowland Forest	Poletimber Medium	3.3	121	1-50	: Flowing stream below Beaver dam.
44	6120 - Lowland Cedar	Poletimber Well	10.0	121	81-110	
45	429 - Mixed Upland Conifers	Sapling Well	31.6	24	Immature	Beaver taking quite a bit of aspen out. Not heavy to aspen, however.
46	4311 - Pine, Aspen Mix	Poletimber Well	8.5	49	81-110	
47	42290 - Natural Mixed Pine	Poletimber Well	23.4	81	81-110	
48	4133 - Aspen, Mixed Pine	Poletimber Well	13.3	49	81-110	Poor quality white pine with aspen understory. Manage for aspen.
49	4191 - Mixed Upland Deciduous with Conifer	Poletimber Well	12.6	41	111-140	Stand year of origin was originally 1942, however, the aspen and red maple was reestablished in the mid-1970's after being cut at that time.
50	4112 - Maple, Beech, Cherry Association	Poletimber Well	3.0	49	81-110	
51	42200 - Natural White Pine	Sawtimber Well	6.7	91	81-110	
52	4130 - Aspen	Poletimber Well	15.3	41	141-170	Aspen diameters are quite variable.
53	42201 - Natural White Pine, Mixed Deciduous	Sawtimber Well	3.5	71	81-110	Stand Year Origin was 1946 but the aspen and red maple component was cut in the mid- 1970's and restarted. Same thing can be done when stand 52 is cut.
54	4133 - Aspen, Mixed Pine	Poletimber Well	19.9	49	81-110	
55	4112 - Maple, Beech, Cherry Association	Poletimber Medium	5.4	49	51-80	BBD is prevalent in the stand.
56	42200 - Natural White Pine	Sapling Well	7.0	36	1-50	
57	4130 - Aspen	Sapling Well	4.9	36	1-50	
58	42110 - Planted Red Pine	Sawtimber Well	148.1	89	81-110	Stand was selectively cut in 2002. Encourage scarification of soil during logging operations.
59	4110 - Sugar Maple Association	Sawtimber Well	7.6	106	81-110	Small stand along the road with a wide range of size classes.

s



t						Year of Entry: 2018
a n d	Level 4 Cover Type	Size Density	Acres	Stand Age	BA Range	General Comments:
61	4133 - Aspen, Mixed Pine	Poletimber Well	30.7	49	81-110	Highly variable stand from one end to the other. Hard to separate into different stands.
62	4110 - Sugar Maple Association	Sawtimber Well	9.5	101	81-110	Stand was thinned in 2000 with larger stand (71) in compartment 14 to the east. It will be treated again with that stand when it comes up again.
63	42201 - Natural White Pine, Mixed Deciduous	Poletimber Well	20.5	71	111-140	
64	42110 - Planted Red Pine	Sawtimber Well	33.6	89	81-110	Species removal in 1990. Good Aspen regeneration.
65	4130 - Aspen	Sapling Well	15.5	26	Immature	Scattered Red Oak residual.
66	6120 - Lowland Cedar	Poletimber Well	2.6	109	51-80	
67	4130 - Aspen	Sapling Well	35.9	8	Immature	Final harvest completed 2009 looking very good. Regeneration doing very nicely.
68	42110 - Planted Red Pine	Sawtimber Poor	55.0	89	1-50	OPIC - FMD: Stand was selectively cut in 2002. Seed tree cut in 20102014- Stand updated following regen survey. Pretzel Edge Red Pine, #53-006-08-01. Regen results: Rp TPA 525, Rm TPA 1275, Wp TPA 388, Be TPA 113. Stand falls just short of acceptable regen standards for red pine. Overall, some very nice patches of natural red pine regen. Residual ba/acre is 23 sq ft so the regen is free to grow. Red maple being browsed heavily which may be good in reducing competition for the red pine.
71	4111 - S.Maple, Hard Mast Association	Sawtimber Well	3.8	101	81-110	Narrow strip of hardwood on the edge of a much bigger stand that was treated around 2000. This part was not included in that cut, so could serve well as a retention stand.
87	4111 - S.Maple, Hard Mast Association	Poletimber Well	9.7	93	51-80	Ten acre parcel within Wildwood Subdivision that was added to this compartment. Not a real good quality stand with some semi-open area.
88	4130 - Aspen	Poletimber Well	3.6	46	111-140	Part of larger stand in Comp. 14 that is already under contract (Autumn Aspen)



