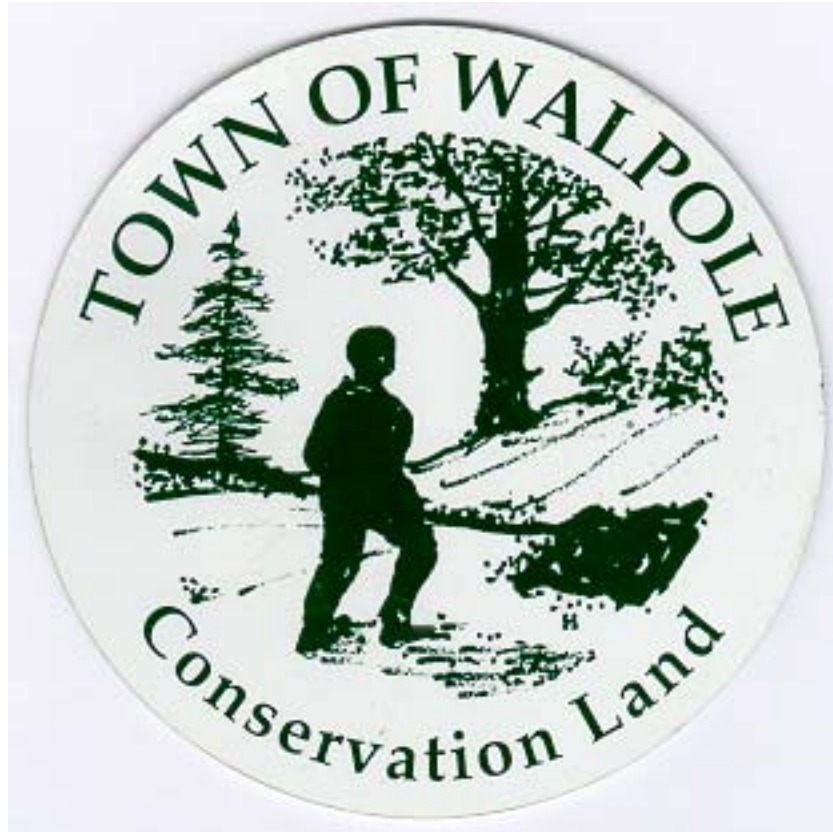


# **Farms, Forests, Streams and Wetlands: Walpole's Conservation Plan**

September 2006



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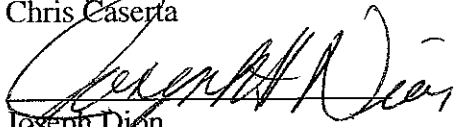
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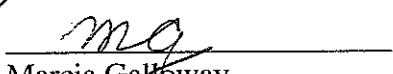
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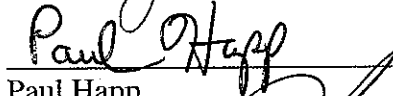
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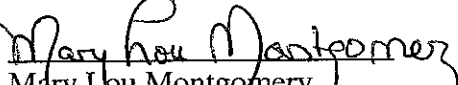
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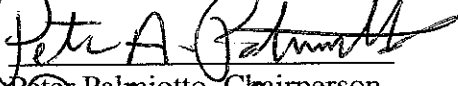
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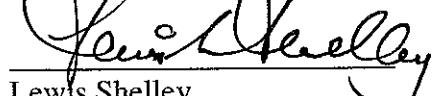
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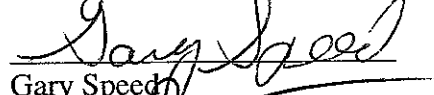
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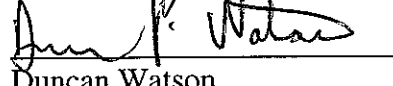
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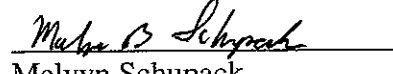
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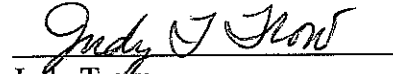
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**Farms, Forests, Streams and Wetlands:  
Walpole's Conservation Plan**

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## ***Introduction***

The quality and the character of the towns in which we live emanate from the people, the homes, the businesses and natural features in the town. An increasing population in the State of New Hampshire and the expansion of retail and suburban areas in the region's economic centers is changing the rural and agrarian character of southwest New Hampshire (Brighton 2005). These changes are being felt in all communities of the region forcing towns like Walpole to examine how they can effectively allow development while maintaining the rural character of the town. Uncontrolled development and population increases can result in habitat loss and fragmentation, increased surface and groundwater pollution, aquifer depletion, and loss of the rural character.

The control of development resides with the selectman and volunteer planning and zoning boards that create and enforce town regulations (RSA672-677, esp. 671). Working in conjunction with these boards, the Conservation Commission advises on conservation strategies and oversees wetland protection (RSA Ground Water 485-L, Fill & Dredge Wetlands 482-A). The first step in assisting these town leaders in making informed conservation decisions is the completion of an inventory of the town's natural resources and the establishment of priorities for conservation (RSA 36-A:2). Based on the recently completed inventories of town resources this Conservation Plan sets conservation priorities. Thus, the contents of this report assists Walpole's town boards in their efforts to conserve the rural character and irreplaceable natural attributes of our town and the benefit they contribute to the quality of life in Walpole.

## **Walpole's Conservation Planning Process**

The effort to write a Conservation Plan formally began in April 2005 when the town wide Natural Resources Inventory (NRI) was completed and the Conservation Commission established a committee to define the purpose and broad goals of the Plan. A task force comprised of volunteer town residents and Walpole conservation commissioners (Appendix A) was formed to refine the proposed goals and to develop objectives and recommendations. In January 2006, a survey was mailed to all town residents and property owners to ask their views on conservation issues. Monthly meetings of the task force have resulted in this Conservation Plan.

## ***Purpose***

The purpose of the Plan was presented to the town boards (i.e., the Planning board, the Zoning board and Board of Selectmen) at their monthly meetings in May 2006 by conservation commission members. The purpose of the 'Farms, Forest Streams and Wetlands: Walpole's Conservation Plan' as we have called it provides a guide to conserving the rural character and natural attributes of Walpole. The Plan establishes priorities to aid the town in fulfilling the Master Plan goals of "protecting and preserving the Town's critical resource areas in an effort to maintain a balance between the Town's existing and future development needs and its natural environment . . ." Specifically, the purposes of this Conservation Plan are:

- To provide a Plan that identifies priorities that will guide town leaders in conservation and development decisions.
- To protect and enhance the ecological integrity of Walpole's natural resource base and overall environmental health.
- To encourage and promote conservation practices and policies which encourage continued agriculture uses and other economic enterprises.
- To inform the residents of Walpole of the options available to help protect the quality of life issues that are important to them.

## ***Goals, Rationale and Recommendations***

The goals of the Farms, Forests, Streams and Wetlands: Walpole's Conservation Plan are outlined under three broad categories that match the listed purposes of the Plan and follow the goals previously presented in the town's Master Plan (see Town of Walpole Master Plan 1998 Natural Features Analysis Section). In the Natural Features Analysis Section of the Master Plan two goals were presented to protect and preserve the town's critical resource areas and to enrich the lives of Town residents. This Plan embraces those goals and expands on the ways in which those goals can be fulfilled by adding objectives and recommendations (summarized in Table 1).

### **Goal 1: Identify specific conservation priorities that are essential to maintain the town's natural communities and their inhabitants.**

The conservation priorities presented in this Plan were developed by considering the ecology of the town's natural resources, social and economic implications and residents' input. We recommend that by protecting the town's drinking water supply, its habitat for wildlife, and its irreplaceable prime agricultural soils the town will conserve its rural character and overall quality of life into the future. These priorities are listed as part of a series of objectives with the rationale for each objective and recommendations to fulfill the objective following them.

#### **Objectives:**

- 1.1. Protect drinking water resources (e.g., public well recharge zones and aquifers).

##### Rationale

The quality and abundance of the drinking water resource in any town should be the most important natural resource that the town protects. Without a reliable clean water supply a town can not exist. Town residents realized this when they indicated aquifer protection as their highest priority in the 2006 conservation survey (Appendix B). Drinking water protection has been exemplified in the town by the passage of a town well source protection ordinance in 2004. The wellhead protection ordinance limits land use activities within the source water protection area. This ordinance was written as a result of the Source Protection

Plan, completed in 2003, which provided a thorough evaluation of the threats to the public drinking water system and an outline of how to manage those risks (Vose and Palmiotto 2003). The ordinance protects a zone around the two town wells delineated by the US Environmental Protection Agency as “the surface and subsurface area from or through which contaminants are reasonably likely to reach a water system source” (Vose and Palmiotto 2003). The ordinance does not protect the entire recharge zone of the town’s aquifers (Map 1). Therefore, to insure protection of the town public drinking water an examination of the benefits of expanding the protection zone over the entire aquifer is recommended. In addition, we recommend assessing the benefits of requiring permeable surfaces which allows the percolation of storm water rather than having run off. This recommendation is based on the fact that 41 towns across the State limit the amount of impervious surface over any aquifer to 18% (median= 21%).

### Recommendations:

- 1.1a. Enforce wellhead protection ordinance.
  - 1.1b. Examine extending wellhead protection regulations over the entire area of the town aquifers. The wellhead protection ordinance restricts land use activities that may have a negative impact on the aquifer.
  - 1.1c. Strictly enforce Site Plan Review Regulations (October 12, 2004) that encourage Best Management Practices in the construction of parking areas and surfaces in a manner that does not negatively affect the aquifer and surface water ways (e.g., use alternative permeable materials other than asphalt, e.g. Greenpave, Gravelpave, Ecostone or Turfstone and/or plant trees in parking lots).
- 1.2. Conserve habitat for wildlife and native plant diversity (e.g., wetlands, unique forest communities, early successional open fields and other areas).

