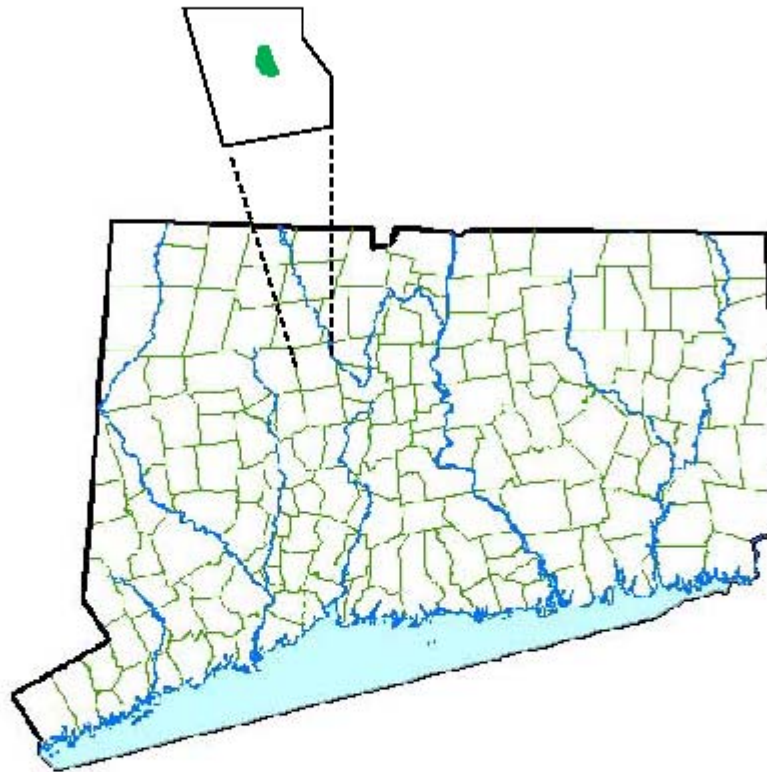


Sessions Woods Wildlife Management Area



Ten Year Management Plan

2011 - 2021

March 14, 2011 edition

**Written by Peter Picone, Wildlife Biologist
CT DEP Bureau of Natural Resources
Wildlife Division, Western District Habitat Unit
Sessions Woods WMA
341 Milford Street
Burlington, CT 06013
860-675-8130 ext 305**

Acknowledgements:

Thanks to the following individuals for providing technical information (forest inventory data and management advice) for this plan: Carrie Pomfrey, Wildlife Technician; David Irvin and Gerard Milne, DEP Foresters and Jack Berlanda, Connecticut Forester #F745 and DEP Seasonal Resource Assistant.

Thanks to my colleagues in the Wildlife Division for valuable comments on this plan and especially the following individuals for reviewing this plan: Rick Jacobson, Wildlife Director; Paul Rothbart, District Supervisor; and Jenny Dickson, Wildlife Supervisor.

Signatures:

_____ **Date** _____
Rick Jacobson, Wildlife Division Director

_____ **Date** _____
Paul Rothbart, District Supervisor

_____ **Date** _____
Peter Picone, Wildlife Biologist

_____ **Date** _____
Jack Berlanda, CT Certified Forester # F745

Table of Contents

	Page
A. History	3
B. Property Description	4
C. Areas/Issues of Concern	8
D. Wildlife and Forest Management Activities	9
E. Ten Year Goals and Objectives	15
F. Habitat Management System Guidelines	16
G. Management of Herbaceous Openings	18
H. Trail Development	20
I. Land Acquisition Recommendations	20
J. Hunting, Trapping and Fishing Rules	20
K. References Cited	20

Figures

Figure 1. Aerial photo of Sessions Woods Wildlife Management Area property, 764-acres ...	5
Figure 2. Map of areas of listed species according to CT DEP Natural Data Diversity Base ...	7
Figure 3. Locations of the 21 forest stands of Sessions Woods WMA.....	11
Figure 4. Locations of where invasive non-native plants were managed.....	13
Figure 5. Proposed 20 acre clear cut in stands 3 and 6	18
Figure 6. Locations of herbaceous openings	19

Tables

Table 1. Farmland soils of statewide significance on Sessions Woods WMA property.....	4
Table 2. Forest stands acreage and forest management activity at Sessions Woods WMA	12

Appendices

Appendix 1. Sessions Woods Wildlife Conservation Education Center Project Plan (1995)	
Appendix 2. Sessions Woods Wildlife Management Area 10 year Forest Management Plan by David Irvin (1997-2007)	
Appendix 3. Sessions Woods Soils Survey Information	
Appendix 4. Sessions Woods Wildlife Management Area Vernal Pool Invertebrate Report	
Appendix 5. Connecticut Department of Health, Attachment A: Summary of recreational activities	
Appendix 6. Sessions Woods Forest Stand Inventory and Descriptions by Carrie Pomfrey (2010)	

Session Woods Wildlife Management Area , 314 Milford Street, Burlington, CT

A. History

Acquisition

Sessions Woods Wildlife Management Area (WMA) is comprised of approximately 764 acres (according to property deeds) located in Burlington, Connecticut. The initial 453 acre parcel was purchased from the United Methodist Church in 1981 for \$646,000 using Pittman-Robertson Federal Aid (PR) funds (75%) which are derived from a sportsman-generated excise tax on firearms, ammunition and hunting equipment sales and matching gift credits (25%) of State funding. The purpose of this land purchase was to create a State Wildlife Management Area with a public education emphasis.

The United Methodist Church utilized the original 453 acres as a retreat. An additional 311 acre parcel was purchased from the New Britain Water Company on July 16, 2004 using the Recreation and Natural Heritage Trust fund.

There is historical evidence of charcoaling, pasturing of animals, and forestry on the property.

Activities Since Ownership

Since DEP ownership management activities have included facility improvements, habitat inventory, habitat enhancements, development of habitat management demonstrations, wildlife species assessments and establishment of regulated hunting and trapping of renewable natural resources.

Originally there were six structures on the property: two dwellings, two storage garages, a bath house and a gazebo. In 1982, one of the dwellings on the property was converted to offices for DEP staff biologists. The second dwelling is a house rented to DEP staff. One of the storage garages was converted to a workshop for Wildlife Division maintenance activities. The other storage garage was converted to office space for DEP maintainer staff and a necropsy lab with freezer storage, a pole barn for storage of tractors, habitat management tools, equipment and inventory was constructed. A camping area was designated and its use is regulated by permit to groups that are conducting wildlife-related activities.

During the late 1980's, two main roads were upgraded for the establishment of habitat management demonstration areas. They became the two main trail systems which are comprised of a 2.6 mile Beaver Pond Trail and the 0.5 mile Forest Meadow Trail. These trails have a gravel surface and are handicap accessible by vehicle and to a limited degree wheel chair. Each trail has educational demonstrations with markers and signage describing natural features and habitat enhancement messages developed by the Wildlife Division.

In 1992, construction of a 15,840 square foot education center was completed utilizing PR funds (75%) and State funds (25%).

