Massachusetts Department of Conservation and Recreation Division of Water Supply Protection, Office of Watershed Management Forest Management Project Summary

Project Title: Harding Hill Young Forest 1

DWSP Harvest Permit Number: 4406 DWSP Proposal ID: WR-19-20-3 and WR-19-22-S DCR Forest Cutting Plan File Number: 021-32475-22

Site Information

Watershed: Ware River Watershed Town(s): Barre Acres: 13 Nearest Road: Coldbrook Rd Natural Heritage Atlas overlap?: No Public Drinking Water Supply Watershed?: Yes Forest Types: White Pine/Oak Area of Critical Environmental Concern (ACEC)?: No Soils: 910C Woodbridge-Paxton and 902E Charlton-Paxton Wetland Resources: Several unnamed intermittent streams and associated wetlands are adjacent to the harvest area. Vernal Pools: No

Harvest Information

Harvest Start Date: 7/6/22 Harvest End Date: 8/14/22 Number of Wetland Crossings: None Number of Stream Crossings: None

Best Management Practices Applied

Stream Crossings: There are no stream crossings. Filter Strips: There is no harvesting in a filter strip. Wetland Crossings: There are no wetland crossings. Harvesting in Wetlands: There is no harvesting in wetlands.

DWSP Forester supervising this harvest

Name: Ken Canfield Forester License number: 431 Phone number: 857 274 7090 Email: <u>Kenneth.canfield@mass.gov</u>

Narrative

General Description/Forest Composition/History

The harvest area is located in the town of Barre between Coldbrook Rd and Harding Hill Rd. It consists of a white pine/oak stand.

Tree species present in the overstory are white pine, red, black, and white oaks, red maple, white ash, paper birch, pignut hickory, black birch, sugar maple, black cherry, and eastern hemlock. The understory consists of red maple, eastern white pine, black birch, red, black, and white oak, pignut hickory, red spruce, American beech, eastern hemlock and black cherry.

Glossy buckthorn and Japanese barberry are present but not well established in the harvest area. Some stems were hand pulled during tree marking.

The soils are well drained to moderately well drained.

Site Selection

The primary goal of the watershed forest management program is to create and maintain a forest that provides high quality drinking water to current users and future generations. A healthy and resilient forest is comprised of diverse native tree and shrub species and multiple age classes of trees.

The harvest consists of a 13 acre clearcut in a white pine/oak stand. The harvest is located in the Ware River Watershed Young Forest Focus Area as described on page 120 of DWSP 2017Comprehensive Land Management Plan (CLMP).

This harvest was proposed to be the first early successional block created in the focus area. However, a gypsy moth infestation affected this area in 2018. Patches of overstory oak trees were left dead or damaged. A salvage harvest was sold and has recently been completed.

This harvest abuts the recently completed salvage harvest. It will expand the early successional habitat that was created by that harvest and the mortality event. The harvest directly abuts a 1.0 acre patch opening (labelled "ST-0" on the FCP Stand Map) that was created by the salvage harvest, effectively turning this 13 acre clearcut into a 14 acre clearcut.

Silvicultural Objectives

The harvest will have the following benefits:

This harvest will create early successional habitat that will be utilized by many wildlife and plant species. This habitat will complement the existing early successional habitat created by the gypsy moth salvage harvest. Future harvests in the area will complement the habitat created by this harvest.

This harvest will result in a fully regenerated stand that will be free to grow for the foreseeable future. Approximately 5 square feet of basal area per acre of overstory trees will be retained for seed and structure. Most of the retention trees are dominant, well formed, vigorous oaks, hickories, and white pines. Trees with large cavities were also retained. Standing dead trees will be retained where possible.

With existing regeneration, sprouts, and seedlings to be established there should be ample regeneration within a few years. No further silvicultural entries will be required for decades, which will allow skid trails to heal and will reduce any potential environmental impacts.

Cultural Resources

Standard practice dictates that every effort is made to avoid disturbing stone walls and other cultural resources.

Rare or Endangered Species

Natural Heritage Endangered Species Program (NHESP) does not show any rare habitat within the harvest area.