### Rationale

In Walpole we are blessed to be living in an area where homes, businesses, farms and forests are woven into a pastoral landscape. Approximately 65% of the town is forested with another 20% in farms or open land. The town is home to over 40 threatened or endangered plants, a rare Silver maple/wood nettle-ostrich fern floodplain forest along the Connecticut River and numerous species of wildlife including river otter, beaver, deer and black bear (NH Natural Heritage Bureau 2004, Conway 2005). The town also has approximately 1290 acres of wetland habitat, which only covers 5.5% of the land area, yet these wetlands provide critical habitat for our wildlife (Hall 1997, Ruddell, 2003). In addition, Walpole is the home of more registered NH Big Trees than any other town with large specimens of black cherry, American chestnut and sugar maple to name a few (UNH Big Tree Program). Our farms, forests, streams and wetlands create the green infrastructure that contributes to the quality of life we enjoy (Benedict and McMahon, 2002).

According to the 2006 conservation survey hiking and bird watching were the top most common outdoor activities (Appendix B). The majority of respondents (93%) indicated that preserving open space was important or very important to them. Aquifers (88%), farmland (85%), and streams and ponds (84%) were selected the most as being very important to protect. However, only 12.5% of the land area in the town is protected from development (Conway 2005). Therefore, to maintain the rural character of the town and wildlife habitat that maximizes the plant and animal diversity protected areas should be expanded to ensure a mix of successional habitats and habitats where native species can thrive. These areas should be connected through riparian and forested travel corridors by establishing setbacks on streams and wetlands (Hall 1997, Ruddell, 2003).

### Recommendations:

#### 1.2a. Establish 100 foot buffer on wetlands, all perennial streams and vernal pools.

We recommend an ordinance be presented to the voters to adopt a 100 foot buffer around all wetlands greater than 3000 square feet, perennial streams and vernal pools in the town of Walpole (Map 2). All wetlands and year round flowing streams (e.g., Cold River, Blanchard Brook, Mad Brook, Great Brook, Houghton Brook and others) and their tributaries should be buffered from future development.

In any landscape, riparian areas support a disproportionate number of wildlife species and provide numerous ecological values (e.g., travel corridors for wildlife, flood protection and pollution mitigation) (Naiman et al. 1993, Chase et al. 1997, Environmental Law Institute 2003) (Map 3). Numerous scientific papers have been published that demonstrate the benefits of riparian buffers (Chase et al. 1997, Environmental Law Institute 2003). Chase et al (1995) recommend a 100 foot buffer around all streams and wetlands larger than 3000 square feet. They clearly explain how a 100 foot buffer will benefit water quality and numerous species of wildlife.

#### 1.2b. Develop a dialogue and plan with the regional power company (currently National Grid) that recognizes the importance of and maintains the early successional habitat under the power line using Best Management Practices with the goal of creating habitat for wildlife.

Early successional habitat is vital for a large number of forest animals and bird species. The reduction of early successional habitat due to abandonment of farms over the last century has reduced the early successional habitat in our town. The power line area is regularly managed to maintain low vegetation. It is an area that with active management should be part of the Conversation Plan.

#### 1.3. Conserve areas categorized as having prime agricultural soils and active farms.

## Rationale

As mentioned above the character and history of Walpole is in its agrarian base. To protect the rural character and the potential to produce food and fodder locally we recommend the protection of the town's prime agricultural soils. Walpole is uniquely positioned in the CT river valley where there is an abundance of prime agricultural soils and significant aquifers (Map 4). According to the NRI (Conway 2005) 3745 acres or 16% of the town is classified as having prime farmland soils which is higher than any other NH town in the region. Once this very valuable resource is developed it will be lost forever. In addition, the development of these areas has the potential to harm our water quality since the majority of our prime soils overlay the town's aquifers. Further, making current farm activities a priority for conservation will aid in maintaining the rural character of the town.

## Recommendations:

- 1.3a. Create a farmland overlay district that elevates the conservation value of properties with prime farmland soils and currently active farms to ensure a large percentage stays or has the potential to stay in production e.g., agriculture, animal husbandry or forestry.
  - 1.3b. Communicate and promote effective use of conservation easements and any other means to preserve agriculture land.
- 1.4. Encourage the preservation of large forested blocks.

## Rationale

Forest cover in the state is shrinking from a high of 87% in 1980 and is expected to decrease 7% by 2020 (Thorne and Sunquit, 2001). This reduction is a consequence of population growth which is also reducing the average parcel size of commercial forest land. The fragmentation of the forested landscape has significant consequences to both landowners and native fauna. Declining parcel size impairs the profitability of forest management (Thorne and Sunquit, 2001) and can negatively impact native fauna (Groom et al, 2005, Environmental Law Institute 2003). We recommend that the town boards work to reduce the fragmentation of large forest blocks.

## Recommendations:

- 1.4a. Identify large unfragmented forest blocks (Map 5).
  - 1.4b. Avoid fragmentation of large blocks by informing town boards and property owners within large forest blocks of the block locations and importance.
- 1.5. Encourage the preservation of the scenic elements of the natural environment and the aesthetic and historic integrity of Walpole (see Goal 1 of Master Plan Land Use Section)



## Rationale

Walpole's scenic beauty and recreational opportunities relies heavily on the presence of natural elements in the landscape (e.g., scenic vista, green corridors, a combination of field forests and farms). To maintain these elements a conscious effort to conserve these elements must be made.

## Recommendations:

- 1.5a. Encourage the creation of green corridors from Connecticut River to hills, along major rivers and streams and green ridgelines (also see recommendation 1.2a).
  - 1.5b. Encourage the establishment of a scenic road system of class VI roads in Walpole which are of conservation and recreational significance (see Master Plan section VI. Conservation and Preservation Techniques, G. Scenic Road System). (e.g., Old Drewsville and County Rd.). (Farnum Lane already designated, is the only one).
  - 1.5c. Encourage adoption of a scenic designation for non class VI roads (e.g., Rte. 12 and other highways) which would minimize the visual impact of development (e.g., setbacks and screening, see Section VIII of Site Plan Review Regulations).
- 1.6. Conserve at least 25% of town acreage over the next 10-20 years.

## Rationale

In 2004 27.7% of the state of New Hampshire was classified as protected land (NH Changing Landscape 2005). In 2004, Walpole had 12.5% of its acreage protected (Appendix C, Map 6). In order to achieve the goals and objectives set forth in this Plan at least 25% of the town should be protected to sustain essential ecosystems, wildlife habitat, the working landscape and quality of life according to the Society for Protection of New Forests (2005). To protect these land areas financial resources need to be secured.

## Recommendations:

- 1.6a. Assist interested landowners in conserving land.
- 1.6b. Establish Conservation funding vehicle that enables the Conservation Commission acquire priority conservation lands via easement or purchase.
  - 1.6b i. Develop cost benefit analysis showing impact on tax base.
  - 1.6b ii. Explore sources of funding (e.g., conservation bond).
  - 1.6b iii. Develop and maintain collaboration with The Nature Conservancy, Monadnock Conservancy, The Society for the Protection of NH Forests and Trust for Public Land (see Appendix D for contacts).

## **Goal 2. Increase residents' awareness of the importance of natural resources.**

The rural character and the quality of life in the town of Walpole depend on the presence of natural resources and how people use them. There are numerous outdoor recreational opportunities in Walpole and on average persons responding to the 2006 conservation survey indicated four different outdoor activities in which they regularly participate (Appendix B). To enhance and protect these recreational opportunities a town wide plan is recommended that examines all recreational activities as a resource that can be enjoyed by all residents. To expand the use and enjoyment of our natural resources more accessible information on what activities are available and where residents can enjoy our natural resources is needed.

### **Objectives:**

- 2.1. Develop plans to enhance and protect the recreational opportunities in the town (e.g., walking, snowmobiling, hunting, cross country skiing, golf, fishing, swimming, biking, birding, canoe/boating).

#### Rationale

The list of areas which provides numerous recreational opportunities in Walpole is extensive (Appendix E). A town wide plan that examines these areas as part of a whole recreational plan is needed to ensure their protection and the safety of their users.

#### Recommendations:

- 2.1a. Develop a town wide trail system that includes the rails to trails program.
  - 2.1b. Promote and enforce existing ordinances to protect all private and town properties from misuse (e.g., limit or in some cases prohibit the use of 4x4 and ATV).
  - 2.1c. Inform land owners of the tax benefits of unrestricted 'Current Use' laws and encourage them to provide full recreational access to their lands.
- 2.2. Develop educational material and promote events that inform residents of the recreational opportunities and value in our town's natural resources.

#### Rationale

For all residents to fully enjoy the town's natural resources and the recreational opportunities they present readily accessible information is needed. In addition for effective environmental conservation to occur, it is critical that the residents of Walpole appreciate the quality of life values of the town's natural resources. Thus, we recommend that maps are displayed with appropriate environmental interpretation to help residents develop an appreciation of the

town's natural surroundings and community. Permanent displays (e.g., kiosks) at the town hall would provide excellent educational information for both the townspeople and visitors.

Recommendations:

- 2.2a. Create educational displays for town hall, library, schools and web site.
  - 2.2a i. Build kiosk and bulletin board dedicated to natural resources
  - 2.2a ii. Display Conservation Plan maps in town hall on an easily accessible rack.
- 2.2b. Create brochures/maps that focus on specific activities (e.g., hiking trails, swimming, snowmobiling, fishing etc).
- 2.2c. Promote and publicize educational events.

2.3. Integrate information of the Conservation Plan into the local schools' curriculum.

Rationale

The legacy of our use and abuse of natural resources locally and globally will be felt by our children. Locally we have irreplaceable and magnificent natural resources that provide numerous outdoor recreational opportunities that can enhance appreciation of the natural resources. Our children should have this opportunity and appreciation for the natural world. Sharing our town's history and natural resources (wildlife, fields and forests) with our children is our duty and their right as residents.

Recommendations:

- 2.3a. Collaborate with local school teachers and the Hooper Institute to develop and promote regular environmental education programs that use our town's natural resources (e.g., water, soils, wetlands and wildlife) and enhances their importance (see Appendix F for contacts).