In 2003, a pavilion was erected behind the education center to provide shelter for visiting groups and a place to conduct outdoor workshops.

A Sessions Woods Wildlife Conservation Education Plan was developed in 1995 (Appendix 1) with three main messages to educate the public about wildlife and the role that the Wildlife Division has in promoting principles of wildlife conservation, management and education to the public. The main messages are:

1- Wildlife Population Dynamics; 2- Wildlife and Habitat Relationships and 3- Wildlife and People are conveyed through outdoor demonstration sites along the trails, educational displays and exhibits in the conservation education building, educational programs and web site development.

B. Property Description

Physical Attributes

The property is bordered on the east by Milford Street (Route 69) and on the north and west by East Chippens Hill Road (Figure 1). The southern, eastern and western boundaries are dotted with suburban development and the northern border is New Britain Water Company property. The parcel is located in the Western Connecticut Hudson Highlands: oak-dominated forest ecoregion (Metzler and Barrett , in press) and is divided into 21 forest stands (Figure 3). Forest stand descriptions and conditions are described in Appendix 2 and Appendix 6.

Soils

There are 17 soil types identified for the property (Appendix 3). Six of the seventeen soil types are considered farmland soils of statewide significance (Table 1) totaling 242.5 acres.

Table 1. Farmland soils of statewide significance at Sessions Woods WMA in Burlington, CT

<u>Soil Type (Symbol)</u>	<u>Area</u>
Hinckley gravelly sandy loam (38C)	179.4 acres
Rippowam fine sandy loam (103)	28.3 acres
Raypol silt loam (12)	20.7 acres
Canton/Charlton soils (61B, 62B)	12.0 acres
Paxton/Montauk soils (84B)	1.6 acres
Woodbridge soils (45B)	.1 acres

Acreage

Total acres: 764 acres (according to property deeds)

Forest: 724 acres (520 acres accessible for forestry operations)
 Wetlands: 35 acres
 Herbaceous Openings: about 3 acres
 Buildings/parking lots: 2 acres

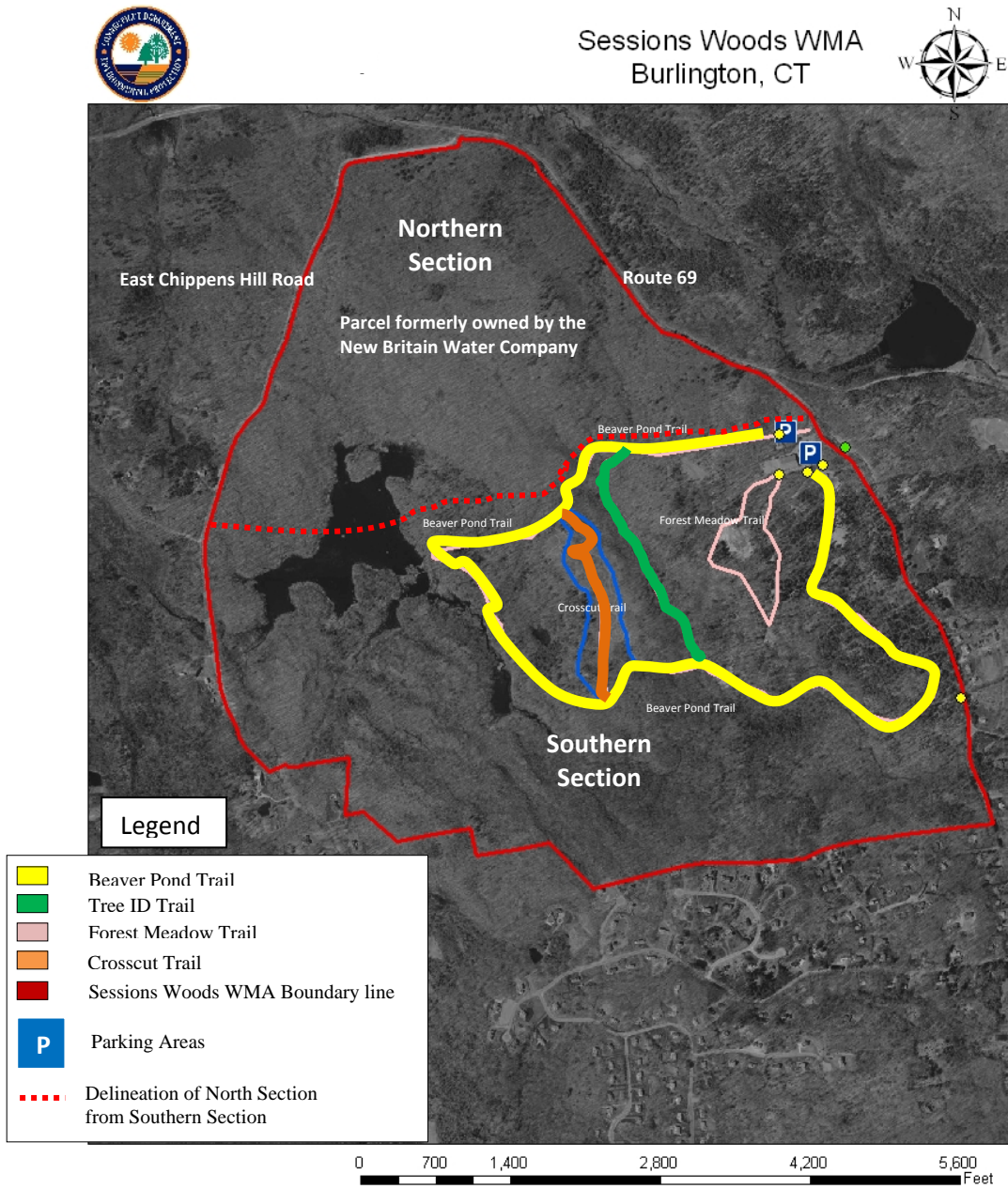


Figure 1. Aerial photo of 764 acre Sessions Woods Wildlife Management Area property trails : Beaver Pond Trail, Forest Meadow Trail and Crosscut Trail in Burlington, CT.

Wetlands

Negro Hill Brook (1.8 miles) is the main drainage on the property and flows easterly. Beaver (*Castor canadensis*) have dammed Negro Hill Brook in several areas and have created a large swamp on the northwest side of the property. This beaver-influenced wetland comprises approximately 35 acres of former upland saw-timber forest creating additional habitat diversity. Flooded forested areas provide snags for primary and secondary cavity users such as pileated woodpeckers, tree swallows, great-crested flycatchers and bluebirds. Edges of the beaver swamp provide thicket habitat for a variety of shrubland specialists including common yellowthroats (*Geothlypis trichas*), yellow warblers (*Dendroica petechia*), gray catbird (*Dumetella carolinensis*) and American woodcock (*Scolopax minor*). Increased sunlight along the edges of the beaver pond improves seasonal berry production (soft mast) and creates dense cover for shrubs such as highbush blueberry (*Vaccinium corymbosum*), swamp rose (*Rosa palustris*), black chokeberry (*Aronia melanocarpa*) and nannyberry viburnum (*Viburnum lentago*). River otter (*Lutra canadensis*) presence provides testimony to the availability of prey such as fish, amphibians and other aquatic life. Diverse aquatic organisms are utilizing the water volume and submerged woody debris. Negro Hill Brook has populations of native brook trout and is also monitored and stocked by the DEP Inland Fisheries Division.