Figures Figure 1. **Final Forest Cutting Plan**

FINAL

Forest Cutting Plan

and Notice of Intent under M.G.L. Chapter 132 - The Forest Cutting Practices Act, 304 CMR 11.00 (Effective Date: 3/15/16)

Location

Acres Vol. N	<u>13</u> 1BF <u>10</u>	7.8_Vol.	•	Start Date 9/	
Plan	Prepa	irer			
		19976 11 S L			
Name	Kenne	th W. Car	field		

• •

4

Plan Preparer				
Name Kenneth W. C	Canfield			
Address 578 Old Turn	pike Rd			
Town, State, Zip Oak	ham, MA	01068		
Phone (857) 2	274-7090			
Type of Preparer LF				
*Mass. Forester Licens	e # 431			
*Required for land und	er Ch61, C	h61A or	Forest St	ewardship
Stream Crossing	gs SC-1	SC-2	SC-3	SC-4
Type of Crossing				
Existing Structure				
Type of Bottom				

For DCR Use Only:	
File Number (21.32475.27 Case 1	No
Date Rec'd SIIII Nat. H	lertN
Earliest Start 8 25 21 Pub. I	Dr. Wat.
River Basin CUICOVEE ACEC	
Gen. Obj. <u>LT</u>	

Landowner

Name DCR Division of Water Supply Protection Mailing Address 485 Ware Rd

Town, St	ate, Zip	Belcher	town, M/	A 01007
Phone			- 6921	
Ch61	61A	61B	Stew	*Case #
FSC 🗖	CR 🗌	CR Hol	der	
				1000

Licensed Timber Harvester**

Name	Success ment
Address	
Town, State, Zip	
Phone	
Mass, Lic, Harvester #	

**This information may be supplied after the plan is approved, but before work begins.

Harvesting in Wetlands HW-2 HW-3 HW-4 Indicate location on map HW-1 Forest Type (see pg 2) Acres to be Harvested Resid. Basal Area (>50%?)

FINAL

Service Forester Comments

ge	Indicate location on m	iap	WC-1	WC-2	WC-3	WC-4		
าล	Length of Crossing							PLEASE NOTEY DOR SERVICE FORSTER
a	Mitigation							AT START OF HARVEST OPERATION
2	Stabilization					-		
Best Manage	Filter Strips							
	Indicate location on m	nap	FS-1	FS-2	FS-3	FS-4]	
	Width (50', 100', or	VA)	VA					
Codes	LF Mass. Lic. For. C TH Lic. Tim. Har B TB Timber Buyer F LO Landowner P OT Other C	Type of Cros CU Cuiver R Bridge O Ford PO Poled OT Other	SE MT CC ST HE OT	J Mulch Corduroy Stone Hay Bale Other	DR y OT	Frozen Dry Other	Type of Bottom LE Ledge ST Stony MU Mud GR Gravel OT Other	Applicant must provide DCR with all relevant information before plan may be approved and cutting may begin. Some forestry activities, such as prescribed burning and pesticide or fertilizer application may require additional permits. Consult MA Forestry BMP Manual for further information.
	If Other (OT) is use	d in any	category	an expla	nation m	ust be given o	on an attached narrative page pg 3 of 5

If Other (OT) is used in any category an explanation must be given on an attached narrative page

FINAL

Practices

Bank Height (ft) Stabilization

Wetland Crossings

1+NI-1

Products to be Harvested*

Species	Mbf/Cds		Mbf/Cds
White Pine	47.3 Mbf	Red Maple	5.8 Mbf
Red Pine		Sugar Maple	0.9 Mbf
Pitch Pine		Red Oak	44.0 Mbf
Hemlock		Black Oak	2.2 Mbf
Spruce		White Oak	0.9 Mbf
Other Sftwd.		Other Hdwd.	2.0 Mbf
White Ash	4.2 Mbf	Total Mbf	107.8
Beech		Cordwood (Cds)	205
White Birch		SW Pulp (Tons)	
B & Y Birch	0.6 Mbf	HW Pulp (Tons)	
Black Cherry		Chips (Tons)	188

*Note: Volumes indicated in the Plan are as reported by the plan preparer and have not been independently verified by the service forester upon approval. **Mbf** = thousand board feet.