**Goal 3. Ensure that the Conservation Plan is implemented.**

Rationale

The natural resources section of the Master Plan is there to guide the actions of town leaders and residents. Incorporating updated conservation plans to the Master Plan and implementing their recommendations is critical to sustaining the character and irreplaceable natural resources in our town. These updates are critical particularly today when pressures on natural resources and open space are so strong.

## **Objectives:**

3.1. Incorporate the written conservation plan into the town's Master Plan.

### Recommendations:

3.1a. Submit Conservation Plan to Planning Board to be incorporated into the Master Plan within one month of Plan completion.

3.2. Actively seek ways to integrate the Conservation Plan into all town boards' deliberations.

### Recommendations:

3.2a. Conservation Commission should work with all town boards to actively integrate the Conservation Plan objectives into the boards' monthly deliberations and decision making.

3.2b. On an annual basis the town should hold a joint meeting of the Walpole Conservation Commission and all town boards to coordinate and review conservation priorities and progress toward accomplishing the goals of the Conservation Plan.

3.3. Develop criteria to evaluate progress of Conservation Plan implementation.

### Rationale

Simply having a Conservation Plan on paper will be of little use unless it is implemented. Developing an evaluation process to follow the Plan's progress will aid in its implementation.

### Recommendations:

3.3a. Conduct an annual review of the implementation of the conservation plan by a subcommittee that might include: a Selectman, a Planning Board member, a Conservation Commissioner and some citizens. An update each year in the town's Annual Report will also inspire further implementation of the plan.

## **Summary**

In the future Walpole is likely to grow at a greater rate than it has experienced in the past. Many towns that have experienced unplanned rapid growth have lost their historic and rural character. Towns that have been able to retain their integrity were able to anticipate growth and develop means of conserving their natural resources. This Conservation Plan is but one component of the effort to conserve our town's natural resources. This Plan's purpose is to articulate and clarify essential community needs for open space and resource protection. The Plan is presented as a

guide for all town boards and residents involved in future development and it is our hope that these guidelines will be used in all development and land use questions. This Conservation Plan calls for an active town wide effort to conserve open space and directs the town boards to make a conscious effort to do so. The first step to actively embrace a conservation mindset is to review the list of conservation priorities (i.e., aquifer protection, stream and wetland protection, protection of prime farmland soils, retention of unfragmented forest blocks, and the preservation of the town's scenic elements) with each proposed development or subdivision request.

As a means to begin the implementation of the Conservation Plan we suggest that within the first year of completion of the Conservation Plan a checklist of criteria be developed to assist the town in evaluating the implementation of the Plan and that each parcel in town be assigned a conservation value based upon the priorities listed in this Plan. This process should ensure that the spirit and intent of the Plan's recommendations are carried out.

## ***Acknowledgements***

We would like to thank the town boards for acknowledging the effort to develop this Conservation Plan, the selectmen for their input on the written conservation survey, Southwest Regional Planning Commission for sharing other town surveys with us and all the residents who responded to the survey. Thanks are also due to McArd Joseph Mlotha for producing the maps and to anonymous reviewers.

## ***Supporting Documents***

Benedict, M. A. and E. T. McMahon (2002). "Green Infrastructure: Smart Conservation for the 21st Century." *Renewable Resources Journal* Autumn 2002: 12-17.

Chase, V., L. Deming and F. Latawiec (1995). *Buffers for Wetlands and Surface Waters: A Guidebook for New Hampshire Municipalities*, Audubon Society of New Hampshire: 80.

Conway, P. (2005). *Walpole New Hampshire Natural Resource Inventory*. Walpole, Walpole Conservation Commission: 37.

Groom, M. J., G. K. Meffe and C. R. Carroll (2005). *Principles of Conservation Biology*. Sunderland, MA, Sinauer Associates, Inc. Publishers.

Hall, J. H. (1997). *Prime Wetland Inventory of the Town of Walpole, NH*. Walpole, Walpole Conservation Commission.

Institute, E. L. (2003). *Conservation Thresholds of Land Use Planners*. Washington, DC, The Environmental Law Institute: 55.

Naiman, R., H. Decamps and M. Pollack (1993). "The role of riparian corridors in maintaining regional biodiversity." *Ecological Applications* 3(2): 209-212.

Vose, E. and J. O. Palmiotto (2003). Source Protection Plan Walpole, New Hampshire, Walpole Water Department: 55.

Southern New Hampshire Planning Commission. June 2004 *Preparing a Master Plan for Your Community: A handbook for planning board members, planners and volunteers*.  
<http://www.state.nh.us/oep/resourcelibrary/referencelibrary/m/masterplan/preparingamasterplan/documents/chapter1.pdf#search='NH%20towns%20Master%20Plan> June 9, 2006.

Town of Walpole. 2005. Site Plan Review Regulations. Planning Board.

UNH Big Tree Program. University of New Hampshire Cooperative Extension, Big Tree Program. 2004. <http://extension.unh.edu/Forestry/FORCTS.htm>. June 9, 2006.

Table 1. Conservation goals, objectives and recommendations of the Walpole Conservation Plan.

<b>Goal 1: Identify specific conservation priorities that are essential to maintain the town’s natural communities and their inhabitants.</b>	
<b>Objectives</b>	<b>Recommendations</b>
1.1. Protect drinking water resources (e.g., public well recharge zones, aquifers).	<p>1.1a. Enforce wellhead protection ordinance.</p> <p>1.1b. Examine extending wellhead protection regulations over all of the town aquifers. The wellhead protection ordinance restricts land use activities that may have a negative impact on the aquifer.</p> <p>1.1c. Strictly enforce Site Plan Review Regulations (October 12, 2004) that encourage Best Management Practices in the construction of parking areas and surfaces in a manner that does not negatively affect the aquifer and surface water ways (e.g., use alternative permeable materials other than asphalt, e.g. Greenpave, Gravelpave, Ecostone or Turfstone and/or plant trees in parking lots).</p>
1.2. Conserve habitat for wildlife and native plant diversity (e.g., wetlands, unique forest communities, early successional open fields and other areas).	<p>1.2a. Establish 100’ set back on wetlands and all perennial streams.</p> <p>1.2b. Develop a dialogue and plan with the regional power company (currently National Grid) that recognizes the importance of and maintains the early successional habitat under the power line using Best Management Practices with the goal of creating habitat for wildlife.</p>
1.3. Conserve areas categorized as having prime agricultural soils and active farms.	<p>1.3a. Create farmland overlay district that elevates the conservation value of properties with prime farmland soils and currently active farms (to ensure large % stays or has the potential to stay in production e.g., agriculture, animal husbandry or forests).</p> <p>1.3b. Communicate and promote effective use of conservation easements and any other means to preserve agriculture land.</p>

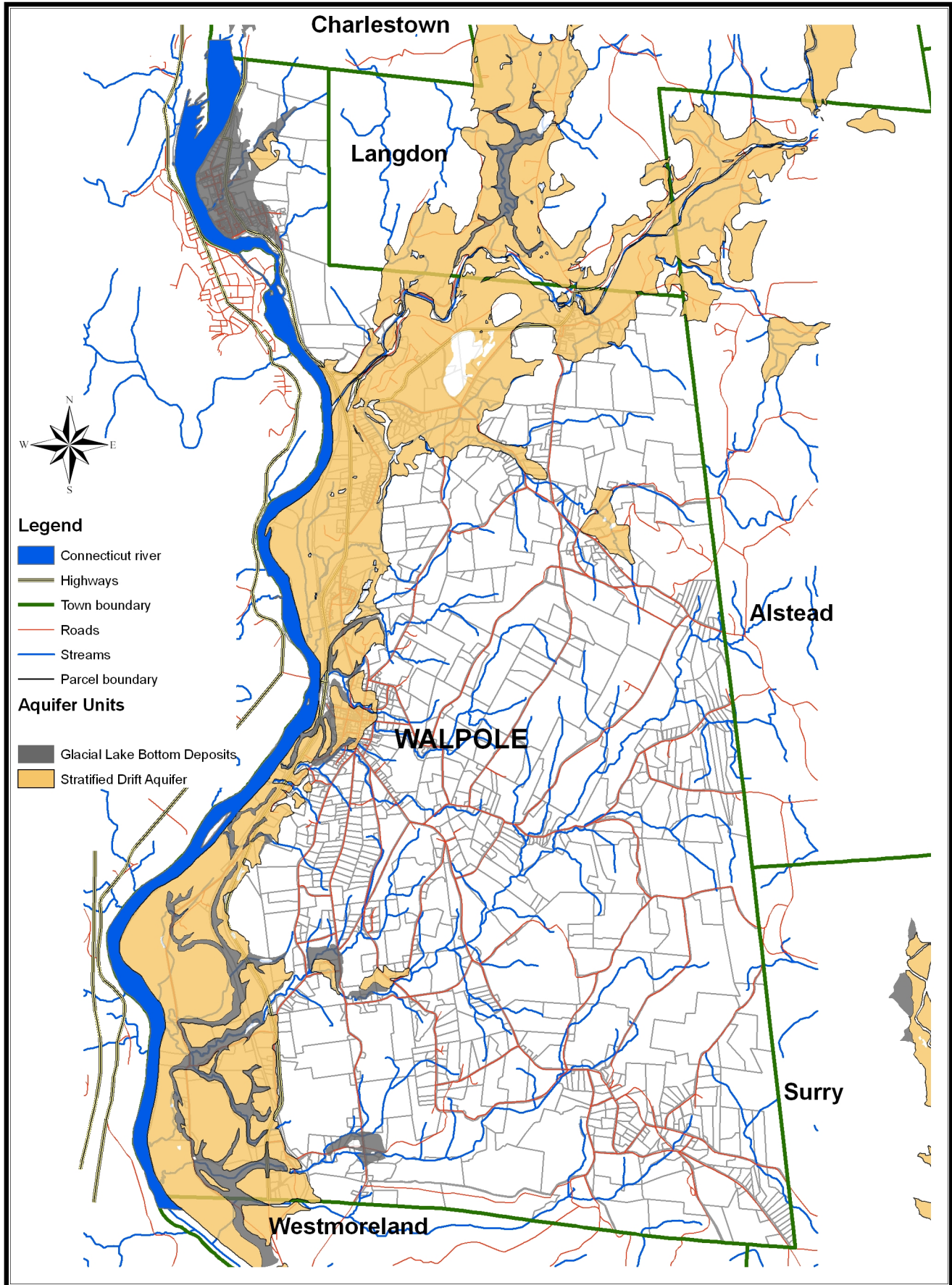
<p>1.4. Encourage the preservation of large forested blocks.</p>	<p>1.4a. Identify large unfragmented forest blocks  1.4b. Avoid fragmentation of large blocks by informing town boards and property owners within large forest blocks of the block locations and importance.</p>
<p>1.5. Encourage the preservation of the scenic elements of the natural environment and the aesthetic and historic integrity of Walpole. (Goal 2 of Master Plan)</p>	<p>1.5a. Encourage the creation of green corridors from CT. River to hills, along major rivers and streams and green ridgelines.  1.5b. Encourage the establishment of a scenic road system of class VI roads in Walpole which are of conservation significance (see Master Plan section VI. Conservation and Preservation Techniques, G. Scenic Road System).  1.5c. Encourage adoption of a scenic designation for non class VI roads (e.g., Rte. 12 and other highways) which would minimize the visual impact of development (e.g., see setbacks and screening see Section VIII of Site Plan Review Regulations).</p>
<p>1.6. Conserve at least 25% of town acreage over the next 10-20 years.</p>	<p>1.6a. Assist interested landowners in conserving land.  1.6b. Establish Conservation funding vehicle that will enable the Conservation Commission to acquire priority conservation lands via easement or purchase.  1.6bi. Develop cost benefit analysis showing impact on tax base.  1.6bii. Explore sources of funding (e.g., conservation bond).  1.6biii. Develop and maintain collaboration with local conservation groups.</p>