A beaver-created pond can be accessed by a handicapped accessible boardwalk and observation blind off of Beaver Pond trail. A variety of wildlife can be observed from this boardwalk and observation blind. Bald eagles (*Haliaeetus leucocephalus*), great blue herons (*Ardea herodias*), wood ducks (*Aix sponsa*), American black ducks (*Anas rubripes*), tree swallows (*Tachycineta bicolor*) and osprey (*Pandion striatus*) are some of the diverse birds that are seasonally observed from this observation blind. Clear water conditions give visitors opportunities to observe water organisms such as newts, dragonfly larvae, water striders/water boatman and fish from the boardwalk and observation blind. Green frogs (*Rana clamitans melanota*), bullfrogs (*Rana catesbiana*) and dragonflies can sometimes be seen resting on lily pads or woody debris. Painted turtles are commonly seen sunning on logs or rocks.

A waterfall is located along Negro Hill Brook and can be accessed from the Beaver Pond Trail. This waterfall is impressive in the early spring as water cascades over large boulders and rock crevices and develops a loud roaring sound of rushing water. To the north of this waterfall, a wet meadow has been created due to past beaver activity. A meadow environment resulted from the first beaver dam on this stretch of Negro Hill Brook and currently provides a mostly-herbaceous area with a meandering stream. Canada geese (*Branta canadensis*), mallards (*Anas platyrhynchos*) and deer (*Odocoileus virginianus*) are occasionally observed feeding there. There is a wildlife observation blind that can be accessed from the east from the Beaver Pond Trail. Two bat shelters have been placed in this herbaceous open habitat to enhance roosting habitat and are visible from a stop along the Beaver Pond Trail.

East Negro Hill Brook (1.2 miles long) is a small tributary of Negro Hill Brook and a small unnamed westerly flowing perennial stream (about 1 mile long) join the main stem of Negro Hill Brook in the interior of the property.

Vernal pools are important micro-habitats on Sessions Woods WMA. There are two vernal pools located along Beaver Pond Trail and a smaller one has a boardwalk and educational signage. These vernal pools provide a fishless aquatic environment for a variety of vernal pool-dependent species such as wood frogs, fairy shrimp and spotted salamanders. A vernal pool assessment (Appendix 4) was conducted by Alberto Mimo (CT DEP Environmental Analyst).

Natural Data Diversity Base Information

The following state listed species (Figure 2): State Endangered American bittern (*Botaurus lentiginosus*), Special Concern Eastern box turtle (*Terrapene c. Carolina*), Whip-poor-will (*Caprimulgus vociferus*) and Eastern pearlshell (*Margaritifera margaritifera*). To date, there are no records for state-listed plant species or significant natural communities mapped within the boundaries.

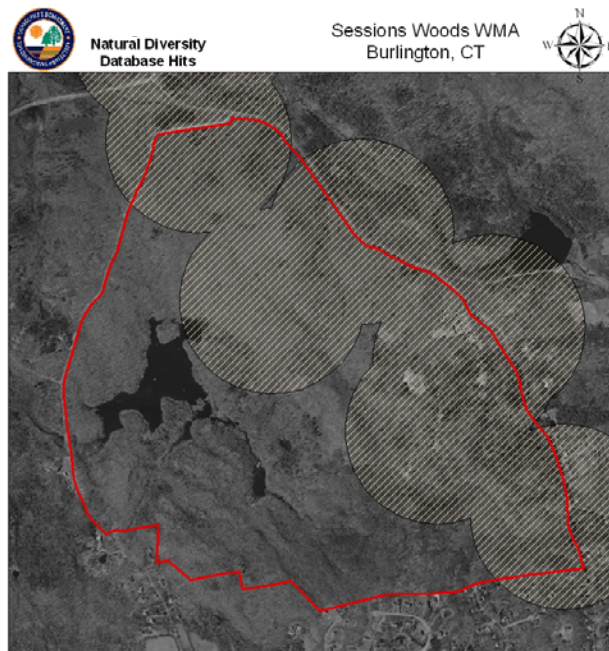


Figure 2. Connecticut DEP Natural Data Diversity Base listed species occurrence map of Sessions Woods WMA.

Access

The WMA has approximately three miles of road frontage along Milford Street (Route 69) and East Chippens Hill Road, inclusive. These public roads are maintained by the Town of Burlington. There are approximately 4.6 miles of property boundary. There are two main parking lots: one for the Wildlife Diversity Staff office and one for the Conservation Education/Office building which are maintained by DEP staff.

Access to the property from Milford Street is from a main entrance with a roadside sign. The

main parking area east of the Conservation Education building has an information kiosk/gazebo that orients visitors to the layout of the property and educational opportunities. A smaller gated roadway is also located on Milford Street to facilitate entry to the camping area and Beaver Pond Trail and to provide emergency access.

There are several trails on the property including the Beaver Pond Trail (2.6 miles long) and Forest Meadow Trail (0.5 mile long) which have locked gates at beginning and end to control vehicular access. These trails have a gravel base to allow vehicular passage. The Crosscut Trail is naturally vegetated and ungraveled, and bisects the Beaver Pond Trail, meandering through a clearcut that was created in 2001. The Tunxis Trail, a hiking trail, is part of a state-wide blue-blazed trail system maintained by the Connecticut Forest and Park Association (CFPA) intersects Route 69 and goes in a westerly and then northerly direction on the Sessions Woods WMA property. CFPA volunteers maintain the Tunxis Trail by painting blue blazes on trees along the trail and clearing vegetation to allow passage.

Right-of-Ways

There is a small transmission line right of way (150 feet wide) (described in 1942 deed) that traverses the property from east to west. It has been reserved by Hartford Utility Company but not utilized.

The Connecticut Department of Public Health (CTDPH) requires the DEP Wildlife Division to apply for a permit to allow public access to the 311 acres formerly owned by the New Britain Water Company. Class 1 watershed land has restrictions and the DEP Wildlife Division has a CTDPH recreational activity permit (on file at DEP Wildlife Division Sessions Woods Office) to allow public access.

Cultural Sites

No formal inventory has been conducted; however DEP Forester David Irvin located a charcoaling mound in the southeast corner of the property during his forest inventory in 1995.

Points of interest on the property

- An old, yet functional, gazebo structure is located along the easterly portion of the Beaver Pond Trail.
- A fire look-out tower (originally from Goodwin State Forest) was placed on the westerly portion of Beaver Pond Trail in 1985 and is functional and accessible to visitors.
- An old dwelling foundation is located along Milford Street just north of entrance to Sessions Woods. Also, a remnant mill foundation is located above the waterfall of Negro Hill Brook on the westerly side of the Beaver Pond Trail.