Cutting Standards

Indicate location on map	ST-1	ST-2	ST-3	ST-4
Forest Type	WO			
Acres	13.0			
Landowner Objective	LT			
Designation of Trees	CT			
Type of Cut	CC			
Source of Regeneration	SE			

Landowner Signature

Landownei

The most important information on a cutting plan is the Landowner's objective, as this will determine which trees will be harvested and which will remain; **this decision will also determine the future condition of the forest for decades to come.** After having read the Massachusetts Forest Cutting Plan Information Sheet on page one, indicate your objective by checking the appropriate box below.

LT – Long-term Forest Management

Planned management of the forest to achieve one or more of the following objectives: produce immediate and maximize long-term income, enhance wildlife habitat, improve recreational opportunities, protect soil and water quality, or produce forest specialty products.

ST - Short-term Harvest

Harvest of trees with the main intention of producing short-term income with minimal consideration given to improving the future forest condition, which often results in a forest dominated by poor quality and low value species.

I (we) have read the Massachusetts Cutting Plan Information Sheet, and am aware of my (our) management options.

I (we) hereby certify that I (we) have the legal authority to carry out the operation described above.

I (we) certify that I (we) have notified the Conservation Commission in the town in which the operation is to take place and the abutters of record within two hundred feet of the area to be harvested.

I (we) understand that the volumes in this plan have not been independently verified by the service forester

upon approval and will report final values and volumes to the Director or his/her agent if the final figures differ from those reported. Digitally signed by Dan Clark Clark Date: 2021.08.11 08:39:21 8/11/2021

Dotormin	nation and S	tatue	Final Bonort and Commonts
Determin	ation and 5	latus	Final Report and Comments
Cutting Plan	Approved Dis	approved Expires Expi	I hereby certify that the afore described Forest Cutting Plan and all relevant statutes have been substantially complied with. <u>Just Baddl</u> Signature of Service Forester/Director's Agent
Extension	1 2	Expires Ser. Fo	For. Ints.
Amendment	App 1 Dis 1	App 2 Dis 2	
, monument			
	Des	Designation	n of Trees Type of Cut Source of Regeneration
Forest Ty WP White Pine	HK Hemlock	OM Mixed Oak CT Cut Tr	Free SH Shelterwood Intermediate Harvests: AD Advanced
Forest Ty WP White Pine WK WP/Hem	HK Hemlock HH Hem/Hdwd	OM Mixed Oak CT Cut Tr RM Red Maple LT Leave	Tree SH Shelterwood Intermediate Harvests: AD Advanced e Tree ST Seed Tree CT Commercial Thin SE Natural Seed
Forest Ty	HK Hemlock	OM Mixed Oak CT Cut Tr RM Red Maple LT Leave BE Beech SB Stand	Tree SH Shelterwood Intermediate Harvests: AD Advanced e Tree ST Seed Tree CT Commercial Thin SE Natural Seed Boundary CC Clear Cut NT Non Com Thin PL Plant

orest Cutting Plan

Narrative Page (Effective Date: 3/15/16) Use this page to provide further explanation or if Other (OT) was used in any category on pages 3 or 4.

Landowner	DCR - DWSP
Town	Barre
File Number	021.32475.22

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Us Stand No.	in the Stand	Treatment Sectio	of trees to be harve n on page 4. Add	sted and/or retained i itional narrative desc	ription may be a	dded on a separate p	bage.	
	Describe Tre			Describe Tr	ees to be Lef	ì	% BA	/AC
Stand No.	Species	Size	Quality	Species	Size	Quality	Cut	Lef
	obe und beene		w Chapter 132 rem	irements will be met	if a non standard	evetem (HG DL	(TO =	
Stand No	o. Source of Regeneration (ex. AD, SE)	was used for He If u	r the "Type of Cut" wwwill Regenerations using AD - Describ	irrements will be met in the Cutting Stands ion be obtained/prot be the species present e the source of the see	ards Section on p ected? and how the rege	age 4.	otected	
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MA DCR DWSP