<b>Goal 2. Increase residents' awareness of the importance of natural resources.</b>	
<b>Objective</b>	<b>Recommendation</b>
2.1. Develop plans to enhance and protect the dominant recreational opportunities in the town (e.g., walking, snowmobiling, hunting, cross country skiing, golf, fishing, swimming, biking, birding, canoe/boating).	2.1a. Develop a town wide trail system that includes the rails to trails program. 2.1b. Promote and enforce existing ordinances to protect all private and town properties from misuse (e.g., limit or in some cases prohibit the use of 4x4 and ATV). 2.1c. Inform land owners of the tax benefits of unrestricted 'Current Use' laws and encourage them to provide full recreational assess to their lands.
2.2. Develop educational material that informs residents of the recreational opportunities and quality of life value in our town's natural resources.	2.2a. Create educational displays for town hall, library, schools and web site. 2.2ai. Build kiosk and bulletin board dedicated to natural resources 2.2aia. Display Conservation Plan maps in town hall on an easily accessible rack. 2.2b. Create brochures/maps that focus on specific activities (e.g., hiking trails, swimming, snowmobiling, fishing etc).  2.2c. Promote and publicize educational events.
2.3. Integrate information of Conservation Plan into local school curriculum.	2.3a. Collaborate with local school teachers and the Hooper Institute to develop and promote regular environmental education programs that use our town's natural resources (e.g., water, soils, wetlands and wildlife) and enhances their importance (see Appendix F for contacts).

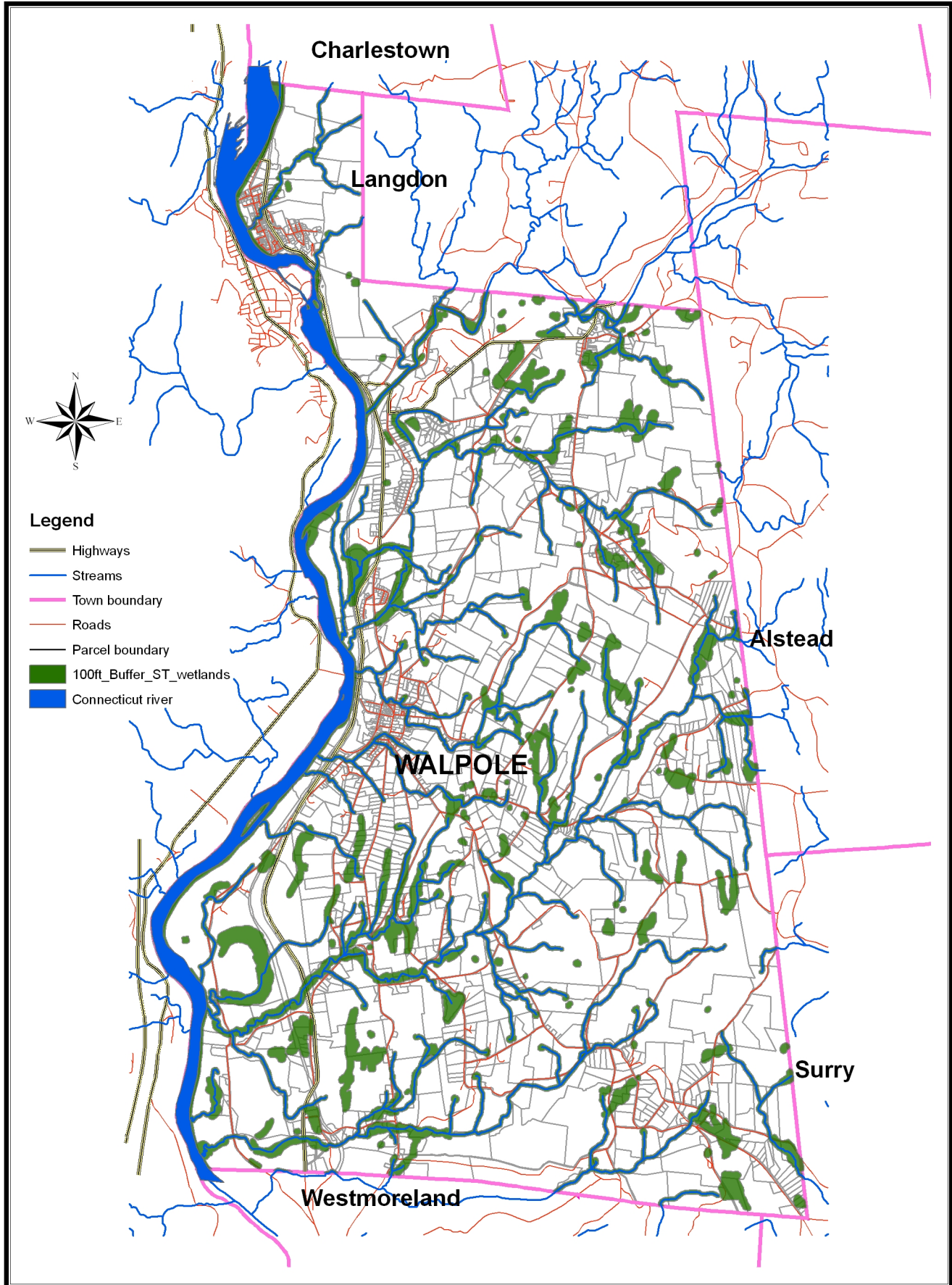
<b>Goal 3. Ensure that the Conservation Plan is implemented.</b>	
<b>Objectives</b>	<b>Recommendations</b>
3.1. Incorporate the written Conservation Plan into the town's Master Plan	3.1a. Submit Conservation Plan to Planning Board to be incorporated into the Master Plan within one month of Plan completion.
3.2. Integrate the Conservation Plan into town board's deliberations and decision making.	3.2a. Conservation Commission should work with all town boards to actively integrate the Conservation Plan objectives into the boards' monthly deliberations and decision making.  3.2b. On an annual basis the town should hold a joint meeting of the Conservation Commission and all town boards to coordinator and review conservation priorities and progress toward accomplishing the goals of the Conservation Plan.
3.3. Develop criteria to evaluate progress of Conservation Plan implementation.	3.3a. Conduct an annual review of the implementation of the conservation plan by a subcommittee that might include: a Selectman, a Planning Board member, a Conservation Commissioner and some citizens. An update each year in the town's Annual Report will also inspire further implementation of the plan.

# Map 1. Aquifers Walpole, NH.



4,000 2,000 0 4,000 8,000 12,000 16,000 Feet  
 This map was produced by McARD Joseph Mlotha, June 2006  
 Based on GIS data sets obtained from NH GRANIT.