C. Areas/ Issues of Concern

Non-compliant dog walkers are a concern because of the potential for disturbance to ground nesting songbirds and visitors on the trails. Recent dog regulations passed in 2009 created leash requirements

for dogs on wildlife management areas except for hunting dogs in the lawful act of licensed hunting. However, despite these regulations, many dog walkers continue to ignore leash requirements.

Occasional unauthorized use of trails by ATV operators occurs especially near the Misty Road subdivision border. Although mountain bikes are allowed on gravel trails, unauthorized mountain bike trails can be found in the northeastern sections of the property.

The increasing popularity of the existing trails located on the property adds to the management complexity of balancing habitat management, regulated hunting, and hikers.

Horses are not allowed on the Sessions Woods WMA property primarily due to the high pedestrian use of the trails and the inherent safety issues.

D. Wildlife and Forest Management Activities

- 1- A wildlife species inventory of the original 453 acres was conducted in 1987 (Summary report of the inventory is available from Sessions Woods WMA files).
- 2- Department of Environmental Protection's Forestry Division's Forester David Irvin conducted a forest inventory of the property in 1995 and developed the property's first 10 year forest management plan (1997-2007) with input from staff biologists (Irvin, 1997).
- 3- A patch cut (2 acres) was created in 1992 along Beaver Pond Trail. It was cut again using a Bobcat T310 with a mounted drum chop Fecon mower in 2010.
- 4- Expansion of the managed herbaceous opening on the Forest Meadow Trail was completed in 1992. This herbaceous opening has consistently supported successful Eastern bluebirds nesting in nest boxes.
- 5- An in ground pool was converted to a wetland in 1993 and was planted with native vegetation to establish a backyard habitat demonstration site.
- 6- Naturalistic landscaping principles have been employed throughout the Sessions Woods property. From 1991 through 2010, a variety of native trees, shrubs, wildflowers and grasses have been planted and maintained around the Conservation Education Center, in the former pool area located along Beaver Pond Trail, around parking areas, septic tank reserve area, and the field along Forest Meadow Trail.
- 7- A first-phase forest shelterwood cut (Stand 17) comprised of 33 acres was completed in 1997 on the easterly side of Beaver Pond Trail and west of Milford Street.
- 8- A clear cut of 14-acres was created in Stand 11 in the fall of 2001 to establish an early successional (ES) forest habitat for disturbance-dependent wildlife species.
- 9- In 2006, a 0.5 acre patch of invasive non-native black locust (*Robinia pseudoacacia*) was removed using DEP Cordwood permits

- 10- In 2007, a USDA Natural Resources Conservation Service Wildlife Habitat Incentive Program (W.H.I.P) grant funded the removal of invasive plant black locust from an 18-acre area located along Milford Street (Stand 1).
- 11- In 2009, Carrie Pomfrey (DEP Wildlife Technician) conducted a forest inventory of the entire Sessions Woods WMA's (Appendix 6) which provided the latest information on the current condition of forest stands. (Note: a discrepancy exists between GIS-interpreted 771 acres and the 764 deeded acreage).
- 12- Herbaceous openings (collectively 3-acres) are mowed at least once a year in late winter.
- 13- Wood duck nest boxes (n=12) are maintained in the beaver swamp. They are checked and cleaned out once a year in the winter.
- 14- Bluebird nest boxes (n=10) are maintained along edges of herbaceous openings.
- 15- Two permanent mast survey plots (white oak and red oak groups) were created in 2008. Fifty saw timber-sized trees are permanently marked with paint and numbered with aluminum tags along the main trails for easy access and annual inspection for mast production. The annual survey is part of a statewide assessment of mast production and contributes to a regional effort of 13 northeast States under a cooperative project established by the Wild Turkey Committee of the Northeast Wildlife Administrators Association.
- 16- A small vernal pool located on the east side of Beaver Pond Trail (41 42' 48" longitude and 72 58' 01" latitude) was studied for invertebrate use/presence by Alberto Mimo (DEP Environmental Analyst) periodically from March 1995 through July 2002 (Appendix 4).
- 17- Invasive non-native plant management : The following invasive non-native plants are found on Sessions Woods WMA (Figure 4) and are being managed at varying intensities depending on availability of resources:

Autumn olive (*Elaeagnus umbellata*) , Japanese barberry (*Berberis thunbergii*) , Norway maple (*Acer platanoides*), black locust (*Robinia pseudo-acacia*) , winged euonymus (*Euonymus alatus*) , European privet (*Ligustrum vulgare*), garlic mustard (*Alliaria petiolata*), Japanese knotweed (*Fallopia japonica*), reed canary grass (*Phalaris arundinacea*), Japanese stiltgrass (*Microstegium vimineum*), multiflora rose (*Rosa multiflora*) , common Reed (*Phragmites australis*), Oriental bittersweet (*Celastrus orbiculatus*), and crested late-summer mint (*Elsholtzia ciliata*).



Sessions Woods WMA
Burlington, CT

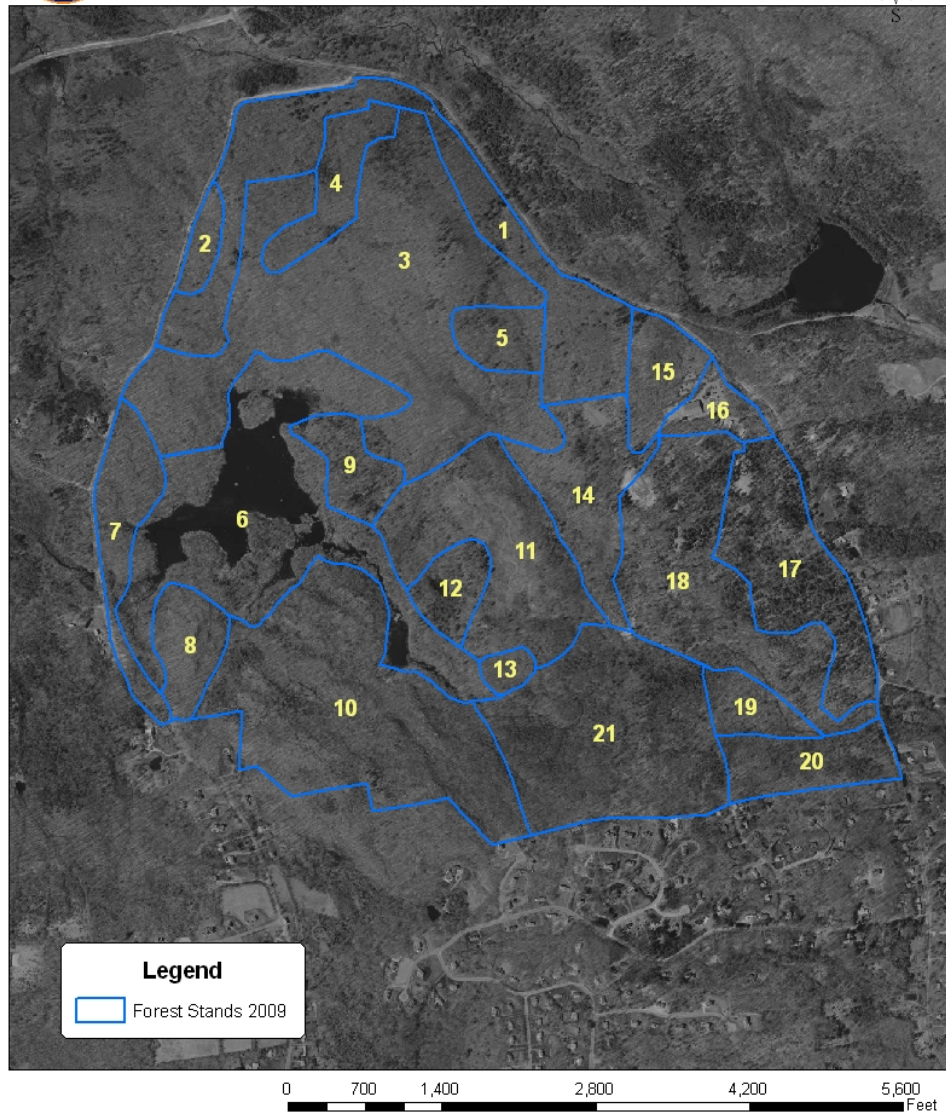
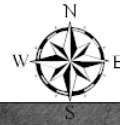