Lot 4406 Young Forest Focus Area

Coldbrook Rd in Barre FCP

Stand 1 Narrative:

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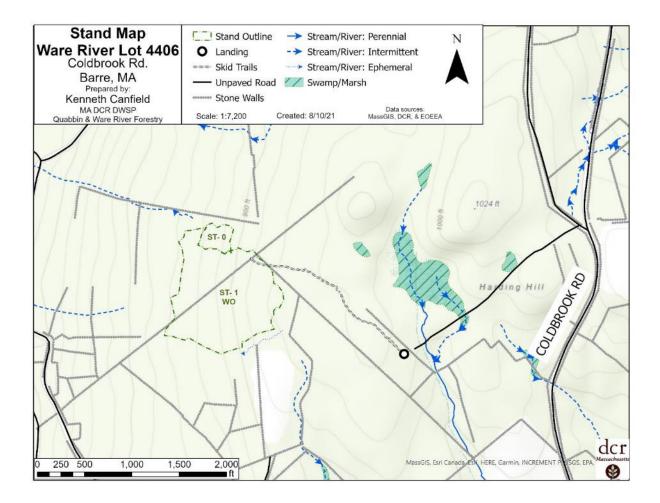
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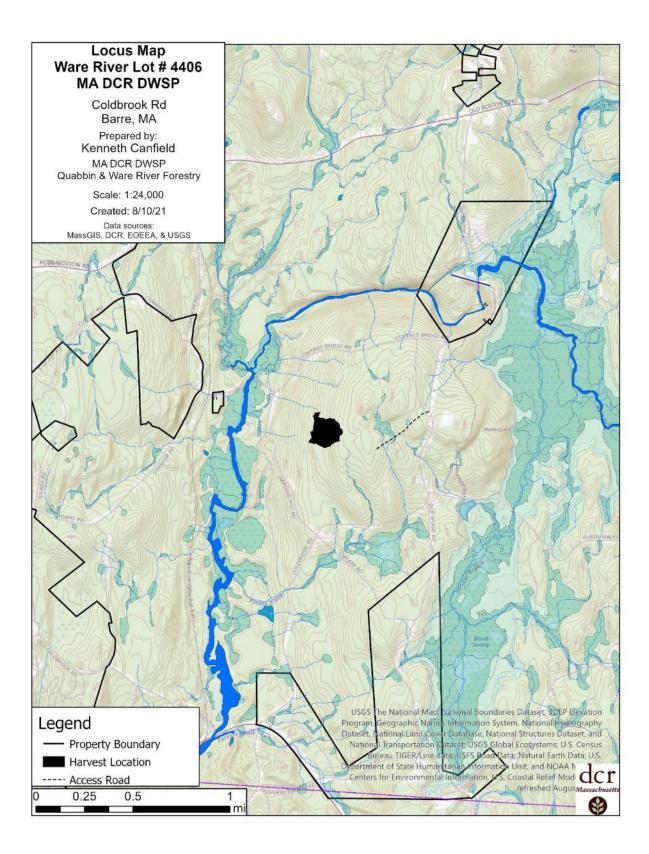
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dcrCOMMONWEALTH OF MASSACHUSETTS Department of Conservation and Recreation Division of State Parks and Recreation	FILE # 021.32475.22
FOREST CUTTING PLAN CERTIN	
Post this in a conspicuous place within the area in which the harvesting Hereitan Hereitan H	STOWN, MA OLODIn accordance with the
provision of M.G.L. Chapter 132, Section 40-46, filed in and Recreation, Division of State Parks and Recreation, a Notice of Inte	with the Dept. of Conservation ent to cut forest products upon the
Approval Date <u>82421</u> Director's Agent <u>CHRIS CAPONE</u> DCR Phone No. <u>(857)406-0175</u>	ISSUED BY: Priscilla E. Geigis, Director Division of State Parks and Recreation