Stand	Cover Type	Acres	Managed Site	General Comments:
8	3303 - Mixed Low Density Trees	9.7	No	BRUSHY OPENING ALONG SWAMP EDGE BEING FILLED IN WITH PRIMARILY HARDWOOD.
10	629 - Mixed non-forested wetland	29.3	No	Periodic flooding from beavers setting back advancement. Also pockets of dead conifer from high water especially toward the south end.
16	629 - Mixed non-forested wetland	2.1	No	Small vernal pool that is wet most of the year. Water is presently flowing out and into stand 17.
17	629 - Mixed non-forested wetland	1.2	No	Vernal Pool similar to 16 but no cedar around the perimeter. Full of water and flowing out down a ravine to another low area and eventually into the creek drainage.
20	623 - Emergent Wetland	13.7	No	Beaver flooded creek bottom. Cedar has been killed off by high water.
24	3301 - Low Density Deciduous Tree	3.6	No	Semi-open area between hardwood and swamp.
25	622 - Lowland Shrub	3.6	No	Pocket of tag alder along swamp edge
31	3105 - Mixed Upland Herbaceous	1.0	No	
32	3105 - Mixed Upland Herbaceous	0.6	No	
43	500 - Water	13.6	No	Portion of cedar swamp that has been killed off by high water held back by beaver dam between 42 and 43.
60	3105 - Mixed Upland Herbaceous	1.0	No	
69	3102 - Grass	1.1	Yes	Managed wildlife opening
70	3102 - Grass	7.4	Yes	Managed wildlife opening
72	3102 - Grass	2.1	Yes	Managed wildlife opening
73	3302 - Low Density Conifer Trees	2.4	No	Natural opening filling in with pine regeneration.
74	3102 - Grass	20.9	Yes	Managed wildlife opening
75	3105 - Mixed Upland Herbaceous	16.9	Yes	North "Pretzel Opening" created by Wildlife Div., but is filling in with Balm and Fir and pine. Needs maintenance



Stand	Cover Type	Acres	Managed Site	General Comments:
76	3102 - Grass	3.2	Yes	Managed wildlife opening
77	3105 - Mixed Upland Herbaceous	5.7	No	Some scattered pine and cherry.
78	3105 - Mixed Upland Herbaceous	1.7	No	
79	3105 - Mixed Upland Herbaceous	3.0	No	
80	3105 - Mixed Upland Herbaceous	1.5	No	Wildlife Div. created this wildlife opening, but hasn't been maintained for several years. Part of Grindstone Hardwood Natural Area to be nominated for SCA.
81	3105 - Mixed Upland Herbaceous	3.3	No	Developed by wildlife Div., but hasn't been maintained for several years. Part of Grindstone Hardwood Natural Area area to be nominated for SCA.
82	3102 - Grass	1.3	Yes	Wildlife managed opening: small Car Body gate opening.
83	3105 - Mixed Upland Herbaceous	2.3	No	Part of Grindstone Hardwood Natural Area to be nominated for SCA.
84	3102 - Grass	4.3	Yes	Wildlife managed opening: Car Body Gate opening (big)
85	3105 - Mixed Upland Herbaceous	1.3	No	Opening at Car Body gate.
86	3105 - Mixed Upland Herbaceous	2.0	No	Opening along Fisherman Rd. and Rd. 124.