# Map 2. Proposed 100ft buffer on Streams & Wetlands, Walpole NH.

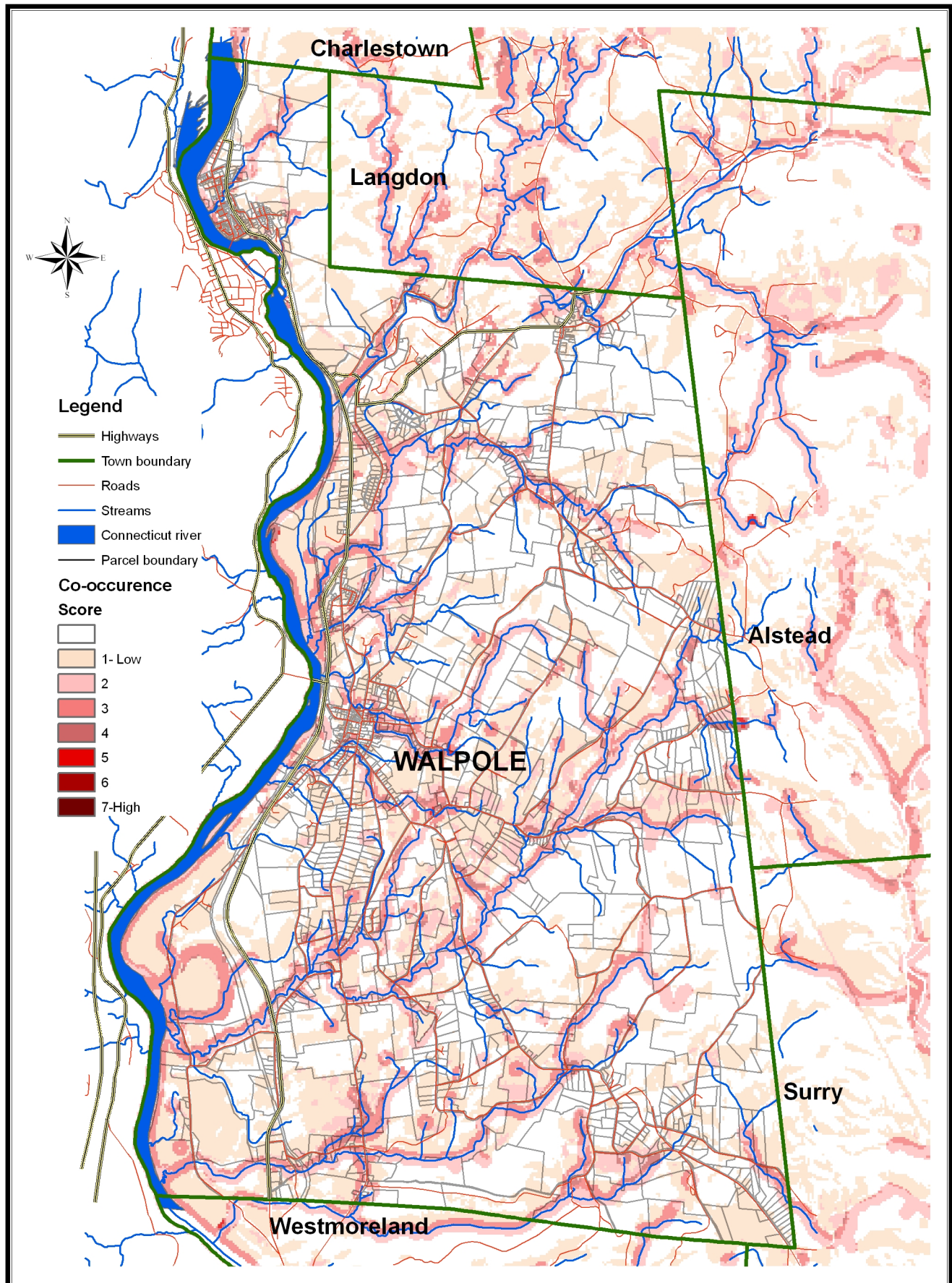


3,400 1,700 0 3,400 6,800 10,200 13,600  
Feet

This Map was produced by McARD Joseph Mlotha, June 2006  
based on GIS data sets obtained from NH GRANIT.

Area under 100ft buffer on streams and wetlands is 5173.365 acres

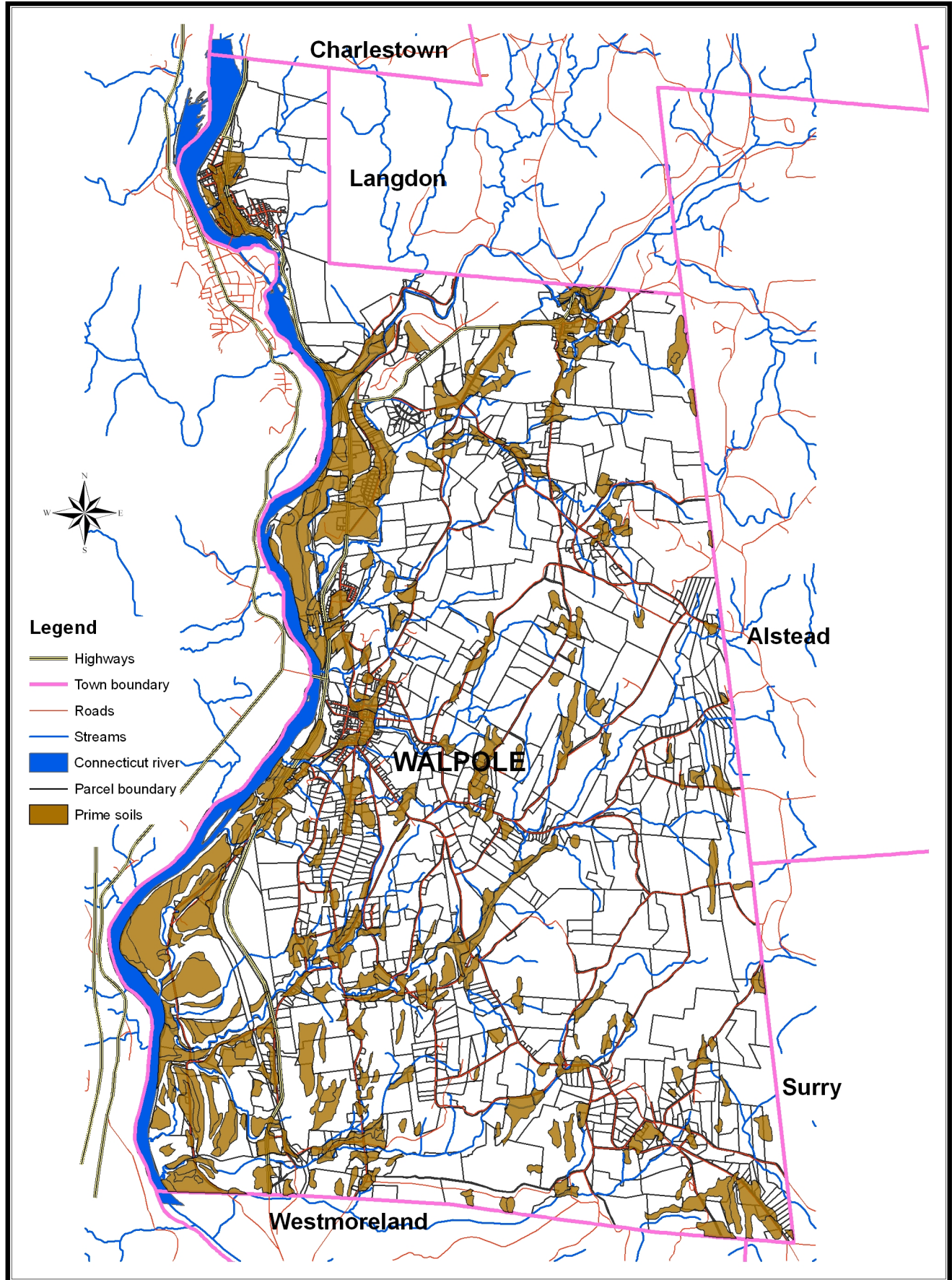
**Map 3. Wildlife Habitat Co-occurrence Scores, Walpole, NH.**



2,900 1,450 0 2,900 5,800 8,700 11,600  
 Feet

This Map was produced by McARD Joseph Mlotha, June 2006 based on Coarse filter significant wildlife habitat: Co-occurrence scores mapping done by US Fish and Game Department, New Hampshire, 2005.

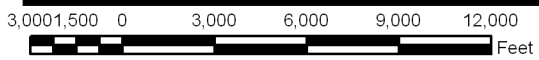
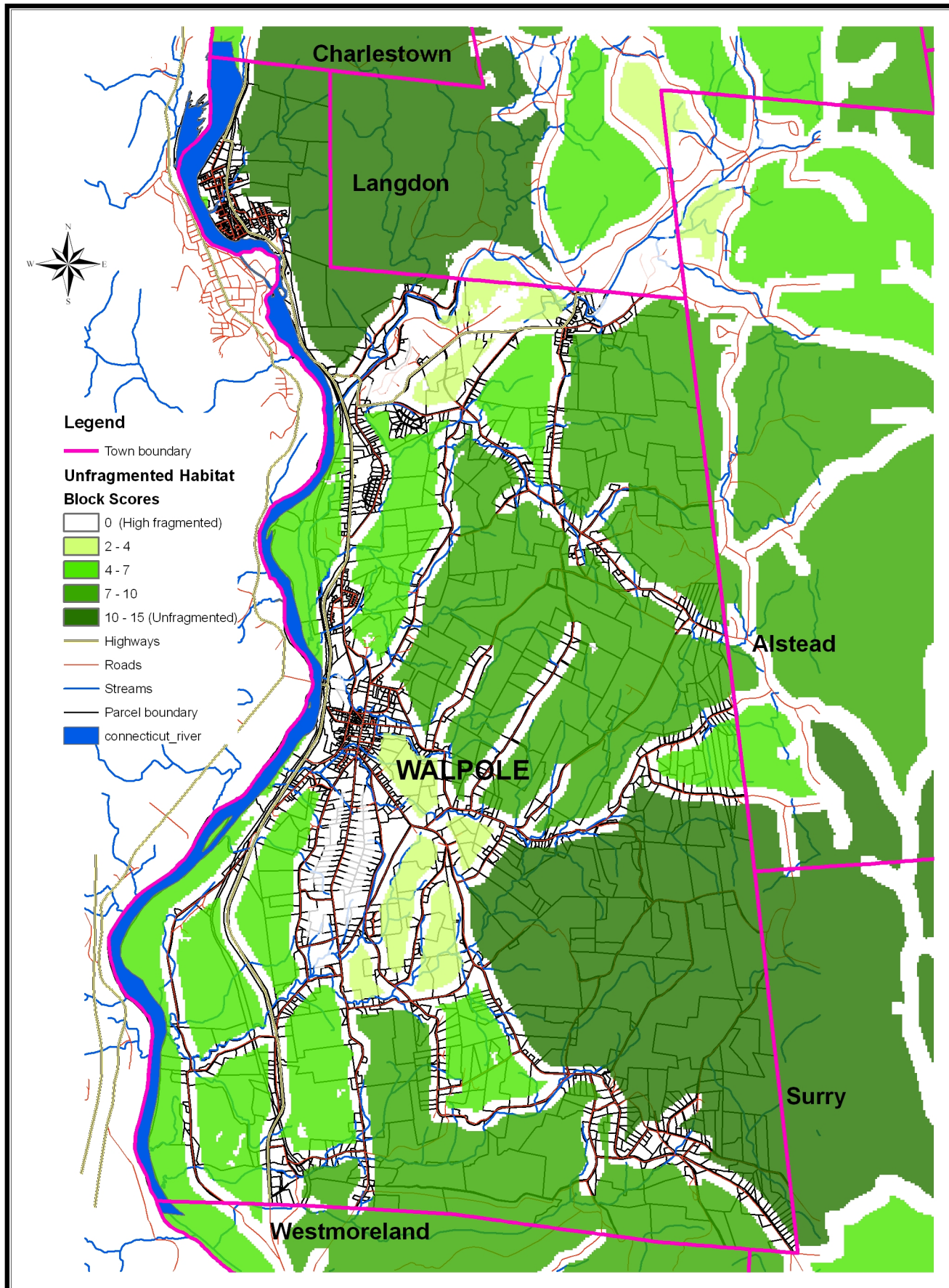
# Map 4. Prime Soils, Walpole, NH.