Figure 3 . Twenty-one forest stands of Sessions Woods Wildlife Management Area in Burlington, CT (see Table 2 for descriptions and conditions) .

Table 2. Forest stands acreage and forest management activity at Sessions Woods WMA, Burlington, CT. (See Appendix 6 for more detailed stand descriptions) †

<u>Stand /Type</u>	<u>Acreage</u>	<u>Forest Management (past and proposed)</u>
1 Oak/N.Hwds	63 acres	black locust cut in 2008
2 Bottomland Hwds	5 acres	To be determined (TBD)
3 Oak	132 acres	Clearcut planned (20 acres)
4 Oak/N.Hwds	16 acres	TBD
5 Oak/N.Hwds	10 acres	TBD
6 Oak/N.Hwds	95 acres	TBD (portion of Clear cut planned)
7 Oak/N.Hwds	20 acres	TBD
8 Oak	14 acres	TBD
9 Oak/N.Hwds	13 acres	TBD
10 Oak	90 acres	TBD
11 Oak/N.Hwds	50 acres	Clearcut in fall 2001 (14 acres)
12 Pine	10 acres	TBD
13 Oak	4 acres	TBD
14 Oak	30 acres	TBD
15 Bottomland Hwds	14 acres	black locust cut in 2008
16 Developed		black locust cut in 2006, 2009, and 2010
17 Pine	*39 acres	Shelterwood cut in 1998-99; final cut 2012
18 Other Hwds	59 acres	Shelterwood cut planned
19 Oak/N.Hwds	10 acres	TBD
20 Oak/N.Pine	18 acres	TBD
21 Other Hwds	69 acres	TBD

* Arcview GIS derived acreage (39 acres) differs from estimate found in Sessions Woods forest management plan (Irvin, 1997) which indicates 33 acres.

† Forest management descriptions and prescriptions were made by certified forest Jack Berlanda (CT DEP Certified Forester #F745) and in consultation with DEP Foresters Jerry Milne and David Irvin.

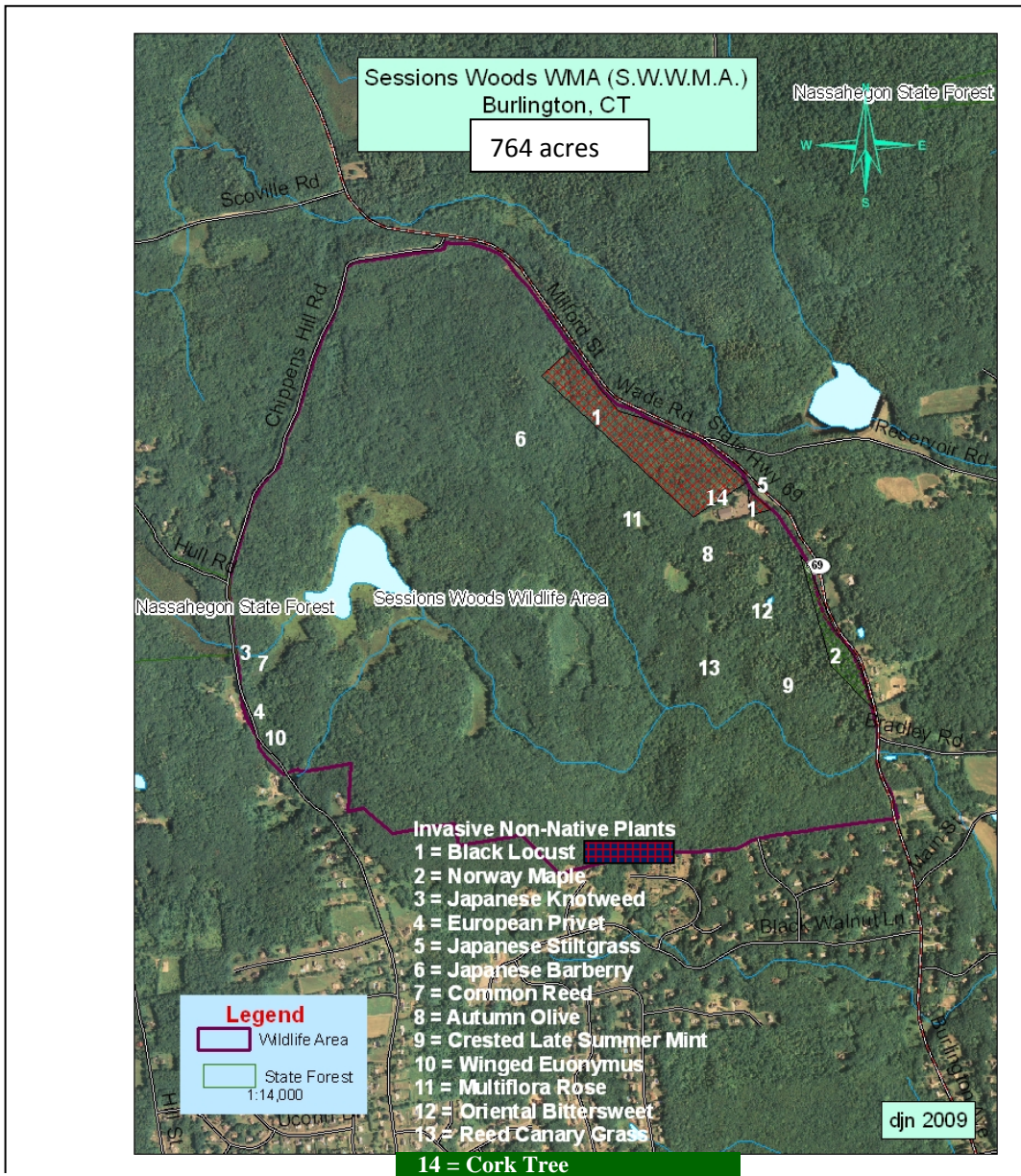


Figure 4. Locations of invasive non-native plants at Sessions Woods WMA in Burlington, CT.