3,000 1,500 0 3,000 6,000 9,000 12,000  
Feet

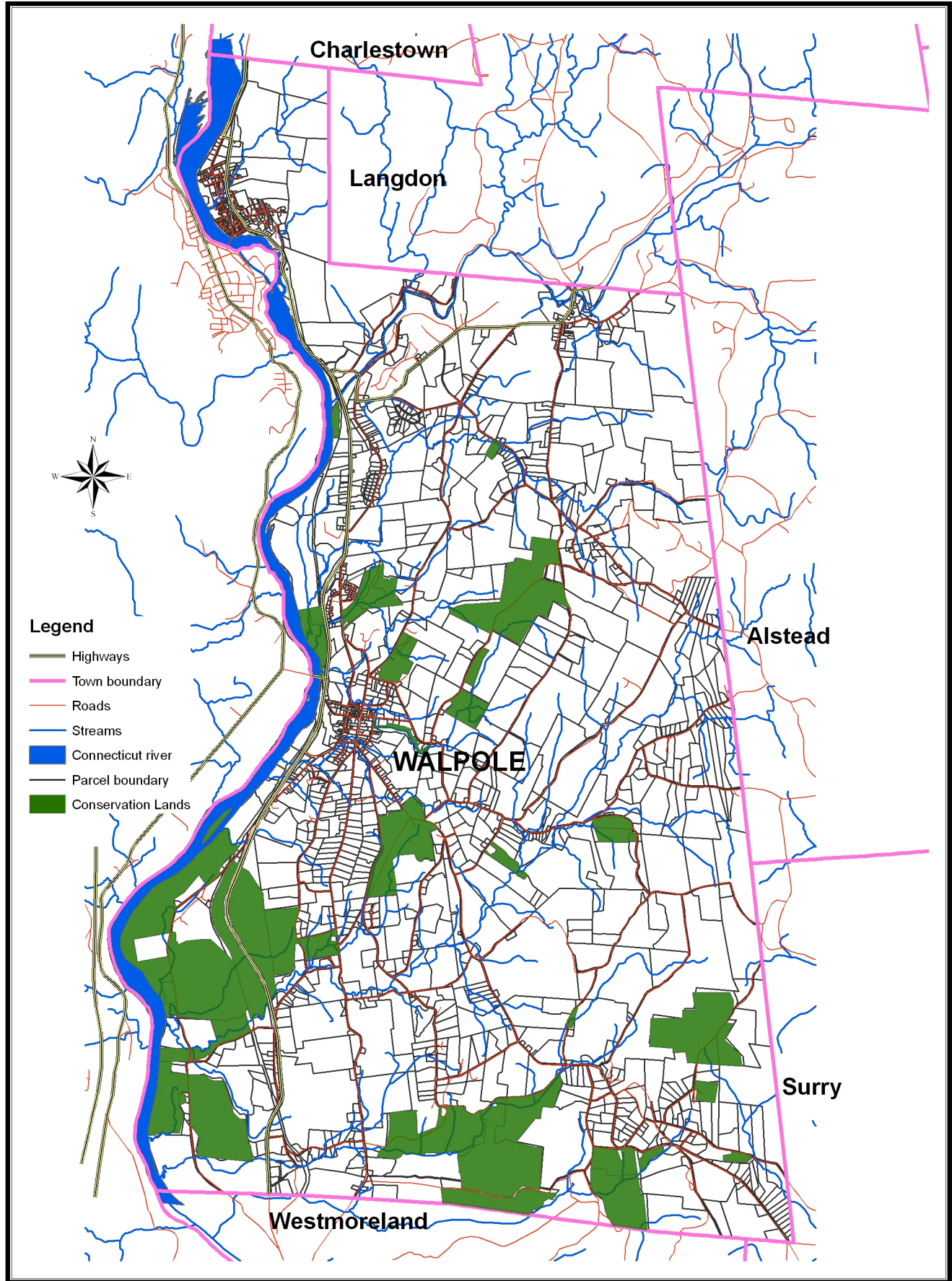
This Map was produced by McARD Joseph Mlotha, June 2006  
based on GIS data sets obtained from NH GRANIT.

# Map 5. Unfragmented Habitat, Walpole, NH.



This Map was produced by McARD Joseph Mlotha, June 2006 based on Coarse filter significant wildlife habitat: Co-occurrence scores mapping done by US Fish and Game Department, New Hampshire, 2005.

# Map 6. Conservation Land, 2005, Walpole, NH.



3,000 1,500 0 3,000 6,000 9,000 12,000  
Feet

This Map was produced by McARD Joseph Mlotha, June 2006  
based on GIS data sets obtained from NH GRANIT.



## **Appendix A. Conservation Plan Task Force Members**

Chris Caserta 663 Wentworth Road Walpole, NH 03608	756-2805	caserta23@yahoo.com
Joseph Dion 143 Wentworth Road Walpole, NH 03608	756-3160	JDPD3@verizon.net
Marcia Galloway 467 Watkins Hill Road Walpole, NH 03608	756-3604	none
Paul Happ 35 Maple Grove Road Walpole, NH 03608	756-3736	phapp@yhp.com
Alan Johnson 136 Upper Valley Road Walpole, NH 03608	445-5021	alan@rnjohnsoninc.com
Kim Lewis RR1 Box 425 Walpole, NH 03608	756-9204	klouie@sover.net
Mary Lou Montgomery 114 Ramsey Hill Road Walpole, NH 03608	756-3965	gunning@cape.net
Peter Palmiotto, chairperson PO Box 338, 66 Elm St Walpole, NH 03608	756-9331	ppalmiotto@antiochne.edu
Lewis Shelley 19 Merriam Road Walpole, NH 03608	756-3640	snowhawk@localnet.com
Gary Speed 337 Maple Grove Road Walpole, NH 03608	756-3702	uglydog@verizon.net
Duncan Watson PO Box 12 Drewsville, NH 03604	445-2546	dwatson@ci.keene.nh.us
Melvyn Schupack PO Box 546, 33 Webster La, Walpole, NH 03608	756-9389	melschupack@aya.yale.edu
Judy Trow 582 County Road Walpole, NH 03608	756-4786	jtrow@sevca.org

## **Appendix B. Results of the Community Survey for a Conservation Plan, Town of Walpole NH. February 2006.**

### **Introduction and Methods**

The process to update the Conservation Plan for the Town of Walpole formally began in April 2005 when the town wide Natural Resources Inventory was completed and the Conservation Commission established a committee to set goals for the plan. The goals of the conservation plan were submitted to the town boards in May 2005 and a task force comprised of volunteer town residents and WCC members was formed to develop objectives and recommendations. As part of this process the task force developed a survey seeking the public's view on selected conservation issues. The surveys were mailed to 2125 residents and non resident property owners in January 2006. Surveys were returned to five drop off locations in town or mailed to the Conservation Commission.

### **Results**

#### Demography of Respondents

There were 276 responses to the survey. This is a 13.0% return and varied by location to which surveys were mailed (Table 1). The majority (90%) of the respondents were resident property owners (Table 2). Forty nine percent of the respondents have been residents for more than 20 years with an addition 30% having resided in town between five and 20 years (Figure 1). Forty-four percent of the respondents own property between 1-10 acres.

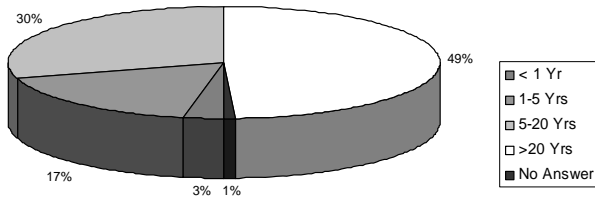
Table 1. Number of Walpole Conservation Commission surveys mailed and returned with percent returned by town, February 2006.

Mailing Address	#mailed	# returned	% return
Walpole	1435	238	16.6
Drewsville	100	13	15.0
North Walpole	410	15	3.2
<u>Non resident property owner</u>	<u>180</u>	<u>10</u>	<u>5.6</u>
Total	2125	276	13.0

Table 2. Distribution of respondents to Walpole Conservation Commission by ownership status, February 2006.

<u>Ownership status</u>	<u># returned</u>	<u>%</u>
Resident property owner	247	89
Renter	17	6
Non resident property or home owner	10	4
Status not indicated	2	1

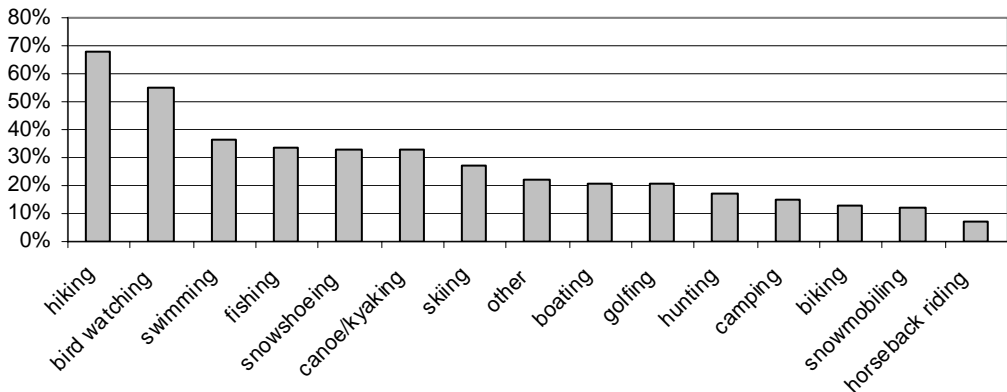
**Figure 1. Survey response by length of residence**



**Outdoor Recreational Use**

Respondents on average indicated four ways in which they enjoyed the recreational opportunities in our town with hiking and bird watching being the most popular at 68% and 55% respectively (Figure 2). Swimming (37%), fishing (34%), snowshoeing (33%) and canoeing/kayaking (33%) were additional activities that a large number of respondents enjoyed.

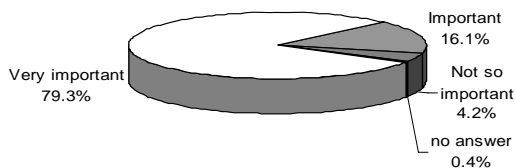
**Figure 2. Outdoor Recreational Activities**



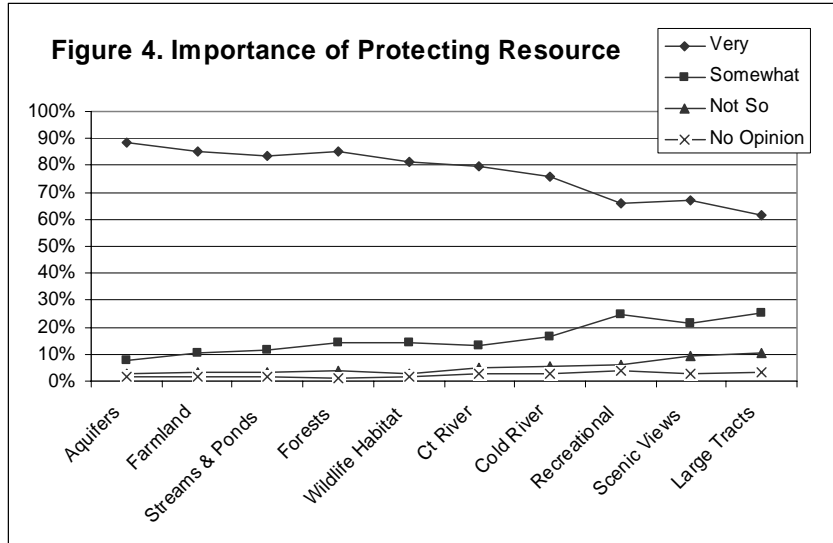
**Conservation views**

The majority of respondents (94%) indicated that preserving open space was important or very important with only 4% indicating it was not so important (Figure 3).

**Figure 3. Importance of Open Space**



When asked if certain listed resources were important to protect respondents consistently said that they were (Figure 4). No more than 11% indicated that any of the resources listed were not so important to protect. Aquifers (88%), farmland (85%), and streams and ponds (84%) were selected the most as being very important to protect.



When asked which resources needed regulations to ensure their protection respondents placed aquifers, wetlands and streams at the top of the list (Table 3).

Table 3. The opinion of respondents to Walpole Conservation Commission survey on which town resources need regulation to insure their protection.

	<u>Yes</u>	<u>No</u>	<u>not sure</u>	<u>no opinion</u>	<u>no answer</u>
Aquifer	247	10	11	2	6
Wetlands	239	16	13	2	6
Streams	234	21	9	2	9
Special Habitat and Places	212	23	28	5	8
Steep Slopes	183	30	44	8	11
Scenic views	193	39	26	11	7
Scenic roads	174	40	42	9	11
Others	10		1		

When asked if they were in favor of increased protection of wetlands respondents overwhelmingly indicated yes (90%) with only 6% not in favor and 4% not giving an opinion. When asked how much of a setback was necessary to protect the wetland the majority respondents (60%) suggested a setback of 100 feet (Figure 5). Ten percent of the respondents that favored increased protection were not sure about setback distances.

Other issues of concern which respondents indicated should have guidelines: the screening of commercial development, off road 4x4 vehicle operation and noise pollution (Table 4).

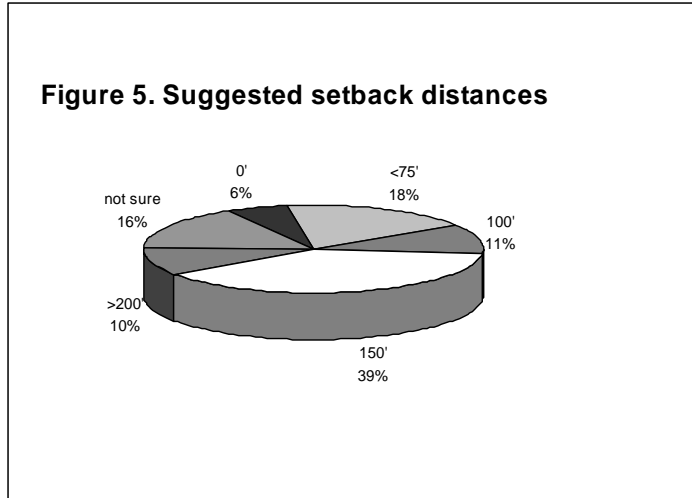


Table 4. The opinion of respondents to Walpole Conservation Commission survey on which quality of life issues need guidelines in the town of Walpole.

	<u>Yes</u>	<u>No</u>	<u>not sure</u>	<u>no opinion</u>	<u>no answer</u>
Screen development	226	24	18	1	7
4x4	223	25	23	0	5
Noise	212	36	16	4	8
Light	182	39	40	6	9
Ridges	175	40	49	6	6
Others	25				

### Conservation Easements and Funding

The majority (67%) of the respondents indicated that they knew how a conservation easement works, whereas only 22% did not know. When asked if they would consider placing a conservation easement on their land, 47% were in favor of doing so and 34% would not be in favor. A small percentage of the respondents (10%) did request additional information on conservation easements.

The overwhelming majority of respondents favored seeking state or federal grants (88%) and charitable donations (86%) to fund conservation efforts. A smaller percentage favored tax increases via annual budget appropriations (60%), a town bond (31%) or straight property tax increase (17%) as a means to fund conservation efforts.

### **Conclusions**

A strong conservation attitude is clearly presented in the results of this survey. It is clear that aquifer protection and outdoor recreational activities are a major concern for residents that responded to the survey. It provides information to the town boards which can be used to guide the conservation planning process and hopefully aid in the maintenance of the rural character and quality of life in Walpole.

**Appendix C. List of conservation lands, their acreage and ownership or easement holder as of April 2005 in Walpole, NH.**

	<u>Name</u>	<u>Acres</u>	<u>Ownership and Easement Holder</u>
1	Academy Ravine	11	Town Owned
2	Fanny Mason Forest	245	Town Owned
3	Hooper Farm Woodland + Golf Course	109	Town Owned
4	Hooper Forest	130	Town Owned
5	Cranberry Meadow Nature Sanctuary	15	Town Owned
6	Merriam Town Forest Easement	12	Town Owned & Monadnock Conservancy
7	Mill Pond Sanctuary	131	Town Owned
8	March Town Forest Easement	23	Town Owned & Monadnock Conservancy
9	Nelson Town Forest Easement	23	Town Owned & Monadnock Conservancy
10	Reservoir Town Forest Easement	59	Town Owned & Monadnock Conservancy
11	Watershed Town Forest Easement	109	Town Owned & Monadnock Conservancy
12	Trombley Town Forest Easement	24	Town Owned & Monadnock Conservancy
13	Stevens / Hocking Wetland Cons	5	Town Owned
14	Paap Wetland Conservation Area	7	Town Owned
15	Great Brook Town Forest	44	Town Owned
16	Bertin Town Forest	23	Town Owned & Monadnock Conservancy
17	Beatrice Graves	69	Town Easement
18	Aldrich, Wright + Hudson	49	Town Easement
19	Leslie Hubbard Easement	15	Town Easement
20	Mr. and Mrs. I. Tucker Burr Easement	10	Town Easement
21	Faulkner P. / Windgate Woodland	165	Society for the Protection of NH Forests
22	High Blue	164	Society for the Protection of NH Forests
23	Galloway Family	614	Society for the Protection of NH Forests
24	Hubbard Easement	15	Monadnock Conservancy
25	Barrett	203	State Owned
26	Great Island WMA	12	State Owned
27	Hubbard Farms WMA	39	State Owned
28	NH DOT	11	State Owned
29	UNH - WENH T.V. Transmitter Site	19	State Owned
30	Cabot - Boggy Meadows	461	State Owned
31	Sawyer Easement/River Meadow	92	Town Owned & Monadnock Conservancy
32	Connecticut River Access - Walpole	14	State Owned
33	Stuart Parcel	12	Town Owned & Monadnock Conservancy
34	LaClair Easement	5	Town Owned & Monadnock Conservancy
<hr/>			
	Total Acreage	2939	

***Appendix D. Address and phone numbers of regional Conservation Organizations.***

Monadnock Conservancy  
P.O. Box 337  
Keene, NH 03431  
603 357-0600

Southwest Regional Planning Commission  
20 Central Square, 2<sup>nd</sup> floor  
Keene, NH 03431  
603 357-0557

The Nature Conservancy  
22 Bridge Street, 4th Floor Concord, New Hampshire 03301  
(603) 224-5853