Invasive Non-native Plant Management

Invasive non-native plant management has been implemented whenever feasible to serve as public demonstration areas and to enhance ecosystem health. The following are descriptions of the status and location of invasive non-native plants on the Sessions Woods WMA property (Figure 4):

1- Invasive non-native black locust (Forest Stands 1 and 3)

In 2006, a firewood permit was issued to remove a patch of invasive non-native black locust (*Robinia pseudoacacia*) near the Conservation Education Building parking lot. In 2007, A

Natural Resources Conservation Service Wildlife Habitat Incentives Program (WHIP) grant was awarded to remove 600 black locust trees from an 18-acre patch of forest in the northern section of the property (Stand 1). The cut stumps were periodically checked and sprayed with herbicide to prevent resprouting. In 2009 and 2010, the DEP Parks Division arborist cut additional black locust trees near buildings and parking lot.

2- Invasive non-native Norway maple (Forest Stand 17)

Norway maple (*Acer platanoides*) is beginning to invade the forest along Route 69 to the south where suburban development is occurring. Hand pulling and small tree removal has been done since 2000. Currently there are no Norway maples producing seeds on the Sessions Woods WMA property. Continued monitoring will occur to prevent this invasive tree from taking hold.

3- Invasive non-native Japanese barberry (Forest Stands 3 and 7)

Japanese barberry (*Berberis thunbergii*) was planted in 1988 as a demonstration planting. It was removed in 1992 and replaced with native northern bayberry (*Myrica pensylvanica*). Small forest understory patches were pulled and/or herbicided with Garlon 3A since 2006. Small populations may still be present.

4- Invasive non-native Autumn olive (Forest Stand 18)

Autumn olive (*Elaeagnus umbellata*) was planted in 1987 as a demonstration planting. In 1992, it was removed and replaced with silky dogwood (*Cornus amomum*), highbush cranberry viburnum (*Viburnum trilobum*) and black chokeberry (*Aronia melanocarpa*).

5- Invasive non-native garlic mustard (Forest Stands 14 and 15)

Garlic mustard (*Alliaria petiolata*) began invading sections of the Beaver Pond Trail in 2001 and was handpulled and herbicided using Glyphosate. Summer of 2008 it was also burned with backpack propane weed torch.

6- Invasive non-native Common Reed (Forest Stand 6)

There are two patches of common reed (*Phragmites australis*) in the beaver swamp. One patch was herbicided with Rodeo in early 90's and another patch closer to East Chippens Hill Road has yet to be managed.

7- Invasive non-native Japanese knotweed (Forest Stand 18)

One patch of Japanese knotweed (*Fallopia japonica*) is found on the Sessions Woods property where water drainage from swamp of Nassahegon State Forest property goes under East Chippens Hill Road on the northeast side of the culvert.

8- Invasive non-native Winged euonymus (Forest Stand 7)

This invasive plant (*Euonymus alatus*) is increasingly found along the forest edge of East Chippens Hill Road. About a dozen plants were pulled by hand in summer of 2008. The source for this plant appears to be the housing development on southwest side of Sessions Woods WMA property where ornamental plantings occur.

9- Invasive non-native Japanese stiltgrass (Forest Stand 16)

A small patch of Japanese stiltgrass (*Microstegium vimineum*) was discovered in the fall of 2009 near the entrance driveway of Sessions Woods WMA and was hand pulled.

10- Invasive non-native privet (Forest Stand 7)

Individual plants of privet (*Ligustrum spp.*) are found occasionally along East Chippens Hill Road in the southwestern edges of the boundary.

11- Invasive non-native Oriental bittersweet (Forest Stands 7 and 17)

This invasive vine (*Celastrus orbiculatus*) has been removed from the forest edge along Route 69 and along the border of East Chippens Hill Road

12- Invasive non-native crested late-summer mint (*Elsholtzia ciliate*) (Forest Stands 11, 14, 15, 17, 18)

This invasive mint has been mechanically pulled, fire-treated with a propane weed torch and sprayed with herbicide along Beaver Pond Trail and Forest Meadow Trail in 2009 and 2010.

13- Invasive non-native Reed Canary Grass (*Phalaris arundunacea*) (Forest Stand 21)

This invasive grass is found in the herbaceous openings along the Beaver Pond Trail.

14- Invasive non-native Amur Corktree (*Phellodendron amurense*) individual 6 foot tall sapling was found growing near the Conservation Education building summer of 2010 and removed.

E. Ten-year Goals (2011 to 2021)

Goal 1. Maintain a biologically diverse property using scientifically guided habitat management principles applying a variety of modern habitat improvement techniques.

Objectives:

- A. Create a 20-acre clear cut near existing 14-acre clear cut to maintain an early successional habitat for disturbance-dependent wildlife species in 2011.
- B. Conduct annual inspections of entire parcel and remove (i.e. physical and or chemical techniques) invasive non-native species of plants and animals (i.e. house sparrow (*Passer domesticus*)).
- C. Seasonally mow open meadow and fields (3 acres) to maintain native herbaceous vegetation.
- D. Plant native wildflowers, trees, shrubs and grasses to enhance seasonal food and cover as funding allows.
- E. Annually inspect, maintain and add nest boxes for cavity-nesting species.

Goal 2. Educate the public on habitat management techniques and strategies by using practical demonstrations that are small scale (backyard/office/parking lot) and large scale (estates/farms/land trusts/forestland owners).

Objectives:

- A. Develop and maintain habitat management demonstration sites throughout the property as habitat management projects are implemented.

Goal 3. Provide a variety of wildlife-based recreational opportunities compatible with wildlife conservation principles and practices.

Objectives:

- A. Annually inspect and maintain 3.5 miles of recreational trails to encourage hiking, wildlife observation and photography compatible with minimizing wildlife disturbance and maintaining wildlife habitat quality.
- B. Implement annually, all forms of regulated permit-required hunting that are determined to be safe including bow hunting of deer and turkey, firearms waterfowl hunting and firearms wild turkey hunting.
- C. Implement annually, opportunities for regulated trapping activities to occur.
- D. Implement annually, opportunities for regulated fishing activities to occur.

F. Habitat Management System Guidelines

Forest management of Sessions Woods WMA will be based on vegetation composition, site quality, and growth potential of each of the 21 forest stands and their existing and potential value for wildlife. All forest stands in operable areas will be managed on an even-aged basis. Priorities will be assigned to each forest stand taking into account the health of both forest and wildlife resources and their respective values and needs. Wildlife species and habitats identified in Connecticut's Comprehensive Wildlife Conservation Strategy (CWCS)/ Wildlife Action Plan (CT DEP, October 2005) will be considered priority.

- Even-aged management produces one stand of similarly-aged forest. It may consist of clearcutting and thinnings using multi-phase shelterwood cuts. Even-aged management can be used to create large patches of early successional forest for disturbance-dependent wildlife species.
- The 2009 Sessions Woods WMA forest inventory (Appendix 2) determined that there are 461-acres of manageable forest (area where active forest management practices can be employed). A 100-year rotation age will serve as the ideal model for forest management. However, due to lack of consistent forest management over the last ten years and the emphasis placed on early successional habitat, management activity will initially be accelerated with the understanding that future management plans will need to incorporate less regeneration harvests. This means that approximately 2.6% of the manageable acreage will be regenerated each year. This equals about 12-acres per year, or approximately 120-acres for this 10-year management plan. Future 10-year management

plans will have to take into account this accelerated forest cutting and make adjustments accordingly.

Habitat Management Goals Using Forest Management Strategies:

Primary Habitat Enhancements

- Enhance early successional habitat by creating a 20-acre clear cut (Figure 5) in Stand 3 and part of Stand 6 to replace the 14-acre clear-cut, created in fall of 2001 in Stand 11 (see Figure 3) which is reaching the end of its successional stage. Clear-cuts provide breeding habitat for disturbance-dependent wildlife species and have a lifespan of 15 to 20 years which is about the amount of time the clear-cut reaches pole timber size. Creating a new clear-cut prior to 15 to 20 years will provide a continuance of this important habitat. Early successional habitat has declined statewide over the last 50 years. U.S. Forest Service forest statistics report (2000) indicates that Connecticut's seedling /sapling stage forest conditions have declined from 29 percent in 1953 to only 5.5 percent in 2006. Connecticut's CWCS indicates that several of the listed species of greatest conservation need (GCN) require early successional habitat. The whip-poor-will, is a GCN listed species that requires early successional habitat has been confirmed to nest at Sessions Woods WMA.
- Complete a 39 acre shelterwood cut in Stand 17 in 2012. An initial phase of this shelterwood cut in Stand 17 was done in 1998-99. Stand 17's current conditions favors white pine establishment.
- Implement forest stand improvements in Stand 18 to favor white pine using appropriate forest management practices (most likely a shelterwood cut with reserves) in consultation with DEP Foresters.
 - o These planned harvests (Stands 3, 6, 17, and 18) would regenerate about 118-acres over the next 10 years.

Secondary Habitat Enhancements and Standard Guidelines

- Locate suitable areas and create small patch cuts in areas conducive to American woodcock nesting and foraging.
- Maintain a least one den tree per forested acre and 3 to 5 dead or dying trees per acre. Maintain large woody debris for forest ground cover for amphibians and decay dependent insects.
- Stands 8, 10 and 21 are difficult to access due to terrain and location, therefore, they will have minimal management activities prescribed except for the management of deleterious plants/insects/blights/fungi as deemed necessary by scientists/biologists to take management action to maintain the ecological integrity of the property.
- Conifer component – forest stands containing conifers should be managed to favor improving density and regeneration of conifer seedlings. This will improve winter cover for wildlife and help offset the loss of Eastern Hemlock (*Tsuga canadensis*) due to the introduction of non-native invasive insects.

- Enhance forest edges and herbaceous openings by adding native shrubs, wildflowers and grasses.
- Manage forest edges to enhance seasonal food and cover for wildlife. Through forest edge thinning techniques (i.e. cordwood cutting), target forest edges that contain existing understory populations of black huckleberry (*Gaylussacia baccata*), low bush blueberry (*Vaccinium angustifolium*), and blackberry/dewberry/raspberry (*Rubus* spp.).
- Using selective cutting forest management techniques to improve hard mast production targeting white oak (*Quercus alba*), chestnut oak (*Quercus prinus*) and shagbark hickory (*Carya ovata*), in particular.

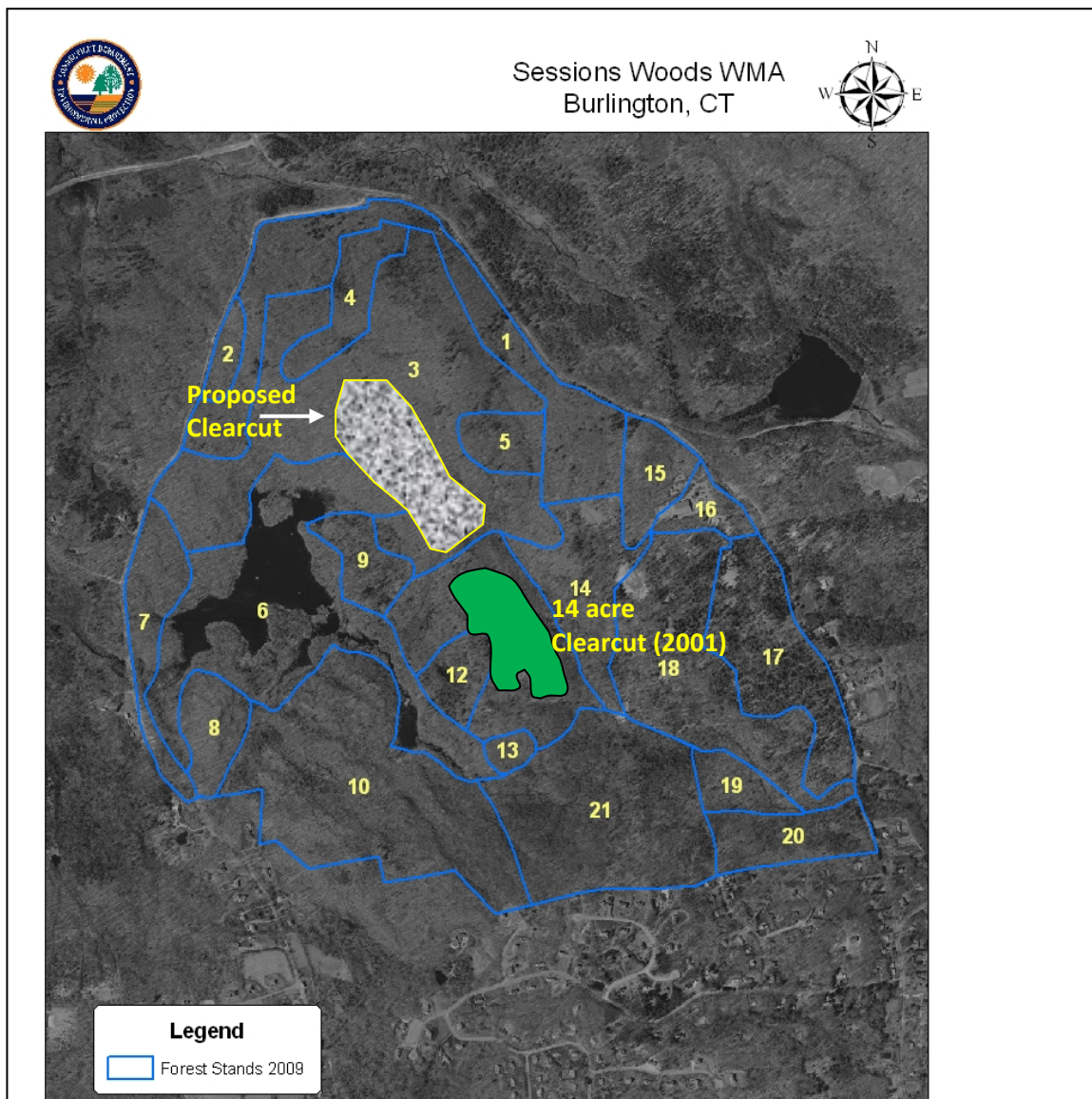


Figure 5. Proposed clearcut area to create habitat for disturbance-dependent species on Sessions Woods WMA in Burlington, CT.