The Society for the Protection of NH Forests  
54 Portsmouth Street  
Concord, NH 03301  
603 224-9945

The Trust for Public Land  
3 Shipman Place  
Montpelier, VT 05602  
802-223-1373 ext. 23

**Appendix E. Recreational areas with some examples of recreational opportunities and class VI roads in Walpole, NH.**

<u>Recreational Area</u>	<u>Common use</u>
Boston & Maine Railroad bed	snowmobiling
Brooks (Aldrich, Houghton, Great & Blanchard)	fishing, swimming
Connecticut River	kayaking, canoeing, fishing, bird watching
Cold River	kayaking, canoeing, fishing, bird watching
Drewsville Common	playground
Episcopal Church lot-skating & ball field	winter recreational skating, summer baseball
Extra Innings	indoor batting cages, birthday parties
Fall Mountain Trail-Table Rock	Table Rock access from end of Mt View Rd
Fall Mountain Trail-North Pond	North Pond access behind Whitney Blake building
Frank Whitcomb Recreational Park	swimming, basketball, tennis, playground
Hubbard/Roentch ball field	baseball
Hooper Golf course	Golf, xcountry skiing, snowmobiling
Hooper Institute	Outdoor education
Hooper Hill Hoppers Snowmobile trails	snowmobiling
N. Walpole Pine Street boat launch & rec area	boat launch, picnicking
N. Meadow Little League ball field	children baseball, adult viewing of baseball
Ponds (Tom's Graves)	cat fishing
Rt.12 CT River boat launch area (South of Vilas bridge)	boat launch, picnicking
Utility power lines	hunting, bird watching
Walpole Academy grounds	weddings, picnicking
Walpole School Playgrounds & Ball fields	baseball, softball, soccer fields, playground
Walpole Town Common	concerts, weddings, ceremonies, flea markets, fairs, nativity scenes

Discontinued roads or class VI roads (on all or part) that provide recreational opportunities such as hiking, biking, skiing, snowmobiling, birding, horseback riding.

---

Alice Smith Road	Merriam Road
Angier Road	Old Stage Road
Cochran Road	Pelsue Road
Cheney Hill Road	Priest Road
Derry Hill Road	Ramsay Hill Road
Eaton Road	Rapids Road
Evans Road	Reservoir Road
Fay Road	Santaw Lane
Four Winds Road	Scovill Road
French Road	Stowell Lane
Kilbe Hill Road	Wentworth Road
Leonard Road	Whipple Hill Road
LeClair Road	Woodshed Road
Maple Grove Road	Woods Road



## **Appendix F. Walpole School Contacts**

Fall Mountain Regional High School  
SAU #60  
P.O. Box 600  
Charlestown, NH 03603

Tom Ferenc, Principal. Phone: 835-6318, Email: [tferenc@sau60.k12.nh.us](mailto:tferenc@sau60.k12.nh.us)  
Bill Doran, Environmental Science Teacher Phone: 835-6318, Email: [bdoran@sau60.k12.nh.us](mailto:bdoran@sau60.k12.nh.us)

Walpole Elementary School  
8 Bemis Lane  
Walpole, NH 03608

Sam Jacobs, Principal Phone: 756-4728, Email: [sjacobs@sau60.k12.nh.us](mailto:sjacobs@sau60.k12.nh.us)  
Kim Lewis, Science Teacher Phone: 756-4728, Email: [klouie4@verizon.net](mailto:klouie4@verizon.net)

Hooper Institute  
Prospect Hill  
Walpole, NH 03608

Eloise Clark , Environmental Educator (working with Walpole Schools grades 4-7):  
Phone: 756-4382

Becky Whippie, Environmental Educator (working with Walpole Schools grades 1-3):  
Phone: 756-4382

Technical Assistance: The Master Degrees in Environmental Studies at Antioch New England graduate school in Keene requires at least 600 hours practica experience (300 or 150 hr each). These are practical experiences where students work on projects in the real world in cooperation with companies, governments, schools, or organizations with the environment in mind. The recent wetlands inventory and natural resource inventory of Walpole were projects done by graduate student from the ES Department at Antioch. These inventories are a tremendous asset for the town. There may be students who are interested in doing the environmental interpretation needed for the educational tasks noted above. To access students who may be interested in doing a practicum for the Walpole Conservation Commission, contact Practicum Coordinator @ 357-3122 x 230

Antioch New England Graduate School  
40 Avon Street  
Keene, NH 03431-3552  
[www.antiochne.edu](http://www.antiochne.edu)

## ***Appendix G. Glossary of Terms***

All town boards- Includes the Board of Selectman, the Planning board, and the Zoning Board.

Aquifer- an underground layer of water-bearing permeable rock, or unconsolidated materials (gravel, sand, silt, or clay) from which groundwater can be usefully extracted using a water well. (Wikipedia)

Buffer –bands of permanent vegetation between streams, wetlands or vernal pools and areas subject to human activities or potential human activities (ie., a protection zone in which human alteration is prohibited).

Early successional – habitat that provides grass and/or shrub cover for wildlife species

Endangered- is a population of organisms (frequently but not always a taxonomic species) which is either (a) so few in number or (b) threatened by changing environmental or predation parameters that it is at risk of becoming extinct. (Wikipedia)

Fauna- a collective term for animal life of any particular region or time. The corresponding term for plants is flora; the term which includes both fauna and flora is biota. (Wikipedia)

Fodder- In agriculture, fodder or animal feed is any foodstuff that is used specifically to feed livestock, such as cattle, sheep, chickens and pigs. (Wikipedia)

Fragmentation (habitat)- a process of environmental change important in evolution and conservation biology. As the name implies, it describes the emergence of discontinuities (fragmentation) in an organism's preferred environment (habitat). Habitat fragmentation can be caused by geological processes that slowly alter the layout of the physical environment or by human activity such as land conversion, which can alter the environment on a much faster time scale. The former is suspected of being one of the major causes of speciation. The latter has been implicated in the extinction of many species. (Wikipedia)

Green infrastructure- an interconnected network of green space that conserves natural ecosystem values and functions and provides associated benefits to human populations. (Benedict and McMahon, 2002)

Habitat- is the place where a particular species lives and grows. It is essentially the environment—at least the physical environment—that surrounds (influences and is utilized by) a species population. (Wikipedia)

Impervious surfaces – surfaces that seal the soil surface, eliminating rainwater infiltration and natural groundwater recharge (Wikipedia)

Master Plan- “a planning document that serves to guide the overall character, physical form, growth and development of a community.” RSA 674.1 the planning board has the duty “to

prepare and amend from time to time a master plan to guide the development of the municipality.” See RSA 674:2. for list of 10 required elements. (SNHPC, 2004)

Percolation- concerns the movement and filtering of fluids through porous materials. (Wikipedia)

Perennial streams- a stream that normally flows year round because it is sustained by ground water discharge as well as surface runoff (Chase etal 1997)

Permeable- In geology, permeability is a measure of the ability of a material (typically, a rock or unconsolidated alluvial material) to transmit fluids through it. It is of great importance in determining the flow characteristics of hydrocarbons in oil and gas reservoirs, and of groundwater in aquifers. (Wikipedia)

Preservation- to protect natural resources including plant and animal species as well as their habitat for future use. (Wikipedia)

Protected land- acreage that has landuse restrictions attached to the property deed that restrict development.

Recharge zone- where surface water enters the aquifer. (Wikipedia)

Riparian buffer- the interface between land and a flowing surface water body. They are typically characterized by hydrophilic vegetation and are often subject to flooding. Riparian zones are significant in ecology, environmental management and civil engineering due to their role in soil conservation, their biodiversity and the influence they have on aquatic ecosystems. Riparian zones occur in many forms including grassland, woodland, wetland or even non-vegetative. (Wikipedia)

Setback- In land use, a setback is the distance which a building or other structure is set back from a street or road, a river or other stream, a shore or flood plain, or any other place which needs protection. (Wikipedia)

Source water protection area - is the surface and subsurface areas from or through which contaminants are reasonably likely to reach a water system source (Vose and Palmiotto, 2003).

Successional- used as an adjective that refers to a group of plants that are in one stage of a sequence of predictable changes in composition and structure of a plant community over time

Sustainable- of, relating to, or being a method of harvesting or using a resource so that the resource is not depleted or permanently damaged (Wikipedia)

Threatened- as a conservation status, are animal and plant species which are at risk of being extinct. Threatened species includes all species which are vulnerable, endangered or critically endangered. In many areas, this is referred to as a red-listed species. (Wikipedia)

Unfragmented habitat - Map 5 shows unfragmented habitat greater than 25 acres. This map was generated by NH Fish and Game Dept. by selecting the natural landcover classes in 2001 NH Landcover Assessment data provided by GRANIT. Developed land classes, NHDOT class I-V roads and any water body greater than ¼ mile wide was considered a fragmenting feature. Habitat blocks were ranked based on size and area/perimeter ratio.

Vernal pool- is usually a shallow depression in level ground with no permanent above-ground outlet. In the northeast United States vernal pools fill with the rising water table or with the meltwater and rain of spring. They are fishless, and thus allow the safe development of natal amphibian and insect species. (Wikipedia)

Wellhead- refers to the location of our two town public drinking water wells.

Wetland- those areas that are inundated or saturated at a frequency and duration sufficient to support a prevalence of vegetation typically adapted for life in saturated soil conditions. (Federal Regulatory definition). Wetlands generally include swamps, marshes, bogs and similar areas.

Wildlife habitat co-occurrence scores - Map 3 showing wildlife habitat co-occurrence scores was generated by NH Fish and Game Dept. by overlaying important features for wildlife (NH Fish and Game). These features were riparian corridors, wetlands greater than five acres, palustrine emergent wetlands, clusters of wetlands less than five acres, agriculture and other non forested lands, uncommon habitat, and south facing slopes greater than 10%. The darker the color the more habitat features overlap and thus a greater significance to wildlife.