- Mow or burn herbaceous openings once a year at the end of winter, preferably by March 1st, to maximize cover and food values for wintering wildlife and reduce negative effects to nesting species and provide fall habitat for migrating birds.
- Mow the edges of fields (20 to 30 foot width) or approximately 20 percent of the herbaceous openings every third year to maintain more woody component.
- Manage herbaceous openings against intrusion of non-native invasives species and enhance with compatible native wildflowers/grasses. Plant larval food plants for a variety of butterfly species and strive to provide seasonal nectar sources.
- Plant a variety of berry producing native shrubs that provide seasonal food and cover throughout the Sessions Woods property.

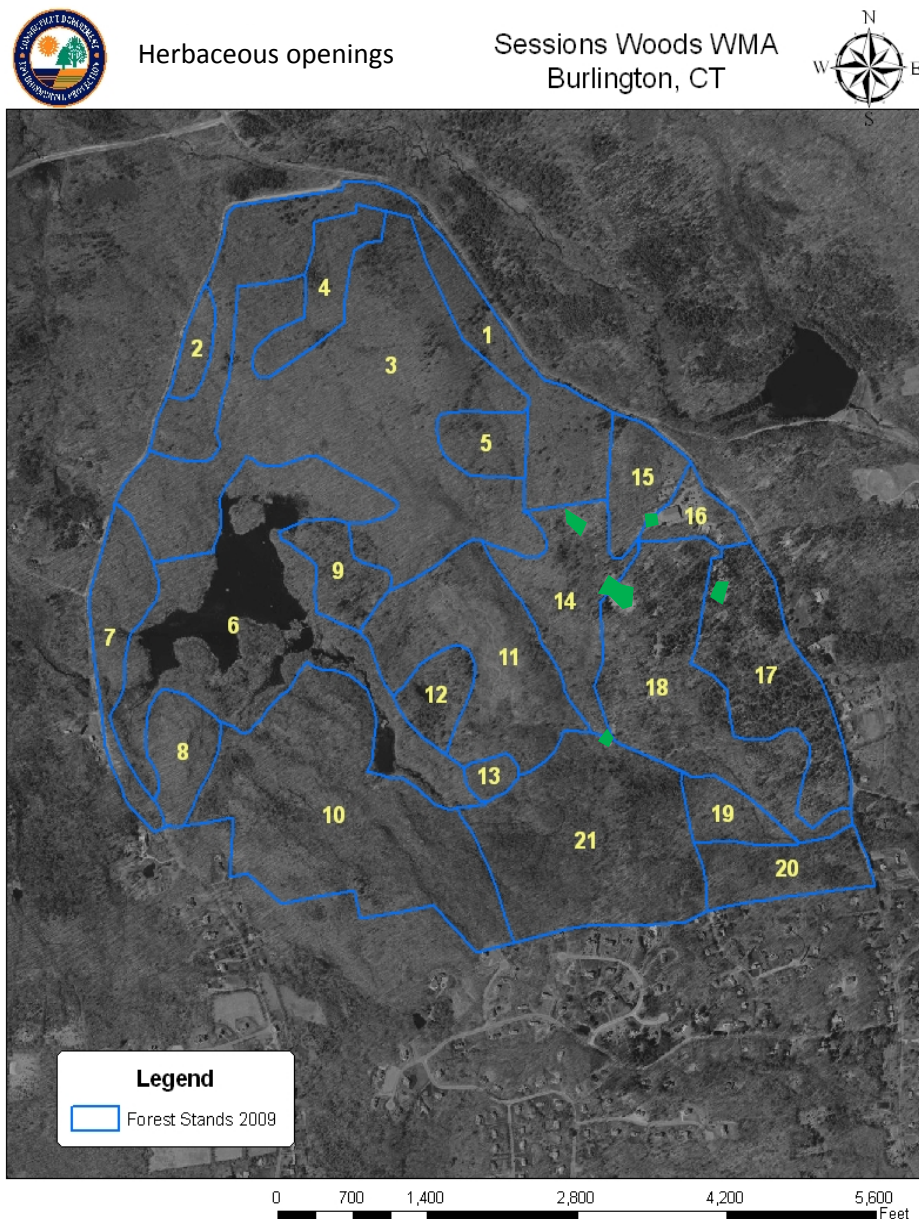


Figure 6. Herbaceous openings in green (about 3 acres total) at Sessions Woods WMA in Burlington, CT

H. Trail Development

No new walking trails will be created except for circumstances that deem it necessary to gain access for a featured habitat demonstration along the main stems of the Beaver Pond Trail or the Forest Meadow Trail. The area already has many trails, including unauthorized mountain biking trails. There is a need to protect wildlife resources from excess disturbance especially for ground nesting birds during the spring and summer months.

Protect vernal pools from potential disturbance by pedestrians and dogs. Although some existing trails lead the public near vernal pools, any new or proposed trail should not go near vernal pools because of the potential disturbance by off-leash dogs swimming in the pools (Picone, personal observation).

I. Land Acquisition Recommendations

Acquisition of additional acreage to the north and northeast would provide a larger tract of unfragmented forest in a rapidly suburbanizing area.

J. Hunting, Trapping and Fishing

The hunting of renewable natural resources is allowed by daily permit only:

- Bow hunting for deer and turkey
- Firearms hunting for waterfowl is allowed by first-come-first-served basis (handicapped hunter preferred) only from the wildlife blind (handicap access from Beaver Pond Trail) on south shoreline of the beaver pond.
- Firearms hunting for wild turkey (northern section only)
- Trapping is allowed using the state land trapping protocol.
- Fishing is allowed in all waters

K. References Cited

Connecticut Department of Environmental Protection (CT DEP). 2005. Connecticut Comprehensive Wildlife Conservation Strategy (CWCS), Wildlife Division, Hartford, CT (CT DEP, October 2005)

Connecticut Department of Environmental Protection (CT DEP). 1997. Sessions Woods 10 Year Plan (1997-2007) Prepared by David Irvin, Forest Technician, Department of Environmental Protection, Forestry Division.

Connecticut Department of Environmental Protection (CT DEP). 2010. Sessions Woods Wildlife Management Area Forest Inventory. Prepared by Carrie Pomfrey, Wildlife Technician, Department of Environmental Protection, Wildlife Division.

Metzler, Kenneth and Juliana Barrett, Connecticut Vegetative Classes , in press, 2008.

Mimo, Alberto. 2002. Sessions Woods Wildlife Management Area Vernal Pool Invertebrate Report. In files at Sessions Woods WMA , Western District Habitat Management Program office.

US Forest Service: Connecticut Forest Statistics Resource Bulletins NE-105 and NE-147.